Our File Ref: PDD/CBS-2:KC/20052007

市區重建局
URBAN RENEWAL AUTHORITY

22 May 2020

By Hand

The Secretary
Town Planning Board,
15/F, North Point Government Offices,
333 Java Road, North Point,
Hong Kong

Dear Sir/Madam,

Submission of the Draft Development Scheme Plan for the Urban Renewal Authority Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

I am pleased to submit 4 copies of the draft Development Scheme Plan ('DSP') for the Urban Renewal Authority ('URA') Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) ('the Scheme') for Town Planning Board ('TPB')'s consideration in accordance with section 25(5) of the Urban Renewal Authority Ordinance ('URAO').

The Scheme was approved by the Financial Secretary for implementation in 2020/2021. On 22 May 2020, the URA has published the commencement of the Scheme in the Government Gazette under section 23 of the URAO and subsequently in local newspapers.

The submission booklet for the draft DSP of CBS-2:KC includes the Planning Report as Part 1 to summarize the planning proposals; the draft DSP, its Notes and Explanatory Statement as Part 2; the supplementary information to support the DSP submission as Part 3, which includes Preliminary Design, Traffic Impact Assessment (TIA), Environmental Assessment (EA), Air Ventilation Assessment (AVA), Drainage Impact Assessment (DIA), Sewerage Impact Assessment (SIA), Water Supply Impact Assessment (WSIA), Visual Appraisal (VA), Stage 1 Social Impact Assessment Report and the implementation programme and URA's acquisition and compensation policies.

In accordance with the Urban Renewal Strategy, the Stage 2 Social Impact Assessment Report will be included as part of the DSP submission. Based on the Gazette, we intend to submit the Stage 2 Social Impact Assessment Report to the TPB on or before 8 July 2020. We believe that there will still be sufficient time for TPB's consideration for the aforesaid report together with the submitted DSP.

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Our File Ref: PDD/CBS-2:KC/20052007

To facilitate the inspection of the draft DSP by the general public, we are pleased to submit also 4 copies of the Chinese version of the Notes and the Explanatory Statement of the draft DSP, and the Stage 1 Social Impact Assessment Report for your use and consideration.

Should you have any enquiry on the draft DSP submission, please feel free to contact me at 2588 2630 or Mr. John Tse at 2588 2491. Thank you very much.

Yours faithfully,

Mike Kwan
General Manager
Planning & Design

encl.

c.c. (w/o – by fax)

S for Dev	(Attn: Mr. KK Cheung)	(Fax No.: 2905 1002)
AD/M, PlanD	(Attn: Ms. Sally Fong)	(Fax No.: 2576 3266)
DPO/K, PlanD	(Attn: Ms. Johanna Cheng)	(Fax No.: 2894 9502)

市區重建局
URBAN RENEWAL AUTHORITY

Our Ref: URA23030891615

By Hand

15 March 2023

The Secretary,
Town Planning Board,
15/F, North Point Government Offices,
333 Java Road, North Point, Hong Kong

Dear Sir/Madam,

Draft Development Scheme Plan for the Urban Renewal Authority
Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
- Responses to Departmental Comments, Batch 9 -

We refer to our submission of the captioned draft Development Scheme Plan (DSP) to Town Planning Board (TPB) dated 22 May 2020 and the subsequent submission on the enhancement scheme of the captioned draft DSP dated 3 November 2022. With the Departmental Comments received via Kowloon District Planning Office (KDPO)'s emails by batches from 17 February 2023 to 14 March 2023, we would like to enclose our Responses to Comments (R to C) to the departmental comments (**Enclosure A** of this letter) for your necessary action.

To facilitate the upcoming Town Planning Board meeting, a Consolidated Report (**Enclosure B** of this letter) summarises information of the Enhanced Scheme (**Part 1**), the Original Scheme (**Part 2**), Responses to Public Comments (**Part 3**), and Responses to Departmental Comments' Tables (Batches 1-8) (No appendices) (**Part 4**) in the period between May 2020 and February 2023 is prepared as requested by KDPO via email dated 16 December 2022. Please note that no new information is contained in the Consolidated Report.

Please also note that the information contained in the R to C is mainly technical clarifications to address various comments and there is no fundamental change to the submitted draft DSP. We consider that the information provided will be sufficient for the TPB to consider the draft DSP in due course.

RECEIVED
15 MAR 2023
Town Planning Board

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Should you have any enquiry, please feel free to contact Ms. Charis Leung at 2588 2058. Thank you for your kind attention.

Yours faithfully,

Mike Kwan
General Manager
Planning & Design

Enclosures:

A: Responses to Departmental Comments (RtoC – 9th Batch) **(70 copies)**

B: Consolidated Report **(30 copies)**

- Part 1
- Parts 2 - 4

c.c. (w/e – by hand)

Kowloon DPO, PlanD (Attn: Mr. Jon Mak, STP/K2)

Urban Renewal Authority
Kau Pui Lung Road / Chi Kiang Street Development Scheme
(CBS-2:KC)

Response to Departmental Comments (9th Batch)

March 2023

(Enclosure A)

Response to Departmental Comments
(R to C – 9th Batch)

March 2023

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

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3.	Environmental Protection Department (EPD)
4.	Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – Urban design and visual perspective
5.	Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – Air ventilation perspective
6.	Kowloon District Planning Office, Planning Department (DPO/K, PlanD)
7.	Transport Department (TD)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

Departmental Comments	Responses
1. Drainage Services Department (DSD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 17 February 2023	
SIA: 1. RtoC (c) - we are not talking about the existing sewers within the site, but those at the downstream of the future terminal manholes of the development up to manhole S18. This is the comparison to demonstrate the sewerage impact of the proposed development.	**Tables 7a** and **7b** have been added to **Appendix B** to assess the sewage generation and usage percentage of the existing sewers before the proposed development (i.e. without Proposed Development) (see the extracted pages of the revised SIA report as attached in **Annex A** of the R to C). Together with the assessment result from **Table 4** of **Appendix B** (after the proposed development (i.e. with Proposed Development)), **Table 2** has been added to **S2.6.5** to present the usage percentage of the concerned existing sewers before and after the proposed development (see the extracted pages of the revised SIA report as attached in **Annex A** of the R to C).
DIA: 1. RtC (a) & Appendix C: Please note that the design allowance under end-century scenario should be added to the rainfall increase (i.e. rainfall intensity x (1 + 16.0% + 12.1%)). Please review your assessment. It is also suggested to present the mid-century scenario results for reference.	Noted. The last column of **Table 1** in **Appendix C** has been updated based on the provided formula (see the extracted pages of the revised DIA report as attached in **Annex B** of the R to C). The mid-century values have been added to the third to last column in **Table 1** for reference (see the extracted pages of the revised DIA report as attached in **Annex B** of the R to C).
2. RtC (b) & (c): Section 2.3.2 states that the areas will drain to the same existing main drainage routes so there will be little overall impact on the drainage regimes as a result of the proposed development. However, based on the existing drainage records, it is noted that the internal drains within the proposed site or immediately adjacent (such as the drains downstream of SMH4110924 and SMH4029192) are draining towards the south, so it appears that the Northern Site is draining to the Chi Kiang St & Ma Tau Wai Road main drainage route (going southwards) under the existing scenario, whereas the Northern Site will drain to the Lok	It is clarified that the current proposed arrangement for the Northern Site is to drain towards the south by discharging to Manhole SMH4114280 in Kiang Su Street (similar to the existing condition). The only diversion proposed for draining towards north is the catchment located to north-west of the Northern Site (i.e. City 151, Morning Joy Building and 80 Maidstone Road) and this should bring a slight improvement to the downstream drainage systems near Kiang Hsi Street / Ma Tau Wai Road. From project level, the DIA prepared for the Scheme demonstrated that, with the proposed

Departmental Comments	Responses
Shan Road main drainage route under the proposed scenario. The impact to the downstream drainage system should be assessed. Nevertheless, overall it is considered worth exploring this diversion scenario considering that there is existing flood risk at Ma Tau Wai Road near Kiang Hsi Street and Chi Kiang Street. As there is existing flood risk near Kiang Hsi Street, the technical benefit would result from reduction in flood risk for the residents of the future URA development.	upgrading and diversion works, the proposed development of the Scheme would not lead to unacceptable adverse drainage impacts of the drainage network. On the other hand, the suggested diversion scenario would involve a larger scale drainage study of the area and it may involve technical feasibility of re-diverting the drainage system to the north in the Northern Site, and the study and diversion works may delay construction programme and housing supply of the Project. Nevertheless, URA noted your office's concern on the flood risk. If DSD has any planned infrastructure works in the wider area in future, URA is willing to work with DSD to explore and collaborate together to carry out appropriate drainage works after DSP approval.
3. Appendix C: Table 1 is difficult to understand. It is unclear what is the meaning to divide into the two groups "Exiting catchments involve drainage diversion" and 'discharge to SMH4028820". Please improve the presentation, such as grouping and labeling by scenarios.	Noted. The first column of **Table 1** of **Appendix C** has been updated (see the extracted pages of the revised DIA report as attached in **Annex B** of the R to C).
4. Appendix C: Some of the pipes show occupancy of >98% which is too close to 100% and hard to argue having sufficient capacity. Please review if the pipe sizes can be increased.	Noted. The pipes between Manholes P1 and D6 have been enlarged to 900mm diameter. **Appendix C**, the texts and **Figures 3 & 4a** have been updated accordingly (see the extracted pages of the revised DIA report as attached in **Annex B** of the R to C).
2. Hong Kong Police Force	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 21 February 2023	
Our office has no further comment on the proposal submission in this stage. If occupation of road/footpath exist in any construction stage of subsequent building modification, the concerned office may consider seeking comment from our Road Management Office with detailed submissions of temporary traffic arrangement (TTA) plans in accordance with CoP of Lighting-signing-and-guarding of Road Works.	Noted.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

Departmental Comments	Responses
3. Environmental Protection Department (EPD)	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 February 2023	
2. For Annex A – Extracted pages of Revised Environmental Assessment (EA), our comments on the revised Noise Impact Assessment are appended below for URA to follow up.	Noted.
3. For Annex B – Extracted pages of Revised Sewerage Impact Assessment (SIA), we have no further comment. Since the sewerage works shall be implemented to the satisfaction of DSD, DSD's view on the SIA should be taken into account.	Noted.
4. Please find below our comments on the DSP: (i) Noise: The site is subject to traffic noise and fixed source noise impact. According to the Noise Impact Assessment (NIA), full compliance with the traffic noise planning standard of 70dB(A) cannot be achieved based on the notional design. Nevertheless, the URA and its consultant have not yet exhausted all practicable noise mitigation designs/measures to reduce the traffic noise impact. Measures including alternative building form to avoid orientation of noise sensitive facades directly facing nearby roads, construction of barrier / canopy on podium with projection beyond the site boundary, etc., are available and should be explored by the URA to further abate the noise impact. The URA should exhaust all practicable noise mitigation designs/measures to minimise the traffic noise impact. To ensure proper evaluation of noise impact based on future development scheme and implementation of required noise mitigation measures, special conditions related to NIA are recommended to be imposed in the future land title document of the site.	The reason / evidence of not able to achieve 100% compliance rate has been stated in Section 3.10 of the NIA in the extracted pages of the revised EA report submitted in February 2023. Despite so, the current noise compliance level is 94% which is already very high; while the noise mitigation design adopted and the recommended at-receiver mitigation measures are explained in **Sections 3.5** and **3.7** of the extracted pages of the revised EA report (see **Annex C** of the R to C). Given the current notional design is at planning stage and subject to CE in C's approval, detailed design will be carried out after approval to design the building and at-source mitigation. Detailed mitigation measures such as baffle type acoustic windows, whether any combination of window pane separation, windows height, window opening and windows overlapping, etc. would be explored in the subsequent detailed design stage to optimize an acceptable noise compliance rate as far as practicable, and for agreement with relevant government departments on the necessity to include special conditions related to NIA in the future land title document of the site.
(ii) Sewerage: The Sewerage Impact Assessment (SIA) report identified the required sewerage upgrading, construction and diversion works for the development. To ensure implementation of the required mitigation measures, a special condition on SIA is	Under the current notional design, the SIA demonstrated that with proposed upgrading and diversion works, the proposed development is anticipated to have no adverse impact to the local sewerage system. It is considered that imposing such SIA clause is not necessary.

Departmental Comments	Responses
recommended to be imposed in the future land title document of the site.	
(iii) Land Contamination: The URA has not addressed the potential land contamination issue arising from the development and instead proposed to carry out land contamination assessments at a later stage. In this connection, a special condition should be imposed in the relevant land title document of the subject site to require the developer to conduct land contamination assessments and carry out remediation (if needed) prior to the development of the site according to the prevailing guidelines.	Please note that the subject site has been occupied solely for residential use for more than 50 years with no activity of industrial or commercial operation. Potential land contamination issues aroused from the past and present land use activities in the subject site are not observed and is very unlikely. As such, submission of a land contamination assessment is considered unnecessary. It is also considered not necessary to include a special condition relating to land contamination in future land grant, with the concern that such special condition would impose time implication to the future implementation programme and delay of housing supply of the Project. If EPD considers necessary to demonstrate no land contamination issue, further desktop study with aerial photos can be provided at detailed design stage upon request to further justify no need for such land contamination clause in future land grant.
(iv) Waste Management: Since the proposed redevelopment would involve demolition of the existing buildings and would likely generate a large amount of construction and demolition (C&D) materials, the URA is advised to minimise the generation of C&D materials; reuse and recycle the C&D materials on-site as far as possible; and observe and comply with the legislative requirements and prevailing guidelines on proper waste management for the proposed development.	Noted.
5. Overall, insurmountable environmental impacts arising from the proposed DSP are not anticipated and we have no objection to the captioned DSP. We note URA is committed to carry out further review on noise impact, sewerage impact and land contamination issues for the proposed development at detailed design stage to work out the necessary mitigation and remediation measures.	Noted. Please refer to our responses to Pt. (i), (ii) and (iii) above.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

Departmental Comments	Responses
Annex A – Extracted pages of Revised Environmental Assessment 1. Full compliance with the road traffic noise planning standard of 70 dB(A) cannot be achieved. As advised previously, the URA and its consultant should exhausted all practicable noise mitigation designs/measures to reduce the traffic noise impact. Measures including alternative building form to avoid orientation of noise sensitive facades directly facing nearby roads, construction of barrier / canopy on podium with projection beyond the site boundary, etc., are available and should be explored by the URA to further abate the noise impact.	Noted. Please refer to response to Pt. (i).
2. There are still some errors in the noise assessment mode. For example, the traffic flow and percentage heavy vehicle of Chi Kiang Street (Link no. 7), Pau Chung Street (Link 21) and East Kowloon Corridor (Link 38-39) in the noise assessment model also appear to be incorrect.	Please note the traffic forecast has been further updated to address some comments from TD and was approved by TD, please refer to the latest set of traffic forecast in **Appendix 3.1** in the extracted pages of the revised EA report as attached in **Annex C** of the R to C. The noise models have been reviewed and revised accordingly (see the extracted pages of the revised EA report as attached in **Annex C** of the R to C).
3. Table 3.1: According to Figures 3.1 and 3.2, the mitigation measure 1.5m long architectural fin is for Low Zone(1-22F) Flat I (N1-22) and High Zone(23-35F) Flat H (N1-22). Please review if it is necessary to add Flat I for Low Zone and Flat H for High Zone in Table 3.1.	Noted. The noise models have been re-run as per Comment #2 and the result tables for the Traffic Noise Impact Assessment in **Appendix 3.2** are updated (see the extracted pages of the revised EA report as attached in **Annex C** of the R to C). **S3.6.2** and **Tables 3.1** & **3.2** have been reviewed and updated accordingly (see the extracted pages of the revised EA report as attached in **Annex C** of the R to C).
4. Appendix 3.1: Please enclose TD's endorsement on the road traffic data adopted in the assessment.	Please refer to **Appendix 3.1** for the TD's endorsement. **Section 3.3.3** has also been updated (see the extracted pages of the revised EA report as attached in **Annex C** of the R to C).
4. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from urban design and visual perspective	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 23 February 2023	
Specific Comments 1. Regarding the "open-side deck" mentioned in para. 7.14 of the proposed ES of the draft	As described in para. 7.14 of the proposed ES of the draft DSP, open-side deck is one of the

Departmental Comments	Responses
DSP, please clarify the location on relevant plan(s) and provide discussion of this feature.	architectural features that may be proposed between the building podia within the subject site, subject to future detailed design. Therefore, any provision/location of the open-side deck can only be determined at the detailed design stage upon DSP approval.
2. Regarding the responses to Item 8(4) in the R-to-C, please clarify the editorial error spotted in the 2nd para. of the responses.	Please be clarified that the following 2 wind enhancement features will be incorporated in the revised **Explanatory Statement** (**ES**) (see **Annex H** of the R to C): - (i) a minimum 15m-wide podia separation along Maidstone Road in the north-south direction; and (ii) a minimum 20m-wide podia separation along Kiang Su Street for east-west wind flow, with any footbridges, canopies, architectural features, open-side decks, sitting area and circulation space, etc., provided in between the podia shall be allowed, where appropriate and practicable. The two wind enhancement features would enhance wind flow penetration at pedestrian level. They would be incorporated in the design and layout of the future developments in the "R(A)" zone, subject to minor adjustment of widths and alignments to be agreed with relevant government departments at detailed design stage.
Visual Impact Assessment (VIA) 3. While we have no further comment on the VIA, the following minor clarifications may be considered:	
(i) **Figure 3.3**: Please consider whether the annotation "WIP" should read as "***6-10 Maidstone Road***".	Noted. **Figure 3.3** has been revised accordingly (see the extracted pages of the revised VIA report as attached in **Annex E** of the R to C).
(ii) **Figure 3.4**: The building currently annotated "Morning Joy Building" on the photomontages should refer to "***City 151***", whereas the shorter building in the front should be annotated "***Morning Joy Building***". Please revise.	Noted. **Figure 3.4** has been revised accordingly (see the extracted pages of the revised VIA report as attached in **Annex E** of the R to C).

Departmental Comments	Responses
5. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from air ventilation perspective	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 23 February 2023	
1. **Accuracy of the simulation results** - With reference to the revised AVA IS report, the VR value of many test points are closed to zero under many simulated wind directions. It seems that those test points are either too closely placed to the modelled developments or topography which affect the accuracy of the simulation results and the impact on the footpath of the nearby streets. As mentioned in our previous comments, the consultant should review the location of those test points and update the relevant VR wind data where appropriate. The same set of test point location should be adopted in both schemes.	Some of the test points are relocated or adjusted to avoid being too close to the buildings. It is confirmed that the same set of test points location are adopted in both schemes. Thus, SVR, LVR and SVAR of each focus area under both annual and summer conditions has been updated in **Table 4.1** (see the extracted pages of the revised AVA report as attached in **Annex D** of the R to C). **Figures 10a, 10b, 11a** and **11b** as well as **Appendix 5** are updated accordingly (see the extracted pages of the revised AVA report as attached in **Annex D** of the R to C).
2. **Baseline Scheme** (paragraph 1.6.2 and Appendix 1) – It is noted that the consultant has only reported some of the good design features in paragraph 1.6.2. The consultant should make sure the good design features reported in text are tallied with those (i.e. (i) 15m-wide building separation at grade along Maidstone Road; (ii) 31m-wide building separation between Towers T1 and T5; and (iii) 18m-wide building separation between Towers T4 and T6) indicated on plan (refers to Figure 02 of Appendix 1).	The said features (i), (ii) and (iii) are included in Para 1.6.2 to tally with indications on plan (see the extracted pages of the revised AVA report as attached in **Annex D** of the R to C).
3. **Proposed Scheme** (paragraph 1.7.2 and Appendix 2) – Apart from the two ventilation corridors, the consultant should discuss whether the various building/podia separations between (i) T2 & T3; (ii) T1 & T5; and (iii) T4 & T6 are considered as good design features. If affirmative, the consultant please indicate them on plan and report them in text with exact width.	The Scheme is proposed to have 2 good design features to enhance the environment, i.e.: i. a minimum 15m-wide podia separation along Maidstone Road in the north-south direction; and ii. a minimum 20m-wide podia separation along Kiang Su Street for east-west wind flow. The above 2 good design features are also proposed to be included into the **ES** (see **Annex H** of the R to C). Apart from the two good design features above (i.e. two ventilation corridors), the other building separation/podia separation shown in Figure 1.1

Departmental Comments	Responses
	of Annex C (Revised AVA) and para. 1.7.3 submitted in February 2023 are only possible layout and results that can be achieved from the notional design, which is subject to changes/refinement in the detailed design stage. They are not committed as good design features of the Scheme.
4. **Additional test points to cover the footpaths to Kau Pui Lung Road Playground** (Figure 8) – The consultant should provide additional test points to cover the footpaths to Kau Pui Lung Road Playground	Additional test points T140-T145 are included in Kau Pui Lung Road Playground to cover the footpaths. **Table 4.1**, **Figure 8** and relevant **Figures 10a, 10b, 11a** and **11b** as well as **Appendix 5** are updated (see the extracted pages of the revised AVA report as attached in **Annex D** of the R to C).
6. Kowloon District Planning Office, Planning Department (DPO/K, PlanD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 23 February 2023, 9 March 2023 and 14 March 2023	
1. Please confirm if the 400 sq.m public open space will be provided at-grade. Please also advise the opening hour of the public open space and its intended location(s).	Please note that the proposed 400 sq.m public open space (POS) will be provided at-grade and located within the potential open space as annotated in **Figure 1.5** (see **Annex G** of the R to C). The specific location of the POS will be subject to detailed design. The POS will be opened to the public at reasonable hours and the its exact opening hours will be liaised with relevant departments and determined at land grant stage.
2. Please confirm if there will be a minimum of 1 sq.m per person private open space.	Private open space provision as per HKPSG will be provided.
3. Please revise figure 1.5 as it does not tally with RtoC to DPO/K, PlanD item 4.	Noted. **Figure 1.5** has been revised (**see Annex G** of the R to C).
4. Please amend the notation of the Plan of the DSP to read 'MAJOR ROAD AND JUNCTION'	Noted. The draft DSP has been revised accordingly (see **Annex H** of the R to C).
5. Please find attached our comments on the Notes and ES of the subject DSP.	Noted. The draft Notes and ES have been revised accordingly. (see **Annex H** of the R to C).
6. It is noted that Plan 7 shows 31 nos. of CBS sites instead of 30. Please clarify.	It is to clarify that there are 30 CBS sites under 28 CBSs within the site boundary. **Plan 7** has been revised accordingly (see **Annex I** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

Departmental Comments	Responses
7. Transport Department (TD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 7 March 2023	
1. Paragraphs 1.2.2, 2.5.1 of TIA Report and RtoC item 3 - The proposed development is considered as one site to be developed by the URA or its joint venture partner(s) according to the paragraph 1.2.2. Under normal circumstance, only one vehicular access shall be allowed for one site;	The development will provide two types of housings, i.e. private housing and Starter Homes, which are of different target buyers. The developments may also involve different developers, e.g. Joint Venture Partners of URA and/or URA contractors to implement the two different developments. There is also possibility that the two developments will be served with its individual basement car park. Given so, it is considered two individual vehicular accesses are required to provide such flexibility. In addition, given the length of the basement carpark along Kau Pui Lung Road is about 60m long, and there will be over 770 parking spaces, it is better to provide 2 vehicular accesses to split the traffic flow rather than concentrating at using one vehicular access.
2. Paragraphs 2.3.1, 2.5.2 of TIA report - The future cul-de-sac formed due to the closure of Maidstone Road near Lok Shan Road will cater for short time car/taxi pick-up/drop-off, loading/unloading and U-turning of vehicles. It is undesirable for traffic circulation and may cause traffic congestion at the junction of Lok Shan Road / Maidstone Road. Please review and advise how to avoid the street management problem, especially illegal parking, in the future;	Please be clarified that the future cul-de-sac formed will mainly cater for short time car/taxi pick-up/drop-off, u-turning of vehicles but unlikely to allow entry of large vehicles for loading/unloading activities as HGV/LGV bays will be provided at the basement car park to facilitate loading/unloading activities. For the section of Maidstone Road within the Scheme area, property management staff appointed by URA or its joint venture partner(s) or the assignee will be arranged to manage the traffic condition at the future cul-de-sac to ensure no long vehicles will be entering the cul-de-sac and the road will not be congested and queue back to the junction of Lok Shan Road / Maidstone Road. For the remaining section of Maidstone Road outside the Scheme area, URA has no ambit and authority to manage as it is government land. Nevertheless, to further minimise chance of tail back queuing at the junction, proper signages/road marks can be suggested at the remaining section of Maidstone Road at the gazettal process under Cap. 374, if necessary, to avoid long vehicles' entry to the remaining part of Maidstone Road.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (9th batch)

Departmental Comments	Responses
3. Paragraphs 2.3.2 of TIA report, Figure 1.5 of Preliminary Design and RtoC item 2 - Please advise whether the pedestrianised avenue, pedestrian connection and the potential public open space will open for 24 hours to the public or not. If not, please advise the routing of the pedestrian walkway;	As mentioned in the previous RtoC item 2 and shown in Figure 1.5 of Preliminary Design (i.e. the 8th Batch submitted in February 2023), the pedestrianized avenue/ event plaza and pedestrian connections will be opened for public use at reasonable hours. However, as according to the Appendix of Joint Practice Note No. 4 (JPN4) under Group III (Item 3), upon request of provision of covered public passageways and walkways as required by Government, URA could consider to provide not less than 3m-width at-grade passageway within the proposed pedestrianized avenue along north-south direction and along the east-west direction for public use for 24 hours daily. That provision, according to Group III Item 3 of JPN4, shall be qualified as a covered public passageways and walkways as requested by Government and shall be GFA exempted from the proposed development.
4. Paragraph 4.5.1 of TIA report and RtoC item 6 - Please provide the detail of your internal survey at Hung Hom Station public carpark in the report for reference and elaborate the traffic trip rate adopted for the PVP from your survey result;	The survey was carried in March 2019 from 0700 to 1900. The peaks occur at 0745 to 0845 and 1545 to 1645 respectively. The elaboration of the traffic trip rate adopted for the PVP is added in **Table 4.5** in the extracted pages of the revised TIA report (see **Annex F** of the R to C).
5. Paragraph 4.8.1 and Figure 4.4 of TIA report and RtoC item 9 - Despite the provision of an island may not be feasible due to site constraint, please review if there is any traffic improvement measure to further strengthen the safety of the split phase arrangement;	To further strengthen the safety of the split arrangement, double white line is added to Tin Kwong Road westbound to separate the split movement. Please refer to **Figure 4.4** in the extracted pages of the revised TIA report (see **Annex F** of the R to C).
6. Figure 4.6 of TIA report and RtoC item 11 - The arrow road markings at Ma Tau Wai Road near Anhui Street shall also be revised;	Noted. The arrow road markings at Ma Tau Wai Road near Anhui Street will be revised as shown in **Figure 4.6** of the extracted pages of the revised TIA report (see **Annex F** of the R to C).
7. RtoC item 16 - According to TPDM Vol. 5 Ch.7, Road Safety Audit (RSA) for permanent road schemes should be conducted at investigation/feasibility study, detailed design and construction stages to ensure that road safety implications of new road projects are fully considered for all road users. Please elaborate why the RSA is not carried out at the investigation/feasibility study stage. Please observe the TPDM	Noted. The RSA will be conducted and would be submitted once it is available.

Departmental Comments	Responses
requirement and submit the RSA findings to this office for review once available;	
8. In view of the high demand of coach parking in the district, please re-consider to explore the feasibility of providing parking spaces for coaches in the PVP; and	The Scheme aims to enhance walkability and accessibility of the area and to address the district need on private car parking spaces through redevelopment. To achieve these planning gains to the community, pedestrianized avenue/ event plaza at ground floor is proposed along the existing portion of Maidstone Road and Kiang Su Street to enhance walkability. Besides, a PVP is proposed to provide not less than 164 private car parking spaces to re-provision the affected on-street parking spaces and also address private car parking demand in the area. There is no on-street coach parking space that will be affected by the Scheme. It is noticed that the demand of coach parking spaces is mainly around Hok Yuen Street/Hung Hom Road area with the concentration of jewelries and souvenirs shops. The Scheme area is far from the Hok Yuen Street area and cannot resolve the coach parking demand at that area. On the other hand, there are already 8 existing on-street coach parking spaces along Kau Pui Lung Road near the Scheme area. The provision of more coach parking space within the Scheme will attract more coaches/tourists to the Scheme area, which is not compatible with the existing tranquil residential living environment in this part of To Kwa Wan. This also deviate from our planning intention to enhance accessibility by providing pedestrianized avenue and basement passageway to provide new connections to MTR station exits. The proposal of not providing coach parking space at the Scheme was also presented and was acceptable from KCDC at its recent consultation on March 2, 2023. The current basement car park can only facilitate HGV manoevring which is 11m long. If 12m long coach parking spaces were provided, in order not to affect the ground floor and basement floor connections and walkability promoted in the Scheme, a deeper basement to cater for coach parking will be needed. This will increase

Departmental Comments	Responses
	construction time for the Scheme and lengthen the provision of new flats (including Starter Homes). Given the above consideration, it is proposed not to provide coach parking space in the Scheme. Besides, with the provision of public vehicle park for private parking spaces within the Scheme, it provides opportunities to convert some on-street parking spaces to on-street lay-bys for coaches if necessary. URA can work together with TD and Highways Department via separate URA's revitalization works to identify any appropriate locations in the vicinity to provide some on-street lay-bys for coach parking if necessary.
9. The proposed development will affect the GMB parking space at Maidstone Road near Lok Shan Road. Please seek the comment from our Transport Operations (Urban) Division - Kowloon Section and liaise with the affected GMB operator for the proposed relocation of GMB parking space.	Noted. Comments from Transport Operations (Urban) Division - Kowloon Section will be sought and liaise with the affected GMB operator will be carried at detailed design stage.

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Annex A

Extracted pages of Revised Sewerage Impact Assessment (SIA)

2.6.5 **Table 2** below shows the comparison of sewer utilization before and after the Proposed Development.

Table 2 Sewer utilization before and after the Proposed Development

Segment	Pipe Dia. (mm)	Estimated Capacity (L/s)	Without Proposed Development **[1]**		With Proposed Development **[2]**	
			Peak Flow from the Existing Buildings with the Site Boundary and Catchment Areas (L/s)	Contribution	Peak Flow from the Proposed Development and Catchment Areas (L/s)	Contribution
S1-S2	375	168.4	64.21	38.1%	131.91	78.3%
S2-S3	450	238.0	64.21	27.0%	146.31	61.5%
S3-S4	450	663.5	122.61	18.5%	172.33	26.0%
S4-S5	450	761.1	122.61	16.1%	172.33	22.6%
S5-S6	450	791.5	129.45	16.4%	247.19	31.2%
S6-S7	450	605.5	137.59	22.7%	255.33	42.2%
S7-S8	600	2101.8	137.59	6.5%	255.33	12.1%
S8-S9	600	809.3	185.82	23.0%	277.69	34.3%
S9-S10	600	983.3	185.82	18.9%	277.69	28.2%
S10-S11	600	826.8	185.82	22.5%	277.69	33.6%
S11-S12	600	884.8	185.82	21.0%	277.69	31.4%
S12-S13	600	1539.1	185.82	12.1%	277.69	18.0%
S13-S14	600	1228.4	377.26	30.7%	469.14	38.2%
S14-S15	600	447.4	377.26	84.3%	469.14	104.9%
S15-S16	600	479.6	377.26	78.7%	469.14	97.8%
S16-S17	600	445.3	377.26	84.7%	469.14	105.4%
S17-S18	600	2497.2	377.26	15.1%	469.14	18.8%
After Pipe Size Upgrading Work for 3 existing sewer segments S14-S17						
S14-S15	750	803.6	377.26	46.9%	469.14	58.4%
S15-S16	750	861.4	377.26	43.8%	469.14	54.5%
S16-S17	750	799.8	377.26	47.2%	469.14	58.7%

[1] Detailed calculation is shown in Table 7 of Appendix B

[2] Detailed calculation is shown in Table 4 of Appendix B

APPENDIX B:
DETAILED SEWERAGE IMPACT ASSESSMENT CALCULATIONS

Table 7a Calculation for Sewage Generation Rate of the Existing Buildings within the Site Boundary

1. Existing Residential Building within the Site Bounary

1a. Total number of residential units	=	410	units
1b. Total number of residents	=	1148	people -- (2016 Population Census: Average Household Size of 2.8)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**310.0**	m^3/day

Total Flow to Manhole S8 (FMH4024266)

Flow Rate	=	310.0	m^3/day
Contributing Population	=	1148	people
Peaking factor	=	6	Refer to Table T-5 of GESF for population 1,000-5,000 incl. stormwater allowance
Peak Flow	=	**21.53**	litre/sec

Table 7b Hydraulic Capacity of Existing Sewers for Sewerage generated from the Existing Buildings within the Site Boundary and Surrounding Catchment Areas (i.e. without Proposed Development)

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Flow from the Existing Buildings with the Site Boundary (m3/day)	Included Catchment Area	Total Flow Rate from the Existing Buildings with the Site Boundary and Catchment Areas (m3/day)	Contribution Population [1]	Peaking Factor [2]	Peak Flow from the Existing Buildings with the Site Boundary and Catchment Areas (L/s) [3]	Contribution (%)
S1-S2	375	66.2	0.007	168.4	0.0	A1	924.6	3424	6	64.21	38.1%
S2-S3	450	44.1	0.005	238.0	0.0	A1	924.6	3424	6	64.21	27.0%
S3-S4	450	54.5	0.042	663.5	0.0	A1 + B	2118.7	7847	5	122.61	18.5%
S4-S5	450	4.0	0.055	761.1	0.0	A1 + B	2118.7	7847	5	122.61	16.1%
S5-S6	450	30.1	0.059	791.5	0.0	A1 + B + C	2796.1	10356	4	129.45	16.4%
S6-S7	450	24.1	0.035	605.5	0.0	A1 + B + C + D	2971.8	11007	4	137.59	22.7%
S7-S8	600	4.0	0.093	2101.8	0.0	A1 + B + C + D	2971.8	11007	4	137.59	6.5%
S8-S9	600	14.5	0.014	809.3	310.0	A1 + A2 + B + C + D + E	4013.6	14865	4	185.82	23.0%
S9-S10	600	12.3	0.020	983.3	310.0	A1 + A2 + B + C + D + E	4013.6	14865	4	185.82	18.9%
S10-S11	600	27.1	0.014	826.8	310.0	A1 + A2 + B + C + D + E	4013.6	14865	4	185.82	22.5%
S11-S12	600	77.1	0.016	884.8	310.0	A1 + A2 + B + C + D + E	4013.6	14865	4	185.82	21.0%
S12-S13	600	15.1	0.050	1539.1	310.0	A1 + A2 + B + C + D + E	4013.6	14865	4	185.82	12.1%
S13-S14	600	16.1	0.032	1228.4	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	30.7%
S14-S15	600	42.4	0.004	447.4	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	84.3%
S15-S16	600	51.3	0.005	479.6	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	78.7%
S16-S17	600	76.1	0.004	445.3	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	84.7%
S17-S18	600	17.7	0.131	2497.2	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	15.1%
After Pipe Size Upgrading Work for Sewer Pipes S14-S15, S15-16 & S16-S17											
S14-S15	750	42.4	0.004	803.6	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	46.9%
S15-S16	750	51.3	0.005	861.4	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	43.8%
S16-S17	750	76.1	0.004	799.8	310.0	A1 + A2 + B + C + D + E + F	8148.8	30181	4	377.26	47.2%

[1] The contribution population is total flow rate (m^3/day) / 0.27 (m^3/day/person)
[2] Peaking Factor of 6 for contributing population 1,000 - 5,000; Peaking Factor of 5 for contributing population 5,000 - 10,000 ; Peaking Factor of 4 for contributing population 10,000 - 50,000 are adopted.
[3] The peak flow is total flow rate of each pipe segment * peaking factor.

Annex B

Extracted pages of Revised Drainage Impact Assessment (DIA)

2. Drainage Impact Assessment

2.1 Existing Drainage System

2.1.1 Based on the currently available Drainage Record Plans (from Lands Department's GeoInfo Map), there are stormwater drains and manholes within and around the Subject Site (see **Appendix B** and **Figure 2**). The Subject Site is currently fully paved, mainly comprising medium-rise domestic buildings.

2.1.2 According to the Drainage Services Department (DSD) website, there are no flooding blackspots in the vicinity of the Subject Site.

2.2 Assessment and Design Criteria

2.2.1 As the catchment areas are all fairly small, the Rational Method (as set out in Section 7.5.2 of Drainage Services Department's Stormwater Drainage Manual, "the SDM") has been used for the calculation of runoff. Times of concentration have been calculated from the topography of the various catchment areas, or assumed, based on consideration of the nature of the relevant catchment areas.

2.2.2 The existing Site has been assumed to be effectively fully paved, i.e. a runoff coefficient, C of 1.0 has been adopted. The upstream catchment areas to the west of the Site comprise steep vegetated slopes and a value of C=0.35 has been adopted for these areas. The future development will comprise hard paving (C=1.0) and some flat landscaping, although full paving has been assumed for simplicity and as a conservative approach.

2.2.3 The Site drains to urban drainage branch systems and a 50 years design return period has therefore been adopted, as set out in Table 10 of the SDM.

2.2.4 In accordance with Section 6.8 of the SDM (Corrigendum No. 1/2022), allowances have been included in the runoff calculations for potential increased rainfall intensities to end 21st century plus a further Design Allowance, with the runoff at end 21st century including Design Allowance adopted for design purposes. The Site and surrounding areas are not tidally affected, so no consideration has been given to potential future sea level rises.

2.2.5 The Colebrook-White Equation has been used for the calculation of pipe capacities, with pipe roughness values taken from Table 14 of the SDM.

2.3 Discussion

2.3.1 The existing drainage facilities within the Subject Site(s) will be replaced by new facilities, to suit the detailed layouts of the proposed developments. Based on the layouts of the surrounding existing drainage systems, the drainage for the Northern Site will be connected to manhole SMH4114280 on Kiang Su Street, while the drainage for the Southern Site will be connected to manhole SMH4029273 on Chi Kiang Street, with ultimate discharge to the main drains along Ma Tau Wai Road.

2.3.2 As both the existing and future conditions will involve effectively full paving, there will be no change to the expected runoff from the Subject Site(s) and therefore no adverse impact on the existing drainage systems. Also, the areas will drain to the same existing main drainage routes,

so there will be little overall impact on the drainage regimes as a result of the proposed development.

2.3.3 Although the proposed redevelopment itself will not result in any adverse drainage impacts, URA will consider the provision of blue-green drainage infrastructure (e.g. porous paving and on-site storage), in accordance with the DSD's Stormwater Drainage Manual (SDM, Section 3.2.2) in the subsequent detailed design stage to reduce the quantity and improve the quality of site runoff as far as practicable.

2.3.4 Overall, no unacceptable adverse drainage impacts are expected as a result of the proposed development.

2.4 Arrangement of New Drainage Pipes for the Adjacent Developments

2.4.1 According to the Drainage Record Plans included in **Appendix B**, some existing drainage pipes serving adjacent developments run through the Subject Site and it will therefore be necessary to rearrange some of these drainage systems to suit the proposed development at the Site.

2.4.2 For the adjacent buildings: Morning Joy Building, City 151 and 80 Maidstone Road, it is proposed to simply reconstruct the existing drainage in the rear access alleyway to run northwards towards Lok Shan Road, with a new connection drain (and manholes) on Lok Shan Road to connect to the existing manholes SMH4114290 (B1) (**Figure 3**).

2.4.3 For the adjacent buildings (Lok Man Sun Chuen Blocks A to E and Kei To Primary School), new drainage pipes (and manholes) are proposed to connect to existing manholes SMH4029171 (P1) and SMH4029270 (D1) on Kau Pui Lung Road.

2.4.4 Based on the drainage layout shown in **Figure 4a** and the hydraulic assessment included in **Tables 3a-4d of Appendix C**, it is proposed to construct a new 900mm diameter drain between Manhole P1 and D1 and adjust the invert levels of Manholes P1 to P3. Furthermore, it is proposed to upgrade the existing drains between Manholes D1 and D6 (along Chi Kiang Street) from (existing) 525mm diameter to 900mm diameter. The exact dimensions and alignments of the new drainage facilities will be subject to detailed design.

2.4.5 The designs of the new drainage facilities will take due consideration of the potential future increases in rainfall intensity as a result of climate change, as set out in Section 6.8 of the DSD's SDM (Corrigendum No. 1/2022) and as calculated in **Appendix C**. The overall catchment areas are shown in **Figure 5**.

2.4.6 It is proposed to upgrade the drains along Lok Shan Road, between Manholes SMH4114290 (B1) and SMH4114294 (B4), from 750mm diameter to 900mm diameter (refer to **Figure 4b** and **Tables 5a-6e of Appendix C**). It is also proposed to reconstruct the drains (and manholes) from SMH4028832 (A1) to SMH4110924 (A6) to flow in the opposite direction to existing, with an increased diameter of 450mm, and to provide a new connection from SMH4110924 (A6) to SMH4114290 (B1), with at least one new intermediate manhole (NM1) in Lok Shan Road. The exact dimensions and alignments of the new drainage facilities will be subject to detailed design.

2.4.7 All new drainage infrastructure within the Site Boundary will be maintained by URA, or its joint venture partner(s), or its assignee. All new drainage infrastructure outside the Site Boundary will be handed over to DSD for maintenance.

Table 1 Summary of proposed upgrading of existing pipes and proposed new pipes

Segment	Manhole No.	Manhole No.	Existing pipe size (mm)	Proposed pipe size (mm)	Remarks
Kau Pui Lung Road / Chi Kiang Street					
P3-P2	SMH4029168	SMH4029170	450	450	Invert levels adjustment
P2-P1	SMH4029170	SMH4029171	450	450	Invert levels adjustment
P1-D1	SMH4029171	SMH4029270	-	900	New drain
D1-D2	SMH4029270	SMH4029271	525	900	Pipe upgrading
D2-D3	SMH4029271	SMH4029272	525	900	Pipe upgrading
D3-D4	SMH4029272	SMH4029273	525	900	Pipe upgrading
D4-D5	SMH4029273	SMH4029274	525	900	Pipe upgrading
D5-D6	SMH4029274	SMH4029177	525	900	Pipe upgrading
Lok Shan Road / Ma Tau Wai Road					
A1-A2	SMH4028832	SMH4028831	300	450	Pipe upgrading
A2-A3	SMH4028831	SMH4028830	300	450	Pipe upgrading
A3-A4	SMH4028830	SMH4028829	300	450	Pipe upgrading
A4-A5	SMH4028829	SMH4028828	225	450	Pipe upgrading
A5-A6	SMH4028828	SMH4110924	225	450	Pipe upgrading
A6-NM1	SMH4110924	New Manhole	-	450	New drain
NM1-B1	New Manhole	SMH4114290	-	450	New drain
B1-B2	SMH4114290	SMH4114291	750	900	Pipe upgrading
B2-B3	SMH4114291	SMH4114292	750	900	Pipe upgrading
B3-B4	SMH4114292	SMH4114294	750	900	Pipe upgrading

3. Overall Conclusion

3.1.1 Drainage assessments were conducted for the redevelopment at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

3.1.2 It is anticipated that the proposed development would not affect the main drainage paths or lead to unacceptable adverse drainage impacts.

3.1.3 It is intended to re-arrange drainage pipes for some existing buildings in the vicinity. Based on the assessment result, it is proposed to construct a new drainage pipe with diameter of 750mm and upgrade 7 existing drainage pipes along Kau Pui Lung Road / Chi Kiang Road. For the drainage system around Lok Shan Road / Ma Tau Wai Road, it is proposed to construct a new manhole (NM1) and 2 new drains with diameter of 450mm and upgrade 8 existing drainage pipes. The exact dimension and alignment of the proposed new drainage pipes will be determined in the detailed design stage.

3.1.4 To facilitate the proposed drainage diversion plan, it is proposed to re-arrange, reconstruct and revert the existing drainage flow direction for the drainage system located at the rear access alleyway (e.g. City 151, Morning Joy Building and 80 Maidstone Road). As revealed in the assessment result, 2 nos. of existing 225mm drain and 3 nos. of existing 300mm drain will be upgraded to 450mm drain, 3 nos. of existing 750mm drain will be upgraded to 900mm drain, 2 nos. of 450mm drain and one new manhole (NM1) will be constructed and to be connected to the existing manholes SMH4114290 (B1) at Lok Shan Road. For drainage system at Kau Pui Lung Road/ Chi Kiang Street, it is proposed to replace two new 450mm drains, install 1 new 900mm drain and upgrading 5 nos. of existing 525mm drain to 900mm drain. The exact dimensions and alignments of the proposed new drainage pipes will be determined in the detail design stage.

3.1.5 This DIA confirms the feasibility of the proposed development, with no unacceptable adverse drainage impact anticipated.

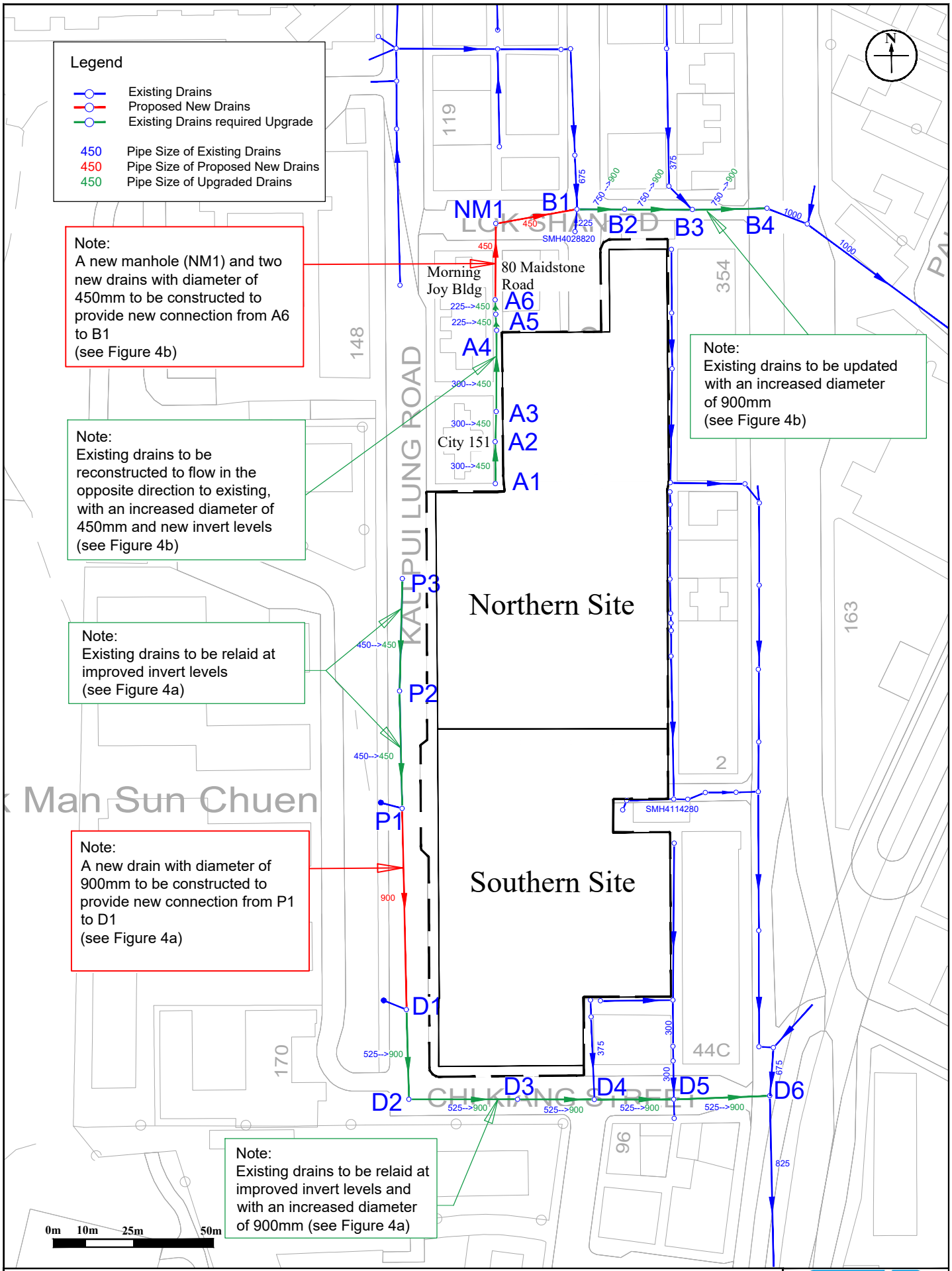

Figure: 3

Title: Proposed drainage system in the vicinity of the Project Sites

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	1.8
Date:	Feb 2023

Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.8\Figure 3 proposed drains.dwg

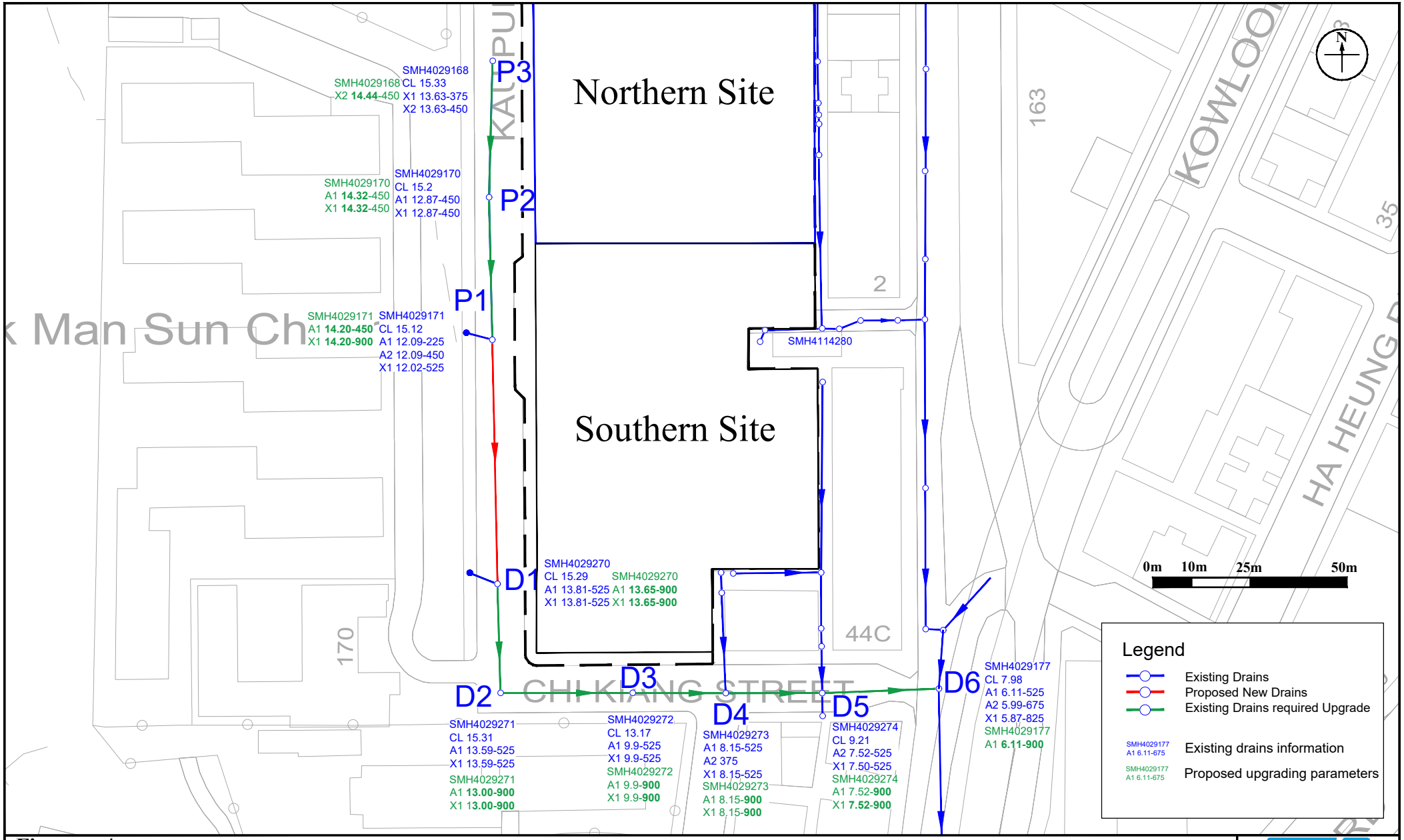

Figure: 4a	RAMBOLL
Title: Proposed Drainage Diversion and the Upgrade of the Drainage System (with details)	Drawn by: LL Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.8 Date: Feb 2023

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APPENDIX C:
HYDRAULIC CALCULATIONS

Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)
Table 1 - Proposed Catchment Areas and Run-off (1 in 50 year)

$$Q_p = 0.278\ C\ i\ A$$

where Q_p = peak runoff in m^3/s
C = runoff coefficient (dimensionless)
i = rainfall intensity in mm/hr
A = catchment area in km^2

Surface Characteristics	*Runoff coefficient, C**
Asphalt	0.70 - 0.95
Concrete	0.80 - 0.95
Brick	0.70 - 0.85
Grassland (heavy soil**)	
Flat	0.13 - 0.25
Steep	0.25 - 0.35
Grassland (sandy soil)	
Flat	0.05 - 0.15
Steep	0.15 - 0.20

1 in 50 year (according to Table 3 of DSD Manual)
a= 451.3
b= 2.46
c= 0.337

Increases from SDM: 11.1% 16.0% 12.1%

Catchment		Area	Levels (mPD)		Fall	Overland, L	Fall, H	Overland t_c	t_0	Total t_f [1]	Total t_c [2]	Intensity	Weighted Runoff Coefficient	Run-off	Run-off Mid-21st Century	Run-off End-21st Century	End-21st Century Including Design Allowance
		(m^2)	Upstream	Downstream	(m)	(m)	(m/100m)	(min)	(min)	(min)	(min)	(mm/h)		(m^3/s)	(m^3/s)	(m^3/s)	(m^3/s)
Runoff of Catchments to be Discharged towards the South to Kau Pui Lung Road/Chi Kiang Street (see Tables 3 & 4)	Catchment A Lok Man Sun Chuen (46% unpaved)	16,897	103.0	26.1	76.9	184	41.8	4.8	4.8	0.5	5.3	227	0.70	0.75	0.83	0.87	0.96
	Catchment B Lok Man Sun Chuen (41% unpaved)	12,048	103.0	15.3	87.7	232.0	37.8	6.3	6.3	0.5	6.8	213	0.73	0.52	0.58	0.61	0.67
	Catchment R1 Fully Paved Road	925	15.3	15.2	0.2	73.8	0.2	7.1	7.1	0.5	7.6	207	0.94	0.05	0.06	0.06	0.06
	Catchment R2 Fully Paved Road	1,285	15.5	15.3	0.2	97.8	0.2	9.5	9.5	0.5	10.0	193	0.94	0.06	0.07	0.07	0.08
	Catchment R3 Fully Paved Road	1,232	15.3	8.0	7.3	106.3	6.9	5.1	5.1	0.5	5.6	223	0.94	0.07	0.08	0.08	0.09
	Southern Site (SS) [See Remark 2] Fully Paved Development	6,888	-	-	-	-	-	-	-	-	10.0	193	1.00	0.37	0.41	0.43	0.47
Runoff of Catchments to be Discharged towards the North to Lok Shan Road/Ma Tau Wai Road (see Tables 5 & 6)	Catchment C (Existing) [See Remark 1] Lok Man Sun Chuen (50% unpaved)	49,573	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.7	190	0.68	1.76	1.96	2.05	2.26
	Catchment C+E (Existing) Lok Man Sun Chuen (47% unpaved)	52,021	103.0	15.4	87.6	370	23.7	9.6	9.6	1.5	11.1	187	0.69	1.88	2.09	2.18	2.41
	Catchment D (Proposed) [See Remark 3] Fully Paved	2,786	-	-	-	-	-	-	-	-	3.0	255	1.00	0.20	0.22	0.23	0.25
	Catchment C+D (Proposed) Lok Man Sun Chuen (o/a 47% unpaved)	52,359	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.6	190	0.69	1.92	2.13	2.23	2.46
	Catchment C+D+E (Proposed) Lok Man Sun Chuen (o/a 45% unpaved)	54,807	103.0	15.4	87.6	370	23.7	9.5	9.5	1.5	11.0	188	0.71	2.02	2.25	2.35	2.59

Notes:
Existing Site comprises concrete paving, C = 1; Steep Grassland, C = 0.35
Future Site Development will include Paved Areas, C = 1, with Soft Landscaping, C = 0.15
Catchments are small, so Rational Method is appropriate

Remarks:
1. Assumed Time of Concentration through stream flow. Velocity of 2m/s assumed for pipe flow in Catchment C
2. Nominal 10 minutes t_c adopted for Southern and Northern Sites, with consideration of discharge from remote high-level podium and rooftop planters, etc.
3. Nominal 3 minutes t_c adopted for Catchment D, with drains over a length of approximately 160m

Table 2a - 1 in 50 year Runoff of Existing Catchments (m/s^3)

	Catchment A	Catchment B	Catchment R1	Catchment R2	Catchment R3	Southern Site (SS)	Catchment C	Catchment C+E	Catchment D	Catchment C+D	Catchment C+D+E
Runoff	0.75	0.52	0.05	0.06	0.07	0.37	1.76	1.88	0.20	1.92	2.02
End-21st C	0.87	0.61	0.06	0.07	0.08	0.43	2.05	2.18	0.23	2.23	2.35
With Design Allowance	0.96	0.67	0.06	0.08	0.09	0.47	2.26	2.41	0.25	2.46	2.59

Table 3a - Hydraulic Capacities for Existing Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
D1-D2	SMH4029270	SMH4029271	Circular	525	28.1	13.81	13.59	9.81	0.0003	0.008	128	0.000001	2.14	0.22	0.46	0.42
D2-D3	SMH4029271	SMH4029272	Circular	525	34.1	13.59	9.90	9.81	0.0003	0.108	9	0.000001	8.02	0.22	1.74	1.65
D3-D4	SMH4029272	SMH4029273	Circular	525	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	6.58	0.22	1.42	1.35
D4-D5	SMH4029273	SMH4029274	Circular	525	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	3.86	0.22	0.84	0.75
D5-D6	SMH4029274	SMH4029177	Circular	525	30.1	7.50	6.11	9.81	0.0003	0.046	22	0.000001	5.23	0.22	1.13	1.08

Table 3b - Hydraulic Capacities for Proposed Drainage System (Kau Pui Lung Road)/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
P3-P2	SMH4029168	SMH4029170	Circular	450	35.2	14.44	14.32	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P2-P1	SMH4029170	SMH4029171	Circular	450	36.8	14.32	14.20	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P1-D1	SMH4029171	SMH4029270	Circular	**900**	63.0	14.20	**13.65**	9.81	0.0003	0.009	115	0.000001	3.15	0.64	2.00	1.80
D1-D2	SMH4029270	SMH4029271	Circular	**900**	28.1	**13.65**	**13.00**	9.81	0.0003	0.023	43	0.000001	5.14	0.64	3.27	2.95
D2-D3	SMH4029271	SMH4029272	Circular	**900**	34.1	**13.00**	9.90	9.81	0.0003	0.091	11	0.000001	10.22	0.64	6.50	6.18
D3-D4	SMH4029272	SMH4029273	Circular	**900**	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	9.15	0.64	5.82	5.53
D4-D5	SMH4029273	SMH4029274	Circular	**900**	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	5.38	0.64	3.42	3.08
D5-D6	SMH4029274	SMH4029177	Circular	**900**	30.1	**7.52**	6.11	9.81	0.0003	0.047	21	0.000001	7.33	0.64	4.66	4.43

Table 4a - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Existing Drains (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Q_{silt}[1]	Catchment Involved	Runoff	Occupancy	Sufficient Capacity?
			mm	m^3/s		m^3/s		
D1-D2	SMH4029270	SMH4029271	525	0.42	A-B-R1-R2	1.38	332.0%	NO
D2-D3	SMH4029271	SMH4029272	525	1.65	A-B-R1-R2	1.38	83.9%	YES
D3-D4	SMH4029272	SMH4029273	525	1.35	A-B-R1-R2-R3	1.45	107.6%	NO
D4-D5	SMH4029273	SMH4029274	525	0.75	A-B-R1-R2-R3-SS	1.82	242.4%	NO
D5-D6	SMH4029274	SMH4029177	525	1.08	A-B-R1-R2-R3-SS	1.82	169.7%	NO

Table 4b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Q_{silt}[1]	Catchment Involved	Runoff	Occupancy	Sufficient Capacity?
			mm	m^3/s		m^3/s		
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.05	27.6%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.05	27.6%	YES
P1-D1	SMH4029171	SMH4029270	900	1.80	A-R1-R2	0.86	47.7%	YES
D1-D2	SMH4029270	SMH4029271	900	2.95	A-B-R1-R2	1.38	47.0%	YES
D2-D3	SMH4029271	SMH4029272	900	6.18	A-B-R1-R2	1.38	22.4%	YES
D3-D4	SMH4029272	SMH4029273	900	5.53	A-B-R1-R2-R3	1.45	26.3%	YES
D4-D5	SMH4029273	SMH4029274	900	3.08	A-B-R1-R2-R3-SS	1.82	59.2%	YES
D5-D6	SMH4029274	SMH4029177	900	4.43	A-B-R1-R2-R3-SS	1.82	41.2%	YES

Table 4c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Q_{silt}[1]	Catchment Involved	Runoff	Occupancy	Sufficient Capacity?
			mm	m^3/s		m^3/s		
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.06	32.0%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.06	32.0%	YES
P1-D1	SMH4029171	SMH4029270	900	1.80	A-R1-R2	1.00	55.3%	YES
D1-D2	SMH4029270	SMH4029271	900	2.95	A-B-R1-R2	1.60	54.5%	YES
D2-D3	SMH4029271	SMH4029272	900	6.18	A-B-R1-R2	1.60	26.0%	YES
D3-D4	SMH4029272	SMH4029273	900	5.53	A-B-R1-R2-R3	1.69	30.5%	YES
D4-D5	SMH4029273	SMH4029274	900	3.08	A-B-R1-R2-R3-SS	2.12	68.7%	YES
D5-D6	SMH4029274	SMH4029177	900	4.43	A-B-R1-R2-R3-SS	2.12	47.7%	YES

Table 4d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - End-21st Century with Design Allowance

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Q_{silt}[1]	Catchment Involved	Runoff	Occupancy	Sufficient Capacity?
			mm	m^3/s		m^3/s		
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.06	35.3%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.06	35.3%	YES
P1-D1	SMH4029171	SMH4029270	900	1.80	A-R1-R2	1.10	61.1%	YES
D1-D2	SMH4029270	SMH4029271	900	2.95	A-B-R1-R2	1.77	60.2%	YES
D2-D3	SMH4029271	SMH4029272	900	6.18	A-B-R1-R2	1.77	28.7%	YES
D3-D4	SMH4029272	SMH4029273	900	5.53	A-B-R1-R2-R3	1.86	33.7%	YES
D4-D5	SMH4029273	SMH4029274	900	3.08	A-B-R1-R2-R3-SS	2.34	75.8%	YES
D5-D6	SMH4029274	SMH4029177	900	4.43	A-B-R1-R2-R3-SS	2.34	52.7%	YES

Table 5a - Hydraulic Capacities for Existing Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
SMH4028820-B1	SMH4028820	SMH4114290	Circular	225	5.3	11.728	11.238	9.81	0.0003	0.092	11	0.000001	4.37	0.04	0.17	0.17
B1-B2	SMH4114290	SMH4114291	Circular	750	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	4.71	0.44	2.08	1.87
B2-B3	SMH4114291	SMH4114292	Circular	750	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.19	0.44	1.85	1.67
B3-B4	SMH4114292	SMH4114294	Circular	750	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.46	0.44	1.97	1.77

Table 5b - Hydraulic Capacities for Proposed Drainage System (Lok Shan Road)/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
A1-A2	SMH4028832	SMH4028831	Circular	**450**	13.1	12.4	12.238	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A2-A3	SMH4028831	SMH4028830	Circular	**450**	9.6	12.238	12.120	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A3-A4	SMH4028830	SMH4028829	Circular	**450**	25.4	12.120	11.807	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A4-A5	SMH4028829	SMH4028828	Circular	**450**	4.8	11.807	11.747	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A5-A6	SMH4028828	SMH4110924	Circular	**450**	3.6	11.747	11.703	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A6-NM1	SMH4110924	New Manhole	Circular	**450**	24.3	11.703	11.403	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
NM1-B1	New Manhole	SMH4114290	Circular	**450**	25.4	11.403	11.090	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
B1-B2	SMH4114290	SMH4114291	Circular	**900**	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	5.27	0.64	3.35	3.02
B2-B3	SMH4114291	SMH4114292	Circular	**900**	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.68	0.64	2.98	2.68
B3-B4	SMH4114292	SMH4114294	Circular	**900**	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.99	0.64	3.17	2.86

Table 6a - Comparison of Runoff from Existing Catchments and Hydraulic Capacities of Existing Drains (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
NM1-B1	New Manhole	SMH4114290	225	0.17	Minor Local	0.00	0.0%	YES
B1-B2	SMH4114290	SMH4114291	750	1.87	C	1.76	94.1%	YES
B2-B3	SMH4114291	SMH4114292	750	1.67	C	1.76	105.9%	NO
B3-B4	SMH4114292	SMH4114294	750	1.77	C+E	1.88	106.1%	NO

Table 6b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	**450**	0.35	D	0.20	56.4%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	**900**	3.02	C+D	1.92	63.6%	YES	
B2-B3	SMH4114291	SMH4114292	**900**	2.68	C+D	1.92	71.6%	YES	
B3-B4	SMH4114292	SMH4114294	**900**	2.86	C+D+E	2.02	70.8%	YES	

Table 6c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	**450**	0.35	D	0.23	65.4%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	**900**	3.02	C+D	2.23	73.8%	YES	
B2-B3	SMH4114291	SMH4114292	**900**	2.68	C+D	2.23	83.0%	YES	
B3-B4	SMH4114292	SMH4114294	**900**	2.86	C+D+E	2.35	82.1%	YES	

Table 6d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - End-21st Century with Design Allowance

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	**450**	0.35	D	0.25	72.2%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	**900**	3.02	C+D	2.46	81.5%	YES	
B2-B3	SMH4114291	SMH4114292	**900**	2.68	C+D	2.46	91.7%	YES	
B3-B4	SMH4114292	SMH4114294	**900**	2.86	C+D+E	2.59	90.7%	YES	

Table 6e - Summary of Flow Rates as a Result of Proposed Drainage Diversion (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Flow Rate (m^3/s)						Remarks
			Without Diversion		With Diversion		Increases		
			Existing	End 21st C + Design Allowance	Existing	End 21st C + Design Allowance	Existing	End 21st C + Design Allowance	
NM1-B1	New Manhole	SMH4114290	0.00	0.00	0.20	0.25	0.20	0.25	Existing drains to be upgraded to accommodate flow to End 21st Century plus Design Allowance
B1-B2	SMH4114290	SMH4114291	1.76	2.26	1.92	2.46	0.16	0.20	
B2-B3	SMH4114291	SMH4114292	1.76	2.26	1.92	2.46	0.16	0.20	
B3-B4	SMH4114292	SMH4114294	1.88	2.41	2.02	2.59	0.14	0.18	

Remarks:

1. Cross Section Area of U-channel: (D^2 x PI) / 4 / 2 + (H x D) / 2
2. Cross Section Area of Circular Pipe: D^2 x PI / 4
3. Qsilt: 10% reduction in capacity for gradients not greater than 1 in 25; 5% reduction in flow for gradients greater than 1 in 25

Annex C

Extracted pages of Revised Environmental Assessment (EA)

3. ROAD TRAFFIC NOISE IMPACT ASSESSMENT

3.1 Introduction

3.1.1 In this assessment, potential road traffic noise impact arising from nearby existing and future roads on the proposed development of the Subject Site has been assessed by using modelling. Practicable environmental mitigation measures have been recommended, as required.

3.2 Assessment Criteria

3.2.1 Noise standards are recommended in the HKPSG for planning against noise impact from sources such as road traffic, railway and aircraft, etc.

3.2.2 The proposed development includes 5 residential towers in Northern Site and 2 residential blocks in Southern Site. The podia beneath the residential towers will be provided with centralized air condition and will not rely on opened window for ventilation, whilst the domestic dwellings will rely on opened window for ventilation. According to the guidelines, the maximum noise level from road traffic, measured in terms of L10 (1-hr) is recommended to be 70 dB(A) at typical facades of new dwellings.

3.3 Assessment Methodology and Assumptions

3.3.1 The methodology involved the prediction of future road traffic noise impacts on Noise Sensitive Receivers (NSRs) arising from traffic flows on existing and future road carriageways situated within 300m study area from the Subject Site.

3.3.2 The U.K. Department of Transport's procedure "Calculation of Road Traffic Noise" was used to predict the hourly L10 noise levels generated from road traffic at selected representative NSRs. The predicted noise levels are then compared with the relevant HKPSG noise standard (i.e. 70 dB(A)). Noise mitigation measures are recommended at situations when the predicted noise levels exceed the noise standard.

3.3.3 The tentative completion date of the development will be in Year 2033. Calculations of the predicted road traffic noise were based on the AM peak hour and PM peak hour traffic flows within a 15-year period (i.e. Year 2048) from the tentative completion date of the proposed development. The assessment year has been chosen to be Year 2048 because the traffic forecast for the Year 2048 is the maximum among the 15-year period. The projected traffic flows and vehicle composition of the road carriageways provided by the project traffic consultant and the endorsement from Transport Department are shown in **Appendix 3.1**.

3.4 Noise Sensitive Receivers (NSRs)

3.4.1 Representative NSRs were selected to represent the noise sensitive uses of the proposed development. Locations of the representative NSRs are shown in **Figures 3.1 to 3.2** for Northern Site and **Figure 3.3 to 3.4** for Southern Site respectively. The assessment points have been taken to be situated at 1.2m above floor slabs and at 1m away from the external façade of windows of the residential unit.

3.5 Incorporated Noise Mitigating Designs

3.5.1 In order to minimise the potential traffic noise impact, noise mitigating designs have been incorporated or considered when formulating the building layout. They are include:

- Building Setback and Orientation

  The residential towers have been set back from Ma Tau Wai Road as far as practicable in order to minimize the traffic noise impact to the domestic premises.

- Building Layout

  To ensure the remaining residential units would not have direct exposure to the major road traffic noise source, the façades of the residential towers have been orientated such that the respective openable windows of habitable rooms can be shielded by the projected façades of the other units of the towers against the more trafficked roads along the Southern Site boundary.

- Podium

  The residential towers are sitting above the podiums. Residential floors are elevated at 27.6mPD in Northern Site and Southern Site so as to increase the vertical buffer distance from the nearby more trafficked roads.

3.6 Assessment Results – Base Case Scenario

3.6.1 The predicted traffic noise levels of the NSRs for the Base Case Scenario (without proposed noise mitigation measures mentioned in section 3.7) with AM peak and PM peak traffic flows are shown in **Appendix 3.2**. The results are summarized in Table below.

3.6.2 By comparing with the predicted noise results of the Base Case Scenario with AM peak and PM peak traffic flows, it is concluded that the Base Case Scenario with AM peak traffic flow is the worst case scenario.

Scenario	Total No. of Flats	No. of Flats Exceeding the Noise Criteria of 70 dB(A)(L10 1-hour)	Max Noise Levels, dB(A)(L10 1-hour)	Compliance Rate
Base Case (AM peak)	2324	443	76	~81%
Base Case (PM peak)		371	76	~84%

3.7 Proposed Traffic Noise Mitigation Measures

3.7.1 In order to further minimise the potential traffic noise impact, at-receiver mitigation measures have been incorporated.

3.7.2 The recommended noise mitigation measures are listed as below in **Table 3.1** & **Table 3.2** and the locations are shown in **Figure 3.1** to **Figure 3.4**.

a. Acoustic Window (Baffle Type) and Enhanced Acoustic Balcony (Baffle Type)

3.7.3 The acoustic window (baffle type) (AW(BT)) and enhanced acoustic balcony (baffle type) (EAB(BT)) in the "*Practice Noise on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact*" (Practice Note) issued by EPD are proposed at the residential blocks. The location of the proposed AW(BT) and EAB(BT) can be referred to **Figures 3.1 to 3.4**. Extracts of the Practice Note can be referred to **Appendix 3.4**.

3.7.4 All of the sizes of room to be adopted with AW(BT) and EAB(BT) would be within +10% of the designated room size of $8m^2$ and $14m^2$ for AW(BT) and EAB(BT) in the Practice Note respectively. If the room size is smaller than -10% of $8m^2$ and $14m^2$ as compared

Table 3.1 Proposed Mitigation Measures for Northern Site

Tower	Flat	NSR	Floor	Proposed Mitigation Measures
1	A	N1-01	1-35	AW(BT)
		N1-02	1-35	EAB(BT)
	B	N1-03	1-35	EAB(BT)
		N1-04	1-35	AW(BT)
		N1-05	1-35	AW(BT)
	H (High Zone)	N1-22	Full Height	1.5m long architectural fin
	I (Low Zone)			
3	A	N3-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		N3-04	1-5	EAB(BT)
	B	N3-05	1-5	EAB(BT)
		N3-06	1-5	AW(BT)
	C	N3-07	1-5	AW(BT)
		N3-08	1-5	EAB(BT)
	D	N3-09	1-5	EAB(BT)
		N3-11	1-5 (up to 43.35mPD)	1.5m long architectural fin
4	A	N4-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		N4-03	1-4	EAB(BT)
	B	N4-04	1-4	AW(BT)
		N4-05	1-4	EAB(BT)
	C	N4-06	1-4	EAB(BT)
		N4-08	1-5 (up to 43.35mPD)	1.5m long architectural fin
5	E (High Zone)	N5-16	Full Height	1.0m long architectural fin
	F (Low Zone)			

Note:

AW(BT) = Acoustic Window (Baffle Type) w/o SAM

EAB(BT) = Enhanced Acoustic Balcony (Baffle Type) w/o SAM

Table 3.2 Proposed Mitigation Measures for Southern Site

Block	Flat	NSR	Floor	Proposed Mitigation Measures
7	A	NAL-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		NAL-02	1-4	EAB(BT)
	B	NAL-03	1-4	EAB(BT)
		NAL-05	1-4	EAB(BT)
	C	NAL-06	1-4	EAB(BT)
		NAL-08	1-4	EAB(BT)
	D	NAL-10	1	EAB(BT)
			1-5 (up to 43.35mPD)	1.5m long architectural fin
	E	NAL-11	1-20	EAB(BT)

		NAH-11	21-35	EAB(BT)
		NAL-12	1-4	AW(BT) with SAM
			5-20	AW(BT)
		NAH-12	21-35	AW(BT)
		NAL-13	1-20	EAB(BT)
		NAH-13	21-35	EAB(BT)
	F	NAL-14	1-20	EAB(BT)
		NAH-14	21-35	EAB(BT)
		NAL-15	1-20	AW(BT)
		NAH-15	21-35	AW(BT)
	G	NAL-16	1-20	EAB(BT)
		NAH-16	21-35	EAB(BT)
		NAL-17	1-20	AW(BT)
		NAH-17	21-35	AW(BT)
		NAL-18	1-20	EAB(BT)
		NAH-18	21-35	EAB(BT)
	H	NAL-19	1-20	EAB(BT)
		NAH-19	21-35	EAB(BT)
		NAL-20	1-3	AW(BT) with SAM
			4-20	AW(BT)
		NAH-20	21-35	AW(BT)
		NAL-21	1-20	EAB(BT)
		NAH-21	21-35	EAB(BT)
	I	NAL-22	1-20	AW(BT)
		NAH-22	21-35	AW(BT)
		NAL-23	1-20	EAB(BT)
			Full Height	1.5m long architectural fin
		NAH-23	21-35	EAB(BT)
	J	NAL-25	Full Height	1.5m long architectural fin
		NAH-25	Full Height	1.5m long architectural fin
	M (High Zone)	NAH-34	Full Height	1.5m long architectural fin
	N (Low Zone)	NAL-34		
6	A	NB-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		NB-02	1-4	EAB(BT)
	B	NB-03	1-4	EAB(BT)
		NB-05	1-4	EAB(BT)
	C	NB-06	1-3	EAB(BT)
		NB-08	1-3	EAB(BT)
	D	NB-10	1	EAB(BT)
			1-4 (up to 40.2mPD)	1.5m long architectural fin
	E	NB-11	1-3 (up to 37.05mPD)	1.0m long architectural fin
	J	NB-24	Full Height	1.5m long architectural fin
	M (High Zone)	NB-34	Full Height	1.5m long architectural fin
	N (Low Zone)			

Appendix 3.1

Traffic Forecast Data for Year 2048 for Traffic Noise Impact Assessment and Endorsement from Transport Department

KMA4T

By Fax
2214 0817

運輸署
Transport Department

本署檔案 Our Ref. : (KMAND) in TD KR146/193/K-17
來函檔號 Your Ref. : 22101HK/hor/wkk/02
電　　話 Tel. : 2399 2504
圖文傳真 Fax : 2397 8046
電　　郵 Email : chunwong@td.gov.hk

15 February 2023

CTA Consultants Limited
Unit 2108, 21/F, Westlands Centre,
20 Westlands Road,
Quarry Bay, Hong Kong
(Attn: Mr. Horace MAK)

Dear Sir/Madam,

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Technical Note on Methodology for Updated Estimating Traffic Forecasts for
Updated Traffic Noise Impact Assessment (TNIA)

I refer to your letter dated 10.2.2023 regarding the captioned.

Please be advised that I have no comment on the methodology as detailed in the revised Technical Note from traffic engineering point of view.

Yours faithfully,

Andy

(Mr Andy WONG)
for Commissioner for Transport

市區(九龍)及新界分區辦事處
Urban (Kln.) & NT Regional Office
九龍聯運街三十號旺角政府合署七樓及八樓
7th & 8th Floors, Mong Kok Government Offices, 30 Luen Wan Street, Kowloon.
圖文傳真 Fax No.: 2381 3799 (新界區) (NTRO) 2397 8046 (九龍市區) (U(K)RO)
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CTA Consultants Limited
Transportation, Planning, Engineering, Research and Development
We commit We deliver
用心以誠

Our Ref: 22101HK/hor/wkk/02

By E-mail & Post
(E-mail : tseungmanchow@td.gov.hk)

10 February 2023

Transport Department
Urban Regional Office
Traffic Engineering (Kln.) Division
Kln. District Central Section
8/F, Mongkok Government Offices,
30 Luen Wan Street, Kowloon

Attn: Mr. WONG Chun (Engr/Hung Hom)

Dear Andy,

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Technical Note on Methodology for Updated Estimating Traffic Forecasts for Updated Traffic Noise Impact Assessment (TNIA)

We refer to your letter [Ref No.: (KLPH4) in TD KR146/193/K-17] dated 18 November 2022 regarding the captioned subject. To address your comments, we are pleased to submit herewith the Summary of "Response to Comments" and revised technical note for your kind consideration and approval.

Thank you very much for your kind assistance and we are looking forward to hearing your favourable reply at your earliest convenience. Should you have any queries or require further information, please feel free to contact the undersigned or our Mr. W K Kwong at 2214 0849.

Yours Faithfully,
For and on behalf of
CTA Consultants Ltd.

W.K. Kwong

Horace Mak
Director

Encl.

Enclosure 1: Fax from TD on 18 November 2022
Enclosure 2: Technical Notes on Methodology for Estimating Traffic Forecasts for Traffic Noise Impact Assessment (TNIA)
c.c. URA - Miss. Charis Leung (Assistant Manager, Planning and Design)

CTA Consultants Limited 志達顧問有限公司
Unit 801, 8/F, Technology Plaza, 651 King's Road, North Point, Hong Kong
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Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Technical Note on Methodology for Updated Estimating Traffic Forecasts for Updated Traffic Noise Impact Assessment (TNIA)

Summary of 'Responses to Comments' (February 2023)

Comments from TD dated 18 November 2022		
Item	**Comments**	**Responses**
a)	It is noticed that the development parameter is updated in your latest Traffic Impact Assessment (TIA) (your ref: 22101HK/ Revised Final Report (October 2022)) such that there is no subsided housing block for the development. All housing units are considered as private residential units. Please tally the development parameter and trip generation in TNIA with TIA and update the traffic forecast accordingly.	Noted. The development parameter was updated and talley with the TIA.

KLF1T

By Fax
2214 0817

運輸署
Transport Department

本署檔案 Our Ref. : (KLPH4) in TD KR146/193/K-17
來函檔號 Your Ref. : 22101HK/hor/wkk/01
電　話 Tel. : 2399 2504
圖文傳真 Fax : 2397 8046
電　郵 Email : tseungmanchow@td.gov.hk

18 November 2022

CTA Consultants Limited
Unit 801, 8/F, Technology Plaza,
651 King's Road,
North Point, Hong Kong
(Attn: Mr. Horace MAK)

Dear Mr. MAK,

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Technical Note on Methodology for Estimating Traffic Forecasts for
Traffic Noise Impact Assessment (TNIA)

I refer to your letter dated 12.10.2022 regarding the captioned.

It is noticed that the development parameter is updated in your latest Traffic Impact Assessment (TIA) (your ref: 22101HK/ Revised Final Report (October 2022)) such that there is no subsided housing block for the development. All housing units are considered as private residential units. Please tally the development parameter and trip generation in TNIA with TIA and update the traffic forecast accordingly.

Yours faithfully,

(Ms Wendy CHOW)
for Commissioner for Transport

市區(九龍)及新界分區辦事處
Urban (Kln.) & NT Regional Office
九龍聯運街三十號旺角政府合署七樓及八樓
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網址 Web Site: http://www.td.gov.hk

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Technical Note on Methodology for Estimating Traffic Forecasts for Traffic Noise Impact Assessment (TNIA)

1. Objective

1.1 This technical note summarizes the methodology and results of the traffic forecasts in support of the Traffic Noise Impact Assessment for the Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) at To Kwa Wan.

2. Approach

2.1 The Annual Growth Rate Method has been adopted.

3. Methodology

3.1 The proposed development is planned to be completed by year 2033 tentatively and hence year 2048 traffic forecasts (i.e. year 2033 +15 years) for the **300M** catchment area roads required summarized in **Appendix A**.

Annual Growth Rate

3.2 In order to assess the impact of the proposed development related traffic on the road links required, reference is made to the growth factor in Annual Traffic Census (ATC) and the latest 2019-Based Territorial Population and Employment Data Matrices (TPEDM) published by the Planning Department which are summarized in below **Tables 3.1 and 3.2** respectively.

Table 3.1 Historical Traffic Data from Annual Traffic Census (ATC)

ATC Stn	Road Name	Annual Average Daily Traffic (AADT)						Avg. Annual Growth Rate
		2014	2015	2016	2017	2018	2019	
3014	Ma Tau Wai Road and To Kwa Wan Road	26,640	23,980	24,170	23,660	23,940	23,670	-2.34%
3818	Ma Tau Wai Road	38,200*	38,970*	34,190	34,990	34,530 *	34,050*	-2.27%
4077	San Lau Street	6,500*	6,410*	6,440*	6,930	7,010*	6,860*	1.08%
4212	Chatham Road North and Ma Tau Wai Road	34,900	35,130	32,660	32,560	32,260	30,920	-2.39%
4213	East Kowloon Corridor <Flyover>	77,910	74,070	74,250	74,220	78,030	73,310	-1.21%
Total		**184,150**	**178,560**	**171,710**	**172,360**	**175,770**	**168,810**	**-1.72%**

*Note: *AADT estimated by Growth factor*
***Due to the COVID-19 in 2020, the traffic flow will not be reliable and hence the Growth Rate will only take into account from 2014 to 2019*

Table 3.2 2019-based TPEDM Population and Employment Planning Data

Kowloon City District				
Data	Year			Average Annual Growth Rate
	2019	2026	2031	
Population	429,300	451,100	420,050	-0.18%
Employment	212,000	237,900	227,850	+0.60%
Total	**641,300**	**689,000**	**647,900**	**+0.09%**

3.3 A.A.D.T. of ATC indicates that the traffic flow of the local road network has an average annual growth rate of -1.72% from year 2014 to year 2019.

3.4 Whilst, the planning data indicates that the population and employment of the study area are expected to grow with an average annual growth rate of +0.090% from 2019 to 2031.

3.5 As a conservative approach, annual growth rate **+1.0%** p.a. is adopted. It is deemed sufficient to allow for any unexpected future growth as a result of some changes in land use or development in the study area.

Proposed Development

3.6 At present, there are residential buildings within the proposed development Site.

3.7 The proposed development will comprise of 2 sites, i.e. "Northern Site" and "Southern Site". Parameters of the proposed development are listed in **Table 3.3**.

Table 3.3 Parameters of the Proposed Development

	Northern Site	Southern Site	Whole Project
Net Site Area*	Around 8,587 m^2	Around 6,888 m^2	15,475 m^2
Proposed Domestic GFA	Around 68,700 m^2 (PR 8)	Around 55,100 m^2 (PR 8)	Around 123,800 m^2 (PR 8)
Proposed Non-Domestic GFA	Around 8,587 m^2 (PR 1)	Around 6,888 m^2 (PR 1)	Around 15,475 m^2 (PR 1)
	GIC: 500 m^2	GIC: 2,000 m^2	GIC: 2,500 m^2
Total GFA	Around 77,287 m^2 (PR 9)	Around 61,988m^2 (PR 9)	Around 139,275 m^2 (PR 9)
Total Number of Residential Flats	About 1,374 units	About 950 units	About 2,324 units
No. of Blocks	5	2	7

**Subject to site survey, Net Site Area includes all private lots, the existing sections of Maidstone Road and Kiang Su Street, and Government lanes, but excludes public pavement at the periphery where affected buildings overhang within the Project. The site boundaries between Northern Site and Southern Site is indicative and subject to change.*

3.8 In order to estimate the traffic generation and attraction of the proposed development, reference has been made to the trip generation rates as stipulated in Volume 1 Chapter 3 Appendix D Table 1 of the latest T.P.D.M. published by Transport Department. The adopted trip rates are summarized in below **Table 3.4**.

Table 3.4 Adopted Traffic Rates for Proposed Development

Use	Unit	Trip Generation (pcu/hr)			
		Weekday AM Peak		Weekday PM Peak	
		Generation	Attraction	Generation	Attraction
Retail	pcu/hr/100 sqm GFA	0.2296	0.2434	0.3100	0.3563
Private Housing (Average Flat Size 60m^2)	pcu/hr/flat	0.0718	0.0425	0.0286	0.0370
Public Vehicle Carpark(1)	pcu/hr /parking space	0.0771	0.0907	0.0493	0.0811

(1) Based on survey on Hung Hom Station Carpark

3.9 Based on the adopted trip rate listed in the above **Table 3.4** and the development parameters in **Table 3.3**, the trip generated and attracted by the proposed development are estimated and summarized in the **Table 3.5**.

Table 3.5 Estimated Traffic Trips of the Proposed Development

Site	Use	Weekday AM Peak (pcu/hr)		Weekday PM Peak (pcu/hr)	
		Gen.	Att.	Gen.	Att.
Northern Site	Residential	99	58	39	51
	Non-Domestic	20	21	27	31
	Public Vehicle Carpark (Net Increase 64 Nos.)	5	6	3	5
	Sub Total	***124***	***86***	***71***	***90***
Southern Site	Residential	68	40	27	35
	Non-Domestic	16	17	21	25
	Sub Total	***84***	***57***	***49***	***60***
Total		**208**	**143**	**119**	**150**

Adjacent Development

3.10 To fully reflect the growth traffic, trip generation of the future planned adjacent developments have been taken into consideration. The planned development are listed in **Table 3.6**.

Table 3.6 Major Planned/ Committed Development in the Vicinity

URA Project No. / Planning Application No. / Site Location	Proposed Use	Development Parameters
URA Project KC-008(A) (1) (3)	Residential & Commercial	No. of Flats = 217 (<40 m^2) = 93 (40 m^2<Flat Size≤70 m^2) Commercial GFA = 2,454 m^2
URA Project KC-009(2) (3)	Residential & Commercial	No. of Flats = 1,152 Average Flat Size = 48.2 m^2 Commercial GFA = 11,105 m^2
URA Project KC-010(2) (3)	Residential & Commercial	No. of Flats = 750 Average Flat Size = 45.6 m^2 Commercial GFA = 6,843 m^2
URA Project KC-011(2)(3)	Residential & Commercial	No. of Flats = 400 Average Flat Size = 45.8 m^2 Commercial GFA = 3,660 m^2
URA Project KC-012 & KC-013(2)	Residential & Commercial	No. of Flats = 414 Average Flat Size = 44.9 m^2 Commercial GFA = 3,721 m^2
URA Project KC-014(2)	Residential & Commercial	No. of Flats = 550 Average Flat Size = 39.0 m^2 Commercial GFA = 4,286 m^2
URA Project KC-016(2)	Residential & Commercial	No. of Flats = 900 Average Flat Size = 46 m^2

		Commercial GFA = 8,322 m^2
URA Project KC-018(1)	Residential & Commercial & GIC	No. of Flats = 1276 Average Flat Size = 53.5 m^2 Commercial GFA = 10,496m^2
URA Project KC-019(1)	Residential & Commercial & GIC	No. of Flats = 950 Average Flat Size = 53.5 m^2 Commercial GFA = 7,816m^2
URA Project DL-8(2)	Residential & Commercial	No. of Flats = 72 Average Flat Size = 52.6 m^2 Non-Domestic GFA = 758 m^2
13 Hok Yuen Street(1)	Office & Retail	Office GFA= 47,007.307 m^2 Retail GFA= 269.993 m^2
A/K10/259(1)	Residential & Commercial	No. of Flats = 48 (Portion 1) + 777 (Portion 2) Average Flat Size = 274 m^2 (Portion 1), 64.35 m^2 (Portion 2) Commercial GFA = 3,150 m^2 (Portion 1), 6,111 m^2 (Portion 2)
A/K10/265(1)	Residential & Commercial	No. of Flats = 746 Average Flat Size = 84 m^2 Commercial GFA = 7,598.5 m^2
A/K10/266(1)	Residential & Commercial	No. of Flats = 208 Average Flat Size = 37.4m^2 Commercial GFA = 971.25 m^2
A/K10/267(1)	Residential & Commercial	No. of Flats = 201 Average Flat Size = 32 m^2 Non-Domestic GFA = 1,268.127 m^2
A/K10/269(1)	Residential & Commercial	No. of Flats = 110 Average Flat Size = 36.8 m^2 Commercial GFA = 808.95 m^2
Ma Tau Wai Estate Re-development	Public Housing	About 4,000 flats (About net increase 2,000 flats)

(1) According to its TIA or Planning Gist
(2) According to the information of TIA of KC-014
(3) Already considered in BDTM

3.11 The trip generations and attractions of the adjacent developments are summarized in **Table 3.7**.

Table 3.7 Traffic Generations and Attractions of Adjacent Development

URA Project No. / Site Location	Trip Generation (pcu/hr)			
	AM Peak		PM Peak	
	Generation	Attraction	Generation	Attraction
KC-012 & KC-013(2)	39	28	24	30
KC-014(2)	49	34	29	36
KC-016(2)	84	58	52	63
KC-018(1)	84	120	88	72
KC-019(1)	63	89	65	54
DL-8(2)	9	7	5	6
13 Hok Yuen Street(1)	81	116	75	56

URA Project No. / Site Location	Trip Generation (pcu/hr)			
	AM Peak		PM Peak	
	Generation	Attraction	Generation	Attraction
A/K10/259(1)	88	60	53	65
A/K10/265(1)	143	91	87	109
A/K10/266(1)	18	12	10	12
A/K10/267(1)	18	12	10	13
A/K10/269	10	7	6	7
Ma Tau Wai Estate Re-development	86	65	47	60

(1) According to its TIA
(2) According to the information of TIA of KC-014

Formulation

3.12 It is noted that Central Kowloon Route is under construction right now, the traffic condition in this area will be very different in future. Therefore, it is not suitable to use existing traffic flow to derive future traffic flow.

3.13 Thus, the year 2048 traffic flow is estimated by applying the adopted growth rate to the year 2026 Base District Traffic Models (BDTM) traffic model flow.

3.14 Therefore, the traffic forecasts for design year 2048 could be derived based on the following formula with data as shown in **Tables 3.1** to **3.7**:

Year 2048 Traffic Flows = **2026 BDTM Traffic Model Flows** x **Adopted Growth Factor i.e. +1.0% p.a. for 22 years** + **Traffic Trips of Adjacent Development** + **Traffic Trips of the Proposed Development**

3.15 As a result, the traffic forecasts for design year 2048 have been estimated and summarized in **Appendix A**.

Appendix A

Year 2048 Traffic Forecasts for TNIA

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

TRAFFIC FORECAST FOR TRAFFIC NOISE IMPACT ASSESSMENT

Link No.	Road Name	Direction	Year 2048			
			AM Peak		PM Peak	
			Traffic Flow (veh/hr)	HV%	Traffic Flow (veh/hr)	HV%
1	Sheung Lok Street	Two-way	235	10%	125	20%
2	Sheung Shing Street	Two-way	1,635	10%	1,015	15%
3	Tin Kwong Road	Two-way	1,480	15%	1,135	25%
4	Tin Kwong Road	Two-way	1,700	20%	1,295	15%
5	Kau Pui Lung Road	Two-way	760	15%	910	15%
6	Lok Shan Road	EB	360	40%	465	20%
7	Kau Pui Lung Road	Two-way	695	15%	665	15%
8	Ko Shan Road	Two-way	915	20%	855	20%
9	Anhui Street	WB	95	20%	115	80%
10	Kiang Hsi Street	EB	20	15%	20	40%
11	Shan Si Street	EB	230	25%	150	40%
12	Ma Tau Wai Road	NB	865	30%	745	55%
13	Ma Tau Wai Road	SB	2,250	25%	1,765	20%
14	Ma Tau Wai Road	NB	340	85%	445	80%
15	Ma Tau Wai Road	SB	1,765	30%	1,310	30%
16	Ma Tau Wai Road	NB	670	45%	555	70%
17	Ma Tau Wai Road	SB	1,875	35%	1,625	25%
18	Ma Tau Wai Road	NB	1,635	45%	1,490	50%
19	Ma Tau Wai Road	SB	1,210	35%	1,140	25%
20	Ma Hang Chung Road	WB	400	40%	450	15%
21	Pau Chung Street	Two-way	315	30%	345	15%
22	Sheung Heung Road	Two-way	880	20%	770	20%
23	Ha Heung Road	Anti-clockwise	70	30%	65	15%
24	Sheung Heung Road	EB	505	35%	365	25%
25	Kowloon City Road	NB	705	15%	695	15%
26	Kowloon City Road	SB	5	0%	5	0%
27	Ha Heung Road	NB	670	15%	665	15%
28	Cheung Ning Street	NB	40	45%	30	40%
29	Lok Shan Road	WB	850	20%	945	20%
30	Kowloon City Road	Clockwise	5	0%	5	0%
31	Ha Heung Road	NB	265	10%	155	10%
32	To Kwa Wan Road	NB	370	55%	380	55%
33	To Kwa Wan Road	SB	1,210	40%	840	55%
34	To Kwa Wan Road	NB	360	55%	410	55%
35	To Kwa Wan Road	SB	2,335	40%	1,855	40%
36	Chi Kiang Street	EB	1,700	35%	1,400	30%
37	Ngan Hon Street	Clockwise	1,060	75%	815	65%
38	East Kowloon Corridor	NB	3,650	20%	4,090	25%
39	East Kowloon Corridor	SB	2,530	30%	2,220	15%

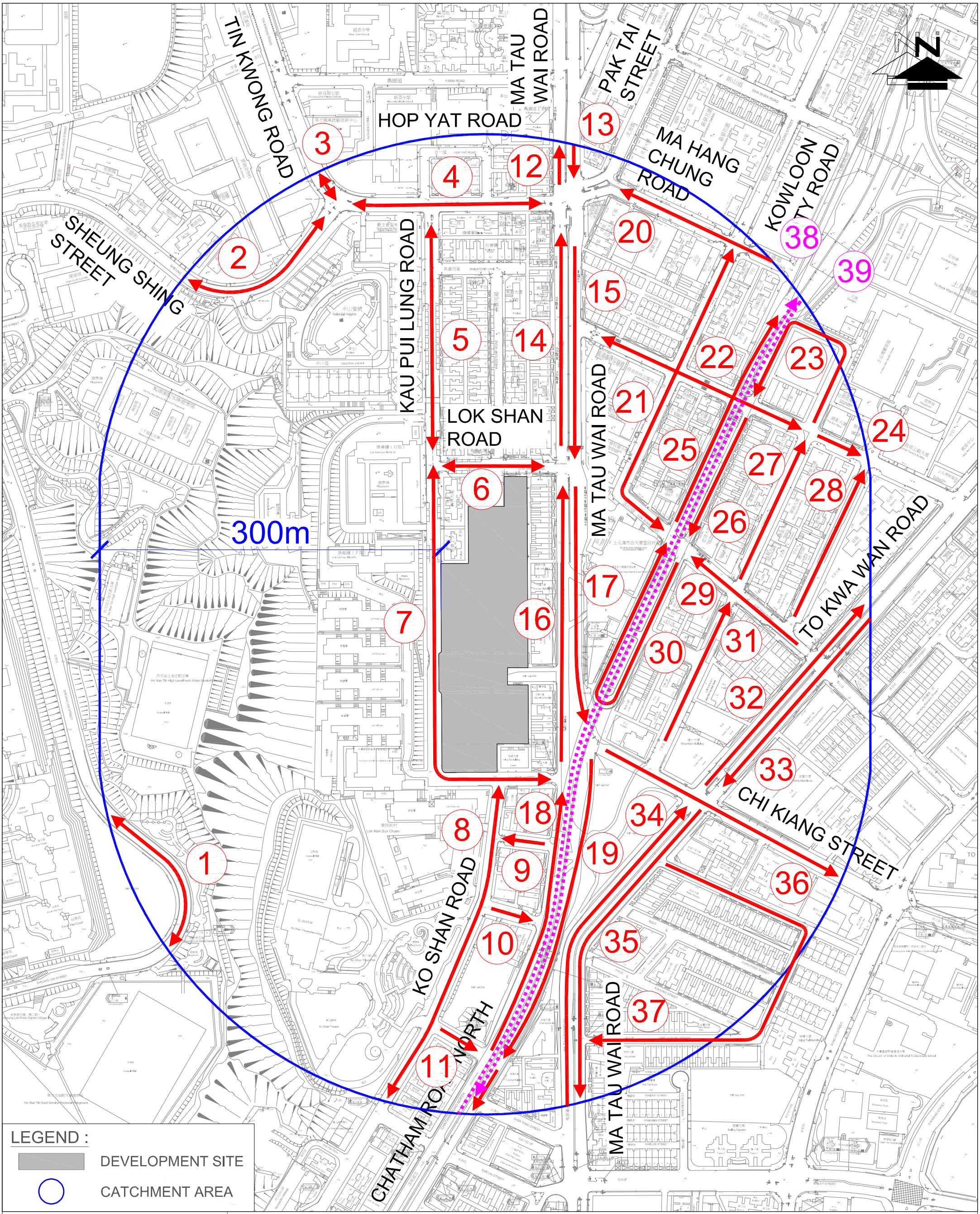


FIGURE NO.: 1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 19025HK	DRAWING TITLE: INDEX PLAN
SCALE: 1 : 3000 @ A3 / DATE: 11 OCT 2022	CTA Consultants Limited 志達顧問有限公司

Appendix 3.2

Results of Road Traffic Noise Impact Assessment

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1a. AM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	72	72	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	73	73	72	73	73	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	64	64	63	63	63	51	48	48	49
4/F	37.05	73	73	73	73	72	69	66	67	66	66	65	65	65	64	64	63	63	63	51	49	49	49
5/F	40.2	73	73	73	72	72	69	66	66	66	66	65	65	64	64	64	63	63	63	52	50	50	50
6/F	43.35	73	73	73	72	72	68	66	66	66	65	65	64	64	64	63	63	63	63	52	51	51	52
7/F	46.5	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	63	53	52	53	54
8/F	49.65	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	55	54	55	56
9/F	52.8	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	57	57	58	60
10/F	55.95	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	62	63
11/F	59.1	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	63	63	64	65
12/F	62.25	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	64	64	64	65
13/F	65.4	73	73	73	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	64	64	65	66
14/F	68.55	73	73	72	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	64	64	65	66
15/F	71.7	73	73	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	65	65	65	67
16/F	74.85	73	72	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	65	65	66	67
17/F	78	73	72	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	65	66	66	68
18/F	81.15	73	72	72	72	72	66	64	65	65	64	64	64	64	64	63	63	63	63	66	66	67	69
19/F	84.3	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	66	67	68	71
20/F	87.45	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	69	71
21/F	90.6	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	70	72
22/F	93.75	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	70	72
Max. Noise Level		74	73	73	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	68	69	70	72
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		4	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	62	63	69	70	70	72
24/F	100.05	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	63	63	69	70	71	72
25/F	103.2	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
26/F	106.35	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
27/F	109.5	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	70	70	71	72
28/F	112.65	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	64	70	71	71	72
29/F	115.8	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	62	63	65	70	71	71	72
30/F	118.95	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	71	71	72
31/F	122.1	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	71	71	72
32/F	125.25	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	71	71	71	72
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	71	71	71	72
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	71	71	71	73
35/F	134.7	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	66	71	71	72	73
Max. Noise Level		73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	63	66	71	71	72	73
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	4	8	12	13
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		13			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	63
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	61	62	63
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	63
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
10/F	55.95	62	62	61	61	61	61	60	60	61	60	60	60	60	60	60	61	61	62	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	63	63	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	64	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	64	63	63	63	63	63	63	63	63	63	63	63	63	61	61
17/F	78	64	63	62	63	64	64	63	63	64	63	63	63	63	63	63	63	63	63	61	61
18/F	81.15	64	63	63	63	64	64	63	63	64	64	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	64	64	64	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
21/F	90.6	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	65	64	64	64	64	64	64	64	65	65	60	61
24/F	100.05	65	64	63	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	62
27/F	109.5	66	65	64	65	65	65	65	64	66	66	66	66	65	65	65	65	66	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	67	66	66	66	66	66	66	67	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	67	67	67	65	68	67	68	68	68	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	73	73	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	58	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	72	72	72	72	72	72	72	72	72	72	72	61	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	59	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	71	71	71	71	71	71	71	71	71	71	71	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	70	70	70	69	69	69	69	61	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	61	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	61	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	69	68	68	61	60	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	62	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	61	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	67	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	73	73	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		5	5	5	5	5	5	5	5	5	5	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	66	65	65	65	65	65	65	66	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	67	66	67	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	66	65	65	65	64	65	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	73	73	73	73	73	73	73	73	51	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	72	54	60	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	58	60	60	60	61	61	61	61	62	62
4/F	37.05	71	71	71	71	71	71	71	71	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	71	59	61	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	61	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	59	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	61	60	61	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	58	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	58	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	58	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	58	62	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	67	67	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	66	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		73	73	73	73	73	73	73	73	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		4	4	4	4	4	4	4	5	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		5			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	57	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	58	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	59	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	59	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	59	56	56	57	57	58	64	63	63
14/F	68.55	61	60	60	59	59	59	59	59	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	57	57	58	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	57	57	57	58	58	65	65	66
18/F	81.15	64	63	63	62	61	61	59	59	57	57	57	58	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	57	57	57	57	58	67	67	67
20/F	87.45	66	65	64	63	62	62	59	59	57	57	57	57	58	67	67	68
21/F	90.6	67	65	65	64	63	62	59	59	57	57	57	57	58	68	68	68
22/F	93.75	68	66	65	64	64	63	59	59	56	56	57	57	58	68	68	68
Max. Noise Level		68	66	65	64	64	63	59	59	57	57	57	58	58	68	68	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	59	56	56	57	57	58	68	69	69
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	58	68	69	69
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	69	69	70
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	69	69	70
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	69	69	70
28/F	112.65	69	67	67	67	66	66	59	58	56	56	57	57	57	69	70	70
29/F	115.8	69	67	67	67	66	66	59	58	56	56	56	57	57	69	70	70
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	69	70	71
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	69	70	71
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
35/F	134.7	69	67	67	67	67	66	59	58	56	56	57	57	57	70	70	71
Max. Noise Level		69	67	67	67	67	66	59	59	56	56	57	57	58	70	70	71
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
No. of Flats with Noise Exceedance		0						0		0			0		6		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	126
Total no. of Flat =	1374
%Compliance =	91%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	73	72	72	72	73	73	76	75	75	76	76	76	76	76	76	76	76	76	76	65	63	59	58	57	56	56	56	56	56	56	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	75	75	76	76	76	76	66	65	63	61	60	59	58	58	58	58	58	60
3/F	33.9	71	71	71	71	72	71	71	71	72	72	75	75	75	75	75	75	75	75	75	75	75	75	75	67	67	64	63	62	62	61	60	60	60	60	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	75	74	74	74	75	75	75	75	75	75	75	75	75	68	67	66	65	64	63	63	63	62	62	62	65
5/F	40.2	71	71	71	71	71	70	71	71	71	71	74	74	74	74	74	74	74	74	74	75	75	75	75	68	68	67	66	65	65	64	64	64	64	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	74	74	74	74	74	74	74	74	74	75	75	75	69	68	67	67	66	66	65	65	65	65	65	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	74	73	74	74	74	74	74	74	74	74	74	74	74	69	68	68	67	67	66	66	66	66	66	66	65
8/F	49.65	69	69	69	69	70	69	69	69	70	70	73	73	73	73	74	74	74	74	74	74	74	74	74	69	69	68	67	67	67	67	66	66	66	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	74	74	74	74	74	74	69	69	68	68	67	67	67	67	67	67	67	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	74	74	74	74	69	69	68	68	68	67	67	67	67	67	67	64
11/F	59.1	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	74	74	74	69	69	68	68	68	68	68	68	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	69	73	73	73	73	73	73	73	73	73	73	73	73	74	69	69	68	68	68	68	68	68	68	68	68	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
15/F	71.7	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	69	68	68	68	68	68	68	68	69	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	69	69	68	68	68	68	68	69	69	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	73	69	69	69	69	69	69	69	69	69	69	69	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	73	73	70	69	69	69	69	69	69	69	69	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	73	70	70	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	72	72	72	73	72	72	72	73	73	76	75	75	76	76	76	76	76	76	76	76	76	76	70	70	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		5	5	5	5	5	4	5	5	5	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5		5			5			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	70	70	70	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	71	71	70	70	70	70	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	72	72	72	72	72	73	73	73	73	73	73	73	73	71	71	71	70	70	70	70	70	70	69	70	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	73	73	73	73	73	73	73	73	71	71	71	71	70	70	70	70	70	70	70	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	73	73	71	71	71	71	71	71	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	73	73	72	72	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	73	73	72	72	71	71	71	71	71	71	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	73	74	72	72	72	71	71	71	71	71	71	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	73	74	72	72	72	71	71	71	71	71	71	71	71	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	73	74	72	72	72	71	71	71	71	71	71	71	71	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	73	74	73	72	72	72	71	71	71	71	71	71	71	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	72	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	72	72	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	73	73	73	73	73	74	73	73	72	72	72	72	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	73	73	73	73	73	74	73	73	72	72	72	72	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	73	73	73	73	73	73	73	74	73	73	72	72	72	72	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	14	13	12	11	11	9	9	8	7	7	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		14			11			9			7		
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	65	65	66	66	66	67	67	63	62	60	59	58	57	57	57	57	57	57	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	71	69	68	68	67	66	66	66	66	67	67	67	67	65	64	63	62	61	60	60	59	59	59	59	61
3/F	33.9	71	71	71	71	71	71	71	71	71	71	71	69	68	68	67	66	66	66	66	67	67	67	67	66	66	65	64	64	63	62	62	62	61	61	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	69	68	68	67	66	66	66	66	67	67	67	67	67	67	66	66	66	65	65	65	64	64	64	65
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	68	67	67	66	66	66	66	67	66	67	67	67	67	67	67	67	66	66	66	66	66	66	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	67	66	66	66	66	66	67	66	67	68	68	68	68	67	67	67	67	67	67	67	65
7/F	46.5	70	70	70	69	69	69	69	69	69	69	69	68	67	67	67	66	66	66	66	67	67	67	67	68	68	68	68	68	68	68	68	68	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	66	66	66	67	67	67	67	69	69	69	69	68	68	68	68	68	68	68	65
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	66	65	66	67	67	67	67	69	69	69	69	69	69	69	69	68	68	68	64
10/F	55.95	69	69	69	69	69	68	69	69	69	69	68	67	67	66	66	66	66	65	66	67	67	67	68	69	69	69	69	69	69	69	69	69	69	69	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	67	66	66	66	65	65	66	67	67	67	68	70	70	70	70	69	69	69	69	69	69	69	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	66	65	65	66	67	67	67	68	70	70	70	70	70	70	70	69	69	69	69	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	66	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	69	69	69	64
14/F	68.55	68	68	68	68	68	67	68	67	68	67	68	67	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	70	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	71	70	70	70	70	70	70	70	70	70	70	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	71	71	71	70	70	70	70	70	70	70	70	63
19/F	84.3	67	66	67	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	70	70	70	70	70	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	71	69	68	68	67	66	66	66	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0	0	0	4	3	3	2	2	2	1	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			4		3			0		0			0			0		4		3		2			0			0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20			20			20		

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	68	68	69	71	71	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	72	71	71	71	71	71	71	71	71	70	70	62
26/F	106.35	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	68	68	70	72	71	71	71	71	71	71	71	71	70	70	62
27/F	109.5	66	66	66	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	67	67	68	68	70	72	72	71	71	71	71	71	71	71	71	71	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	72	72	72	71	71	71	71	71	71	71	71	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	72	72	72	72	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	72	72	72	72	72	71	71	71	71	71	71	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	68	68	69	70	72	72	72	72	72	72	71	71	71	71	71	62
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	71	71	71	71	71	62
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	14	11	9	9	0
No. of Flats with Noise Exceedance		0		0			0			0		0			0		0			0			0		15				15			14			9		
No. of Flats		15		15			15			15		15			15		15			15			15		15				15			15			15		

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	317
Total no. of Flat =	950
%Compliance =	67%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	443
Total no. of Flat =	2324
%Compliance =	81%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1b. PM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	72	72	72	72	72	69	66	67	66	65	65	64	64	64	63	63	63	62	49	47	47	48
2/F	30.75	72	72	72	72	72	69	66	66	66	65	65	64	64	63	63	63	62	62	50	48	48	48
3/F	33.9	72	72	72	72	72	68	65	66	66	65	65	64	64	63	63	63	62	62	50	48	48	48
4/F	37.05	72	72	72	72	72	68	65	66	65	65	64	64	64	63	63	62	62	62	51	48	48	49
5/F	40.2	72	72	72	72	72	68	65	66	65	65	64	64	63	63	63	62	62	62	51	49	49	50
6/F	43.35	72	72	72	72	72	67	65	65	65	64	64	64	63	63	63	62	62	62	52	50	50	51
7/F	46.5	73	72	72	72	72	67	65	65	65	64	64	64	63	63	62	62	62	62	53	52	52	53
8/F	49.65	73	72	72	72	71	67	64	65	65	64	64	64	63	63	62	62	62	62	54	54	54	55
9/F	52.8	73	72	72	72	71	67	64	65	65	64	64	64	63	63	63	62	62	62	57	57	58	59
10/F	55.95	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	60	61	62	63
11/F	59.1	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	63	63	63	64
12/F	62.25	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	64	64	64	65
13/F	65.4	73	72	72	71	71	66	64	65	65	64	64	64	63	63	63	62	62	62	64	64	64	65
14/F	68.55	73	72	72	71	71	66	64	65	64	64	64	63	63	63	63	62	62	62	64	64	64	65
15/F	71.7	73	72	72	71	71	66	63	64	64	64	64	63	63	63	63	62	62	62	64	64	65	66
16/F	74.85	73	72	72	71	71	66	63	64	64	64	64	63	63	63	63	62	62	62	65	65	65	67
17/F	78	73	72	71	71	71	65	63	64	64	64	64	63	63	63	63	62	62	62	65	65	66	67
18/F	81.15	73	72	71	71	71	65	63	64	64	64	64	63	63	63	62	62	62	62	65	66	66	68
19/F	84.3	73	71	71	71	71	65	63	64	64	64	63	63	63	63	62	62	62	62	66	66	67	69
20/F	87.45	73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	62	62	66	67	68	70
21/F	90.6	73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	62	62	67	68	69	70
22/F	93.75	73	71	71	71	71	65	63	63	63	63	63	63	63	63	62	62	62	62	67	68	69	70
Max. Noise Level		73	72	72	72	72	69	66	67	66	65	65	64	64	64	63	63	63	62	67	68	69	70
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	70
24/F	100.05	72	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	71
25/F	103.2	72	71	71	71	71	65	62	63	63	63	63	63	63	62	62	62	62	63	69	69	69	71
26/F	106.35	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	63	69	69	70	71
27/F	109.5	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	63	69	69	70	71
28/F	112.65	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	69	70	71
29/F	115.8	72	71	71	70	70	64	62	63	63	63	63	63	62	62	62	62	62	64	69	70	70	71
30/F	118.95	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	69	70	70	71
31/F	122.1	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	69	70	70	71
32/F	125.25	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	70	70	70	71
33/F	128.4	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	62	64	70	70	70	71
34/F	131.55	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	62	65	70	70	70	71
35/F	134.7	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	63	65	70	70	70	71
Max. Noise Level		73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	71
No. of Noise Exceedance		13	13	13	5	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		12			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	61	61	60	60	60	59	59	59	60	60	59	59	59	59	58	59	60	59	62	63
2/F	30.75	61	60	60	60	60	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
3/F	33.9	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
4/F	37.05	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
5/F	40.2	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
6/F	43.35	61	60	60	59	59	59	59	58	60	60	59	59	59	59	59	60	60	60	62	62
7/F	46.5	61	60	60	59	59	59	59	58	60	59	59	59	59	59	59	60	60	61	61	62
8/F	49.65	61	60	60	59	59	59	59	58	60	60	59	59	59	59	59	60	60	61	61	62
9/F	52.8	61	60	60	59	60	59	59	59	60	59	59	59	59	59	59	60	60	61	61	62
10/F	55.95	61	61	60	60	60	60	59	59	60	60	59	59	59	59	59	60	60	61	61	62
11/F	59.1	61	61	60	60	60	60	60	59	60	60	60	60	59	59	59	60	61	61	61	62
12/F	62.25	61	61	61	60	61	61	60	60	61	61	61	60	60	60	60	61	61	62	61	62
13/F	65.4	62	61	61	61	62	62	62	61	62	62	62	61	61	61	61	62	62	62	61	61
14/F	68.55	62	61	61	61	62	63	62	62	63	62	62	62	62	62	62	62	62	62	61	61
15/F	71.7	62	61	61	62	63	63	63	62	63	63	62	62	62	62	62	62	62	63	61	61
16/F	74.85	62	62	61	62	63	63	63	62	63	63	62	62	62	62	62	62	62	63	60	61
17/F	78	62	62	61	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	60	61
18/F	81.15	63	62	62	62	63	63	63	62	63	63	63	63	62	62	62	63	63	63	60	61
19/F	84.3	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
20/F	87.45	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
21/F	90.6	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	64	60	61
22/F	93.75	63	62	62	62	63	63	63	63	64	64	64	64	63	63	63	64	64	64	60	61
Max. Noise Level		63	62	62	62	63	63	63	63	64	64	64	64	63	63	63	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	62	62	63	63	64	63	63	64	64	64	64	64	64	64	64	64	64	60	61
24/F	100.05	64	63	62	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
25/F	103.2	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
26/F	106.35	64	63	63	63	64	64	64	63	65	64	65	65	64	64	64	64	64	65	60	61
27/F	109.5	64	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
28/F	112.65	65	64	63	64	65	65	64	63	65	65	65	65	65	65	65	65	65	65	60	62
29/F	115.8	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	61	62
30/F	118.95	65	64	64	64	65	65	65	63	65	65	66	66	65	65	65	65	65	66	61	62
31/F	122.1	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
32/F	125.25	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
33/F	128.4	65	64	64	64	65	66	65	64	66	66	66	66	66	66	66	66	66	66	61	63
34/F	131.55	65	65	64	65	66	66	66	64	66	66	67	67	67	66	67	67	67	67	61	63
35/F	134.7	66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
Max. Noise Level		66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	72	73	56	55	49	47	47	47	47	50	50	51	56	58	58	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	58	57	51	49	47	47	47	52	53	53	56	58	59	63	64
3/F	33.9	72	72	72	72	71	72	72	71	71	71	71	60	57	53	50	47	47	48	53	53	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	54	50	48	48	48	54	54	55	57	58	59	63	64
5/F	40.2	71	71	71	71	71	71	71	70	70	70	70	61	58	54	51	48	49	49	55	55	56	58	59	60	63	64
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	54	51	49	49	50	56	56	57	59	60	61	63	64
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	54	51	50	50	51	56	57	58	60	60	61	63	64
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	60	58	54	52	50	51	51	57	58	58	60	61	61	63	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	58	55	52	51	51	52	58	58	59	60	61	61	63	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	60	61	61	63	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	60	59	56	55	54	54	54	58	59	59	60	61	61	63	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	60	59	57	56	56	55	55	59	59	59	60	61	61	63	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	57	59	60	60	61	61	62	63	63
14/F	68.55	68	68	68	68	68	68	68	68	68	67	68	61	60	58	58	58	57	57	60	60	60	61	61	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	61	60	59	58	58	58	58	60	60	60	61	61	62	63	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	61	60	59	59	58	58	58	60	61	60	61	61	62	63	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	61	61	59	59	59	59	59	60	61	60	61	61	62	63	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	61	60	59	59	59	59	61	61	61	61	61	62	63	63
19/F	84.3	67	67	67	67	67	67	67	66	66	66	66	62	61	60	60	60	60	60	61	61	61	61	62	62	63	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	66	62	62	61	60	60	60	60	61	61	61	61	62	62	63	63
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	62	62	61	61	61	61	61	61	62	61	62	62	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	63	63	62	62	62	62	62	62	62	61	62	62	62	63	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	72	73	63	63	62	62	62	62	62	62	62	61	62	62	62	63	64
No. of Noise Exceedance		5	5	5	5	5	5	5	4	4	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	63	63	63	63	62	62	62	62	62	61	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	63	64	63	63	63	63	63	63	62	62	62	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	65	66	65	66	64	64	64	64	63	63	63	63	63	62	62	62	62	63	63
26/F	106.35	65	65	65	65	65	65	65	65	65	65	65	64	64	64	64	64	64	64	63	63	62	62	62	62	63	63
27/F	109.5	65	65	65	65	65	65	65	65	65	65	65	64	65	64	64	64	64	64	63	63	62	62	62	62	63	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	64	64	64	64	63	62	63	63	63	63	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	64	63	63	63	63	63	63	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	64	64	63	63	63	63	63	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	63	63	63	64	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	64	63	63	64	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	64	65	65	66	65	66	65	65	64	64	64	63	63	64	63
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	63
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	63
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	66	66	66	66	66	66	66	65	64	64	64	64	64	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	72	72	72	72	72	72	50	57	58	59	59	60	60	60	61	61
2/F	30.75	72	72	72	72	72	72	72	72	54	59	59	60	60	60	60	61	61	61
3/F	33.9	71	71	71	71	71	71	71	71	58	59	59	60	60	60	60	61	61	61
4/F	37.05	71	71	71	71	71	71	71	71	59	60	59	60	60	60	60	61	61	61
5/F	40.2	70	70	70	70	70	70	70	70	59	60	59	60	60	60	60	61	61	61
6/F	43.35	70	70	70	70	70	70	70	70	59	60	59	60	60	60	60	61	61	61
7/F	46.5	69	69	69	69	69	69	69	69	59	60	59	60	60	60	60	61	61	61
8/F	49.65	69	69	69	69	69	69	69	69	59	60	59	60	60	60	60	61	61	61
9/F	52.8	69	69	69	69	69	69	69	69	58	60	59	60	60	60	60	61	61	61
10/F	55.95	68	68	68	68	68	68	68	68	58	60	60	60	60	60	61	61	61	62
11/F	59.1	68	68	68	68	68	68	68	68	58	60	60	60	60	61	61	61	62	62
12/F	62.25	68	68	68	68	68	68	68	68	58	60	60	60	61	61	61	62	62	62
13/F	65.4	68	68	68	68	68	68	68	68	57	61	60	61	61	61	62	62	62	63
14/F	68.55	67	67	67	67	67	67	67	67	57	61	61	61	61	62	62	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	57	61	61	61	62	62	62	63	63	63
16/F	74.85	67	67	67	67	67	67	67	67	57	61	61	62	62	62	62	63	63	63
17/F	78	67	67	67	67	67	67	67	67	57	62	62	62	62	62	63	63	63	64
18/F	81.15	67	67	66	66	67	66	66	67	57	62	62	62	62	63	63	63	64	64
19/F	84.3	66	66	66	66	66	66	66	66	57	62	62	62	63	63	63	64	64	65
20/F	87.45	66	66	66	66	66	66	66	66	57	62	62	63	63	63	64	64	64	65
21/F	90.6	66	66	66	66	66	66	66	66	57	63	63	63	63	64	64	65	65	66
22/F	93.75	66	66	66	66	66	66	66	66	58	63	63	63	64	64	64	65	65	66
Max. Noise Level		72	72	72	72	72	72	72	72	59	63	63	63	64	64	64	65	65	66
No. of Noise Exceedance		4	4	4	4	4	4	4	4	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	63	63	63	64	64	65	65	66	66
24/F	100.05	66	66	65	65	65	65	65	66	58	64	64	64	64	65	65	66	66	66
25/F	103.2	65	65	65	65	65	65	65	65	58	64	64	64	64	65	65	66	66	67
26/F	106.35	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
27/F	109.5	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
28/F	112.65	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
29/F	115.8	65	65	65	65	65	65	65	65	59	64	64	65	65	65	66	66	66	67
30/F	118.95	65	65	65	65	65	65	65	65	60	65	64	65	65	65	66	66	67	67
31/F	122.1	65	65	65	65	65	65	65	65	60	65	65	65	65	65	66	66	67	68
32/F	125.25	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	66	67	68
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	67	67	68
34/F	131.55	65	65	65	65	65	65	65	65	61	65	65	65	65	66	66	67	67	68
35/F	134.7	65	65	64	64	64	64	64	64	61	65	65	65	66	66	67	67	68	68
Max. Noise Level		66	66	66	66	66	66	66	66	61	65	65	65	66	66	67	67	68	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	55	55	55	56	56	56	57	56	50	49	51	52	53	61	61	61
2/F	30.75	56	56	56	56	56	56	57	56	51	50	51	52	54	61	61	61
3/F	33.9	56	56	56	56	56	56	58	57	52	52	53	54	54	61	61	61
4/F	37.05	56	56	56	56	56	56	58	58	54	54	55	55	56	61	61	61
5/F	40.2	56	56	56	57	56	57	59	58	55	55	56	56	56	61	61	61
6/F	43.35	56	56	56	57	57	57	59	58	56	56	56	56	56	61	61	61
7/F	46.5	57	56	56	57	57	57	59	58	56	56	56	56	57	61	61	61
8/F	49.65	57	57	56	57	57	57	59	58	56	56	56	57	57	61	61	61
9/F	52.8	57	57	57	57	57	57	59	58	56	56	56	57	57	62	62	62
10/F	55.95	57	57	57	57	57	57	59	58	56	56	56	57	57	62	62	62
11/F	59.1	58	57	57	57	57	57	59	58	56	56	57	57	57	62	62	62
12/F	62.25	58	58	57	58	57	57	59	58	56	56	57	57	57	63	63	63
13/F	65.4	59	59	58	58	58	57	59	58	56	56	57	57	57	63	63	63
14/F	68.55	60	59	59	59	58	58	59	58	56	56	57	57	57	63	63	63
15/F	71.7	61	60	60	59	59	58	59	58	56	56	57	57	57	64	64	64
16/F	74.85	62	61	60	60	59	59	59	58	56	56	57	57	57	64	64	64
17/F	78	62	61	61	60	60	59	59	58	56	56	57	57	57	65	65	65
18/F	81.15	63	62	62	61	60	60	59	58	56	56	57	57	57	65	66	66
19/F	84.3	64	63	62	61	61	60	59	58	56	56	57	57	57	66	66	66
20/F	87.45	65	64	63	62	61	61	59	58	56	56	57	57	57	66	67	67
21/F	90.6	66	64	64	62	62	61	59	58	56	56	57	57	57	67	67	67
22/F	93.75	66	65	64	63	62	62	59	58	56	56	57	57	57	67	67	68
Max. Noise Level		66	65	64	63	62	62	59	58	56	56	57	57	57	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	67	65	65	64	63	62	59	58	56	56	57	57	57	67	68	68
24/F	100.05	67	66	65	64	63	63	59	58	56	56	57	57	57	68	68	69
25/F	103.2	67	66	65	65	64	63	59	58	56	56	57	57	57	68	68	69
26/F	106.35	68	66	65	65	65	64	58	58	56	56	56	57	57	68	69	69
27/F	109.5	68	66	65	65	65	64	58	58	56	56	56	57	57	68	69	69
28/F	112.65	68	66	65	66	65	64	58	58	56	56	56	57	57	68	69	70
29/F	115.8	68	66	65	66	65	64	58	58	56	56	56	57	57	69	69	70
30/F	118.95	68	66	65	66	65	65	58	58	56	56	56	57	57	69	69	70
31/F	122.1	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
32/F	125.25	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
33/F	128.4	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
34/F	131.55	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
35/F	134.7	68	66	66	66	65	65	58	58	56	56	57	57	57	69	69	70
Max. Noise Level		68	66	66	66	65	65	59	58	56	56	57	57	57	69	69	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	113
Total no. of Flat =	1374
%Compliance =	92%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	73	76	75	75	75	75	75	75	76	76	76	76	76	76	65	63	59	57	56	56	56	55	55	55	55	55
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	75	75	75	75	76	76	66	65	62	61	59	58	58	57	57	57	57	60
3/F	33.9	71	71	71	71	71	71	71	71	71	72	75	74	74	74	74	75	75	75	75	75	75	75	75	67	66	64	63	61	61	60	60	59	59	59	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	74	74	74	74	74	74	74	74	75	75	75	75	75	68	67	65	64	63	63	62	62	61	61	62	65
5/F	40.2	70	70	70	70	70	70	70	70	70	71	74	74	74	74	74	74	74	74	74	74	75	75	75	68	68	66	65	65	64	64	63	63	63	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	73	73	74	74	74	74	74	74	74	74	74	74	68	68	67	66	65	65	65	65	64	65	65	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	73	73	73	73	73	74	74	74	74	74	74	74	74	68	68	67	67	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	74	74	74	74	74	68	68	67	67	66	66	66	66	66	66	66	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	74	74	74	69	68	68	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	74	69	68	68	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	68	68	69	73	72	73	73	73	73	73	73	73	73	73	73	73	69	68	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	68	68	68	68	67	67	67	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	68	68	68	68	68	68	68	67	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	72	73	73	73	73	73	73	68	68	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	72	72	73	73	73	73	73	69	68	68	68	68	68	68	68	68	68	68	62
16/F	74.85	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	73	73	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	71	71	72	72	72	72	72	72	72	72	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	71	71	71	71	72	72	72	72	72	72	72	73	73	69	69	68	68	68	68	68	68	68	68	68	62
20/F	87.45	66	66	66	66	66	66	66	66	66	67	71	71	71	71	72	72	72	72	72	72	73	73	73	69	69	69	69	68	68	68	68	68	68	68	61
Max. Noise Level		72	72	72	72	72	72	72	72	72	73	76	75	75	75	75	75	75	76	76	76	76	76	76	69	69	69	69	68	68	68	68	68	68	68	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	71	71	71	72	72	72	72	72	72	72	73	73	73	70	69	69	69	69	69	68	68	68	68	69	61
22/F	93.75	66	66	66	66	66	66	66	66	66	67	71	71	71	72	72	72	72	72	72	72	73	73	73	70	70	70	69	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	70	70	70	70	69	69	69	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	70	70	70	70	69	69	69	69	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	71	71	70	70	70	70	70	70	69	69	69	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	71	71	70	70	70	70	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	71	71	70	70	70	70	70	70	70	70	60
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	71	71	70	70	70	70	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	72	71	71	71	70	70	70	70	70	70	70	60
30/F	118.95	65	65	65	66	66	65	65	66	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	72	71	71	71	71	70	70	70	70	70	70	60
31/F	122.1	65	65	65	65	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	71	71	71	70	70	70	70	70	70	60
32/F	125.25	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	71	71	71	71	70	70	70	70	70	60
33/F	128.4	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	70	70	70	70	70	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	71	70	70	70	70	59
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	71	71	70	70	70	60
Max. Noise Level		66	66	66	66	66	66	66	66	66	67	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	72	71	71	71	71	71	70	70	70	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	12	11	9	7	6	4	2	1	0	0	0	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		11			6			1			0		
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	65	65	65	65	66	66	66	66	63	61	60	58	57	57	57	56	56	56	56	56
2/F	30.75	72	72	72	72	72	71	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	66	66	64	63	62	61	60	59	59	59	58	58	58	60
3/F	33.9	71	71	71	71	71	71	71	71	71	71	70	69	68	67	67	66	66	65	66	66	66	66	66	65	65	64	63	63	62	62	61	61	61	60	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	68	68	67	67	66	66	65	66	66	66	66	66	66	66	66	65	65	64	64	64	63	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	67	67	67	66	65	65	66	66	66	66	66	67	67	66	66	66	66	65	65	65	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	65	65	66	66	66	66	66	67	67	67	67	67	67	66	66	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	66	66	66	68	67	67	67	67	67	67	67	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	68	67	67	66	66	66	65	65	66	66	66	66	66	68	68	68	68	68	68	68	67	67	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	66	66	66	65	65	65	66	66	66	66	67	68	68	68	68	68	68	68	68	68	68	68	64
10/F	55.95	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	68	68	68	68	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	68	68	63
13/F	65.4	68	68	68	68	68	67	67	67	67	67	67	66	66	66	65	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
14/F	68.55	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	68	69	69	69	69	69	69	69	69	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	68	70	70	70	69	69	69	69	69	69	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	65	65	65	65	65	65	66	66	66	66	68	70	70	70	70	70	69	69	69	69	69	69	63
18/F	81.15	67	66	67	66	66	66	66	66	66	66	67	66	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	69	69	69	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4			4			4		2		0		0			0			0		0		0		0			0			0	
No. of Flats		20			20			20			20		20		20		20			20			20		20		20		20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	70	70	70	70	70	70	70	70	69	69	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	70	70	70	70	70	70	70	69	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	70	70	70	70	70	70	70	70	62
24/F	100.05	66	66	66	66	66	65	66	65	65	65	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	71	70	70	70	70	70	70	70	62
25/F	103.2	66	66	66	66	66	65	66	65	65	65	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	71	70	70	70	70	70	70	70	62
26/F	106.35	66	65	66	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	66	67	68	69	71	71	71	71	71	70	70	70	70	70	70	62
27/F	109.5	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	66	67	68	69	71	71	71	71	71	71	70	70	70	70	70	61
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	69	71	71	71	71	71	71	71	71	70	70	70	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	69	71	71	71	71	71	71	71	71	70	70	70	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	65	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	66	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	65	65	66	65	66	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	14	14	12	10	9	8	5	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0			0		0		0		0			0			0		15				10			5			0	
No. of Flats		15			15			15			15		15		15		15			15			15		15				15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	258
Total no. of Flat =	950
%Compliance =	73%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	371
Total no. of Flat =	2324
%Compliance =	84%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

2. AM Peak - Mitigated Scenario (by Architectual Fins)

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	72	72	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	73	73	72	73	73	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	64	64	63	63	63	50	48	48	48
4/F	37.05	73	73	73	73	72	69	66	67	66	66	65	65	65	64	64	63	63	63	51	48	48	48
5/F	40.2	73	73	73	72	72	69	66	66	66	66	65	65	64	64	64	63	63	63	51	49	49	49
6/F	43.35	73	73	73	72	72	68	66	66	66	65	65	64	64	64	63	63	63	63	52	50	50	50
7/F	46.5	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	53	51	51	51
8/F	49.65	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	54	53	53	53
9/F	52.8	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	56	55	55	57
10/F	55.95	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	59	59	59	60
11/F	59.1	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	61	62
12/F	62.25	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	62	62	61	62
13/F	65.4	73	73	73	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
14/F	68.55	73	73	72	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
15/F	71.7	73	73	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
16/F	74.85	73	72	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	64	63	63	64
17/F	78	73	72	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	73	72	72	72	72	66	64	65	65	64	64	64	64	64	63	63	63	63	65	65	65	66
19/F	84.3	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	65	66	66	68
20/F	87.45	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	66	67	67	68
21/F	90.6	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	68	69
22/F	93.75	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	68	69	69
Max. Noise Level		74	73	73	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	68	68	69	69
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	62	63	68	69	69	69
24/F	100.05	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	62	63	69	69	69	69
25/F	103.2	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
26/F	106.35	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	62	63	65	70	70	70	69
30/F	118.95	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
31/F	122.1	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
32/F	125.25	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
35/F	134.7	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	66	70	70	70	70
Max. Noise Level		73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	60	62	62
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	62
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	61	62
10/F	55.95	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	61	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	62	62	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	63	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
17/F	78	64	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
18/F	81.15	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	63	63	63	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	63	64	63	63	64	64	64	64	64	63	64	64	64	64	60	61
21/F	90.6	64	63	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	65	60	61
24/F	100.05	65	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	66	65	65	65	65	65	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	66	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	66	66	67	65	67	67	68	68	67	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	73	73	73	73	73	73	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	72	72	72	72	72	72	71	71	60	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	70	71	71	71	71	71	71	71	71	70	70	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	69	70	70	69	69	69	69	60	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	66	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		72	73	73	73	73	73	73	73	73	73	72	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		4	5	5	5	5	5	5	5	5	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	64	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	66	66	65	65	65	64	64	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	72	72	73	72	72	72	50	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	71	53	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	57	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	71	71	71	71	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	66	66	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		72	72	72	72	73	72	72	72	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		3	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	58	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	63	63	63
14/F	68.55	61	60	60	59	59	59	59	58	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	56	57	57	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	56	56	57	57	58	65	65	65
18/F	81.15	64	63	63	62	61	61	59	59	56	57	57	57	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	56	56	57	57	58	66	66	66
20/F	87.45	66	65	64	63	62	62	59	59	56	56	57	57	58	66	67	67
21/F	90.6	67	65	65	64	63	62	59	59	56	56	57	57	58	67	67	67
22/F	93.75	68	66	65	64	64	63	59	58	56	56	57	57	58	67	67	68
Max. Noise Level		68	66	65	64	64	63	59	59	56	57	57	57	58	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	68	68	69
28/F	112.65	69	67	67	67	66	65	59	58	56	56	56	57	57	68	68	69
29/F	115.8	69	67	67	67	66	66	58	58	56	56	56	57	57	68	69	69
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	67	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	67	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	102
Total no. of Flat =	1374
%Compliance =	93%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	76	75	75	76	76	76	76	76	76	76	76	76	75	65	60	57	57	56	56	56	56	56	55	55	55
2/F	30.75	71	72	72	72	72	72	72	71	71	70	75	75	75	75	75	75	75	75	75	75	76	76	75	66	62	60	59	59	58	58	58	57	57	57	60
3/F	33.9	71	71	71	71	71	71	71	71	71	69	75	75	75	75	75	75	75	75	75	75	75	75	74	67	64	62	62	61	61	60	60	60	60	59	64
4/F	37.05	70	71	71	71	71	71	71	71	70	69	75	74	74	74	74	75	75	75	75	75	75	75	74	68	64	64	64	63	63	62	62	62	62	61	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	74	74	74	74	74	74	74	74	74	74	75	74	73	68	65	65	65	65	64	64	64	63	63	63	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	74	74	74	74	74	74	74	74	74	74	74	74	73	69	66	66	66	65	65	65	65	64	64	64	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	74	73	74	74	74	74	74	74	74	74	74	74	73	69	66	66	66	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	73	73	73	73	73	73	74	74	74	74	74	74	73	69	66	67	67	66	66	66	66	66	66	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	74	74	74	72	69	67	67	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	67	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	72	72	72	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	73	73	73	73	73	73	73	71	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	68	68	67	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	71	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	72	72	73	73	73	73	71	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	72	71	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	72	72	71	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	72	72	71	70	68	69	69	69	69	69	68	68	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	72	71	70	69	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	76	75	75	76	76	76	76	76	76	76	76	76	75	70	69	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		3	4	4	4	4	4	4	4	3	1	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			3		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	72	73	72	71	70	69	69	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	72	72	72	71	71	70	70	70	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	72	72	72	72	72	72	72	72	73	73	72	72	71	71	70	70	70	70	70	70	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	71	70	70	70	70	70	70	70	70	70	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	71	70	71	71	70	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	71	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	71	71	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	71	72	71	71	71	71	71	71	71	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	71	71	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	71	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	72	71	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	72	71	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	72	71	73	72	72	72	72	71	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	10	11	11	10	10	9	7	6	5	4	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		11			10			7			5		
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	65	65	66	66	66	67	67	60	59	60	59	58	57	57	57	57	57	56	56
2/F	30.75	71	72	72	72	72	71	71	71	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	62	62	63	62	61	60	59	59	59	58	58	60
3/F	33.9	71	71	71	71	71	71	71	71	71	69	69	68	68	67	67	66	66	66	66	67	67	67	67	63	63	65	64	64	63	62	62	62	61	61	64
4/F	37.05	70	71	71	71	71	70	70	70	70	69	69	68	68	67	67	66	66	66	66	67	67	67	67	64	65	66	66	66	65	65	64	64	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	66	66	66	66	67	67	64	65	67	67	67	66	66	66	66	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	67	66	67	65	66	68	68	67	67	67	67	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	67	67	67	65	67	68	68	68	68	68	67	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	67	67	67	66	67	69	68	68	68	68	68	68	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	65	65	65	66	67	67	67	67	66	68	69	69	69	69	68	68	68	68	68	64
10/F	55.95	69	68	69	68	69	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	66	68	69	69	69	69	69	69	69	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	69	69	69	69	69	69	69	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	69	69	69	69	69	69	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	70	70	69	69	69	69	63
14/F	68.55	68	67	68	67	67	67	67	67	67	67	68	67	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	70	70	70	70	70	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	66	66	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	65
No. of Noise Exceedance		3	4	4	4	4	3	3	3	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	2	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4			3			3			0			0			0			0			0		3			2			0			0	
No. of Flats		20			20			20			20			20			20			20			20			20		20			20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	69	70	71	71	71	71	71	71	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	65	65	66	67	66	66	66	66	65	65	65	67	67	68	68	70	69	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	65	65	65	65	66	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	71	71	71	71	71	71	71	70	70	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	71	71	71	71	71	71	71	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	15	15	15	15	15	14	9	8	7	0
No. of Flats with Noise Exceedance		0			0			0			0			0			0			0			0			15			15			14			8	
No. of Flats		15			15			15			15			15			15			15			15			15			15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	294
Total no. of Flat =	950
%Compliance =	69%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	396
Total no. of Flat =	2324
%Compliance =	83%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

3. AM Peak - Mitigated Scenario (by Architectual Fins, Acoustic Window (Baffle Type) with/without SAM and Enhanced Acoustic Blacony (Baffle Type))

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	67	64	64	69	69	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	67	65	64	70	68	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	67	65	65	69	68	69	66	67	67	66	66	65	65	64	64	63	63	63	50	48	48	48
4/F	37.05	67	65	65	70	68	69	66	67	66	66	65	65	65	64	64	63	63	63	51	48	48	48
5/F	40.2	67	65	65	69	68	69	66	66	66	66	65	65	64	64	64	63	63	63	51	49	49	49
6/F	43.35	67	65	65	69	68	68	66	66	66	65	65	64	64	64	63	63	63	63	52	50	50	50
7/F	46.5	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	53	51	51	51
8/F	49.65	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	54	53	53	53
9/F	52.8	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	56	55	55	57
10/F	55.95	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	59	59	59	60
11/F	59.1	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	61	62
12/F	62.25	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	62	62	61	62
13/F	65.4	67	65	65	69	68	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
14/F	68.55	67	65	64	69	68	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
15/F	71.7	67	65	64	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
16/F	74.85	67	64	64	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	64	63	63	64
17/F	78	67	64	64	69	68	66	64	65	65	65	64	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	67	64	64	69	68	66	64	65	65	64	64	64	64	64	63	63	63	63	65	65	65	66
19/F	84.3	68	64	64	69	68	66	63	65	65	64	64	64	64	64	63	63	63	63	65	66	66	68
20/F	87.45	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	66	67	67	68
21/F	90.6	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	68	69
22/F	93.75	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	68	68	69	69
Max. Noise Level		68	65	65	70	69	70	67	68	67	66	66	65	65	65	64	64	63	63	68	68	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	67	64	64	69	67	65	63	64	64	64	64	64	63	63	63	63	62	63	68	69	69	69
24/F	100.05	67	64	64	69	67	65	63	64	64	64	64	63	63	63	63	63	62	63	69	69	69	69
25/F	103.2	67	64	64	68	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
26/F	106.35	67	64	64	68	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	67	64	64	68	67	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	62	63	65	70	70	70	69
30/F	118.95	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
31/F	122.1	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
32/F	125.25	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
33/F	128.4	67	64	63	68	67	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
34/F	131.55	67	64	63	68	67	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
35/F	134.7	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	66	70	70	70	70
Max. Noise Level		67	64	64	69	67	65	63	64	64	64	64	64	63	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	60	62	62
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	62
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	61	62
10/F	55.95	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	61	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	62	62	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	63	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
17/F	78	64	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
18/F	81.15	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	63	63	63	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	63	64	63	63	64	64	64	64	64	63	64	64	64	64	60	61
21/F	90.6	64	63	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	65	60	61
24/F	100.05	65	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	66	65	65	65	65	65	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	66	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	66	66	67	65	67	67	68	68	67	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	65	65	67	68	65	65	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	64	65	67	67	65	64	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	64	64	66	67	64	64	71	71	60	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	63	64	66	66	64	63	71	71	61	58	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	70	71	71	63	63	65	66	63	63	70	70	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	69	70	70	69	69	69	69	60	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	66	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		72	73	73	70	70	70	70	70	70	73	72	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		4	5	5	0	0	0	0	0	0	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				0		0		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	64	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	66	66	65	65	65	64	64	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	64	67	65	64	72	72	50	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	64	66	64	64	72	71	53	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	63	66	63	63	71	71	57	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	63	65	63	63	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	66	66	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		72	72	70	70	70	70	72	72	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		3	4	0	0	0	0	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			0			4		0		0			0			0	
No. of Flats		22			22			22		22		22			22			22	

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0			0	
No. of Flats		13			13			13		13		13			13			13	

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	58	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	63	63	63
14/F	68.55	61	60	60	59	59	59	59	58	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	56	57	57	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	56	56	57	57	58	65	65	65
18/F	81.15	64	63	63	62	61	61	59	59	56	57	57	57	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	56	56	57	57	58	66	66	66
20/F	87.45	66	65	64	63	62	62	59	59	56	56	57	57	58	66	67	67
21/F	90.6	67	65	65	64	63	62	59	59	56	56	57	57	58	67	67	67
22/F	93.75	68	66	65	64	64	63	59	58	56	56	57	57	58	67	67	68
Max. Noise Level		68	66	65	64	64	63	59	59	56	57	57	57	58	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	68	68	69
28/F	112.65	69	67	67	67	66	65	59	58	56	56	56	57	57	68	68	69
29/F	115.8	69	67	67	67	66	66	58	58	56	56	56	57	57	68	69	69
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	67	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	67	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	17
Total no. of Flat =	1374
%Compliance =	99%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	69	70	67	68	70	68	70	68	69	70	68	70	69	65	60	57	57	56	56	56	56	56	55	55	55
2/F	30.75	71	64	64	72	64	64	72	63	71	70	68	70	67	68	70	67	69	67	68	70	68	70	69	66	62	60	59	59	58	58	58	57	57	57	60
3/F	33.9	71	63	63	71	63	63	71	63	71	69	68	70	67	67	69	67	69	67	68	69	67	69	68	67	64	62	62	61	61	60	60	60	60	59	64
4/F	37.05	70	63	63	71	63	63	71	63	70	69	67	69	66	67	69	67	69	67	68	70	67	69	68	68	64	64	64	63	63	62	62	62	62	61	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	67	70	66	67	69	66	68	66	67	70	67	68	68	68	65	65	65	65	64	64	64	63	63	63	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	67	70	66	66	69	66	68	66	67	70	66	68	67	69	66	66	66	65	65	65	65	64	64	64	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	66	70	66	66	68	66	68	66	67	69	66	68	67	69	66	66	66	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	66	70	65	66	68	65	68	66	67	69	66	68	67	69	66	67	67	66	66	66	66	66	66	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	66	70	65	66	68	65	67	65	67	69	66	68	67	69	67	67	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	66	69	65	66	68	65	67	65	66	69	65	67	66	69	67	67	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	69	69	69	65	69	65	65	68	65	67	65	66	69	65	67	66	69	67	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	65	69	65	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	68	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	68	68	67	68	68	68	68	65	69	64	65	67	64	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	65	68	64	65	67	64	66	64	66	68	65	67	65	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	65	68	64	65	67	64	66	64	66	68	65	66	65	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	64	66	65	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	64	66	65	70	68	69	69	69	69	69	68	68	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	65	66	65	70	69	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	69	70	67	68	70	68	70	68	69	70	68	70	69	70	69	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		3	0	0	4	0	0	4	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			4		3		0			0		0			0			0			0		0		0		0			0	
No. of Flats		20			20			20		20		20			20		20			20			20			20		20		20		20			20	

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	64	68	64	64	67	64	66	64	66	68	65	66	65	70	69	69	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	64	68	64	65	67	64	66	64	66	68	64	66	65	71	70	70	70	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	65	68	64	65	67	64	66	64	66	68	64	66	65	71	70	70	70	70	70	70	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	71	70	70	70	70	70	70	70	70	70	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	71	70	71	71	70	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	71	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	71	71	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	73	71	72	71	71	71	71	71	71	71	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	73	72	72	71	71	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	71	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	72	71	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	72	71	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	65	69	64	65	67	64	66	64	66	68	65	66	65	73	72	72	72	72	71	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14	10	11	11	10	10	9	7	6	5	4	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			14			11			10			7			5	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	70	69	68	67	67	66	65	65	66	66	66	67	67	60	59	60	59	58	57	57	57	57	57	56	56
2/F	30.75	71	64	64	72	64	63	71	63	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	62	62	63	62	61	60	59	59	59	58	58	60
3/F	33.9	71	63	63	71	63	63	71	63	71	69	69	68	68	67	67	66	66	66	66	67	67	67	67	63	63	65	64	64	63	62	62	62	61	61	64
4/F	37.05	70	63	63	71	63	70	70	70	70	69	69	68	68	67	67	66	66	66	66	67	67	67	67	64	65	66	66	66	65	65	64	64	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	66	66	66	66	67	67	64	65	67	67	67	66	66	66	66	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	67	66	67	65	66	68	68	67	67	67	67	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	67	67	67	65	67	68	68	68	68	68	67	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	67	67	67	66	67	69	68	68	68	68	68	68	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	65	65	65	66	67	67	67	67	66	68	69	69	69	69	68	68	68	68	68	64
10/F	55.95	69	68	69	68	69	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	66	68	69	69	69	69	69	69	69	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	69	69	69	69	69	69	69	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	69	69	69	69	69	69	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	70	70	69	69	69	69	63
14/F	68.55	68	67	68	67	67	67	67	67	67	67	68	67	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	70	70	70	70	70	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	70	69	68	67	67	66	66	66	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	65
No. of Noise Exceedance		3	0	0	4	0	0	3	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	2	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			3		3		0			0		0			0			0			0		3		2			0			0	
No. of Flats		20			20			20		20		20			20		20			20			20			20		20		20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	69	70	71	71	71	71	71	71	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	65	65	66	67	66	66	66	66	65	65	65	67	67	68	68	70	69	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	65	65	65	65	66	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	71	71	71	71	71	71	71	70	70	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	71	71	71	71	71	71	71	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	15	15	15	15	15	14	9	8	7	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			0			15			15			14			8	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	131
Total no. of Flat =	950
%Compliance =	86%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	148
Total no. of Flat =	2324
%Compliance =	94%

Note:

Adopted with Enhanced Acoustic Balcony (Baffle Type)

Adopted with Acoustic Window (Baffle Type) w/o SAM

Adopted with Acoustic Window (Baffle Type) with SAM

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Annex D

Extracted pages of Revised Air Ventilation Assessment (AVA)

FIGURES

Figure 1	Location of Site and Its Environs
Figure 2	Location of Surrounding Future/ Committed Development
Figure 3	Building Blocks of Surrounding Future/ Committed Development Assumed in the CFD Model
Figure 4	Building Height of Existing Development in the Immediate Vicinity of the Subject Site (a: Northern Part; b: Southern Part)
Figure 5	Assessment Area and Surrounding Area of the CFD Model
Figure 6	Windrose Diagram representing V∞ of the Area under Concern
Figure 7	Wind Profile Curve
Figure 8	Test Points Selected for Quantitative Air Ventilation Assessment
Figure 9	Nil
Figure 10	Wind Velocity Ratios of Individual Test Points for Baseline Scheme (a: Annual, b: Summer)
Figure 11	Wind Velocity Ratios of Individual Test Points for Proposed Scheme (a: Annual, b: Summer)

APPENDICES

Appendix 1	Master Layout Plan for Baseline Scheme
Appendix 2	Master Layout Plan for Proposed Scheme
Appendix 3	Captured Pictures of the CFD Model
Appendix 4	Contour and Vector Plot for CFD Simulation
Appendix 5	Detailed CFD Simulation Result for Selected Test Points
Appendix 6	Master Layout Plan of Future/Committed Development

1.3.3 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objectives

1.4.1 To address the above changes in the draft DSP, it is considered necessary to revise the AVA to support the re-submission to TPB for consideration. In this AVA, apart from the proposed development parameters, internal boundary between the sites and the types of housings, the methodology adopted in the last AVA (ref. no.: R6917_v1.5 dated February 2022) remain unchanged.

1.5 Future/ Committed Development

1.5.1 It is noted that there are several future/ committed developments in the nearby area. Furthermore, referring to the GeoInfo Map from Lands Department and site visit on 02 September 2022, there are several "work-in-progress" (WIP) sites in the area. **Figure 2** illustrated the locations of these future/ committed development and **Figure 3** shows the building block with building height assumed in the CFD simulation.

1.5.2 Following sites are under construction and almost completed. Therefore, building bulk could be observed during site visit or from the sale brochure.

1. No. 10 Maidstone Road
2. 41, 43 and 45 Pau Chung Street
3. Public Housing Development at Ko Shan Road
4. Proposed Residential Redevelopment at 470-478 Chatham Road North

1.5.3 Following are future re-development site for Urban Renewal Authority (URA), the building information was provided by URA.

5. KC-016
6. KC-010
7. KC-011
8. KC-014
9. DL-8KC
10. KC-013
11. KC-012
12. KC-009

1.5.4 The East Kowloon Corridor is the major elevated structure within the surrounding area.

1.5.5 There are two To Kwa Wan Station entrances/ exits located on Kiang Su Street and Lok Shan Road for MTR Tuen Ma Line, respectively. One storey structure for both entrances/ exits is included in the assessment.

1.6 Baseline Scheme

1.6.1 **Appendix 1** shows that the layout of the Baseline Scheme for assessment purposes. The Baseline Scheme comprises of 7 residential towers on top of three storeys podium. The main roof level is not more than 120 mPD. It is noted that the Baseline Scheme complies with the stipulated OZP development restrictions and SBD guidelines. The assumption of development follows the market practice.

1.6.2 The following mitigation measures have been identified in the Baseline Scheme.

- 15m building separation at grade along Maidstone Road;
- 31m building separation between towers T1 and T5; and
- 18m breezeway along Kiang Su Street at the direction of E-W.

1.7 Proposed Scheme

1.7.1 The Proposed Scheme comprises of 7 residential towers on top of 2 storeys podium and 4 storeys basement of carpark and retail. The main roof level is not more than 140

mPD. All the towers are located along the eastern and western boundary. However, it must be noted that this Proposed Scheme is for indicative purpose only that the notional layout is subject to detailed design upon DSP approval.

1.7.2 The following are the podia separation proposed in the Proposed Scheme (i.e. wind enhancement features).

- At least 17m podia separation at grade along the N-S pedestrianised avenue (i.e. existing Maidstone Road);
- 23m breezeway between the podia along Kiang Su Street at the direction of E-W;

1.7.3 On top of the 2 wind enhancement features, the proposed building height of 140mPD can reduce the bulkiness of buildings, number of blocks, and size of podia, which can facilitate wider building/podia separation in the notional design to further enhance wind flow environment. Under the notional design of the Proposed Scheme, the following wider building/podia separation can be achieved:

- over 50m building separation at Tower between T1 and T5;
- about 13m podia separation between T2 and T3;
- over 20m building separation at Tower between T4 and T5; and
- over 30m building separation at Tower between T4 and T6 at the direction of E-W.

1.7.4 In addition, there are several permeable elevated footbridges on the podium level at about 20.1 mPD to connect among different towers in both Northern Site and Southern Site.

1.7.5 **Appendix 2** shows the MLP of the Proposed Scheme.

1.8 Comparison of the Baseline Scheme and Proposed Scheme

1.8.1 The building height and GFA are higher in the Proposed Scheme compared to the Baseline Scheme. The building height of each building of both the Baseline Scheme and the Proposed Scheme has been indicated on the MLPs in **Appendix 1 and 2**. Comparison table of the development parameter proposed for two schemes is listed in **Table 1.1** below.

1.8.2 In both schemes, there is a N-S building separation; and the effective width is ~15m and 17m for the Baseline Scheme and the Proposed Scheme respectively.

1.8.3 In addition, the podia separation aligned with Kiang Su Street is 23m for the Proposed Scheme, which is much larger than that of 18m in the Baseline Scheme.

1.8.4 The building separation between T1 and T5 has been enlarged from about 30m to above 50m.

1.8.5 Compared with the continuous bulky podia between T2 and T3 as well as T1 and T5 in the Baseline Scheme, smaller podia with additional separation of 13m width between T2 and T3 can be achieved in the design of the podia under the Proposed Scheme. In addition, the podium under T6 is reduced, and the podia separation between it and Ming Fat Building is increased from 3m to 11m in the Proposed Scheme.

1.8.6 The footprint of T6 has been reduced and T7 has been moved to the southwest corner of the Subject Site in the Proposed Scheme, namely T6 and T7 in Southern Site.

Table 1.1 Development Parameter of the Baseline Scheme and Proposed Scheme

4. KEY FINDINGS

4.1 Spatial Average Wind Velocity Ratios

4.1.1 The velocity ratio under a specific wind direction at a test point is calculated by dividing the simulated wind speed at the test point under this wind direction with the velocity at gradient height under the same wind direction. All test points are located at 2 m above ground level.

4.1.2 Table 4.1 shows the Site spatial average velocity ratio (SVR), local spatial average velocity ratio (LVR) and average wind velocity ratio along surrounding air sensitive area during annual condition and summer condition (for the Baseline Scheme (BS) and Proposed Scheme (PS)).

4.1.3 The wind velocity ratios of individual test points are shown in **Figure 10a** and **Figure 11a** for annual condition of the Baseline Scheme and Proposed Scheme respectively, and **Figure 10b** and **Figure 11b** for summer condition of the Baseline Scheme and Proposed Scheme respectively. **Appendix 4** shows detailed simulation results of the Baseline Scheme and the Proposed Scheme respectively.

Table 4.1 Summary of Spatial Average Wind Velocity Ratios (VR) – Annual and Summer Condition

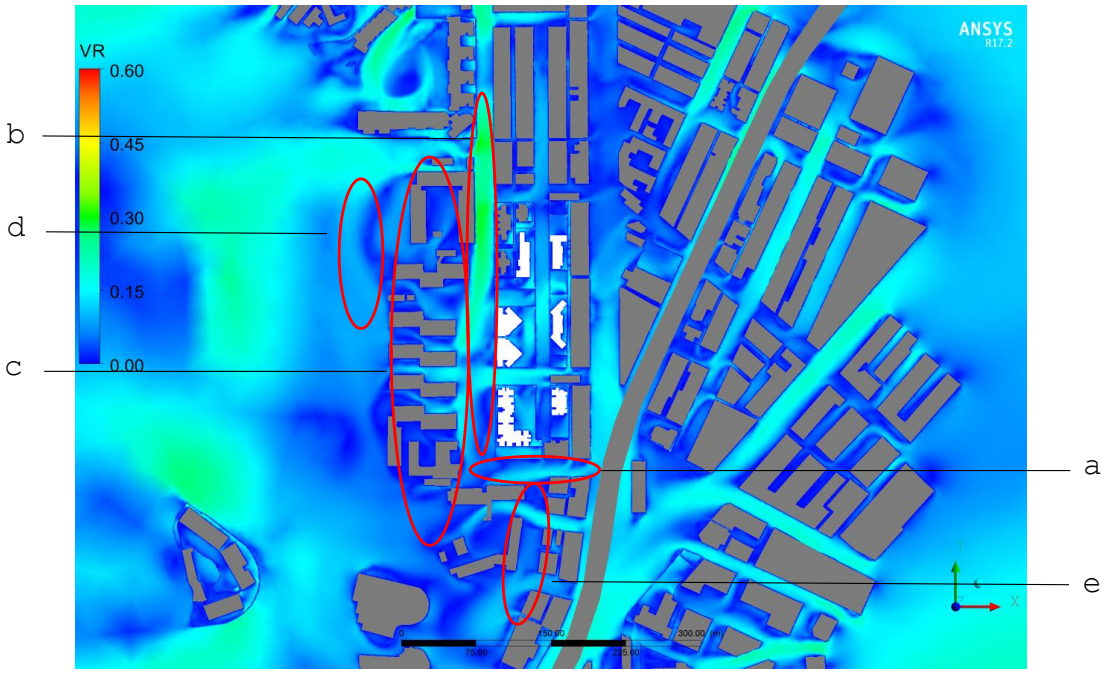
Location	Tests Point	Annual Condition		Summer Condition	
		BS	PS	BS	PS
SVR	P01-P30	0.09	**0.10**	0.09	**0.10**
LVR	P01-P30, T01-T145	0.11	0.11	0.12	0.12
Lok Man Sun Chuen	T01-T13, T105-T111, T125-T132	0.09	**0.10**	0.11	0.11
Kau Pui Lung Road	T14-T24, P17, P19, P21, P23, P25	0.16	0.16	**0.18**	0.17
Maidstone Road	T27-T31, S01-S05, P01, P14-P15, P30	0.09	**0.10**	0.09	**0.11**
Lok Shan Road	P01, T32-T38	0.08	**0.09**	0.09	**0.10**
Ma Tau Wai Road	T39-T50, T33-T34, T77, T116-T119	0.10	0.10	0.10	0.10
Sheung Heung Road	T40, T52-T53	0.08	**0.09**	0.07	0.07
Pau Chung Street	T35, T53-T55	**0.09**	0.08	0.07	0.07
Kowloon City Road	T37, T56-T61	0.10	0.10	**0.08**	0.07
Sze Chuen Street	T59, T62-T63	0.08	**0.09**	0.06	**0.07**
Ha Heung Road	T63-T66	0.11	**0.12**	0.08	**0.09**
Chi Kiang Street	P15-P17, T66-T70, T48	0.11	**0.13**	0.11	**0.12**
Ko Shan Road	T67, T71-T75	0.12	**0.13**	0.17	**0.18**
Kiang Hsi Street	T74, T76-T77	0.18	0.18	0.22	0.22
Anhui Street	T50, T72, T78	0.17	0.17	0.15	0.15
Ko Shan Road Park	T79-T87	0.12	0.12	0.19	0.19
Kau Pui Lung Road Playground	T25-T26, T51, T140-T145	**0.13**	0.11	**0.14**	0.13
C.C.C. Wanchai Church Kei To Primary School (Kowloon City)	T88-T91	0.06	0.06	**0.11**	0.10

Location	Tests Point	Annual Condition		Summer Condition	
		BS	PS	BS	PS
Po Leung Kuk Madam Chan Wai Chow Memorial School	T92-T94	0.07	0.07	0.08	0.08
Po Leung Kuk Lam Man Chan English Primary School	T95-T97	0.05	0.05	0.05	0.05
E.L.C.H.K. Hung Hom Lutheran Primary School	T42, T98-T100	0.06	0.06	0.07	0.07
S.K.H. Good Shepherd Primary School	T101-T104	0.05	0.05	0.06	0.06
Ball Court on rooftop of To Kwa Wan Market	T112-T115	0.08	0.08	0.05	0.05
Kiang Su Street	P10, P11, P21, S04, S06, S07	**0.13**	0.11	**0.12**	0.11
Ma Tau Wai Road/ To Kwa Wan Playground	T120-T124	0.13	0.13	**0.16**	0.15
To Kwa Wan Road	T70, T124, T133-T139	0.18	0.18	0.19	0.19
Pedestrianised Avenue	S01-S05	0.10	**0.11**	0.09	**0.12**

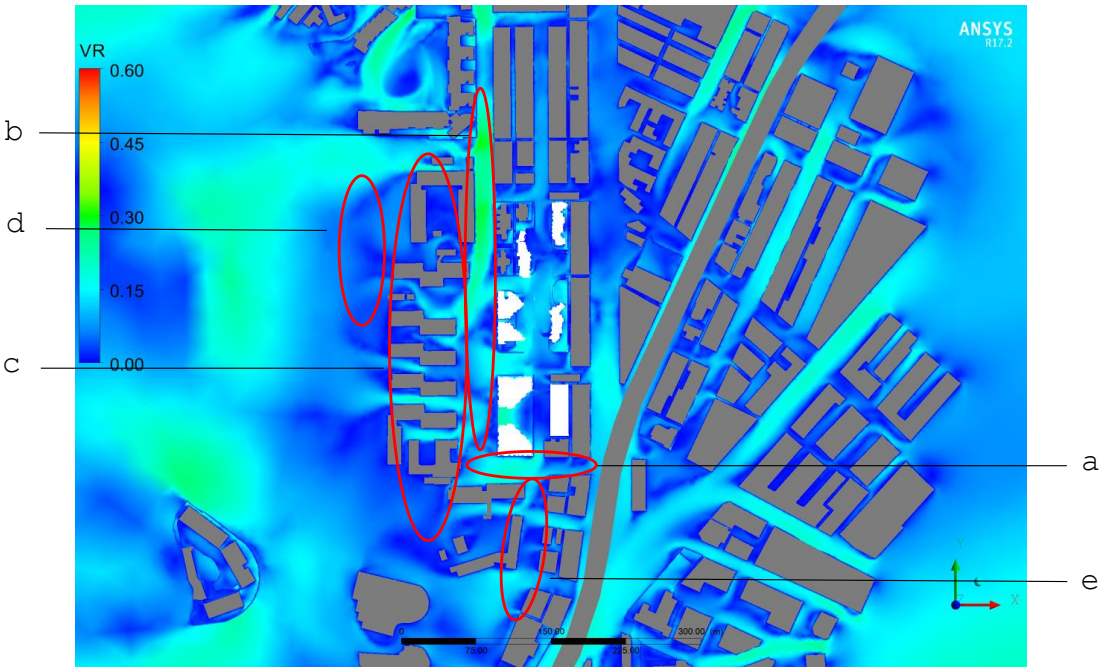
Note: Highlighted in **red** where VR is higher in the Proposed Scheme

Highlighted in **blue** where VR is higher in the Baseline Scheme

Wind performance under wind direction of ENE

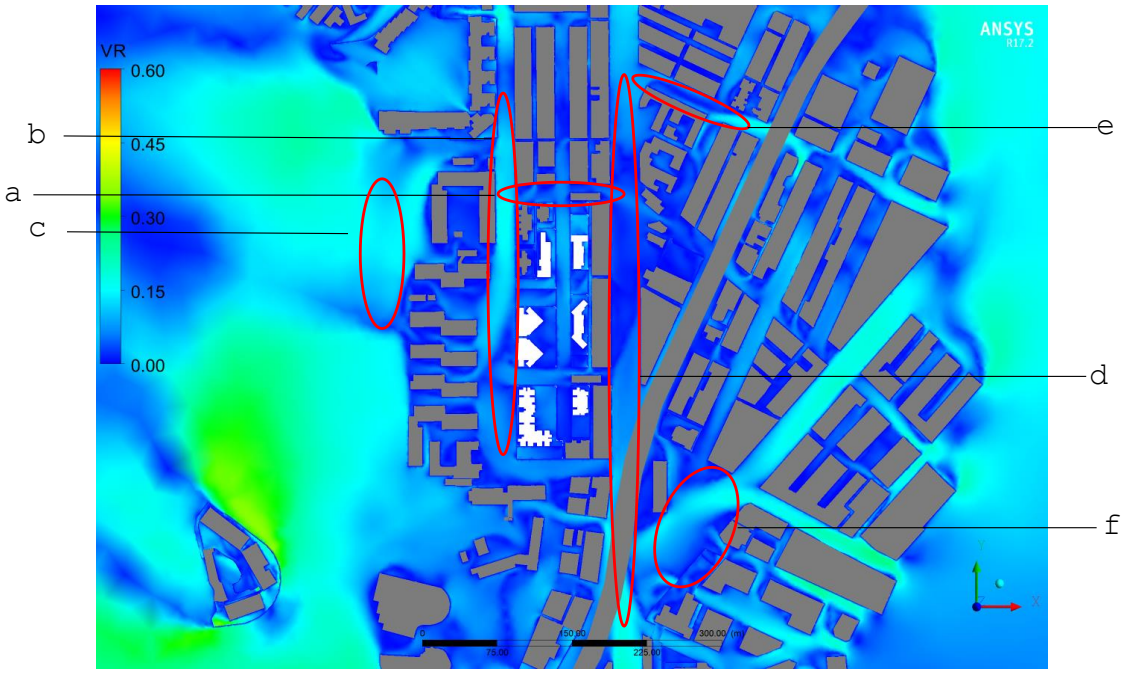


Contour plot for Baseline Scheme

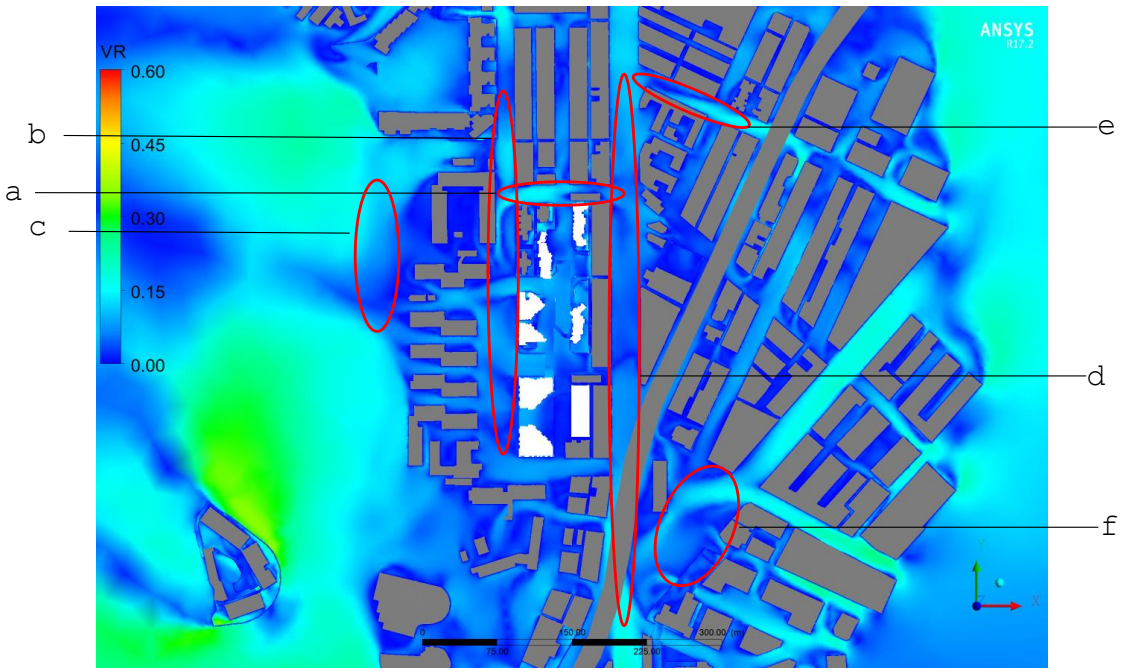


Contour plot for Proposed Scheme

Wind performance under wind direction of SE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.6 Under SE wind, the wind penetrates through the building cluster in To Kwa Wan area and Chi Kiang Street to reach the Subject Site.

a. Due to the different disposition of T1 under the two schemes, the upcoming SE wind skims over the podium under T1 in Baseline Scheme near the northern site boundary and hits on the high-rise of 80 Maidstone Road, then the downwash air flows towards south along Maidstone Road. On the other hand, since the T5 under the Proposed Scheme has been moved towards north, the upcoming SE wind pass through the separation and hit on T2, the downwash wind splits to two directions, in which one is towards north along Maidstone Road, together with the flow from east to west along Lok Shan Road, causes air acceleration at Lok Shan Road to the immediate north of the site boundary.

b. The additional separation between podia under T1 and T5, together with the wider separation along Kiang Su Road, enhance the wind penetration within the site along E-W direction. The stronger penetrated wind flow counters with the wind along Kau Pui Lung Road from north to south and reduces the wind velocity along Kau Pui Lung Road under the Proposed Scheme.

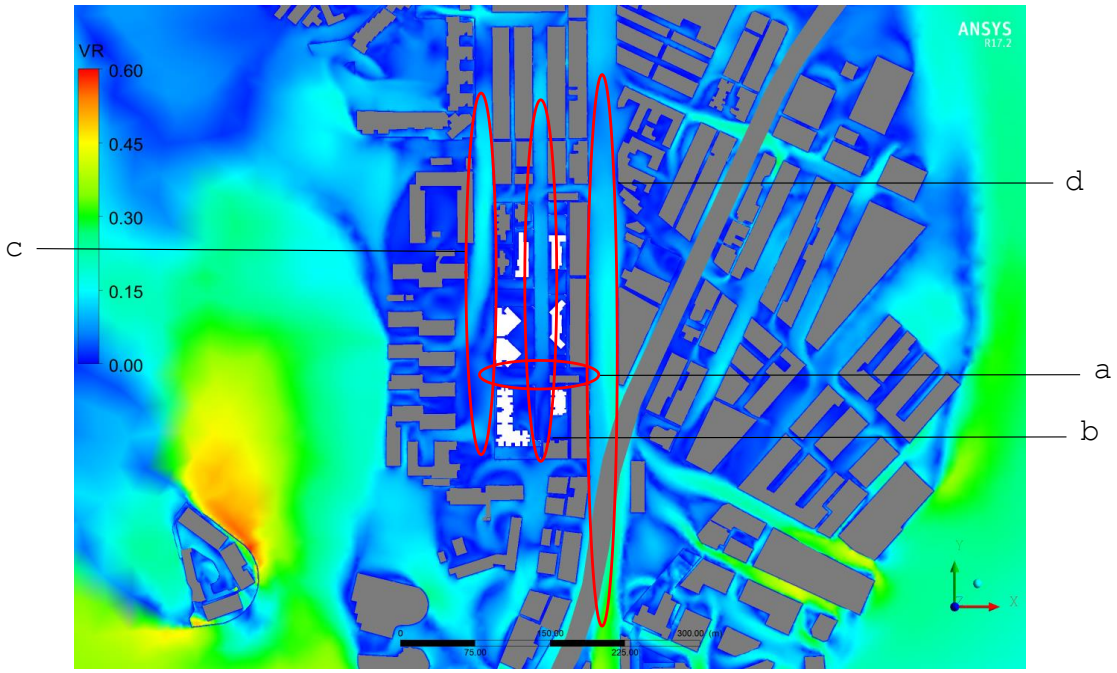
c. The upcoming wind flows along the private road to the north of Lok Seen Lau and was diverted to south along the hillside to the immediate west of Lok Man Sun Chuen. Under the Proposed Scheme, better penetration on E-W direction due to the larger building separations causes some counter flow towards north direction at the west of Lok Seen Lau. The turbulence slows down the wind speed at Kau Pui Lung Road Playground.

d. The taller building height in the Proposed Scheme induce a stronger downwash wind at Ma Tau Wai Road. Therefore, the VR is slightly higher under the Proposed Scheme at Ma Tau Wai Road.

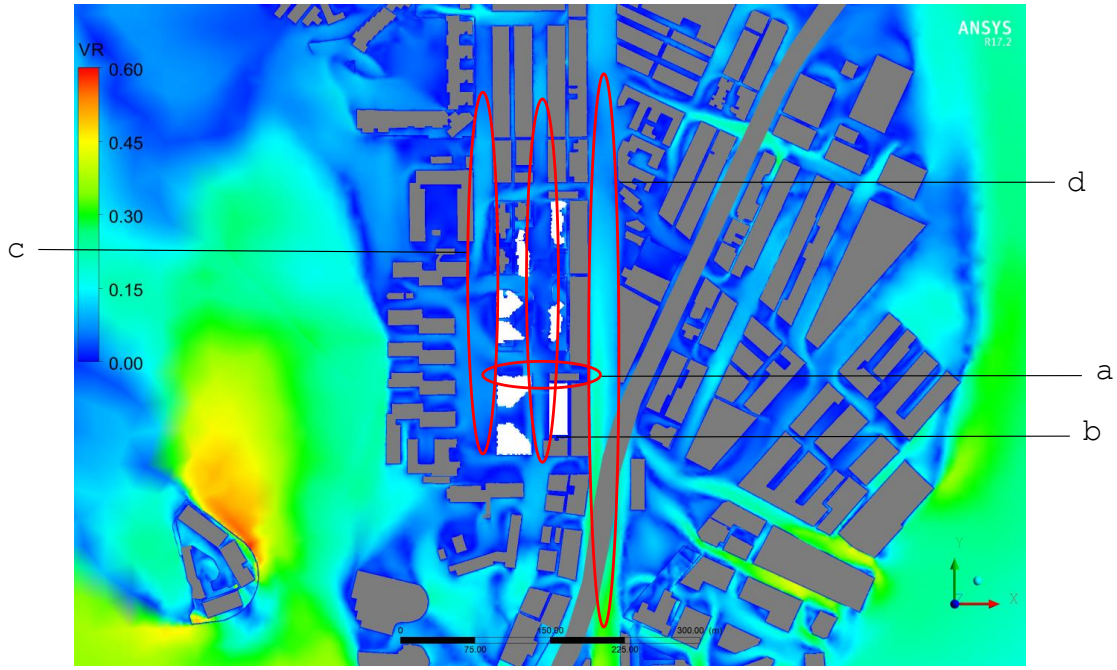
e. The stronger flow along Pau Chung Road joins the upcoming wind along Sheung Heung Road and accelerates the velocity at Sheung Heung Road under the Proposed Scheme.

f. The stronger downwash wind towards south along Ma Tau Wai Road counters with the upcoming wind from Chi Kiang Street and Kai Ming Street, slows down the wind speed at Ma Tau Wai Road/ To Kwa Wan Playground and To Kwa Wan Road as well.

Wind performance under wind direction of SSE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.7 Under SSE wind, the building cluster in To Kwa Wan area reduce the wind flow to reach the Subject Site.

a. The podium under T6 and T7 is reduced so that the separation between the podium and Ming Fat Building is widened in the Proposed Scheme. It allows the wind to penetrate into the site. Therefore, the VR at Kiang Su Street is slightly higher under the Proposed Scheme.

b. The upcoming SSE wind skims over the clusters in To Kwa Wan area, hits on the high-rise buildings and induces the downwash effect to the pedestrian level from north to south along Maidstone Road. However, under the Proposed Scheme, due to the wider separation of the podium and Ming Fat Building, more wind could penetrate into the site along N-S direction, which counters with the downwash flow. Thus, the VR is lower at Maidstone Road / future pedestrianised avenue within the Subject Site under the Proposed Scheme.

c. The additional separation between podia under T1 and T5, together with the wider separation along Kiang Su Road, enhances the wind penetration within the site along E-W direction. The stronger penetrated wind flow counters with the wind along Kau Pui Lung Road from north to south and reduces the wind velocity along Kau Pui Lung Road under the Proposed Scheme.

d. The upcoming wind flows from south to north along Ma Tau Wai Road. Since the podium T6 in the Baseline Scheme is larger and closer to Ming Fat Building than the Proposed Scheme, part of the upwind from Ko Shan Road was diverted to east and west along Chi Kiang Road. The diverted wind to east would reach and counter with the upcoming flow at Ma Tau Wai Road, which slows down the wind velocity on Ma Tau Wai Road. Moreover, T7 in the Baseline Scheme is moved to the southwest corner of the site, which is less unlikely to cause downwash effect and affect the wind flow on Ma Tau Wai Road. Thus, the VR is slightly higher on Ma Tau Wai Road under the Proposed Scheme.

5. CONCLUSION

5.1.1 The proposed development located in To Kwa Wan area has been evaluated from an air ventilation perspective.

5.1.2 To enhance the wind flow circulation of the Proposed Scheme, the following 2 enhancement features are provided:

(a) 17m podia separation along the N-S pedestrianised avenue for N-S wind flow; and

(b) 23m breezeway between podia along Kiang Su Street for E-W wind flow.

5.1.3 Apart from the two ventilation corridors, the following wider building/ podia separation can be achieved under notional design:

(a) over 50m building separation at Tower between T1 and T5;

(b) about 13m podia separation between T2 and T3;

(c) over 20m building separation at Tower between T4 and T5; and

(d) over 30m building separation at Tower between T4 and T6 at the direction of E-W.

5.1.4 According to Section 4.3, it is noted that the LVR is similar between the Proposed Scheme and Baseline Scheme under both annual and summer condition. The SVR is slightly better in the Proposed Scheme, compared to the Baseline Scheme, under both annual and summer condition.

5.1.5 There are some variations in VR between two schemes. Under the annual condition, the VR of some areas is higher under the Proposed Scheme, including Lok Man Sun Chuen, Maidstone Road, Lok Shan Road, Sheung Heung Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, VR is lower at Pau Chung Street, Kau Pui Lung Road Playground and Kiang Su Street under the Proposed Scheme.

5.1.6 Under the summer condition, the areas with higher VR under the Proposed Scheme are Maidstone Road, Lok Shan Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, the areas with higher VR under the Baseline Scheme are Kau Pui Lung Road, Kowloon City Road, Kau Pui Lung Road Playground, C.C.C. Wanchai Church Kei To Primary School (Kowloon City), Kiang Su Street and Ma Tau Wai Road/ To Kwa Wan Playground.

5.1.7 It is observed that the increase in building height would not induce significant impact to the To Kwa Wan area in air ventilation term under both annual and summer condition. With the two wind enhancement features discussed in Section 4.4, the Proposed Scheme could slightly enhance the wind flow in the Subject Site and nearby area.

Figures

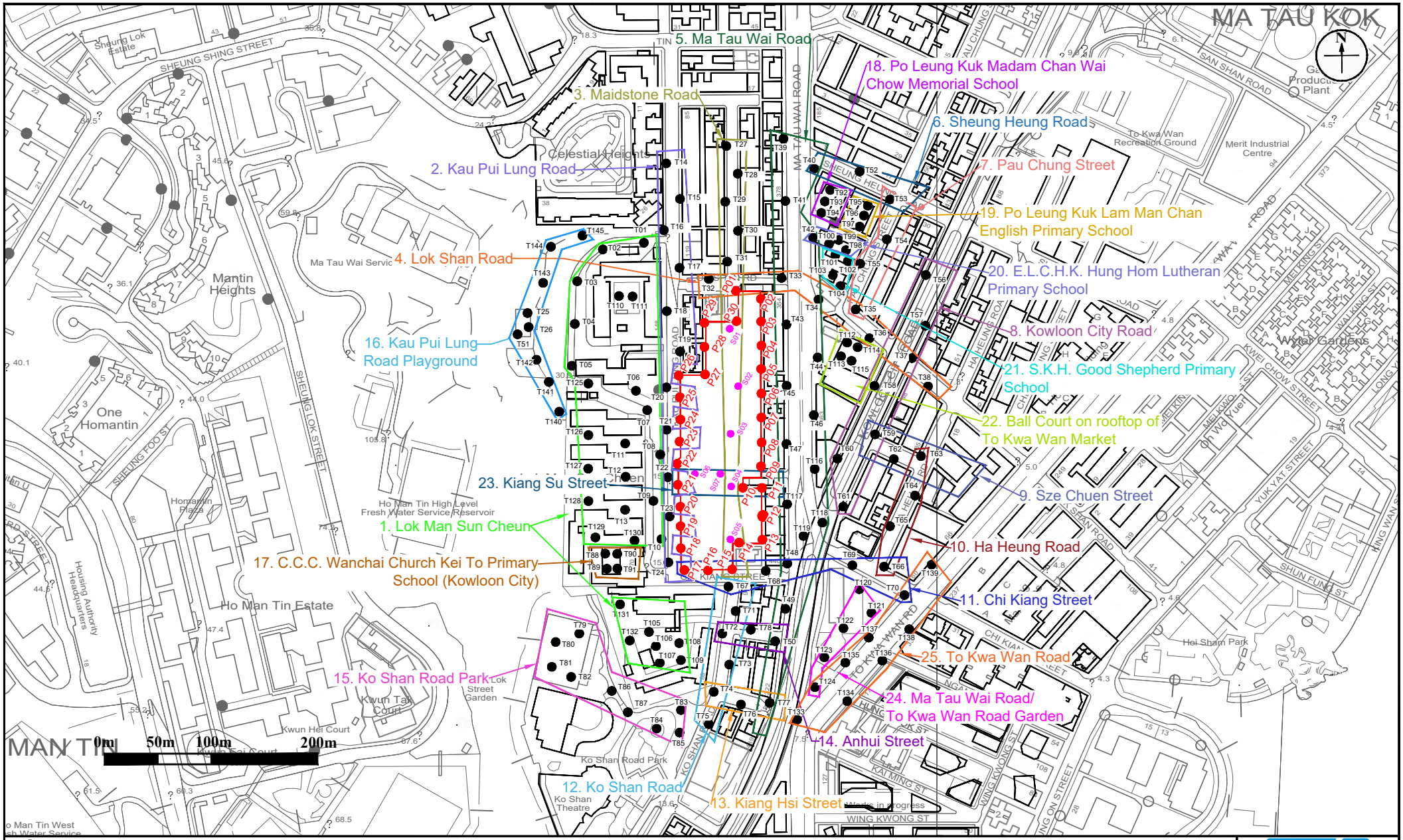


Figure: 8

Title: Test Points Selected for Quantitative Air Ventilation Assessment

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.1
Date:	Feb 2023

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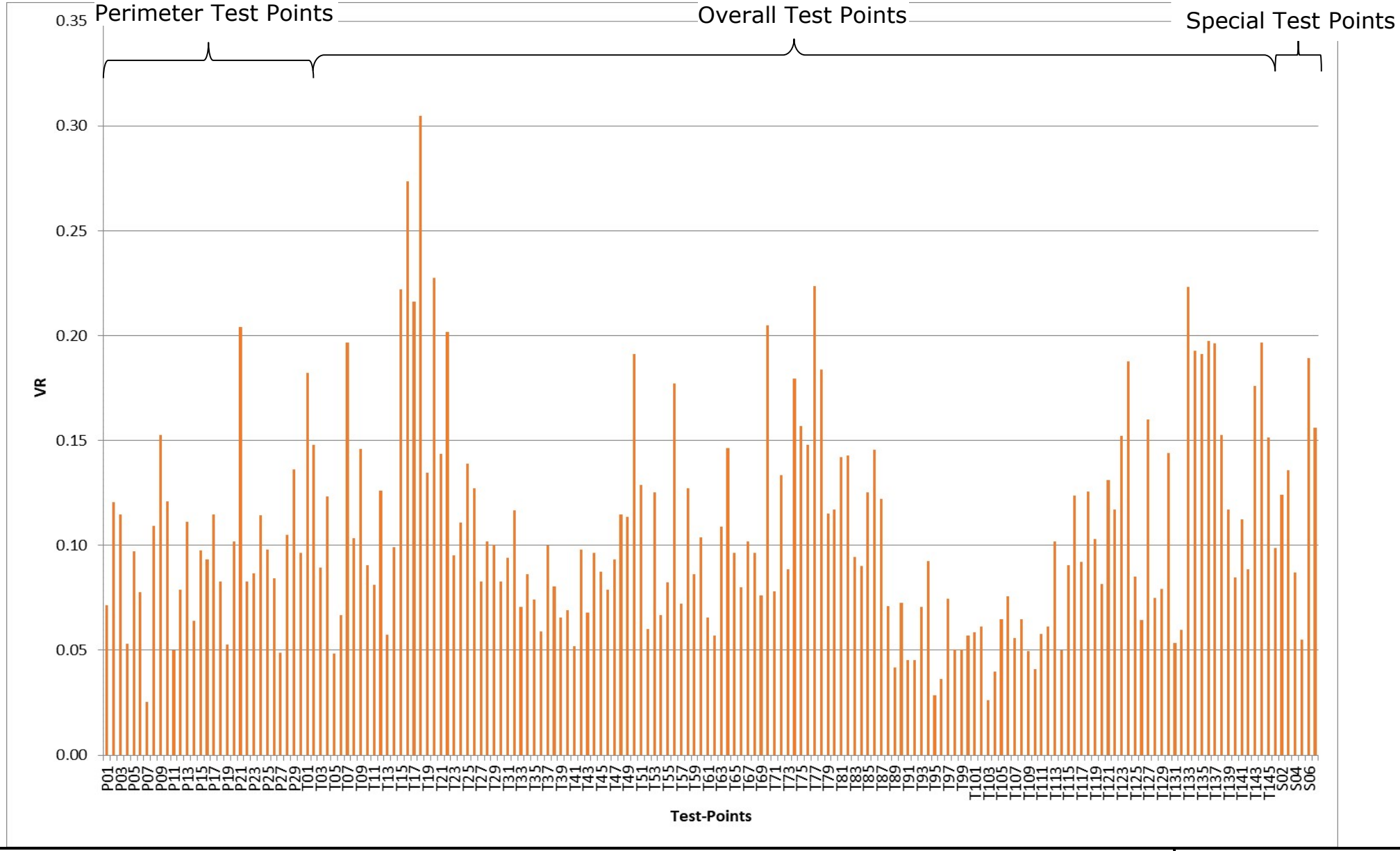

Figure: 10a	RAMBOLL
Title: Wind Velocity Ratios of Individual Test Points for Baseline Scheme (Annual)	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.0 Date: Feb 2023

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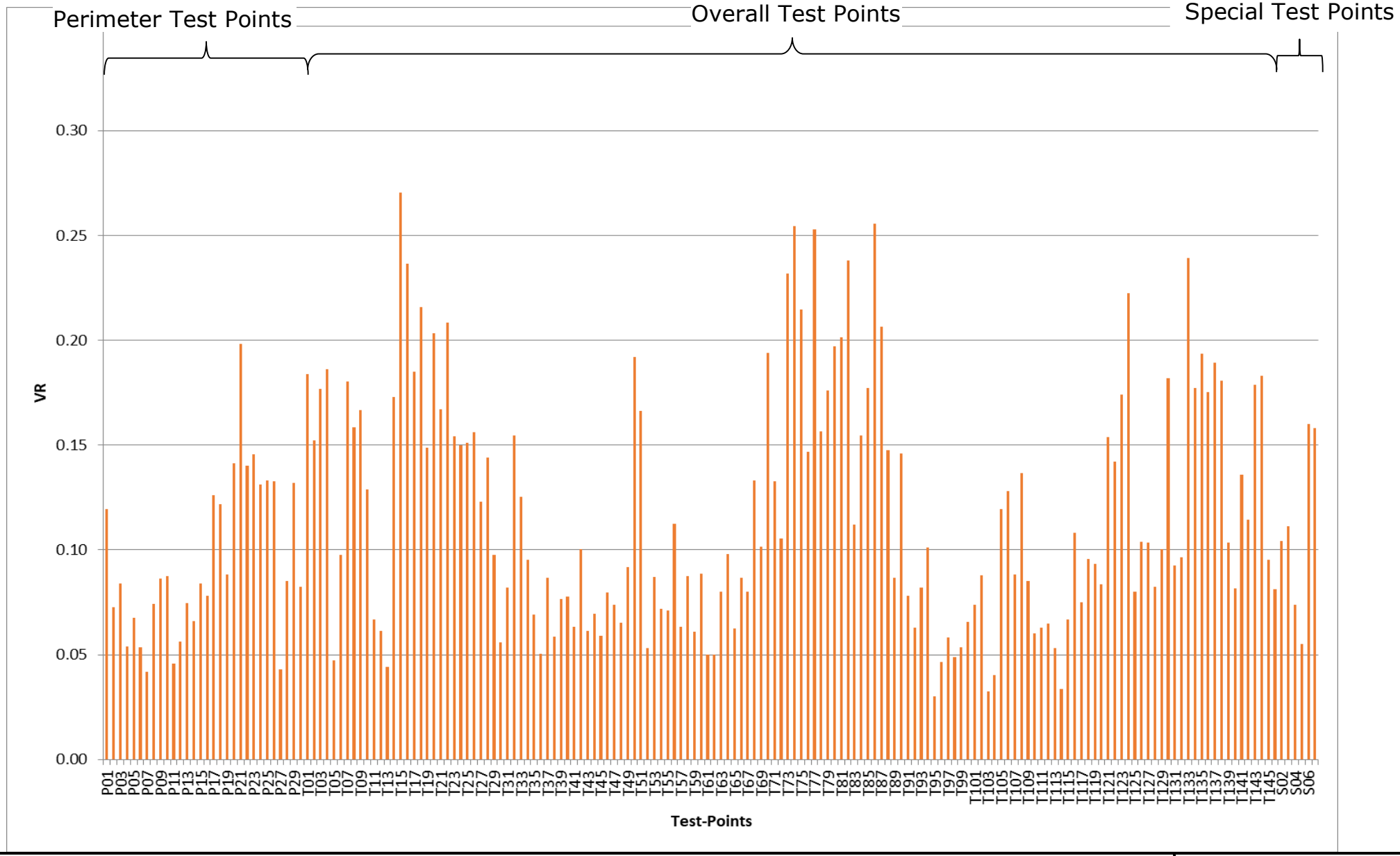

Figure: 10b

Title: Wind Velocity Ratios of Individual Test Points for Baseline Scheme (Summer)

RAMBOLL

Drawn by: WT

Checked by: EC

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme

Rev.: 1.0

Date: Feb 2023

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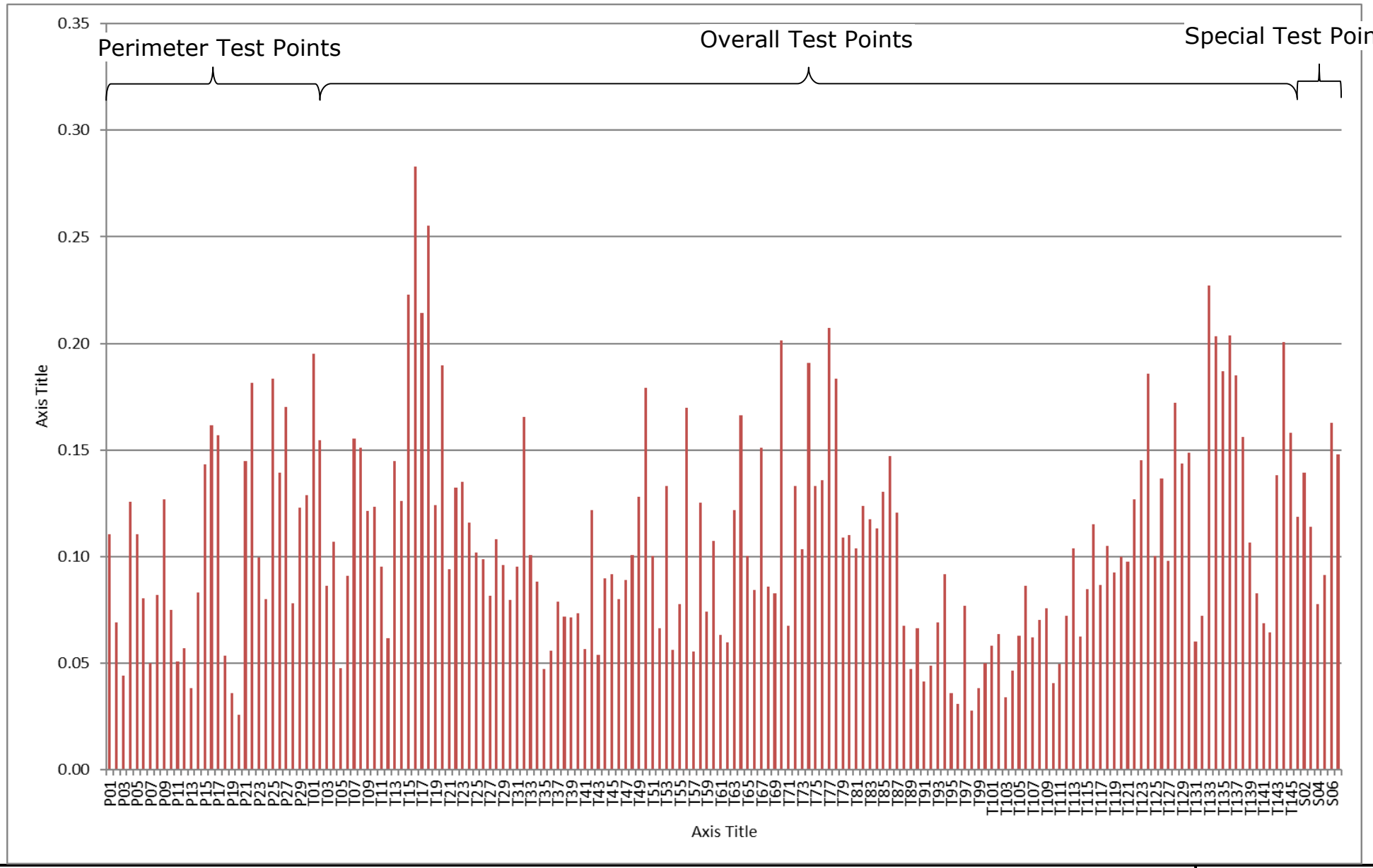

Figure: 11a	RAMBOLL
Title: Wind Velocity Ratios of Individual Test Points for Proposed Scheme (Annual)	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.0 Date: Feb 2023

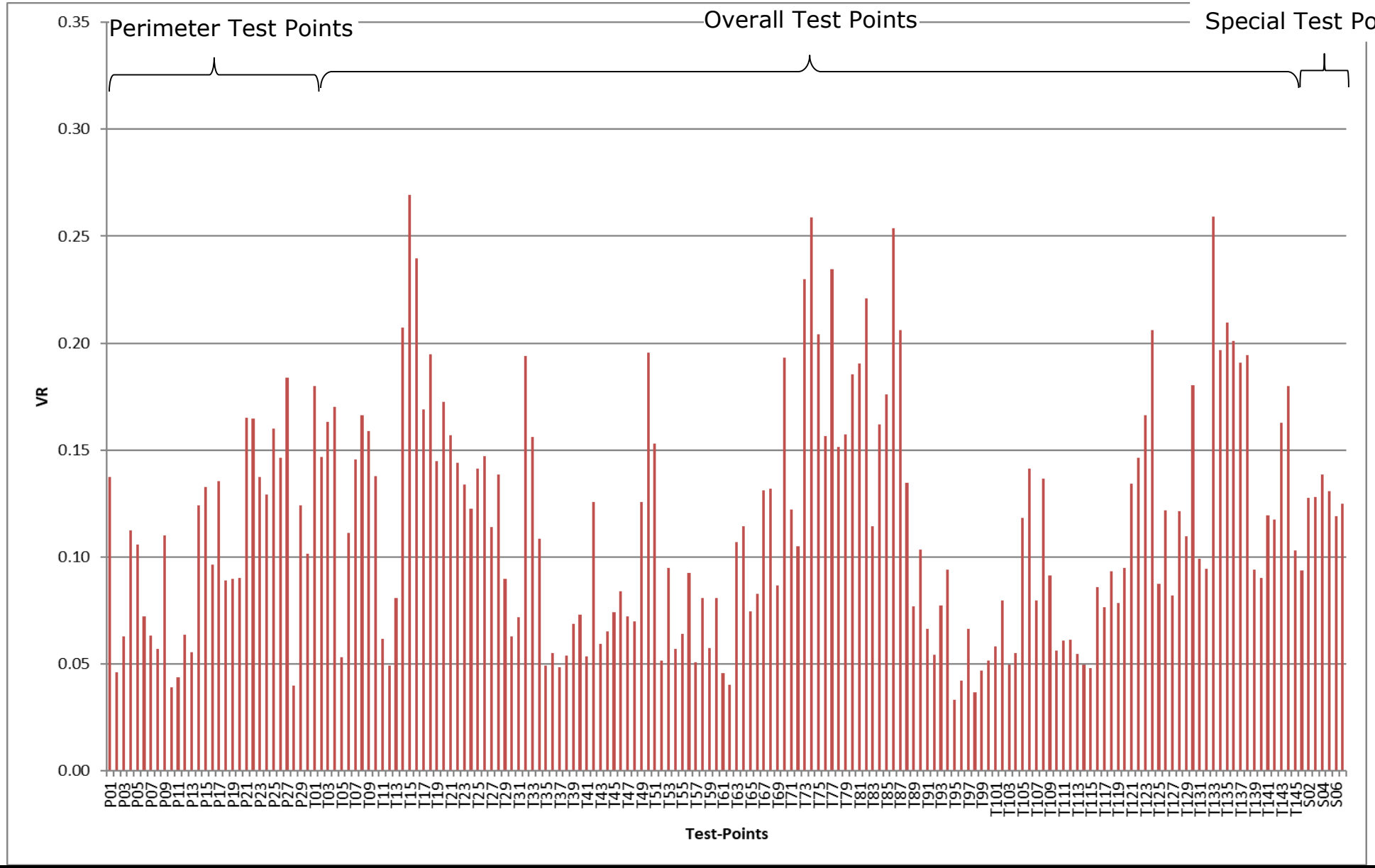

Figure: 11b	RAMBOLL
Title: Wind Velocity Ratios of Individual Test Points for Proposed Scheme (Summer)	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.0 Date: Feb 2023

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Appendix 5

Detailed CFD Simulation Result for Selected Test Points

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
P01	0.03	0.06	0.05	0.04	0.05	0.05	0.05	0.03	0.19	0.22	0.20	0.07	0.12
P02	0.06	0.12	0.16	0.17	0.14	0.08	0.04	0.01	0.05	0.02	0.11	0.12	0.07
P03	0.05	0.11	0.17	0.14	0.12	0.08	0.05	0.03	0.07	0.06	0.13	0.11	0.08
P04	0.01	0.02	0.18	0.04	0.02	0.01	0.01	0.04	0.09	0.01	0.20	0.05	0.05
P05	0.01	0.05	0.17	0.13	0.10	0.09	0.04	0.02	0.05	0.02	0.11	0.10	0.07
P06	0.02	0.14	0.20	0.06	0.02	0.10	0.03	0.03	0.04	0.03	0.15	0.08	0.05
P07	0.01	0.05	0.05	0.01	0.01	0.07	0.03	0.03	0.00	0.03	0.17	0.03	0.04
P08	0.04	0.12	0.16	0.15	0.10	0.09	0.04	0.02	0.01	0.07	0.13	0.11	0.07
P09	0.04	0.20	0.23	0.21	0.14	0.12	0.05	0.00	0.02	0.04	0.17	0.15	0.09
P10	0.08	0.17	0.16	0.12	0.09	0.04	0.01	0.03	0.13	0.14	0.06	0.12	0.09
P11	0.05	0.05	0.06	0.05	0.05	0.01	0.02	0.01	0.04	0.08	0.07	0.05	0.05
P12	0.05	0.11	0.11	0.09	0.07	0.02	0.02	0.02	0.05	0.09	0.06	0.08	0.06
P13	0.08	0.17	0.15	0.12	0.10	0.04	0.02	0.04	0.07	0.10	0.07	0.11	0.07
P14	0.03	0.05	0.06	0.08	0.06	0.02	0.04	0.02	0.13	0.06	0.08	0.06	0.07
P15	0.08	0.11	0.08	0.13	0.07	0.07	0.07	0.05	0.11	0.08	0.08	0.10	0.08
P16	0.09	0.10	0.05	0.13	0.07	0.08	0.09	0.04	0.09	0.10	0.03	0.09	0.08
P17	0.10	0.15	0.04	0.16	0.10	0.10	0.09	0.14	0.11	0.12	0.19	0.11	0.13
P18	0.03	0.11	0.08	0.05	0.09	0.07	0.07	0.09	0.15	0.13	0.26	0.08	0.12
P19	0.05	0.11	0.05	0.03	0.04	0.05	0.07	0.09	0.07	0.07	0.28	0.05	0.09
P20	0.04	0.15	0.08	0.11	0.07	0.01	0.10	0.14	0.19	0.18	0.25	0.10	0.14
P21	0.13	0.27	0.19	0.22	0.18	0.09	0.07	0.13	0.26	0.28	0.24	0.20	0.20
P22	0.02	0.09	0.02	0.09	0.04	0.01	0.03	0.10	0.23	0.24	0.24	0.08	0.14
P23	0.01	0.05	0.06	0.08	0.04	0.04	0.05	0.09	0.25	0.27	0.19	0.09	0.15
P24	0.02	0.06	0.09	0.13	0.08	0.06	0.06	0.03	0.24	0.26	0.05	0.11	0.13
P25	0.03	0.06	0.04	0.10	0.08	0.09	0.02	0.11	0.21	0.23	0.10	0.10	0.13
P26	0.01	0.04	0.06	0.06	0.07	0.11	0.05	0.13	0.22	0.24	0.08	0.08	0.13
P27	0.03	0.07	0.04	0.05	0.05	0.02	0.03	0.01	0.07	0.06	0.03	0.05	0.04
P28	0.05	0.15	0.11	0.11	0.08	0.06	0.02	0.01	0.14	0.13	0.06	0.11	0.09
P29	0.06	0.17	0.13	0.16	0.09	0.08	0.04	0.02	0.21	0.20	0.16	0.14	0.13
P30	0.03	0.12	0.09	0.14	0.07	0.11	0.11	0.05	0.06	0.06	0.09	0.10	0.08
Average SVR	**0.04**	**0.11**	**0.10**	**0.10**	**0.08**	**0.06**	**0.05**	**0.05**	**0.12**	**0.12**	**0.13**	**0.09**	**0.09**
T01	0.12	0.24	0.18	0.22	0.12	0.04	0.06	0.24	0.15	0.31	0.23	0.18	0.18
T02	0.06	0.19	0.13	0.18	0.12	0.12	0.07	0.18	0.13	0.21	0.17	0.15	0.15
T03	0.04	0.06	0.07	0.06	0.03	0.19	0.12	0.36	0.27	0.17	0.18	0.09	0.18
T04	0.09	0.11	0.10	0.09	0.06	0.18	0.02	0.35	0.25	0.27	0.16	0.12	0.19
T05	0.03	0.13	0.03	0.03	0.07	0.08	0.03	0.07	0.02	0.04	0.06	0.05	0.05
T06	0.05	0.11	0.06	0.04	0.02	0.02	0.04	0.03	0.16	0.18	0.19	0.07	0.10
T07	0.08	0.25	0.12	0.26	0.17	0.10	0.06	0.02	0.25	0.28	0.19	0.20	0.18
T08	0.01	0.13	0.08	0.08	0.06	0.05	0.02	0.06	0.24	0.29	0.29	0.10	0.16
T09	0.03	0.18	0.16	0.17	0.06	0.07	0.02	0.04	0.23	0.25	0.35	0.15	0.17
T10	0.06	0.07	0.08	0.11	0.10	0.08	0.13	0.16	0.08	0.10	0.30	0.09	0.13
T11	0.02	0.08	0.09	0.10	0.12	0.07	0.07	0.01	0.04	0.05	0.09	0.08	0.07
T12	0.09	0.24	0.16	0.16	0.11	0.04	0.03	0.04	0.02	0.04	0.06	0.13	0.06
T13	0.02	0.12	0.10	0.06	0.03	0.03	0.02	0.06	0.02	0.04	0.11	0.06	0.04
T14	0.06	0.11	0.10	0.07	0.02	0.05	0.02	0.20	0.22	0.32	0.33	0.10	0.17
T15	0.11	0.28	0.24	0.24	0.09	0.08	0.12	0.28	0.35	0.42	0.40	0.22	0.27
T16	0.15	0.37	0.30	0.35	0.18	0.13	0.10	0.28	0.23	0.31	0.24	0.27	0.24
T17	0.01	0.28	0.25	0.31	0.16	0.13	0.17	0.22	0.17	0.15	0.18	0.22	0.18
T18	0.12	0.42	0.34	0.40	0.25	0.19	0.16	0.20	0.27	0.19	0.05	0.30	0.22
T19	0.01	0.10	0.21	0.08	0.14	0.14	0.10	0.14	0.22	0.23	0.05	0.13	0.15
T20	0.04	0.24	0.27	0.28	0.19	0.15	0.14	0.15	0.24	0.26	0.15	0.23	0.20
T21	0.01	0.16	0.18	0.15	0.05	0.09	0.04	0.05	0.27	0.30	0.22	0.14	0.17
T22	0.12	0.25	0.16	0.23	0.19	0.07	0.06	0.10	0.26	0.30	0.33	0.20	0.21
T23	0.01	0.03	0.03	0.13	0.10	0.08	0.06	0.12	0.17	0.20	0.31	0.10	0.15
T24	0.07	0.06	0.04	0.13	0.08	0.07	0.03	0.06	0.24	0.22	0.23	0.11	0.15
T25	0.07	0.14	0.13	0.14	0.14	0.18	0.03	0.26	0.19	0.14	0.10	0.14	0.15
T26	0.07	0.12	0.12	0.11	0.14	0.18	0.08	0.26	0.19	0.15	0.12	0.13	0.16
T27	0.01	0.08	0.07	0.08	0.08	0.04	0.06	0.03	0.08	0.25	0.27	0.08	0.12
T28	0.03	0.07	0.08	0.13	0.09	0.05	0.14	0.04	0.08	0.27	0.29	0.10	0.14
T29	0.03	0.09	0.10	0.14	0.10	0.04	0.13	0.02	0.04	0.15	0.15	0.10	0.10
T30	0.02	0.11	0.11	0.12	0.07	0.03	0.09	0.03	0.03	0.05	0.04	0.08	0.06
T31	0.02	0.12	0.11	0.11	0.10	0.07	0.09	0.02	0.04	0.12	0.11	0.09	0.08
T32	0.07	0.09	0.06	0.11	0.13	0.09	0.09	0.03	0.22	0.23	0.24	0.12	0.15
T33	0.02	0.07	0.03	0.06	0.03	0.06	0.10	0.03	0.23	0.17	0.24	0.07	0.13
T34	0.03	0.03	0.05	0.12	0.09	0.07	0.08	0.03	0.13	0.12	0.08	0.09	0.10
T35	0.05	0.03	0.05	0.12	0.07	0.02	0.04	0.05	0.07	0.09	0.07	0.07	0.07
T36	0.01	0.05	0.02	0.11	0.04	0.04	0.03	0.02	0.05	0.07	0.02	0.06	0.05
T37	0.02	0.08	0.05	0.18	0.07	0.07	0.10	0.06	0.07	0.10	0.03	0.10	0.09
T38	0.05	0.10	0.06	0.13	0.05	0.08	0.07	0.03	0.03	0.07	0.03	0.08	0.06
T39	0.04	0.07	0.05	0.07	0.04	0.12	0.13	0.05	0.11	0.06	0.04	0.07	0.08
T40	0.03	0.04	0.05	0.08	0.08	0.11	0.06	0.04	0.09	0.09	0.06	0.07	0.08
T41	0.01	0.06	0.05	0.06	0.02	0.06	0.05	0.05	0.14	0.04	0.07	0.05	0.06
T42	0.03	0.06	0.09	0.14	0.17	0.05	0.10	0.04	0.06	0.03	0.25	0.10	0.10
T43	0.04	0.04	0.05	0.10	0.12	0.02	0.13	0.04	0.04	0.02	0.05	0.07	0.06

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T44	0.04	0.07	0.11	0.13	0.15	0.02	0.10	0.03	0.04	0.05	0.05	0.10	0.07
T45	0.02	0.07	0.14	0.12	0.11	0.01	0.10	0.06	0.03	0.04	0.03	0.09	0.06
T46	0.03	0.08	0.12	0.10	0.10	0.02	0.19	0.09	0.03	0.04	0.12	0.08	0.08
T47	0.04	0.13	0.15	0.11	0.08	0.02	0.14	0.08	0.04	0.07	0.07	0.09	0.07
T48	0.09	0.22	0.16	0.12	0.09	0.10	0.10	0.07	0.02	0.03	0.03	0.11	0.07
T49	0.02	0.18	0.12	0.15	0.07	0.10	0.12	0.02	0.07	0.12	0.08	0.11	0.09
T50	0.13	0.23	0.16	0.21	0.11	0.17	0.11	0.05	0.27	0.29	0.20	0.19	0.19
T51	0.04	0.12	0.10	0.12	0.14	0.19	0.17	0.24	0.16	0.18	0.12	0.13	0.17
T52	0.03	0.03	0.05	0.09	0.04	0.10	0.07	0.02	0.01	0.09	0.02	0.06	0.05
T53	0.03	0.10	0.16	0.21	0.10	0.08	0.17	0.04	0.07	0.01	0.09	0.13	0.09
T54	0.02	0.04	0.03	0.09	0.09	0.09	0.10	0.04	0.07	0.04	0.07	0.07	0.07
T55	0.02	0.02	0.08	0.17	0.03	0.02	0.07	0.02	0.09	0.06	0.10	0.08	0.07
T56	0.03	0.25	0.22	0.28	0.08	0.13	0.14	0.09	0.09	0.09	0.05	0.18	0.11
T57	0.04	0.08	0.03	0.12	0.04	0.03	0.01	0.05	0.07	0.12	0.02	0.07	0.06
T58	0.05	0.16	0.15	0.18	0.10	0.07	0.04	0.11	0.05	0.09	0.05	0.13	0.09
T59	0.06	0.04	0.12	0.13	0.06	0.06	0.01	0.04	0.03	0.06	0.09	0.09	0.06
T60	0.01	0.10	0.12	0.19	0.06	0.11	0.13	0.12	0.06	0.03	0.09	0.10	0.09
T61	0.02	0.08	0.11	0.08	0.02	0.08	0.05	0.03	0.01	0.06	0.07	0.07	0.05
T62	0.05	0.03	0.05	0.08	0.05	0.07	0.08	0.05	0.03	0.03	0.04	0.06	0.05
T63	0.06	0.12	0.13	0.14	0.12	0.10	0.14	0.02	0.07	0.01	0.10	0.11	0.08
T64	0.10	0.18	0.15	0.23	0.12	0.09	0.13	0.09	0.03	0.05	0.11	0.15	0.10
T65	0.01	0.16	0.13	0.13	0.08	0.01	0.05	0.02	0.05	0.07	0.09	0.10	0.06
T66	0.02	0.09	0.04	0.11	0.11	0.06	0.02	0.11	0.05	0.11	0.11	0.08	0.09
T67	0.04	0.20	0.13	0.12	0.09	0.05	0.10	0.06	0.03	0.06	0.16	0.10	0.08
T68	0.07	0.07	0.05	0.10	0.04	0.08	0.06	0.08	0.16	0.27	0.15	0.10	0.13
T69	0.06	0.08	0.07	0.07	0.06	0.09	0.15	0.13	0.09	0.11	0.11	0.08	0.10
T70	0.10	0.26	0.19	0.25	0.17	0.18	0.20	0.12	0.10	0.29	0.21	0.20	0.19
T71	0.03	0.04	0.04	0.06	0.03	0.03	0.11	0.08	0.26	0.28	0.06	0.08	0.13
T72	0.06	0.21	0.13	0.19	0.11	0.04	0.11	0.10	0.06	0.14	0.08	0.13	0.11
T73	0.01	0.03	0.03	0.04	0.02	0.04	0.08	0.14	0.39	0.41	0.48	0.09	0.23
T74	0.11	0.19	0.12	0.19	0.10	0.12	0.18	0.14	0.36	0.36	0.43	0.18	0.25
T75	0.11	0.20	0.11	0.13	0.11	0.09	0.17	0.09	0.29	0.34	0.35	0.16	0.21
T76	0.13	0.23	0.10	0.15	0.12	0.05	0.06	0.02	0.27	0.19	0.19	0.15	0.15
T77	0.11	0.29	0.20	0.25	0.15	0.11	0.19	0.11	0.35	0.35	0.38	0.22	0.25
T78	0.10	0.22	0.18	0.23	0.13	0.05	0.02	0.11	0.22	0.27	0.10	0.18	0.16
T79	0.06	0.14	0.08	0.05	0.06	0.12	0.15	0.09	0.28	0.36	0.12	0.11	0.18
T80	0.07	0.14	0.09	0.07	0.04	0.13	0.11	0.09	0.26	0.34	0.39	0.12	0.20
T81	0.08	0.16	0.12	0.13	0.05	0.11	0.11	0.01	0.27	0.36	0.41	0.14	0.20
T82	0.03	0.16	0.09	0.13	0.06	0.09	0.14	0.10	0.34	0.42	0.41	0.14	0.24
T83	0.05	0.19	0.08	0.11	0.01	0.06	0.04	0.11	0.13	0.16	0.23	0.09	0.11
T84	0.01	0.15	0.06	0.06	0.06	0.08	0.14	0.16	0.17	0.23	0.26	0.09	0.15
T85	0.06	0.19	0.13	0.10	0.04	0.06	0.11	0.16	0.29	0.25	0.28	0.13	0.18
T86	0.08	0.22	0.04	0.12	0.09	0.06	0.23	0.14	0.38	0.39	0.46	0.15	0.26
T87	0.08	0.19	0.04	0.09	0.09	0.10	0.26	0.11	0.24	0.31	0.37	0.12	0.21
T88	0.04	0.01	0.01	0.05	0.02	0.08	0.09	0.20	0.26	0.27	0.07	0.07	0.15
T89	0.02	0.02	0.02	0.03	0.02	0.03	0.07	0.11	0.15	0.14	0.08	0.04	0.09
T90	0.01	0.04	0.04	0.04	0.04	0.03	0.13	0.20	0.26	0.27	0.07	0.07	0.15
T91	0.02	0.03	0.03	0.03	0.03	0.04	0.07	0.12	0.12	0.12	0.04	0.05	0.08
T92	0.02	0.08	0.04	0.03	0.07	0.09	0.09	0.04	0.01	0.04	0.18	0.05	0.06
T93	0.03	0.09	0.04	0.09	0.10	0.10	0.11	0.04	0.01	0.06	0.20	0.07	0.08
T94	0.04	0.08	0.06	0.12	0.14	0.10	0.12	0.03	0.06	0.04	0.23	0.09	0.10
T95	0.01	0.04	0.02	0.03	0.02	0.04	0.03	0.02	0.02	0.05	0.03	0.03	0.03
T96	0.01	0.03	0.03	0.04	0.02	0.08	0.05	0.02	0.05	0.05	0.07	0.04	0.05
T97	0.04	0.08	0.05	0.11	0.08	0.06	0.07	0.00	0.04	0.07	0.04	0.07	0.06
T98	0.02	0.03	0.03	0.09	0.05	0.06	0.09	0.01	0.04	0.04	0.04	0.05	0.05
T99	0.03	0.04	0.03	0.07	0.04	0.08	0.12	0.01	0.06	0.04	0.04	0.05	0.05
T100	0.03	0.04	0.03	0.07	0.05	0.10	0.12	0.01	0.06	0.09	0.04	0.06	0.07
T101	0.02	0.03	0.04	0.06	0.04	0.10	0.14	0.00	0.06	0.13	0.04	0.06	0.07
T102	0.02	0.01	0.03	0.06	0.05	0.09	0.17	0.02	0.09	0.18	0.01	0.06	0.09
T103	0.03	0.01	0.02	0.03	0.03	0.05	0.07	0.05	0.02	0.01	0.02	0.03	0.03
T104	0.04	0.01	0.02	0.04	0.10	0.04	0.01	0.07	0.03	0.03	0.01	0.04	0.04
T105	0.02	0.02	0.03	0.05	0.03	0.09	0.06	0.10	0.23	0.16	0.14	0.06	0.12
T106	0.07	0.05	0.06	0.02	0.05	0.06	0.06	0.03	0.24	0.25	0.16	0.08	0.13
T107	0.06	0.06	0.04	0.02	0.04	0.04	0.02	0.05	0.10	0.20	0.13	0.06	0.09
T108	0.02	0.06	0.02	0.03	0.03	0.09	0.09	0.09	0.23	0.24	0.19	0.06	0.14
T109	0.02	0.09	0.04	0.02	0.03	0.03	0.07	0.07	0.13	0.12	0.15	0.05	0.09
T110	0.02	0.06	0.02	0.03	0.01	0.02	0.02	0.08	0.07	0.15	0.02	0.04	0.06
T111	0.01	0.10	0.06	0.06	0.01	0.02	0.03	0.08	0.08	0.13	0.03	0.06	0.06
T112	0.04	0.05	0.07	0.07	0.04	0.03	0.07	0.03	0.08	0.09	0.09	0.06	0.07
T113	0.01	0.09	0.16	0.18	0.07	0.01	0.04	0.01	0.02	0.05	0.06	0.10	0.05
T114	0.03	0.04	0.06	0.08	0.03	0.04	0.02	0.02	0.01	0.04	0.02	0.05	0.03
T115	0.03	0.06	0.12	0.15	0.05	0.01	0.09	0.04	0.06	0.08	0.05	0.09	0.07
T116	0.05	0.15	0.15	0.14	0.12	0.07	0.22	0.08	0.14	0.09	0.02	0.12	0.11
T117	0.06	0.15	0.16	0.08	0.07	0.08	0.13	0.13	0.07	0.05	0.02	0.09	0.08

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T118	0.03	0.18	0.15	0.16	0.11	0.11	0.21	0.03	0.05	0.09	0.05	0.13	0.10
T119	0.05	0.20	0.16	0.08	0.09	0.09	0.19	0.17	0.12	0.03	0.03	0.10	0.09
T120	0.07	0.15	0.05	0.10	0.07	0.02	0.06	0.14	0.08	0.08	0.11	0.08	0.08
T121	0.06	0.15	0.18	0.14	0.03	0.16	0.11	0.19	0.07	0.28	0.22	0.13	0.15
T122	0.15	0.26	0.14	0.04	0.01	0.14	0.06	0.18	0.19	0.24	0.18	0.12	0.14
T123	0.09	0.25	0.15	0.13	0.07	0.14	0.01	0.25	0.19	0.29	0.20	0.15	0.17
T124	0.07	0.26	0.15	0.22	0.12	0.06	0.15	0.30	0.35	0.25	0.22	0.19	0.22
T125	0.06	0.07	0.08	0.13	0.02	0.03	0.03	0.04	0.06	0.17	0.09	0.09	0.08
T126	0.03	0.06	0.06	0.02	0.08	0.07	0.07	0.07	0.11	0.19	0.15	0.06	0.10
T127	0.09	0.22	0.15	0.21	0.17	0.06	0.06	0.05	0.11	0.12	0.01	0.16	0.10
T128	0.03	0.14	0.12	0.04	0.04	0.06	0.07	0.03	0.09	0.13	0.16	0.07	0.08
T129	0.03	0.11	0.04	0.12	0.03	0.05	0.06	0.10	0.12	0.10	0.19	0.08	0.10
T130	0.07	0.15	0.15	0.15	0.08	0.07	0.11	0.18	0.27	0.24	0.25	0.14	0.18
T131	0.04	0.04	0.02	0.02	0.03	0.10	0.05	0.10	0.14	0.18	0.05	0.05	0.09
T132	0.03	0.06	0.04	0.05	0.02	0.10	0.04	0.11	0.19	0.07	0.15	0.06	0.10
T133	0.13	0.32	0.21	0.24	0.11	0.21	0.26	0.24	0.37	0.24	0.19	0.22	0.24
T134	0.06	0.27	0.18	0.23	0.18	0.08	0.15	0.09	0.19	0.24	0.19	0.19	0.18
T135	0.08	0.25	0.13	0.22	0.16	0.10	0.11	0.05	0.32	0.26	0.20	0.19	0.19
T136	0.14	0.31	0.18	0.23	0.11	0.04	0.06	0.03	0.30	0.26	0.23	0.20	0.18
T137	0.17	0.29	0.09	0.23	0.17	0.10	0.04	0.07	0.28	0.28	0.22	0.20	0.19
T138	0.05	0.05	0.07	0.22	0.16	0.03	0.08	0.02	0.29	0.28	0.22	0.15	0.18
T139	0.02	0.09	0.14	0.12	0.13	0.11	0.02	0.06	0.02	0.24	0.04	0.12	0.10
T140	0.06	0.15	0.11	0.06	0.08	0.08	0.11	0.07	0.05	0.11	0.09	0.08	0.08
T141	0.02	0.15	0.11	0.09	0.07	0.14	0.05	0.24	0.12	0.27	0.02	0.11	0.14
T142	0.04	0.11	0.11	0.05	0.09	0.15	0.15	0.21	0.15	0.08	0.05	0.09	0.11
T143	0.07	0.21	0.17	0.22	0.15	0.14	0.14	0.29	0.22	0.13	0.15	0.18	0.18
T144	0.07	0.27	0.20	0.28	0.16	0.12	0.13	0.24	0.16	0.13	0.27	0.20	0.18
T145	0.05	0.21	0.15	0.22	0.12	0.06	0.01	0.06	0.03	0.18	0.04	0.15	0.10
Average LVR	**0.05**	**0.12**	**0.10**	**0.12**	**0.08**	**0.08**	**0.08**	**0.09**	**0.14**	**0.15**	**0.14**	**0.11**	**0.12**
S01	0.03	0.14	0.10	0.14	0.09	0.12	0.12	0.05	0.05	0.01	0.13	0.10	0.08
S02	0.05	0.20	0.18	0.15	0.05	0.11	0.11	0.06	0.08	0.09	0.21	0.12	0.10
S03	0.07	0.19	0.15	0.19	0.12	0.08	0.09	0.02	0.08	0.08	0.25	0.14	0.11
S04	0.06	0.14	0.13	0.09	0.06	0.04	0.05	0.06	0.07	0.06	0.16	0.09	0.07
S05	0.03	0.03	0.05	0.07	0.05	0.02	0.03	0.02	0.10	0.05	0.06	0.06	0.06
S06	0.12	0.23	0.17	0.20	0.16	0.08	0.01	0.08	0.26	0.31	0.03	0.19	0.16
S07	0.09	0.12	0.17	0.16	0.10	0.07	0.02	0.09	0.29	0.30	0.06	0.16	0.16

Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
P01	0.05	0.13	0.07	0.11	0.10	0.07	0.04	0.04	0.20	0.21	0.21	0.11	0.14
P02	0.03	0.08	0.05	0.10	0.08	0.06	0.04	0.01	0.04	0.03	0.02	0.07	0.05
P03	0.02	0.05	0.02	0.04	0.04	0.03	0.03	0.03	0.09	0.10	0.10	0.04	0.06
P04	0.06	0.17	0.09	0.16	0.13	0.11	0.08	0.03	0.11	0.11	0.16	0.13	0.11
P05	0.03	0.15	0.05	0.15	0.11	0.13	0.12	0.06	0.10	0.10	0.08	0.11	0.11
P06	0.06	0.16	0.10	0.07	0.04	0.00	0.05	0.07	0.13	0.11	0.05	0.08	0.07
P07	0.08	0.14	0.01	0.02	0.01	0.04	0.05	0.06	0.12	0.11	0.04	0.05	0.06
P08	0.05	0.09	0.10	0.10	0.09	0.06	0.05	0.02	0.05	0.04	0.05	0.08	0.06
P09	0.07	0.12	0.15	0.15	0.11	0.09	0.08	0.04	0.14	0.12	0.12	0.13	0.11
P10	0.07	0.15	0.14	0.05	0.09	0.02	0.01	0.01	0.02	0.02	0.09	0.07	0.04
P11	0.06	0.08	0.08	0.03	0.05	0.01	0.02	0.01	0.03	0.05	0.13	0.05	0.04
P12	0.01	0.12	0.06	0.03	0.05	0.02	0.01	0.04	0.09	0.12	0.07	0.06	0.06
P13	0.01	0.09	0.02	0.01	0.04	0.02	0.01	0.03	0.08	0.10	0.09	0.04	0.06
P14	0.01	0.11	0.06	0.07	0.07	0.01	0.09	0.06	0.21	0.18	0.21	0.08	0.12
P15	0.07	0.19	0.16	0.15	0.11	0.09	0.09	0.10	0.23	0.13	0.11	0.14	0.13
P16	0.09	0.26	0.21	0.20	0.12	0.09	0.07	0.06	0.12	0.07	0.05	0.16	0.10
P17	0.10	0.25	0.19	0.17	0.11	0.09	0.08	0.10	0.12	0.16	0.21	0.16	0.14
P18	0.03	0.03	0.05	0.07	0.04	0.02	0.02	0.12	0.06	0.10	0.26	0.05	0.09
P19	0.03	0.02	0.03	0.03	0.03	0.02	0.05	0.11	0.07	0.11	0.27	0.04	0.09
P20	0.01	0.03	0.02	0.00	0.01	0.03	0.09	0.11	0.05	0.11	0.31	0.03	0.09
P21	0.15	0.29	0.18	0.08	0.05	0.06	0.07	0.05	0.23	0.29	0.34	0.14	0.17
P22	0.13	0.26	0.19	0.23	0.10	0.09	0.06	0.07	0.16	0.23	0.31	0.18	0.16
P23	0.03	0.08	0.06	0.09	0.17	0.07	0.06	0.08	0.10	0.19	0.28	0.10	0.14
P24	0.02	0.07	0.01	0.06	0.12	0.05	0.03	0.10	0.17	0.24	0.15	0.08	0.13
P25	0.09	0.25	0.19	0.24	0.08	0.04	0.02	0.12	0.24	0.26	0.14	0.18	0.16
P26	0.10	0.14	0.09	0.16	0.13	0.09	0.08	0.14	0.20	0.20	0.09	0.14	0.15
P27	0.10	0.18	0.13	0.18	0.14	0.07	0.08	0.06	0.31	0.29	0.18	0.17	0.18
P28	0.06	0.09	0.08	0.11	0.08	0.06	0.03	0.01	0.02	0.02	0.01	0.08	0.04
P29	0.06	0.16	0.12	0.14	0.08	0.06	0.06	0.02	0.18	0.17	0.21	0.12	0.12
P30	0.08	0.21	0.04	0.20	0.16	0.09	0.06	0.06	0.03	0.08	0.17	0.13	0.10
Average SVR	**0.06**	**0.14**	**0.09**	**0.11**	**0.08**	**0.06**	**0.05**	**0.06**	**0.12**	**0.13**	**0.15**	**0.10**	**0.10**
T01	0.18	0.27	0.20	0.22	0.14	0.04	0.06	0.23	0.15	0.29	0.22	0.20	0.18
T02	0.11	0.19	0.13	0.19	0.13	0.11	0.04	0.16	0.14	0.19	0.17	0.15	0.15
T03	0.12	0.11	0.08	0.03	0.03	0.05	0.10	0.34	0.27	0.20	0.19	0.09	0.16
T04	0.16	0.12	0.09	0.08	0.02	0.03	0.09	0.34	0.24	0.28	0.16	0.11	0.17
T05	0.06	0.08	0.03	0.05	0.06	0.02	0.06	0.13	0.02	0.05	0.05	0.05	0.05
T06	0.03	0.10	0.08	0.09	0.06	0.09	0.07	0.03	0.14	0.16	0.19	0.09	0.11
T07	0.09	0.27	0.23	0.09	0.14	0.10	0.09	0.02	0.18	0.21	0.24	0.16	0.15
T08	0.10	0.17	0.14	0.19	0.10	0.08	0.07	0.12	0.15	0.21	0.34	0.15	0.17
T09	0.07	0.04	0.10	0.17	0.13	0.08	0.08	0.12	0.15	0.16	0.35	0.12	0.16
T10	0.04	0.19	0.16	0.13	0.12	0.01	0.05	0.19	0.15	0.11	0.31	0.12	0.14
T11	0.02	0.15	0.06	0.16	0.12	0.03	0.04	0.05	0.02	0.05	0.03	0.10	0.06
T12	0.08	0.19	0.08	0.01	0.05	0.06	0.05	0.01	0.06	0.05	0.08	0.06	0.05
T13	0.09	0.19	0.17	0.21	0.13	0.07	0.04	0.06	0.09	0.02	0.06	0.14	0.08
T14	0.14	0.13	0.11	0.10	0.02	0.04	0.05	0.22	0.31	0.36	0.36	0.13	0.21
T15	0.19	0.27	0.23	0.22	0.10	0.07	0.08	0.28	0.36	0.42	0.41	0.22	0.27
T16	0.24	0.37	0.31	0.34	0.21	0.11	0.10	0.27	0.22	0.33	0.26	0.28	0.24
T17	0.03	0.25	0.25	0.29	0.19	0.12	0.10	0.23	0.19	0.16	0.05	0.21	0.17
T18	0.16	0.38	0.34	0.28	0.20	0.09	0.14	0.20	0.27	0.17	0.16	0.26	0.19
T19	0.01	0.13	0.12	0.13	0.09	0.05	0.04	0.16	0.26	0.23	0.06	0.12	0.14
T20	0.11	0.24	0.20	0.21	0.16	0.12	0.08	0.18	0.20	0.21	0.16	0.19	0.17
T21	0.03	0.06	0.05	0.05	0.19	0.09	0.08	0.14	0.16	0.21	0.27	0.09	0.16
T22	0.13	0.27	0.14	0.11	0.05	0.03	0.07	0.06	0.17	0.23	0.34	0.13	0.14
T23	0.10	0.16	0.14	0.17	0.12	0.06	0.08	0.09	0.10	0.13	0.32	0.14	0.13
T24	0.05	0.15	0.13	0.13	0.06	0.07	0.04	0.03	0.16	0.18	0.23	0.12	0.12
T25	0.14	0.04	0.03	0.10	0.14	0.11	0.12	0.28	0.20	0.12	0.06	0.10	0.14
T26	0.12	0.04	0.04	0.10	0.13	0.11	0.15	0.28	0.19	0.11	0.11	0.10	0.15
T27	0.05	0.08	0.07	0.08	0.04	0.02	0.03	0.04	0.11	0.27	0.21	0.08	0.11
T28	0.08	0.13	0.07	0.11	0.09	0.05	0.11	0.03	0.12	0.28	0.22	0.11	0.14
T29	0.06	0.14	0.09	0.11	0.08	0.06	0.10	0.02	0.05	0.16	0.11	0.10	0.09
T30	0.06	0.14	0.10	0.08	0.06	0.06	0.07	0.04	0.04	0.08	0.08	0.08	0.06
T31	0.06	0.16	0.12	0.07	0.12	0.10	0.05	0.02	0.06	0.08	0.08	0.10	0.07
T32	0.04	0.12	0.08	0.19	0.18	0.17	0.06	0.05	0.30	0.24	0.23	0.17	0.19
T33	0.02	0.05	0.02	0.11	0.12	0.06	0.06	0.04	0.26	0.22	0.26	0.10	0.16
T34	0.03	0.07	0.04	0.11	0.06	0.11	0.03	0.03	0.16	0.16	0.15	0.09	0.11
T35	0.03	0.02	0.03	0.08	0.04	0.03	0.07	0.08	0.02	0.05	0.03	0.05	0.05
T36	0.05	0.04	0.04	0.08	0.04	0.02	0.05	0.04	0.07	0.07	0.05	0.06	0.06
T37	0.04	0.08	0.08	0.15	0.03	0.09	0.03	0.08	0.01	0.01	0.03	0.08	0.05
T38	0.02	0.09	0.03	0.13	0.06	0.05	0.04	0.03	0.05	0.05	0.04	0.07	0.05
T39	0.01	0.06	0.07	0.07	0.10	0.14	0.12	0.02	0.09	0.03	0.02	0.07	0.07
T40	0.01	0.03	0.06	0.10	0.08	0.12	0.10	0.05	0.09	0.02	0.05	0.07	0.07
T41	0.01	0.06	0.09	0.05	0.04	0.08	0.04	0.05	0.08	0.03	0.05	0.06	0.05
T42	0.04	0.07	0.12	0.15	0.16	0.18	0.14	0.04	0.08	0.07	0.24	0.12	0.13
T43	0.04	0.07	0.05	0.06	0.08	0.04	0.14	0.04	0.01	0.03	0.12	0.05	0.06

Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T44	0.02	0.07	0.08	0.13	0.13	0.06	0.05	0.01	0.03	0.07	0.05	0.09	0.07
T45	0.01	0.08	0.11	0.14	0.10	0.06	0.15	0.10	0.04	0.03	0.02	0.09	0.07
T46	0.04	0.10	0.10	0.10	0.09	0.04	0.14	0.11	0.04	0.04	0.16	0.08	0.08
T47	0.05	0.11	0.14	0.11	0.08	0.04	0.20	0.12	0.04	0.03	0.02	0.09	0.07
T48	0.09	0.22	0.15	0.09	0.06	0.08	0.22	0.04	0.04	0.05	0.04	0.10	0.07
T49	0.02	0.18	0.12	0.17	0.08	0.12	0.32	0.01	0.16	0.11	0.08	0.13	0.13
T50	0.13	0.24	0.15	0.19	0.12	0.16	0.22	0.11	0.26	0.24	0.22	0.18	0.20
T51	0.12	0.05	0.04	0.12	0.11	0.11	0.20	0.25	0.16	0.13	0.16	0.10	0.15
T52	0.00	0.08	0.06	0.09	0.08	0.08	0.01	0.02	0.04	0.01	0.09	0.07	0.05
T53	0.02	0.12	0.17	0.22	0.09	0.15	0.16	0.02	0.06	0.05	0.09	0.13	0.09
T54	0.02	0.06	0.06	0.04	0.12	0.08	0.08	0.01	0.04	0.03	0.09	0.06	0.06
T55	0.01	0.04	0.09	0.14	0.05	0.04	0.07	0.03	0.07	0.02	0.10	0.08	0.06
T56	0.01	0.25	0.26	0.28	0.04	0.13	0.12	0.10	0.05	0.06	0.03	0.17	0.09
T57	0.00	0.07	0.03	0.09	0.03	0.09	0.07	0.07	0.01	0.05	0.02	0.06	0.05
T58	0.03	0.18	0.18	0.18	0.09	0.04	0.05	0.12	0.05	0.06	0.09	0.13	0.08
T59	0.02	0.19	0.14	0.06	0.02	0.07	0.05	0.09	0.02	0.06	0.11	0.07	0.06
T60	0.04	0.13	0.16	0.15	0.06	0.07	0.03	0.13	0.02	0.08	0.12	0.11	0.08
T61	0.02	0.16	0.14	0.03	0.02	0.09	0.03	0.01	0.02	0.09	0.07	0.06	0.05
T62	0.02	0.04	0.07	0.09	0.07	0.05	0.05	0.01	0.01	0.02	0.04	0.06	0.04
T63	0.03	0.14	0.14	0.16	0.13	0.09	0.15	0.10	0.06	0.10	0.10	0.12	0.11
T64	0.07	0.24	0.17	0.24	0.15	0.08	0.14	0.11	0.09	0.09	0.04	0.17	0.11
T65	0.04	0.17	0.08	0.14	0.08	0.06	0.04	0.08	0.09	0.09	0.01	0.10	0.07
T66	0.03	0.11	0.05	0.12	0.11	0.05	0.09	0.12	0.05	0.06	0.08	0.08	0.08
T67	0.07	0.22	0.16	0.19	0.11	0.06	0.12	0.10	0.17	0.14	0.13	0.15	0.13
T68	0.03	0.05	0.02	0.09	0.03	0.10	0.03	0.07	0.24	0.25	0.11	0.09	0.13
T69	0.04	0.10	0.11	0.10	0.06	0.08	0.10	0.14	0.07	0.05	0.12	0.08	0.09
T70	0.10	0.34	0.16	0.24	0.17	0.18	0.21	0.15	0.12	0.24	0.25	0.20	0.19
T71	0.03	0.05	0.04	0.03	0.02	0.03	0.13	0.05	0.24	0.28	0.04	0.07	0.12
T72	0.07	0.20	0.14	0.19	0.09	0.04	0.12	0.09	0.09	0.09	0.13	0.13	0.10
T73	0.02	0.07	0.06	0.06	0.02	0.04	0.10	0.12	0.38	0.43	0.44	0.10	0.23
T74	0.13	0.21	0.16	0.18	0.11	0.13	0.21	0.12	0.36	0.38	0.42	0.19	0.26
T75	0.10	0.16	0.09	0.08	0.11	0.10	0.16	0.08	0.29	0.32	0.34	0.13	0.20
T76	0.14	0.19	0.06	0.11	0.13	0.04	0.05	0.02	0.31	0.23	0.21	0.14	0.16
T77	0.12	0.28	0.17	0.23	0.15	0.10	0.16	0.10	0.33	0.30	0.37	0.21	0.23
T78	0.11	0.26	0.17	0.24	0.12	0.03	0.06	0.11	0.22	0.23	0.10	0.18	0.15
T79	0.06	0.10	0.06	0.10	0.04	0.06	0.16	0.04	0.29	0.32	0.09	0.11	0.16
T80	0.06	0.10	0.07	0.11	0.04	0.10	0.22	0.13	0.22	0.31	0.28	0.11	0.19
T81	0.07	0.10	0.05	0.09	0.04	0.03	0.13	0.07	0.25	0.33	0.44	0.10	0.19
T82	0.05	0.11	0.08	0.09	0.05	0.05	0.06	0.07	0.35	0.42	0.43	0.12	0.22
T83	0.06	0.16	0.16	0.14	0.06	0.04	0.09	0.10	0.11	0.13	0.21	0.12	0.11
T84	0.04	0.11	0.13	0.12	0.05	0.06	0.21	0.13	0.19	0.22	0.27	0.11	0.16
T85	0.07	0.18	0.15	0.12	0.02	0.09	0.14	0.15	0.28	0.24	0.27	0.13	0.18
T86	0.12	0.15	0.09	0.11	0.08	0.10	0.18	0.16	0.37	0.38	0.48	0.15	0.25
T87	0.10	0.14	0.09	0.07	0.09	0.12	0.22	0.15	0.24	0.29	0.38	0.12	0.21
T88	0.03	0.07	0.03	0.03	0.02	0.06	0.10	0.18	0.29	0.22	0.05	0.07	0.13
T89	0.01	0.06	0.03	0.03	0.03	0.02	0.04	0.10	0.13	0.13	0.06	0.05	0.08
T90	0.03	0.10	0.05	0.05	0.05	0.03	0.10	0.21	0.26	0.05	0.04	0.07	0.10
T91	0.02	0.05	0.02	0.03	0.03	0.03	0.04	0.11	0.13	0.08	0.03	0.04	0.07
T92	0.02	0.06	0.07	0.06	0.02	0.05	0.08	0.03	0.03	0.04	0.15	0.05	0.05
T93	0.00	0.06	0.07	0.09	0.07	0.09	0.10	0.02	0.06	0.05	0.16	0.07	0.08
T94	0.01	0.07	0.09	0.12	0.12	0.14	0.12	0.02	0.04	0.05	0.19	0.09	0.09
T95	0.00	0.04	0.05	0.04	0.03	0.05	0.04	0.03	0.03	0.03	0.02	0.04	0.03
T96	0.02	0.04	0.03	0.02	0.01	0.10	0.04	0.06	0.06	0.03	0.04	0.03	0.04
T97	0.02	0.07	0.07	0.11	0.09	0.07	0.10	0.04	0.04	0.05	0.07	0.08	0.07
T98	0.02	0.03	0.03	0.02	0.02	0.07	0.09	0.02	0.02	0.03	0.04	0.03	0.04
T99	0.02	0.09	0.05	0.02	0.03	0.06	0.12	0.03	0.04	0.05	0.05	0.04	0.05
T100	0.03	0.10	0.05	0.06	0.01	0.06	0.09	0.03	0.03	0.05	0.10	0.05	0.05
T101	0.02	0.07	0.06	0.10	0.01	0.06	0.14	0.03	0.03	0.04	0.11	0.06	0.06
T102	0.01	0.08	0.01	0.13	0.00	0.12	0.14	0.01	0.06	0.04	0.19	0.06	0.08
T103	0.01	0.02	0.01	0.04	0.06	0.04	0.08	0.09	0.06	0.03	0.01	0.03	0.05
T104	0.03	0.04	0.04	0.07	0.04	0.04	0.09	0.12	0.05	0.01	0.04	0.05	0.06
T105	0.06	0.02	0.04	0.04	0.03	0.02	0.05	0.11	0.24	0.18	0.16	0.06	0.12
T106	0.06	0.06	0.05	0.07	0.02	0.04	0.03	0.08	0.29	0.25	0.18	0.09	0.14
T107	0.03	0.07	0.06	0.07	0.02	0.05	0.00	0.06	0.11	0.12	0.14	0.06	0.08
T108	0.03	0.06	0.05	0.05	0.01	0.02	0.09	0.10	0.25	0.25	0.18	0.07	0.14
T109	0.04	0.10	0.07	0.09	0.02	0.04	0.05	0.06	0.14	0.13	0.15	0.08	0.09
T110	0.07	0.04	0.01	0.03	0.03	0.01	0.01	0.08	0.07	0.12	0.04	0.04	0.06
T111	0.04	0.02	0.02	0.08	0.02	0.01	0.02	0.09	0.08	0.11	0.04	0.05	0.06
T112	0.09	0.08	0.08	0.09	0.06	0.01	0.05	0.06	0.08	0.05	0.09	0.07	0.06
T113	0.10	0.08	0.14	0.19	0.03	0.01	0.01	0.03	0.07	0.03	0.06	0.10	0.05
T114	0.08	0.07	0.05	0.10	0.03	0.05	0.04	0.05	0.08	0.01	0.06	0.06	0.05
T115	0.08	0.06	0.10	0.15	0.03	0.02	0.03	0.06	0.06	0.02	0.03	0.08	0.05
T116	0.04	0.14	0.17	0.15	0.13	0.05	0.13	0.11	0.04	0.04	0.10	0.11	0.09
T117	0.03	0.17	0.16	0.06	0.08	0.09	0.24	0.15	0.03	0.03	0.02	0.09	0.08

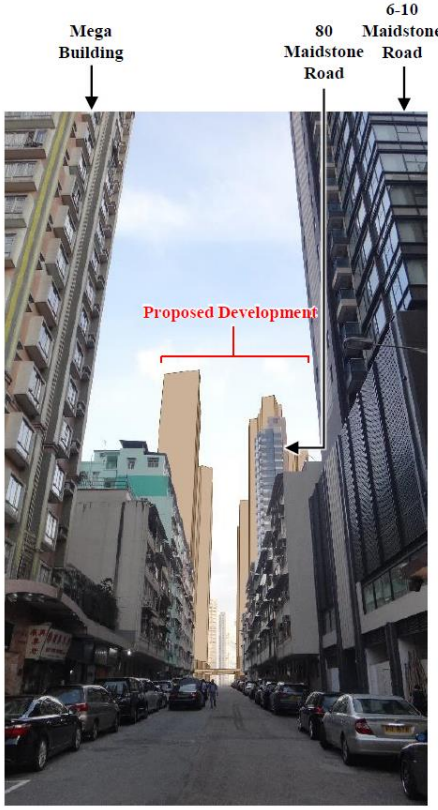
Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T118	0.02	0.15	0.16	0.10	0.10	0.08	0.10	0.06	0.03	0.14	0.12	0.11	0.09
T119	0.03	0.18	0.16	0.08	0.07	0.08	0.12	0.18	0.06	0.02	0.07	0.09	0.08
T120	0.07	0.21	0.07	0.11	0.07	0.04	0.06	0.15	0.10	0.10	0.10	0.10	0.09
T121	0.06	0.13	0.14	0.07	0.05	0.13	0.14	0.18	0.04	0.23	0.21	0.10	0.13
T122	0.14	0.25	0.13	0.08	0.03	0.12	0.07	0.17	0.19	0.22	0.19	0.13	0.15
T123	0.07	0.24	0.16	0.13	0.07	0.12	0.05	0.25	0.19	0.25	0.19	0.15	0.17
T124	0.08	0.27	0.18	0.21	0.09	0.06	0.04	0.25	0.36	0.26	0.24	0.19	0.21
T125	0.05	0.12	0.10	0.10	0.12	0.08	0.07	0.04	0.08	0.13	0.04	0.10	0.09
T126	0.02	0.12	0.08	0.21	0.21	0.09	0.07	0.07	0.07	0.10	0.17	0.14	0.12
T127	0.06	0.21	0.13	0.08	0.05	0.09	0.07	0.07	0.08	0.08	0.12	0.10	0.08
T128	0.09	0.18	0.20	0.24	0.17	0.10	0.06	0.06	0.07	0.12	0.15	0.17	0.12
T129	0.01	0.21	0.19	0.20	0.12	0.04	0.04	0.09	0.10	0.07	0.22	0.14	0.11
T130	0.03	0.15	0.14	0.17	0.12	0.07	0.05	0.19	0.27	0.22	0.26	0.15	0.18
T131	0.02	0.07	0.04	0.04	0.03	0.04	0.10	0.10	0.14	0.19	0.08	0.06	0.10
T132	0.03	0.12	0.06	0.08	0.03	0.06	0.09	0.11	0.14	0.08	0.14	0.07	0.09
T133	0.13	0.33	0.20	0.24	0.13	0.20	0.38	0.23	0.42	0.24	0.19	0.23	0.26
T134	0.07	0.28	0.16	0.26	0.17	0.05	0.11	0.04	0.26	0.29	0.26	0.20	0.20
T135	0.06	0.26	0.14	0.20	0.12	0.08	0.07	0.13	0.39	0.29	0.22	0.19	0.21
T136	0.13	0.32	0.16	0.22	0.14	0.04	0.08	0.04	0.35	0.29	0.27	0.20	0.20
T137	0.16	0.26	0.12	0.21	0.12	0.04	0.02	0.13	0.32	0.28	0.24	0.19	0.19
T138	0.05	0.03	0.08	0.21	0.15	0.05	0.06	0.02	0.33	0.31	0.25	0.16	0.19
T139	0.04	0.12	0.11	0.12	0.12	0.07	0.03	0.04	0.05	0.15	0.12	0.11	0.09
T140	0.03	0.11	0.04	0.15	0.03	0.04	0.09	0.16	0.07	0.10	0.09	0.08	0.09
T141	0.03	0.08	0.07	0.05	0.01	0.02	0.05	0.22	0.13	0.26	0.11	0.07	0.12
T142	0.05	0.05	0.05	0.06	0.05	0.07	0.16	0.22	0.15	0.06	0.18	0.06	0.12
T143	0.13	0.11	0.09	0.15	0.16	0.14	0.08	0.25	0.21	0.12	0.17	0.14	0.16
T144	0.09	0.28	0.20	0.26	0.19	0.16	0.10	0.19	0.15	0.12	0.29	0.20	0.18
T145	0.11	0.20	0.13	0.20	0.16	0.14	0.01	0.06	0.03	0.17	0.03	0.16	0.10
Average LVR	**0.06**	**0.13**	**0.10**	**0.12**	**0.08**	**0.07**	**0.09**	**0.09**	**0.14**	**0.14**	**0.15**	**0.11**	**0.12**
S01	0.08	0.18	0.06	0.19	0.14	0.08	0.05	0.06	0.03	0.05	0.20	0.12	0.09
S02	0.07	0.15	0.14	0.16	0.14	0.09	0.05	0.09	0.12	0.18	0.14	0.14	0.13
S03	0.09	0.18	0.11	0.07	0.11	0.08	0.01	0.10	0.18	0.20	0.18	0.11	0.13
S04	0.04	0.04	0.05	0.06	0.02	0.03	0.08	0.08	0.24	0.27	0.16	0.08	0.14
S05	0.02	0.12	0.07	0.09	0.08	0.02	0.12	0.06	0.20	0.18	0.23	0.09	0.13
S06	0.13	0.27	0.18	0.19	0.15	0.10	0.02	0.12	0.08	0.08	0.23	0.16	0.12
S07	0.08	0.20	0.17	0.18	0.14	0.09	0.02	0.02	0.10	0.11	0.33	0.15	0.12

Annex E

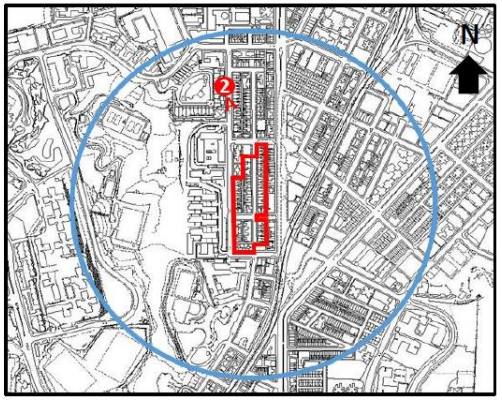
Extracted pages of Revised Visual Impact Assessment (VIA)

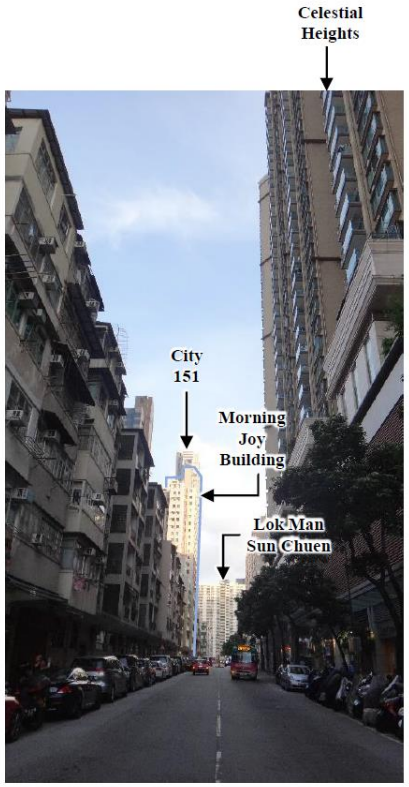
Existing Condition

Baseline Scheme (120mPD)

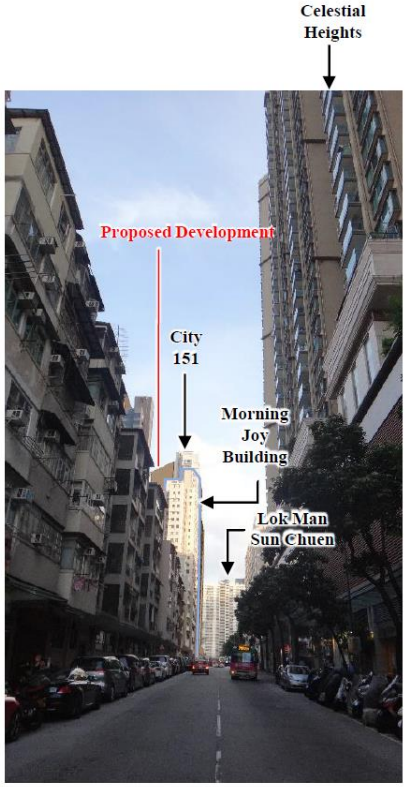


Proposed Scheme (140mPD)

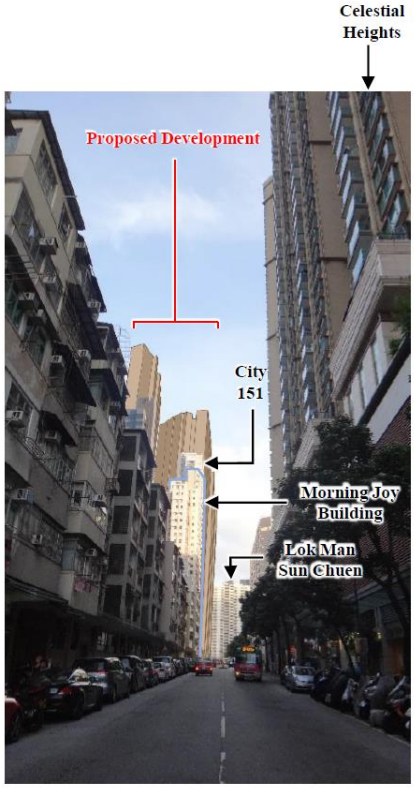




Existing Condition



Baseline Scheme (120mPD)



Proposed Scheme (140mPD)

Annex F

Extracted pages of Revised Traffic Impact Assessment (TIA)

4.5 Traffic Trips of the Proposed Development

4.5.1 In order to estimate the traffic generation and attraction of the proposed development, reference has been made to the trip generation rates as stipulated in Volume 1 Chapter 3 Appendix D Table 1 of the latest T.P.D.M. published by Transport Department. The adopted trip rates are summarized in below **Table 4.5**.

Table 4.5 Adopted Traffic Trips Rate of Proposed Development

Use	Units	Trip Rate			
		Weekday AM Peak		Weekday PM Peak	
		Gen.	Att.	Gen.	Att.
Retail	pcu/hr/100 sqm GFA	0.2296	0.2434	0.3100	0.3563
Private Housing (Average Flat Size 60m^2)	pcu/hr/flat	0.0718	0.0425	0.0286	0.0370
Public Vehicle Carpark(1)	*Observed trips (pcu/hr)*	*62*	*73*	*39*	*65*
	pcu/hr /parking space	0.0771	0.0907	0.0493	0.0811

(1) Based on survey on Hung Hom Station Carpark (About 801 parking space) carried on March 2019 from 0700 to 1900. The peaks occurs at 0745 to 0845 and 1545 to 1645 respectively.

4.5.2 Based on the adopted trip rate listed in the above **Table 4.5** and the development parameters in **Table 2.1**, the trip generated and attracted by the proposed development are estimated and summarized in **Table 4.6**.

Table 4.6 Estimated Traffic Trips of the Proposed Development

Site	Use	Weekday AM Peak (pcu/hr)		Weekday PM Peak (pcu/hr)	
		Gen.	Att.	Gen.	Att.
Northern Site	Residential	99	58	39	51
	Non-Domestic	20	21	27	31
	Public Vehicle Carpark (Net Increase 64 Nos.)	5	6	3	5
	Sub Total	***124***	***86***	***71***	***90***
Southern Site	Residential	68	40	27	35
	Non-Domestic	16	17	21	25
	Sub Total	***84***	***57***	***48***	***60***
Total		**208**	**143**	**119**	**150**

4.5.3 There are about 100 nos. of on-street private parking spaces would be affected due to this proposed development. A PVP with total 164 nos. of private car parking spaces will be re-provided within the Scheme area to address the local demand. Based on the observation, there are illegally parking along Maidstone lane at present, these illegal parking would be absorbed by these additional number of spaces in the proposed PVP.

Table 4.8 V/C Ratio of Critical Road Link in Year 2036

Index	Direction	Cap. (veh/hr) (C)	Reference Case				Design Case			
			Flow (veh/hr) (V)		V/C		Flow (veh/hr) (V)		V/C	
			AM Peak	PM Peak	AM Peak	PM Peak	AM Peak	PM Peak	AM Peak	PM Peak
L1	Two-way	1700	1125	835	0.66	0.49	1125	835	0.66	0.49
L2	NB	4200	1175	1225	0.28	0.29	1175	1225	0.28	0.29
L2	SB	4200	1690	1425	0.40	0.34	1690	1425	0.40	0.34
L3	Two-way	1700	1325	920	0.78	0.54	1340	930	0.79	0.55
L4	Two-way	1700	585	540	0.34	0.32	710	615	0.42	0.36
L5	NB	4200	705	695	0.17	0.17	705	695	0.17	0.17
L5	SB	4200	1765	1500	0.42	0.36	1805	1525	0.43	0.36
L6	Two-way	1700	215	160	0.13	0.09	245	195	0.14	0.11
L7	NB	4200	805	785	0.19	0.19	850	830	0.20	0.20
L7	SB	4200	1085	980	0.26	0.23	1130	1005	0.27	0.24
L8	NB	4200	585	535	0.14	0.13	610	545	0.15	0.13
L8	SB	4200	705	555	0.17	0.13	705	555	0.17	0.13
L9	NB	4200	2165	2080	0.52	0.50	2170	2095	0.52	0.5
L9	SB	4200	2520	2000	0.60	0.48	2540	2010	0.60	0.48

Notes: (1) Index please refer to Figure 3.1

4.7.2 The assessment result in **Tables 4.7 and 4.8** reveals that all junctions and road links would operate with ample capacities in both reference and design scenarios in year 2036, except Junctions B and C.

4.7.3 The proposed improvement scheme will be discussed in the upcoming **Section 4.8**.

4.8 Proposed Improvement Scheme

4.8.1 Improvement scheme of Junction B (Tin Kwong Road / Kau Pui Lung Road) – By revising the MOC, the RC of the junction could be improved. To further strengthen the safety of the split arrangement, double white line is added to Tin Kwong Road westbound to separate the split movement. The proposed layout is presented in **Figure 4.4**.

4.8.2 Improvement scheme of Junction C (Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road) – By amending the road marking at Ma Hang Chung Road to improve the junction performance. The proposed layout is presented in **Figure 4.5**.

4.8.3 Improvement scheme of Junction F (Chi Kiang Street / Ko Shan Road) - As section of Kiang Su Street will be closed and became part of the Site, vehicles from Kau Pui Lung Road can no longer access to Ma Tau Wai Road Northbound via Kiang Su

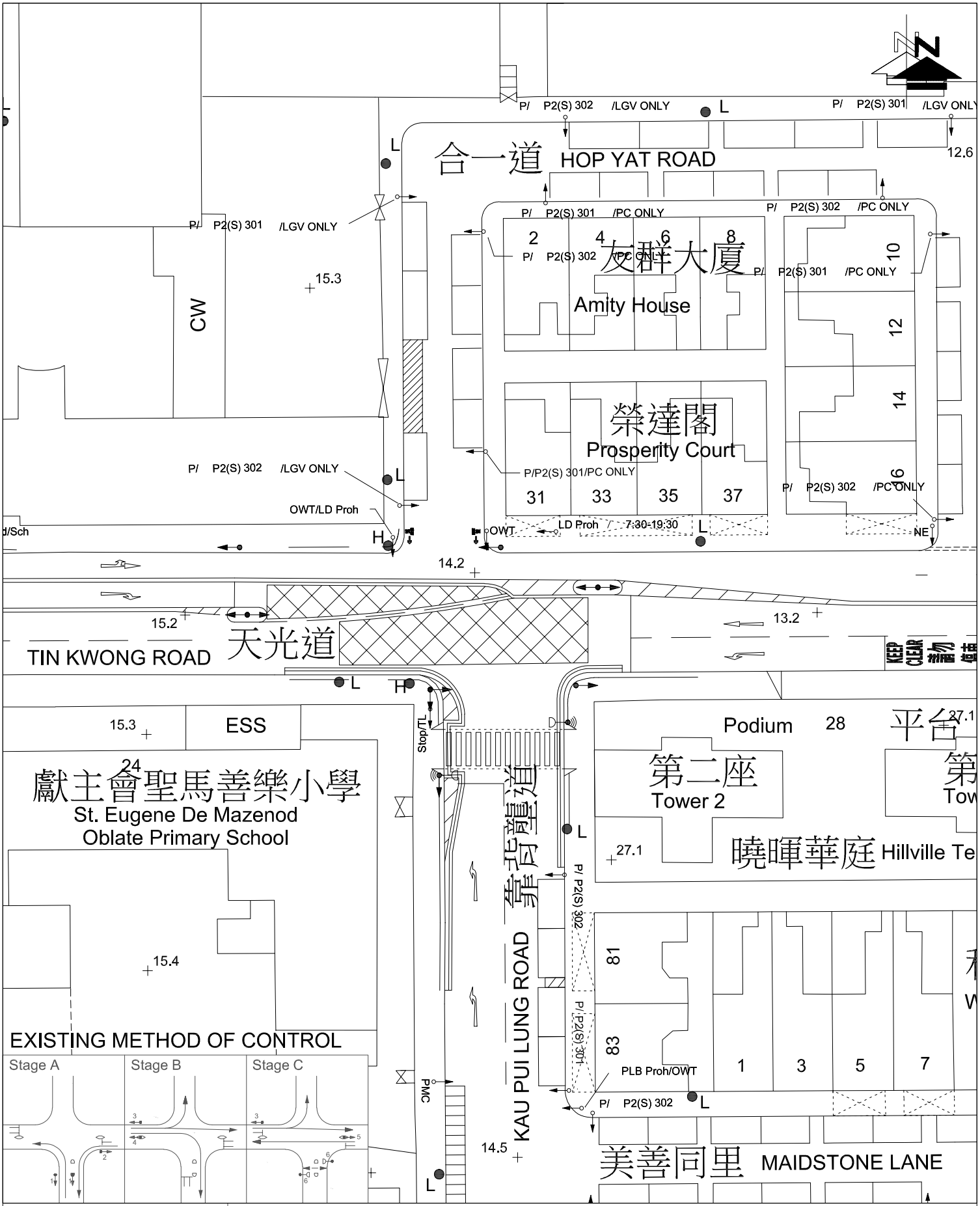


FIGURE NO.: 3.3	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF TIN KWONG ROAD / KAU PUI LUNG ROAD / HOP YAT ROAD (B)
SCALE: 1 : 500 @ A4 / DATE: 08 MAR 2023	CTA Consultants Limited 志達顧問有限公司

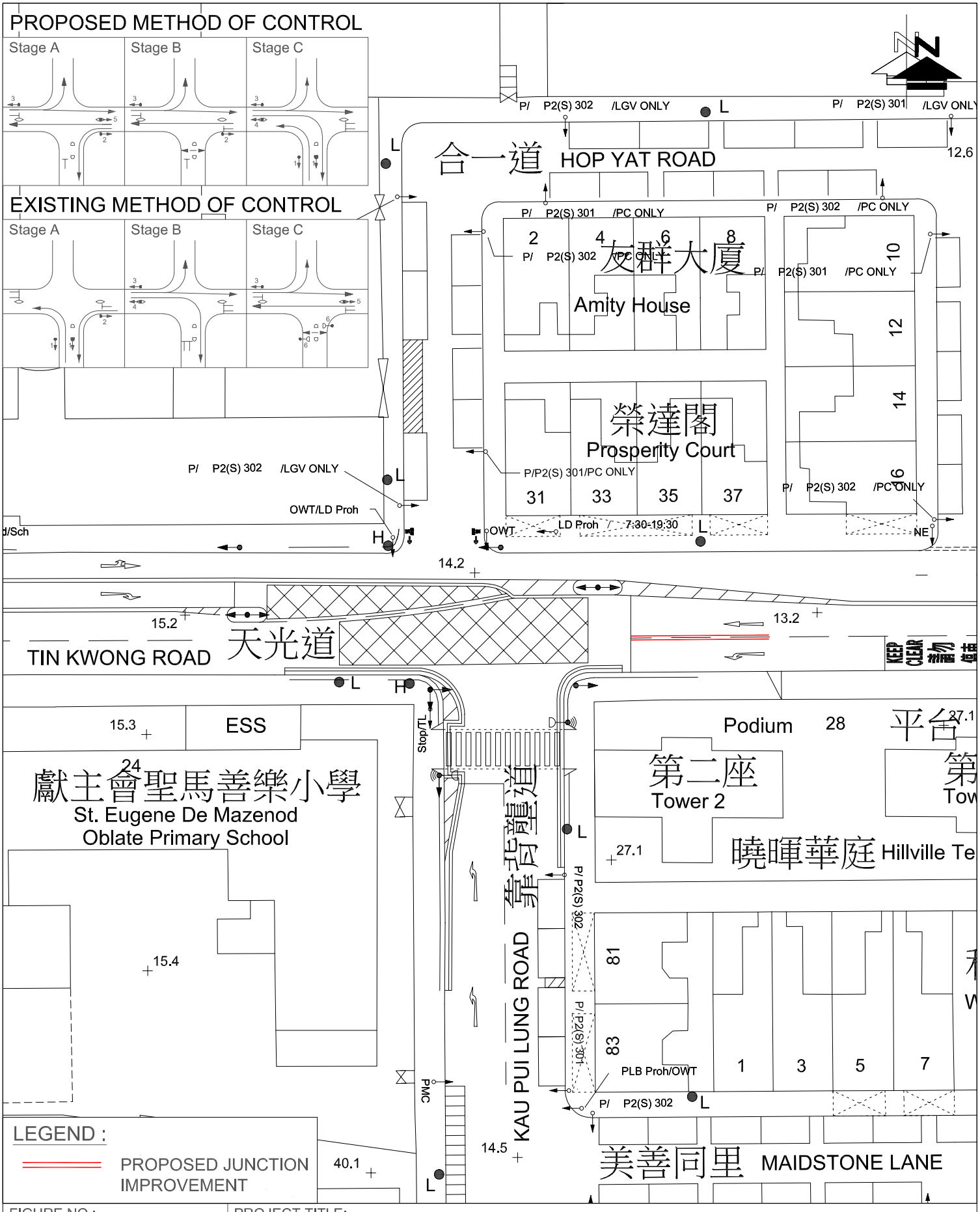


FIGURE NO.: 4.4	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF TIN KWONG ROAD / KAU PUI LUNG ROAD / HOP YAT ROAD (B)
SCALE: 1 : 500 @A4 / DATE: 08 MAR 2023	CTA Consultants Limited 志達顧問有限公司

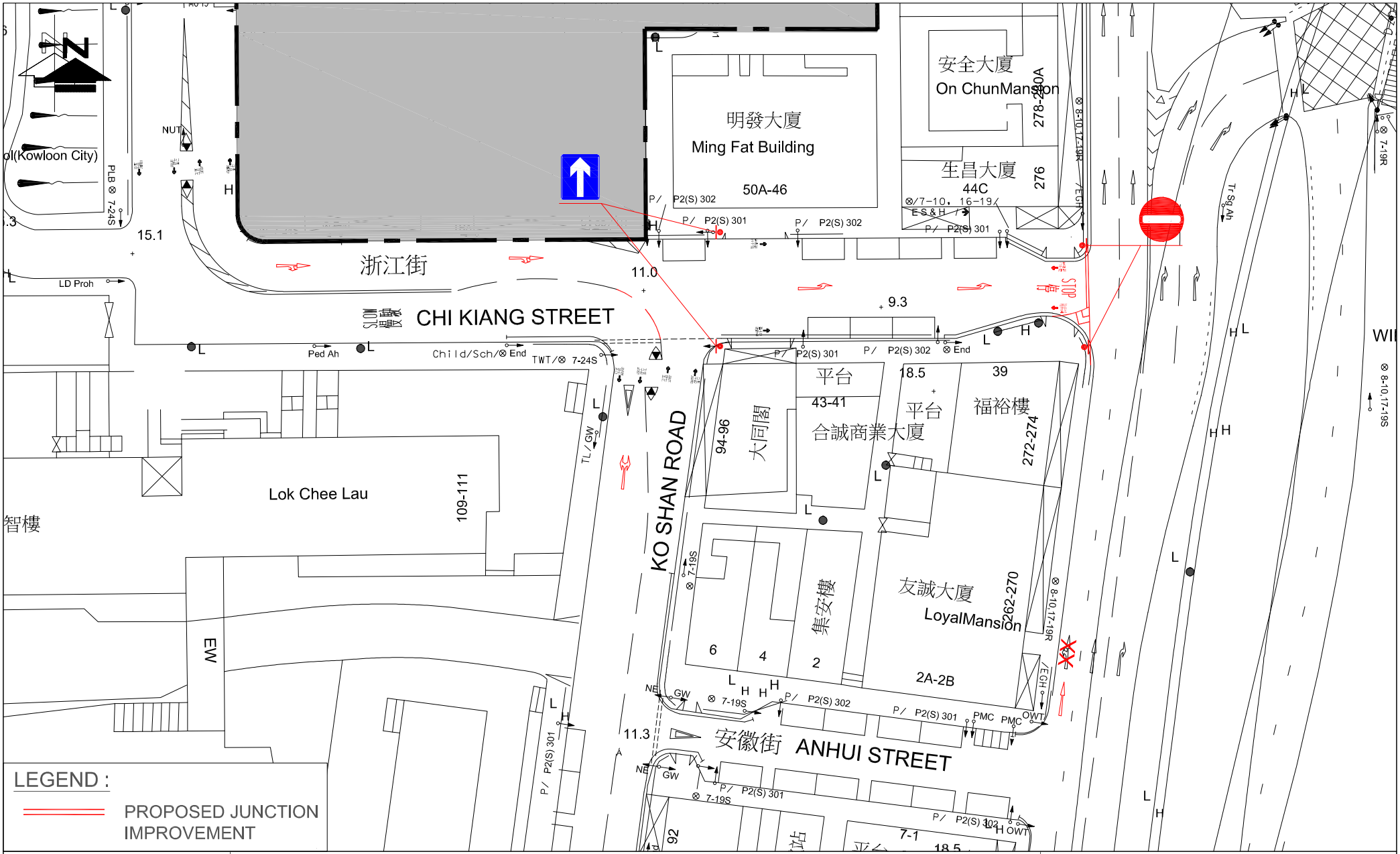
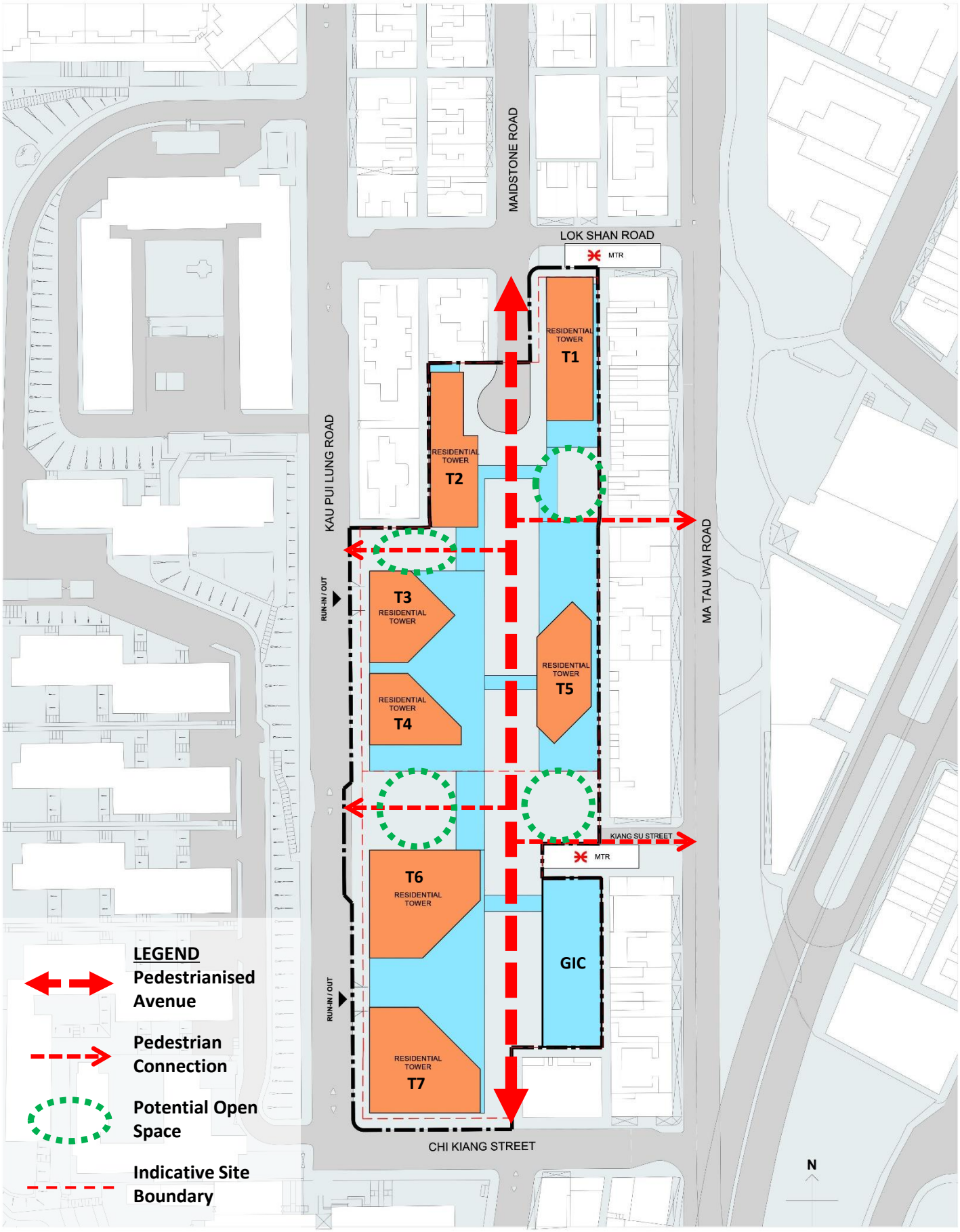


FIGURE NO.: 4.6	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF CHI KIANG STREET / KO SHAN ROAD (F)
SCALE: 1 : 600 @A4	DATE: 08 MAR 2023

CTA Consultants Limited
志達顧問有限公司

Annex G

Figure 1.5

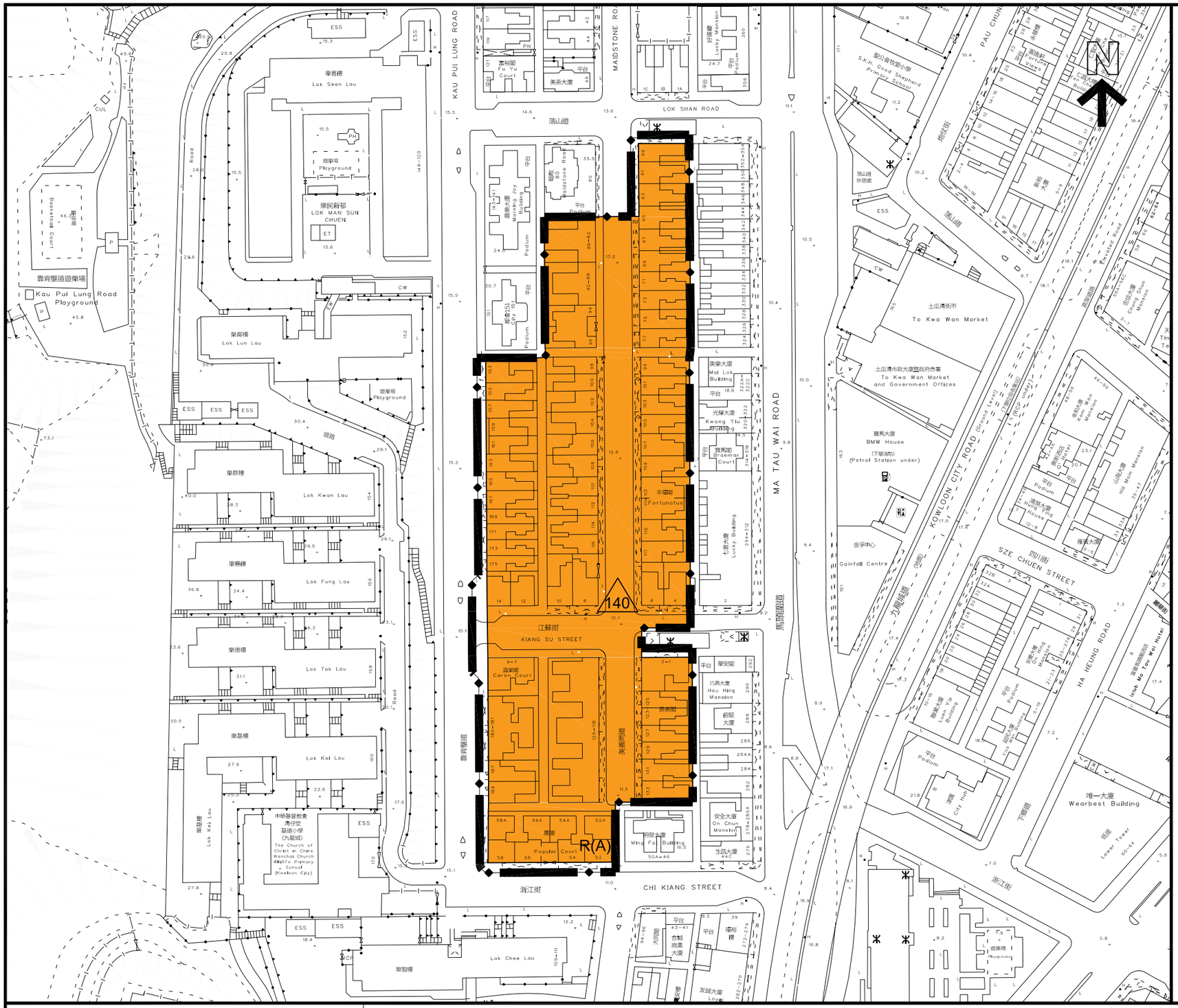


(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Pedestrian Connection and Potential Open Space	**Figure 1.5**

Annex H

Revised Draft DSP with Notes and Explanatory Statement (RtoC 9)



圖例
NOTATION

BOUNDARY OF DEVELOPMENT SCHEME ..... 發展計劃範圍界線

RESIDENTIAL (GROUP A) ..... R(A) ..... 住宅(甲類)

MAJOR ROAD AND JUNCTION ..... 主要道路及路口

MAXIMUM BUILDING HEIGHT (IN METRES ABOVE PRINCIPAL DATUM) ..... 140 ..... 最高建築物高度(在主水平基準上若干米)

夾附的<<註釋>>屬這份圖則的一部分

THE ATTACHED NOTES ALSO FORM PART OF THIS PLAN

2023年 月 日城市規劃委員會根據市區重建局條例第25(6)(a)條認為圖則適宜公布，並於2023年 月 日按照城市規劃條例第5條展示。

PLAN DEEMED SUITABLE BY THE TOWN PLANNING BOARD FOR PUBLICATION UNDER SECTION 25(6)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE ON 2023 AND EXHIBITED UNDER SECTION 5 OF THE TOWN PLANNING ORDINANCE ON 2023.

SECRETARY, TOWN PLANNING BOARD 城市規劃委員會秘書

香港城市規劃委員會依據城市規劃條例擬備的市區重建局靠背壟道/浙江街發展計劃圖則
TOWN PLANNING ORDINANCE, HONG KONG TOWN PLANNING BOARD URBAN RENEWAL AUTHORITY KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME PLAN

SCALE 1 : 1500 比例尺

米METRES 10 0 10 20 30 40 50 METRES 米

依據市區重建局條例第25(3)(a)條擬備

PREPARED UNDER SECTION 25(3)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE

圖則編號 PLAN No. S/K10/URA2/A

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

NOTES

(N.B. These form part of the Plan)

(1) These Notes show the uses or developments on land falling within the boundaries of the Plan which are always permitted and which may be permitted by the Town Planning Board, with or without conditions, on application. Where permission from the Town Planning Board for a use or development is required, the application for such permission should be made in a prescribed form. The application shall be addressed to the Secretary of the Town Planning Board, from whom the prescribed application form may be obtained.

(2) Any use or development which is always permitted or may be permitted in accordance with these Notes must also conform to any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, as may be applicable.

(3) (a) No action is required to make the existing use of any land or building conform to this Plan until there is a material change of use or the building is redeveloped.

(b) Any material change of use or any other development (except minor alteration and/or modification to the development of the land or building in respect of the existing use which is always permitted) or redevelopment must be always permitted in terms of the Plan or, if permission is required, in accordance with the permission granted by the Town Planning Board.

(c) For the purposes of subparagraph (a) above, "existing use of any land or building" means –

(i) before the publication in the Gazette of the notice of the first statutory plan covering the land or building (hereafter referred as 'the first plan'),

- a use in existence before the publication of the first plan which has continued since it came into existence; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building; and

(ii) after the publication of the first plan,

- a use permitted under a plan which was effected during the effective period of that plan and has continued since it was effected; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building and permitted under a plan prevailing at the time when the use or change of use was approved.

(4) Except as otherwise specified by the Town Planning Board, when a use or material change of use is effected or a development or redevelopment is undertaken, as always permitted in terms of the Plan or in accordance with a permission granted by the Town Planning Board, all permissions granted by the Town Planning Board in respect of the site of the use or material change of use or development or redevelopment shall lapse.

(5) Road widths, road junctions and alignments of roads may be subject to minor adjustments as detailed planning proceeds.

(6) Temporary uses (expected to be 5 years or less) of any land or building are always permitted as long as they comply with any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, and there is no need for these to conform to the zoned use or these Notes. For temporary uses expected to be over 5 years, the uses must conform to the zoned use or these Notes.

(7) The following uses or developments are always permitted on land falling within the boundaries of the Plan except where the uses or developments are specified in Column 2 of the Schedule of Uses:

(a) provision, maintenance or repair of plant nursery, amenity planting, open space, rain shelter, refreshment kiosk, road, bus/public light bus stop or lay-by, cycle track, Mass Transit Railway station entrance, Mass Transit Railway structure below ground level, taxi rank, nullah, public utility pipeline, electricity mast, lamp pole, telephone booth, telecommunications radio base station, automatic teller machine and shrine; and

(b) geotechnical works, local public works, road works, sewerage works, drainage works, environmental improvement works, marine related facilities, waterworks (excluding works on service reservoir) and such other public works co-ordinated or implemented by Government.

(8) In any area shown as 'Road', all uses or developments except those specified in paragraph (7) above and those specified below require permission from the Town Planning Board:
toll plaza, on-street vehicle park and railway track.

(9) Unless otherwise specified, all building, engineering and other operations incidental to and all uses directly related and ancillary to the permitted uses and developments within the same zone are always permitted and no separate permission is required.

(10) In these Notes, "existing building" means a building, including a structure, which is physically existing and is in compliance with any relevant legislation and the conditions of the Government lease concerned.

(11) Any development not compatible with the Urban Renewal Authority's Development Scheme for the area is prohibited by virtue of section 25(4) of the Urban Renewal Authority Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

Schedule of Uses

	Page
RESIDENTIAL (GROUP A)	1

S/K10/URA2/A

RESIDENTIAL (GROUP A)

Column 1 Uses always permitted	Column 2 Uses that may be permitted with or without conditions on application to the Town Planning Board
Ambulance Depot Flat Government Use (not elsewhere specified) House Library Market Place of Recreation, Sports or Culture Public Clinic Public Transport Terminus or Station (excluding open-air terminus or station) Public Vehicle Park (excluding container vehicle) Residential Institution School (in free-standing purpose-designed building only) Social Welfare Facility Utility Installation for Private Project	Commercial Bathhouse/ Massage Establishment Eating Place Educational Institution Exhibition or Convention Hall Government Refuse Collection Point Hospital Hotel Institutional Use (not elsewhere specified) Mass Transit Railway Vent Shaft and/or Other Structure above Ground Level other than Entrances Office Petrol Filling Station Place of Entertainment Private Club Public Convenience Public Transport Terminus or Station (not elsewhere specified) Public Utility Installation Religious Institution School (not elsewhere specified) Shop and Services (not elsewhere specified) Training Centre

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

In addition, the following uses are always permitted (a) on the lowest three floors of a building, taken to include basements; or (b) in the purpose-designed non-residential portion of an existing building, both excluding floors containing wholly or mainly car parking, loading / unloading bay and / or plant room:	

Eating Place
Educational Institution
Institutional Use (not elsewhere specified)
Off-course Betting Centre
Office
Place of Entertainment
Private Club
Public Convenience
Recyclable Collection Centre
School
Shop and Services
Training Centre

Planning Intention

This zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, Government, institution or community (GIC) facilities, at-grade pedestrianized avenue/ event plaza and public open space. Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building.

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

Remarks

(1) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in the plot ratio for the building upon development and/or redevelopment in excess of 8.0 for a domestic building or 9.0 for a building that is partly domestic and partly non-domestic, or the plot ratio of the existing building, whichever is the greater. Except where the plot ratio is permitted to be exceeded under paragraphs (7) and/or (8) hereof, under no circumstances shall the plot ratio for the domestic part of any building, to which this paragraph applies, exceed 8.0.

(2) For a non-domestic building to be erected on the site, the maximum plot ratio shall not exceed 9.0 except where the plot ratio is permitted to be exceeded under paragraphs (7) and/or (8) hereof.

(3) For the purposes of paragraph (1) above, no addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the relevant maximum domestic and/or non-domestic plot ratio(s), or the domestic and/or non-domestic plot ratio(s) of the existing building, whichever is the greater, subject to, as applicable –

(i) the plot ratio(s) of the existing building shall apply only if any addition, alteration and/or modification to or redevelopment of an existing building is for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building; or

(ii) the maximum domestic and/or non-domestic plot ratio(s) stated in paragraph (1) above shall apply if any addition, alteration and/or modification to or redevelopment of an existing building is not for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building.

(4) Not less than 400m^2 of public open space for public use at reasonable hours shall be provided.

(5) An underground public vehicle park shall be provided. Any floor space that is constructed or intended for use solely as public vehicle park as required by the Government, may be disregarded.

(6) In determining the relevant maximum plot ratio for the purposes of paragraphs (1) and (2) above, any floor space that is constructed or intended for use solely as car park, loading/unloading bay, plant room and caretaker's office, or caretaker's quarters and recreational facilities for the use and benefit of all the owners or occupiers of the domestic building or domestic part of the building,

provided such uses and facilities are ancillary and directly related to the development or redevelopment, may be disregarded. Any floor space that is constructed or intended for use solely as Government, institution or community facilities, as required by the Government, may also be disregarded.

(7) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the maximum building height in terms of metres above Principal Datum as stipulated on the Plan, or the height of the existing building, whichever is the greater.

(8) Where the permitted plot ratio as defined in Building (Planning) Regulations is permitted to be exceeded in circumstances as set out in Regulation 22(1) or (2) of the said Regulations, the plot ratio for the building on land to which paragraph (1) or (2) above applies may be increased by the additional plot ratio by which the permitted plot ratio is permitted to be exceeded under and in accordance with the said Regulation 22(1) or (2), notwithstanding that the relevant maximum plot ratio specified in the paragraphs (1) and (2) above may thereby be exceeded.

(9) Based on the individual merits of a development or redevelopment proposal, minor relaxation of the plot ratio and building height restrictions as stated in paragraphs (1), (2) and (7) above may be considered by the Town Planning Board on application under section 16 of the Town Planning Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

EXPLANATORY STATEMENT

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

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3.	OBJECT OF THE PLAN	2
4.	NOTES OF THE PLAN	3
5.	AREA COVERED BY THE PLAN	3
6.	EXISTING CONDITIONS	4
7.	PLANNING AND LAND USE PROPOSALS	4
8.	IMPLEMENTATION OF THE DEVELOPMENT SCHEME	7

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

EXPLANATORY STATEMENT

Note: For the purposes of the Town Planning Ordinance (the Ordinance), this statement shall not be deemed to constitute a part of the Plan.

1. INTRODUCTION

This Explanatory Statement is intended to assist an understanding of the draft Urban Renewal Authority (URA) Kau Pui Lung Road / Chi Kiang Street Development Scheme Plan (DSP) No. S/K10/URA2/A. It reflects the planning intention and objectives of the Town Planning Board (the Board) for the area covered by the Plan.

2. AUTHORITY FOR THE PLAN AND PROCEDURES

2.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive (CE), the URA was invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) is one of the pilot CBS redevelopment projects.

2.2 On 11 May 2020, Kau Pui Lung Road / Chi Kiang Street Development Scheme was approved by the Financial Secretary to be commenced in 2020/21. The Development Scheme was proposed to be processed under section 25 of the URA Ordinance (URAO).

2.3 On 22 May 2020, pursuant to section 23(1) of the URAO, the URA notified in the Government Gazette the commencement of implementation of the Kau Pui Lung Road / Chi Kiang Street Development Scheme.

2.4 On the same day of commencement (i.e. 22 May 2020), the URA submitted the draft URA Kau Pui Lung Road / Chi Kiang Street DSP to the Board under section 25(5) of the URAO.

2.5 During the public consultation period of the Development Scheme, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government bureaux / departments, has taken the opportunity to review the draft DSP to respond to the new policy directives entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Development Scheme to achieve wider planning gains to the community. On 3 November 2022, the URA has submitted a revised scheme of the draft DSP to the Board for consideration.

2.6 On XXXX, the Board, under section 25(6)(a) of the URAO, deemed the draft URA Kau Pui Lung Road / Chi Kiang Street DSP as being suitable for publication. Under section 25(7) of the URAO, the draft DSP, which the Board has deemed suitable for publication, is deemed to be a draft plan prepared by the Board for the purposes of the Ordinance.

2.7 On XXXX, the draft Kau Pui Lung Road / Chi Kiang Street DSP No. S/K10/URA2/1 (the Plan) was exhibited under section 5 of the Ordinance. By virtue of section 25(9) of the URAO, the Plan has from the date replaced the Ma Tau Kok Outline Zoning Plan (OZP) in respect of the area delineated and described herein.

3. OBJECT OF THE PLAN

The Plan illustrates that the Development Scheme Area (the Area) is designated as "Residential (Group A)" ("R(A)"). It is planned to be developed by means of the Development Scheme prepared under section 25 of the URAO. The Development Scheme intends to be primarily for high-density residential developments with the provision of an underground public vehicle park, Government, institution or community (GIC) facilities, at-grade pedestianised avenue/ event plaza and public open space (POS). Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building. The Development Scheme will be developed for private housing and SH, providing not less than 950 SH units, subject to liaison and agreement with relevant Government bureaux / departments at implementation stage.

4. NOTES OF THE PLAN

4.1 Attached to the Plan is a set of Notes which shows the types of uses or developments which are always permitted within the Area in this zone and which may be permitted by the Board, with or without conditions, on application. The provision for application for planning permission under section 16 of the Ordinance allows greater flexibility in land use planning and control of development to meet changing needs.

4.2 For the guidance of the general public, a set of definitions that explains some of the terms used in the Notes may be obtained from the Technical Services Division of the Planning Department and can be downloaded from the Board's website at http://www.info.gov.hk/tpb.

5. AREA COVERED BY THE PLAN

5.1 The Development Scheme boundary which is shown in heavy broken line on the Plan, covers a total area of about 16,473m^2 (subject to site survey). The Development Scheme involves a cluster of 30 CBS sites which is broadly bounded by a row of buildings at Ma Tau Wai Road to

the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

5.2 The Area includes all private lots, the government lanes, and portions of Maidstone Road and Kiang Su Street, and also includes public pavement at the periphery where affected buildings overhang within the Area.

5.3 Before the exhibition of the Plan, the Area was zoned "R(A)" and areas shown as 'Road' on the draft Ma Tau Kok OZP No. S/K10/29.

6. EXISTING CONDITIONS

6.1 The Development Scheme consists of buildings of 5 to 6 storeys high and they were built between 1959 and 1970 (i.e. all aged 50 or above). The buildings are all residential in nature and there is no retail shop within the Area. Most of the buildings are in "acceptable" conditions. All buildings are without lift or barrier-free access and the serviceability is poor.

6.2 The existing southern portion of Maidstone Road is a dead-end road, which is included in the Area for redevelopment. A portion of Kiang Su Street is also included in the Area for redevelopment.

7. PLANNING AND LAND USE PROPOSALS

7.1 On the Plan, the Area is zoned "R(A)" and areas shown as "Road". The Notes of the Plan indicated broadly the intended land uses within the Area. The area covered by the "R(A)" zone is about 15,475m^2, subject to site survey.

Uses

7.2 The "R(A)" zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, GIC facilities, at-grade pedestrianised avenue/ event plaza and POS. Commercial uses are always permitted on the lowest three floors of a

building or in the purpose-designed non-residential portion of an existing building.

7.3 The maximum plot ratio within the "R(A)" zone is 9.0, or the plot ratio of the existing building(s), whichever is the greater. Except where the plot ratio is permitted to be exceeded under the Notes of the Plan or under Building (Planning) Regulations 22(1) or (2), under no circumstances shall the plot ratio for the domestic part of any development exceed 8.0. The "R(A)" zone is also subject to a maximum building height restriction of 140 metres above Principal Datum.

7.4 The plot ratio control under "R(A)" zone is regarded as being stipulated in a "new or amended statutory plan" according to the Joint Practice Note No. 4 "Development Control Parameters Plot Ratio/Gross Floor Area", and shall be subject to the streamlining arrangements stated therein.

7.5 To provide design flexibility, minor relaxation of the plot ratio and building height restrictions may be considered by the Board on application under section 16 of the Ordinance taking into account its individual planning and design merits.

Urban Design Concept

7.6 The design of the Development Scheme will adopt an integrated approach. The tower disposition, podium massing and open space are considered as one development to maximise the benefits of replanning and restructuring and to allow the provision of pedestrianised avenue / event plaza and POS.

7.7 The massing of podia is minimised to create a pedestrian-friendly environment through urban design including utilisation of underground space. The footprint of the podia is limited in order to provide two ventilation corridors in north-south and east-west and for pedestrianised avenue / event plaza and POS. Not less than 400m^2 of POS and not less than 2,400m^2 of covered and uncovered area of the pedestrianised avenue / event plaza for public use at reasonable hours would be provided.

Pedestrianised Avenue / Event Plaza and Public Open Space

7.8 To remove the existing dead-end condition for a better pedestrian environment, portions of Maidstone Road and Kiang Su Street have been included as part of the Area for the creation of a pedestrianised avenue / event plaza within the Area. The pedestrianised avenue / event plaza will connect Lok Shan Road at the north and Chi Kiang Street at the south. It will also link to the two entrances of the Mass Transit Railway (MTR) To Kwa Wan Station at Lok Shan Road and Kiang Su Street respectively.

7.9 The pedestrianised avenue / event plaza will include uncovered and covered area with hard and soft landscape, event space and sitting area for public enjoyment. Ground floor of retail shops will be provided along both sides of the pedestrianised avenue /event plaza to enrich pedestrian experience and enhance street vibrancy. The pedestrianised avenue / event plaza will be maintained and managed by the URA or its future joint partner(s), or its assignee. The management and maintenance arrangement of the POS will be determined with relevant Government departments at land grant stage.

7.10 The pedestrianised avenue / event plaza will also integrate with the proposed underground pedestrian passageway with retail shops, which will create an underground shopping street. The proposed underground pedestrian passageway will be opened for public use during the opening hours of the non-domestic portion. It will connect to the two entrances of the MTR To Kwa Wan Station at Lok Shan Road and Kiang Su Street at basement level, subject to technical feasibility and agreement with relevant government departments and the MTR Corporation Limited. The re-planned multi-level pedestrian network will enhance overall connectivity, walkability and provide a car-free environment.

Underground Public Vehicle Park

7.11 An underground public vehicle park will be provided to re-provision the original on-street parking spaces and to cater for the demand for parking in the district. Not less than 164 public car parking spaces shall be provided in the underground car park as required by the Government.

Management of the underground public vehicle park will be arranged at the development stage.

Government, Institution or Community (GIC) Facilities

7.12 To meet the need for community facilities in the vicinity and the increased population after redevelopment, GIC uses are proposed in the Development Scheme. Not less than 2,500m^2 non-domestic gross floor area would be proposed for GIC use in the GIC block or within the non-domestic portion of the development, subject to confirmation of usage and funding from relevant Government departments. In order to facilitate provision of GIC facilities, in determining the relevant maximum plot ratio of the development and / or redevelopment, any floor space that is constructed or intended for use solely as GIC facilities, as required by the Government, may be disregarded.

Landscaping and Greening

7.13 A cohesive landscaping, tree planting and greening will be provided in the pedestrianised avenue / event plaza and POS to meet the Sustainable Building Design (SBD) Guidelines to enhance the local streetscape and walking environment. According to SBD Guidelines, minimum site coverage of greening of 20% of the net site area will be provided.

Air Ventilation

7.14 According to the air ventilation assessment report (AVA 2022) for the proposed development, the proposed building height reduces the bulkiness of the buildings and the number of building blocks and have smaller podia, which would enhance the wind flow penetration. Besides, two wind enhancement features will be provided, i.e. a minimum 15m-wide podia separation along Maidstone Road in the north-south direction; and a minimum 20m-wide podia separation along Kiang Su Street for east-west wind flow, with any footbridge, canopies, architectural features, open-side decks, sitting area and circulation space, etc., provided in between the podia shall be allowed, where appropriate and practicable. The two wind enhancement features would enhance wind flow penetration at pedestrian level. They would be incorporated in the design and layout of the future developments in the "R(A)" zone, subject

to minor adjustment of widths and alignments to be agreed with relevant government departments at detailed design stage.

8. IMPLEMENTATION OF THE DEVELOPMENT SCHEME

8.1 The proposals set out in the Plan form an integral part of the Development Scheme for the Area.

8.2 The URA does not own or lease any land within the boundaries of the Development Scheme and intends to acquire the properties within the Area of the Development Scheme. With respect to any of such properties which cannot be acquired by purchase, the Secretary for Development would consider, upon the application of the URA, recommending to the CE in Council the resumption of properties under the Lands Resumption Ordinance, if necessary.

8.3 All eligible tenants will be offered an ex-gratia payment package in accordance with the URA's policy. The URA has already entered into agreement with the Hong Kong Housing Society (HKHS) and the Hong Kong Housing Authority (HKHA) for the purpose of making available rehousing units by HKHS or HKHA to rehouse affected tenants who satisfy the eligibility criteria of HKHS or HKHA.

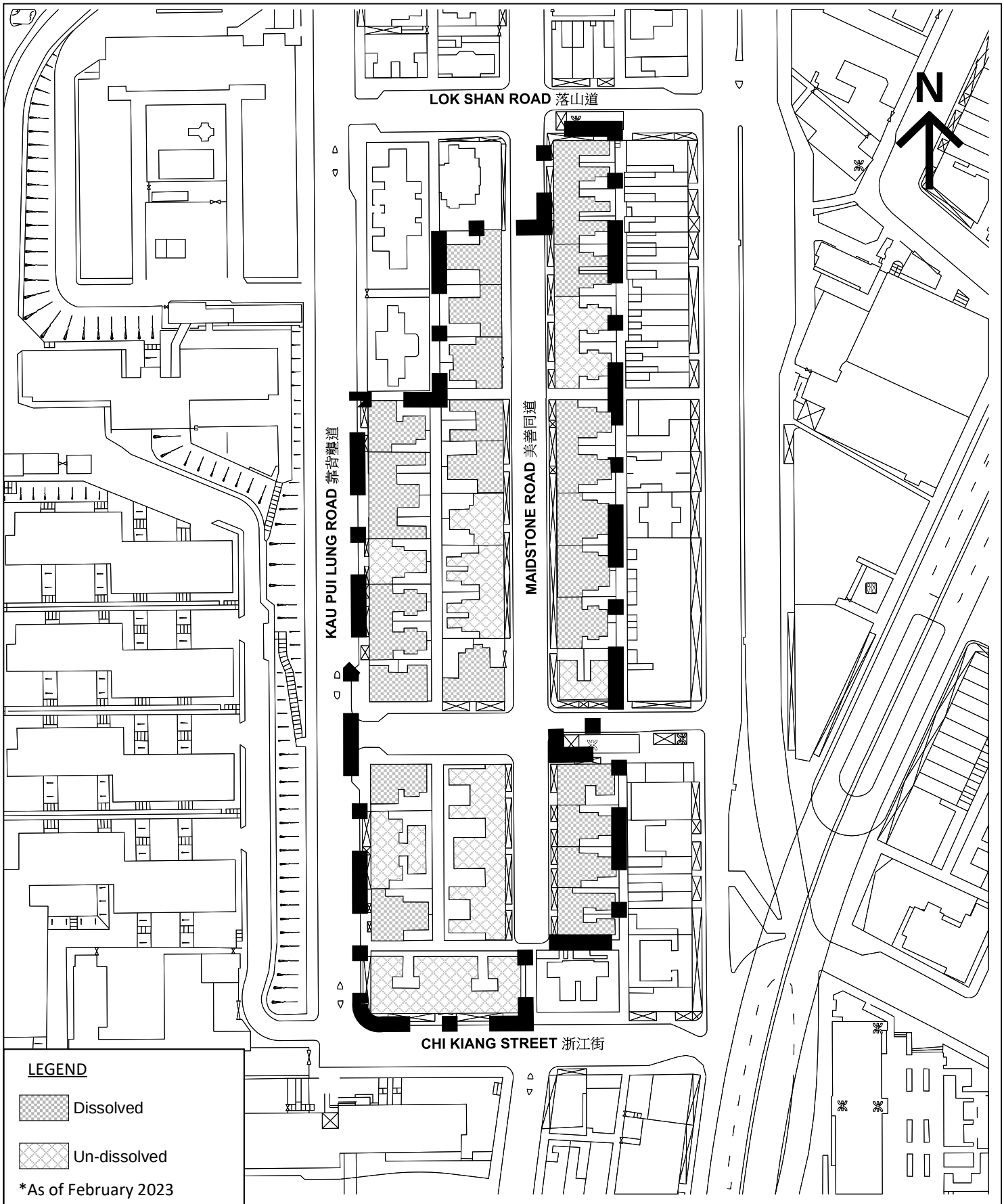
8.4 Non-domestic tenants (if any) of properties acquired by the URA whose tenancies are terminated by the URA due to implementation of the Development Scheme may be offered an ex-gratia allowance to assist in their business relocation.

8.5 Details of the acquisition, compensation and rehousing policies are subject to the URA's prevailing policies at the time of acquisition. The URA may implement the Development Scheme on its own or in association with one or more partners.

TOWN PLANNING BOARD
MARCH 2023

Annex I

Plan 7



THE SCHEME

EXTRACT PLAN PREPARED ON 09.03.23
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

DISSOLVED AND UN-DISSOLVED CBS PATTERN

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 7

Urban Renewal Authority
Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Consolidated Report

(Enclosure B – Part 1)

Part 1 – Enhanced Scheme	*Latest Submission	*Enhanced Scheme Batch 9 R-to-C (15 Mar 2023)
Planning Report Nov 2022 1. Planning Proposal 2. Planning and Design Merits	Enhanced Scheme (Nov 2022)	
Draft DSP, Notes, and ES	RtoC 8 (Feb 2023)	✓
Preliminary Design		
• **Figure 1.1:** Indicative Block Plan	Enhanced Scheme (Nov 2022)	
• **Figures 1.2-1.4:** Section Plans	Enhanced Scheme (Nov 2022)	
• **Figure 1.5:** Pedestrian Connection and Potential Open Space	RtoC 8 (Feb 2023)	✓
• **Figure 1.6:** Multi-level Pedestrian Linkages	RtoC 8 (Feb 2023)	
Technical Assessments		
• EA (AQIA, NIA, Waste Management)	Full Set: Combine Enhanced Scheme (Nov 2022) & RtoC 8 (Feb 2023)	✓
• SIA	Full Set: Combine Enhanced Scheme (Nov 2022) & RtoC 8 (Feb 2023)	✓
• DIA	Full Set: Combine Enhanced Scheme (Nov 2022) & RtoC 8 (Feb 2023)	✓
• AVA	Full Set: RtoC 8 (Feb 2023)	✓
• VIA	Full Set: RtoC 8 (Feb 2023)	✓
• TIA	Full Set: RtoC 8 (Feb 2023)	✓
• WSIA (Comparison Table)	Enhanced Scheme (Nov 2022)	
• QRA (Comparison Table)	Enhanced Scheme (Nov 2022)	
Updated Info of Submission in May 2020		
• Plan 7	RtoC 8 (Feb 2023)	✓
• Table 3.1	RtoC 8 (Feb 2023)	
• Implementation Programme	RtoC 8 (Feb 2023)	
Part 2 – Original Scheme		
Planning Report MAY 2020 **Part 1 - Planning Report**	May 2020	

- Executive Summary

1. Introduction
2. The Development Scheme Area
3. Background and Existing Conditions
   - Historical Background of the Scheme
   - Existing Uses, Building and Living Conditions
   - Surrounding Land Uses
   - Planned Development in the Vicinity
   - Existing Pedestrian Network
   - Demographic Background
   - Ownership Pattern
   ~~-> Table 3.1~~
4. Planning & Land Use Proposals
   ~~- Objective of the Scheme~~
   ~~- Development Intensity~~
   ~~- Conceptual Layout~~
   ~~- Internal Parking Provision and Vehicular Access~~
   ~~- Vehicular Circulation~~
   ~~- Provision of a Pedestrianised Avenue / Plaza~~
   ~~- Enhancement of connectivity in the Scheme~~
   ~~- Promoting walkability and place-making~~
   ~~- Provision of GIC Facilities and Open Space~~
   - Technical Assessments
     > Traffic Impact
     > Environmental Aspect
     > Air Ventilation
     > Drainage Impact
     > Sewerage Impact
     > Water Supply Impact
     > Visual Impact
     > Social Impact
     > Landscape Impact
~~5. Planning and Design Merits~~
6. Implementation of the Development Scheme

Plan 1: Location Plan
Plan 2: Site Plan
Plan 3: Existing Zoning of Development Scheme
Plan 4: Building Age
Plan 5: Building Height
Plan 6: Information on Buildings Immediately Adjacent

to the Scheme ~~Plan 7: Dissolved and Un-dissolved CBS Pattern~~ Plans 8 - 9: Site Photos ~~**Part 2 - The Draft Plan**~~ ~~1. Draft Development Scheme Plan~~ ~~2. Notes of the Plan~~ ~~3. Explanatory Statement~~ **Part 3 – Supplementary Information** ~~Appendix 1: Preliminary Design~~ ~~Appendix 2: TIA~~ ~~Appendix 3: EA~~ ~~Appendix 4: AVA~~ ~~Appendix 5: DIA~~ ~~Appendix 6: SIA~~ ~~Appendix 7: WSIA~~ ~~Appendix 8: VA~~ Appendix 9: Social Impact Assessment 1 ~~Appendix 10: Tentative Implementation Programme~~ Appendix 11: Acquisition and Resumption of Affected Properties Appendix 12: Rehousing and Ex-Gratia Payment Package for Domestic and Non-domestic Tenants		
Technical Assessments (Original Scheme 2020)		
• QRA	Full Set: RtoC 1	
• WSIA	Full Set: Combine Original Submission & RtoC 2	
SIA2	8 Jul 2020	
Part 3 – Responses to Public Comments		
• Stage 1	30 Dec 2020	
• Stage 2	Nov 2022	
Part 4 – Responses to Departmental Comments' Tables (Batches 1-8) (No appendices)		
After Submission of Original Scheme		
• Batch 1	Jul 2020	
• Batch 2	Sep 2020	
• Batch 3	Oct 2020	

• **Batch 4**	**Dec 2020**	
• **Batch 5**	**Mar 2021**	
• **Batch 6**	**Jun 2021**	
• **Batch 7**	**Mar 2022**	
After Submission of Enhanced Scheme		
• **Batch 8**	**Feb 2023**	

*As at 13 Mar 2023

Part 1 - Enhanced Scheme

Planning Report

(Nov 2022)

1. PLANNING PROPOSAL (REVISED DESIGN 2022)

1.1. This section provides a brief description of the notional design and planning proposal of the proposed development in the Scheme.

Key Development Parameters and Development Intensity

1.2. Under the draft DSP (refer to Part 3), the Scheme area in orange colour is proposed to be zoned "R(A)", which is primarily intended for high-density residential developments with the provision of Government, institution or community (GIC) facilities and commercial/retail uses at the podia, at-grade open space for public use and underground public vehicle park.

1.3. In response to the new policy directives of provide more Starter Homes (SH), the Scheme is proposed to provide private housing and provision of about 950 SH units. The Scheme will be considered as one site to be developed by the URA or its joint venture partner(s).

1.4. A maximum total Plot Ratio (PR) of 9 is adopted in the Scheme to optimise the site potential. New planning tool of PR interchangeability, with domestic PR = 8 and non-domestic PR = 1, is proposed in the Scheme to allow more flexibility on proposed development for better urban design and massing to echo with the local environment. The flat supply of the Scheme will be about five (5) times of the existing flat number, according to the approved GBP as of October 2022, increasing from about 460 to about 2,300 units.

1.5. Residential towers are proposed on top of podia. Retail will be provided on the ground floor and the basement floor, which is proposed to be connected with the MTR To Kwa Wan Station directly to enhance pedestrian connectivity and convenience.

1.6. Not less than 2,500sq.m. GFA of GIC facilities will be provided in the podia, subject to confirmation of usage and funding from relevant government departments. It is proposed a clause to be included in the "Remarks" of the proposed Notes of "R(A)" that "any floor space that is constructed or intended for use solely as GIC facilities, as required by the Government, may be disregarded from GFA/PR calculation".

1.7. To optimise underground space and to address the district parking needs, an underground public car park will be provided to reprovision the affected on-street parking spaces by the Scheme and additional parking spaces for public use. In determining the relevant maximum GFA of the redevelopment, any floor space that is constructed or intended for use solely as public vehicle park as required by the Government, may be disregarded.

1.8. With the re-structuring of land parcels to optimise massing and layout and to create both north-south and east-west ventilation corridors, a 20m height relaxation, i.e. from 120mPD to 140mPD, is proposed in the

Scheme.

Table 1.1 Proposed Development Parameters of the Scheme

Parameters	**Details**	
	Northern Site *	**Southern Site ***
Scheme Area*	16,473m^2	
Net Site Area**	15,475m^2	
Proposed Domestic GFA (PR)^	Around 123,800m^2 (8)	
Proposed Non-domestic GFA (PR)^	Around 15,475m^2 (1)	
GIC Provision (exempted from GFA calculation under planning regime)	Not less than 2,500m^2	
Total GFA (PR) (Excluded GIC GFA)	Around 139,275m^2 (9)	
No. of Flats@	About 1,374	About 950
Average Flat Size@	About 50m^2	About 58m^2
Proposed Maximum Building Height	Not more than 140mPD	
Public Car Parking Spaces in Public Vehicle Park (PVP)+	164	
Ancillary Private Car Parking Spaces%	611	
Ancillary Loading / Unloading Bays%	28 (15 LGV and 13 M/HGV bays)	

Remarks:

* The boundary between the Northern Site and the Southern Site is indicative and subject to site survey and changes.

** Net Site Area includes all private lots, the government lanes, the portion of Maidstone Road and Kiang Su Street within the Scheme.

^ The exact GFA and PR are subject to TPB approval, detailed design and prevailing Schedule 1 of the Building (Planning) Regulations.

@ Indicative only, subject to detailed design at project implementation stage.

\+ Include re-provision of 100 on-street private car parking spaces affected by the Scheme and subject to agreement with TD.

% Number of provision subject to detailed design and agreement with Transport Department (TD).

Conceptual Layout

1.9. Based on the proposed development parameters for the Scheme, **Part 5** shows the indicative block plan and section plan of the Scheme. The indicative block plan reflects only the general disposition of the towers and the design concept of the Scheme, while the landscape proposal and local open space provision will be ascertained in the detailed design stage. The proposed development parameters are set out in **Table 2.1** which is subject to adjustments in the detailed design stage.

Holistic replanning of land uses to optimise site potential

1.10. A holistic replanning of the uses within the Scheme to rationalise and optimise the land uses. The portions of Maidstone Road and Kiang Su Street within the Scheme are proposed to be permanently closed to achieve the following goals:

- Convert the dead-end condition of Maidstone Road to provide more space for pedestrianised avenues for safer traffic and car-free pedestrian environment;
- Integrated design of the proposed development to group all traffic servicing area, such that more area can be opened up for pedestrian flow;
- Create a roundabout for Maidstone Road near Lok Shan Road to enhance safer traffic; and
- Facilitate a more flexible building disposition and layout.

1.11. With the proposed closure of the two roads, the land parcels are re-configured to enable a more efficient block layout and disposition. Under the notional design of the Scheme, there will be 7 residential towers on top of podia, distributed in a north-south alignment along two sides of the Scheme area, with a wide at-grade pedestrianised avenue/ plaza provided in the middle part along the existing Maidstone Road. Building separation is created between towers to create two major east-west corridors within the Scheme.

1.12. Under the notional design, the Scheme is divided into two portions, namely the Northern Site and the Southern Site. The two residential towers at the southern portion of the Scheme area will be allocated for provision of SH units. The site boundary between the Northern Site and the Southern Site is indicative as shown in Figure 1.1 of Part 3, with the site boundary and the locations of the SH units subject to detailed design and change.

1.13. With the adoption of a higher domestic PR (8) for flat supply, a lower non-domestic PR (1) is adopted to maintain the development intensity to a total PR of 9 for the Scheme. Low-rise retail podia are created to accommodate the retail uses at ground level and 1 basement level only. The more human-scale retail podia will provide small-scale street front shops for daily necessities and shopping needs. This will create a more comfortable environment at street level and echo with the tranquil atmosphere of the locality.

Restructuring of Traffic and Pedestrian Network to enhance walkability and accessibility

1.14. With the closure of the portion of Maidstone Road and Kiang Su Street, a pedestrianised avenue integrated with event plaza, where appropriate, will be provided within the Scheme. The pedestrianised avenue will provide a north-south throughway within the Scheme area to provide a car-free walking environment connecting from Lok Shan Road to the north towards Chi Kiang Street to the south. It will also directly arrive to the at-grade MTR To Kwa Wan Station exits at Lok Shan Road and Kiang Su Street respectively. It will provide a convenient and safe pedestrian network for the neighbourhood.

1.15. Ground floor retail shops of the proposed development will be provided along both sides of the pedestrianised avenue to enrich passerby experience and enhance street vibrancy. The pedestrianised avenue/ event plaza will include uncovered and covered area with hard and soft landscape, commercial / retail components, event space and sitting area for public enjoyment. Cohesive landscaping, tree planting and vertical greening will be explored to improve the pedestrian friendly environment and create a sense of place.

1.16. The pedestrianised avenue/ event plaza will form part of the proposed development and will be maintained and managed by the URA or its assignee for place-making. Some place-making activities and commercial components such as musical playing, selling light refreshments can be organized at the pedestrianised avenues / event plazas in future to enhance the street vibrancy and provide quality open space for public enjoyment. The pedestrianised avenue/ event plaza will be opened for public use at reasonable hours to benefit the local community.

1.17. To further enhance connectivity, multi-level pedestrian network is proposed. Apart from the at-grade pedestrianised avenue, an underground shopping street will be provided with possible connection to the MTR To Kwa Wan Station at basement level. In addition, possible elevated bridge/deck linkages to connect between the podia within the Scheme will be explored at detailed design stage to not only serve the residents of the proposed development, but also providing rain cover for the pedestrianised avenue / plaza on the ground level.

1.18. With the restructuring of land uses and redevelopment, integrated design of the proposed development, some of the back lanes serving the existing buildings will no longer be required upon redevelopment. Integrated design of the proposed development will facilitate the grouping of internal transport facilities, including ingress/egress for ancillary carpark and public vehicle park and loading/unloading facilities of the proposed development, for more efficient use of land.

Building separation and building height relaxation for better urban design and environment

1.19. Under the notional design, careful building separation and disposition is considered to create wide openness as visual corridors. Two visual corridors are created within the Scheme, along the existing Maidstone Road and Kiang Su Street respectively. The massing of the proposed development will be carefully designed to minimise site coverage to allow a considerable width of the visual corridors, as well as comfortable pedestrian movement at-grade with possible on-street activities.

1.20. With the careful massing design and visual corridors provided, it helps to create two ventilation corridors in north-south (N-S) and east-west (E-W) directions to enhance comfort for these pedestrian friendly environment and event spaces. The revised Air Ventilation Assessment (AVA) demonstrates that the air breezeway along these two areas is enlarged and thus improve the air ventilation, especially on the pedestrian level. The results indicated that the proposed development in the Scheme could slightly enhance the wind flow in the Scheme Area and its nearby area.

1.21. To facilitate the above urban design consideration and to optimize the land potential, a relaxation of the maximum building height from 120mPD to 140mPD is proposed within the Scheme. The proposed 140mPD is still compatible to the building height restriction of the adjoining Lok Man Sun Chuen opposite to the Scheme.

1.22. A revised Visual Impact Assessment (VIA) is carried out to demonstrate that the proposed building height of 140mPD is compatible with the surrounding developments as viewed from main street angles in the vicinity and also without jeopardising the urban design principles of maintaining a stepping height profile towards the waterfront and without obstructing the ridgeline. The gap between the proposed building towers is much larger under the scenario of 140mPD, which results in a wider and better visual corridor in a medium distance. The two corridors in N-S and E-W directions will also serve for visual corridors at the pedestrian level, which will invite people to the car-free and environmental-friendly pedestrianised avenue / plaza.

1.23. If the maximum building height of 120mPD is kept for the proposed development as of the current OZP, bulkier building forms and one extra residential tower (i.e. total of 8 towers), comparing with the scenario of 140mPD, would be required. Under such scenario, although the layout on two sides of the N-S corridor could be kept to maintain the major N-S corridor, the E-W corridor is unavoidably interrupted under the Sustainable Building Design (SBD) Guidelines including the requirements on building façade length and building separation. Building separation will be much narrowed due to the increase of tower numbers and the limited site area. The planning gain of the Scheme will be diminished as it will jeopardise the opportunity to create a wider ventilation and visual corridor and reduced at-grade space for public use

and place-making.

1.24. The design will aim to meet the design guidelines stipulated in the SBD Guidelines by providing the requisite building separation, building permeability and greenery in the Scheme to enhance the environmental sustainability.

GIC provision and Open Space to benefit the community

1.25. To align with the "Single Site, Multiple Uses" initiatives as promoted by the Government, it is proposed to reserve not less than 2,500m^2 GFA for appropriate GIC facilities within the Scheme to meet the needs of the community, subject to confirmation from relevant government departments on the usage and funding availability to take up and operate the facilities.

1.26. A public open space (POS) of about 400m^2 is provided within the Scheme. The POS will be designed in conjunction or close to the pedestrianised avenue/ plaza in order to create a continuation of public space for more integrated design and use. Together with the provision of the pedestrianised avenue/ plaza, the Scheme will bring a considerable size of at-grade open space for the enjoyment of the community.

1.27. Local open space provision within the Scheme will follow the HKPSG and to be ascertained at detailed design.

Provision of Public Vehicle Park and Internal Transport Facilities

1.28. An underground public vehicle park (PVP) is proposed within the Scheme to provide about 164 parking spaces for the community. The PVP can facilitate the removal of the on-street parking spaces due to the proposed closure of Maidstone Road and Kiang Su Street for redevelopment. It will also provide opportunities for optimising the surrounding pedestrian environment and further improves walkability.

1.29. Ancillary basement car park will be provided for the proposed development. Vehicular ingress / egress will be provided at Kau Pui Lung Road for both the PVP and the ancillary car park of the proposed development. Proper management measures will be designed at implementation stage to meet the operation needs of the two car parks.

2. PLANNING AND DESIGN MERITS

2.1. The Revised Design 2022 will provide the following planning and environmental benefits:-

- Full utilisation of development potential of the site for high density development in the urban district to increase flat supply to about five time more than the exiting flat number;

- About 950 units of SH units will be provided within the Scheme to meet different market needs;

- More efficient use of land by including a dead-end road in the Scheme, forming a comparatively consolidated land parcel;

- Provision of GIC facilities and open space for public use and enjoyment;

- Provision of public parking spaces for community use and provide opportunities to remove on-street parking spaces to optimise pedestrian environment;

- Creation of pedestrianised avenue / plaza to provide car-free environment and event space for safe and pedestrian friendly walking environment;

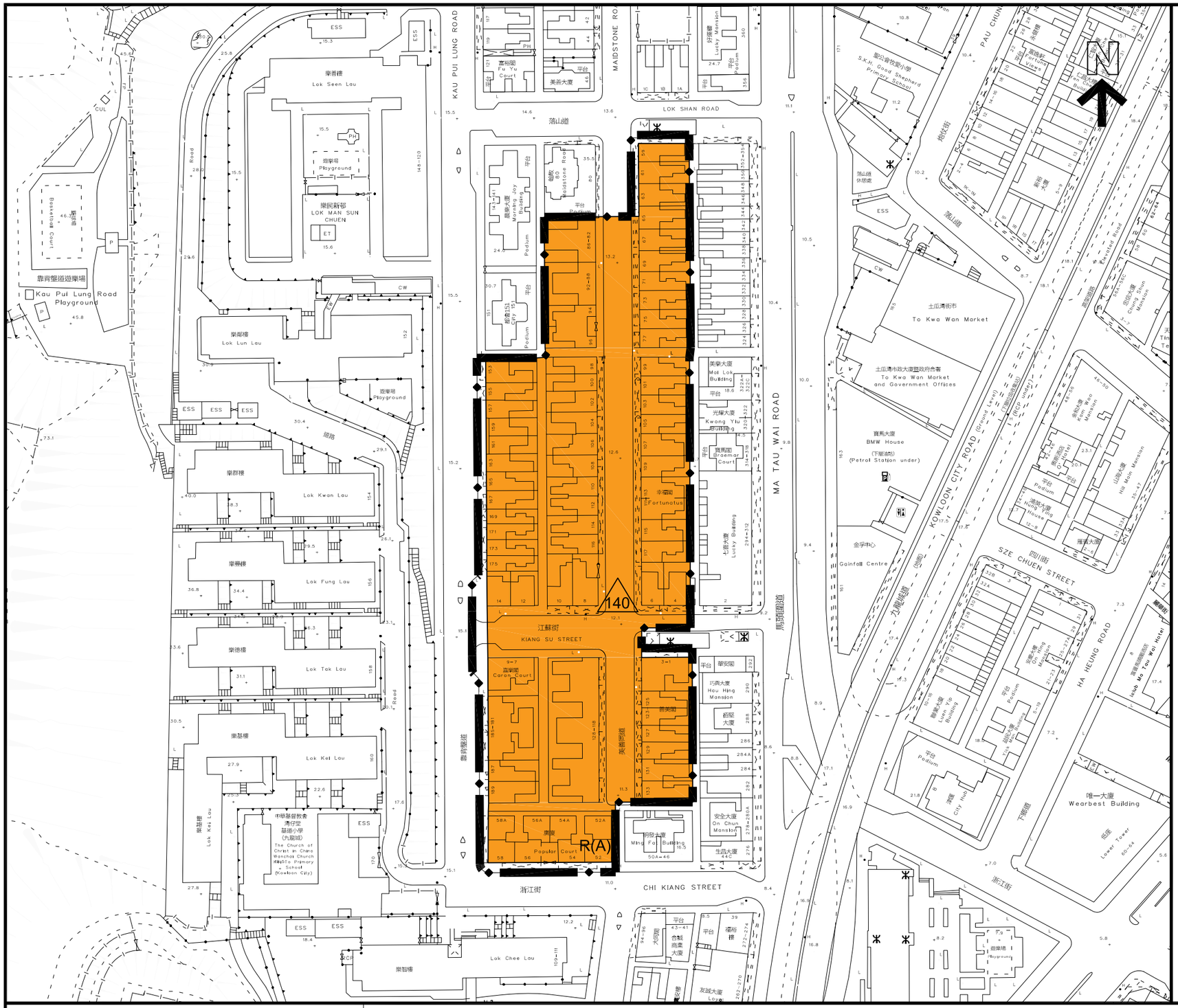
- Creation of both at-grade and underground pedestrian networks connected with the MTR Station to enhance walkability and accessibility; and

- Better urban design to enhance air ventilation and landscaping of urban area.

URBAN RENEWAL AUTHORITY

November 2022

Revised Draft DSP with Draft Notes and Explanatory Statement (RtoC_8)
(Feb 2023)



圖例
NOTATION

BOUNDARY OF DEVELOPMENT SCHEME ..... 發展計劃範圍界線

RESIDENTIAL (GROUP A) ..... R(A) ..... 住宅(甲類)

MAJOR ROAD JUNCTION ..... 主要道路及路口

MAXIMUM BUILDING HEIGHT (IN METRES ABOVE PRINCIPAL DATUM) ..... 140 ..... 最高建築物高度(在主水平基準上若干米)

DRAFT

CONFIDENTIAL

夾附的<<註釋>>屬這份圖則的一部分

THE ATTACHED NOTES ALSO FORM PART OF THIS PLAN

2023年 月 日城市規劃委員會根據市區重建局條例第25(6)(a)條認為圖則適宜公布，並於2023年 月 日按照城市規劃條例第5條展示。

PLAN DEEMED SUITABLE BY THE TOWN PLANNING BOARD FOR PUBLICATION UNDER SECTION 25(6)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE ON 2023 AND EXHIBITED UNDER SECTION 5 OF THE TOWN PLANNING ORDINANCE ON 2023.

SECRETARY, TOWN PLANNING BOARD 城市規劃委員會秘書

香港城市規劃委員會依據城市規劃條例擬備的市區重建局靠背壟道/浙江街發展計劃圖則
TOWN PLANNING ORDINANCE, HONG KONG TOWN PLANNING BOARD URBAN RENEWAL AUTHORITY KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME PLAN

SCALE 1 : 1500 比例尺

米METRES 10 0 10 20 30 40 50 METRES 米

依據市區重建局條例第25(3)(a)條擬備

PREPARED UNDER SECTION 25(3)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE

圖則編號 PLAN No. S/K10/URA2/A

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

NOTES

(N.B. These form part of the Plan)

(1) These Notes show the uses or developments on land falling within the boundaries of the Plan which are always permitted and which may be permitted by the Town Planning Board, with or without conditions, on application. Where permission from the Town Planning Board for a use or development is required, the application for such permission should be made in a prescribed form. The application shall be addressed to the Secretary of the Town Planning Board, from whom the prescribed application form may be obtained.

(2) Any use or development which is always permitted or may be permitted in accordance with these Notes must also conform to any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, as may be applicable.

(3) (a) No action is required to make the existing use of any land or building conform to this Plan until there is a material change of use or the building is redeveloped.

(b) Any material change of use or any other development (except minor alteration and/or modification to the development of the land or building in respect of the existing use which is always permitted) or redevelopment must be always permitted in terms of the Plan or, if permission is required, in accordance with the permission granted by the Town Planning Board.

(c) For the purposes of subparagraph (a) above, "existing use of any land or building" means –

(i) before the publication in the Gazette of the notice of the first statutory plan covering the land or building (hereafter referred as 'the first plan'),

- a use in existence before the publication of the first plan which has continued since it came into existence; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building; and

(ii) after the publication of the first plan,

- a use permitted under a plan which was effected during the effective period of that plan and has continued since it was effected; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building and permitted under a plan prevailing at the time when the use or change of use was approved.

(4) Except as otherwise specified by the Town Planning Board, when a use or material change of use is effected or a development or redevelopment is undertaken, as always permitted in terms of the Plan or in accordance with a permission granted by the Town Planning Board, all permissions granted by the Town Planning Board in respect of the site of the use or material change of use or development or redevelopment shall lapse.

(5) Road widths, road junctions and alignments of roads may be subject to minor adjustments as detailed planning proceeds.

(6) Temporary uses (expected to be 5 years or less) of any land or building are always permitted as long as they comply with any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, and there is no need for these to conform to the zoned use or these Notes. For temporary uses expected to be over 5 years, the uses must conform to the zoned use or these Notes.

(7) The following uses or developments are always permitted on land falling within the boundaries of the Plan except where the uses or developments are specified in Column 2 of the Schedule of Uses:

(a) provision, maintenance or repair of plant nursery, amenity planting, open space, rain shelter, refreshment kiosk, road, bus/public light bus stop or lay-by, cycle track, Mass Transit Railway station entrance, Mass Transit Railway structure below ground level, taxi rank, nullah, public utility pipeline, electricity mast, lamp pole, telephone booth, telecommunications radio base station, automatic teller machine and shrine; and

(b) geotechnical works, local public works, road works, sewerage works, drainage works, environmental improvement works, marine related facilities, waterworks (excluding works on service reservoir) and such other public works co-ordinated or implemented by Government.

(8) In any area shown as 'Road', all uses or developments except those specified in paragraph (7) above and those specified below require permission from the Town Planning Board:
toll plaza, on-street vehicle park and railway track.

(9) Unless otherwise specified, all building, engineering and other operations incidental to and all uses directly related and ancillary to the permitted uses and developments within the same zone are always permitted and no separate permission is required.

(10) In these Notes, "existing building" means a building, including a structure, which is physically existing and is in compliance with any relevant legislation and the conditions of the Government lease concerned.

(11) Any development not compatible with the Urban Renewal Authority's Development Scheme for the area is prohibited by virtue of section 25(4) of the Urban Renewal Authority Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

Schedule of Uses

	Page
RESIDENTIAL (GROUP A)	1

S/K10/URA2/A

RESIDENTIAL (GROUP A)

Column 1 Uses always permitted	Column 2 Uses that may be permitted with or without conditions on application to the Town Planning Board
Ambulance Depot Flat Government Use (not elsewhere specified) House Library Market Place of Recreation, Sports or Culture Public Clinic Public Transport Terminus or Station (excluding open-air terminus or station) Public Vehicle Park (excluding container vehicle) Residential Institution School (in free-standing purpose-designed building only) Social Welfare Facility Utility Installation for Private Project	Commercial Bathhouse/ Massage Establishment Eating Place Educational Institution Exhibition or Convention Hall Government Refuse Collection Point Hospital Hotel Institutional Use (not elsewhere specified) Mass Transit Railway Vent Shaft and/or Other Structure above Ground Level other than Entrances Office Petrol Filling Station Place of Entertainment Private Club Public Convenience Public Transport Terminus or Station (not elsewhere specified) Public Utility Installation Religious Institution School (not elsewhere specified) Shop and Services (not elsewhere specified) Training Centre

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

In addition, the following uses are always permitted (a) on the lowest three floors of a building, taken to include basements; or (b) in the purpose-designed non-residential portion of an existing building, both excluding floors containing wholly or mainly car parking, loading / unloading bay and / or plant room:	

Eating Place
Educational Institution
Institutional Use (not elsewhere specified)
Off-course Betting Centre
Office
Place of Entertainment
Private Club
Public Convenience
Recyclable Collection Centre
School
Shop and Services
Training Centre

Planning Intention

This zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, Government, institution or community (GIC) facilities, and at-grade pedestrianized avenue/ event plaza. Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building.

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

Remarks

(1) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in the plot ratio for the building upon development and/or redevelopment in excess of 8.0 for a domestic building or 9.0 for a building that is partly domestic and partly non-domestic, or the plot ratio of the existing building, whichever is the greater. Except where the plot ratio is permitted to be exceeded under paragraphs (7) and/or (8) hereof, under no circumstances shall the plot ratio for the domestic part of any building, to which this paragraph applies, exceed 8.0.

(2) For a non-domestic building to be erected on the site, the maximum plot ratio shall not exceed 9.0 except where the plot ratio is permitted to be exceeded under paragraphs (7) and/or (8) hereof.

(3) For the purposes of paragraph (1) above, no addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the relevant maximum domestic and/or non-domestic plot ratio(s), or the domestic and/or non-domestic plot ratio(s) of the existing building, whichever is the greater, subject to, as applicable –

(i) the plot ratio(s) of the existing building shall apply only if any addition, alteration and/or modification to or redevelopment of an existing building is for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building; or

(ii) the maximum domestic and/or non-domestic plot ratio(s) stated in paragraph (1) above shall apply if any addition, alteration and/or modification to or redevelopment of an existing building is not for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building.

(4) Not less than 400m^2 of public open space for public use at reasonable hours shall be provided.

(5) An underground public vehicle park shall be provided. Any floor space that is constructed or intended for use solely as public vehicle park as required by the Government, may be disregarded.

(6) In determining the relevant maximum plot ratio for the purposes of paragraphs (1) and (2) above, any floor space that is constructed or intended for use solely as car park, loading/unloading bay, plant room and caretaker's office, or caretaker's quarters and recreational facilities for the use and benefit of all the owners or occupiers of the domestic building or domestic part of the building,

provided such uses and facilities are ancillary and directly related to the development or redevelopment, may be disregarded. Any floor space that is constructed or intended for use solely as Government, institution or community facilities, as required by the Government, may also be disregarded.

(7) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the maximum building height in terms of metres above Principal Datum as stipulated on the Plan, or the height of the existing building, whichever is the greater.

(8) Where the permitted plot ratio as defined in Building (Planning) Regulations is permitted to be exceeded in circumstances as set out in Regulation 22(1) or (2) of the said Regulations, the plot ratio for the building on land to which paragraph (1) or (2) above applies may be increased by the additional plot ratio by which the permitted plot ratio is permitted to be exceeded under and in accordance with the said Regulation 22(1) or (2), notwithstanding that the relevant maximum plot ratio specified in the paragraphs (1) and (2) above may thereby be exceeded.

(9) Based on the individual merits of a development or redevelopment proposal, minor relaxation of the plot ratio and building height restrictions as stated in paragraphs (1), (2) and (6) above may be considered by the Town Planning Board on application under section 16 of the Town Planning Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

EXPLANATORY STATEMENT

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

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DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

EXPLANATORY STATEMENT

Note: For the purposes of the Town Planning Ordinance (the Ordinance), this statement shall not be deemed to constitute a part of the Plan.

1. INTRODUCTION

This Explanatory Statement is intended to assist an understanding of the draft Urban Renewal Authority (URA) Kau Pui Lung Road / Chi Kiang Street Development Scheme Plan (DSP) No. S/K10/URA2/A. It reflects the planning intention and objectives of the Town Planning Board (the Board) for the area covered by the Plan.

2. AUTHORITY FOR THE PLAN AND PROCEDURES

2.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive (CE), the URA was invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) is one of the pilot CBS redevelopment projects.

2.2 On 11 May 2020, Kau Pui Lung Road / Chi Kiang Street Development Scheme was approved by the Financial Secretary to be commenced in 2020/21. The Development Scheme was proposed to be processed under section 25 of the URA Ordinance (URAO).

2.3 On 22 May 2020, pursuant to section 23(1) of the URAO, the URA notified in the Government Gazette the commencement of implementation of the Kau Pui Lung Road / Chi Kiang Street Development Scheme.

2.4 On the same day of commencement (i.e. 22 May 2020), the URA submitted the draft URA Kau Pui Lung Road / Chi Kiang Street DSP to the Board under section 25(5) of the URAO.

2.5 During the public consultation period of the Development Scheme, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government bureaux / departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Development Scheme to achieve wider planning gains to the community. On 3 November 2022, the URA has submitted a revised scheme of the draft DSP to the Board under section 25(5) of the URAO for consideration.

2.6 On XXXX, the Board, under section 25(6)(a) of the URAO, deemed the draft URA Kau Pui Lung Road / Chi Kiang Street DSP as being suitable for publication. Under section 25(7) of the URAO, the draft DSP, which the Board has deemed suitable for publication, is deemed to be a draft plan prepared by the Board for the purposes of the Ordinance.

2.7 On XXXX, the draft Kau Pui Lung Road / Chi Kiang Street DSP No. S/K10/URA2/1 (the Plan) was exhibited under section 5 of the Ordinance. By virtue of section 25(9) of the URAO, the Plan has from the date replaced the Ma Tau Kok Outline Zoning Plan (OZP) in respect of the area delineated and described herein.

3. OBJECT OF THE PLAN

The Plan illustrates that the Development Scheme Area (the Area) is designated as "Residential (Group A)" ("R(A)"). It is planned to be developed by means of the Development Scheme prepared under section 25 of the URAO. The Development Scheme intends to be primarily for high-density residential developments with the provision of an underground public vehicle park, Government, institution or community (GIC) facilities, and at-grade pedestianised avenue/ event plaza. Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building. The Development Scheme will be developed for private housing and SH, providing not less than 950 SH units, subject to liaison and agreement with relevant Government bureaux / departments at implementation stage.

4. NOTES OF THE PLAN

4.1 Attached to the Plan is a set of Notes which shows the types of uses or developments which are always permitted within the Area in this zone and which may be permitted by the Board, with or without conditions, on application. The provision for application for planning permission under section 16 of the Ordinance allows greater flexibility in land use planning and control of development to meet changing needs.

4.2 For the guidance of the general public, a set of definitions that explains some of the terms used in the Notes may be obtained from the Technical Services Division of the Planning Department and can be downloaded from the Board's website at http://www.info.gov.hk/tpb.

5. AREA COVERED BY THE PLAN

5.1 The Development Scheme boundary which is shown in heavy broken line on the Plan, covers a total area of about 16,473m^2 (subject to site survey). The Development Scheme involves a cluster of 30 CBS sites which is broadly bounded by a row of buildings at Ma Tau Wai Road to

the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

5.2 With a total gross site area of about 15,475m^2, the Area includes all private lots, the government lanes, and portions of Maidstone Road and Kiang Su Street, but excludes public pavement at the periphery where affected buildings overhang within the Area.

5.3 Before the exhibition of the Plan, the Area was zoned "R(A)" and areas shown as 'Road' on the draft Ma Tau Kok OZP No. S/K10/29.

6. EXISTING CONDITIONS

6.1 The Development Scheme consists of buildings of 5 to 6 storeys high and they were built between 1959 and 1970 (i.e. all aged 50 or above). The buildings are all residential in nature and there is no retail shop within the Area. Most of the buildings are in "acceptable" conditions. All buildings are without lift or barrier-free access and the serviceability is poor.

6.2 The existing southern portion of Maidstone Road is a dead-end road, which is included in the Area for redevelopment. A portion of Kiang Su Street is also included in the Area for redevelopment.

7. PLANNING AND LAND USE PROPOSALS

7.1 On the Plan, the Area is zoned "R(A)" and the Notes of the Plan indicated broadly the intended land uses within the Area. The area covered by the "R(A)" zone is about 15,475m^2, subject to site survey.

Uses

7.2 The "R(A)" zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, GIC facilities and at-grade pedestrianised avenue/ event plaza. Commercial uses are always permitted on the lowest three floors of a

building or in the purpose-designed non-residential portion of an existing building.

7.3 The maximum plot ratio within the "R(A)" zone is 9.0, or the plot ratio of the existing building(s), whichever is the greater. Except where the plot ratio is permitted to be exceeded under the Notes of the Plan or under Building (Planning) Regulations 22(1) or (2), under no circumstances shall the plot ratio for the domestic part of any development exceed 8.0. The "R(A)" zone is also subject to a maximum building height restriction of 140 metres above Principal Datum.

7.4 The plot ratio control under "R(A)" zone is regarded as being stipulated in a "new or amended statutory plan" according to the Joint Practice Note No. 4 "Development Control Parameters Plot Ratio/Gross Floor Area", and shall be subject to the streamlining arrangements stated therein.

7.5 To provide design flexibility, minor relaxation of the plot ratio and building height restrictions may be considered by the Board on application under section 16 of the Ordinance taking into account its individual planning and design merits.

Urban Design Concept

7.6 The design of the Development Scheme will adopt an integrated approach. The tower disposition, podium massing and open space are considered as one development to maximise the benefits of replanning and restructuring and to allow the provision of pedestrianised avenue / event plaza and public open space (POS).

7.7 The massing of podia is minimised to create a pedestrian-friendly environment through urban design including utilisation of underground space. The footprint of the podia is limited in order to provide two ventilation corridors in north-south and east-west and for pedestrianised avenue / event plaza and POS. Not less than 400m^2 of POS and not less than 2,400m^2 of covered and uncovered area of the pedestrianised avenue / event plaza for public use at reasonable hours would be provided.

Pedestrianised Avenue / Event Plaza and Public Open Space

7.8 To remove the existing dead-end condition for a better pedestrian environment, portions of Maidstone Road and Kiang Su Street have been included as part of the Area for the creation of a pedestrianised avenue / event plaza within the Area. The pedestrianised avenue / event plaza will connect Lok Shan Road at the north and Chi Kiang Street at the south. It will also link to the two entrances of the Mass Transit Railway (MTR) To Kwa Wan Station at Lok Shan Road and Kiang Su Street respectively.

7.9 The pedestrianised avenue / event plaza will include uncovered and covered area with hard and soft landscape, event space and sitting area for public enjoyment. Ground floor of retail shops will be provided along both sides of the pedestrianised avenue /event plaza to enrich pedestrian experience and enhance street vibrancy. The pedestrianised avenue / event plaza will be maintained and managed by the URA or its assignee. The management and maintenance arrangement of the POS will be determined with relevant Government departments at land grant stage.

7.10 The pedestrianised avenue / event plaza will also integrate with the proposed underground pedestrian passageway with retail shops, which will create an underground shopping street. The proposed underground pedestrian passageway will be opened for public use during the opening hours of the non-domestic portion. It will connect to the two entrances of the MTR To Kwa Wan Station at Lok Shan Road and Kiang Su Street at basement level, subject to technical feasibility and agreement with relevant government departments and the MTR Corporation. The re-planned multi-level pedestrian network will enhance overall connectivity, walkability and provide a car-free environment.

Underground Public Vehicle Park

7.11 An underground public vehicle park will be provided to re-provision the original on-street parking spaces and to cater for the demand for parking in the district. Not less than 164 public car parking spaces shall be provided in the underground car park as required by the Government.

Management of the underground public vehicle park will be arranged at the development stage.

Government, Institution or Community (GIC) Facilities

7.12 To meet the need for community facilities in the vicinity and the increased population after redevelopment, GIC uses are proposed in the Development Scheme. Not less than 2,500m^2 non-domestic gross floor area would be proposed for GIC use in the GIC block or within the non-domestic portion of the development, subject to confirmation of usage and funding from relevant Government departments. In order to facilitate provision of GIC facilities, in determining the relevant maximum plot ratio of the development and / or redevelopment, any floor space that is constructed or intended for use solely as GIC facilities, as required by the Government, may be disregarded.

Landscaping and Greening

7.13 A cohesive landscaping, tree planting and greening will be provided in the pedestrianised avenue / plaza and open space to meet the Sustainable Building Design (SBD) Guidelines to enhance the local streetscape and walking environment. According to SBD Guidelines, minimum site coverage of greening of 20% of the net site area will be provided.

Air Ventilation

7.14 According to the air ventilation assessment report (AVA 2022) for the proposed development, the proposed building height reduces the bulkiness of the buildings and the number of building blocks and have smaller podia, which would enhance the wind flow penetration. Besides, two wind enhancement features will be provided, i.e. a minimum 15m width podia separation along the north-south pedestrianised avenue; and a 23m breezeway between podia along Kiang Su Street for east-west wind flow, with any footbridge, canopies, architectural feature, open-side deck, sitting area and circulation space, etc., provided in between the podia shall be allowed, where appropriate and practicable. The two wind enhancement features would enhance wind flow penetration at pedestrian level. They would be incorporated in the design and layout of the future developments in the "R(A)" zone, subject to minor adjustment

of widths and alignments to be agreed with relevant government departments at detailed design stage.

8. IMPLEMENTATION OF THE DEVELOPMENT SCHEME

8.1 The proposals set out in the Plan form an integral part of the Development Scheme for the Area.

8.2 The URA does not own or lease any land within the boundaries of the Development Scheme and intends to acquire the properties within the Area of the Development Scheme. With respect to any of such properties which cannot be acquired by purchase, the Secretary for Development would consider, upon the application of the URA, recommending to the CE in Council the resumption of properties under the Lands Resumption Ordinance, if necessary.

8.3 All eligible tenants will be offered an ex-gratia payment package in accordance with the URA's policy. The URA has already entered into agreement with the Hong Kong Housing Society (HKHS) and the Hong Kong Housing Authority (HKHA) for the purpose of making available rehousing units by HKHS or HKHA to rehouse affected tenants who satisfy the eligibility criteria of HKHS or HKHA.

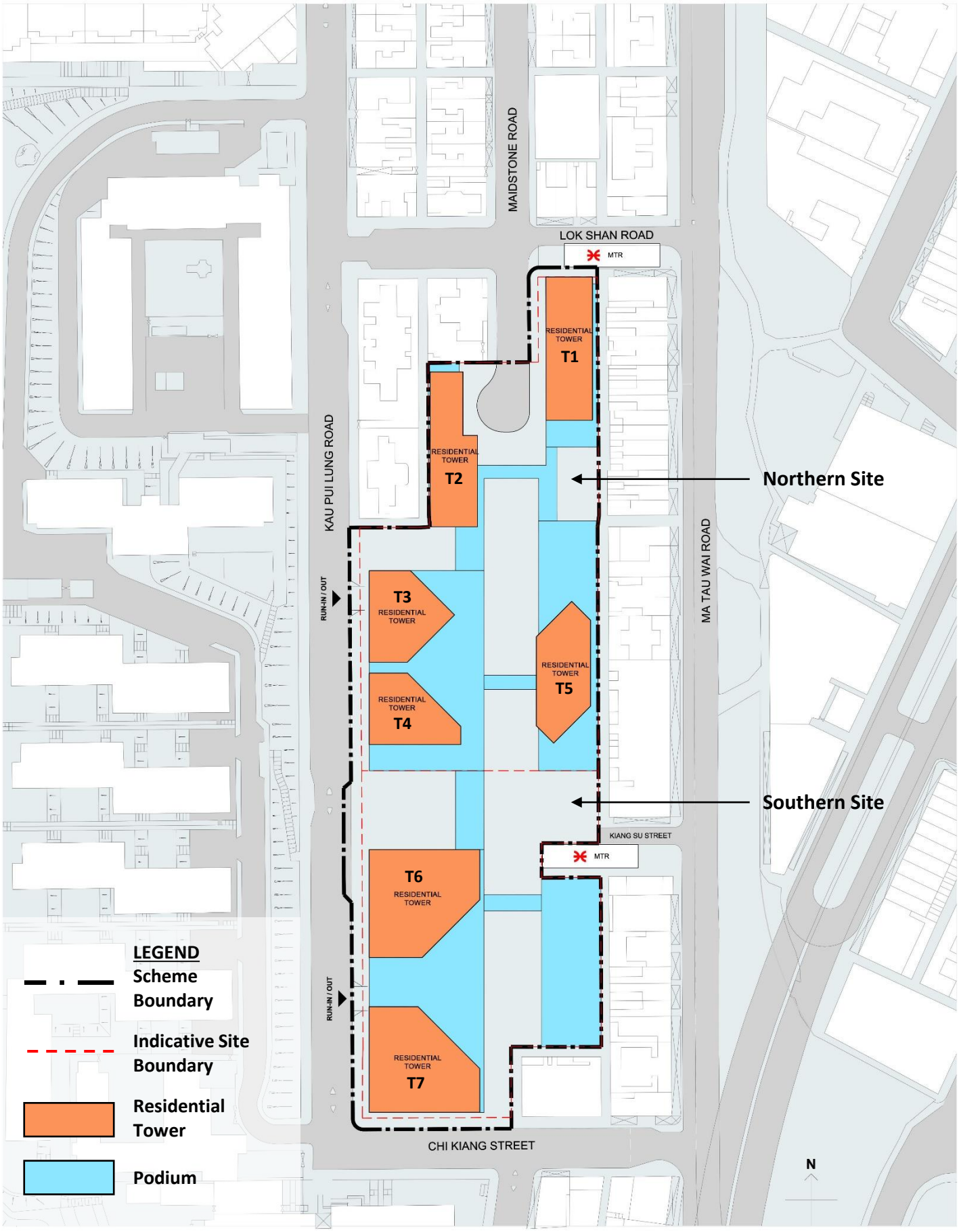
8.4 Non-domestic tenants (if any) of properties acquired by the URA whose tenancies are terminated by the URA due to implementation of the Development Scheme may be offered an ex-gratia allowance to assist in their business relocation.

8.5 Details of the acquisition, compensation and rehousing policies are subject to the URA's prevailing policies at the time of acquisition. The URA may implement the Development Scheme on its own or in association with one or more partners.

TOWN PLANNING BOARD
February 2023

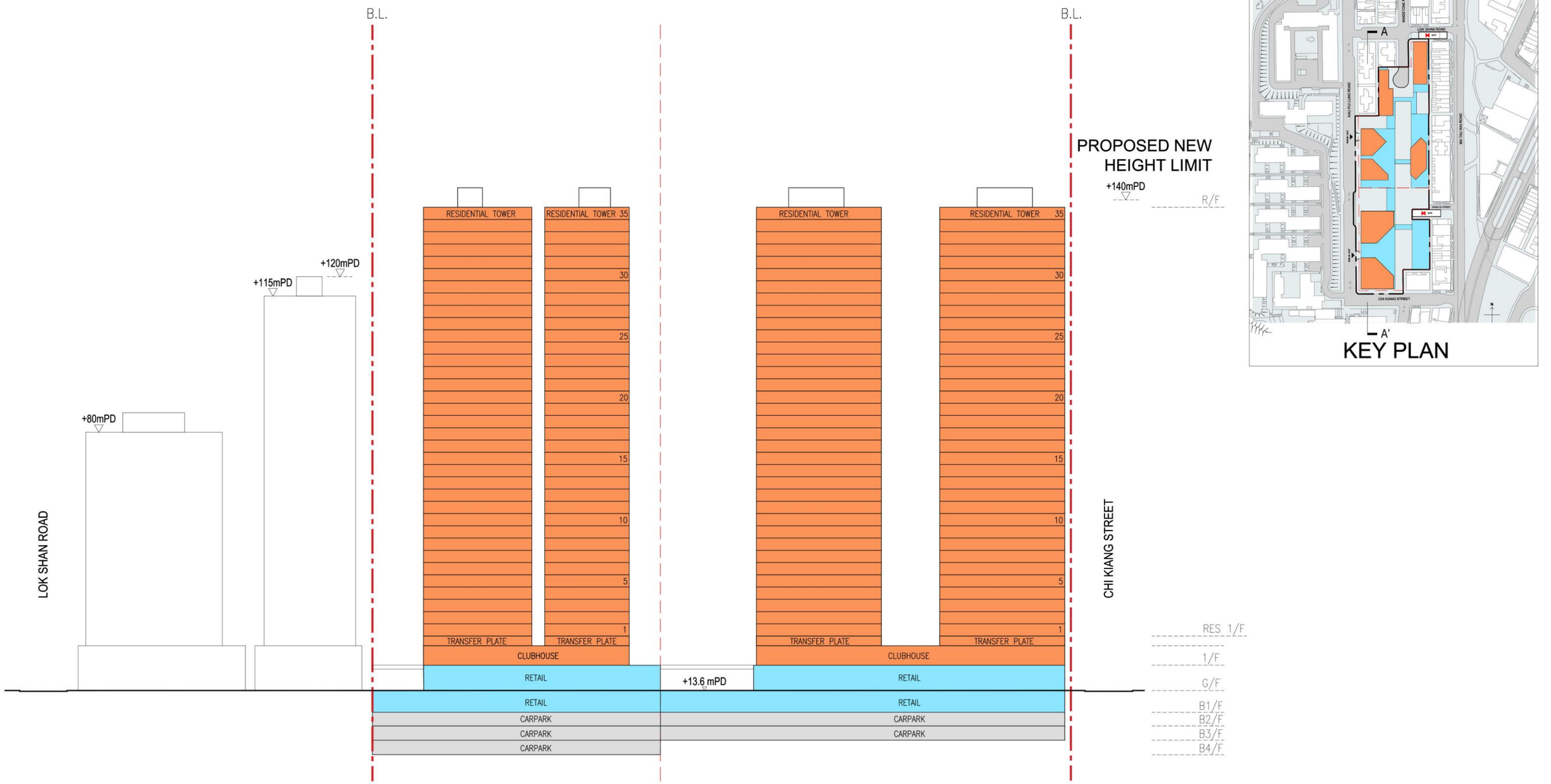
Preliminary Design

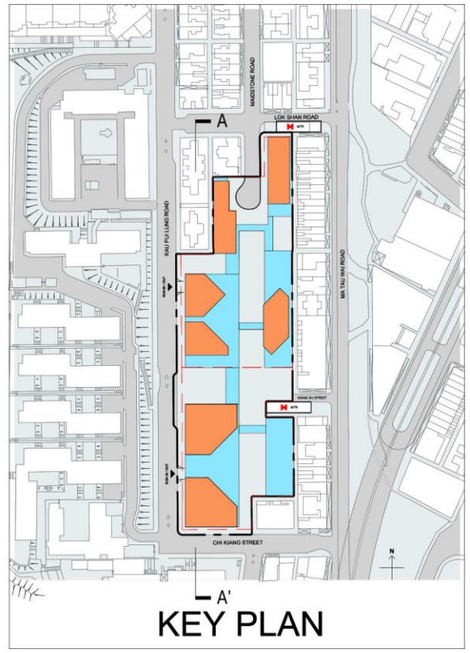
(Enhanced Scheme (Nov 2022) + RtoC_8 (Feb 2023))



(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Indicative Block Plan	**Figure 1.1**





KEY PLAN

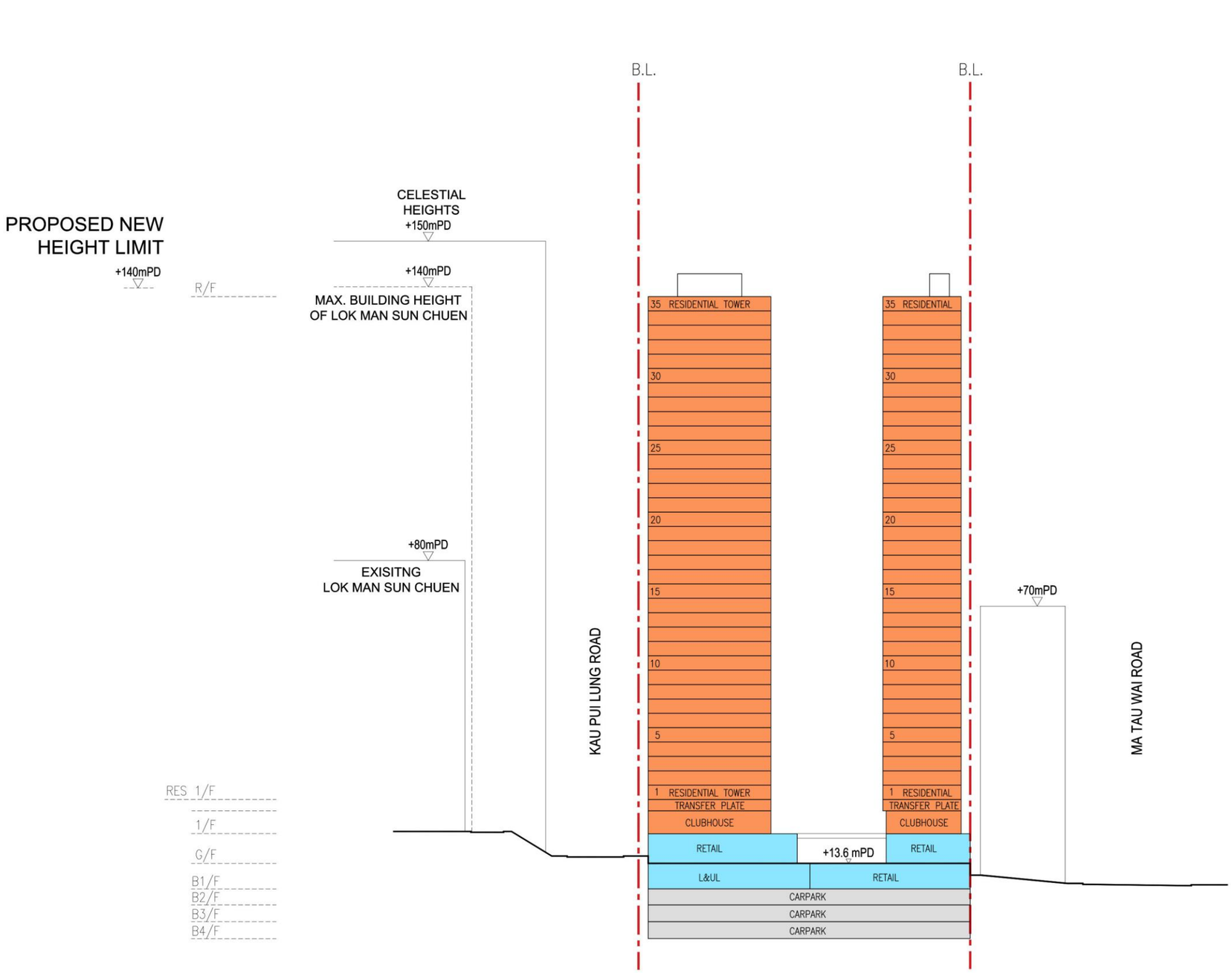
(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

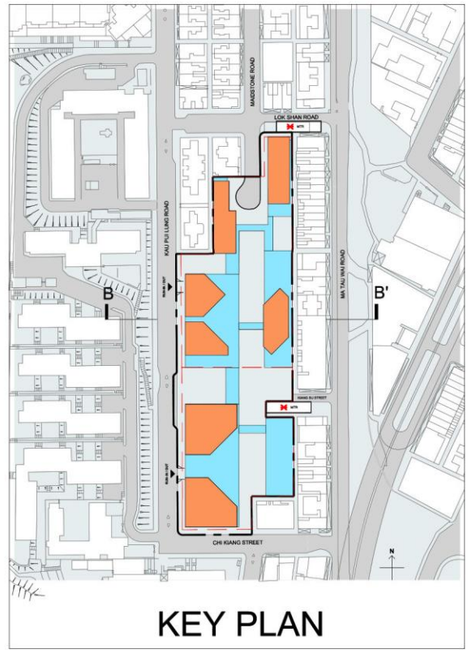
市區重建局
URBAN RENEWAL AUTHORITY

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Notional Design – Schematic Section AA'

Figure 1.2





KEY PLAN

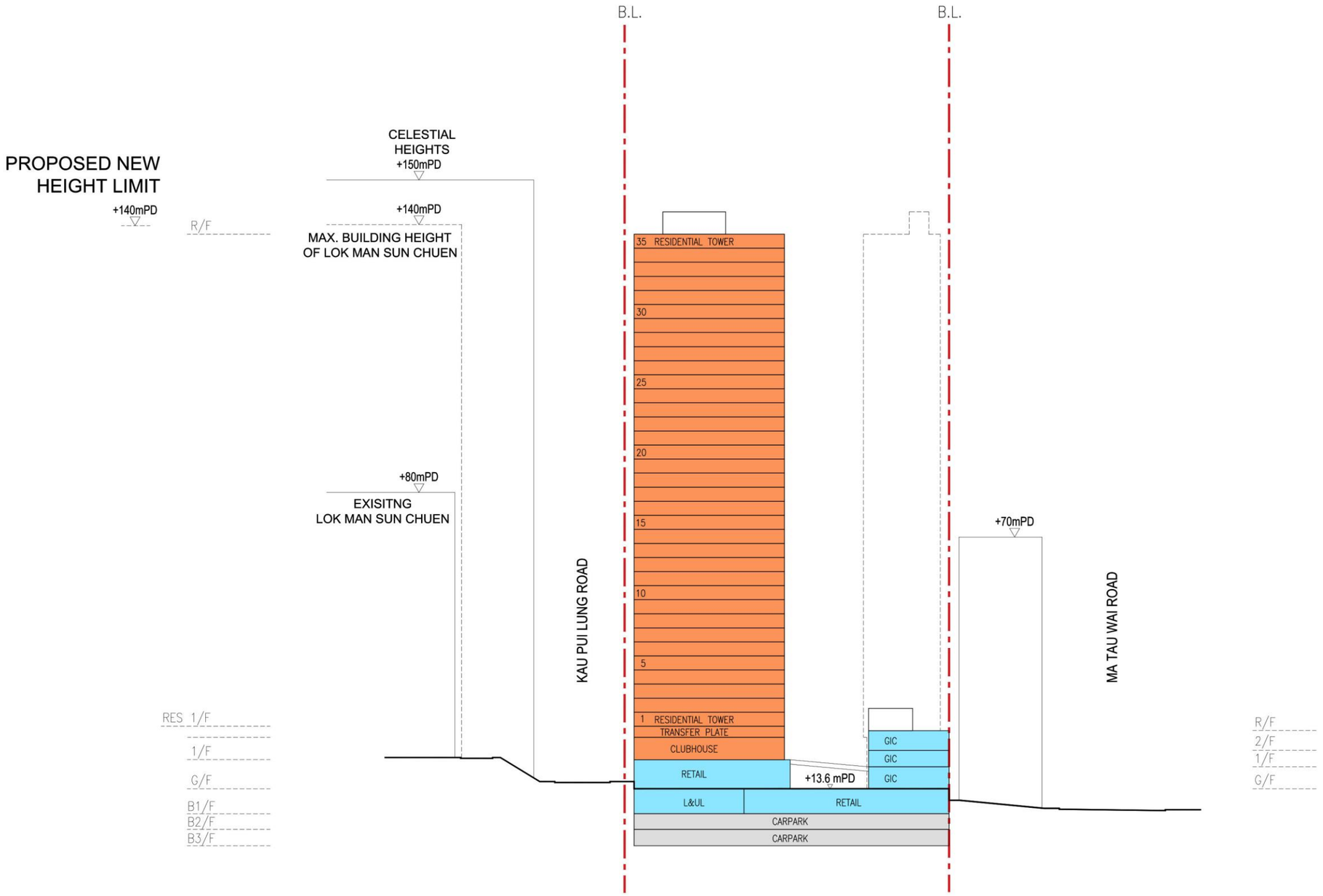
(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

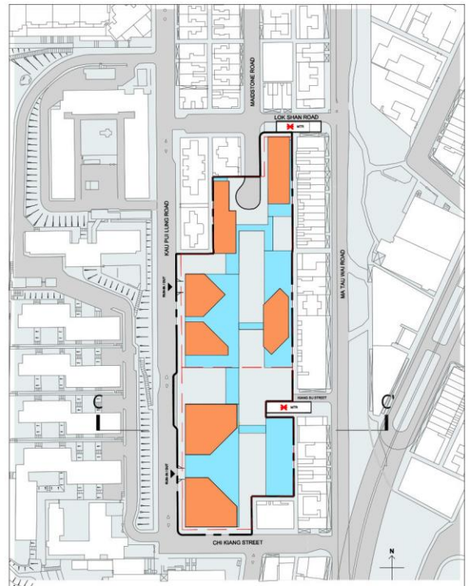
URBAN RENEWAL AUTHORITY 市區重建局

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Notional Design – Schematic Section BB'

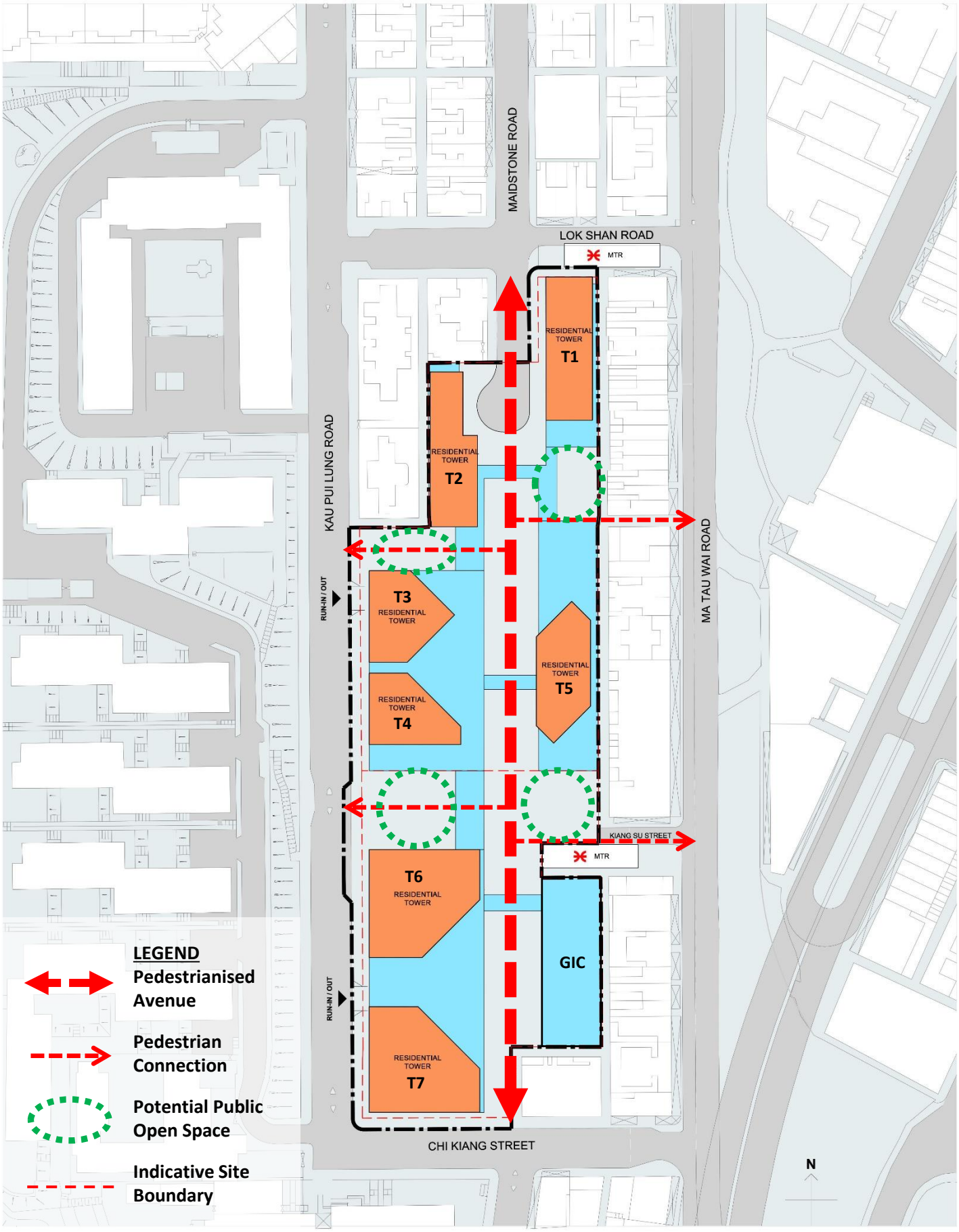
Figure 1.3





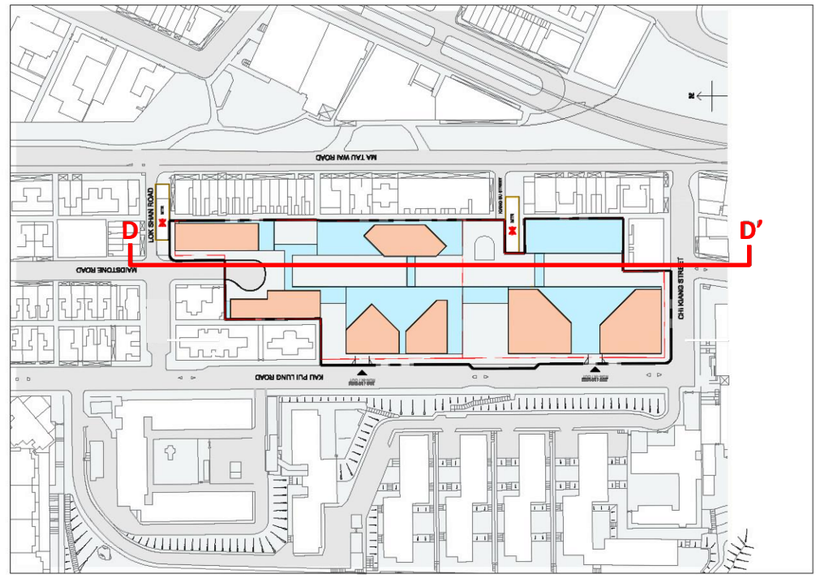
KEY PLAN

(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

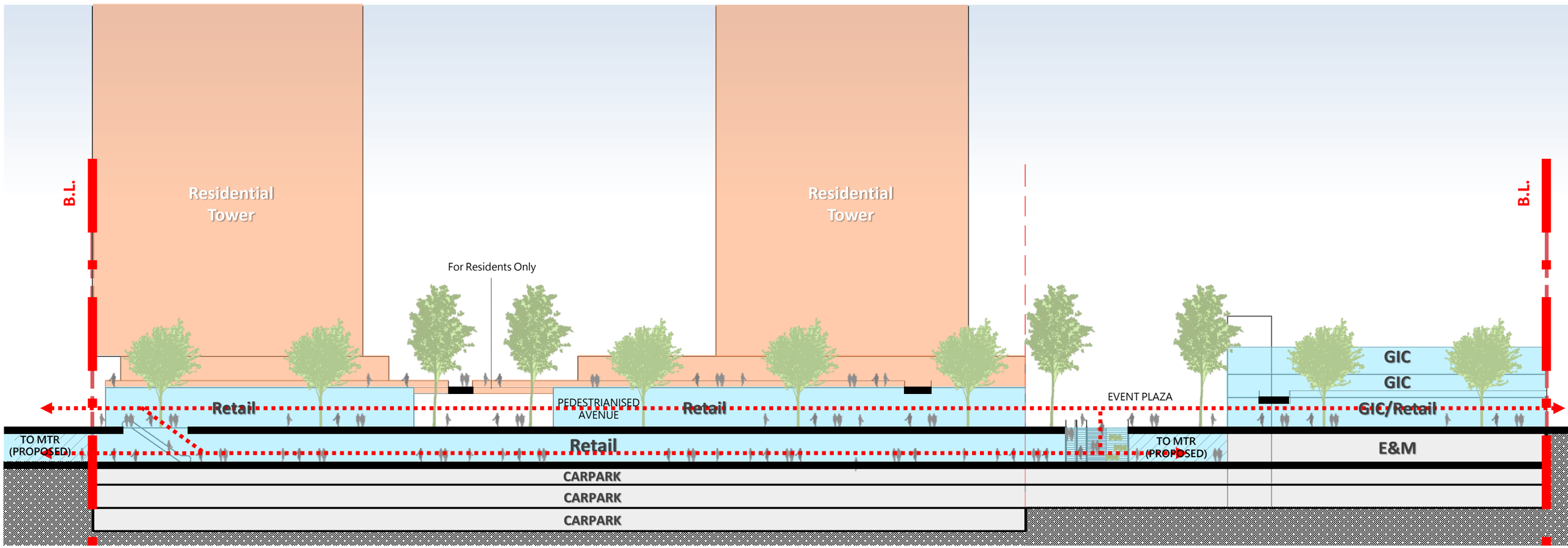


(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Pedestrian Connection and Potential Public Open Space	**Figure 1.5**



KEY PLAN



(Remarks: For indicative purpose only and subject to detailed design upon DSP approval.)

URBAN RENEWAL AUTHORITY 市區重建局

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Notional Design – Multi-level Pedestrian Linkages

Figure 1.6

Technical Assessments (Enhanced Scheme)

LIST OF TECHNICAL ASSESSMENTS

No.	**REVISED/UPDATED TECHNICAL ASSESSMENTS**	**VERSION(S)**
1.	Environmental Assessment (EA)	Enhanced Scheme (Nov 2022) + RtoC 8 (Feb 2023)
2.	Sewage Impact Assessment (SIA)	Enhanced Scheme (Nov 2022) + RtoC 8 (Feb 2023)
3.	Drainage Impact Assessment (DIA)	Enhanced Scheme (Nov 2022) + RtoC 8 (Feb 2023)
4.	Air Ventilation Assessment (AVA)	RtoC 8 (Feb 2023)
5.	Visual Impact Assessment (VIA)	RtoC 8 (Feb 2023)
6.	Traffic Impact Assessment (TIA)	RtoC 8 (Feb 2023)
	COMPARISON TABLES	
7.	Comparison Tables of Water Supply Impact Assessment (WSIA)	Enhanced Scheme (Nov 2022)
8.	Comparison Tables of Quantitative Risk Assessment (QRA)	Enhanced Scheme (Nov 2022)

EA (Enhanced Scheme)
(Nov 2022)

Prepared for

Urban Renewal Authority

Prepared by

Ramboll Hong Kong Limited

KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME (CBS-2:KC)

ENVIRONMENTAL ASSESSMENT

Date	**October 2022**
Prepared by	**Kitty Wong** **Senior Consultant**
Signed	
Approved by	**Tony Cheng** **Senior Manager**
Signed	
Project Reference	**URACBS02EI00**
Document No.	**R6859_v2.0**

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1. INTRODUCTION

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). An Environmental Assessment (EA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 Ramboll Hong Kong Limited has been commissioned by the URA to undertake this EA for the proposed development.

1.1.3 This EA consists of the air quality impact assessment, noise impact assessment and waste management study for the proposed development of the site. Mitigation measures and recommendation shall be proposed in compliance with relevant standards and guidelines.

1.1.4 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.1.5 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.3 Proposed Development

1.3.1 The site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 Under notional layout of the Revised Design 2022, the Northern Site consists of five residential towers providing 1374 residential units, clubhouses (about 3,435m^2), retail (about 8,587m^2) and community facilities (about 500m^2). The Southern Site consists of two residential towers providing 950 residential units, clubhouses (about 2,755m^2),

retail (about 6,888m^2) and community facilities (about 2,000m^2). A block plan of the notional layout is provided in **Appendix 1.1**.

1.3.3 **Table 1.1** shows the breakdown of flat units under the notional layout of the Revised Design 2022.

1.3.4 An indicative MLP is shown in **Appendix 1.1** with further details of the floor plans and sections.

1.3.5 The anticipated completion year of the Project is 2033.

Table 1.1 Breakdown of Flat Units under Notional Layout

	***Northern Site**	***Southern Site**
Low Zone	1-22/F (22 Storeys)	1-20/F (20 Storeys)
	40 Flats per Storey	28 Flats per Storey
	880 Flats	560 Flats
High Zone	23-35/F (13 Storeys)	21-35/F (15 Storeys)
	38 Flats per Storey	26 Flats per Storey
	494 Flats	390 Flats
Total	**1374 Flats**	**950 Flats**

**The site boundaries between Northern Site and Southern Site is indicative and subject to change.*

1.4 Objectives

1.4.1 To address the changes in the draft DSP, it is considered necessary to revise the EA to support the re-submission to TPB for consideration. In this EA, apart from the proposed development parameters, internal boundary between the sites, and the types of housings, the calculation assumption, methodology, catchment area adopted in the last version of EA (ref. no.: R6859_v1.2) remain unchanged.

1.4.2 The last version of EA (ref. no.: R6859_v1.2 dated January 2022), was submitted to the TPB in March 2022 in support of the draft DSP submission. The Environmental Protection Department (EPD) then has no objection to the previously submitted draft DSP based on the findings of the submitted EA and Sewerage Impact Assessment (SIA), understanding that the URA has committed to carry out further reviews on noise impact, sewerage impact and land contamination issues at detailed design stage.

2. AIR QUALITY IMPACT ASSESSMENT

2.1 Operational Phase

2.1.1 This assessment is to review the potential air quality impact due to the traffic emissions from the surrounding roads and the industrial emission upon the sensitive receivers of the proposed development.

2.2 Vehicular Emission Impact Assessment

2.2.1 The proposed development is bounded by road networks. According to Table 3.1 of Chapter 9 (Environment) of the Hong Kong Planning Standard and Guideline (HKPSG), there is a recommended buffer distance on vehicular emission in relation to different types of road. The recommended buffer distance is 5m for "Local Distributor", 10m for "District Distributor" and 20m for "Trunk Road and Primary Distributor".

2.2.2 According to The Annual Traffic Census 2021 published by Transport Department (TD) and confirmation from TD (see **Appendix 2.1**), the classification of road type are summarized as **Table 2.1** below.

Table 2.1 Road Type and Recommended Buffer Distance

Road Name	Road Type	Recommended Buffer Distance
Ma Tau Wai Road	Primary Distributor	20m
Lok Shan Road	Local Distributor	5m
Kau Pui Lung Road	Local Distributor	5m
Chi Kiang Street	Local Distributor	5m
Maidstone Road	Local Distributor	5m
Kiang Su Street	Local Distributor	5m

2.2.3 As shown in **Figure 2.1**, the residential buildings within both Northern Site and Southern Site have sufficient buffer distance to the roads, hence the recommended buffer distance of vehicular emission stipulated in the HKPSG can be met.

2.2.4 The podium of proposed development will not rely on opened windows for ventilation, it will adopt mechanical ventilation system with fresh air intake. The fresh air intake point(s) are proposed to be located at the roof of podium where there would be sufficient buffer distance to the roads.

2.2.5 Therefore, the future occupants of the development will not be subjected to insurmountable vehicular emission impacts.

2.3 Industrial Emission Impact Assessment

2.3.1 No chimney was identified within 500m from the Subject Site. Therefore, the Air Sensitive Receivers (ASRs) within the Subject Site would not be under any impacts of industrial emissions from chimney.

2.4 Conclusion

2.4.1 The proposed development under the Revised Design 2022 has sufficient buffer distance to the roads, and no chimney was found within 500m from the Subject Site. In this connection, it is anticipated that the proposed development would not be subject to adverse vehicular and industrial emission impacts in operational phase.

2.5 Construction Phase

Identification of Existing Representative Air Sensitive Receivers

2.5.1 There are a number of residential buildings, community centers, place for recreation located within 500m of the proposed development. The existing representative ASRs are shown in **Table 2.2** below and **Figure 2.2**.

Table 2.2 Summary of Existing Representative Air Sensitive Receivers

	Location	Land Use
1	Ko Shan Theatre	Place of recreation, sport or culture
2	Ko Shan Road Park 7-a-side Soccer Pitch	Place of recreation, sport or culture
3	Ko Shan Road Park	Place of recreation, sport or culture
4	Ming Fat Building, Seng Cheong Building, 278-292 Ma Tau Wai Road	Residential
5	Lok Man Sun Chuen	Residential
6	C.C.C. Wan Chai Church Kei to Primary School (Kowloon City)	School
7	Morning Joy Building	Residential
8	City 151, 151 Kau Pui Lung Rd	Residential
9	80 Maidstone Rd	Residential
10	Maxim Mansion	Residential
11	1A – 1C Lok Shan Rd	Residential
12	Celestial Heights	Residential
13	324 – 354 Ma Tau Wai Road	Residential
14	Braemar Court, 320-322C Ma Tau Wai Road, Mai Lok Building	Residential

	Location	Land Use
15	Lucky Building	Residential
16	356 -360 Ma Tau Wai Road	Residential
17	S.K.H. Good Shepherd Primary School. Elchk Hung Hom Lutheran Primary School, Po Leung Kuk Madam Chan Wai Chow Memorial School, Po Leung Kuk Madam Chan Wai Chow English Primary School	School
18	To Kwa Wan Government Offices	Government, Institution or Community
19	BMW House	Commercial

Identification of Potential Fugitive Dust Impacts

2.5.2 Demolition of existing building, earthworks (excavation and backfilling) for the construction of the basements, foundation works would be required for the Subject Site. Fugitive dust will be the only potential major source of air quality impact during the construction phase. Significant emissions are not anticipated from the criteria pollutants – NO_2, SO_2, and CO, etc. as only a limited number of diesel/ petroleum fuelled machinery would be operating at the relatively small Subject Site when compared to the traffic volume on the local road network. Moreover, under the Air Pollutant Control (Non-road Mobile Machinery) (Emission) Regulation, only approved or exempted non-road mobile machineries (including mobile generator, air compressor, crawler crane, bulldozer, and etc.) with a proper label are allowed to be used in the construction site. In addition, dust potentially generated as a result of the concreting works for the construction of superstructure, floor slab, etc. would be insignificant as the concrete would be pre-mixed and transferred to the Subject Site by concrete lorry mixer.

Mitigation Measures for Fugitive Dust Emission

2.5.3 With the implementation of sufficient dust suppression measures as stipulated under the APCO, Air Pollution Control (Construction Dust) Regulation (Cap 311R) and good site practices, fugitive dust emission arising from the demolition works, earthworks, etc. can be effectively suppressed through contractual clauses and close enforcement of the resident engineers. The Contractor(s) shall be required to follow the requirements of the Air Pollution Control (Construction Dust) Regulation which requires notification before carrying out demolition works or construction works and to adopt dust reduction measures while carrying out demolition activities or construction activities. In general, non-blasting demolition method (such as top down demolition

method) will probably be adopted for the demolition of the existing building. During the demolition works, relevant dust control measures (e.g. impervious dust screens) shall be implemented.

2.5.4 The recommended dust mitigation measures for protection of nearby ASRs are described below:

- During the demolition of buildings, impervious dust screens or sheeting shall be used;
- Use of regular watering, to reduce dust emissions from exposed site surfaces and unpaved roads, particularly during dry weather;
- Use of frequent watering for particularly dusty construction areas close to ASRs;
- Side enclosure and covering of any aggregate or dusty material storage piles to reduce emissions. Where this is not practicable owing to frequent usage, watering should be applied to aggregate fines;
- Open temporary stockpiles should be avoided or covered. Prevent placing dusty material storage plies near ASRs;
- Tarpaulin covering of all dusty vehicle loads transported to, from and between site locations;
- Establishment and use of vehicle wheel and body washing facilities at the exit points of the site;
- Imposition of speed controls for vehicles on unpaved site roads. 8 km/hr is the recommended limit;
- Routing of vehicles and positioning of construction plant should be at the maximum possible distance from ASRs;
- Every stock of more than 20 bags of cement or dry pulverised fuel ash (PFA) should be covered entirely by impervious sheeting or placed in an area sheltered on the top and the 3-sides;
- Loading, unloading, transfer, handling or storage of large amount of cement or dry PFA should be carried out in a totally enclosed system or facility, and any vent or exhaust should be fitted with an effective fabric filter or equivalent air pollution control system;
- The area at which demolition work takes place should be sprayed with water or a dust suppression chemical immediately prior to, during and immediately after the demolition activities; and
- Site hoarding of not less than 2.4 m high from ground level should be provided.

2.5.5 "Recommended Pollution Control Clauses for Construction Contracts" is available on the EPD website which set out the recommended air pollution control measures to be implemented by the contractor(s) during the construction stage of the Project.

2.5.6 With the adoption of good practices, it is expected that emission of construction fugitive dust can be kept to an acceptable level.

3. ROAD TRAFFIC NOISE IMPACT ASSESSMENT

3.1 Introduction

3.1.1 In this assessment, potential road traffic noise impact arising from nearby existing and future roads on the proposed development of the Subject Site has been assessed by using modelling. Practicable environmental mitigation measures have been recommended, as required.

3.2 Assessment Criteria

3.2.1 Noise standards are recommended in the HKPSG for planning against noise impact from sources such as road traffic, railway and aircraft, etc.

3.2.2 The proposed development includes 5 residential towers in Northern Site and 2 residential blocks in Southern Site. The podia beneath the residential towers will be provided with centralized air condition and will not rely on opened window for ventilation, whilst the domestic dwellings will rely on opened window for ventilation. According to the guidelines, the maximum noise level from road traffic, measured in terms of L10 (1-hr) is recommended to be 70 dB(A) at typical facades of new dwellings.

3.3 Assessment Methodology and Assumptions

3.3.1 The methodology involved the prediction of future road traffic noise impacts on Noise Sensitive Receivers (NSRs) arising from traffic flows on existing and future road carriageways situated within 300m study area from the Subject Site.

3.3.2 The U.K. Department of Transport's procedure "Calculation of Road Traffic Noise" was used to predict the hourly L10 noise levels generated from road traffic at selected representative NSRs. The predicted noise levels are then compared with the relevant HKPSG noise standard (i.e. 70 dB(A)). Noise mitigation measures are recommended at situations when the predicted noise levels exceed the noise standard.

3.3.3 The tentative completion date of the development will be in Year 2033. Calculations of the predicted road traffic noise were based on the AM peak hour and PM peak hour traffic flows within a 15-year period (i.e. Year 2048) from the tentative completion date of the proposed development. The assessment year has been chosen to be Year 2048 because the traffic forecast for the Year 2048 is the maximum among the 15-year period. The projected traffic flows and vehicle composition of the road carriageways provided by the project traffic consultant are shown in **Appendix 3.1**. The endorsement from Transport Department will be provided once available.

3.4 Noise Sensitive Receivers (NSRs)

3.4.1 Representative NSRs were selected to represent the noise sensitive uses of the proposed development. Locations of the representative NSRs are shown in **Figures 3.1 to 3.2** for Northern Site and **Figure 3.3 to 3.4** for Southern Site respectively. The assessment points have been taken to be situated at 1.2m above floor slabs and at 1m away from the external façade of windows of the residential unit.

3.5 Incorporated Noise Mitigating Designs

3.5.1 In order to minimise the potential traffic noise impact, noise mitigating designs have been incorporated or considered when formulating the building layout. They are include:

- Building Setback and Orientation

  The residential towers have been set back from Ma Tau Wai Road as far as practicable in order to minimize the traffic noise impact to the domestic premises.

- Building Layout

  To ensure the remaining residential units would not have direct exposure to the major road traffic noise source, the façades of the residential towers have been orientated such that the respective openable windows of habitable rooms can be shielded by the projected façades of the other units of the towers against the more trafficked roads along the Southern Site boundary.

- Podium

  The residential towers are sitting above the podiums. Residential floors are elevated at 27.6mPD in Northern Site and Southern Site so as to increase the vertical buffer distance from the nearby more trafficked roads.

3.6 Assessment Results – Base Case Scenario

3.6.1 The predicted traffic noise levels of the NSRs for the Base Case Scenario (without proposed noise mitigation measures mentioned in section 3.7) with AM peak and PM peak traffic flows are shown in **Appendix 3.2**. The results are summarized in Table below.

3.6.2 By comparing with the predicted noise results of the Base Case Scenario with AM peak and PM peak traffic flows, it is concluded that the Base Case Scenario with AM peak traffic flow is the worst case scenario.

Scenario	**Total No. of Flats**	**No. of Flats Exceeding the Noise Criteria of 70 dB(A)$_{(L10\ 1\text{-}hour)}$**	**Max Noise Levels, dB(A)$_{(L10\ 1\text{-}hour)}$**	**Compliance Rate**
Base Case (AM peak)	2324	432	77	~81%
Base Case (PM peak)		358	77	~85%

3.7 Proposed Traffic Noise Mitigation Measures

3.7.1 In order to further minimise the potential traffic noise impact, at-receiver mitigation measures have been incorporated.

3.7.2 The recommended noise mitigation measures are listed as below in **Table 3.1** & **Table 3.2** and the locations are shown in **Figure 3.1** to **Figure 3.4**.

a. Acoustic Window (Baffle Type) and Enhanced Acoustic Balcony (Baffle Type)

3.7.3 The acoustic window (baffle type) (AW(BT)) and enhanced acoustic balcony (baffle type) (EAB(BT)) in the "*Practice Noise on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact*" (Practice Note) issued by EPD are proposed at the residential blocks. The location of the proposed AW(BT) and EAB(BT) can be referred to **Figures 3.1 to 3.4**. Extracts of the Practice Note can be referred to **Appendix 3.4**.

3.7.4 All of the sizes of room to be adopted with AW(BT) and EAB(BT) would be within +10% of the designated room size of 8m^2 and 14m^2 for AW(BT) and EAB(BT) in the Practice Note respectively. If the room size is smaller than -10% of 8m^2 and 14m^2 as compared

to the Reference Case, the sound attenuation will be deducted by a factor of 10 x log(R_{ref}/R_{design}), where R_{ref} and R_{design} are the area of the room of the Reference Case and the proposed development respectively. This methodology for adjusting the sound attenuation performance of an AW(BT) / EAB(BT) due to difference in room size has been widely adopted in numerous approved planning applications, e.g. A/TSW/63-1, A/TSW/70, A/K10/267 and A/K10/266.

3.7.5 Some of the AW(BT) facing Chi Kiang Street will be equipped with sound absorptive materials (SAM). The location of these windows have been indicated in **Figure 3.3**. As stated in the Practice Note, addition of SAM to the AW(BT) can offer an additional 1.5dB(A) reduction. On the other hand, none of the EAB(BT) will be equipped with SAM.

3.7.6 The sound attenuation performances of AW(BT) and EAB(BT) at each NSR after room size correction and addition of SAM, if applicable, can be referred to **Appendix 3.3**. Extracts of the Practice Note can be referred to **Appendix 3.4**.

b. Architectural Fin

3.7.7 1.0m and 1.5m long architectural fins are proposed to reduce the angle of view from the noise sensitive use to the nearby roads. Regarding the effectiveness provided by the fin, it is maximized to be not more than 3 dB(A) with reference to the EPD's website.

3.8 Assessment Results – Mitigated Scenario

3.8.1 Under mitigated scenario with AM peak traffic flow, the road traffic noise compliance rate for the proposed development is improved from 81% (base case scenario) to 94% (149 flats exceeding the noise criteria). **Appendix 3.2** shows the predicted noise results under mitigated scenario.

3.9 Schedule of Noise Mitigation Measures

3.9.1 The proposed mitigation measures for the traffic noise impact are summarized in **Table 3.1** for Northern Site and **Table 3.2** for Southern Site below.

Table 3.1 Proposed Mitigation Measures for Northern Site

Tower	Flat	NSR	Floor	Proposed Mitigation Measures
1	A	N1-01	1-35	AW(BT)
		N1-02	1-35	EAB(BT)
	B	N1-03	1-35	EAB(BT)
		N1-04	1-35	AW(BT)
		N1-05	1-35	AW(BT)
	I	N1-22	Full Height	1.5m long architectural fin
3	A	N3-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		N3-04	1-5	EAB(BT)
	B	N3-05	1-5	EAB(BT)
	C	N3-08	1-5	EAB(BT)
	D	N3-09	1-5	EAB(BT)
		N3-11	1-5 (up to 43.35mPD)	1.5m long architectural fin
4	A	N4-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		N4-03	1-4	EAB(BT)
	B	N4-05	1-4	EAB(BT)
	C	N4-06	1-4	EAB(BT)
		N4-08	1-5 (up to 43.35mPD)	1.5m long architectural fin
5	F	N5-16	Full Height	1.0m long architectural fin

Note:

AW(BT) = Acoustic Window (Baffle Type) w/o SAM

EAB(BT) = Enhanced Acoustic Balcony (Baffle Type) w/o SAM

Table 3.2 Proposed Mitigation Measures for Southern Site

Block	Flat	NSR	Floor	Proposed Mitigation Measures
7	A	NAL-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		NAL-02	1-4	EAB(BT)
	B	NAL-03	1-4	EAB(BT)
		NAL-05	1-4	EAB(BT)
	C	NAL-06	1-4	EAB(BT)
		NAL-08	1-4	EAB(BT)
	D	NAL-10	1	EAB(BT)
			1-5 (up to 43.35mPD)	1.5m long architectural fin
	E	NAL-11	1-20	EAB(BT)
		NAH-11	21-35	EAB(BT)
		NAL-12	1-5	AW(BT) with SAM
			6-20	AW(BT)
		NAH-12	21-35	AW(BT)
		NAL-13	1-20	EAB(BT)
		NAH-13	21-35	EAB(BT)
	F	NAL-14	1-20	EAB(BT)
		NAH-14	21-35	EAB(BT)
		NAL-15	1-20	AW(BT)
		NAH-15	21-35	AW(BT)
	G	NAL-16	1-20	EAB(BT)
		NAH-16	21-35	EAB(BT)
		NAL-17	1-20	AW(BT)
		NAH-17	21-35	AW(BT)
		NAL-18	1-20	EAB(BT)
		NAH-18	21-35	EAB(BT)
	H	NAL-19	1-20	EAB(BT)
		NAH-19	21-35	EAB(BT)
		NAL-20	1-5	AW(BT) with SAM
			6-20	AW(BT)
		NAH-20	21-35	AW(BT)
		NAL-21	1-20	EAB(BT)
		NAH-21	21-35	EAB(BT)
	I	NAL-22	1	AW(BT) with SAM
			2-20	AW(BT)
		NAH-22	21-35	AW(BT)
		NAL-23	1-20	EAB(BT)
			Full Height	1.5m long architectural fin
		NAH-23	21-35	EAB(BT)
		NAL-25	Full Height	1.5m long architectural fin
		NAH-25	Full Height	1.5m long architectural fin

	N	NAL-34	Full Height	1.5m long architectural fin
		NAH-34	Full Height	1.5m long architectural fin
6	A	NB-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		NB-02	1-4	EAB(BT)
	B	NB-03	1-4	EAB(BT)
		NB-05	1-4	EAB(BT)
	C	NB-06	1-4	EAB(BT)
		NB-08	1-4	EAB(BT)
	D	NB-10	1	EAB(BT)
			1-4 (up to 40.2mPD)	1.5m long architectural fin
	E	NB-11	1-3 (up to 37.05mPD)	1.0m long architectural fin
	J	NB-24	Full Height	1.5m long architectural fin
	N	NB-34	Full Height	1.5m long architectural fin

Note:

AW(BT) = Acoustic Window (Baffle Type) w/o SAM

AW(BT) with SAM = Acoustic Window (Baffle Type) with SAM

EAB(BT) = Enhanced Acoustic Balcony (Baffle Type) w/o SAM

3.10 Design Constraints in the Proposed Layout

3.10.1 The current notional design has exhaustively explored all possible noise mitigation measures to minimize the traffic noise impact to the proposed development in order to achieve a 94% of noise compliance level. However, the design of layout has been restricted owing to various site constraints as stated in the following:

a. The Subject Site is a long and narrow rectangle shape and surrounded by local roads with adjacent existing buildings in close proximity which have limited the flexibility of the placement and orientation of towers within the site boundary. Furthermore, the 5m recommended setback for the air quality (discussed in Section 2) and the future access road within the site boundary further reduce the flexibility of buildable area. Hence, building setback is limited by the site condition;

b. There is no window opening towards Ma Tau Wai Road directly in order to prevent any direct line of sight to Ma Tau Wai Road, which affect orientation of towers (mainly Tower 1 & 5); and

c. Seven towers approach to accommodate more residential units to meet housing demand.

3.11 Conclusion

3.11.1 With the implementation of the proposed mitigation measures listed in Section 3.9, 94% of residential units comply with the road traffic noise standard (i.e. L_{10}(1-hr) 70 dB(A)).

3.11.2 For those residential units with residual noise impacts, based on the Appendix 4.4: Suitable Window Types for Noise of HKPSG, it is recommended to have openable well-gasketted window with 6mm pane as indirect mitigation measure. In this project, upgraded window/door will be provided for insulation as the last resort. The noise insulation of these upgraded window/door would be STC 31 as a minimum.

4. FIXED NOISE IMPACT ASSESSMENT

4.1 Introduction

4.1.1 In this assessment, potential noise impact arising from nearby fixed source noises on the proposed development of the Subject Site has been assessed. Practicable environmental mitigation measures have been recommended, where necessary.

4.1.2 The Subject Site is located in an urban area surrounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north. In accordance with the Technical Memorandum for the Assessment of Noise from Places other than Domestic Premises, Public Places or Construction Sites (herein referred as IND-TM), the type of the area where the Subject Site located is considered to be "Type (iii) Urban Area".

4.2 Noise Assessment Criteria

4.2.1 According to Table 1 of the IND-TM, the area sensitive rating (ASR) depends on the type of area and the degree of impact that Influencing Factors (IFs) have on the NSRs. Industrial area, major road or the area within the boundary of Hong Kong International Airport shall be considered to be an IF.

4.2.2 The type of area of this site is considered as urban area. Ma Tau Wai Road with an annual average daily traffic flow in excess of 30,000 vehicles is considered as the influencing factor of this site.

4.2.3 As shown in **Figure 4.3**, the units highlighted in blue are directly or indirectly affected by Ma Tau Wai Road, an ASR of C is therefore assigned.

4.2.4 As shown in **Figure 4.3**, the units highlighted in red are back towards Ma Tau Wai Road and they are not affected by Ma Tau Wai Road, an ASR of B is therefore assigned.

4.2.5 According to Table 2 of the IND-TM, the Acceptable Noise Level (ANL), in Leq (30min) dB(A) regarding to the ASR "B" and "C" for both Daytime/Evening and Night-time is shown in **Table 4.1** below.

Table 4.1 Fixed Noise Impact Assessment Criteria

Area Sensitivity Rating (ASR)	Time Period	Acceptable Noise Level (ANL), Leq (30 min) dB(A)
B	Leq (30 mins) (07:00 – 23:00)	65 dB(A)
	Leq (30 mins) (23:00 – 07:00)	55 dB(A)
C	Leq (30 mins) (07:00 – 23:00)	70 dB(A)
	Leq (30 mins) (23:00 – 07:00)	60 dB(A)

Notes:

In any event, the Area Sensitivity Rating and the ANLs adopted in this report are only indicative and they are used for assessment only. Noise from fixed noise sources is controlled under the NCO. Therefore, the Noise Control Authority shall determine the noise impact on the basis of prevailing legislation and practices being in force, and taking into account of contemporary conditions / situations of adjoining land uses.

4.3 Fixed Noise Sources

4.3.1 Site visits were conducted on 24 April 2019, 22 May 2019 and 18 July 2022 to identify the fixed noise sources within 300m from the Subject Site.

Potential fixed noise sources mainly include 1) the garages and workshops for car repair and motor services, 2) Variable Refrigerant Volume (VRVs) on the roof of BMW House, 3) air cool chillers and VRV on the roof of To Kwa Wan Complex and Government Offices, 4) chillers and VRVs on the roof of To Kwa Wan Market, and 5) fixed plant noise sources of To Kwa Wan MTR Station. The identified fixed noise sources are shown in **Figure 4.1** and **Figure 4.2** and described as below sections.

1. Garages and Workshops for Car Repair and Motor Services

4.3.2 38 nos. garages, which located at the ground floor of buildings, were found within 300m from the Subject Site during the site visits. As shown in **Figure 4.1**, all of them are blocked by the buildings erected in between hence there is no direct line of sight from the NSRs of the proposed development. The garages mainly include car washing and car painting work. There were no night-time activities identified in the garages and they close before 7pm. In view of no direct line of sight from the NSRs of the proposed development, they are not considered as potential noise sources in this assessment.

2. VRVs on the Roof of BMW House

4.3.3 19 VRV (V01 to V19) outdoor condenser units were found on the roof of BMW House (refer to **Figure 4.2**). Permission could not be obtained from BMW House for conducting the noise measurement at the roof area. However, it was identified from the site visits that the VRVs belong to Daikin Series X7. 12 nos. of VRVs (V01 to V08, V13 to V16) have double top fan, 7 nos. of them (V09 to V12, V17 to V19) have single top fan.

4.3.4 The sound power level (SWL) of the VRVs were referenced from the Daikin's catalogues, the model with the largest SWL is selected as worst case study. It is assumed all VRVs were in operation. Details of VRVs include their locations, brand, model number, dimension and SWLs were summarised in **Appendix 4.1**.

4.3.5 According to the website of BMW House, their operation hour is from 9am to 8pm.

3. Air cool chillers and VRV on the roof of To Kwa Wan Complex and Government Offices

4.3.6 4 air cool chillers (C01 to C04) and a VRV (C05) were found on the roof of To Kwa Wan Complex and Government Offices (refer to **Figure 4.2**). The brand of C01 to C04 is Carrier but the model number is known. Their SWL were calculated by following the methodology stated in ISO 3746-2010 Acoustics – Determination of Sound Power Levels and Sound Energy Levels of Noise Sources Using Sound Pressure – Survey Method Using an Enveloping Measurement Surface over a Reflecting Plane. The measurement methodology, locations of measurement points, measured sound pressure levels (SPLs) and the associated calculated SWLs are summarised in **Appendix 4.2**. The SWL of the VRV was referenced from the Daikin's catalogue.

4.3.7 The opening hours of the offices is from 8:30am to 6:15pm.

4. Chillers and VRVs on the roof of To Kwa Wan Market

4.3.8 4 chillers (A01, A02, A06 & A07) and 3 VRVs (A03 to A05) were found on the roof of To Kwa Wan Market (refer to **Figure 4.2**). Their SWL were calculated by following the methodology stated in ISO 3746-2010 or referenced from the catalogue, which are shown in details in **Appendix 4.3**. The calculated SWLs are then compared with the SWL shown in the catalogues, the larger SWL will be adopted for assessment as a conservative assessment.

4.3.9 As advised by the management officer, the operation hours of the market is from 7am to 8pm.

5. Fixed plant noise sources of To Kwa Wan MTR Station

4.3.10 Tunnel ventilation louvers (TVL), station ventilation louvers (SVL) and cooling towers were identified at the Ventilation Shaft, To Kwa Wan MTR Station Exits A and D (refer to **Figure 4.2**). Their maximum allowable SWLs were adopted in this assessment with reference to the Fixed Plant Noise Audit Report (Batch 1 – To Kwa Wan Station), which is prepared pursuant to EP Condition 2.32 of the Environmental Permit (EP No: EP-438/2012/K). The relevant pages of the noise audit report are extracted in **Appendix 4.5**.

4.3.11 The operation hours of the noise sources are 24 hours.

4.4 Noise Sensitive Receivers

4.4.1 Three (3) representative NSRs N01, N02 and N03 are selected, which are located at the eastern part of the site boundary and nearest to the identified noise sources. **Figure 4.3** shows the location of the representative NSR.

4.5 Assessment Methodology

4.5.1 A façade correction of + 3dB(A) were assumed.

4.5.2 No tonality, impulsiveness and intermittency characteristics were identified during the on-site surveys. Therefore, no correction of tonality, impulsiveness and intermittency were applied in the calculations.

4.6 Assessment Result

4.6.1 The maximum predicted fixed noise levels during daytime/evening at the selected NSRs is 60dB(A), which comply with the noise standards (65dB(A) for ASR of B and 70dB(A) for ASR of C). During night-time period, the maximum predicted fixed noise levels at the selected NSRs is 53dB(A), which also comply with the noise standards (55dB(A) for ASR of B and 60dB(A) for ASR of C). Therefore, it is anticipated the remaining NSRs at the residential towers can comply with the noise standard. Detailed calculations are shown in **Appendix 4.4**.

4.7 Conclusion

4.7.1 The assessment results indicated that all the predicted noise level of NSRs from all identified fixed noise sources within 300m study area comply the criteria as stipulated in NCO. It is therefore anticipated that the proposed development will not be subject to adverse fixed noise impacts.

5. WASTE MANAGEMENT

5.1 Introduction

5.1.1 This section presents the management and disposal strategy of the wastes generated from the construction work for the proposed development. The options for waste minimization, reuse, recycling, collection, transport and disposal of wastes arising from the construction and demolition work have been examined. Where appropriate, procedures for waste reduction and management are considered and environmental control measures for avoiding and minimising the potential impacts are recommended.

5.2 Relevant Legislation & Guideline

5.2.1 The following legislations and guidelines are relevant to the handling, treatment and disposal of waste in HKSAR and reference were made in assessing the potential impacts and their avoidance or mitigation:

- Waste Disposal Ordinance (Cap. 354);
- Waste Disposal (Chemical Waste) (General) Regulation (Cap. 354C);
- Waste Disposal (Charges for Disposal of Construction Waste) Regulation (Cap. 354N);
- Public Cleansing and Prevention of Nuisances Regulation (Cap. 132BK);
- Project Administration Handbook for Civil Engineering Works, Management of Construction/ Demolition Materials including Rocks
- The Environment, Transport and Works Bureau Technical Circular (Works) No. 19/2005 – Environmental Management on Construction Sites; and
- The Development Bureau Technical Circular (Works) No. 6/2010– Trip-ticket System for Disposal of Construction and Demolition Material

5.3 Waste Generation During Construction Phase

5.3.1 The construction activities to be carried out such as demolition of existing buildings and excavation of basements would generate a variety of wastes that can be divided into distinct categories based on their composition and ultimate method of disposal. The identified waste types include:

- construction and demolition (C&D) materials;
- chemical waste;
- general refuse; and
- asbestos-containing wastes.

Construction and Demolition (C&D) Material

5.3.2 C&D materials comprise mainly of unwanted materials, including surplus materials generated from demolition of existing buildings and excavation of basements. C&D materials may comprise different types of materials including:

- Inert C&D materials (also known as public fill, including soil, rock debris, rubble earth, concrete, etc.) do not decompose and are suitable to reuse as filling materials for land reclamation and site formation. Inert C&D materials could be reused on-site as filling materials. For those inert C&D materials that cannot be reused should be disposed of at Public Fill Reception Facilities.
- Non-inert C&D materials (also known as C&D waste, including bamboo, timber, paper, metal, glass, plastic, packaging wastes, etc.). Non-inert C&D materials

should be reused or recycled as far as possible. For those non-inert C&D materials that cannot be reused or recycled, they should be disposed of at designated landfill sites as last resort.

5.3.3 The general waste management strategy is to avoid waste generation in the first place. Should it be unavoidable, reduction and segregation at-source should be exercised as far as practicable and recycling and reuse should be adopted at the same time to salvage all the recyclable and reusable materials as much as possible.

5.3.4 The Contractor(s) should be responsible for ensuring that all on-site wastes will be collected by approved waste collectors and appropriate measures should be undertaken to minimise adverse impacts to the surrounding environment, such as dust generation. The Contractor(s) must also ensure that all necessary waste disposal permits have been obtained before actions.

5.3.5 Prior to disposal of non-inert C&D materials, it is recommended that wood, steel, glass and other metals will be collected separately for re-use and/or recycling and inert C&D materials utilized as fill materials to minimize the quantity of waste to be disposed of at the Public Fill Reception Facilities and landfill.

Chemical Waste

5.3.6 Construction plant and equipment will require regular maintenance and servicing, which would generate waste such as solvents, lubrication oil and fuel, etc. Chemical wastes arising during the construction phase may pose serious environmental, health and safety hazards if not stored and disposed of in an appropriate manner. The estimated quantity of chemical waste generated would be less than hundred litres per month.

5.3.7 The contractor is required to register as a chemical waste producer if chemical wastes would be produced from the construction activities. The Waste Disposal Ordinance (Cap 354) and its subsidiary regulations in particular the Waste Disposal (Chemical Waste) (General) Regulation should be observed and complied with for control of chemical wastes.

5.3.8 Storage, handling, transport and disposal of chemical waste should be arranged in accordance with the Code of Practice on the Packaging, Labelling and Storage of Chemical Waste published by the EPD. Chemical wastes such as wasted solvents, lubrication oil and fuel, etc. will need special handling and storage arrangements and should be collected by licensed collectors for subsequent disposal and appropriate treatment at licensed waste disposal facilities, for example the Chemical Waste Treatment Facility Centre (CWTC) in Tsing Yi. Mitigation and control requirements for chemical waste are provided in the "Recommended Pollution Control Clauses for Construction Contracts" available in EPD website mentioned the handling, storage and disposal of chemical wastes. With good management and site particles, adverse environmental impacts should not result.

General Refuse

5.3.9 Throughout the construction stage, the workforce would generate general refuse comprising food scraps, waste paper, empty containers, etc. Release of general refuse into watercourses or marine waters should not be permitted as introduction of these wastes is likely to have detrimental effects on water quality in the area. Effective collection of site wastes would be required to prevent waste materials being blown around by wind, flushed or leached into the marine environment, and odour nuisance. The work sites may also attract pests and vermin if the waste storage area is not well maintained and cleaned regularly. Disposal of refuse at sites other than approved waste transfer or disposal facilities can also result in similar impacts. The number of work force to be employed for the Project is around 80. Based on the generation rate

of 0.65kg/person/day, the estimated total refuse generated per day (maximum) would be about 52kg/day.

5.3.10 Recyclable materials (i.e. paper, plastic bottles and aluminium cans) will be collected separately for recycling, in order to reduce the amount of general refuse to be disposed into the landfill. Adequate number of enclosed waste containers will be provided to avoid over-spillage of waste. The non-recyclable refuse will be placed in bags and stored in enclosed containers, and disposed of on a daily basis to the designated landfill. Given that the quantity of general refuse to be disposed will be small, no adverse impact on the operation of these waste disposal facilities is anticipated.

5.3.11 With the implementation of the recommended waste management practices at the site, adverse environmental impacts would not arise from the storage, handling and transportation of refuse.

Asbestos-containing Wastes

5.3.12 Asbestos waste, a kind of chemical waste, may potentially be found during the demolition phase of the existing residential building. Relevant requirements under the Air Pollution Control Ordinance, Waste Disposal (Chemical Waste) (General) Regulation and the practice note for registered contractors – 15 issued by Building Departments for asbestos control should be followed prior to demolition of the existing buildings.

5.3.13 Asbestos waste should be removed by a registered asbestos contractor, who shall arrange a licensed collector for the removal in accordance with the Air Pollution Control Ordinance and the Waste Disposal (Chemical Waste) (General) Regulation.

Summary

5.3.14 Preliminary quantity estimation of construction waste involved and disposal method is summarised in the **Table 5.1** below. However, it should be noted that these quantities are initial estimates only and would need to be further reviewed and updated as the design progresses.

Table 5.1 Summary of Estimated Construction Waste and Disposal Method

Waste Material Type		Estimated Quantity Generated	Disposal Method
Inert C&D Materials	Demolition of Existing Building and Excavation of Basements	~135,000m^3	Around 20% (~33,280m3) to be reused on-site for site formation The remainders should be disposed of at Public Fill Reception Facilities
	Construction of New Buildings	~31,400m^3	
Non-inert C&D Materials	Demolition of Existing Building and Excavation of Basements	~2,400m^3	Around 20% (~590m3) to be reused and recycled in other projects The remainders should be disposed of at NENT Landfill as last resort.
	Construction of New Buildings	~550m^3	
Chemical Waste	-	Less than hundred litres /month (preliminary estimate)	For treatment at licensed facilities
General Refuse	-	52kg/day (preliminary estimate, assuming there are 80 workers at any one time with generation rate of 0.65kg per worker per day)	Around 20% (~10.4kg/day) to be reused or recycled on-site or in other projects The remainders which cannot be reused or recycled will be disposed of at NENT landfill

5.4 Waste Disposal and Mitigation Measures

5.4.1 Waste generated by construction activities should be properly sorted and certain waste management requirements must be followed to minimize the impacts arising because of the generation, storage, handling, transport and disposal of wastes. Good site management and control can prevent the generation of significant amounts of "mixed waste". For unavoidable wastes, reuse, recycling and optimal disposal are most practical when segregation occurs on the construction site, categorized as follows:

- Inert C&D materials for reuse on-site or delivering to Public Fill Reception Facilities for beneficial reuse at other projects;
- Non-inert C&D materials for reuse or recycle or disposal at landfill as last resort;
- Chemical waste for treatment at licensed facilities; and
- General refuse for disposal at landfill.

C&D Materials

5.4.2 Proper storage and site practices should be adopted to minimize the damage to, or contamination of, C&D materials that may reduce their recyclability and suitability for disposal in public fill reception facilities. The inert C&D materials shall be reused in earth filling, reclamation or site formation works. The non-inert C&D materials shall be reused or recycled and, as the last resort, disposed of at landfills.

5.4.3 Appropriate measures should also be employed to minimize windblown litter and dust during transportation by either covering trucks with tarpaulin or transporting wastes in enclosed containers. Waste should only be disposed at licensed sites. Resident site staff and the contractors should develop procedures to ensure that illegal disposal of waste does not occur. In addition, waste storage areas within the Project should be well maintained and cleaned regularly to prevent cross-contamination. The disposal of inert C&D materials and non-inert C&D materials to public fill reception facilities/sorting facilities respectively through a trip-ticket system, while general refuse will be disposed of at landfill.

5.4.4 The ETWB TCW No. 19/2005 - Environmental Management on Construction Sites introduces additional measures to enhance waste management on construction sites, which is applicable for this project. The circular sets out the policies and procedures that require the contractors to prepare and implement an Environmental Management Plan (EMP), which includes the Waste Management Plan (WMP) to encourage on-site sorting of C&D materials and to minimize generation of C&D materials during the course of construction. The EMP shall be submitted to the Project Architect/Engineer for approval before construction works.

5.4.5 According to Chapter 4 Clause 4.1.3 of the Project Administration Handbook for Civil Engineering Works, a Construction and Demolition Materials Management Plan (C&DMMP) is required if a project generates more than 50,000m^3 of C&D materials or requires more than 50,000 m^3 of imported fill. The total quantity of inert C&D materials estimated for the Project is more than 50,000 m^3, therefore C&DMMP is required. The C&DMMP shall be prepared and submitted to Public Fill Committee for approval before construction works.

Chemical Waste

5.4.6 Chemical and oily wastes generated from the construction activities, vehicle and plant maintenance should be disposed of as chemical waste in strict compliance with the Waste Disposal (Chemical Waste) (General) Regulations.

General Refuse

5.4.7 For general refuse, mitigation measures should include provision of a collection area where waste can be sorted, stored and loaded prior to removal from the site during construction phase.

5.4.8 In additional, with the implementation of the recommended mitigation measures in the "Recommended Pollution Control Clauses for Construction Contracts" available in EPD website, the potential environmental impacts resulting from the storage, handling and transportation of inert C&D materials, non-inert C&D materials, chemical wastes and general site wastes would be minimal. Below are the examples of the relevant measures:-

Waste Minimisation

- The Contractor shall submit to the Engineer for approval a waste management plan with appropriate mitigation measures including the allocation of an area for waste segregation and shall ensure that the day-to-day site operations comply with the approved waste management plan.
- The Contractor shall minimise the generation of waste from his work. Avoidance and minimisation of waste generation can be achieved through changing or improving design and practices, careful planning and good site management.
- The Contractor shall ensure that different types of wastes are segregated on-site and stored in different containers, skips or stockpiles to facilitate reuse/recycling of waste and, as the last resort, disposal at different outlets as appropriate.
- The reuse and recycling of waste shall be practised as far as possible.
- The Contractor shall record the amount of wastes generated, recycled and disposed of (including the disposal sites).
- The Contractor shall use a trip ticket system as stipulated in TCW No. 6/2010 for the disposal of C&D materials to any designated public filling facility and/or landfill.

5.5 Waste Generated during Operation Phase

5.5.1 A Person-per-Flat (PPF) of 2.3 is assumed for the area, which has made reference to HKPSG and adopted a more conservative assumption than HKPSG recommendation. In order to assess the waste capacities, a sensitivity test adding 22% is adopted to assess the adequacy of the waste capacities (i.e. PPF 2.8 = PPF 2.3 x 122%). The proposed development will provide a total number of about 2350 residential units. It is anticipated that the proposed development will serve a population of about 6600 under the sensitivity test scenario.

5.5.2 The disposal rate of domestic waste is 0.87 kg/person/day according to the Monitoring of Solid Waste in Hong Kong – Waste Statistics for 2020. By applying this figure to the anticipated population of the proposed development, approximately 5800 kg/day of domestic waste would be disposed of from operation of the proposed development.

5.5.3 Prior to disposal of domestic waste, recycling would be conducted as much as practicable. In order to facilitate recycling, recycling bin for paper, metals and plastics should be provided together with a general refuse bin. They should be placed in prominent places to promote waste separation at source. All recyclable materials should be collected by recyclers.

5.6 Conclusion

5.6.1 Waste generated during construction and operation phases of the project have been qualitatively evaluated. With the implementation of the mitigation measures, no significant impact on waste management is anticipated. The implementation of the mitigation measures shall form part of the works contracts.

6. CONCLUSION

6.1.1 The Environmental Assessment report has been prepared to identify the following potential environmental impacts during the operational phase of the proposed development.

Air Quality Impact Assessment

6.1.2 The proposed development under the Revised Design 2022 has sufficient buffer distance to the roads, and no chimney was found within 500m from the Subject Site. In this connection, it is anticipated that the proposed development would not be subject to adverse vehicular and industrial emission impacts.

Noise Impact Assessment

6.1.3 A traffic noise impact assessment has been carried out for the proposed development. With the implementation of proposed mitigation measures, the compliance level is 94%.

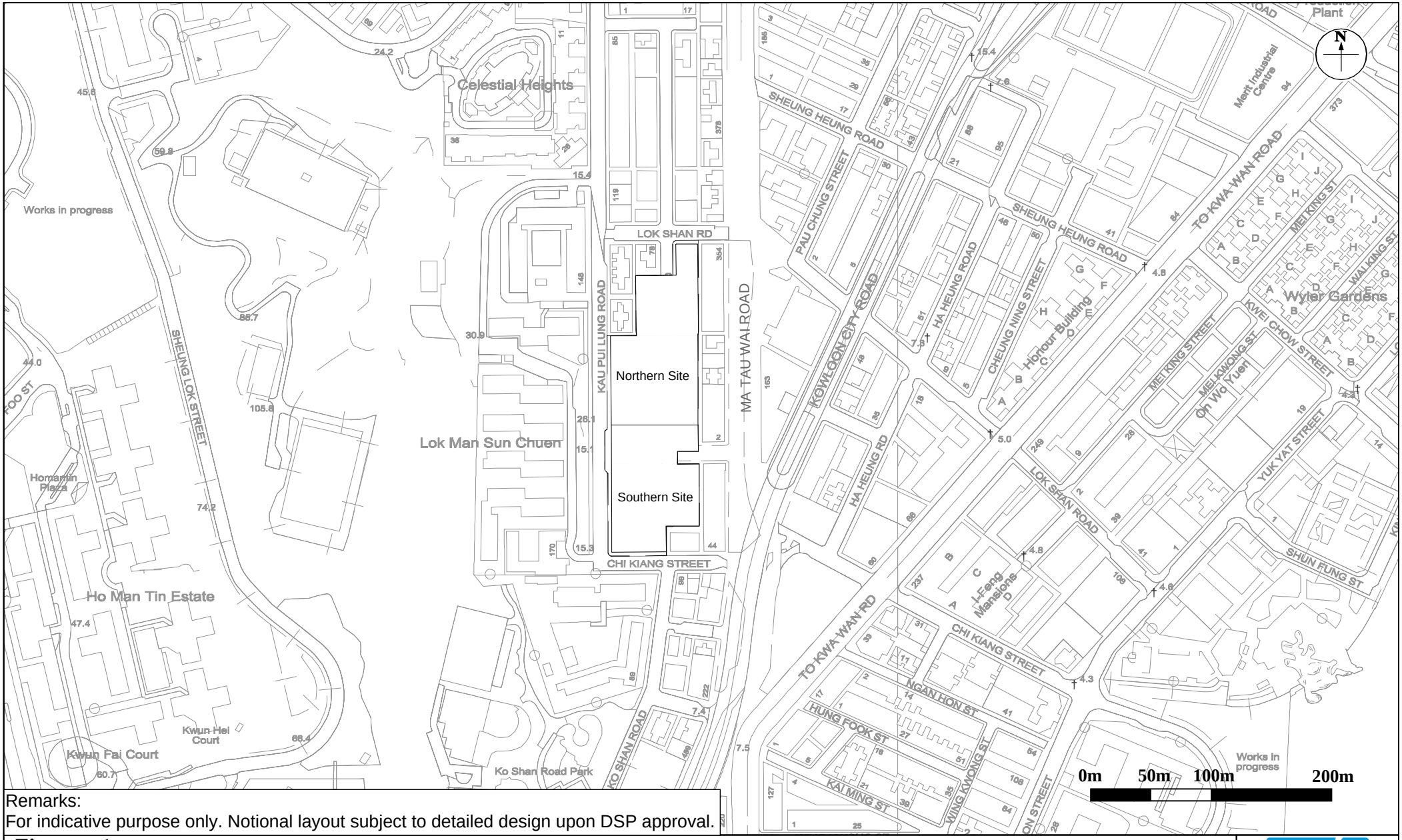
6.1.4 A fixed noise impact assessment has been conducted. The predicted noise level of NSRs from all identified fixed noise sources within 300m study area comply the criteria as stipulated in NCO. It is therefore anticipated that the proposed development will not be subject to adverse fixed noise impacts.

Waste Management

6.1.5 Waste generated during construction and operation phases of the project have been qualitatively evaluated. With the implementation of the mitigation measures, no significant impact on waste management is anticipated. The implementation of the mitigation measures shall form part of the works contracts.

6.1.6 In conclusion, the assessments in this EA report reveal overall acceptability of the proposed development from air, noise and waste management perspectives.

Figures



Remarks:
For indicative purpose only. Notional layout subject to detailed design upon DSP approval.

Figure: 1

Title: Location of the Subject Site and Its Environs

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	2.0
Date:	Sep 2022

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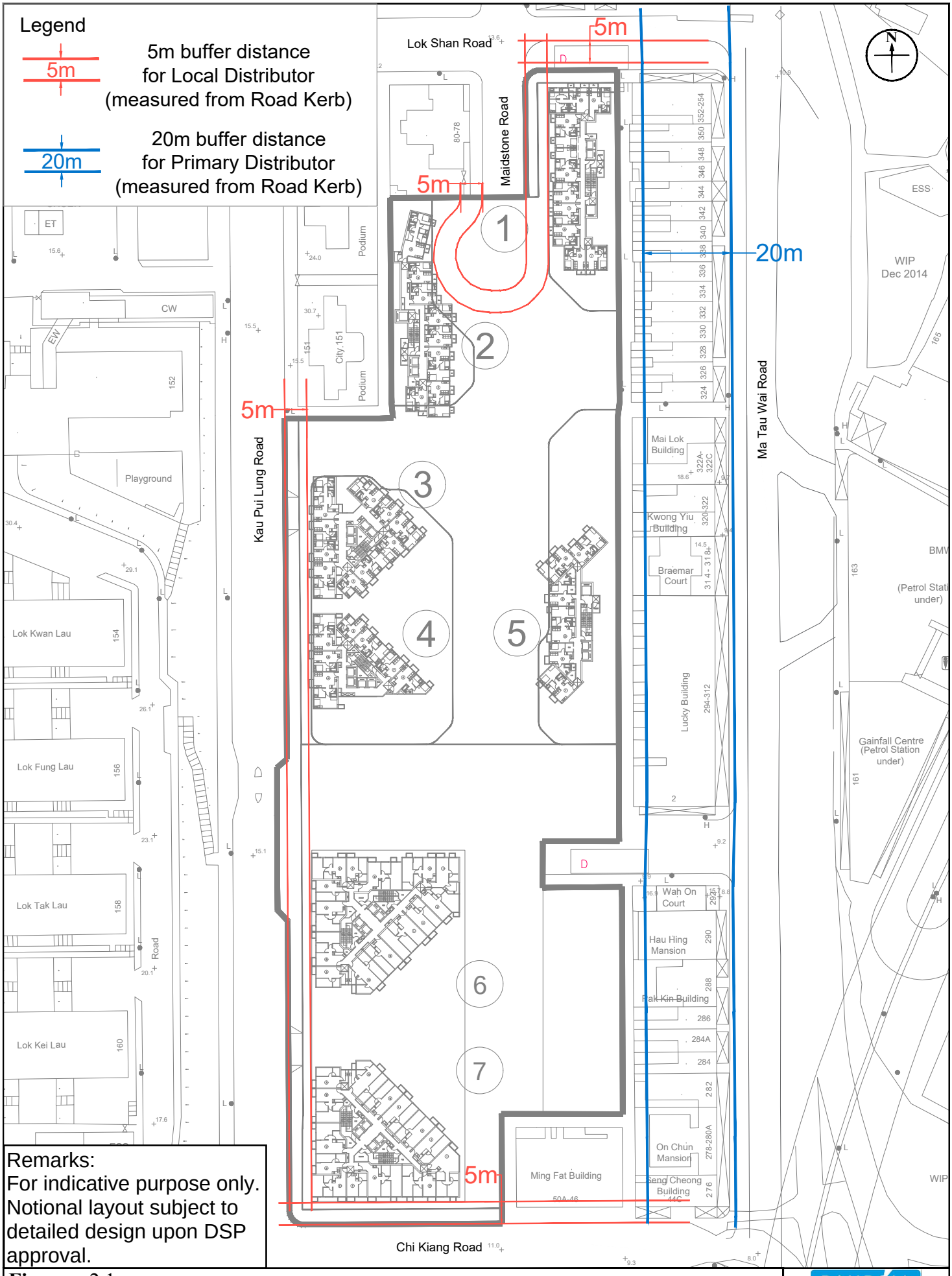

Remarks:
For indicative purpose only.
Notional layout subject to detailed design upon DSP approval.

Figure: 2.1	RAMBOLL
Title: HKPSG Recommended Buffer Distance for Vehicular Emission Impact	Drawn by: KW
	Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0
	Date: Aug 2022

Q:\Projects\URACBS02EI00\04 Deliverables\01 EA Report\01 Figures\v2.0\Fig 2.1 Air Buffer Distance.dwg

Note:
Please refer to Table 2.2 of the Report for Full Name of Buildings.

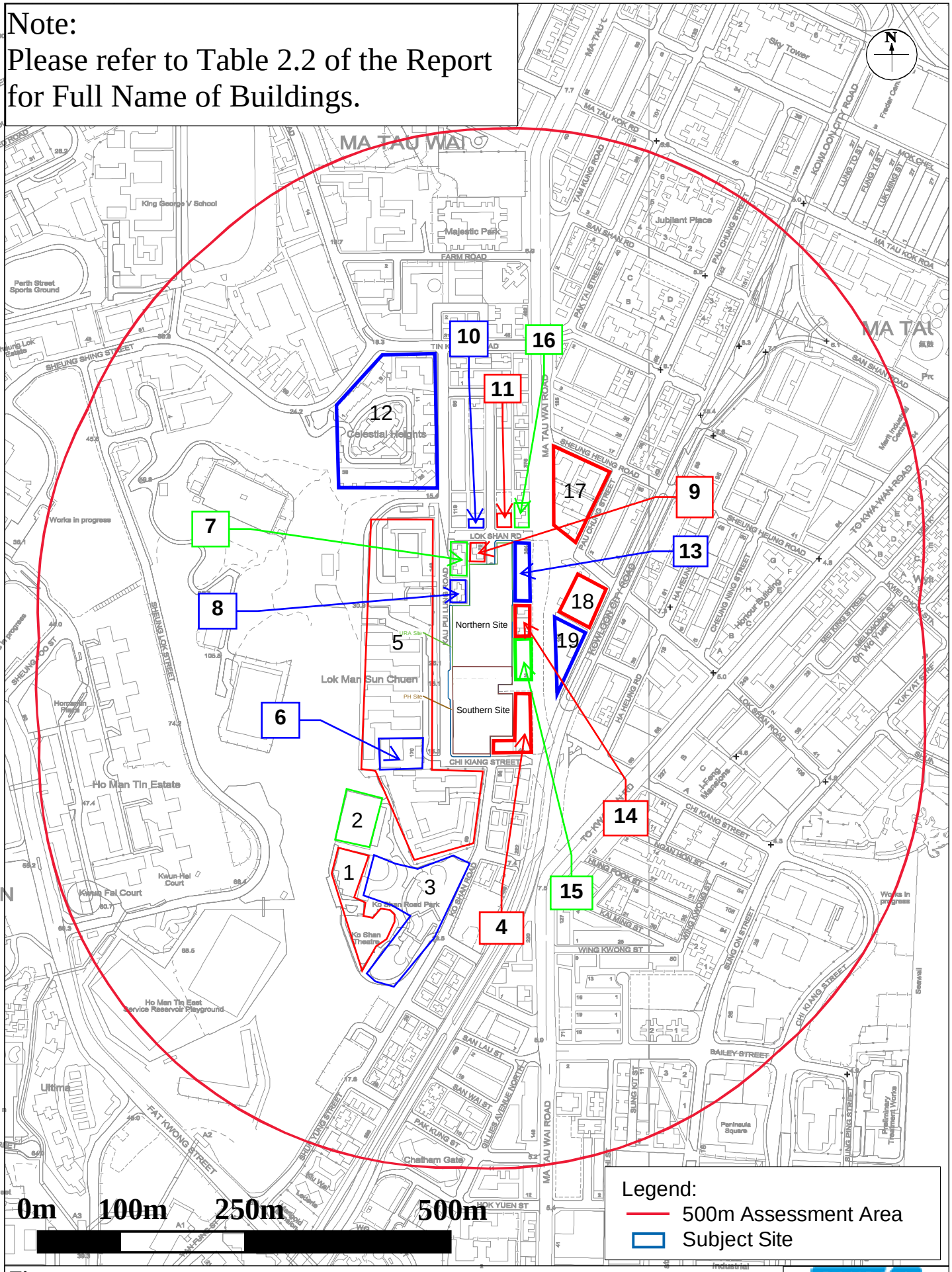

Figure: 2.2	RAMBOLL
Title: Existing Representative Air Sensitive Receivers	Drawn by: WT
	Checked by: TC
Project: Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.0
	Date: Jul 2019

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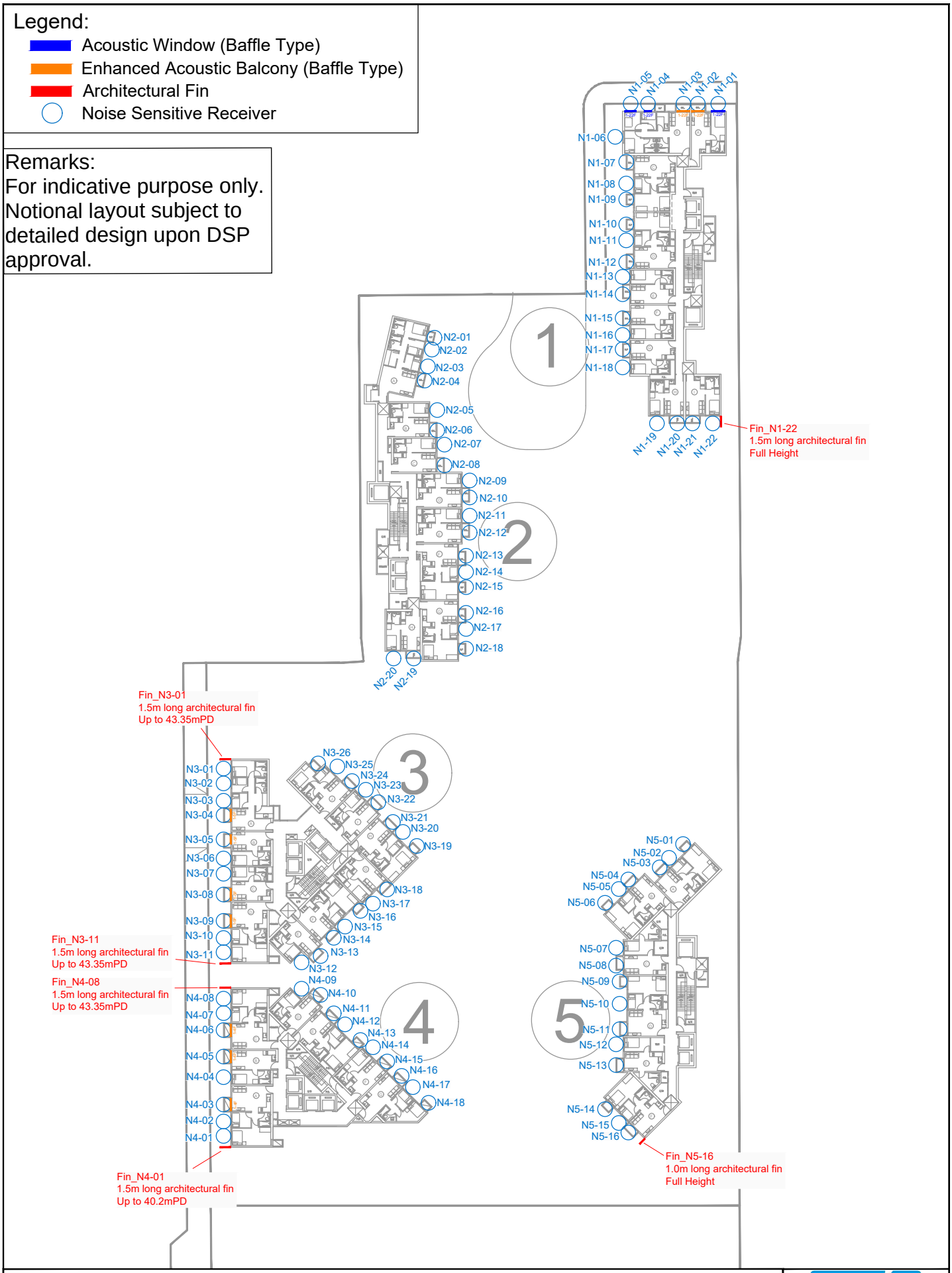

Figure: 3.1

Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Northern Site - Low Zone (1/F - 22/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	HC
Checked by:	TC
Rev.:	2.0
Date:	Oct 2022

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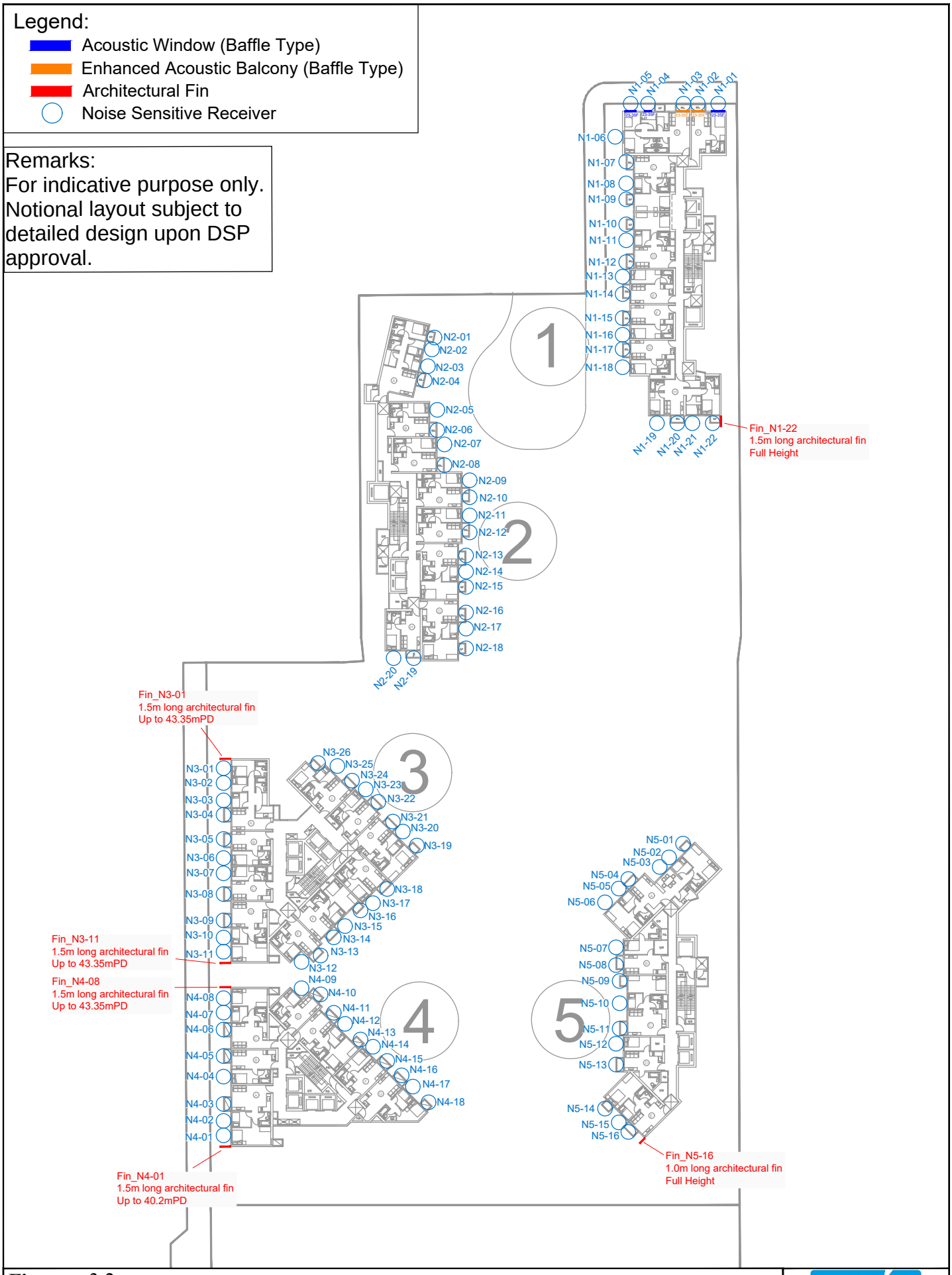

Figure: 3.2

Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Northern Site - High Zone (23/F - 35/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	HC
Checked by:	TC
Rev.:	2.0
Date:	Oct 2022

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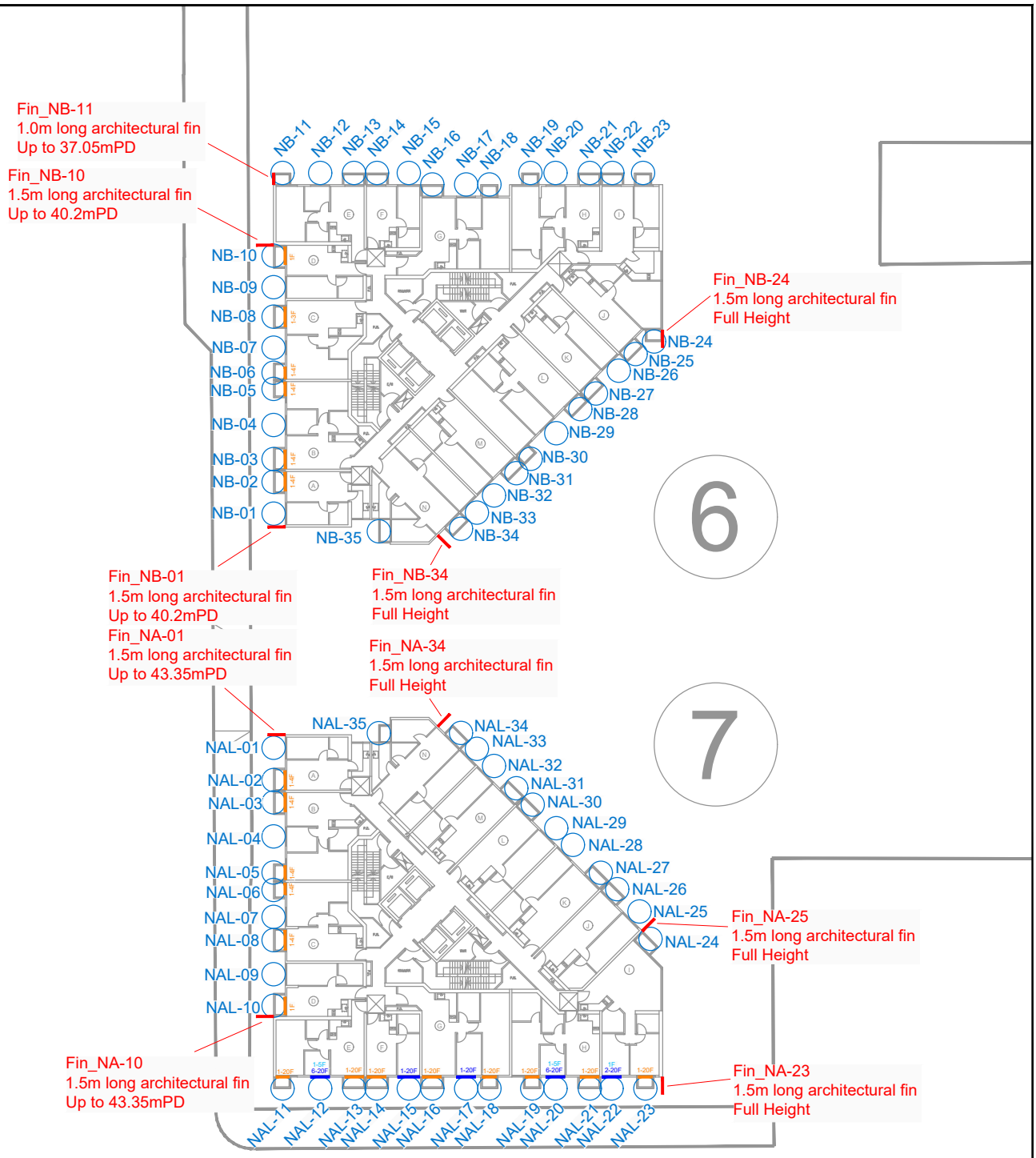

Remarks:
For indicative purpose only.
Notional layout subject to detailed design upon DSP approval.

Legend:
- Acoustic Window (Baffle Type)
- 1-5F Floors requiring SAM
- Enhanced Acoustic Balcony (Baffle Type)
- Architectural Fin
- Noise Sensitive Receiver

Figure: 3.3

Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Southern Site - Low Zone (1/F - 20/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by: HC
Checked by: TC
Rev.: 2.0
Date: Oct 2022

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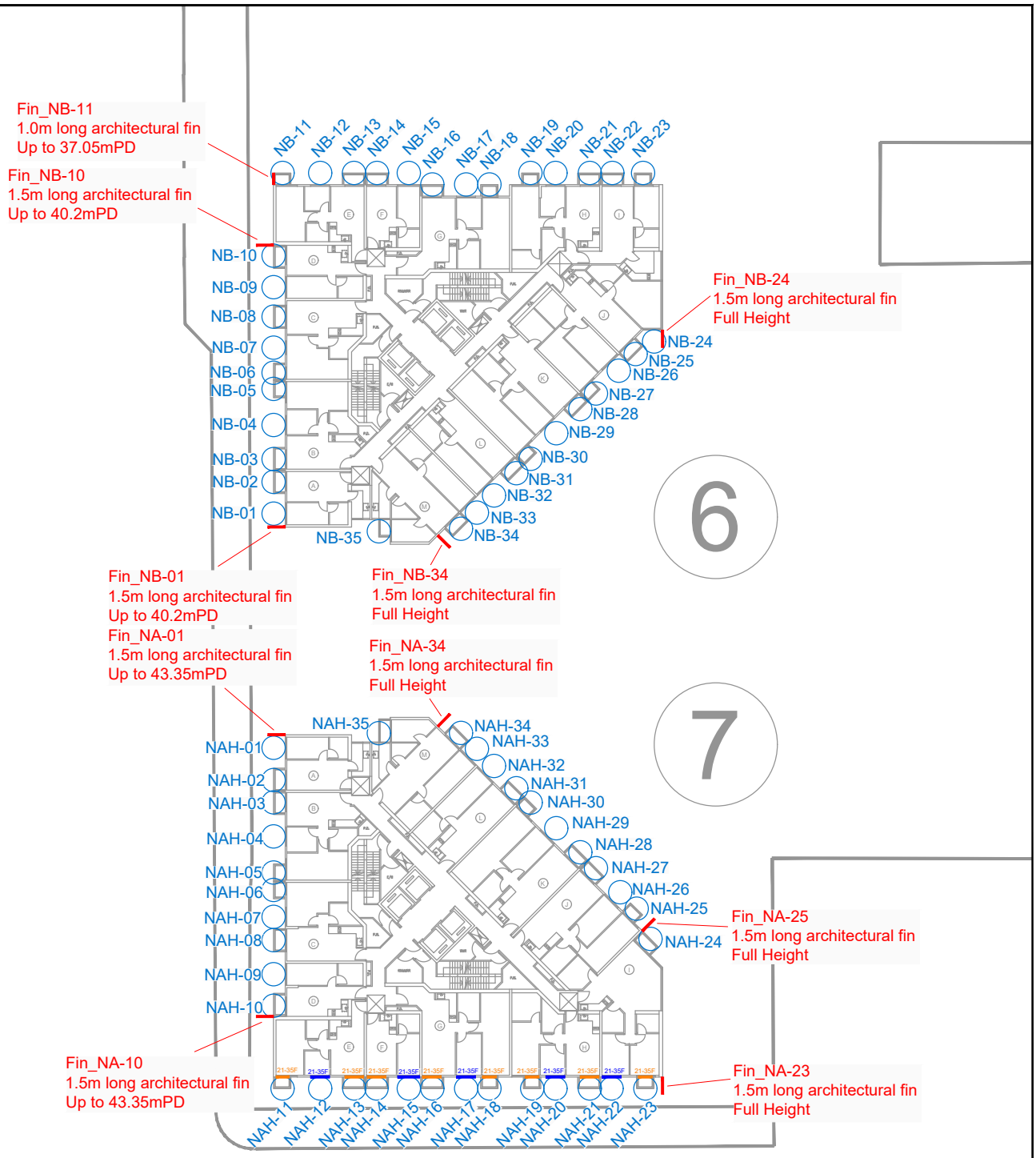

Remarks:
For indicative purpose only.
Notional layout subject to detailed design upon DSP approval.

Legend:
- Acoustic Window (Baffle Type)
- Enhanced Acoustic Balcony (Baffle Type)
- Architectural Fin
- Noise Sensitive Receiver

Figure: 3.4

Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Southern Site - High Zone (21/F - 35/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	HC
Checked by:	TC
Rev.:	2.0
Date:	Oct 2022

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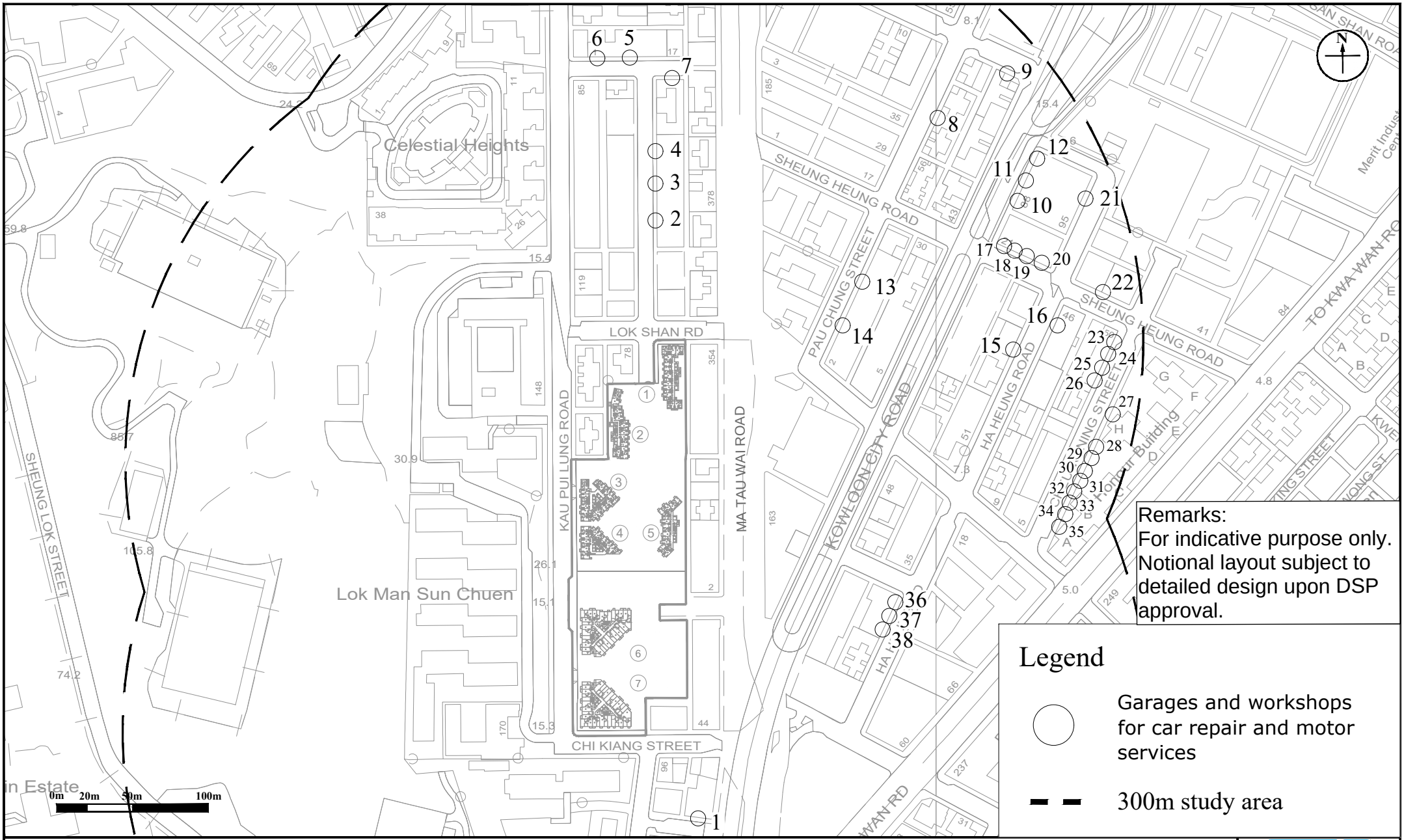


Figure: 4.1	RAMBOLL
Title: Locations of the Identified Garages and Workshops for Car Repair and Motor Services	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Aug 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\01 Industrial\202208 v2.0\Fig 4 300m from Site (Noise).dwg

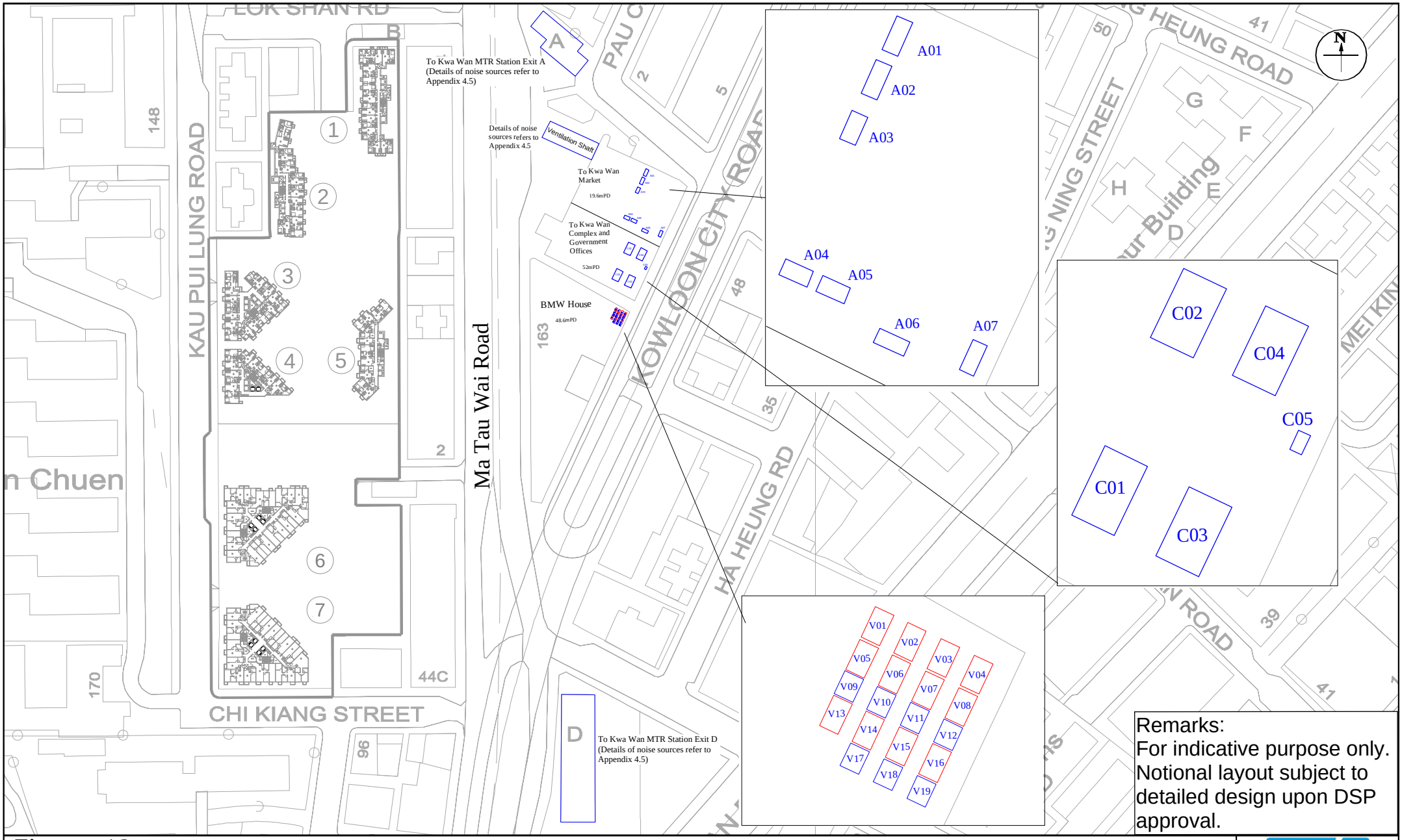


Figure: 4.2	RAMBOLL
Title: Location of Potential Fixed Noise Sources on the Roof of BMW House, To Kwa Wan Complex and Government Offices, To Kwa Wan Market and To Kwa Wan MTR Station	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Aug 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\01 Industrial\202208 v2.0\Fig 4 300m from Site (Noise).dwg

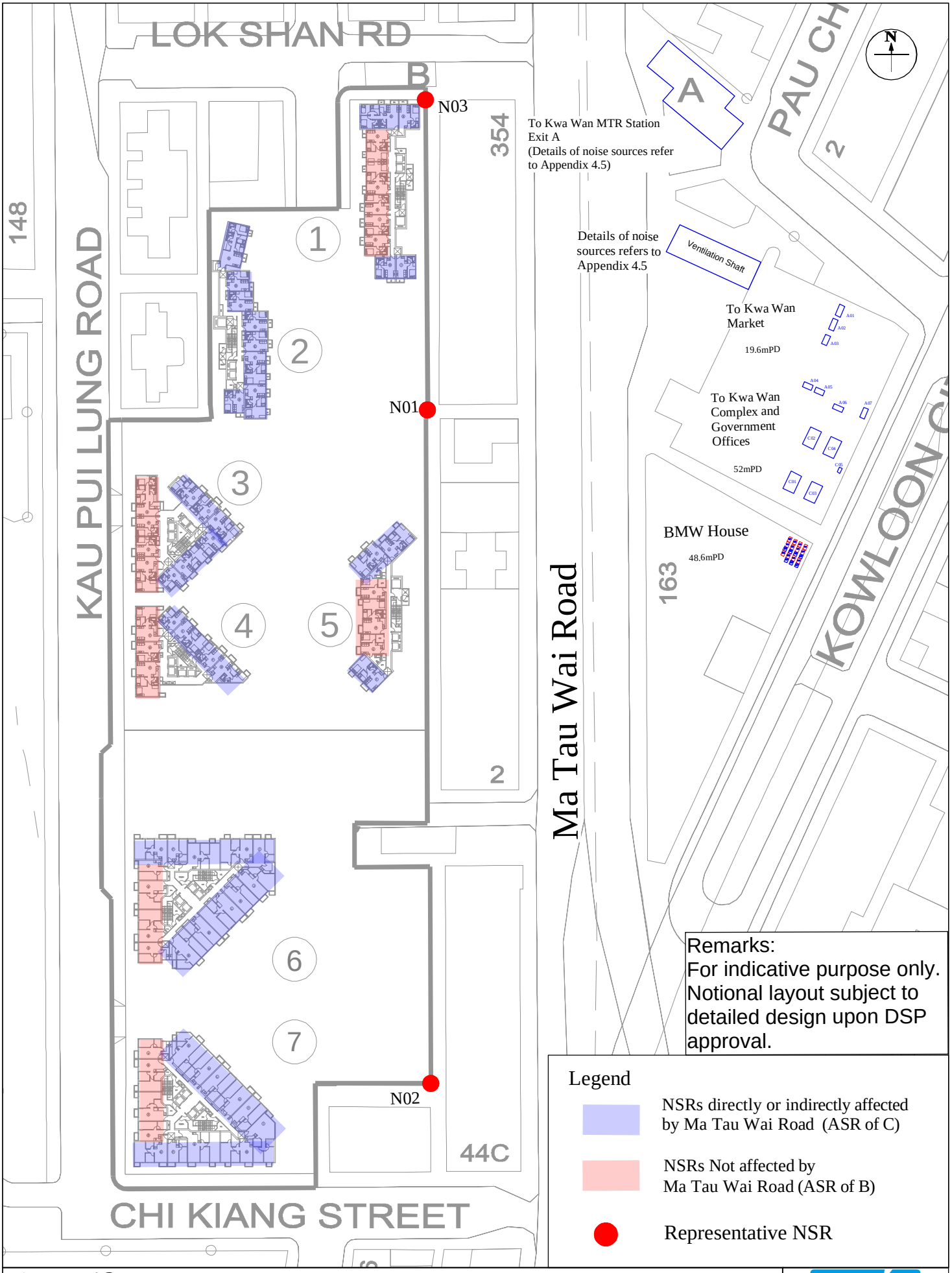
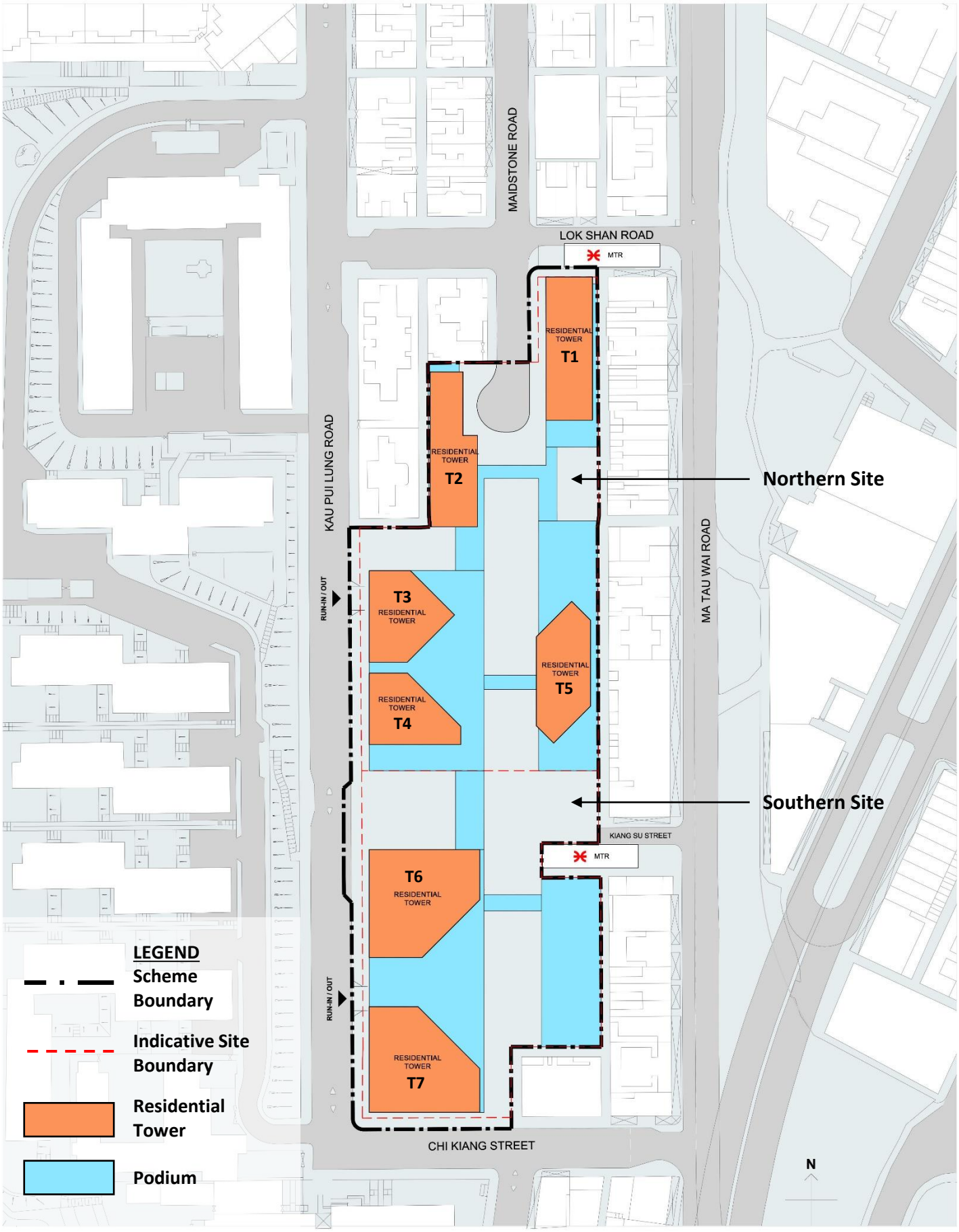


Figure: 4.3	RAMBOLL
Title: Identification of Area Sensitive Rating and Location of Representative Noise Sensitive Receivers for Fixed Noise Impact Assessment	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Aug 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\01 Industrial\202208 v2.0\Fig 4 300m from Site (Noise).dwg

Appendix 1.1

Master Layout Plan



(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Indicative Block Plan	**Figure 1.1**

MAIDSTONE ROAD

LOK SHAN ROAD

C.L. OF ST.

7.5m

KAU PUI LUNG ROAD

MTR

5m

20m

Shuttle Lift Lobby

RETAIL

13.6

OUTLINE OF EVA

RUN-IN / OUT

Retail Lift Lobby

KIANG SU STREET

GIC Lift Lobby

Residential Lift Lobby

GIC

28.6

65.4

20.6

15.2

11.0

9.2

8.9

RAMP DOWN FROM GF TO CAR PARK

1:10

MA TAU WAI ROAD

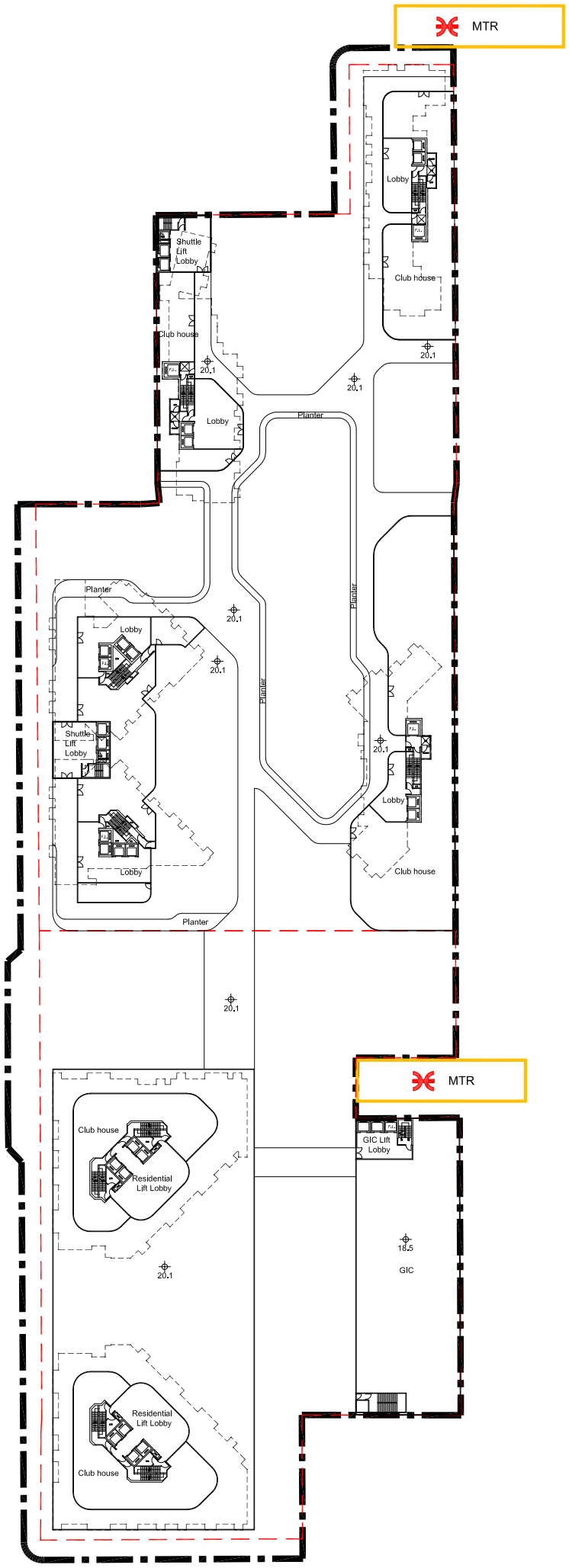
CHI KIANG STREET

N

CBS-2 KC NORTHERN SITE + SOUTHERN SITE

140mPD GF PLAN

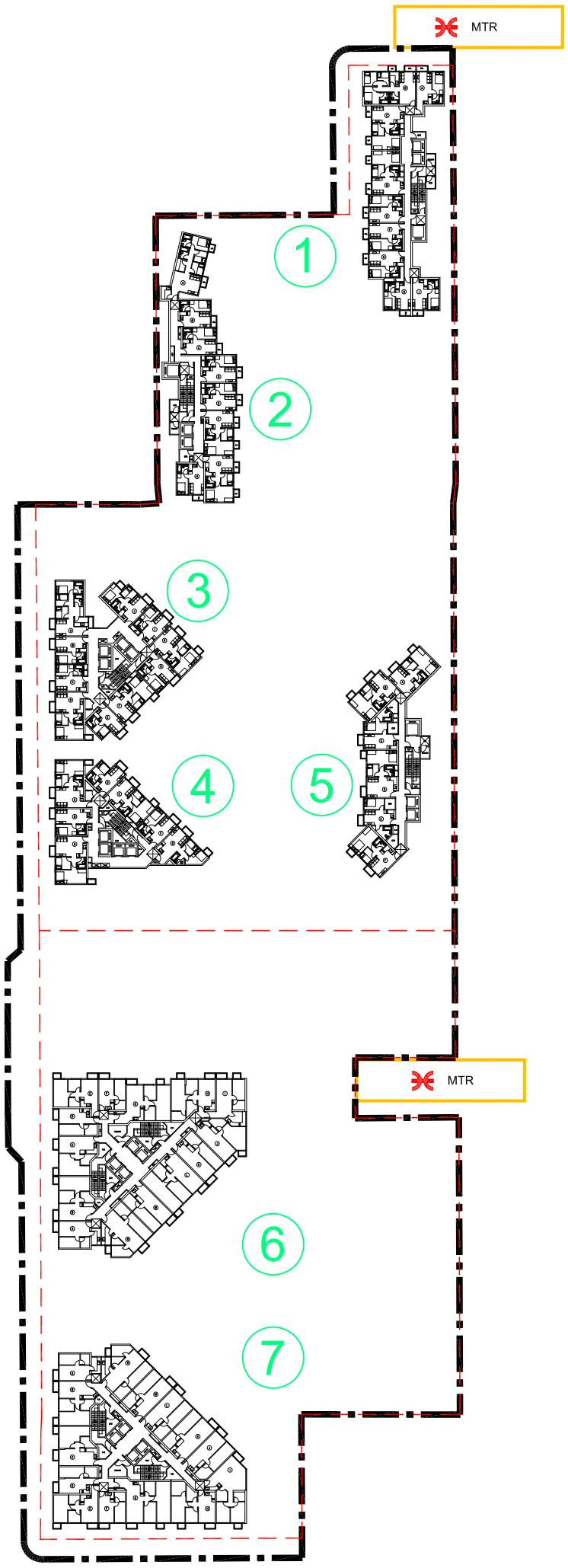
1:1000@A3 2022-09-27



CBS-2 KC NORTHERN SITE + SOUTHERN SITE

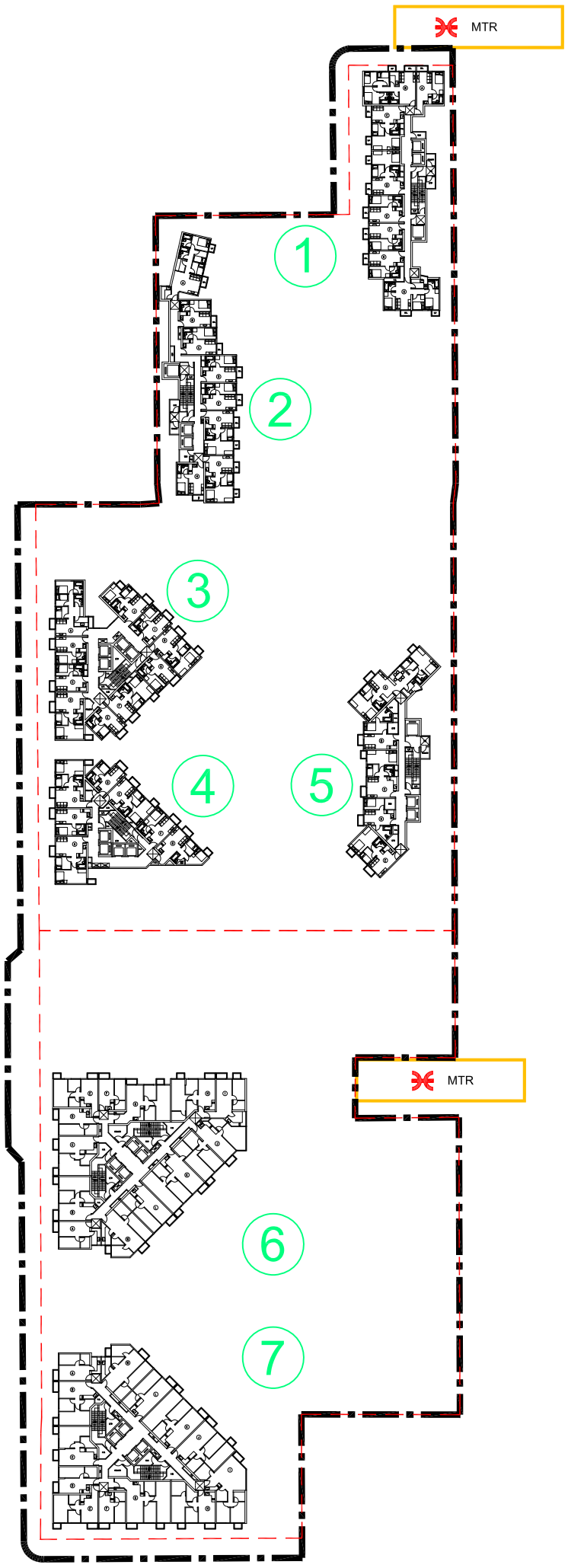
140mPD 1F PLAN

1:1000@A3 2022-09-27



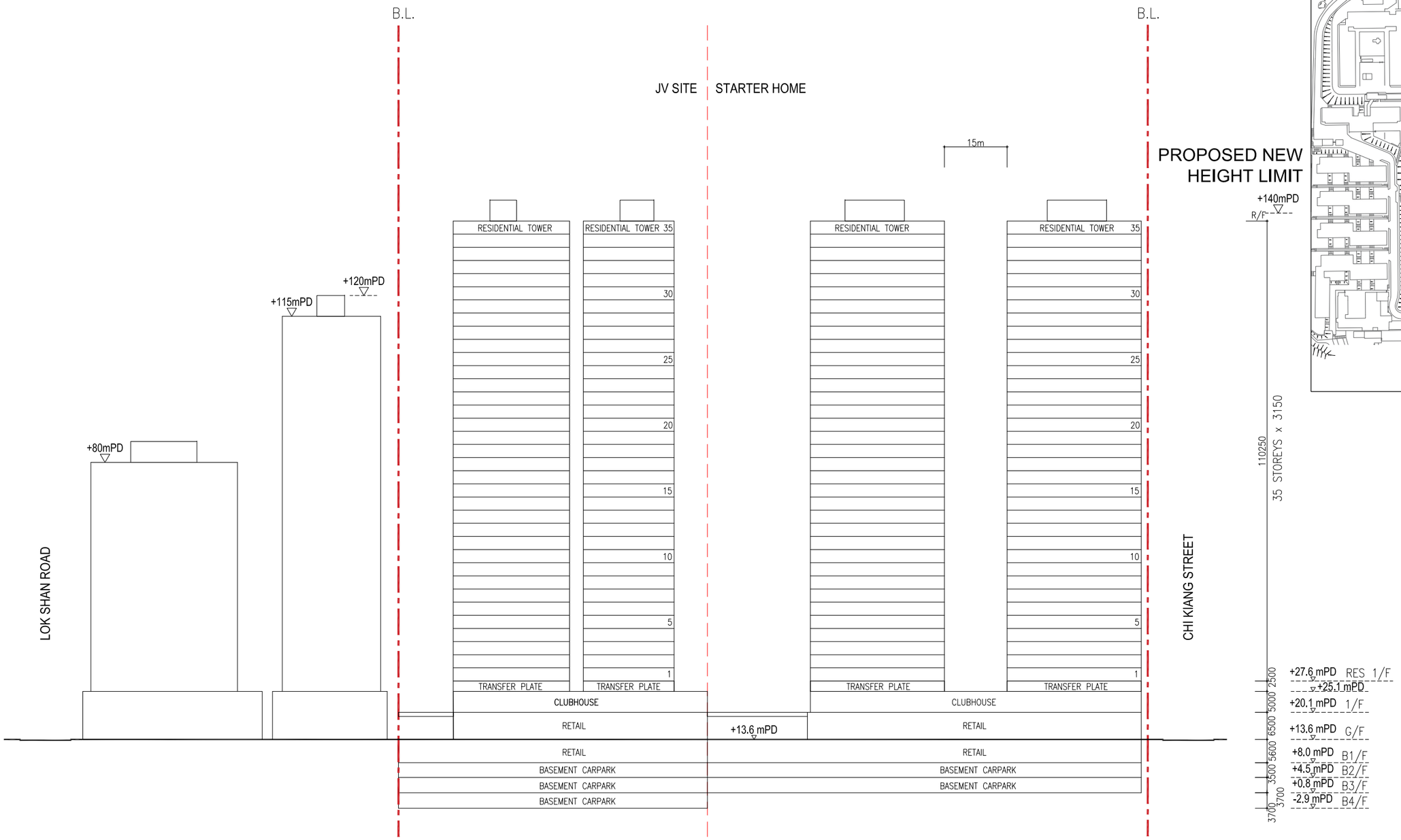
N

CBS-2 KC NORTHERN SITE (1-22F) + SOUTHERN SITE (1-20F)
140mPD TYPICAL FLOOR PLAN (LOW ZONE)
1:1000@A3 2022-09-27



N

CBS-2 KC NORTHERN SITE (23-35F) + SOUTHERN SITE (21-35F)
140mPD TYPICAL FLOOR PLAN (HIGH ZONE)
1:1000@A3 2022-09-27



CBS-2 KC NORTHERN SITE + SOUTHERN SITE
140mPD SECTION AA'
1:1000@A3 2022-09-27

PROPOSED NEW
HEIGHT LIMIT

+140mPD

CELESTIAL
HEIGHTS
+150mPD

+140mPD

MAX. BUILDING HEIGHT
OF LOK MAN SUN CHUEN

+80mPD

EXISITNG
LOK MAN SUN CHUEN

R/F

35 STOREYS x 3150 = 110250

RES 1/F +27.6 mPD
+25.1 mPD
1/F +20.1 mPD
G/F +13.6 mPD
B1/F +8.0 mPD
B2/F +4.5 mPD
B3/F +0.8 mPD
B4/F -2.9 mPD

2500 5000 6500 5600 3500 3700 3700

B.L.

B.L.

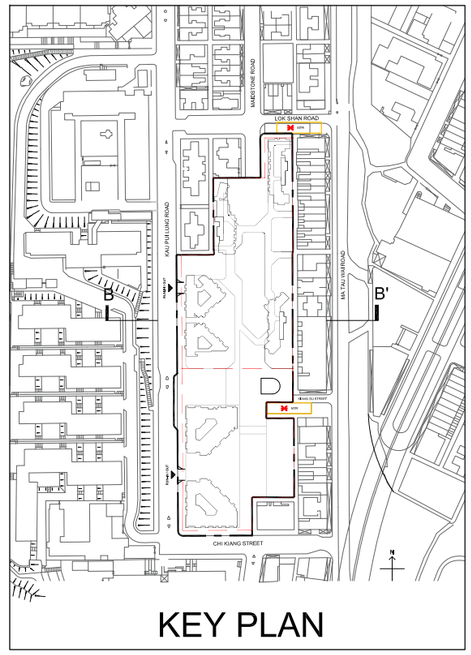
35 RESIDENTIAL TOWER
30
25
20
15
10
5
1 RESIDENTIAL TOWER
TRANSFER PLATE
CLUBHOUSE
RETAIL
L&UL
BASEMENT CARPARK
BASEMENT CARPARK
BASEMENT CARPARK

35 RESIDENTIAL
30
25
20
15
10
5
1 RESIDENTIAL
TRANSFER PLATE
CLUBHOUSE
RETAIL
RETAIL

KAU PUI LUNG ROAD

MA TAU WAI ROAD

+20.6 mPD
+15.2 mPD
+13.6 mPD
+70mPD
+11.0 mPD
+9.2 mPD
+8.9 mPD



KEY PLAN

CBS-2 KC NORTHERN SITE + SOUTHERN SITE
140mPD SECTION BB'
1:1000@A3 2022-09-27

PROPOSED NEW
HEIGHT LIMIT

+140mPD

CELESTIAL
HEIGHTS
+150mPD

+140mPD

MAX. BUILDING HEIGHT
OF LOK MAN SUN CHUEN

R/F

+80mPD

EXISITNG
LOK MAN SUN CHUEN

35 STOREYS x 3150 = 110250

B.L.

B.L.

35 RESIDENTIAL TOWER

30

25

20

15

10

5

1 RESIDENTIAL TOWER
TRANSFER PLATE

CLUBHOUSE

RETAIL

L&UL

RETAIL

BASEMENT CARPARK

BASEMENT CARPARK

KAU PUI LUNG ROAD

MA TAU WAI ROAD

+70mPD

GIC

GIC

GIC

+20.6 mPD

+15.2 mPD

+13.6 mPD

+11.0 mPD

+9.2 mPD

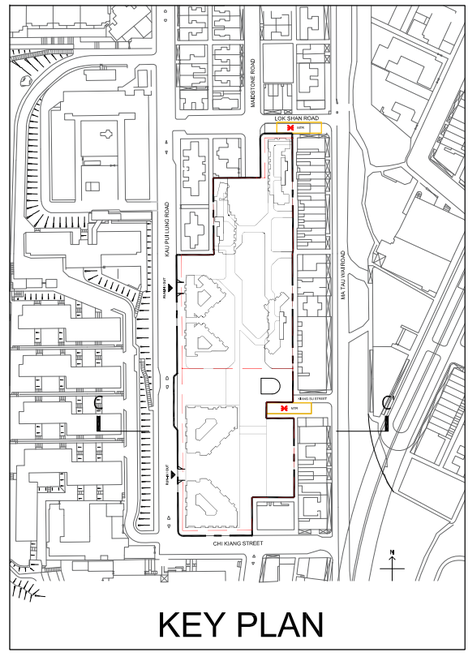
+8.9 mPD

RES 1/F +27.6 mPD
+25.1 mPD
1/F +20.1 mPD
G/F +13.6 mPD
B1/F +8.0 mPD
B2/F +4.5 mPD
B3/F +0.8 mPD

3700 3500 5600 6500 5000 2500

R/F +26.6 mPD
2/F +22.2 mPD
1/F +18.5 mPD
G/F +13.6mPD

4400 3700 4900



KEY PLAN

CBS-2 KC NORTHERN SITE + SOUTHERN SITE
140mPD SECTION CC'
1:1000@A3 2022-09-27

Appendix 2.1

Extract of The Annual Traffic Census 2021 and

Confirmation from Transport Department on the Road Type

Appendix C - AADT of Counting Stations - ordered by Road Names

Road Name	From	To	Stn. No.	Road Type	Stn. Type	AADT 2020	AADT 2021	Change of 2021 as % of 2020
Ma On Shan Rd	Ma On Shan Bypass	Hang Hong St RA	5005	PD	A	24,340	25,520	+4.8
Ma On Shan Rd	Ma On Shan Bypass	Hang Shun St	5913	RT	C	46,990 *	50,410	+7.3
Ma On Shan Rd	Slip rds to & from Tate's Cairn Highway	Hang Shun St	5692	RT	C	47,540	44,630	-6.1
Ma Sik Rd	Fan Leng Lau Rd	Luen Chit St	5895	DD	C	15,030 *	14,980	-0.3
Ma Sik Rd	Jockey Club Rd	Tin Ping Rd	5500	DD	C	20,760	21,600 *	+4.0
Ma Sik Rd	Luen Chit St	Wo Tai St	6091	DD	C	13,040 *	13,570 *	+4.0
Ma Sik Rd	Tin Ping Rd	Fan Leng Lau Rd	5695	DD	C	23,240	22,520	-3.1
Ma Sik Rd	Wo Tai St	Sha Tau Kok Rd - Lung Yeuk Tau	5293	DD	C	14,400 *	14,980 *	+4.0
Ma Tau Chung Rd	Ma Tau Kok Rd	Sung Wong Toi Rd	3436	PD	C	35,730	36,230 *	+1.4
Ma Tau Chung Rd	Sung Wong Toi Rd	Slip rd to Olympic Ave	3638	PD	C	58,320	71,050	+21.8
Ma Tau Chung Rd & FO <K11C>	Kowloon City RA	Tak Ku Ling Rd	4027	PD	C	49,700 *	51,820 *	+4.3
Ma Tau Chung Rd & FO <K11C>	Sung Wong Toi Rd Garden	Kowloon City INT	3831	PD	C	63,100 *	76,950	+22.0
Ma Tau Kok Rd	Kowloon City Rd	Ma Tau Chung Rd	4045	DD	C	7,540 *	7,750 *	+2.8
Ma Tau Kok Rd	Kowloon City Rd	To Kwa Wan Rd	3250	DD	C	7,180 *	7,380 *	+2.8
Ma Tau Pa Rd & Texaco Rd	Yeung Uk Rd	Texaco Rd RA	5230	DD	C	14,590 *	15,160 *	+3.9
Ma Tau Wai Rd	Chi Kiang St	Tin Kwong Rd	3620	PD	C	27,960	28,890	+3.3
Ma Tau Wai Rd	Fat Kwong St	Wuhu St	3840	DD	C	18,760 *	19,320	+3.0
Ma Tau Wai Rd	San Lau St & Bailey St	Fat Kwong St	4040	DD	C	14,320 *	14,710 *	+2.8
Ma Tau Wai Rd	Tin Kwong Rd	Farm Rd	3818	PD	C	31,950 *	34,230	+7.1
Ma Tau Wai Rd & Ma Tau Chung Rd	Farm Rd	Ma Tau Kok Rd	4016	PD	C	28,580 *	28,980 *	+1.4
Ma Tau Wai Rd & To Kwa Wan Rd	San Lau St & Bailey St	Chi Kiang St	3014	DD	A	22,500	23,130	+2.8
Magazine Gap Rd	Garden Rd	Peak Rd	2205	DD	B	15,630	16,160	+3.4
Magic Rd	Penny's Bay Highway	End	5709	LD	C	3,390	3,560	+4.8
Man Fuk Rd	Pui Ching Rd	Man Wan Rd	4626	LD	C	8,090	9,920	+22.5
Man Hong St	Java Rd	King's Rd	1613	PD	C	23,780	25,860	+8.7
Man Kam To Rd	Jockey Club Rd	Boundary	5465	RR	C	17,270	17,960 *	+4.0
Man Yiu St	Man Kwong St	Harbour View St	1647	DD	C	17,680	19,460	+10.1
Man Yue St	Ma Tau Wai Rd	Hung Hom Rd	3698	DD	C	4,420	5,610	+27.1
Marsh Rd	Gloucester Rd	Hennessy Rd	2625	LD	C	9,180	9,260	+0.8
Marsh Rd & FO <H78>	Hung Hing Rd	Lockhart Rd	1859	DD	C	13,130 *	12,600	-4.0
Mau Yip Rd	Po Fung Rd	Wan Hang Rd	6107	DD	C	6,440 *	6,740 *	+4.7

*** AADT estimated by Growth Factor**

Kitty Wong

Subject: FW: URA Confidential Project in Kowloon City

From: Christine LUK [mailto:christineluk@td.gov.hk]
Sent: Friday, July 5, 2019 3:43 PM
To: Horace Mak
Cc: 'W K Kwong'
Subject: Re: URA Confidential Project in Kowloon City

Dear Horace,

I have no comment on your proposed road type.

Regards,

Christine LUK
EK/KC, TEK,TD
Tel 2399 2512

From: "Horace Mak" <horacemak@ctaconsultants.com>
To: <Christineluk@td.gov.hk>
Cc: '"W K Kwong"' <wkkwong@ctaconsultants.com>
Date: 03/06/2019 09:15 AM
Subject: URA Confidential Project in Kowloon City

Dear Christine,

We refer to our telephone conversation on 31 May 2019 regarding the captioned subject.

In order to facilitate the environmental assessment for the proposed development to be carried out by the URA's environmental consultants, we would like to seek your confirmation on the road type of the following roads in the vicinity of the proposed development:

Road Name	Road Type
Lok Shan Road	Local Distributor
Kau Pui Lung Road	Local Distributor
Chi Kiang Street	Local Distributor
Maidstone Road	Local Distributor
Kiang Su Street	Local Distributor

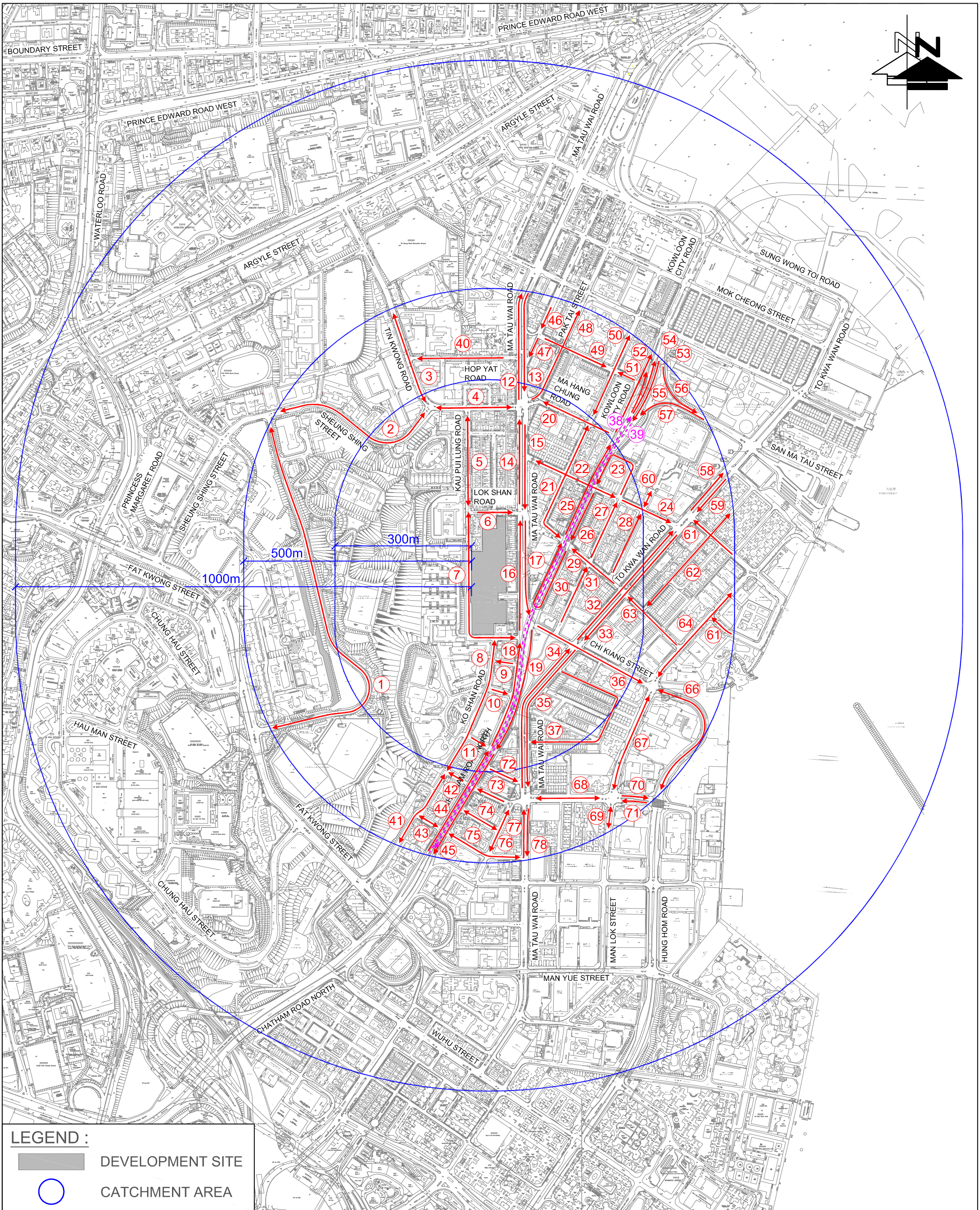
Should you have any queries or require further information, please feel free to contact me at 2214 0849/9172 2107 or our Mr. W. K. Kwong at 2214 0849.
Many thanks for your kind assistance.

Best Regards,

Horace Mak
Director
T : (852) 2214 0849
M : (852) 9172 2107
CTA Consultants Limited

Appendix 3.1

Traffic Forecast Data for Year 2048 for Traffic Noise Impact Assessment



LEGEND :

DEVELOPMENT SITE

CATCHMENT AREA

FIGURE NO.: 1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: INDEX PLAN
SCALE: 1 : 7500 @ A3 / DATE: 14 SEP 2022	CTA Consultants Limited 志達顧問有限公司

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

TRAFFIC FORECAST FOR TRAFFIC NOISE IMPACT ASSESSMENT

Link No.	Road Name	Direction	Year 2048			
			AM Peak		PM Peak	
			Traffic Flow (veh/hr)	HV%	Traffic Flow (veh/hr)	HV%
1	Sheung Lok Street	Two-way	235	10%	125	20%
2	Sheung Shing Street	Two-way	1,635	10%	1,015	15%
3	Tin Kwong Road	Two-way	1,480	15%	1,135	25%
4	Tin Kwong Road	Two-way	1,700	20%	1,295	15%
5	Kau Pui Lung Road	Two-way	760	15%	910	15%
6	Lok Shan Road	EB	360	40%	465	20%
7	Kau Pui Lung Road	Two-way	695	15%	665	15%
8	Ko Shan Road	Two-way	915	20%	855	20%
9	Anhui Street	WB	95	20%	115	80%
10	Kiang Hsi Street	EB	20	15%	20	40%
11	Shan Si Street	EB	230	25%	150	40%
12	Ma Tau Wai Road	NB	865	30%	745	55%
13	Ma Tau Wai Road	SB	2,250	25%	1,765	20%
14	Ma Tau Wai Road	NB	340	85%	445	80%
15	Ma Tau Wai Road	SB	1,765	30%	1,310	30%
16	Ma Tau Wai Road	NB	670	45%	555	70%
17	Ma Tau Wai Road	SB	1,875	35%	1,625	25%
18	Ma Tau Wai Road	NB	1,635	45%	1,490	50%
19	Ma Tau Wai Road	SB	1,210	35%	1,140	25%
20	Ma Hang Chung Road	WB	400	40%	450	15%
21	Pau Chung Street	Two-way	315	30%	345	15%
22	Sheung Heung Road	Two-way	880	20%	770	20%
23	Ha Heung Road	Anti-clockwise	70	30%	65	15%
24	Sheung Heung Road	EB	505	35%	365	25%
25	Kowloon City Road	NB	705	15%	695	15%
26	Kowloon City Road	SB	5	0%	5	0%
27	Ha Heung Road	NB	670	15%	665	15%
28	Cheung Ning Street	NB	40	45%	30	40%
29	Lok Shan Road	WB	850	20%	945	20%
30	Kowloon City Road	Clockwise	5	0%	5	0%
31	Ha Heung Road	NB	265	10%	155	10%
32	To Kwa Wan Road	NB	355	55%	360	55%
33	To Kwa Wan Road	SB	1,195	40%	840	55%
34	To Kwa Wan Road	NB	345	55%	390	55%
35	To Kwa Wan Road	SB	2,320	40%	1,855	40%
36	Chi Kiang Street	EB	1,700	35%	1,400	30%
37	Ngan Hon Street	Clockwise	1,060	75%	815	65%
38	East Kowloon Corridor	NB	3,650	20%	4,090	25%
39	East Kowloon Corridor	SB	2,530	30%	2,220	15%

Appendix 3.2

Results of Road Traffic Noise Impact Assessment

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1a. AM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	73	72	73	73	70	67	68	67	66	66	66	65	65	64	64	64	63	49	48	48	48
2/F	30.75	73	73	73	73	73	70	67	67	67	66	66	65	65	65	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	65	64	64	63	63	50	48	48	49
4/F	37.05	73	73	73	73	73	69	66	67	66	66	66	65	65	64	64	64	63	63	51	49	49	49
5/F	40.2	73	73	73	73	73	69	66	67	66	66	65	65	65	64	64	64	63	63	51	49	50	50
6/F	43.35	74	73	73	73	73	68	66	66	66	66	65	65	65	64	64	63	63	63	52	51	51	52
7/F	46.5	74	73	73	73	73	68	66	66	66	65	65	65	65	64	64	63	63	63	53	52	52	53
8/F	49.65	74	74	73	73	73	68	65	66	66	65	65	65	64	64	64	63	63	63	54	54	54	55
9/F	52.8	74	73	73	73	73	68	65	66	66	65	65	65	65	64	64	63	63	63	56	56	57	59
10/F	55.95	74	73	73	73	73	67	65	66	66	65	65	65	65	64	64	63	63	63	59	60	61	62
11/F	59.1	74	73	73	73	73	67	65	66	66	65	65	65	65	64	64	63	63	63	62	62	62	63
12/F	62.25	74	73	73	73	73	67	65	66	66	65	65	65	64	64	64	63	63	63	63	63	63	64
13/F	65.4	74	73	73	73	72	67	65	66	66	65	65	64	64	64	64	63	63	63	63	63	64	65
14/F	68.55	74	73	73	72	72	67	64	65	65	65	65	64	64	64	64	63	63	63	64	64	64	65
15/F	71.7	73	73	73	72	72	67	64	65	65	65	65	64	64	64	64	63	63	63	64	64	65	66
16/F	74.85	73	73	73	72	72	66	64	65	65	65	65	64	64	64	64	63	63	63	64	65	65	67
17/F	78	73	73	73	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	65	65	66	68
18/F	81.15	73	73	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	65	66	67	69
19/F	84.3	74	73	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	66	67	68	70
20/F	87.45	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	67	68	69	71
21/F	90.6	74	72	72	72	72	66	63	64	64	64	64	64	64	64	63	63	63	63	68	68	70	71
22/F	93.75	74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	70	72
Max. Noise Level		74	74	73	73	73	70	67	68	67	66	66	66	65	65	64	64	64	63	68	69	70	72
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		3	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	69	70	70	72
24/F	100.05	73	72	72	72	72	65	63	64	64	64	64	64	64	63	63	63	63	64	69	70	70	72
25/F	103.2	73	72	72	72	72	65	63	64	64	64	64	64	64	63	63	63	63	64	69	70	71	72
26/F	106.35	73	72	72	72	72	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
27/F	109.5	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
28/F	112.65	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	70	70	71	72
29/F	115.8	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	65	70	71	71	72
30/F	118.95	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	71	71	72
31/F	122.1	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	71	71	72
32/F	125.25	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	71	71	72
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	71	71	71	72
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	63	63	65	71	71	71	72
35/F	134.7	73	72	71	71	71	65	62	63	64	63	63	63	63	63	63	63	63	66	71	71	71	72
Max. Noise Level		74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	66	71	71	71	72
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	3	7	11	13
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		13			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	60	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	61	62	63
3/F	33.9	62	61	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	63
4/F	37.05	62	61	61	60	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
6/F	43.35	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
7/F	46.5	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	63
8/F	49.65	62	61	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
9/F	52.8	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
10/F	55.95	63	62	62	61	61	61	60	60	61	61	61	61	60	60	60	61	62	62	62	62
11/F	59.1	63	62	62	62	62	61	61	60	61	61	61	61	61	60	61	61	62	62	62	62
12/F	62.25	63	62	62	62	62	62	61	61	62	62	61	61	61	61	61	62	62	62	61	62
13/F	65.4	63	63	62	62	62	62	62	61	62	62	62	62	62	62	62	62	63	63	61	62
14/F	68.55	63	63	63	62	63	63	63	62	63	63	63	62	62	62	62	63	63	63	61	62
15/F	71.7	64	63	63	63	63	63	63	62	63	63	63	63	62	62	62	63	63	63	61	62
16/F	74.85	64	63	63	63	63	63	63	62	63	63	63	63	63	63	63	63	63	63	61	61
17/F	78	64	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	61	61
18/F	81.15	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	63	64	61	61
19/F	84.3	64	63	63	63	63	64	63	63	64	64	63	63	63	63	63	63	64	64	61	61
20/F	87.45	64	63	63	63	64	64	63	63	64	64	64	64	63	63	63	64	64	64	61	61
21/F	90.6	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	61	61
22/F	93.75	65	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		65	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	65	64	63	63	64	64	64	63	65	64	64	64	64	64	64	64	64	65	60	61
24/F	100.05	65	64	64	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	65	65	64	63	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	62
27/F	109.5	66	65	64	65	65	65	65	64	66	65	66	66	65	65	65	65	65	65	61	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	66	66	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	62
31/F	122.1	66	65	65	65	66	66	66	64	66	66	67	67	66	66	66	66	66	66	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	67	66	66	66	67	67	67	65	67	67	67	67	67	67	67	67	67	67	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	67	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	67	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	73	73	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	58	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	72	72	72	72	72	72	72	72	72	72	72	61	58	53	50	48	48	48	53	54	54	57	59	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	59	54	51	48	48	49	54	55	55	58	59	60	63	65
5/F	40.2	71	71	71	71	71	71	71	71	71	71	71	61	59	55	51	49	49	50	56	56	57	58	60	61	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	70	70	70	69	69	69	69	61	59	55	52	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	61	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	61	59	56	54	53	53	54	59	59	59	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	69	68	68	61	60	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	61	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	58	58	60	61	61	61	62	62	63	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	63	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	59	59	59	61	61	61	62	62	62	63	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	61	61	62	62	62	63	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	60	60	60	61	62	61	62	62	62	63	64
20/F	87.45	67	67	67	67	67	67	67	66	66	66	66	63	63	62	61	61	61	61	62	62	61	62	62	62	63	63
21/F	90.6	66	67	67	66	66	66	66	66	66	66	66	63	63	62	62	62	62	62	62	62	62	62	62	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	62	62	62	62	62	62	62	62	62	63	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	73	73	64	64	63	63	62	62	62	62	62	62	62	62	62	64	65
No. of Noise Exceedance		5	5	5	5	5	5	5	5	5	5	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	63	63	63	63	63	63	62	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	63	63	62	63	62	63	63	63
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	64	64	63	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	66	65	65	65	65	65	65	65	65	65	65	65	65	64	63	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	63	64	63	63	64	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	63	63	64	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	65	66	66	67	66	67	66	66	65	65	65	64	64	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	66	66	67	66	67	66	66	65	65	65	64	64	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	73	73	73	73	73	73	73	73	51	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	72	54	60	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	58	60	60	60	61	61	61	61	62	62
4/F	37.05	71	71	71	71	71	71	71	71	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	71	59	60	60	60	60	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	61	62
7/F	46.5	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	61	62
8/F	49.65	69	69	69	69	69	69	69	69	59	60	60	60	60	61	61	61	61	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	60	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	58	61	60	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	58	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	58	61	61	61	62	62	62	63	63	63
14/F	68.55	68	68	67	67	68	68	68	68	57	62	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	63	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	63	64	64	64	65
19/F	84.3	66	66	66	66	66	66	66	67	57	63	63	63	63	64	64	64	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	63	64	64	64	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	66	66	67
Max. Noise Level		73	73	73	73	73	73	73	73	59	64	64	64	64	65	65	66	66	67
No. of Noise Exceedance		4	4	4	4	4	4	4	5	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		5			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	67	67
25/F	103.2	66	66	65	65	66	66	66	66	59	65	64	65	65	65	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
32/F	125.25	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	66	66	66	67	67	68	69
34/F	131.55	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	61	66	66	66	66	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	53	54	62	62	62
2/F	30.75	57	57	57	57	57	57	58	57	51	51	52	53	54	62	62	62
3/F	33.9	57	57	57	57	57	57	58	57	53	53	53	54	55	63	63	62
4/F	37.05	57	57	57	57	57	57	58	58	55	55	55	56	56	63	62	62
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	63	62	62
6/F	43.35	57	57	57	57	57	57	59	59	56	56	56	57	57	63	62	62
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
8/F	49.65	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	63	62	62
10/F	55.95	58	58	57	58	58	58	59	59	56	56	57	57	57	63	63	63
11/F	59.1	58	58	58	58	58	58	59	59	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	59	56	56	57	57	58	64	63	63
13/F	65.4	60	59	59	59	58	58	59	59	56	56	57	57	58	64	64	64
14/F	68.55	61	60	60	59	59	59	59	59	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	57	57	57	58	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	57	57	57	58	58	65	65	65
17/F	78	64	63	62	61	61	60	59	59	57	57	57	58	58	65	65	66
18/F	81.15	65	63	63	62	62	61	59	59	57	57	57	58	58	66	66	67
19/F	84.3	65	64	64	63	62	61	59	59	57	57	57	58	58	67	67	67
20/F	87.45	66	65	64	63	63	62	59	59	57	57	57	58	58	67	67	68
21/F	90.6	67	66	65	64	63	62	59	59	57	57	57	57	58	68	68	68
22/F	93.75	68	66	66	65	64	63	59	59	57	57	57	57	58	68	68	68
Max. Noise Level		68	66	66	65	64	63	59	59	57	57	57	58	58	68	68	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	65	64	59	59	56	57	57	57	58	68	68	69
24/F	100.05	69	67	67	66	65	64	59	58	56	56	57	57	58	68	69	69
25/F	103.2	69	67	67	66	65	65	59	58	56	56	57	57	58	69	69	69
26/F	106.35	69	67	67	67	66	65	59	58	56	56	57	57	57	69	69	70
27/F	109.5	69	68	67	67	66	66	59	58	56	56	57	57	57	69	69	70
28/F	112.65	69	67	67	67	66	66	59	58	56	56	57	57	57	69	70	70
29/F	115.8	69	67	67	67	67	66	58	58	56	56	57	57	57	69	70	70
30/F	118.95	69	68	67	67	67	66	58	58	56	56	57	57	57	69	70	70
31/F	122.1	69	68	67	67	67	66	58	58	56	56	56	57	57	69	70	71
32/F	125.25	69	68	67	67	67	66	58	58	56	56	56	57	57	70	70	71
33/F	128.4	69	68	67	67	67	66	58	58	56	56	56	57	57	70	70	71
34/F	131.55	69	68	67	67	67	66	58	58	56	56	56	57	57	70	70	71
35/F	134.7	69	68	67	67	67	66	58	58	56	57	57	57	57	70	70	71
Max. Noise Level		69	68	67	67	67	66	59	59	56	57	57	57	58	70	70	71
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5
No. of Flats with Noise Exceedance		0						0		0			0		5		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	124
Total no. of Flat =	1374
%Compliance =	91%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	73	73	73	73	73	72	72	72	73	73	76	75	76	76	76	76	76	76	76	76	77	77	77	66	65	59	57	56	56	55	55	55	55	55	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	76	76	76	76	76	76	67	66	62	61	59	58	57	57	57	57	57	62
3/F	33.9	71	71	72	72	72	71	71	71	72	72	75	75	75	75	75	75	75	75	76	76	76	76	76	68	67	64	62	61	60	60	59	59	59	59	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	75	74	75	75	75	75	75	75	75	75	76	76	76	68	68	65	64	63	62	62	61	61	61	61	65
5/F	40.2	71	71	71	71	71	71	71	71	71	71	74	74	74	74	74	75	75	75	75	75	75	75	75	69	68	66	65	64	64	63	63	63	63	63	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	74	74	74	74	74	74	74	75	75	75	75	75	69	69	67	66	65	65	65	64	64	64	65	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	74	74	74	74	74	74	74	74	75	75	75	75	75	69	69	67	67	66	66	66	65	65	65	65	65
8/F	49.65	70	70	70	70	70	69	70	70	70	70	74	73	74	74	74	74	74	74	74	74	75	75	75	69	69	68	67	67	66	66	66	66	66	66	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	74	74	74	74	74	74	74	74	74	69	69	68	68	67	67	67	67	66	66	67	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	74	74	74	74	74	74	74	69	69	68	68	67	67	67	67	67	67	67	64
11/F	59.1	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	74	74	74	74	74	69	69	68	68	68	68	67	67	67	67	67	64
12/F	62.25	68	68	68	68	68	68	68	68	68	69	73	73	73	73	73	73	73	73	74	74	74	74	74	69	69	68	68	68	68	68	68	68	68	68	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	73	73	73	73	73	73	73	73	74	74	74	74	69	69	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	73	73	73	73	73	73	73	73	74	74	74	69	69	68	68	68	68	68	68	68	68	68	63
15/F	71.7	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	74	73	69	69	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	73	73	73	73	73	73	73	73	69	69	69	69	68	68	68	68	68	68	69	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	69	69	68	68	68	68	68	68	69	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	70	70	69	69	69	69	69	68	69	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	70	70	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		73	73	73	73	73	72	72	72	73	73	76	75	76	76	76	76	76	76	76	76	77	77	77	70	70	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		5	5	5	5	5	5	5	5	5	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5		5			5			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	67	67	67	67	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	70	70	70	69	69	69	69	69	69	69	69	62
22/F	93.75	66	66	66	66	67	66	66	67	67	67	72	72	72	72	72	73	73	73	73	73	73	73	73	71	71	70	70	70	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	66	66	66	66	67	67	72	72	72	72	73	73	73	73	73	73	73	73	73	71	71	70	70	70	70	70	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	73	73	73	73	73	73	73	73	73	71	71	71	70	70	70	70	70	70	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	73	73	73	73	73	73	73	73	71	71	71	71	71	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	73	73	73	73	73	73	73	73	72	71	71	71	71	70	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	73	73	73	73	73	73	73	74	72	72	71	71	71	71	70	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	74	72	72	71	71	71	71	71	70	70	70	70	61
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	74	72	72	72	71	71	71	71	71	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	74	72	72	72	71	71	71	71	71	70	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	74	73	72	72	71	71	71	71	71	71	71	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	73	73	73	73	73	73	74	73	73	72	72	71	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	73	73	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	73	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	73	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	60
Max. Noise Level		67	67	67	67	67	66	67	67	67	67	72	72	72	72	73	73	73	73	73	73	73	73	74	73	73	72	72	72	71	71	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	14	12	11	11	9	8	7	5	5	4	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		14		11		11		7		5		
No. of Flats		15		15			15			15		15			15		15			15			15		15		15		15		15		15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	72	69	68	67	67	66	65	65	66	66	66	67	67	64	62	61	59	58	57	57	57	56	56	56	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	71	69	68	68	67	66	66	66	66	67	67	67	67	66	65	64	62	61	60	59	59	59	58	58	62
3/F	33.9	71	71	71	71	71	71	71	71	71	71	71	69	68	68	67	66	66	66	66	67	67	67	67	67	66	66	65	64	63	62	62	61	61	61	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	69	68	68	67	66	66	66	66	66	66	67	67	67	67	67	66	66	66	65	64	64	63	63	66
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	68	67	67	66	66	66	66	66	66	66	67	68	67	67	67	67	66	66	66	65	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	67	66	66	66	66	66	66	66	67	68	68	68	68	67	67	67	67	67	66	66	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	69	68	67	67	67	66	66	66	66	66	66	66	67	68	68	68	68	68	68	67	67	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	66	65	66	66	66	66	67	68	68	68	68	68	68	68	68	68	68	67	65
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	67	67	66	66	65	65	66	66	66	67	67	69	69	69	69	69	69	68	68	68	68	68	65
10/F	55.95	69	69	69	69	69	69	69	69	69	69	68	67	67	66	66	66	65	65	66	66	66	67	67	69	69	69	69	69	69	69	69	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	67	67	69	69	69	69	69	69	69	69	69	69	69	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	67	67	70	70	70	70	69	69	69	69	69	69	69	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	67	67	68	70	70	70	70	70	70	70	69	69	69	69	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	67	66	66	66	66	65	65	65	66	66	67	67	68	70	70	70	70	70	70	70	70	69	69	69	64
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	70	70	70	70	70	70	70	70	70	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	70	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	71	70	70	70	70	70	70	70	70	70	70	63
19/F	84.3	67	67	67	67	67	66	67	66	67	66	67	66	66	66	66	65	65	65	66	67	67	67	69	71	71	71	71	70	70	70	70	70	70	70	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	71	71	71	71	71	71	70	70	70	70	70	63
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	72	69	68	68	67	66	66	66	66	67	67	67	69	71	71	71	71	71	71	70	70	70	70	70	66
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0	0	0	3	2	2	2	1	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			4		3			0		0			0			0		3		2		1			0			0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20			20			20		

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	71	71	71	71	71	71	71	70	70	70	70	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	66	65	65	65	65	66	66	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	71	70	70	62
28/F	112.65	66	66	66	66	66	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	72	71	71	71	71	71	71	71	71	71	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	70	72	72	71	71	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	72	72	72	71	71	71	71	71	71	71	71	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	72	72	72	71	71	71	71	71	71	71	71	62
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	65	66	67	67	68	68	70	72	72	72	72	71	72	71	71	71	71	71	62
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	66	66	67	67	68	68	70	72	72	72	72	72	72	71	71	71	71	71	62
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	65	66	66	67	67	68	69	70	72	72	72	72	72	72	71	71	71	71	71	62
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	13	9	8	7	0
No. of Flats with Noise Exceedance		0		0			0			0		0			0		0			0			0		15				15			13			8		
No. of Flats		15		15			15			15		15			15		15			15			15		15				15			15			15		

Summary of Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	308
Total no. of Flat =	950
%Compliance =	68%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	432
Total no. of Flat =	2324
%Compliance =	81%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1b. PM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	72	72	72	72	72	69	66	67	66	65	65	65	64	64	63	63	63	62	49	47	48	48
2/F	30.75	72	72	72	72	72	69	66	66	66	65	65	64	64	64	63	63	63	62	49	48	48	48
3/F	33.9	72	72	72	72	72	68	66	66	66	65	65	64	64	64	63	63	63	62	50	48	48	48
4/F	37.05	72	72	72	72	72	68	65	66	66	65	65	64	64	63	63	63	63	62	50	48	48	49
5/F	40.2	73	72	72	72	72	68	65	66	65	65	64	64	64	63	63	63	62	62	51	49	49	50
6/F	43.35	73	72	72	72	72	67	65	65	65	65	64	64	64	63	63	63	62	62	52	50	50	51
7/F	46.5	73	73	72	72	72	67	65	65	65	65	64	64	64	63	63	63	62	62	53	51	52	53
8/F	49.65	73	73	72	72	72	67	65	65	65	65	64	64	64	63	63	63	62	62	54	53	54	55
9/F	52.8	73	72	72	72	72	67	65	65	65	65	64	64	64	63	63	63	62	62	56	56	57	58
10/F	55.95	73	72	72	72	72	67	64	65	65	65	64	64	64	63	63	63	63	62	59	59	60	61
11/F	59.1	73	72	72	72	72	66	64	65	65	65	64	64	64	63	63	63	63	62	61	62	62	63
12/F	62.25	73	72	72	72	72	66	64	65	65	64	64	64	64	63	63	63	63	62	62	62	63	63
13/F	65.4	73	72	72	72	72	66	64	65	65	64	64	64	64	63	63	63	63	62	63	63	63	64
14/F	68.55	73	72	72	72	71	66	64	65	65	64	64	64	64	63	63	63	62	62	63	63	63	65
15/F	71.7	73	72	72	72	71	66	64	65	64	64	64	64	64	63	63	63	62	62	63	63	64	65
16/F	74.85	73	72	72	71	71	66	63	64	64	64	64	64	63	63	63	63	62	62	64	64	64	66
17/F	78	73	72	72	71	71	66	63	64	64	64	64	63	63	63	63	63	62	62	64	65	65	67
18/F	81.15	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	62	62	62	65	65	66	68
19/F	84.3	73	72	71	71	71	65	63	64	64	64	64	63	63	63	63	62	62	62	65	66	67	69
20/F	87.45	73	72	71	71	71	65	63	64	64	64	63	63	63	63	63	62	62	62	66	67	68	70
21/F	90.6	73	72	71	71	71	65	63	64	64	64	63	63	63	63	63	62	62	63	67	67	68	70
22/F	93.75	73	72	71	71	71	65	63	64	64	63	63	63	63	63	63	62	62	63	67	68	69	70
Max. Noise Level		73	73	72	72	72	69	66	67	66	65	65	65	64	64	63	63	63	63	67	68	69	70
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	62	63	68	68	69	70
24/F	100.05	73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	71
25/F	103.2	73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	71
26/F	106.35	72	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	69	69	69	71
27/F	109.5	72	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	69	69	70	71
28/F	112.65	72	71	71	71	71	64	62	63	63	63	63	63	63	63	62	62	62	64	69	69	70	71
29/F	115.8	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	69	70	71
30/F	118.95	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	69	70	71
31/F	122.1	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	70	70	71
32/F	125.25	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	70	70	71
33/F	128.4	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	70	70	71
34/F	131.55	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	65	70	70	70	71
35/F	134.7	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	63	65	70	70	70	71
Max. Noise Level		73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	63	65	70	70	70	71
No. of Noise Exceedance		13	13	13	8	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		12			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	61	61	60	60	60	59	59	59	60	60	60	60	59	59	59	60	60	59	62	63
2/F	30.75	61	60	60	60	60	59	59	59	60	60	60	60	60	59	60	60	61	60	62	62
3/F	33.9	61	60	60	60	59	59	59	59	60	60	60	60	60	59	60	60	61	60	62	62
4/F	37.05	61	60	60	59	59	59	59	59	60	60	60	60	60	59	60	60	61	61	62	62
5/F	40.2	61	60	60	59	59	59	59	59	60	60	60	60	60	60	60	60	61	61	62	62
6/F	43.35	61	60	60	59	59	59	59	58	60	60	60	60	60	60	60	60	61	61	62	62
7/F	46.5	61	60	60	59	59	59	59	58	60	60	60	60	60	60	60	61	61	61	62	62
8/F	49.65	61	60	60	59	60	59	59	58	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	61	61	60	60	60	59	59	59	60	60	60	60	60	60	60	60	61	61	62	62
10/F	55.95	61	61	61	60	60	60	59	59	60	60	60	60	60	60	60	61	61	61	62	62
11/F	59.1	62	61	61	61	61	60	60	59	61	60	60	60	60	60	60	61	61	62	61	62
12/F	62.25	62	61	61	61	61	61	60	60	61	61	61	61	60	60	60	61	61	62	61	62
13/F	65.4	62	62	61	61	61	61	61	60	62	62	61	61	61	61	61	62	62	62	61	62
14/F	68.55	62	62	61	61	62	62	62	61	62	62	62	62	62	62	62	62	62	63	61	61
15/F	71.7	62	62	61	62	62	62	62	62	63	62	62	62	62	62	62	62	62	63	61	61
16/F	74.85	63	62	62	62	62	63	62	62	63	62	62	62	62	62	62	62	63	63	61	61
17/F	78	63	62	62	62	62	63	62	62	63	63	62	62	62	62	62	62	63	63	61	61
18/F	81.15	63	62	62	62	62	63	62	62	63	63	63	62	62	62	62	63	63	63	60	61
19/F	84.3	63	62	62	62	63	63	62	62	63	63	63	63	63	63	62	63	63	63	60	61
20/F	87.45	63	62	62	62	63	63	63	62	63	63	63	63	63	63	63	63	63	63	60	61
21/F	90.6	63	62	62	62	63	63	63	62	63	63	63	63	63	63	63	63	63	63	60	61
22/F	93.75	64	62	62	62	63	63	63	62	64	63	63	63	63	63	63	63	63	64	60	61
Max. Noise Level		64	62	62	62	63	63	63	62	64	63	63	63	63	63	63	63	63	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	63	62	62	63	63	63	63	64	64	64	64	64	64	63	64	64	64	60	61
24/F	100.05	64	63	62	63	63	64	63	63	64	64	64	64	64	64	64	64	64	64	60	61
25/F	103.2	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
26/F	106.35	64	63	63	63	64	64	64	63	65	64	64	64	64	64	64	64	64	64	60	61
27/F	109.5	65	64	63	63	64	64	64	63	65	65	65	65	64	64	64	64	64	65	60	61
28/F	112.65	65	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	62
29/F	115.8	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	61	62
30/F	118.95	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	61	62
31/F	122.1	65	64	64	64	65	65	65	63	66	65	66	66	65	65	65	65	66	66	61	62
32/F	125.25	65	64	64	64	65	65	65	63	66	66	66	66	66	66	66	66	66	66	61	62
33/F	128.4	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
34/F	131.55	65	65	64	65	66	66	65	64	66	66	66	66	66	66	66	66	66	66	61	63
35/F	134.7	66	65	65	65	66	66	66	64	67	66	67	67	67	67	66	67	67	67	61	63
Max. Noise Level		66	65	65	65	66	66	66	64	67	66	67	67	67	67	66	67	67	67	61	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	73	73	56	55	48	47	47	47	47	50	51	51	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	58	57	51	48	47	47	47	52	53	53	56	58	59	63	64
3/F	33.9	72	72	72	72	72	72	72	71	71	71	71	60	57	53	50	47	47	48	53	53	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	53	50	48	48	48	54	54	55	57	59	59	63	64
5/F	40.2	71	71	71	71	71	71	71	70	70	70	70	61	58	54	51	48	48	49	55	55	56	58	59	60	63	64
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	54	51	49	49	50	56	56	57	59	60	61	64	64
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	54	51	49	50	51	57	57	58	60	61	61	64	64
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	60	58	54	52	50	50	51	57	58	58	60	61	61	63	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	58	55	52	51	51	52	58	58	59	60	61	61	63	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	58	55	53	52	52	53	58	59	59	60	61	61	63	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	60	59	56	55	54	54	54	58	59	59	60	61	61	63	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	60	59	57	56	55	55	55	59	59	59	60	61	61	63	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	59	57	57	57	56	56	59	60	60	61	61	61	63	63
14/F	68.55	68	68	68	68	68	68	68	68	68	67	68	61	60	58	58	57	57	57	60	60	60	61	61	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	61	60	59	58	58	58	58	60	60	60	61	61	62	63	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	61	60	59	58	58	58	58	60	60	60	61	61	62	63	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	61	61	59	59	59	59	59	60	61	60	61	61	62	63	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	61	61	60	59	59	59	59	60	61	61	61	61	62	63	63
19/F	84.3	67	67	67	67	67	67	67	66	66	66	66	62	61	60	60	59	59	59	61	61	61	61	61	62	63	63
20/F	87.45	66	67	66	66	66	66	66	66	66	66	66	62	61	61	60	60	60	60	61	61	61	61	61	62	63	63
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	62	62	61	61	60	61	61	61	61	61	61	61	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	63	63	62	62	61	61	61	62	62	61	61	61	62	63	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	73	73	63	63	62	62	61	61	61	62	62	61	61	61	62	64	64
No. of Noise Exceedance		5	5	5	5	5	5	5	4	4	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	61	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	63	64	63	63	63	63	63	62	62	61	62	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	65	66	65	65	63	64	64	64	63	63	63	63	62	62	62	62	62	63	63
26/F	106.35	65	66	66	65	65	66	65	65	65	65	65	64	64	64	64	63	64	63	63	63	62	62	62	62	63	63
27/F	109.5	65	65	65	65	65	65	65	65	65	65	65	64	64	64	64	64	64	64	63	63	62	62	62	62	63	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	64	64	64	64	64	64	64	63	63	62	62	62	62	63	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	64	64	64	64	63	62	63	62	62	63	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	64	64	63	63	63	62	63	63	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	64	64	63	63	63	63	63	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	64	64	63	63	63	63	63	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	63	63	63	63	63
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	64	63	63	64	63
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	64	65	65	66	65	66	65	65	64	64	64	63	63	64	63
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	64	65	65	66	65	66	65	65	64	64	64	63	63	64	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	72	72	72	72	72	72	51	57	58	58	59	59	60	60	61	61
2/F	30.75	72	72	72	72	72	72	72	72	54	59	59	60	60	60	60	61	61	61
3/F	33.9	71	71	71	71	71	71	71	71	58	59	59	60	60	60	60	61	61	61
4/F	37.05	71	71	71	71	71	71	71	71	59	60	59	60	60	60	60	61	61	61
5/F	40.2	70	70	70	70	70	70	70	70	59	60	59	59	60	60	60	61	61	61
6/F	43.35	70	70	70	70	70	70	70	70	59	60	59	59	60	60	60	61	61	61
7/F	46.5	69	69	69	69	69	69	69	70	59	60	59	59	60	60	60	61	61	61
8/F	49.65	69	69	69	69	69	69	69	69	58	60	59	59	60	60	60	61	61	61
9/F	52.8	69	69	69	69	69	69	69	69	58	60	59	59	60	60	60	61	61	61
10/F	55.95	68	68	68	68	68	68	68	68	58	60	59	60	60	60	61	61	61	62
11/F	59.1	68	68	68	68	68	68	68	68	58	60	60	60	60	60	61	61	61	62
12/F	62.25	68	68	68	68	68	68	68	68	58	60	60	60	60	61	61	62	62	62
13/F	65.4	68	68	68	68	68	68	68	68	57	60	60	61	61	61	62	62	62	63
14/F	68.55	67	67	67	67	67	67	67	67	57	61	61	61	61	61	62	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	57	61	61	61	62	62	62	63	63	63
16/F	74.85	67	67	67	67	67	67	67	67	57	61	61	61	62	62	62	63	63	63
17/F	78	67	67	67	67	67	67	67	67	57	61	61	62	62	62	63	63	63	64
18/F	81.15	66	66	66	66	66	66	66	67	57	62	62	62	62	62	63	63	63	64
19/F	84.3	66	66	66	66	66	66	66	66	57	62	62	62	62	63	63	63	64	64
20/F	87.45	66	66	66	66	66	66	66	66	57	62	62	62	63	63	63	64	64	65
21/F	90.6	66	66	66	66	66	66	66	66	57	63	62	63	63	63	64	64	65	65
22/F	93.75	66	66	66	66	66	66	66	66	57	63	63	63	63	64	64	65	65	66
Max. Noise Level		72	72	72	72	72	72	72	72	59	63	63	63	63	64	64	65	65	66
No. of Noise Exceedance		4	4	4	4	4	4	4	4	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	57	63	63	63	64	64	65	65	65	66
24/F	100.05	66	66	65	65	66	66	66	66	58	63	63	63	64	64	65	65	66	66
25/F	103.2	65	65	65	65	65	65	65	65	58	64	64	64	64	65	65	65	66	66
26/F	106.35	65	65	65	65	65	65	65	65	58	64	64	64	64	65	65	66	66	67
27/F	109.5	65	65	65	65	65	65	65	65	58	64	64	64	64	65	65	66	66	67
28/F	112.65	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
29/F	115.8	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
30/F	118.95	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
31/F	122.1	65	65	65	65	65	65	65	65	59	64	64	64	65	65	66	66	67	67
32/F	125.25	65	65	65	65	65	65	65	65	59	65	64	65	65	65	66	66	67	68
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	67	67	68
34/F	131.55	65	64	64	64	64	64	64	65	60	65	65	65	65	66	66	67	67	68
35/F	134.7	64	64	64	64	64	64	64	64	60	65	65	65	65	66	66	67	67	68
Max. Noise Level		66	66	66	66	66	66	66	66	60	65	65	65	65	66	66	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	55	55	55	56	56	56	57	56	49	49	51	52	53	62	62	62
2/F	30.75	56	56	56	56	56	56	57	56	51	50	51	53	54	62	62	62
3/F	33.9	56	56	56	56	56	56	58	57	52	52	53	54	55	62	62	62
4/F	37.05	56	56	56	57	56	56	58	58	54	54	55	56	56	62	62	62
5/F	40.2	56	56	56	57	56	57	59	58	55	55	56	56	56	62	62	62
6/F	43.35	56	56	56	57	57	57	59	58	56	56	56	56	56	62	62	62
7/F	46.5	57	56	56	57	57	57	59	58	56	56	56	56	57	62	62	62
8/F	49.65	57	57	56	57	57	57	59	58	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	57	57	57	59	58	56	56	56	57	57	62	62	62
10/F	55.95	57	57	57	57	57	57	59	58	56	56	57	57	57	63	62	62
11/F	59.1	58	57	57	57	57	57	59	58	56	56	57	57	57	63	63	63
12/F	62.25	58	58	57	57	57	57	59	58	56	56	57	57	57	63	63	63
13/F	65.4	59	58	58	58	58	57	59	58	56	56	57	57	57	63	63	63
14/F	68.55	60	59	59	58	58	58	59	58	56	56	57	57	57	63	63	63
15/F	71.7	61	60	60	59	59	58	59	59	56	56	57	57	58	64	64	64
16/F	74.85	62	61	60	60	59	59	59	59	56	56	57	57	58	64	64	64
17/F	78	62	62	61	60	60	60	59	59	56	56	57	57	58	65	65	65
18/F	81.15	63	62	62	61	61	60	59	59	56	56	57	57	58	65	66	66
19/F	84.3	64	63	62	62	61	61	59	59	56	56	57	57	58	66	66	67
20/F	87.45	65	64	63	62	62	61	59	58	56	56	57	57	58	66	67	67
21/F	90.6	66	64	64	63	62	61	59	58	56	56	57	57	57	67	67	67
22/F	93.75	66	65	64	63	63	62	59	58	56	56	57	57	57	67	67	68
Max. Noise Level		66	65	64	63	63	62	59	59	56	56	57	57	58	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	67	65	65	64	63	63	59	58	56	56	57	57	57	67	68	68
24/F	100.05	67	66	65	64	64	63	59	58	56	56	57	57	57	68	68	68
25/F	103.2	67	66	65	65	64	64	59	58	56	56	57	57	57	68	68	69
26/F	106.35	68	66	65	65	65	64	58	58	56	56	57	57	57	68	68	69
27/F	109.5	68	66	66	65	65	64	58	58	56	56	56	57	57	68	69	69
28/F	112.65	68	66	66	66	65	64	58	58	56	56	56	57	57	68	69	69
29/F	115.8	68	66	66	66	65	65	58	58	56	56	56	57	57	69	69	70
30/F	118.95	68	66	66	66	65	65	58	58	56	56	56	57	57	69	69	70
31/F	122.1	68	66	66	66	65	65	58	58	56	56	56	57	57	69	69	70
32/F	125.25	68	66	66	66	65	65	58	58	56	56	56	57	57	69	69	70
33/F	128.4	68	66	66	66	65	65	58	58	56	56	56	57	57	69	69	70
34/F	131.55	68	66	66	66	66	65	58	58	56	56	56	57	57	69	69	70
35/F	134.7	68	66	66	66	66	65	58	58	56	56	57	57	57	69	69	70
Max. Noise Level		68	66	66	66	66	65	59	58	56	56	57	57	57	69	69	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	113
Total no. of Flat =	1374
%Compliance =	92%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	73	76	75	75	75	76	76	76	76	76	76	76	77	77	66	64	59	57	55	55	55	55	54	54	55	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	75	76	76	76	76	76	67	66	62	60	58	57	57	56	56	56	56	61
3/F	33.9	71	71	71	71	71	71	71	71	71	72	75	75	75	75	75	75	75	75	75	75	76	76	76	67	66	63	62	60	60	59	59	58	58	58	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	74	74	74	74	74	74	75	75	75	75	75	75	75	68	67	64	63	62	62	61	61	60	60	61	65
5/F	40.2	70	70	70	70	70	70	70	70	70	71	74	74	74	74	74	74	74	75	75	75	75	75	75	68	68	66	65	64	63	63	62	62	62	63	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	74	74	74	74	74	74	74	74	75	75	75	75	68	68	66	66	65	64	64	64	63	64	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	74	73	73	73	74	74	74	74	74	74	74	75	75	69	68	67	66	66	65	65	65	64	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	73	73	73	73	73	74	74	74	74	74	74	74	74	69	68	67	67	66	66	66	65	65	65	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	74	74	74	74	74	74	69	69	67	67	67	66	66	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	74	74	74	74	74	69	69	68	67	67	67	67	66	66	66	66	64
11/F	59.1	68	68	68	68	69	68	68	68	68	69	73	73	73	73	73	73	73	73	73	74	74	74	74	69	69	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	72	72	73	73	73	73	73	73	73	73	74	74	74	69	69	68	68	67	67	67	67	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	67	67	67	67	67	67	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	73	73	73	73	73	73	73	73	69	69	68	68	68	68	67	67	67	67	68	63
15/F	71.7	67	67	67	68	68	67	67	67	68	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	68	68	68	68	68	67	67	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
20/F	87.45	66	66	66	66	67	66	66	66	67	67	71	71	72	72	72	72	72	72	73	73	73	73	73	69	69	69	68	68	68	68	68	68	68	68	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	73	76	75	75	75	76	76	76	76	76	76	76	77	77	69	69	69	68	68	68	68	68	68	68	68	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	66	66	66	66	66	67	71	71	72	72	72	72	72	72	72	73	73	73	73	70	69	69	69	68	68	68	68	68	68	68	61
22/F	93.75	66	66	66	66	66	66	66	66	66	66	71	71	72	72	72	72	72	72	73	73	73	73	73	70	70	69	69	69	69	68	68	68	68	68	61
23/F	96.9	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	73	73	70	70	70	69	69	69	69	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	73	73	70	70	70	70	70	69	69	69	69	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	71	70	70	70	70	70	69	69	69	69	69	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	73	73	73	73	71	71	70	70	70	70	70	69	69	69	69	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	71	71	71	70	70	70	70	70	69	69	69	60
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	71	71	71	70	70	70	70	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	71	71	71	70	70	70	70	70	70	70	70	60
30/F	118.95	65	65	66	66	66	65	66	66	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	72	71	71	71	70	70	70	70	70	70	70	60
31/F	122.1	65	65	65	65	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	71	71	71	70	70	70	70	70	70	60
32/F	125.25	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	71	71	71	70	70	70	70	70	70	60
33/F	128.4	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	71	71	71	70	70	70	70	70	70	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	72	71	71	71	70	70	70	70	70	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	72	71	71	71	70	70	70	70	70	60
Max. Noise Level		66	66	66	66	66	66	66	66	66	67	72	72	72	72	72	72	72	72	73	73	73	73	73	72	72	72	71	71	71	70	70	70	70	70	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	11	10	9	6	5	2	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		10			5			0			0	
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15	

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	65	65	65	65	66	66	66	66	64	62	60	58	57	56	56	56	56	56	56	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	66	66	65	64	63	62	61	59	59	58	58	58	58	61
3/F	33.9	71	71	71	71	71	71	71	71	71	71	70	69	68	67	67	66	66	65	66	66	66	66	66	66	65	65	64	64	62	61	61	61	60	60	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	68	68	67	67	66	65	65	66	66	66	66	66	67	66	66	65	65	65	64	63	63	63	62	65
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	67	67	67	66	65	65	66	66	66	66	66	67	67	67	66	66	66	65	65	65	64	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	65	65	66	66	66	66	66	67	67	67	67	67	66	66	66	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	66	66	66	67	67	67	67	67	67	67	67	66	66	66	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	65	65	65	66	66	66	66	66	68	68	68	68	67	67	67	67	67	67	67	65
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	66	66	66	65	65	65	66	66	66	66	66	68	68	68	68	68	68	68	67	67	67	67	64
10/F	55.95	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	65	66	66	66	66	68	68	68	68	68	68	68	68	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	66	66	66	65	65	65	65	65	66	66	66	67	69	69	69	69	69	68	68	68	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	64	65	66	66	66	67	69	69	69	69	69	69	69	68	68	68	68	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	67	66	66	65	65	65	65	64	65	66	66	66	67	69	69	69	69	69	69	69	69	69	68	68	63
14/F	68.55	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	64	65	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	65	65	65	65	64	64	65	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	65	65	65	65	64	64	65	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	65	65	65	65	64	64	65	66	66	66	68	70	70	70	70	69	69	69	69	69	69	69	63
18/F	81.15	67	67	67	67	67	66	67	66	67	66	67	65	65	65	65	64	64	64	65	66	66	66	68	70	70	70	70	70	70	69	69	69	69	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	65	66	66	66	68	70	70	70	70	70	70	70	69	69	69	69	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	65	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			4		2			0		0			0			0		0		0		0			0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20			20		20		

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	65	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	65	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	65	66	66	67	68	71	70	70	70	70	70	70	70	70	69	69	62
25/F	103.2	66	66	66	65	65	65	65	65	65	65	66	65	65	65	65	64	64	64	66	66	66	67	68	71	70	70	70	70	70	70	70	70	69	69	62
26/F	106.35	66	66	66	65	65	65	65	65	65	65	66	65	65	65	65	64	64	64	65	66	66	67	68	71	71	70	70	70	70	70	70	70	69	69	62
27/F	109.5	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	64	64	66	66	67	67	69	71	71	71	70	70	70	70	70	70	70	70	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	64	64	66	66	67	67	69	71	71	71	71	70	70	70	70	70	70	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	64	64	66	66	67	67	69	71	71	71	71	71	71	70	70	70	70	70	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	64	65	66	66	67	67	69	71	71	71	71	71	71	70	70	70	70	70	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	64	65	66	66	67	68	69	71	71	71	71	71	71	70	70	70	70	70	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	64	65	65	66	66	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	10	9	8	7	7	4	1	0	0	0	0
No. of Flats with Noise Exceedance		0		0			0			0		0			0		0			0			0		12				7			1		0		
No. of Flats		15		15			15			15		15			15		15			15			15		15				15			15		15		

Summary of Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	245
Total no. of Flat =	950
%Compliance =	74%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	358
Total no. of Flat =	2324
%Compliance =	85%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

2. AM Peak - Mitigated Scenario (by Architectual Fins)

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	73	72	73	73	70	67	68	67	66	66	66	65	65	64	64	64	63	49	48	48	48
2/F	30.75	73	73	73	73	73	70	67	67	67	66	66	65	65	65	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	65	64	64	63	63	50	48	48	48
4/F	37.05	73	73	73	73	73	69	66	67	66	66	66	65	65	64	64	64	63	63	50	48	48	49
5/F	40.2	73	73	73	73	73	69	66	67	66	66	65	65	65	64	64	64	63	63	51	49	49	49
6/F	43.35	74	73	73	73	73	68	66	66	66	66	65	65	65	64	64	63	63	63	52	50	50	50
7/F	46.5	74	73	73	73	73	68	66	66	66	65	65	65	65	64	64	63	63	63	52	51	51	50
8/F	49.65	74	74	73	73	73	68	65	66	66	65	65	65	64	64	64	63	63	63	53	52	52	52
9/F	52.8	74	73	73	73	73	68	65	66	66	65	65	65	65	64	64	63	63	63	55	54	54	56
10/F	55.95	74	73	73	73	73	67	65	66	66	65	65	65	65	64	64	63	63	63	58	57	58	59
11/F	59.1	74	73	73	73	73	67	65	66	66	65	65	65	64	64	64	63	63	63	60	59	59	60
12/F	62.25	74	73	73	73	73	67	65	66	66	65	65	65	64	64	64	63	63	63	61	60	60	61
13/F	65.4	74	73	73	73	72	67	65	66	66	65	65	64	64	64	64	63	63	63	62	61	61	62
14/F	68.55	74	73	73	72	72	67	64	65	65	65	65	64	64	64	64	63	63	63	62	61	61	62
15/F	71.7	73	73	73	72	72	67	64	65	65	65	65	64	64	64	64	63	63	63	62	62	62	63
16/F	74.85	73	73	73	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
17/F	78	73	73	73	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	73	73	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	64	65	65	66
19/F	84.3	74	73	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	65	66	66	67
20/F	87.45	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	66	67	67	68
21/F	90.6	74	72	72	72	72	66	63	64	64	64	64	64	64	64	63	63	63	63	67	67	68	68
22/F	93.75	74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	69	69
Max. Noise Level		74	74	73	73	73	70	67	68	67	66	66	66	65	65	64	64	64	63	67	68	69	69
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	69	69
24/F	100.05	73	72	72	72	72	65	63	64	64	64	64	64	64	63	63	63	63	64	68	69	69	69
25/F	103.2	73	72	72	72	72	65	63	64	64	64	64	64	64	63	63	63	63	64	69	69	69	69
26/F	106.35	73	72	72	72	72	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	73	72	72	71	71	65	62	64	64	64	63	63	63	63	63	63	63	65	70	70	70	69
30/F	118.95	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
31/F	122.1	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
32/F	125.25	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
35/F	134.7	73	72	71	71	71	65	62	63	64	63	63	63	63	63	63	63	63	66	70	70	70	70
Max. Noise Level		74	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	60	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	61	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	62
4/F	37.05	62	61	61	60	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
6/F	43.35	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
7/F	46.5	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
8/F	49.65	62	61	61	61	61	60	60	59	61	61	61	61	60	60	60	61	62	62	62	62
9/F	52.8	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
10/F	55.95	63	62	62	61	61	61	60	60	61	61	61	61	60	60	60	61	62	62	62	62
11/F	59.1	63	62	62	62	62	61	61	60	61	61	61	61	61	60	61	61	62	62	61	62
12/F	62.25	63	62	62	62	62	62	61	61	62	62	61	61	61	61	61	62	62	62	61	62
13/F	65.4	63	63	62	62	62	62	62	61	62	62	62	62	62	62	62	62	63	63	61	62
14/F	68.55	63	63	63	62	63	63	63	62	63	63	63	62	62	62	62	63	63	63	61	62
15/F	71.7	64	63	63	63	63	63	63	62	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	64	63	63	63	63	63	63	62	63	63	63	63	63	62	63	63	63	63	61	61
17/F	78	64	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	61	61
18/F	81.15	64	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	64	61	61
19/F	84.3	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	64	64	61	61
20/F	87.45	64	63	63	63	63	63	63	63	64	64	64	64	63	63	63	64	64	64	60	61
21/F	90.6	64	63	63	63	63	63	63	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	65	64	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		65	64	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	65	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
24/F	100.05	65	64	64	64	64	64	64	63	65	65	65	65	65	64	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	65	65	65	65	65	65	65	61	62
28/F	112.65	66	65	65	65	65	65	65	64	66	65	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	65	66	66	64	66	66	66	66	66	66	66	66	66	66	61	62
31/F	122.1	66	65	65	65	66	66	66	64	66	66	67	66	66	66	66	66	66	66	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	67	66	66	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
35/F	134.7	67	66	66	66	67	67	67	65	67	67	68	68	67	68	68	68	67	67	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	67	67	68	68	67	68	68	68	67	67	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	73	73	73	73	73	73	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	72	72	72	72	72	72	71	71	60	58	53	50	48	48	48	53	54	54	57	59	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	54	51	48	48	49	54	55	55	58	59	60	63	65
5/F	40.2	70	71	71	71	71	71	71	71	71	70	70	61	59	55	51	49	49	50	56	56	57	58	60	61	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	50	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	70	70	70	69	69	69	69	60	58	55	52	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	59	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	61	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	60	59	59	59	58	58	60	61	61	61	62	62	63	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	63	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	59	59	59	61	61	61	62	62	62	63	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	61	61	62	62	62	63	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	62	62	61	61	60	60	60	61	62	61	62	62	62	63	64
20/F	87.45	67	67	67	67	67	67	67	66	66	66	66	63	62	62	61	61	61	61	62	62	61	62	62	62	63	63
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	62	62	62	62	62	62	62	62	62	62	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	62	62	62	62	62	62	62	62	62	63	63
Max. Noise Level		72	73	73	73	73	73	73	73	73	73	72	64	64	63	63	62	62	62	62	62	62	62	62	62	64	65
No. of Noise Exceedance		4	5	5	5	5	5	5	5	5	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	63	63	63	63	63	63	62	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	64	64	63	63	63	62	63	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	64	64	64	64	63	63	62	63	62	63	63	63
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	64	63	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	65	65	65	64	63	64	63	63	64	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	65	64	64	64	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	66	66	66	66	66	66	66	65	65	64	64	64	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	73	73	73	73	72	72	51	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	71	54	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	58	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	71	71	71	71	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	61	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	61	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	60	61	61	61	61	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	60	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	60	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	62	63	63	63
14/F	68.55	68	68	67	67	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	63	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	62	63	63	63	63	64	64	64	65
19/F	84.3	66	66	66	66	66	66	66	67	57	63	63	63	63	64	64	64	65	65
20/F	87.45	66	66	66	66	66	66	66	66	57	63	63	63	64	64	64	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	66	66	67
Max. Noise Level		72	72	73	73	73	73	72	72	59	64	64	64	64	65	65	66	66	67
No. of Noise Exceedance		3	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	67	67
25/F	103.2	66	66	65	65	66	66	66	66	59	65	64	65	65	65	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
28/F	112.65	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
32/F	125.25	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	68	68
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	66	66	66	67	67	68	69
34/F	131.55	65	65	65	65	65	65	65	65	61	66	65	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	61	66	66	66	66	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	53	54	62	62	62
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	62	62	62
3/F	33.9	57	57	57	57	57	57	58	57	53	53	53	54	55	63	63	62
4/F	37.05	57	57	57	57	57	57	58	58	55	55	55	56	56	63	62	62
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	63	62	62
6/F	43.35	57	57	57	57	57	57	59	59	56	56	56	57	57	63	62	62
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
8/F	49.65	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	58	56	56	57	57	57	63	62	62
10/F	55.95	58	58	57	58	58	58	59	58	56	56	57	57	57	63	63	63
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	58	64	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	64	64	64
14/F	68.55	61	60	60	59	59	58	59	59	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	59	59	59	59	57	57	57	58	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	57	57	57	58	58	65	65	65
17/F	78	64	63	62	61	61	60	59	59	57	57	57	58	58	65	65	65
18/F	81.15	65	63	63	62	62	61	59	59	57	57	57	58	58	66	66	66
19/F	84.3	65	64	64	63	62	61	59	59	57	57	57	58	58	66	66	66
20/F	87.45	66	65	64	63	63	62	59	59	57	57	57	57	58	66	67	67
21/F	90.6	67	66	65	64	63	62	59	58	57	57	57	57	58	67	67	67
22/F	93.75	68	66	66	64	64	63	59	58	56	56	57	57	58	67	67	67
Max. Noise Level		68	66	66	64	64	63	59	59	57	57	57	58	58	67	67	67
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	64	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	65	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	68	67	67	66	65	59	58	56	56	57	57	57	68	68	68
28/F	112.65	69	67	67	67	66	66	58	58	56	56	57	57	57	68	68	69
29/F	115.8	69	67	67	67	67	66	58	58	56	56	56	57	57	68	68	69
30/F	118.95	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
32/F	125.25	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
33/F	128.4	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
34/F	131.55	69	68	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	68	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	68	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	102
Total no. of Flat =	1374
%Compliance =	93%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	76	75	76	76	76	76	76	76	76	76	77	77	76	66	62	56	56	55	55	55	55	55	55	54	56
2/F	30.75	71	72	72	72	72	72	72	72	71	70	75	75	75	75	75	75	75	76	76	76	76	76	75	67	63	59	58	57	57	57	57	56	56	56	61
3/F	33.9	71	71	71	71	71	71	71	71	71	70	75	75	75	75	75	75	75	75	75	76	76	76	75	68	64	61	60	60	59	59	59	58	58	58	64
4/F	37.05	70	71	71	71	71	71	71	71	70	69	75	74	75	75	75	75	75	75	75	75	75	75	75	68	65	63	63	62	61	61	61	60	60	60	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	74	74	74	74	74	75	75	75	75	75	75	75	74	69	65	64	64	64	63	63	62	62	62	62	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	74	74	74	74	74	74	74	74	75	75	75	75	74	69	66	65	65	65	64	64	64	63	63	63	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	74	74	74	74	74	74	74	74	74	74	75	74	74	69	66	66	66	65	65	65	65	64	64	64	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	74	73	74	74	74	74	74	74	74	74	74	74	73	69	66	66	66	66	66	66	65	65	65	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	74	74	74	74	74	74	74	74	73	69	66	67	67	66	66	66	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	74	74	74	74	74	73	69	67	67	67	67	67	67	66	66	66	66	64
11/F	59.1	68	68	68	68	69	68	68	69	69	69	73	73	73	73	73	73	73	73	74	74	74	74	73	69	67	67	67	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	73	73	73	73	73	73	73	73	73	73	74	73	72	69	67	67	68	67	67	67	67	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	67	67	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	73	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	72	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	72	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	72	70	68	68	68	68	68	68	68	68	68	68	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	71	70	68	69	69	69	68	68	68	68	68	68	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	76	75	76	76	76	76	76	76	76	76	77	77	76	70	68	69	69	69	68	68	68	68	68	68	65
No. of Noise Exceedance		3	4	4	4	4	4	4	4	3	1	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4			4			3		20			20			20			20			20		0		0		0		0		0	
No. of Flats		20			20			20			20		20			20			20			20			20		20		20		20		20		20	

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	67	67	67	67	66	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	71	70	69	69	69	69	69	69	69	69	69	69	62
22/F	93.75	66	66	66	66	67	66	66	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	71	71	69	70	69	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	66	66	66	66	67	67	72	72	72	72	72	72	73	73	73	73	73	73	71	71	70	70	70	70	70	69	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	72	71	71	70	70	70	70	70	70	70	69	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	72	71	71	70	70	70	70	70	70	70	70	70	69	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	72	71	72	70	71	71	70	70	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	73	73	72	71	72	71	71	71	71	70	70	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	73	72	72	71	72	71	71	71	71	71	70	70	70	70	70	61
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	70	70	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	73	73	72	71	72	71	71	71	71	71	71	70	70	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	72	71	73	71	71	71	71	71	71	71	70	70	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	73	73	72	71	73	71	71	71	71	71	71	71	71	70	70	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	72	72	72	72	73	72	72	71	73	71	72	71	71	71	71	71	71	71	70	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	71	71	71	71	71	71	70	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	71	71	71	71	71	71	71	60
Max. Noise Level		66	67	67	67	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	71	73	72	72	72	71	71	71	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	9	10	10	9	8	6	5	4	3	1	0
No. of Flats with Noise Exceedance		0			0			0			0		15			15			15			15			15		10		9			5			3	
No. of Flats		15			15			15			15		15			15			15			15			15		15		15			15			15	

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	65	65	66	66	66	67	67	62	60	61	59	58	57	57	56	56	56	55	56
2/F	30.75	71	72	72	72	72	72	72	71	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	63	63	64	62	61	60	59	59	58	58	57	61
3/F	33.9	71	71	71	71	71	71	71	71	71	70	69	68	68	67	67	66	66	66	66	67	67	67	67	64	64	66	65	64	63	62	62	61	60	60	65
4/F	37.05	70	71	71	71	71	71	71	70	70	69	69	68	68	67	67	66	66	66	66	66	66	67	67	64	65	67	66	66	65	65	64	64	63	62	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	65	66	66	66	66	67	65	66	67	67	67	66	66	66	65	65	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	66	66	67	65	66	68	67	67	67	67	67	66	66	65	65
7/F	46.5	70	70	70	70	70	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	66	66	67	65	67	68	68	68	67	67	67	67	66	66	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	66	66	67	65	67	68	68	68	68	68	68	67	67	66	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	67	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	68	68	68	68	67	67	64
10/F	55.95	69	69	69	69	69	69	69	69	69	68	68	67	66	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	69	69	68	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	69	69	69	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	67	67	67	68	70	69	69	69	69	69	69	69	68	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	67	68	67	68	70	70	70	70	69	69	69	69	69	63
14/F	68.55	68	68	68	68	68	67	68	68	68	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	70	70	70	70	70	70	70	69	69	63
19/F	84.3	67	66	67	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	71	71	71	71	70	70	70	70	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	66	66	66	67	67	67	69	68	70	71	71	71	71	70	70	70	70	69	65
No. of Noise Exceedance		3	4	4	4	4	4	4	3	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	1	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			3		0			0		0			0			0			0		2		1		0			0	
No. of Flats		20		20			20			20		20			20		20			20			20			20		20		20		20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	71	71	71	70	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	71	71	71	71	70	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	66	65	65	65	65	66	66	65	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
28/F	112.65	66	65	66	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	69	71	71	71	71	71	71	71	71	70	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	69	71	71	71	71	71	71	71	71	70	70	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	65	66	67	67	68	68	70	69	71	72	72	71	71	71	71	71	71	71	62
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	66	66	67	67	68	68	70	69	71	72	72	71	71	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	62
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	15	15	15	15	14	10	8	6	4	0
No. of Flats with Noise Exceedance		0		0			0			0		0			0		0			0			0			15			15			10			6	
No. of Flats		15		15			15			15		15			15		15			15			15			15			15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	281
Total no. of Flat =	950
%Compliance =	70%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	77
No. of Noise Exceeded Flat =	383
Total no. of Flat =	2324
%Compliance =	84%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

3. AM Peak - Mitigated Scenario (by Architectual Fins, Acoustic Window (Baffle Type) with/without SAM and Enhanced Acoustic Blacony (Baffle Type))

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	67	65	64	70	69	70	67	68	67	66	66	66	65	65	64	64	64	63	49	48	48	48
2/F	30.75	67	65	65	70	68	70	67	67	67	66	66	65	65	65	64	64	63	63	50	48	48	48
3/F	33.9	67	65	65	69	68	69	66	67	67	66	66	65	65	65	64	64	63	63	50	48	48	48
4/F	37.05	67	65	65	70	68	69	66	67	66	66	66	65	65	64	64	64	63	63	50	48	48	49
5/F	40.2	67	65	65	70	68	69	66	67	66	66	65	65	65	64	64	64	63	63	51	49	49	49
6/F	43.35	68	65	65	70	68	68	66	66	66	66	65	65	65	64	64	63	63	63	52	50	50	50
7/F	46.5	68	65	65	70	68	68	66	66	66	65	65	65	65	64	64	63	63	63	52	51	51	50
8/F	49.65	68	66	65	70	68	68	65	66	66	65	65	65	64	64	64	63	63	63	53	52	52	52
9/F	52.8	68	65	65	70	68	68	65	66	66	65	65	65	65	64	64	63	63	63	55	54	54	56
10/F	55.95	68	65	65	70	68	67	65	66	66	65	65	65	65	64	64	63	63	63	58	57	58	59
11/F	59.1	68	65	65	70	68	67	65	66	66	65	65	65	64	64	64	63	63	63	60	59	59	60
12/F	62.25	68	65	65	70	68	67	65	66	66	65	65	65	64	64	64	63	63	63	61	60	60	61
13/F	65.4	68	65	65	70	68	67	65	66	66	65	65	64	64	64	64	63	63	63	62	61	61	62
14/F	68.55	68	65	65	69	68	67	64	65	65	65	65	64	64	64	64	63	63	63	62	61	61	62
15/F	71.7	67	65	65	69	68	67	64	65	65	65	65	64	64	64	64	63	63	63	62	62	62	63
16/F	74.85	67	65	65	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
17/F	78	67	65	65	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	67	65	64	69	68	66	64	65	65	65	64	64	64	64	63	63	63	63	64	65	65	66
19/F	84.3	68	65	64	69	68	66	64	65	65	65	64	64	64	64	63	63	63	63	65	66	66	67
20/F	87.45	68	64	64	69	68	66	63	65	65	64	64	64	64	64	63	63	63	63	66	67	67	68
21/F	90.6	68	64	64	69	68	66	63	64	64	64	64	64	64	64	63	63	63	63	67	67	68	68
22/F	93.75	68	64	64	69	68	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	69	69
Max. Noise Level		68	66	65	70	69	70	67	68	67	66	66	66	65	65	64	64	64	63	67	68	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	68	64	64	69	68	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	69	69
24/F	100.05	67	64	64	69	67	65	63	64	64	64	64	64	64	63	63	63	63	64	68	69	69	69
25/F	103.2	67	64	64	69	67	65	63	64	64	64	64	64	64	63	63	63	63	64	69	69	69	69
26/F	106.35	67	64	64	69	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	67	64	64	69	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	67	64	64	68	67	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	67	64	64	68	67	65	62	64	64	64	63	63	63	63	63	63	63	65	70	70	70	69
30/F	118.95	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
31/F	122.1	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
32/F	125.25	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	63	63	65	70	70	70	69
33/F	128.4	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
34/F	131.55	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
35/F	134.7	67	64	63	68	67	65	62	63	64	63	63	63	63	63	63	63	63	66	70	70	70	70
Max. Noise Level		68	64	64	69	68	66	63	64	64	64	64	64	64	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	60	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	61	61	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	62
4/F	37.05	62	61	61	60	61	60	60	60	61	61	61	61	60	60	60	61	62	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
6/F	43.35	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
7/F	46.5	62	61	61	60	60	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
8/F	49.65	62	61	61	61	61	60	60	59	61	61	61	61	60	60	60	61	62	62	62	62
9/F	52.8	62	62	61	61	61	60	60	60	61	61	61	61	60	60	60	61	62	62	62	62
10/F	55.95	63	62	62	61	61	61	60	60	61	61	61	61	60	60	60	61	62	62	62	62
11/F	59.1	63	62	62	62	62	61	61	60	61	61	61	61	61	60	61	61	62	62	61	62
12/F	62.25	63	62	62	62	62	62	61	61	62	62	61	61	61	61	61	62	62	62	61	62
13/F	65.4	63	63	62	62	62	62	62	61	62	62	62	62	62	62	62	62	63	63	61	62
14/F	68.55	63	63	63	62	63	63	63	62	63	63	63	62	62	62	62	63	63	63	61	62
15/F	71.7	64	63	63	63	63	63	63	62	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	64	63	63	63	63	63	63	62	63	63	63	63	63	62	63	63	63	63	61	61
17/F	78	64	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	61	61
18/F	81.15	64	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	64	61	61
19/F	84.3	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	64	64	61	61
20/F	87.45	64	63	63	63	63	63	63	63	64	64	64	64	63	63	63	64	64	64	60	61
21/F	90.6	64	63	63	63	63	63	63	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	65	64	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		65	64	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	65	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
24/F	100.05	65	64	64	64	64	64	64	63	65	65	65	65	65	64	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	65	65	65	65	65	65	65	61	62
28/F	112.65	66	65	65	65	65	65	65	64	66	65	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	65	66	66	64	66	66	66	66	66	66	66	66	66	66	61	62
31/F	122.1	66	65	65	65	66	66	66	64	66	66	67	66	66	66	66	66	66	66	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	67	66	66	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
35/F	134.7	67	66	66	66	67	67	67	65	67	67	68	68	67	68	68	68	67	67	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	67	67	68	68	67	68	68	68	67	67	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	65	65	73	73	65	65	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	64	65	72	72	65	64	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	64	64	72	72	64	64	71	71	60	58	53	50	48	48	48	53	54	54	57	59	59	63	64
4/F	37.05	71	71	71	63	64	71	71	64	63	71	71	61	58	54	51	48	48	49	54	55	55	58	59	60	63	65
5/F	40.2	70	71	71	63	63	71	71	63	63	70	70	61	59	55	51	49	49	50	56	56	57	58	60	61	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	50	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	70	70	70	69	69	69	69	60	58	55	52	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	59	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	61	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	60	59	59	59	58	58	60	61	61	61	62	62	63	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	63	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	59	59	59	61	61	61	62	62	62	63	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	61	61	62	62	62	63	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	62	62	61	61	60	60	60	61	62	61	62	62	62	63	64
20/F	87.45	67	67	67	67	67	67	67	66	66	66	66	63	62	62	61	61	61	61	62	62	61	62	62	62	63	63
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	62	62	62	62	62	62	62	62	62	62	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	62	62	62	62	62	62	62	62	62	63	63
Max. Noise Level		72	73	73	70	70	73	73	70	70	73	72	64	64	63	63	62	62	62	62	62	62	62	62	62	64	65
No. of Noise Exceedance		4	5	5	0	0	5	5	0	0	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	63	63	63	63	63	63	62	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	64	64	63	63	63	62	63	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	64	64	64	64	63	63	62	63	62	63	63	63
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	64	64	64	64	63	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	65	65	65	64	63	64	63	63	64	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	65	64	64	64	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	66	66	66	66	66	66	66	65	65	64	64	64	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	65	73	65	65	72	72	51	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	64	72	64	64	72	71	54	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	63	71	63	63	71	71	58	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	63	71	63	63	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	61	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	61	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	60	61	61	61	61	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	60	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	60	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	62	63	63	63
14/F	68.55	68	68	67	67	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	63	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	62	63	63	63	63	64	64	64	65
19/F	84.3	66	66	66	66	66	66	66	67	57	63	63	63	63	64	64	64	65	65
20/F	87.45	66	66	66	66	66	66	66	66	57	63	63	63	64	64	64	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	66	66	67
Max. Noise Level		72	72	70	73	70	70	72	72	59	64	64	64	64	65	65	66	66	67
No. of Noise Exceedance		3	4	0	4	0	0	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	67	67
25/F	103.2	66	66	65	65	66	66	66	66	59	65	64	65	65	65	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
28/F	112.65	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
32/F	125.25	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	68	68
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	66	66	66	67	67	68	69
34/F	131.55	65	65	65	65	65	65	65	65	61	66	65	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	61	66	66	66	66	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	53	54	62	62	62
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	62	62	62
3/F	33.9	57	57	57	57	57	57	58	57	53	53	53	54	55	63	63	62
4/F	37.05	57	57	57	57	57	57	58	58	55	55	55	56	56	63	62	62
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	63	62	62
6/F	43.35	57	57	57	57	57	57	59	59	56	56	56	57	57	63	62	62
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
8/F	49.65	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	58	56	56	57	57	57	63	62	62
10/F	55.95	58	58	57	58	58	58	59	58	56	56	57	57	57	63	63	63
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	58	64	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	64	64	64
14/F	68.55	61	60	60	59	59	58	59	59	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	59	59	59	59	57	57	57	58	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	57	57	57	58	58	65	65	65
17/F	78	64	63	62	61	61	60	59	59	57	57	57	58	58	65	65	65
18/F	81.15	65	63	63	62	62	61	59	59	57	57	57	58	58	66	66	66
19/F	84.3	65	64	64	63	62	61	59	59	57	57	57	58	58	66	66	66
20/F	87.45	66	65	64	63	63	62	59	59	57	57	57	57	58	66	67	67
21/F	90.6	67	66	65	64	63	62	59	58	57	57	57	57	58	67	67	67
22/F	93.75	68	66	66	64	64	63	59	58	56	56	57	57	58	67	67	67
Max. Noise Level		68	66	66	64	64	63	59	59	57	57	57	58	58	67	67	67
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	64	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	65	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	68	67	67	66	65	59	58	56	56	57	57	57	68	68	68
28/F	112.65	69	67	67	67	66	66	58	58	56	56	57	57	57	68	68	69
29/F	115.8	69	67	67	67	67	66	58	58	56	56	56	57	57	68	68	69
30/F	118.95	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
32/F	125.25	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
33/F	128.4	69	68	67	67	67	66	58	58	56	56	56	57	57	68	69	69
34/F	131.55	69	68	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	68	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	68	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	31
Total no. of Flat =	1374
%Compliance =	98%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	69	70	68	68	70	68	70	68	69	70	69	69	70	66	62	56	56	55	55	55	55	55	55	54	56
2/F	30.75	71	64	64	72	64	64	72	64	71	70	68	70	67	68	70	67	70	68	69	70	68	70	70	67	63	59	58	57	57	57	57	56	56	56	61
3/F	33.9	71	63	63	71	63	63	71	63	71	70	68	70	67	67	70	67	69	67	68	70	68	70	69	68	64	61	60	60	59	59	59	58	58	58	64
4/F	37.05	70	63	63	71	63	63	71	63	70	69	67	69	67	67	69	67	69	67	68	69	67	69	69	68	65	63	63	62	61	61	61	60	60	60	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	67	69	66	67	69	67	69	67	68	69	67	69	68	69	65	64	64	64	63	63	62	62	62	62	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	67	70	66	67	69	66	68	66	68	70	67	69	68	69	66	65	65	65	64	64	64	63	63	63	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	67	70	66	66	69	66	68	66	67	70	67	68	68	69	66	66	66	65	65	65	65	64	64	64	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	66	70	66	66	68	66	68	66	67	70	66	68	67	69	66	66	66	66	66	66	65	65	65	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	66	70	65	66	68	66	68	66	67	70	66	68	67	69	66	67	67	66	66	66	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	66	70	65	66	68	65	67	66	67	69	66	68	67	69	67	67	67	67	67	67	66	66	66	66	64
11/F	59.1	68	68	68	68	69	68	68	69	69	69	66	69	65	66	68	65	67	65	67	69	66	68	67	69	67	67	67	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	65	69	65	66	68	65	67	65	66	69	66	67	67	69	67	67	68	67	67	67	67	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	65	69	65	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	68	67	67	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	65	69	64	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	65	68	64	65	67	64	67	65	66	68	65	67	66	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	65	68	64	65	67	64	67	65	66	68	65	67	66	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	65	68	64	65	67	64	66	65	66	68	65	67	66	70	68	68	68	68	68	68	68	68	68	68	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	64	68	64	65	67	64	66	65	66	68	65	67	66	70	68	69	69	69	68	68	68	68	68	68	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	69	70	68	68	70	68	70	68	69	70	69	70	70	70	68	69	69	69	68	68	68	68	68	68	65
No. of Noise Exceedance		3	0	0	4	0	0	4	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			4		3		0			0		0			0			0			0		0		0		0		0		
No. of Flats		20			20			20		20		20			20		20			20			20			20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	67	67	67	67	66	67	67	67	67	64	68	64	64	67	64	66	65	66	68	65	67	66	70	69	69	69	69	69	69	69	69	69	69	62
22/F	93.75	66	66	66	66	67	66	66	67	67	67	64	68	64	65	67	64	67	65	66	68	65	67	66	71	69	70	69	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	66	66	66	66	67	67	65	68	64	65	67	64	67	65	66	68	65	67	65	71	70	70	70	70	70	69	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	67	65	66	68	65	66	65	71	70	70	70	70	70	70	70	69	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	65	66	68	65	66	65	71	70	70	70	70	70	70	70	70	69	69	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	66	68	65	66	65	72	70	71	71	70	70	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	65	66	65	72	71	71	71	71	70	70	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	66	68	64	66	65	72	71	71	71	71	71	70	70	70	70	70	61
29/F	115.8	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	66	68	64	66	65	72	71	71	71	71	71	70	70	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	66	68	65	66	65	72	71	71	71	71	71	71	70	70	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	66	68	65	66	66	73	71	71	71	71	71	71	71	70	70	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	65	68	64	65	67	64	66	64	66	68	64	66	66	73	71	71	71	71	71	71	71	71	70	70	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	65	69	64	65	67	64	66	64	66	68	64	66	66	73	71	72	71	71	71	71	71	71	71	70	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	66	68	64	66	66	73	72	72	72	71	71	71	71	71	71	70	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	66	68	64	66	66	73	72	72	72	71	71	71	71	71	71	71	60
Max. Noise Level		66	67	67	67	67	66	67	67	67	67	65	69	64	65	67	64	67	65	66	68	65	67	66	73	72	72	72	71	71	71	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14	9	10	10	9	8	6	5	4	3	1	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			14			10			9			5			3	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	70	69	68	67	67	66	65	65	66	66	66	67	67	62	60	61	59	58	57	57	56	56	56	55	56
2/F	30.75	71	64	64	72	64	64	72	63	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	63	63	64	62	61	60	59	59	58	58	57	61
3/F	33.9	71	63	63	71	63	63	71	63	71	70	69	68	68	67	67	66	66	66	66	67	67	67	67	64	64	66	65	64	63	62	62	61	60	60	65
4/F	37.05	70	63	63	71	63	63	71	70	70	69	69	68	68	67	67	66	66	66	66	66	66	67	67	64	65	67	66	66	65	65	64	64	63	62	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	65	66	66	66	66	67	65	66	67	67	67	66	66	66	65	65	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	66	66	67	65	66	68	67	67	67	67	67	66	66	65	65
7/F	46.5	70	70	70	70	70	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	66	66	67	65	67	68	68	68	67	67	67	67	66	66	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	66	66	67	65	67	68	68	68	68	68	68	67	67	66	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	67	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	68	68	68	68	67	67	64
10/F	55.95	69	69	69	69	69	69	69	69	69	68	68	67	66	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	69	69	68	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	66	67	66	68	69	69	69	69	69	69	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	67	67	67	68	70	69	69	69	69	69	69	69	68	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	67	68	67	68	70	70	70	70	69	69	69	69	69	63
14/F	68.55	68	68	68	68	68	67	68	68	68	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	70	70	70	70	70	70	70	69	69	63
19/F	84.3	67	66	67	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	66	67	67	69	68	70	71	71	71	71	70	70	70	70	69	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	70	69	68	67	67	66	66	66	66	67	67	67	69	68	70	71	71	71	71	70	70	70	70	69	65
No. of Noise Exceedance		3	0	0	4	0	0	4	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	1	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			4		3		0			0		0			0			0			0			1			0			0	
No. of Flats		20			20			20		20		20			20		20			20			20			20			20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	71	71	71	70	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	71	71	71	71	70	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	66	65	65	65	65	66	66	65	65	65	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
28/F	112.65	66	65	66	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	69	71	71	71	71	71	71	71	71	70	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	69	71	71	71	71	71	71	71	71	70	70	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	65	66	67	67	68	68	70	69	71	72	72	71	71	71	71	71	71	71	62
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	66	66	67	67	68	68	70	69	71	72	72	71	71	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	62
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	15	15	15	15	14	10	8	6	4	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			0			15			15			10			6	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	118
Total no. of Flat =	950
%Compliance =	88%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	149
Total no. of Flat =	2324
%Compliance =	94%

Note:

Adopted with Enhanced Acoustic Balcony (Baffle Type)

Adopted with Acoustic Window (Baffle Type) w/o SAM

Adopted with Acoustic Window (Baffle Type) with SAM

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Appendix 3.3

Sound Attenuation Performance of AW(BT) and EAB (BT) after Room Size Correction and addition of SAM

Innovative Noise Mitigation Measures Adopted In Traffic Noise Impact Assessment
Table of Major Parameters and Room Size of Proposed Case and Corresponding Reference Case, and Sound Attenuation Adjustment

Room	Type	Reference	
		Room area (RAref), m^2	Ref. sound attenuation, dB(A)
Living Room	Enhanced Acoustic Balcony (Baffle Type)	14.0	8.0
Bedroom	Acoustic Window (Baffle Type)	8.0	6.0

NSRs	Type	Application Site	Reference		Room Adjustment: 10xlog(RA / RAref) (adjust downward only), dB(A) RAref)	Sound attenuation after room adjustment, dB(A)	Sound attenuation with SAM, dB(A)
		Room area (RA), m^2	Room area (RAref), m^2	Ref. sound attenuation, dB(A)			
N1-01	Acoustic Window (Baffle Type)	7.4	8.0	6.0	0.0	6.0	--
N1-02	Enhanced Acoustic Balcony (Baffle Type)	15.1	14.0	8.0	0.0	8.0	--
N1-03	Enhanced Acoustic Balcony (Baffle Type)	15.9	14.0	8.0	0.0	8.0	--
N1-04	Acoustic Window (Baffle Type)	4.0	8.0	6.0	-3.0	3.0	--
N1-05	Acoustic Window (Baffle Type)	5.3	8.0	6.0	-1.8	4.2	--
N3-04	Enhanced Acoustic Balcony (Baffle Type)	12.6	14.0	8.0	0.0	8.0	--
N3-05	Enhanced Acoustic Balcony (Baffle Type)	12.4	14.0	8.0	-0.5	7.5	--
N3-08	Enhanced Acoustic Balcony (Baffle Type)	12.4	14.0	8.0	-0.5	7.5	--
N3-09	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
N4-03	Enhanced Acoustic Balcony (Baffle Type)	16.6	14.0	8.0	0.0	8.0	--
N4-05	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
N4-06	Enhanced Acoustic Balcony (Baffle Type)	16.2	14.0	8.0	0.0	8.0	--
NAL-02	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAL-03	Enhanced Acoustic Balcony (Baffle Type)	15.8	14.0	8.0	0.0	8.0	--
NAL-05	Enhanced Acoustic Balcony (Baffle Type)	12.8	14.0	8.0	0.0	8.0	--
NAL-06	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-08	Enhanced Acoustic Balcony (Baffle Type)	16.9	14.0	8.0	0.0	8.0	--
NAL-10	Enhanced Acoustic Balcony (Baffle Type)	13.7	14.0	8.0	0.0	8.0	--
NAL-11	Enhanced Acoustic Balcony (Baffle Type)	11.9	14.0	8.0	-0.7	7.3	--
NAH-11	Enhanced Acoustic Balcony (Baffle Type)	11.9	14.0	8.0	-0.7	7.3	--
NAL-12	Acoustic Window (Baffle Type)	4.5	8.0	6.0	-2.5	3.5	5.0
NAH-12	Acoustic Window (Baffle Type)	4.5	8.0	6.0	-2.5	3.5	--
NAL-13	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
NAH-13	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
NAL-14	Enhanced Acoustic Balcony (Baffle Type)	12.2	14.0	8.0	-0.6	7.4	--
NAH-14	Enhanced Acoustic Balcony (Baffle Type)	12.2	14.0	8.0	-0.6	7.4	--
NAL-15	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
NAH-15	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
NAL-16	Enhanced Acoustic Balcony (Baffle Type)	22.4	14.0	8.0	0.0	8.0	--
NAH-16	Enhanced Acoustic Balcony (Baffle Type)	22.4	14.0	8.0	0.0	8.0	--
NAL-17	Acoustic Window (Baffle Type)	7.7	8.0	6.0	0.0	6.0	--
NAH-17	Acoustic Window (Baffle Type)	7.7	8.0	6.0	0.0	6.0	--
NAL-18	Enhanced Acoustic Balcony (Baffle Type)	17.3	14.0	8.0	0.0	8.0	--
NAH-18	Enhanced Acoustic Balcony (Baffle Type)	17.3	14.0	8.0	0.0	8.0	--
NAL-19	Enhanced Acoustic Balcony (Baffle Type)	11.1	14.0	8.0	-1.0	7.0	--
NAH-19	Enhanced Acoustic Balcony (Baffle Type)	11.1	14.0	8.0	-1.0	7.0	--
NAL-20	Acoustic Window (Baffle Type)	5.6	8.0	6.0	-1.6	4.4	5.9
NAH-20	Acoustic Window (Baffle Type)	5.6	8.0	6.0	-1.6	4.4	--
NAL-21	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAH-21	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAL-22	Acoustic Window (Baffle Type)	8.0	8.0	6.0	0.0	6.0	7.5
NAH-22	Acoustic Window (Baffle Type)	8.0	8.0	6.0	0.0	6.0	--
NAL-23	Enhanced Acoustic Balcony (Baffle Type)	8.5	14.0	8.0	-2.2	5.8	--
NAH-23	Enhanced Acoustic Balcony (Baffle Type)	8.5	14.0	8.0	-2.2	5.8	--
NB-02	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NB-03	Enhanced Acoustic Balcony (Baffle Type)	15.7	14.0	8.0	0.0	8.0	--
NB-05	Enhanced Acoustic Balcony (Baffle Type)	12.8	14.0	8.0	0.0	8.0	--
NB-06	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NB-08	Enhanced Acoustic Balcony (Baffle Type)	17.0	14.0	8.0	0.0	8.0	--
NB-10	Enhanced Acoustic Balcony (Baffle Type)	13.8	14.0	8.0	0.0	8.0	--

Note:

RA: Room Area,m^2

RAref: Reference Room Area,m^2

SAM: Sound Absorptive Material

*[1] The Sound Attenuation is determined according to the following equation: Sound Attenuation of Reference Case + 10*log[(RA of the habitable room at the Proposed Development)/ (RA of the habitable room at the reference case)]*

[2] According to the "Practice Noise on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact" issued by EPD, addition of SAM to Acoustic Window (Baffle Type) can offer an additional 1.5dB(A) reduction.

Appendix 3.4

Extract of Practice Note on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact by EPD

Practice Note on Application of INNOVATIVE NOISE MITIGATION DESIGNS in Planning Private Residential Developments against Road Traffic Noise Impact

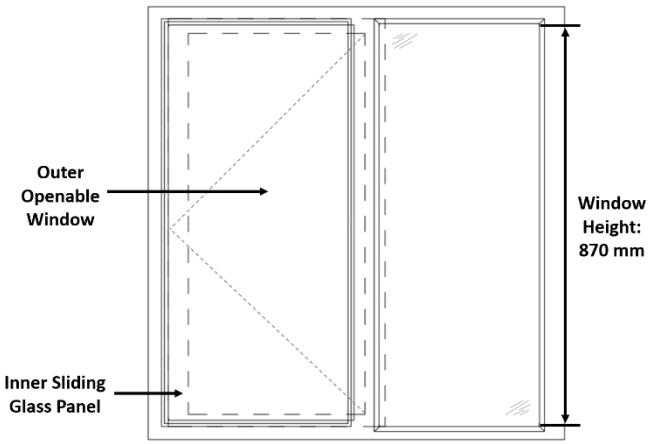
Version: V2.0

Date of issue: December 2021

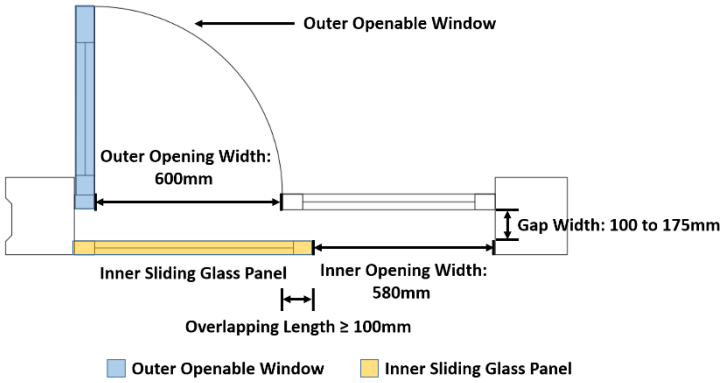
Environmental Protection Department
The Government of the Hong Kong Special Administrative Region

Annex A

(I) A possible design of "Acoustic Window (Baffle Type)" for 8m^2 habitable room (i.e. dining room, living room or bedroom)



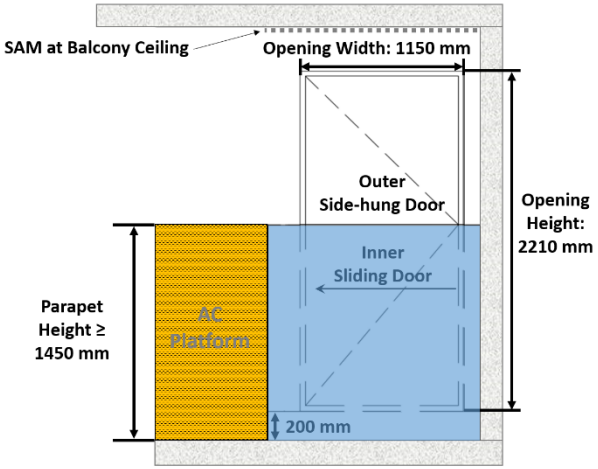
INTERNAL VIEW (NOT TO SCALE)



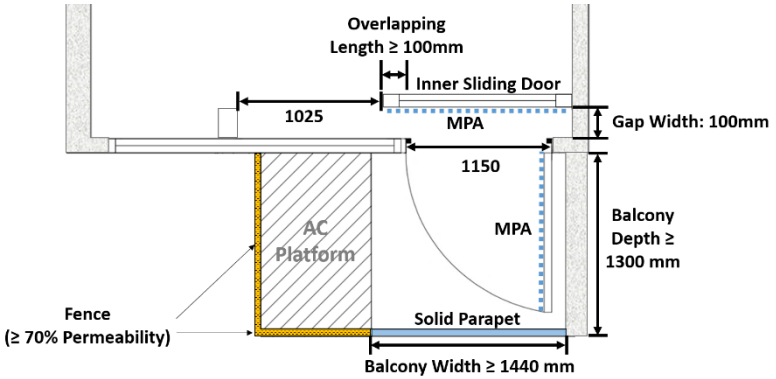
PLAN (NOT TO SCALE)

A Possible Design of "Acoustic Window (Baffle Type)" for 8m^2 room				
Room Dimensions (mm^3)	**Inner Window Opening (mm^2)**	**Outer Window Opening (mm^2)**	**Window Overlapping Length (mm)**	**Gap Width between Window Panels (mm)**
3200 (W) x 2500 (D) x 3400 (H)	**580 (W) x 870 (H)**	**600 (W) x 870 (H)**	**≥ 100**	**100 to 175**
**** This is one of feasible designs of AW(BT) for 8m^2 room. The key points of designs include:*** ***- The resultant opening after aligning the inner sliding glass panel with the outer openable window will be taken as its openable window area for the purpose of regulations 30 and 31 of the Building (Planning) Regulations (B(P)R) and Part III of Appendix A of PNAP APP-130;*** ***- For optimum performance, the air gap should have a pane-to-pane overlapping length of ≥ 100mm and a width between 100mm and 175mm, with the inner sliding glass panel in a closed position as required in PNAP APP-130. The window pane shall be ≥ 6mm in thickness.***				

(III) A possible design of "Enhanced Acoustic Balcony (Baffle Type)" in 14m^2 habitable room (i.e. dining room, living room or bedroom)



EXTERNAL VIEW (NOT TO SCALE)



PLAN (NOT TO SCALE)

Fence (≥ 70% Permeability) Solid Parapet

A Possible Design of "Enhanced Acoustic Balcony (Baffle Type)" for 14m^2 room							
Room Dimensions (mm^3)	**Balcony Width (mm)**	**Balcony Depth (mm)**	**Parapet Height (mm)**	**Inner Opening (mm^2)**	**Outer Opening (mm^2)**	**Overlapping Length (mm)**	**Gap Width between Panels (mm)**
3400 (W) x 4100 (D) x 3100 (H)	**≥ 1440**	**≥ 1300**	**≥ 1450**	**1025 (W) x 2210 (H)**	**1150 (W) x 2210 (H)**	**≥ 100**	**100**

**** This is one of feasible designs of EAB for 14m^2 room. The room with EAB should meet the natural lighting and ventilation requirements in regulations 30 & 31 of the Building (Planning) Regulations (B(P)R). The EAB door with MPA may not be accountable for complying with the natural lighting requirements in regulation 30(2)(a)(i) of B(P)R. The AC platform should comply with the requirements under Appendix B of Code of Practice on Access for External Maintenance 2021 (AfEM Code), and balconies for residential buildings should comply with the criteria and conditions set out in Joint Practice Note (JPN) 1 for application of exemption from gross floor area and/or site coverage under the B(P)R.***

**** MPA refers to micro-perforated absorber of noise reduction coefficient ≥ 0.45; SAM refers to sound absorptive material of noise reduction coefficient ≥ 0.7.***

**** Comparable noise performance is anticipated should the AC platform be replaced by balcony with solid parapet.***

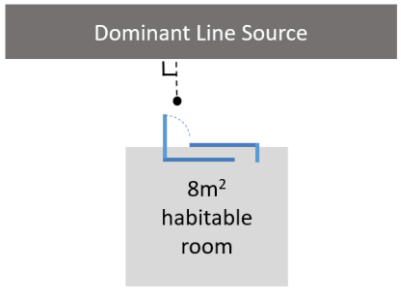
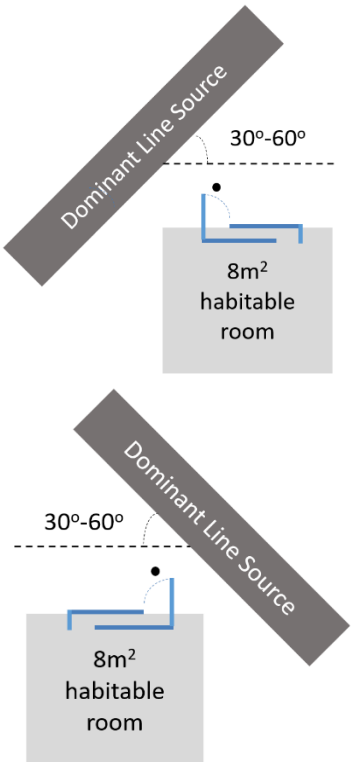
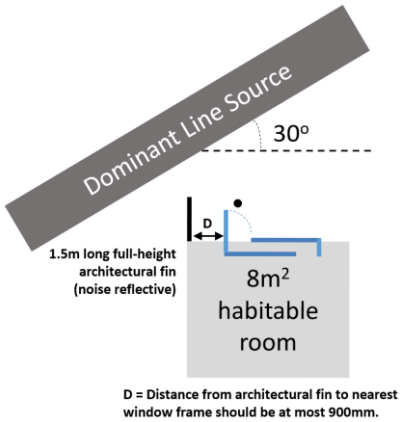
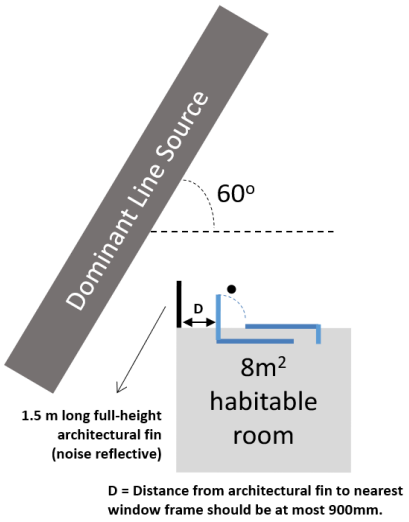
Table 1: Summary on RNR of Acoustic Window (Baffle Type) (for use in NIA) *Plan not to scale		Correction dB(A) L10(1hr)
	(a) Provision of AW(BT) parallel to dominant line source (whichever side the outer side-hung window is)	- 6.0
	(b) Tilting the AW(BT) in (a) above to 30°-60° horizontal incident angle to dominant line source (whichever side the outer side-hung window is)	Additional - 1.0 to (a)
	(b1) If tilted AW(BT) is <u>at 30° horizontal incident angle</u> to dominant line source + 1.5m long full-height architectural fin (noise reflective) Note1 * AW(BT) + fin should be considered as ONE package of noise mitigation measures. Outer side-hung window of AW(BT) and fin should be installed at the side nearer to dominant line source.	Additional - 1.0 to (b)

Table 1: Summary on RNR of Acoustic Window (Baffle Type) (for use in NIA) *Plan not to scale		Correction dB(A) L10(1hr)
	(b2) If tilted AW(BT) is <u>at 60° horizontal incident angle</u> to dominant line source + 1.5m long full-height architectural fin (noise reflective) Note1 * AW(BT) + fin should be considered as ONE package of noise mitigation measures. Outer side-hung window of AW(BT) and fin should be installed at the side nearer to dominant line source.	Additional - 2.0 to (b)

Note 1: The 1.5m long full-height architectural fin (noise reflective) may be subject to the requirements for natural lighting and ventilation, gross floor area and site coverage under the B(P)R.

Note 2: For case (a), (b), (b1) and (b2), addition of Sound Absorptive Material (SAM) of Noise Reduction Coefficient ≥ 0.7 at top and both side of window frame can offer an additional 1.5 dB(A) reduction. The material of SAM is subject to the requirements of section 3 of Building (Construction) Regulation. The examples below may serve as reference.

Example 1

Predicted Noise Level at Noise Sensitive Receiver (Base Case)	: 77.9	dB(A)
RNR of prescribed AW in (a) + SAM	: 6.0 + 1.5	dB(A)
Predicted Noise Level at Noise Sensitive Receiver (Mitigated Case)	: 70.4	dB(A)
	= 70 dB(A) [rounded to the nearest whole number]	
	[complied with the HKPSG]	

Example 2

Predicted Noise Level at Noise Sensitive Receiver (Base Case)	: 78.9	dB(A)
RNR of prescribed AW in (b) + SAM	: 6.0 + 1.0 + 1.5	dB(A)
Predicted Noise Level at Noise Sensitive Receiver (Mitigated Case)	: 70.4	dB(A)
	= 70 dB(A) [rounded to the nearest whole number]	
	[complied with the HKPSG]	

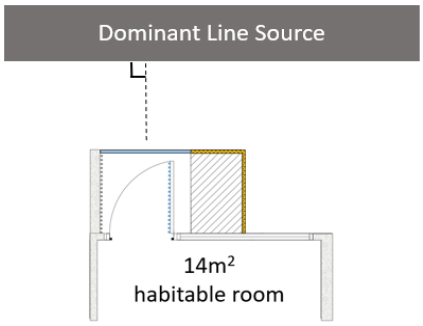
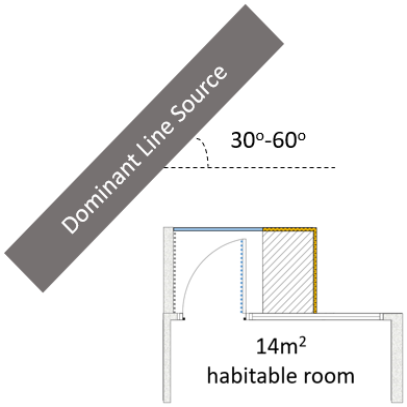
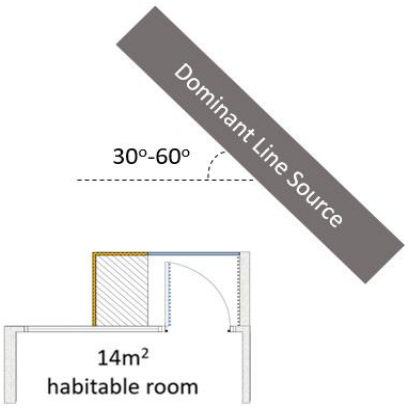
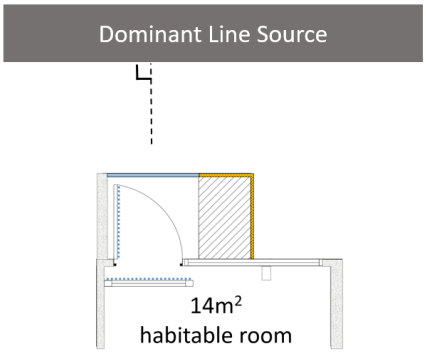
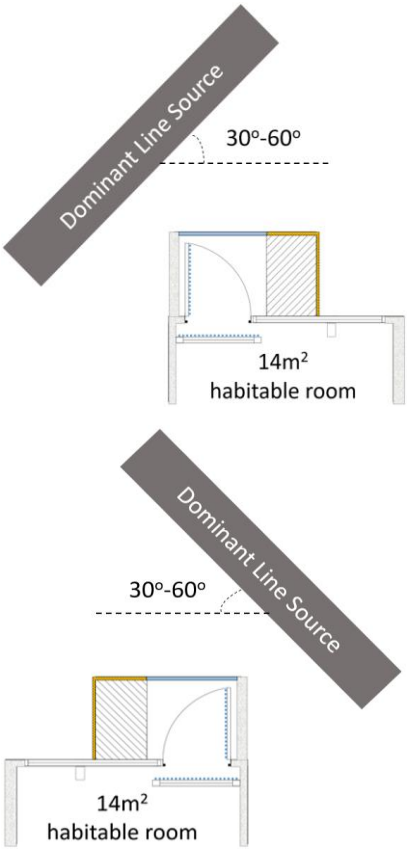
Table 2: Summary on RNR of Enhanced Acoustic Balconies (for use in NIA) *Plan not to scale		Correction dB(A) L10(1hr)
	(a) Provision of EAB(ST) parallel to dominant line source	- 2.0
 	(b) Tilting the EAB in (a) above to 30°-60° horizontal incident angle to dominant line source	Additional - 1.0 to (a)
	(c) Provision of EAB(BT) parallel to dominant line source	- 8.0

Table 2: Summary on RNR of Enhanced Acoustic Balconies (for use in NIA) *Plan not to scale	Correction dB(A) L10(1hr)
 (d) Tilting the EAB in (c) above to 30°-60° horizontal incident angle to dominant line source	Additional - 3.0 to (c)

Note: For cases (c) and (d), addition of Sound Absorptive Material (SAM) of Noise Reduction Coefficient ≥ 0.7 at top and both side of the mullion can offer an additional 1.5 dB(A) reduction. The material of SAM is subject to the requirements of section 3 of Building (Construction) Regulation. The examples below may serve as reference.

Example 1

Predicted Noise Level at Noise Sensitive Receiver (Base Case)	: 72.4	dB(A)
RNR of prescribed EAB in (a)	: 2.0	dB(A)
Predicted Noise Level at Noise Sensitive Receiver (Mitigated Case)	: 70.4	dB(A)
	= 70 dB(A) [rounded to the nearest whole number]	
	[complied with the HKPSG]	

Appendix 4.1

Details of the VRVs (V01 to V19) on the roof of BMW House and

Catalogue of Daikin

The VRVs (V01 to V19) on the roof of BMW House

The VRVs belong to Daikin Series X7.

There are in total 19 nos. of VRVs on the roof of BMW house.
12 nos. of VRVs have double top fan, 7 nos. of them have single top fan.
Their location is indicated in **Figure 4.2**.

Source ID	Brand	VRV Series	Number of Fan on the top	Model Number adopted *	Horse Power	Cooling Capacity (KW)	Dimension			Sound Power Level, dB(A) ^
							H (m)	L (m)	W (m)	
V09 to V12, V17 to V19	Daikin	Series X7	1	RUXYQ14BA	14	40	1.66	0.93	0.77	64
V01 to V08, V13 to V16	Daikin	Series X7	2	RUXYQ22BA	22	61.5	1.66	1.24	0.77	68

* Since the model number is unknown, the model with the largest sound power level is selected as worst case study.

^ Refer to the catalogue of Daikin, which is attached in this Appendix 4.1.

VRV X7 智能化中央冷氣系統

V09 to V12, V17 to V19

返回

8匹	10匹	12匹	14匹	16匹	18匹	20匹	22匹	24匹	26匹	28匹	30匹	32匹
34匹	36匹	38匹	40匹	42匹	44匹	46匹	48匹	50匹	52匹	54匹	56匹	58匹
60匹	62匹	64匹	66匹									

室外機 - RUXYQ14BA

V09 to V12, V17 to V19

Sound power level is 64dB(A) when the measurement distance is 1m

型號		室外機	
室外機	RUXYQ14BA	運轉音量 (高/低)	56dB(A)
製冷量	40kW kW	尺寸 (高x闊x深)	1657x1240x765mm
供暖量	45kW kW	機身重量	250kg
電源	3Ø, 380V, 50Hz	配管直徑(液態)	Ø12.7mm
		配管直徑(氣態)	Ø25.4mm

描述

製冷量以室內溫度27°CDB，19°CWB及室外溫度35°CDB為基本量度環境

供暖量以室內溫度20°CDB 及室外溫度7°CDB，6°CWB為基本量度環境

運轉音量值為無反響房間轉換數值，以機身前1m量度，在一般實際運行情況下，室外機運轉音量值可能受環境影響

TOP

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VRV X7 智能化中央冷氣系統

V01 to V08, V13 to V16

返回

8匹	10匹	12匹	14匹	16匹	18匹	20匹	22匹	24匹	26匹	28匹	30匹	32匹
34匹	36匹	38匹	40匹	42匹	44匹	46匹	48匹	50匹	52匹	54匹	56匹	58匹
60匹	62匹	64匹	66匹									

室外機 - RUXYQ22BA

V01 to V08, V13 to V16

Sound power level is 68dB(A) when the measurement distance is 1m

型號		室外機	
室外機	RUXYQ22BA	運轉音量 (高/低)	60dB(A)
製冷量	61.5kW kW	尺寸 (高x闊x深)	1657x1240x765mm
供暖量	69.0kW kW	機身重量	300kg
電源	3Ø, 380V, 50Hz	配管直徑(液態)	Ø15.9mm
		配管直徑(氣態)	Ø28.6mm

描述

製冷量以室內溫度27°CDB，19°CWB及室外溫度35°CDB為基本量度環境

供暖量以室內溫度20°CDB 及室外溫度7°CDB，6°CWB為基本量度環境

運轉音量值為無反響房間轉換數值，以機身前1m量度，在一般實際運行情況下，室外機運轉音量值可能受環境影響

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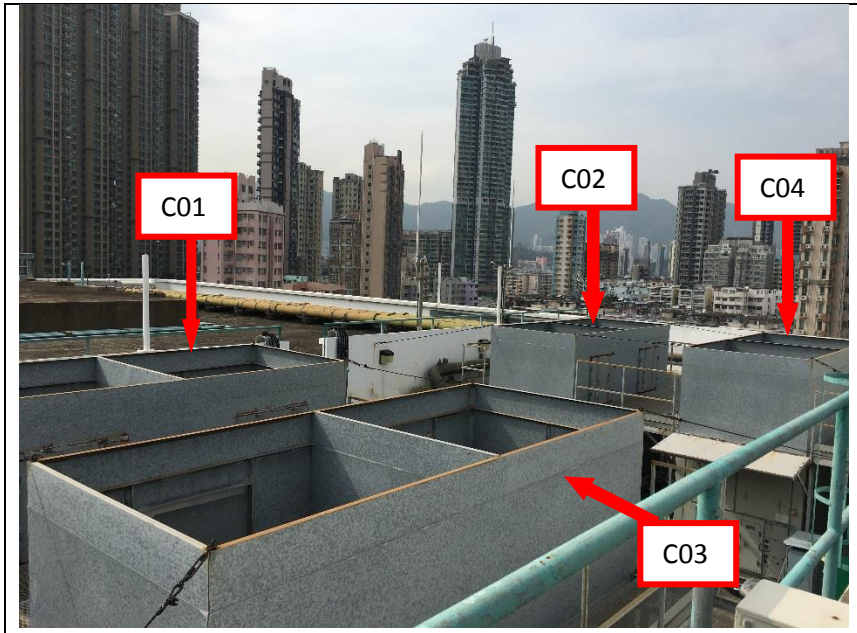
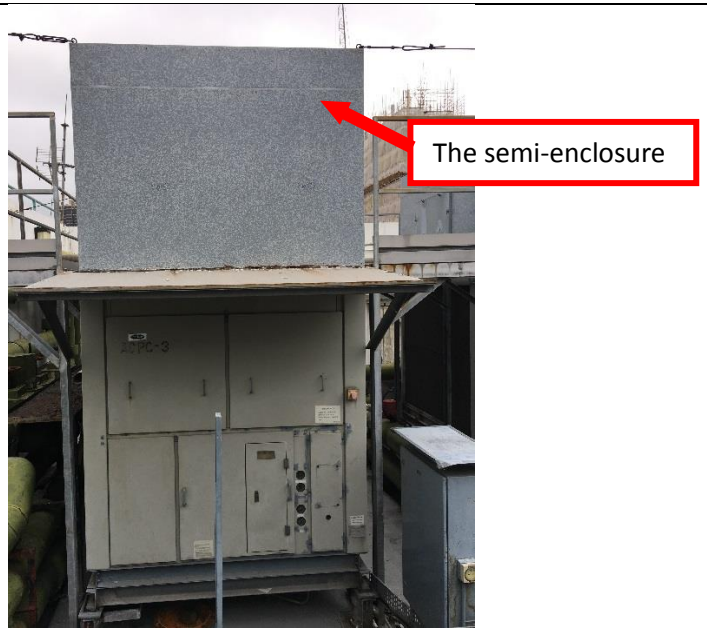
Appendix 4.2

Details of the Chillers (C01 to C04) and VRV (C05) on the Roof of To Kwa Wan Complex and Government Offices

The chillers (C01 to C04) and VRV (C05) on the roof of To Kwa Wan Complex and Government Offices



Top view, the four 8 fans-air cooled chillers (C01 to C04) are semi-enclosed.



Side view, the brand of chiller is Carrier.

Side view

Side view

C05, the VRV

ID	Type	Brand	Number of Fans on the top	Model Number	In operation during the measurement?	Dimension			Sound Power Level, dB(A)
						H (m)	L (m)	W (m)	
C01	Chiller	Carrier	8	Unknown	Yes	4.1 *	4.5	2	87.9 ^
C02		Carrier	8	Unknown	No	4.1 *	4.5	2	87.9 ^
C03		Carrier	8	Unknown	No	4.1 *	4.5	2	87.9 ^
C04		Carrier	8	Unknown	Yes	4.1 *	4.5	2	87.9 ^
C05	VRV	Daikin	2	RHXYQ16QY1	No	1.68	1.24	0.77	68 #

* With semi-enclosure

^ Refer to the calculation, which is attached in this Appendix 4.2.

Refer to the catalogue, which is attached in this Appendix 4.2.

C01 to C04

Sound Power Measurement Calculation Sheet

To: ISO 3746 (Survey Method)

Project	**To Kwa Wan**
Measurement Date & Time:	**2019-May-22**
Type of Sound Source:	**Chillers and VRVs**
Opeartion Conditions:	**Stable**

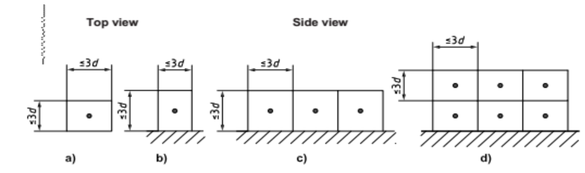
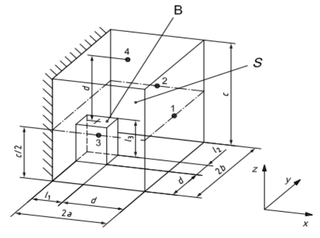
Overall, dB(A)			**C01 (Chiller)**			
Raw Data	$\overline{L'_{pA(ST)}} = 10 \lg \left[\frac{1}{N_M} \sum_{i=1}^{N_M} 10^{0,1 L'_{pA\,i(ST)}} \right]$ dB	**Averaged $L'_{pA(ST)}$**	68.6			
		Averaged $L_{pA(BG)}$	63.1			

Surface Area	**No. of reflecting plane:**	1			
	Parallaed Measurement Surface, d (m):	1			
	Surface Area of Measurement (m^2):	133.1			

K_{1A} Correction	$\Delta L_{pA} = \overline{L'_{pA(ST)}} - \overline{L_{pA(B)}}$	**ΔL_{pA}=L'$_{pA(ST)}$ - $L_{pA(BG)}$**	5.5			
	$\Delta L_{pA} > 10$ dB, K_{1A} is assumed equal to zero.	**ΔL_{pA}>10**				
	3 dB $\leqslant \Delta L_{pA} \leqslant$ 10 dB $K_{1A} = -10 \lg \left(1 - 10^{-0,1 \Delta L_{pA}}\right)$ dB	**3=<ΔL_{pA}<=10**	1.4			
	$\Delta L_{pA} <$ 3 dB, K_{1A} to be applied in this case is 3 dB	**ΔL_{pA}<3**				
		K_{1A}	1.4			

K_{2A} Correction	$K_{2A} = 10 \lg \left[1 + 4 \frac{S}{A}\right]$ dB	**A= α S_V**	Outdoor Env.			
		K_{2A}	0			

Results	$\overline{L_{pA}} = \overline{L'_{pA(ST)}} - K_{1A} - K_{2A}$	**Corrected L_{pA}**	67.2			
	$L_{WA} = \overline{L_{pA}} + 10 \lg \frac{S}{S_0}$ dB	**Sound Power Level: L_{WA}**	**88.4**			

Determination of Microphone Arrays on Parallelepiped Measurement Surface	**Parallelepiped Measurement Surface for Floor-standing Noise Sources Adjacent to Two Reflecting Plans**
	

Key
- ● microphone positions
- d measurement distance

Figure C.1 — Microphone positions on a parallelepiped measurement surface

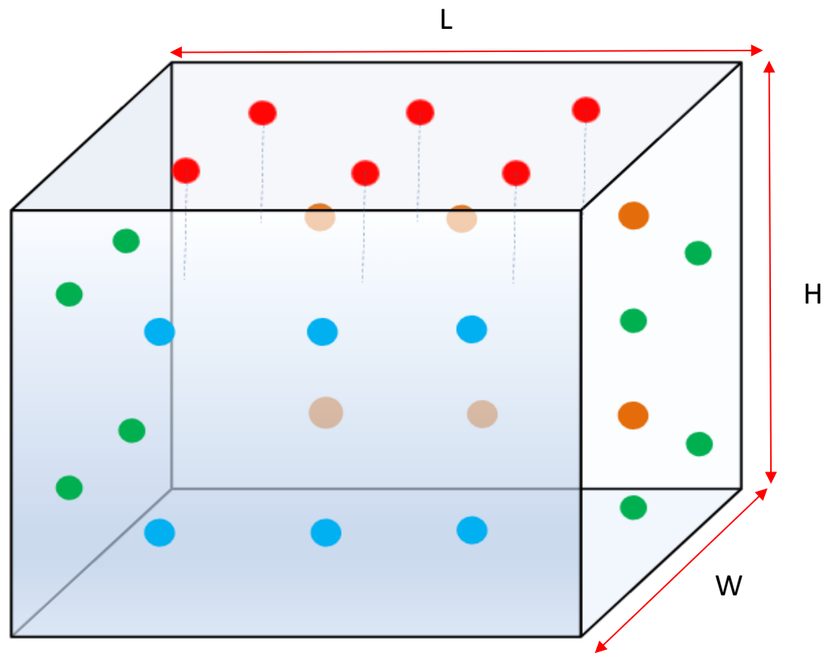
Key
- ● microphone positions (1, 2, 3, 4)
- B reference box
- $2a$ measurement surface length
- $2b$ measurement surface width
- c measurement surface height
- d measurement distance
- l_1 reference box length
- l_2 reference box width
- l_3 reference box height
- S measurement surface

$S = 2(2ab + bc + 2ca)$

C01 to C04

Sound Pressure Level of C01 (Chiller):

Sound Source	Overall, dB(A)	$10^{li/10}$
Side	68.1	6456542.3
	67.3	5370318.0
	68.3	6760829.8
	68.5	7079457.8
	66.9	4897788.2
	67.6	5754399.4
	67.7	5888436.6
	67.2	5248074.6
	68.0	6309573.4
	67.5	5623413.3
	66.9	4897788.2
	68.1	6456542.3
	68.3	6760829.8
	67.7	5888436.6
	67.6	5754399.4
	67.6	5754399.4
	66.8	4786300.9
	67.7	5888436.6
	68.5	7079457.8
	67.4	5495408.7
Top	70.4	10964782.0
	69.5	8912509.4
	71.3	13489628.8
	71.2	13182567.4
	70.8	12022644.3
	70.8	12022644.3
$L'_{pA(ST)}$ = Average SPL	68.6	



Microphone Position over the noise source

Microphone Position aside the noise source

Measurement Distance = 1m

Dimension of measurement Surface

	H (m)	L (m)	W (m)
=	4.1+1	4.5+1+1	2+1+1
=	5.1	6.5	4

Total Measurement Surface

= 6.5*4 + 2*6.5*5.1 + 2*5.1*4

= **133.1** m2

C05

VRV 更新用Q 智能化中央冷氣系統

返回

8匹 | 10匹 | 12匹 | 14匹 | 16匹 | 18匹 | 20匹 | 22匹 | 24匹 | 26匹 | 28匹 | 30匹 | 32匹

34匹 | 36匹 | 38匹 | 40匹 | 42匹 | 44匹 | 46匹 | 48匹

室外機 - RHXYQ16QY1

C05

Sound power level is 68dB(A) when the measurement distance is 1m

型號		室外機	
室外機	RHXYQ16QY1	運轉音量 (高/低)	60dB(A)
製冷量	45.0kW kW	尺寸 (高x闊x深)	1,680x1,240x765mm
供暖量	50.0kW kW	機身重量	393kg
電源	3Ø, 380V, 50Hz	配管直徑(液態)	Ø12.7mm
		配管直徑(氣態)	Ø28.6mm

描述

製冷量以室內溫度27°CDB，19°CWB及室外溫度35°CDB為基本量度環境

供暖量以室內溫度20°CDB 及室外溫度7°CDB，6°CWB為基本量度環境

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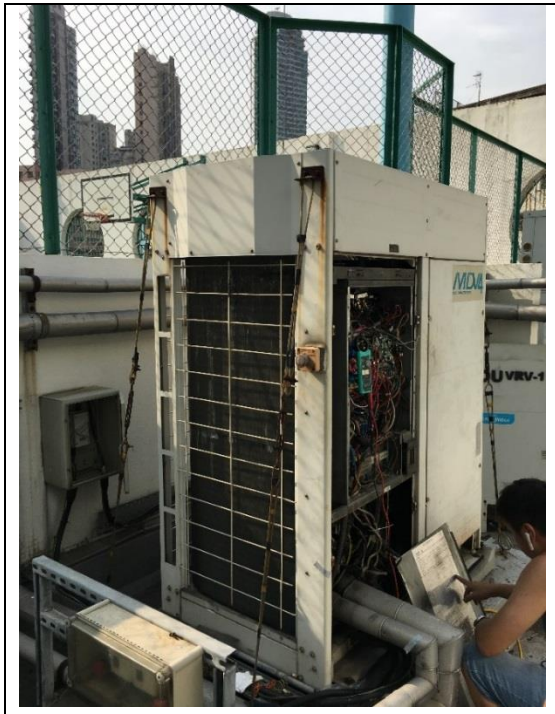
Appendix 4.3

Details of the Chillers (A01, A02, A06 & A07) and VRVs (A03 to A05) on the Roof of To Kwa Wan Market

The VRVs and chillers (A01 to A07) on the roof of To Kwa Wan Market

A01

A02



A03

A04

A05

A06 & A07

Noise Source ID	Type	Brand	Model Number	Dimension of 1 nos. of chiller / VRV			In Operation during Site Visit?	Sound Power Level dB(A)		
				H (m)	L (m)	W (m)		Shown in Catalogue *	Measured by ISO3746:2010 Methodology ^	Adopted in Industrial Noise Impact Assessment
A01	Chiller	Airedale	UCUR100	2.0	2.8	1.3	No	81	-	**81**
A02							No	81	-	**81**
A03	VRV	Midea	MDV-450W	1.8	1.3	0.8	No	68	-	**68**
A04	VRV	Daikin	RJZQ8AAY	1.43	0.94	0.32	Yes	64	73.4	**73.4**
A05	VRV	Daikin	RXQ12ARY6	1.66	0.93	0.77	Yes	67	74.4	**74.4**
A06	Chiller	Carrier	30RBS045	1.33	2.05	1.06	Yes	81	79.1	**81**
A07							No	81	-	**81**

* Refer to the catalogue, which is attached in this Appendix 4.3.

^ Refer to the calculation, which is attached in this Appendix 4.3.

A04 to A06

Sound Power Measurement Calculation Sheet

To: ISO 3746 (Survey Method)

Project	**To Kwa Wan**
Measurement Date & Time:	**2019-May-22**
Type of Sound Source:	**Chillers and VRVs**
Opeartion Conditions:	**Stable**

Overall, dB(A)			**A04 (VRV)**	**A05 (VRV)**	**A06 (Chiller)**	
Raw Data	$\overline{L'_{pA(ST)}} = 10 \lg\left[\frac{1}{N_M}\sum_{i=1}^{N_M} 10^{0,1L'_{pA\,i(ST)}}\right]$ dB	**Averaged $L'_{pA(ST)}$**	63.1	63.4	67.2	
		Averaged $L_{pA(BG)}$	63.1	63.1	63.1	

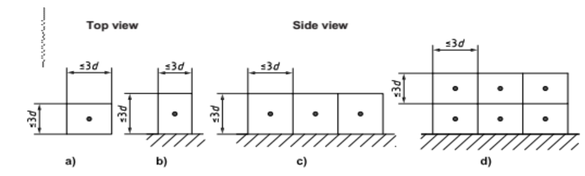
Surface Area	**No. of reflecting plane:**		2	2	1	
	Parallaed Measurement Surface, d (m):		1	1	1	
	Surface Area of Measurement (m^2):		21.4	25.2	45.5	

K_{1A} Correction	$\Delta L_{pA} = \overline{L'_{pA(ST)}} - \overline{L_{pA(B)}}$	**ΔL_{pA}=L'$_{pA(ST)}$ - $L_{pA(BG)}$**	0.0	0.3	4.1	
	$\Delta L_{pA} > 10$ dB, K_{1A} is assumed equal to zero.	**ΔL_{pA}>10**				
	3 dB $\leqslant \Delta L_{pA} \leqslant$ 10 dB $K_{1A} = -10 \lg\left(1-10^{-0,1\Delta L_{pA}}\right)$ dB	**3=<ΔL_{pA}<=10**			2.1	
	$\Delta L_{pA} <$ 3 dB, K_{1A} to be applied in this case is 3 dB	**ΔL_{pA}<3**	3	3		
		K_{1A}	3.0	3.0	2.1	

K_{2A} Correction	$K_{2A} = 10 \lg\left[1 + 4\frac{S}{A}\right]$ dB	**A= α S_V**	Outdoor Env.			
		K_{2A}	0			

Results	$\overline{L_{pA}} = \overline{L'_{pA(ST)}} - K_{1A} - K_{2A}$	**Corrected L_{pA}**	60.1	60.4	65.1	
	$L_{WA} = \overline{L_{pA}} + 10 \lg\frac{S}{S_0}$ dB	**Sound Power Level: L_{WA}**	**73.4**	**74.4**	**79.1**	

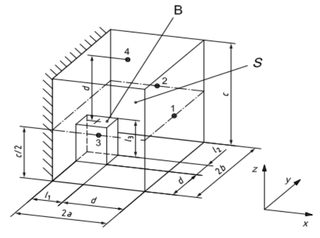
Determination of Microphone Arrays on Parallelepiped Measurement Surface



Key
● microphone positions
d measurement distance

Figure C.1 — Microphone positions on a parallelepiped measurement surface

Parallelepiped Measurement Surface for Floor-standing Noise Sources Adjacent to Two Reflecting Plans

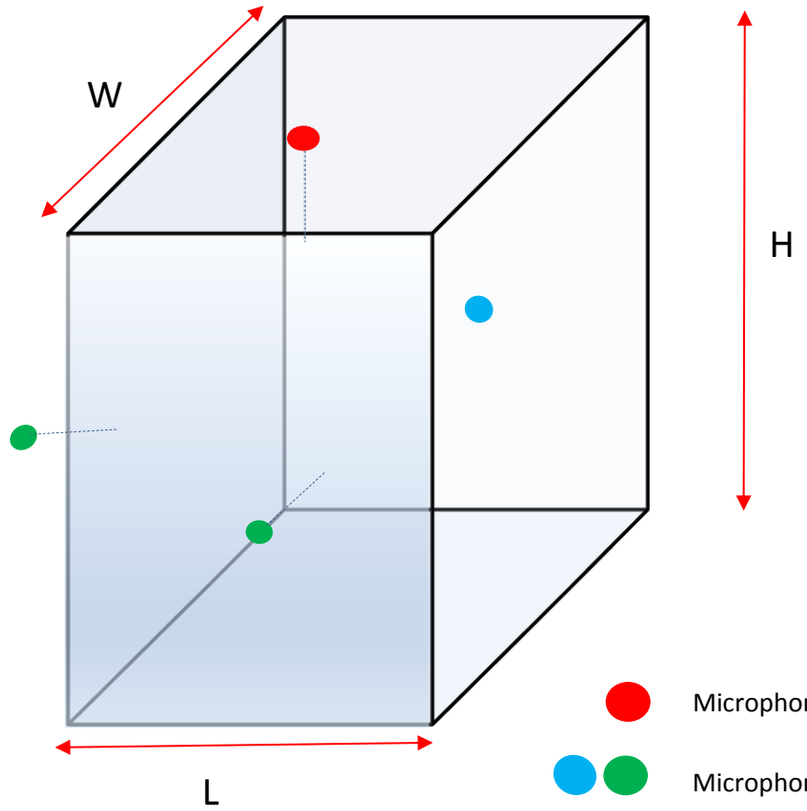


Key
● microphone positions (1, 2, 3, 4)
B reference box
$2a$ measurement surface length
$2b$ measurement surface width
c measurement surface height
d measurement distance
l_1 reference box length
l_2 reference box width
l_3 reference box height
S measurement surface
$S = 2(2ab + bc + 2ca)$

A04 to A06

Sound Pressure Level of A04:

Sound Source	Overall, dB(A)	$10^{li/10}$
Side	63.4	2187761.6
	63.8	2398832.9
	62.6	1819700.9
Top	62.6	1819700.9
$L'_{pA(ST)}$ = Average SPL	63.1	



Microphone Position over the noise source

Microphone Position aside the noise source

Measurement Distance = 1m

Dimension of measurement Surface

	H (m)	L (m)	W (m)
=	1.43+1	0.94+1+1	0.32+1
=	2.43	2.94	1.32

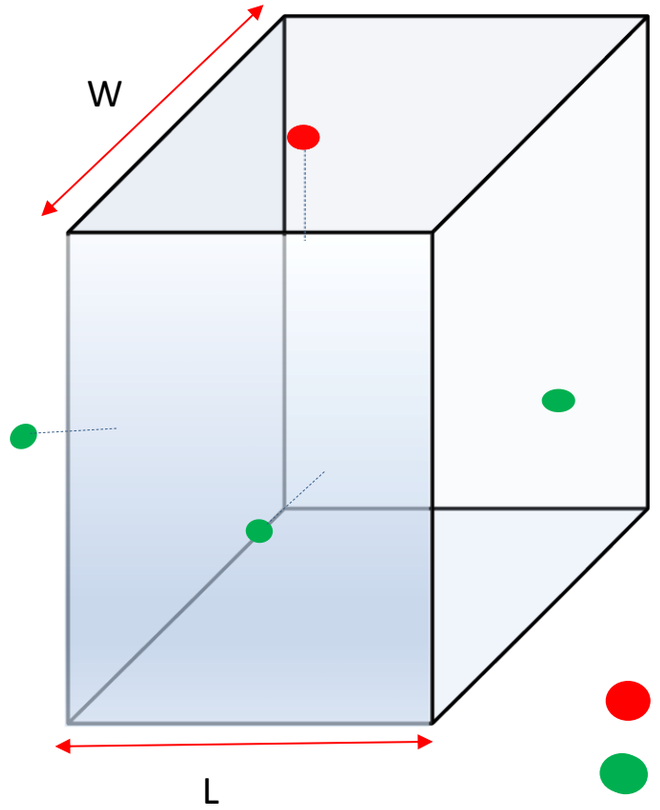
Total Measurement Surface

= 2.94*1.32 + 2*2.43*2.94 + 2.43*1.32

= **21.4** m2

Sound Pressure Level of A05:

Sound Source	Overall, dB(A)	$10^{li/10}$
Side	64.1	2570395.8
	63.4	2187761.6
	63.0	1995262.3
Top	63.1	2041737.9
$L'_{pA(ST)}$ = Average SPL	63.4	



Microphone Position over the noise source

Microphone Position aside the noise source

Measurement Distance = 1m

Dimension of measurement Surface

	H (m)	L (m)	W (m)
=	1.66+1	0.93+1	0.77+1+1
=	2.66	1.93	2.77

Total Measurement Surface

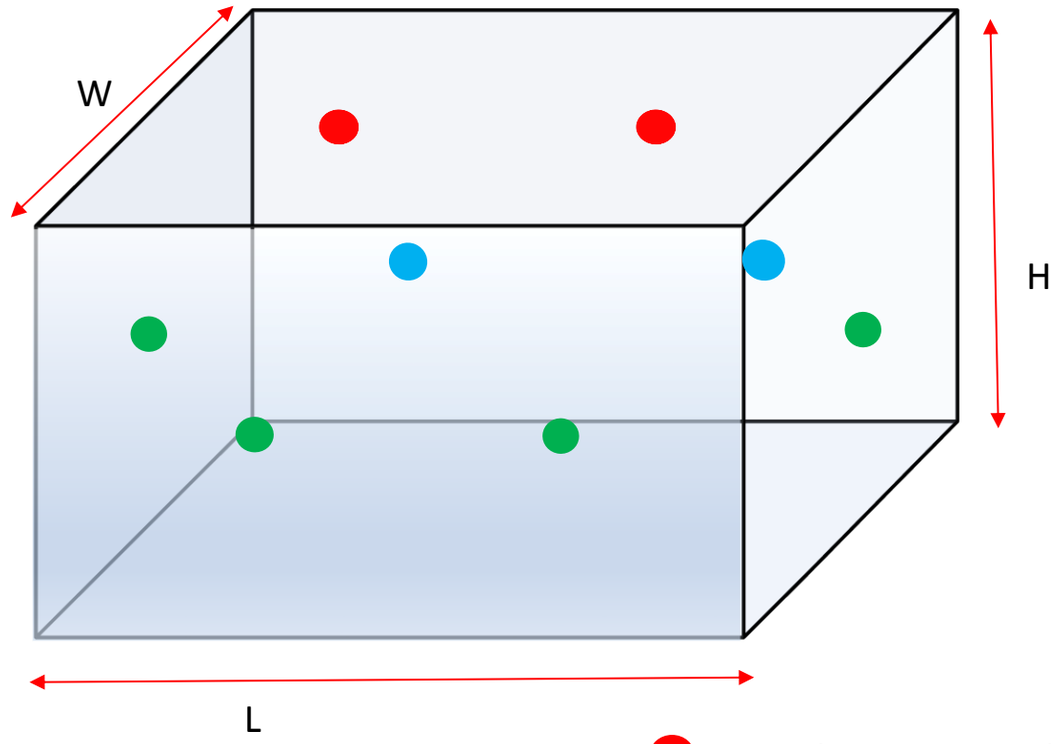
= 2.77*1.93 + 2.66*1.93 + 2*2.66*2.77

= **25.2** m2

A04 to A06

Sound Pressure Level of A06:

Sound Source	Overall, dB(A)	$10^{li/10}$
Side	67.1	5128613.8
	66.4	4385307.0
	66.0	3981071.7
	67.0	5011872.3
	67.8	6025595.9
	68.2	6606934.5
Top	67.1	5128613.8
	67.8	6025595.9
$L'_{pA(ST)}$ = Average SPL	67.2	



Microphone Position over the noise source

Microphone Position aside the noise source

Measurement Distance = 1m

Dimension of measurement Surface

	H (m)	L (m)	W (m)
=	1.33+1	2.05+1+1	1.06+1+1
=	2.33	4.05	3.06

Total Measurement Surface

= 3.06*4.05 + 2*2.33*4.05 + 2*2.33*3.06

= **45.5** m2

A01 & A02

Unparalleled efficiency

Ultimate in advanced condenser technology

The Ultima Compact Condenser is a high efficiency, compact, air-cooled single/ dual circuit condensing unit, which offers exceptional Energy Efficiency Ratios (EER) of up to 3.39 .

With DSH scroll compressors and optimised for R410A refrigerant, the Ultima Compact Condensing range has been engineered using the very best condenser technology and components to increase efficiency and deliver improved performance.

Developed with low sound levels as a key factor in its design, the Ultima Compact Condenser is ideally applicable to a variety of environments including including offices, retail, healthcare, leisure and data centres.

Key technical data

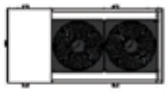
- 30 – 150kW nominal cooling capacity
- 30 models
- 5 case sizes
- Single and dual circuit variants
- Regular quiet and extra quiet sound variants
- 1-4 stages of cooling
- Designed and optimised for R410A refrigerant

EER* of up to 3.42

Part load efficiencies are enhanced by sequenced scroll compressors and EC fans.

*Energy Efficiency Ratio

5 case sizes available

	H x W x L	Nominal Cooling*
	1450 x 1310 x 1650mm Single and Dual Circuit	30 - 40kW
	1450 x 1310 x 2500mm Single and Dual Circuit	30 - 75kW
	2000 x 1300 x 2800mm Dual Circuit Only	85 - 100kW
	2000 x 1300 x 3650mm Dual Circuit Only	100 - 150kW
	2000 x 1300 x 4500mm Dual Circuit Only	125 - 150kW

* 6°C evaporating temperature, 35°C ambient

A01 & A02

Specifications at a glance

Nomenclature explained U CUR 075 D R- 2

U	Ultima
CUR	CUR = Condensing Unit R410A
xxx	Nominal Capacity (kW)
S D	Number of Circuits Single Circuit Dual Circuit
R- X-	Noise Variant Regular Quiet Extra Quiet
1-4	Number of Fans/Case size

Nominal capacity @ 6°C evaporating, 35°C ambient

EU F-Gas Regulations

This product range contains R410A fluorinated greenhouse gas with a GWP of 2088, weight range of 8.5 - 45.5kg, representing 17.7 - 95.0 equivalent tonnes of CO_2.

5 case sizes available

Model No.	Number of Circuits	Nom. Cooling Capacity (kW)[1]	Input (kW)[1]	EER[2]	Sound Pressure @ 10m dB(A)	Dimensions (HxWxD) mm	Operating Weight (kg)
Regular quiet							
UCUR030SR-10E0	1	31.6	10.1	3.13	44	1450 x 1310 x 1650	
UCUR040SR-10H0	1	39.4	14.5	2.72	44	1450 x 1310 x 1650	
UCUR040DR-10CC	2	39.4	14.5	2.72	44	1450 x 1310 x 1650	
UCUR050SR-20K0	1	57.2	17.6	3.25	47	1450 x 1310 x 2500	833
UCUR050DR-20DD	2	57.2	17.6	3.25	47	1450 x 1310 x 2500	804
UCUR060SR-20L0	1	63.6	20.1	3.16	47	1450 x 1310 x 2500	839
UCUR060DR-20EE	2	63.6	20.1	3.16	47	1450 x 1310 x 2500	812
UCUR070SR-20M0	1	71.1	23.6	3.01	47	1450 x 1310 x 2500	843
UCUR070DR-20FF	2	71.1	23.6	3.01	47	1450 x 1310 x 2500	816
UCUR075SR-20N0	1	78.1	27.3	2.86	48	1450 x 1310 x 2500	850
UCUR075DR-20GG	2	78.1	27.3	2.86	48	1450 x 1310 x 2500	823
UCUR085DR-20HJ	2	88.2	30.3	2.91	49	2000 x 1300 x 2800	1160
UCUR100DR-20JK	2	105.7	34.4	3.07	53	2000 x 1300 x 2800	1206
UCUR125DR-30LL	2	130.1	40.4	3.22	53	2000 x 1300 x 3650	1511
UCUR150DR-30NN	2	161.6	53.8	3.00	54	2000 x 1300 x 3650	1536
Extra quiet							
UCUR030SX-10E0	1	31.8	10.0	3.18	42	1450 x 1310 x 1650	560
UCUR040SX-10H0	1	39.7	14.4	2.76	42	1450 x 1310 x 1650	616
UCUR040DX-10CC	2	39.7	14.4	2.76	42	1450 x 1310 x 1650	650
UCUR050SX-20K0	1	57.4	17.4	3.30	45	1450 x 1310 x 2500	833
UCUR050DX-20DD	2	57.4	17.4	3.30	45	1450 x 1310 x 2500	804
UCUR060SX-20L0	1	63.9	19.9	3.21	45	1450 x 1310 x 2500	839
UCUR060DX-20EE	2	63.9	19.9	3.21	45	1450 x 1310 x 2500	812
UCUR070SX-20M0	1	71.5	23.3	3.07	45	1450 x 1310 x 2500	843
UCUR070DX-20FF	2	71.5	23.3	3.07	45	1450 x 1310 x 2500	816
UCUR075SX-20N0	1	78.6	26.9	2.92	46	1450 x 1310 x 2500	850
UCUR075DX-20GG	2	78.6	26.9	2.92	46	1450 x 1310 x 2500	823
UCUR085DX-20HJ	2	89.3	29.7	3.01	47	2000 x 1300 x 2800	1160
UCUR100DX-30JK	2	106.6	33.0	3.23	48	2000 x 1300 x 3650	1498
UCUR125DX-40LL	2	130.7	38.5	3.39	48	2000 x 1300 x 4500	1679
UCUR150DX-40NN	2	162.1	51.7	3.14	48	2000 x 1300 x 4500	1704

Sound power level is 81dB(A) when the measurement distance is 10m

1) Nominal cooling capacity at 6°C evaporating temperature, 35°C ambient temperature, EC fans

2) EER at 6°C evaporating temperature, 35°C ambient temperature, based on TOTAL input power of compressors and fans

A03

Technical Service Manual

V4 Plus

Individual Series VRF

Top Discharge Version

Model:

3 phase, 380-415V, 50Hz

MDV-252W/DRN1-i(B)
MDV-280W/DRN1-i(B)
MDV-335W/DRN1-i(B)
MDV-400W/DRN1-i(B)
MDV-450W/DRN1-i(B)
MDV-560W/DRN1-i(B)
MDV-615W/DRN1-i(B)
MDV-670W/DRN1-i(B)
MDV-730W/DRN1-i(B)
MDV-785W/DRN1-i(B)
MDV-850W/DRN1-i(B)
MDV-900W/DRN1-i(B)

A03

Model			MDV-400W/ DRN1-i(B)	MDV-450W/ DRN1-i(B)
Power supply		V-Ph-Hz	380-415/3/50	
Cooling	Capacity	kW	40.0	45.0
	Power input	kW	12.3	14.0
	EER		3.25	3.21
Heating	Capacity	kW	45.0	50.0
	Power input	kW	11.2	12.8
	COP		4.02	3.91
DC inverter compressor	Model		E405DHD-36D2YG	E405DHD-36D2YG
	Type		DC inverter	DC inverter
	Brand		HITACHI	HITACHI
	Quantity		1	1
	Capacity	kW	11.8	11.8
	Input	kW	3.665	3.665
	Crankcase heater	W	27.6	27.6
	Refrigerant oil type		FVC68D	FVC68D
	Refrigerant oil charge	ml	500	500
Fixed inverter compressor	Model		E605DH-59D2YG	E655DH-65D2YG(GC)
	Type		Scroll	Scroll
	Brand		HITACHI	HITACHI
	Quantity		2	2
	Capacity	kW	15.39	17.1
	Input	kW	5.13	5.74
	Crankcase heater	W	27.6	27.6
	Refrigerant oil type		FVC68D	FVC68D
	Refrigerant oil charge	ml	500	500
Outdoor fan motor	Model		WZDK450-38G	WZDK450-38G
	Type		DC	DC
	Quantity		2	2
	Brand		PANASONIC	PANASONIC
	Insulation class		IPX4	IPX4
	Safe class		E	E
	Input	W	505×2	505×2
	Output	W	450×2	450×2
	Rated current	A	3.28×2	3.28×2
Outdoor fan	Material		ASG20	ASG20
	Type		Axial fan	Axial fan
	Quantity		2	2
	Diameter	mm	560	560
	Height	mm	189	189
	ESP	Pa	0-20 (default)	0-20 (default)
		Pa	20-40 (customized)	20-40 (customized)

Outdoor coil	Number of rows		2	2
	Tube pitch(a)× row pitch(b)	mm	22×19	22×19
	Fin spacing	mm	1.6	1.6
	Fin type		Hydrophilic aluminium	Hydrophilic aluminium
	Tube outside diameter	mm	Φ7.94	Φ7.94
	Tube type		innergroove tube	innergroove tube
	Coil dimension (W×H×D)	mm	2270×38×1232	2270×38×1232
	Number of circuits		inlet:22; outlet:20	inlet:22; outlet:20
Outdoor air flow		m^3/h	15000	15000
Sound pressure level		dB(A)	60	60
Connectable indoor unit	Total capacity	%	50-130	50-130
	Max. quantity		16	20
Outdoor unit	Net dimension (W×H×D)	mm	1250×1615×765	1250×1615×765
	Packing (W×H×D)	mm	1305×1790×820	1305×1790×820
	Net/Gross weight	mm	325/345	325/345
Refrigerant	Type		R410A	R410A
	Factory charged	kg	15	15
Throttle type			EXV	EXV
Design pressure (Hi/Lo)		MPa	4.4/2.6	4.4/2.6
Refrigerant piping	Liquid pipe	mm	15.9	15.9
	Gas pipe	mm	31.8	31.8
Ambient temp. range	Cooling	°C	-5~48	-5~48
	Heating	°C	-15~24	-15~24

Notes:

Capacities are based on the following conditions:

Cooling: Indoor temperature 27 °C DB/19 °C WB; Outdoor temperature 35 °C DB/24 °C WB.

Heating: Indoor temperature 20 °C DB/15 °C WB; Outdoor temperature 7 °C DB/6 °C WB.

Piping length: Interconnecting piping length 7.5m, level difference of zero.

Sound values are measured in a semi-anechoic room, at a position 1m in front of the unit and 1.3m above the floor.

The above data may be changed without notice for future improvement on quality and performance.

A04

VRV S 三管道智能化中央冷氣系統

返回

3匹 | 4匹 | 4匹 | 5匹 | 6匹 | 7匹 | 8匹 | 9匹 | 10匹 | 11匹 | 12匹 | 14匹 | 16匹

室外機 - RJZQ8AAY

A04

Sound power level is 64dB(A) when the measurement distance is 1m

型號	
室外機	RJZQ8AAY
製冷量	22.4kW kW
供暖量	25.0kW kW
電源	Y: 3Ø, 380V, 50Hz

室外機	
運轉音量 (高/低)	56dB(A)
尺寸 (高x闊x深)	1,430x940x320mm
機身重量	140kg
配管直徑(液態)	Ø9.5mm
配管直徑(氣態)	Ø19.1mm

描述

製冷量以室內溫度27°CDB，19°CWB及室外溫度35°CDB為基本量度環境

供暖量以室內溫度20°CDB 及室外溫度7°CDB，6°CWB為基本量度環境

TOP

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免責聲明 隱私條例

A05

Outdoor Units

VRV X (Cooling Only)

MODEL			**RXQ6ARY6**	**RXQ8ARY6**	**RXQ10ARY6**	**RXQ12ARY6**	**RXQ14ARY6**	**RXQ16ARY6**
Combination units			-	—	—	—	—	—
Power supply			3-phase, 380-415 V, 50 Hz					
Cooling capacity		Btu/h	54,600	76,400	95,500	1,14,000	1,36,000	1,54,000
		kW	16.0	22.4	28.0	33.5	40.0	45.0
Capacity control		%	25~100	20~100	13~100	12~100	11~100	10~100
Casing colour			Ivory white (5Y7.5/1)					
Compressor	Type		Hermetically Sealed Scroll Type					
	No. of compressor		1	1	1	1	1	2
Airflow rate		m^3/min	119	178		191	257	
Dimensions (HxWxD)		mm	1,657X930X765				1,657X1,240X765	
Machine weight		kg	165		175		220	260
Sound level		dB(A)	56	56	57	59	60	60
Operation range	Cooling	°CDB	10 ~ 49					
Refrigerant	Type		R410A					
	Charge	kg	5.9		6.7	6.8	7.4	8.2
Piping connections	Liquid	mm	ø 9.5				ø 12.7	
	Gas	mm	ø 19.1		ø 22.2		ø 28.6	

Note: Specifications are based on the following conditions:

- Cooling: Indoor temp.: 27°CDB, 19°CWB, Outdoor temp.: 35°CDB, Equivalent piping length: 7.5 m, Level difference: 0
- Sound level: Anechoic chamber conversion value, measured at a point 1 m in front of the unit at a height of 1.5 m. During actual operation, these values are normally somewhat higher as a result of ambient conditions.

Physical data, 30RBS

A06 & A07

30RBS				039	045	050	060	070	080	090	100	120	140	160
Cooling														
Standard unit	C1	Nominal capacity	kW	40	44	51	58	67	79	87	97	114	135	156
Full load performances*	C1	EER	kW/kW	2.87	2.76	2.67	2.66	2.72	2.70	2.73	2.73	2.67	2.70	2.65
	C1	Eurovent class cooling		C	C	D	D	C	C	C	C	D	C	D
	C2	Nominal capacity	kW	53	59	69	81	85	98	114	126	151	171	194
	C2	EER	kW/kW	3.44	3.32	3.12	3.31	2.97	3.06	3.18	3.09	3.10	2.99	3.01
Full load performances**	C1	Gross nominal capacity	kW	40	44	52	59	68	80	87	98	115	136	157
	C1	Gross EER	kW/kW	2.95	2.84	2.75	2.74	2.80	2.78	2.79	2.79	2.73	2.77	2.72
	C2	Gross nominal capacity	kW	54	59	69	82	86	99	115	127	152	173	196
	C2	Gross EER	kW/kW	3.59	3.47	3.26	3.47	3.08	3.19	3.28	3.19	3.21	3.09	3.12
Seasonal efficiency*	C1	ESEER	kW/kW	3.75	3.88	3.95	3.80	3.62	3.67	3.91	3.94	3.83	3.68	3.87
Seasonal efficiency**	C1	Gross ESEER	kW/kW	3.97	4.14	4.22	4.06	3.84	3.90	4.16	4.18	4.08	3.94	4.16
IPLV			kW/kW	4.54	4.71	4.81	4.58	4.26	4.39	4.55	4.53	4.55	4.29	4.64
Sound levels														
Standard unit														
Sound power level(1)			dB(A)	80	81	81	81	87	87	84	84	84	90	90
Sound pressure level at 10 m(2)			dB(A)	49	49	49	49	55	55	52	52	52	58	58
Unit with option 15LS														
Sound power level(1)			dB(A)	79	80	80	80	80	80	83	83	83	83	83
Sound pressure level at 10 m(2)			dB(A)	48	48	48	48	48	48	51	51	51	51	51
Dimensions														
Length			mm	1061	1061	1061	1061	1061	1061	2258	2258	2258	2258	2258
Width			mm	2050	2050	2050	2050	2050	2050	2050	2050	2050	2050	2050
Height			mm	1330	1330	1330	1330	1330	1330	1330	1330	1330	1330	1330
Operating weight with MCHE coil (3)														
Standard unit without hydronic module			kg	429	436	442	454	454	471	766	776	789	896	928
Standard unit with hydronic module														
Single high-pressure pump			kg	459	466	472	484	484	501	798	808	825	935	967
Dual high-pressure pump			kg	484	492	497	510	510	527	843	853	873	972	1004
Compressors				Hermetic scroll compressors, 48.3 r/s										
Circuit A				2	2	2	2	2	2	3	3	3	2	2
Circuit B				-	-	-	-	-	-	-	-	-	2	2
No of control stages				2	2	2	2	2	2	3	3	3	4	4
Refrigerant charge with MCHE coil(3)				R-410A										
Circuit A			kg	4.7	5.3	5.9	6.7	6.2	7.3	10.7	10.8	11.4	6.5	7.4
			$teqCO_2$	9.8	11.1	12.3	14.0	12.9	15.2	22.3	22.6	23.8	13.6	15.5
Circuit B			kg	-	-	-	-	-	-	-	-	-	6.5	7.4
			$teqCO_2$	-	-	-	-	-	-	-	-	-	13.6	15.5
Capacity control				Touch Pilot Junior										
Minimum capacity			%	50	50	50	50	50	50	33	33	33	25	25
Condensers				All-aluminium microchannel heat exchanger (MCHE)										
Fans				Axial Flying Bird IV with rotating shroud										
Quantity				1	1	1	1	1	1	2	2	2	2	2
Maximum total air flow			l/s	3885	3883	3687	3908	5013	5278	6940	6936	7370	10026	10556
Maximum rotation speed			r/s	12	12	12	12	16	16	12	12	12	16	16
Evaporator				Direct expansion. plate heat exchanger										
Water volume			l	2.6	3.0	3.3	4.0	4.8	5.6	8.7	9.9	11.3	12.4	14.7
Without hydronic module (option)														
Max. water-side operating pressure			kPa	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000	1000
With hydronic module (option)														
Single or dual pump (as selected)				Pump, Victaulic screen filter, relief valve, expansion tank, purge valves (water + air), pressure sensors										
Expansion tank volume			l	12	12	12	12	12	12	35	35	35	35	35
Expansion tank pressure (4)			bar	1	1	1	1	1	1	1.5	1.5	1.5	1.5	1.5
Max. water-side operating pressure			kPa	400	400	400	400	400	400	400	400	400	400	400
Water connections with/without hydronic module				Victaulic										
Diameter			in	2	2	2	2	2	2	2	2	2	2	2
Outside tube diameter			mm	60.3	60.3	60.3	60.3	60.3	60.3	60.3	60.3	60.3	60.3	60.3
Chassis paint colour				Colour code: RAL7035										

* In accordance with standard EN14511-3:2013

** Not in accordance with standard EN14511-3:2013.These performances do not take into account the correction for the proportionnal heating capacity and power input generated by the water pump to overcome the internal pressure drop in the heat exchanger.

C1 Cooling mode conditions: evaporator water entering/leaving temperature 12°C/7°C, outside air temperature 35°C, evaporator fooling factor 0 m^2.K/W

C2 Cooling mode conditions: evaporator water entering/leaving temperature 23°C/18°C, outside air temperature 35°C, evaporator fooling factor 0 m^2.K/W

IPLV Calculations according to standard performances (in accordance with AHRI 550-590)

(1) In dB ref=10-12 W, (A) weighting. Declared dualnumber noise emission values in accordance with ISO 4871 (with an associated uncertainty of +/-3dB(A)). Measured in accordance with ISO 9614-1 and certified by Eurovent.

(2) In dB ref 20µPa, (A) weighting. Declared dualnumber noise emission values in accordance with ISO 4871 (with an associated uncertainty of +/-3dB(A)). For information, calculated from the sound power level Lw(A).

(3) Values shown are a guideline only. Please refer to the unit nameplate

(4) When delivered, the standard pre-inflation of the tank is not necessarily the optimal value for the system. To permit changing the water volume, change the inflation pressure to a pressure that is close to the static head of the system. Fill the system with water (purging the air) to a pressure value that is 10 to 20 kPa higher than the pressure in the tank

Eurovent certified values

Appendix 4.4

Detailed Calculations of Fixed Noise Impact Assessment

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N01** X coordinate = 837334.3
Y coordinate = 819801.6

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	91.7	-47.2	0	3	24
V02			68.0	837421.8	819770.2	93.0	-47.4	0	3	24
V03			68.0	837423.1	819769.6	94.4	-47.5	0	3	23
V04			68.0	837424.3	819768.9	95.8	-47.6	0	3	23
V05			68.0	837420.1	819769.5	91.6	-47.2	0	3	24
V06			68.0	837421.3	819768.9	92.9	-47.4	0	3	24
V07			68.0	837422.5	819768.4	94.3	-47.5	0	3	24
V08			68.0	837423.8	819767.7	95.7	-47.6	0	3	23
V09			64.0	837419.6	819768.5	91.5	-47.2	0	3	20
V10			64.0	837420.8	819767.9	92.8	-47.4	0	3	20
V11			64.0	837422.0	819767.3	94.2	-47.5	0	3	20
V12			64.0	837423.3	819766.7	95.6	-47.6	0	3	19
V13			68.0	837419.1	819767.5	91.4	-47.2	0	3	24
V14			68.0	837420.3	819766.9	92.8	-47.3	0	3	24
V15			68.0	837421.5	819766.3	94.2	-47.5	0	3	24
V16			68.0	837422.8	819765.7	95.5	-47.6	0	3	23
V17			64.0	837419.8	819765.8	92.7	-47.3	0	3	20
V18			64.0	837421.0	819765.2	94.1	-47.5	0	3	20
V19			64.0	837422.3	819764.6	95.5	-47.6	0	3	19
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	88.6	-47.0	0	3	44
C02			87.9	837425.9	819794.9	91.9	-47.3	0	3	44
C03			87.9	837426.2	819782.0	94.0	-47.5	0	3	43
C04			87.9	837430.8	819792.7	96.9	-47.7	0	3	43
C05		VRV	68.0	837432.5	819787.2	99.3	-47.9	0	3	23
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	101.1	-48.1	0	3	36
A02		Chiller	81.0	837431.0	819821.8	98.8	-47.9	0	3	36
A03		VRV	68.0	837429.3	819818.3	96.5	-47.7	0	3	23
A04		VRV	73.4	837424.9	819807.3	90.8	-47.2	0	3	29
A05		VRV	74.4	837427.7	819806.0	93.5	-47.4	0	3	30
A06		Chiller	81.0	837432.1	819802.0	97.9	-47.8	0	3	36
A07		Chiller	81.0	837438.4	819800.9	104.1	-48.4	0	3	36
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	231.2	-55.3	0	3	35
VS-TKW-2		TVL	90.0	837407.9	819581.6	232.0	-55.3	0	3	38
VS-TKW-3		TVL	87.0	837405.5	819572.2	240.3	-55.6	0	3	34
VS-TKW-4		SVL	81.0	837401.9	819571.9	239.5	-55.6	0	3	28
VS-TKW-5		SVL	85.0	837399.6	819571.9	238.9	-55.6	0	3	32
VS-TKW-6		SVL	81.0	837398.7	819586.0	225.1	-55.0	0	3	29
VS-TKW-7		TVL	91.0	837404.9	819590.1	223.0	-55.0	0	3	39
VS-TKW-8		TVL	85.0	837398.9	819579.6	231.3	-55.3	0	3	33
VS-TKW-9		SVL	80.0	837398.7	819585.9	225.2	-55.0	0	3	28
VS-TKW-22		SVL	95.0	837411.5	819582.8	232.1	-55.3	0	3	43
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	203.4	-54.2	0	3	27
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	212.5	-54.5	0	3	30
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	210.2	-54.5	0	3	31
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	211.7	-54.5	0	3	37
VS-TKW-28		SVL	85.0	837404.7	819617.1	197.5	-53.9	0	3	34
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	72.2	-45.2	0	3	45
VS-TKW-49		SVL	82.0	837394.9	819844.2	74.0	-45.4	0	3	40
VS-TKW-50		TVL	96.0	837400.7	819842.1	77.8	-45.8	0	3	53
VS-TKW-51		TVL	94.0	837399.2	819835.6	73.3	-45.3	0	3	52
VS-TKW-52		TVL	88.0	837407.8	819839.1	82.6	-46.3	0	3	45
VS-TKW-53		TVL	81.0	837404.6	819838.7	79.5	-46.0	0	3	38
VS-TKW-54		SVL	84.0	837407.3	819835.3	80.4	-46.1	0	3	41
VS-TKW-55		SVL	87.0	837407.3	819833.7	79.7	-46.0	0	3	44
VS-TKW-56		SVL	92.0	837407.4	819833.7	79.8	-46.0	0	3	49
VS-TKW-57		SVL	81.0	837406.3	819832.7	78.5	-45.9	0	3	38
VS-TKW-57A		SVL	90.0	837406.3	819832.5	78.4	-45.9	0	3	47
VS-TKW-58		SVL	90.0	837393.9	819839.2	70.5	-45.0	0	3	48
VS-TKW-59		TVL	84.0	837394.6	819840.5	71.8	-45.1	0	3	42
VS-TKW-60		TVL	85.0	837394.3	819841.3	72.0	-45.1	0	3	43
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	98.7	-47.9	0	3	32
VS-TKW-64		SVL	79.0	837403.8	819872.3	99.1	-47.9	0	3	34
VS-TKW-65		SVL	80.0	837393.3	819888.1	104.6	-48.4	0	3	35
VS-TKW-67		SVL	88.0	837397.3	819875.2	96.9	-47.7	0	3	43
VS-TKW-68		SVL	79.0	837387.1	819884.5	98.3	-47.8	0	3	34
VS-TKW-71		SVL	79.0	837404.0	819879.1	104.2	-48.4	0	3	34
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	211.9	-54.5	0	3	45
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	203.5	-54.2	0	3	46
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N01** X coordinate = 837334.3
Y coordinate = 819801.6

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	91.7	-47.2	0	3	NA
V02			0.0	837421.8	819770.2	93.0	-47.4	0	3	NA
V03			0.0	837423.1	819769.6	94.4	-47.5	0	3	NA
V04			0.0	837424.3	819768.9	95.8	-47.6	0	3	NA
V05			0.0	837420.1	819769.5	91.6	-47.2	0	3	NA
V06			0.0	837421.3	819768.9	92.9	-47.4	0	3	NA
V07			0.0	837422.5	819768.4	94.3	-47.5	0	3	NA
V08			0.0	837423.8	819767.7	95.7	-47.6	0	3	NA
V09			0.0	837419.6	819768.5	91.5	-47.2	0	3	NA
V10			0.0	837420.8	819767.9	92.8	-47.4	0	3	NA
V11			0.0	837422.0	819767.3	94.2	-47.5	0	3	NA
V12			0.0	837423.3	819766.7	95.6	-47.6	0	3	NA
V13			0.0	837419.1	819767.5	91.4	-47.2	0	3	NA
V14			0.0	837420.3	819766.9	92.8	-47.3	0	3	NA
V15			0.0	837421.5	819766.3	94.2	-47.5	0	3	NA
V16			0.0	837422.8	819765.7	95.5	-47.6	0	3	NA
V17			0.0	837419.8	819765.8	92.7	-47.3	0	3	NA
V18			0.0	837421.0	819765.2	94.1	-47.5	0	3	NA
V19			0.0	837422.3	819764.6	95.5	-47.6	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	88.6	-47.0	0	3	NA
C02			0.0	837425.9	819794.9	91.9	-47.3	0	3	NA
C03			0.0	837426.2	819782.0	94.0	-47.5	0	3	NA
C04			0.0	837430.8	819792.7	96.9	-47.7	0	3	NA
C05		VRV	0.0	837432.5	819787.2	99.3	-47.9	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	101.1	-48.1	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	98.8	-47.9	0	3	NA
A03		VRV	0.0	837429.3	819818.3	96.5	-47.7	0	3	NA
A04		VRV	0.0	837424.9	819807.3	90.8	-47.2	0	3	NA
A05		VRV	0.0	837427.7	819806.0	93.5	-47.4	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	97.9	-47.8	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	104.1	-48.4	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	231.2	-55.3	0	3	25
VS-TKW-2		TVL	80.0	837407.9	819581.6	232.0	-55.3	0	3	28
VS-TKW-3		TVL	77.0	837405.5	819572.2	240.3	-55.6	0	3	24
VS-TKW-4		SVL	71.0	837401.9	819571.9	239.5	-55.6	0	3	18
VS-TKW-5		SVL	75.0	837399.6	819571.9	238.9	-55.6	0	3	22
VS-TKW-6		SVL	71.0	837398.7	819586.0	225.1	-55.0	0	3	19
VS-TKW-7		TVL	81.0	837404.9	819590.1	223.0	-55.0	0	3	29
VS-TKW-8		TVL	75.0	837398.9	819579.6	231.3	-55.3	0	3	23
VS-TKW-9		SVL	70.0	837398.7	819585.9	225.2	-55.0	0	3	18
VS-TKW-22		SVL	85.0	837411.5	819582.8	232.1	-55.3	0	3	33
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	203.4	-54.2	0	3	17
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	212.5	-54.5	0	3	20
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	210.2	-54.5	0	3	21
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	211.7	-54.5	0	3	27
VS-TKW-28		SVL	75.0	837404.7	819617.1	197.5	-53.9	0	3	24
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	72.2	-45.2	0	3	39
VS-TKW-49		SVL	76.0	837394.9	819844.2	74.0	-45.4	0	3	34
VS-TKW-50		TVL	88.0	837400.7	819842.1	77.8	-45.8	0	3	45
VS-TKW-51		TVL	88.0	837399.2	819835.6	73.3	-45.3	0	3	46
VS-TKW-52		TVL	82.0	837407.8	819839.1	82.6	-46.3	0	3	39
VS-TKW-53		TVL	74.0	837404.6	819838.7	79.5	-46.0	0	3	31
VS-TKW-54		SVL	78.0	837407.3	819835.3	80.4	-46.1	0	3	35
VS-TKW-55		SVL	81.0	837407.3	819833.7	79.7	-46.0	0	3	38
VS-TKW-56		SVL	86.0	837407.4	819833.7	79.8	-46.0	0	3	43
VS-TKW-57		SVL	75.0	837406.3	819832.7	78.5	-45.9	0	3	32
VS-TKW-57A		SVL	84.0	837406.3	819832.5	78.4	-45.9	0	3	41
VS-TKW-58		SVL	84.0	837393.9	819839.2	70.5	-45.0	0	3	42
VS-TKW-59		TVL	78.0	837394.6	819840.5	71.8	-45.1	0	3	36
VS-TKW-60		TVL	79.0	837394.3	819841.3	72.0	-45.1	0	3	37
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	98.7	-47.9	0	3	31
VS-TKW-64		SVL	73.0	837403.8	819872.3	99.1	-47.9	0	3	28
VS-TKW-65		SVL	79.0	837393.3	819888.1	104.6	-48.4	0	3	34
VS-TKW-67		SVL	87.0	837397.3	819875.2	96.9	-47.7	0	3	42
VS-TKW-68		SVL	77.0	837387.1	819884.5	98.3	-47.8	0	3	32
VS-TKW-71		SVL	73.0	837404.0	819879.1	104.2	-48.4	0	3	28
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	211.9	-54.5	0	3	35
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	203.5	-54.2	0	3	36
									Total	**53**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N02** X coordinate = 837335.1
Y coordinate = 819641.1

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	155.3	-51.8	0	3	19
V02			68.0	837421.8	819770.2	155.5	-51.8	0	3	19
V03			68.0	837423.1	819769.6	155.7	-51.8	0	3	19
V04			68.0	837424.3	819768.9	155.9	-51.9	0	3	19
V05			68.0	837420.1	819769.5	154.0	-51.7	0	3	19
V06			68.0	837421.3	819768.9	154.2	-51.8	0	3	19
V07			68.0	837422.5	819768.4	154.4	-51.8	0	3	19
V08			68.0	837423.8	819767.7	154.6	-51.8	0	3	19
V09			64.0	837419.6	819768.5	152.9	-51.7	0	3	15
V10			64.0	837420.8	819767.9	153.0	-51.7	0	3	15
V11			64.0	837422.0	819767.3	153.2	-51.7	0	3	15
V12			64.0	837423.3	819766.7	153.4	-51.7	0	3	15
V13			68.0	837419.1	819767.5	151.7	-51.6	0	3	19
V14			68.0	837420.3	819766.9	151.9	-51.6	0	3	19
V15			68.0	837421.5	819766.3	152.1	-51.6	0	3	19
V16			68.0	837422.8	819765.7	152.3	-51.7	0	3	19
V17			64.0	837419.8	819765.8	150.7	-51.6	0	3	15
V18			64.0	837421.0	819765.2	151.0	-51.6	0	3	15
V19			64.0	837422.3	819764.6	151.2	-51.6	0	3	15
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	167.2	-52.5	0	3	38
C02			87.9	837425.9	819794.9	178.6	-53.0	0	3	38
C03			87.9	837426.2	819782.0	167.8	-52.5	0	3	38
C04			87.9	837430.8	819792.7	179.2	-53.1	0	3	38
C05		VRV	68.0	837432.5	819787.2	175.6	-52.9	0	3	18
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	208.4	-54.4	0	3	30
A02		Chiller	81.0	837431.0	819821.8	204.6	-54.2	0	3	30
A03		VRV	68.0	837429.3	819818.3	200.7	-54.0	0	3	17
A04		VRV	73.4	837424.9	819807.3	188.9	-53.5	0	3	23
A05		VRV	74.4	837427.7	819806.0	189.2	-53.5	0	3	24
A06		Chiller	81.0	837432.1	819802.0	187.9	-53.5	0	3	31
A07		Chiller	81.0	837438.4	819800.9	190.3	-53.6	0	3	30
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	88.5	-46.9	0	3	43
VS-TKW-2		TVL	90.0	837407.9	819581.6	94.0	-47.5	0	3	46
VS-TKW-3		TVL	87.0	837405.5	819572.2	98.5	-47.9	0	3	42
VS-TKW-4		SVL	81.0	837401.9	819571.9	96.2	-47.7	0	3	36
VS-TKW-5		SVL	85.0	837399.6	819571.9	94.6	-47.5	0	3	40
VS-TKW-6		SVL	81.0	837398.7	819586.0	84.2	-46.5	0	3	37
VS-TKW-7		TVL	91.0	837404.9	819590.1	86.5	-46.7	0	3	47
VS-TKW-8		TVL	85.0	837398.9	819579.6	88.7	-47.0	0	3	41
VS-TKW-9		SVL	80.0	837398.7	819585.9	84.2	-46.5	0	3	36
VS-TKW-22		SVL	95.0	837411.5	819582.8	96.1	-47.7	0	3	50
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	70.9	-45.0	0	3	36
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	75.6	-45.6	0	3	39
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	74.4	-45.4	0	3	40
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	75.1	-45.5	0	3	46
VS-TKW-28		SVL	85.0	837404.7	819617.1	73.6	-45.3	0	3	43
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	209.5	-54.4	0	3	36
VS-TKW-49		SVL	82.0	837394.9	819844.2	211.7	-54.5	0	3	30
VS-TKW-50		TVL	96.0	837400.7	819842.1	211.4	-54.5	0	3	44
VS-TKW-51		TVL	94.0	837399.2	819835.6	204.8	-54.2	0	3	43
VS-TKW-52		TVL	88.0	837407.8	819839.1	211.0	-54.5	0	3	37
VS-TKW-53		TVL	81.0	837404.6	819838.7	209.5	-54.4	0	3	30
VS-TKW-54		SVL	84.0	837407.3	819835.3	207.1	-54.3	0	3	33
VS-TKW-55		SVL	87.0	837407.3	819833.7	205.6	-54.3	0	3	36
VS-TKW-56		SVL	92.0	837407.4	819833.7	205.7	-54.3	0	3	41
VS-TKW-57		SVL	81.0	837406.3	819832.7	204.4	-54.2	0	3	30
VS-TKW-57A		SVL	90.0	837406.3	819832.5	204.2	-54.2	0	3	39
VS-TKW-58		SVL	90.0	837393.9	819839.2	206.7	-54.3	0	3	39
VS-TKW-59		TVL	84.0	837394.6	819840.5	208.1	-54.4	0	3	33
VS-TKW-60		TVL	85.0	837394.3	819841.3	208.8	-54.4	0	3	34
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	249.3	-55.9	0	3	24
VS-TKW-64		SVL	79.0	837403.8	819872.3	241.2	-55.6	0	3	26
VS-TKW-65		SVL	80.0	837393.3	819888.1	253.7	-56.1	0	3	27
VS-TKW-67		SVL	88.0	837397.3	819875.2	242.3	-55.7	0	3	35
VS-TKW-68		SVL	79.0	837387.1	819884.5	248.9	-55.9	0	3	26
VS-TKW-71		SVL	79.0	837404.0	819879.1	247.8	-55.9	0	3	26
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	77.8	-45.8	0	3	54
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	73.4	-45.3	0	3	55
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N02** X coordinate = 837335.1
Y coordinate = 819641.1

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	155.3	-51.8	0	3	NA
V02			0.0	837421.8	819770.2	155.5	-51.8	0	3	NA
V03			0.0	837423.1	819769.6	155.7	-51.8	0	3	NA
V04			0.0	837424.3	819768.9	155.9	-51.9	0	3	NA
V05			0.0	837420.1	819769.5	154.0	-51.7	0	3	NA
V06			0.0	837421.3	819768.9	154.2	-51.8	0	3	NA
V07			0.0	837422.5	819768.4	154.4	-51.8	0	3	NA
V08			0.0	837423.8	819767.7	154.6	-51.8	0	3	NA
V09			0.0	837419.6	819768.5	152.9	-51.7	0	3	NA
V10			0.0	837420.8	819767.9	153.0	-51.7	0	3	NA
V11			0.0	837422.0	819767.3	153.2	-51.7	0	3	NA
V12			0.0	837423.3	819766.7	153.4	-51.7	0	3	NA
V13			0.0	837419.1	819767.5	151.7	-51.6	0	3	NA
V14			0.0	837420.3	819766.9	151.9	-51.6	0	3	NA
V15			0.0	837421.5	819766.3	152.1	-51.6	0	3	NA
V16			0.0	837422.8	819765.7	152.3	-51.7	0	3	NA
V17			0.0	837419.8	819765.8	150.7	-51.6	0	3	NA
V18			0.0	837421.0	819765.2	151.0	-51.6	0	3	NA
V19			0.0	837422.3	819764.6	151.2	-51.6	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	167.2	-52.5	0	3	NA
C02			0.0	837425.9	819794.9	178.6	-53.0	0	3	NA
C03			0.0	837426.2	819782.0	167.8	-52.5	0	3	NA
C04			0.0	837430.8	819792.7	179.2	-53.1	0	3	NA
C05		VRV	0.0	837432.5	819787.2	175.6	-52.9	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	208.4	-54.4	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	204.6	-54.2	0	3	NA
A03		VRV	0.0	837429.3	819818.3	200.7	-54.0	0	3	NA
A04		VRV	0.0	837424.9	819807.3	188.9	-53.5	0	3	NA
A05		VRV	0.0	837427.7	819806.0	189.2	-53.5	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	187.9	-53.5	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	190.3	-53.6	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	88.5	-46.9	0	3	33
VS-TKW-2		TVL	80.0	837407.9	819581.6	94.0	-47.5	0	3	36
VS-TKW-3		TVL	77.0	837405.5	819572.2	98.5	-47.9	0	3	32
VS-TKW-4		SVL	71.0	837401.9	819571.9	96.2	-47.7	0	3	26
VS-TKW-5		SVL	75.0	837399.6	819571.9	94.6	-47.5	0	3	30
VS-TKW-6		SVL	71.0	837398.7	819586.0	84.2	-46.5	0	3	27
VS-TKW-7		TVL	81.0	837404.9	819590.1	86.5	-46.7	0	3	37
VS-TKW-8		TVL	75.0	837398.9	819579.6	88.7	-47.0	0	3	31
VS-TKW-9		SVL	70.0	837398.7	819585.9	84.2	-46.5	0	3	26
VS-TKW-22		SVL	85.0	837411.5	819582.8	96.1	-47.7	0	3	40
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	70.9	-45.0	0	3	26
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	75.6	-45.6	0	3	29
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	74.4	-45.4	0	3	30
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	75.1	-45.5	0	3	36
VS-TKW-28		SVL	75.0	837404.7	819617.1	73.6	-45.3	0	3	33
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	209.5	-54.4	0	3	30
VS-TKW-49		SVL	76.0	837394.9	819844.2	211.7	-54.5	0	3	24
VS-TKW-50		TVL	88.0	837400.7	819842.1	211.4	-54.5	0	3	36
VS-TKW-51		TVL	88.0	837399.2	819835.6	204.8	-54.2	0	3	37
VS-TKW-52		TVL	82.0	837407.8	819839.1	211.0	-54.5	0	3	31
VS-TKW-53		TVL	74.0	837404.6	819838.7	209.5	-54.4	0	3	23
VS-TKW-54		SVL	78.0	837407.3	819835.3	207.1	-54.3	0	3	27
VS-TKW-55		SVL	81.0	837407.3	819833.7	205.6	-54.3	0	3	30
VS-TKW-56		SVL	86.0	837407.4	819833.7	205.7	-54.3	0	3	35
VS-TKW-57		SVL	75.0	837406.3	819832.7	204.4	-54.2	0	3	24
VS-TKW-57A		SVL	84.0	837406.3	819832.5	204.2	-54.2	0	3	33
VS-TKW-58		SVL	84.0	837393.9	819839.2	206.7	-54.3	0	3	33
VS-TKW-59		TVL	78.0	837394.6	819840.5	208.1	-54.4	0	3	27
VS-TKW-60		TVL	79.0	837394.3	819841.3	208.8	-54.4	0	3	28
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	249.3	-55.9	0	3	23
VS-TKW-64		SVL	73.0	837403.8	819872.3	241.2	-55.6	0	3	20
VS-TKW-65		SVL	79.0	837393.3	819888.1	253.7	-56.1	0	3	26
VS-TKW-67		SVL	87.0	837397.3	819875.2	242.3	-55.7	0	3	34
VS-TKW-68		SVL	77.0	837387.1	819884.5	248.9	-55.9	0	3	24
VS-TKW-71		SVL	73.0	837404.0	819879.1	247.8	-55.9	0	3	20
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	77.8	-45.8	0	3	44
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	73.4	-45.3	0	3	45
									Total	**51**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N03** X coordinate = 837333.8
Y coordinate = 819875.5

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	136.1	-50.7	0	3	20
V02			68.0	837421.8	819770.2	137.3	-50.8	0	3	20
V03			68.0	837423.1	819769.6	138.5	-50.8	0	3	20
V04			68.0	837424.3	819768.9	139.8	-50.9	0	3	20
V05			68.0	837420.1	819769.5	136.7	-50.7	0	3	20
V06			68.0	837421.3	819768.9	137.9	-50.8	0	3	20
V07			68.0	837422.5	819768.4	139.1	-50.9	0	3	20
V08			68.0	837423.8	819767.7	140.4	-50.9	0	3	20
V09			64.0	837419.6	819768.5	137.1	-50.7	0	3	16
V10			64.0	837420.8	819767.9	138.4	-50.8	0	3	16
V11			64.0	837422.0	819767.3	139.6	-50.9	0	3	16
V12			64.0	837423.3	819766.7	140.9	-51.0	0	3	16
V13			68.0	837419.1	819767.5	137.7	-50.8	0	3	20
V14			68.0	837420.3	819766.9	138.9	-50.9	0	3	20
V15			68.0	837421.5	819766.3	140.1	-50.9	0	3	20
V16			68.0	837422.8	819765.7	141.4	-51.0	0	3	20
V17			64.0	837419.8	819765.8	139.4	-50.9	0	3	16
V18			64.0	837421.0	819765.2	140.6	-51.0	0	3	16
V19			64.0	837422.3	819764.6	141.9	-51.0	0	3	16
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	126.3	-50.0	0	3	41
C02			87.9	837425.9	819794.9	122.4	-49.8	0	3	41
C03			87.9	837426.2	819782.0	131.5	-50.4	0	3	41
C04			87.9	837430.8	819792.7	127.5	-50.1	0	3	41
C05		VRV	68.0	837432.5	819787.2	132.4	-50.4	0	3	21
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	110.8	-48.9	0	3	35
A02		Chiller	81.0	837431.0	819821.8	111.0	-48.9	0	3	35
A03		VRV	68.0	837429.3	819818.3	111.3	-48.9	0	3	22
A04		VRV	73.4	837424.9	819807.3	113.8	-49.1	0	3	27
A05		VRV	74.4	837427.7	819806.0	116.8	-49.3	0	3	28
A06		Chiller	81.0	837432.1	819802.0	122.8	-49.8	0	3	34
A07		Chiller	81.0	837438.4	819800.9	128.5	-50.2	0	3	34
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	303.0	-57.6	0	3	32
VS-TKW-2		TVL	90.0	837407.9	819581.6	303.1	-57.6	0	3	35
VS-TKW-3		TVL	87.0	837405.5	819572.2	311.7	-57.9	0	3	32
VS-TKW-4		SVL	81.0	837401.9	819571.9	311.2	-57.9	0	3	26
VS-TKW-5		SVL	85.0	837399.6	819571.9	310.7	-57.8	0	3	30
VS-TKW-6		SVL	81.0	837398.7	819586.0	296.7	-57.4	0	3	27
VS-TKW-7		TVL	91.0	837404.9	819590.1	294.1	-57.4	0	3	37
VS-TKW-8		TVL	85.0	837398.9	819579.6	303.0	-57.6	0	3	30
VS-TKW-9		SVL	80.0	837398.7	819585.9	296.8	-57.4	0	3	26
VS-TKW-22		SVL	95.0	837411.5	819582.8	302.9	-57.6	0	3	40
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	274.7	-56.8	0	3	24
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	284.0	-57.1	0	3	28
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	281.7	-57.0	0	3	28
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	283.1	-57.0	0	3	35
VS-TKW-28		SVL	85.0	837404.7	819617.1	267.9	-56.6	0	3	31
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	68.9	-44.8	0	3	45
VS-TKW-49		SVL	82.0	837394.9	819844.2	68.6	-44.7	0	3	40
VS-TKW-50		TVL	96.0	837400.7	819842.1	74.8	-45.5	0	3	54
VS-TKW-51		TVL	94.0	837399.2	819835.6	76.6	-45.7	0	3	51
VS-TKW-52		TVL	88.0	837407.8	819839.1	82.5	-46.3	0	3	45
VS-TKW-53		TVL	81.0	837404.6	819838.7	79.8	-46.0	0	3	38
VS-TKW-54		SVL	84.0	837407.3	819835.3	83.7	-46.5	0	3	41
VS-TKW-55		SVL	87.0	837407.3	819833.7	84.5	-46.5	0	3	43
VS-TKW-56		SVL	92.0	837407.4	819833.7	84.7	-46.6	0	3	48
VS-TKW-57		SVL	81.0	837406.3	819832.7	84.2	-46.5	0	3	37
VS-TKW-57A		SVL	90.0	837406.3	819832.5	84.3	-46.5	0	3	46
VS-TKW-58		SVL	90.0	837393.9	819839.2	70.2	-44.9	0	3	48
VS-TKW-59		TVL	84.0	837394.6	819840.5	70.1	-44.9	0	3	42
VS-TKW-60		TVL	85.0	837394.3	819841.3	69.5	-44.8	0	3	43
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	54.4	-42.7	0	3	37
VS-TKW-64		SVL	79.0	837403.8	819872.3	70.1	-44.9	0	3	37
VS-TKW-65		SVL	80.0	837393.3	819888.1	60.8	-43.7	0	3	39
VS-TKW-67		SVL	88.0	837397.3	819875.2	63.5	-44.1	0	3	47
VS-TKW-68		SVL	79.0	837387.1	819884.5	54.0	-42.7	0	3	39
VS-TKW-71		SVL	79.0	837404.0	819879.1	70.2	-44.9	0	3	37
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	283.1	-57.0	0	3	43
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	274.4	-56.8	0	3	43
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N03** X coordinate = 837333.8
Y coordinate = 819875.5

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	136.1	-50.7	0	3	NA
V02			0.0	837421.8	819770.2	137.3	-50.8	0	3	NA
V03			0.0	837423.1	819769.6	138.5	-50.8	0	3	NA
V04			0.0	837424.3	819768.9	139.8	-50.9	0	3	NA
V05			0.0	837420.1	819769.5	136.7	-50.7	0	3	NA
V06			0.0	837421.3	819768.9	137.9	-50.8	0	3	NA
V07			0.0	837422.5	819768.4	139.1	-50.9	0	3	NA
V08			0.0	837423.8	819767.7	140.4	-50.9	0	3	NA
V09			0.0	837419.6	819768.5	137.1	-50.7	0	3	NA
V10			0.0	837420.8	819767.9	138.4	-50.8	0	3	NA
V11			0.0	837422.0	819767.3	139.6	-50.9	0	3	NA
V12			0.0	837423.3	819766.7	140.9	-51.0	0	3	NA
V13			0.0	837419.1	819767.5	137.7	-50.8	0	3	NA
V14			0.0	837420.3	819766.9	138.9	-50.9	0	3	NA
V15			0.0	837421.5	819766.3	140.1	-50.9	0	3	NA
V16			0.0	837422.8	819765.7	141.4	-51.0	0	3	NA
V17			0.0	837419.8	819765.8	139.4	-50.9	0	3	NA
V18			0.0	837421.0	819765.2	140.6	-51.0	0	3	NA
V19			0.0	837422.3	819764.6	141.9	-51.0	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	126.3	-50.0	0	3	NA
C02			0.0	837425.9	819794.9	122.4	-49.8	0	3	NA
C03			0.0	837426.2	819782.0	131.5	-50.4	0	3	NA
C04			0.0	837430.8	819792.7	127.5	-50.1	0	3	NA
C05		VRV	0.0	837432.5	819787.2	132.4	-50.4	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	110.8	-48.9	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	111.0	-48.9	0	3	NA
A03		VRV	0.0	837429.3	819818.3	111.3	-48.9	0	3	NA
A04		VRV	0.0	837424.9	819807.3	113.8	-49.1	0	3	NA
A05		VRV	0.0	837427.7	819806.0	116.8	-49.3	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	122.8	-49.8	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	128.5	-50.2	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	303.0	-57.6	0	3	22
VS-TKW-2		TVL	80.0	837407.9	819581.6	303.1	-57.6	0	3	25
VS-TKW-3		TVL	77.0	837405.5	819572.2	311.7	-57.9	0	3	22
VS-TKW-4		SVL	71.0	837401.9	819571.9	311.2	-57.9	0	3	16
VS-TKW-5		SVL	75.0	837399.6	819571.9	310.7	-57.8	0	3	20
VS-TKW-6		SVL	71.0	837398.7	819586.0	296.7	-57.4	0	3	17
VS-TKW-7		TVL	81.0	837404.9	819590.1	294.1	-57.4	0	3	27
VS-TKW-8		TVL	75.0	837398.9	819579.6	303.0	-57.6	0	3	20
VS-TKW-9		SVL	70.0	837398.7	819585.9	296.8	-57.4	0	3	16
VS-TKW-22		SVL	85.0	837411.5	819582.8	302.9	-57.6	0	3	30
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	274.7	-56.8	0	3	14
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	284.0	-57.1	0	3	18
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	281.7	-57.0	0	3	18
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	283.1	-57.0	0	3	25
VS-TKW-28		SVL	75.0	837404.7	819617.1	267.9	-56.6	0	3	21
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	68.9	-44.8	0	3	39
VS-TKW-49		SVL	76.0	837394.9	819844.2	68.6	-44.7	0	3	34
VS-TKW-50		TVL	88.0	837400.7	819842.1	74.8	-45.5	0	3	46
VS-TKW-51		TVL	88.0	837399.2	819835.6	76.6	-45.7	0	3	45
VS-TKW-52		TVL	82.0	837407.8	819839.1	82.5	-46.3	0	3	39
VS-TKW-53		TVL	74.0	837404.6	819838.7	79.8	-46.0	0	3	31
VS-TKW-54		SVL	78.0	837407.3	819835.3	83.7	-46.5	0	3	35
VS-TKW-55		SVL	81.0	837407.3	819833.7	84.5	-46.5	0	3	37
VS-TKW-56		SVL	86.0	837407.4	819833.7	84.7	-46.6	0	3	42
VS-TKW-57		SVL	75.0	837406.3	819832.7	84.2	-46.5	0	3	31
VS-TKW-57A		SVL	84.0	837406.3	819832.5	84.3	-46.5	0	3	40
VS-TKW-58		SVL	84.0	837393.9	819839.2	70.2	-44.9	0	3	42
VS-TKW-59		TVL	78.0	837394.6	819840.5	70.1	-44.9	0	3	36
VS-TKW-60		TVL	79.0	837394.3	819841.3	69.5	-44.8	0	3	37
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	54.4	-42.7	0	3	36
VS-TKW-64		SVL	73.0	837403.8	819872.3	70.1	-44.9	0	3	31
VS-TKW-65		SVL	79.0	837393.3	819888.1	60.8	-43.7	0	3	38
VS-TKW-67		SVL	87.0	837397.3	819875.2	63.5	-44.1	0	3	46
VS-TKW-68		SVL	77.0	837387.1	819884.5	54.0	-42.7	0	3	37
VS-TKW-71		SVL	73.0	837404.0	819879.1	70.2	-44.9	0	3	31
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	283.1	-57.0	0	3	33
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	274.4	-56.8	0	3	33
									Total	**53**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Appendix 4.5

Extracted pages of Fixed Plant Noise Audit Report (Batch 1 – To Kwa Wan Station), pursuant to Condition 2.32 of the Environmental Permit (EP-438/2012/K)

AECOM

MTR Corporation Limited

Consultancy Agreement No. C11033

Shatin to Central Link - Tai Wai to Hung Hom Section [SCL(TAW – HUH)] and Stabling Sidings at Hung Hom Freight Yard [SCL(HHS)]

Fixed Plant Noise Audit Report (Batch 1 – To Kwa Wan Station (TKW))

March 2019

	Name	Signature
Prepared & Checked:	Isaac Chu	
Reviewed & Approved:	Josh Lam	

Version:	A	Date: 14 March 2019

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1 INTRODUCTION

1.1 Background

1.1.1 The Shatin to Central Link (SCL) is a 17km extension of the existing Ma On Shan Line (MOL) and East Rail Line (EAL) comprising (i) The East-West Corridor which extends the MOL from Tai Wai to Hung Hom via East Kowloon to connect with the West Rail Line (WRL) at Hung Hom Station (HUH) and Stabling Sidings at Hung Hom Freight Yard (HHS); and (ii) The North-South Corridor which is an extension of the EAL at Hung Hom across the harbour to Admiralty Station (ADM).

1.1.2 Environmental Impact Assessment (EIA) Reports for SCL – Tai Wai to Hung Hom Section [SCL (TAW-HUH)] (Register No. AEIAR-167/2012) and SCL Stabling Sidings at Hung Hom Freight Yard [SCL (HHS)] (Register No. AEIAR-164/2012) (hereinafter referred to as "the EIA Reports") were approved on 17 February 2012 under the Environmental Impact Assessment Ordinance (EIAO). Following the approval of the EIA Reports, the Environmental Permit (EP) (EP No: EP-438/2012), covering the construction of both SCL (TAW-HUH) and SCL (HHS) (hereinafter referred to as "the Project"), was granted on 22 March 2012. Variations of Environmental Permit (VEP) were subsequently applied for EP-438/2012 and the latest Environmental Permit (EP No: EP-438/2012/K) was issued by Director of Environmental Protection (DEP) on 4 October 2016.

1.1.3 Pursuant to EP Condition 2.32, at least one month before commencement of operation of the Project, the Permit Holder, MTR Corporation Ltd (MTR), shall carry out fixed plant noise audit and deposit with the Director four hardcopies and one electronic copy of an audit report showing the design of the fixed plant noise sources associated with the Project complies with the maximum sound power levels determined in the approved SCL(TAW-HUH) EIA Report (Register No. AEIAR-167/2012) and SCL(HHS) EIA Report (Register No. AEIAR-164/2012) and all relevant documents in the Register, or otherwise approved by the Director in compliance with the requirements in Technical Memorandum on Environmental Impact Assessment Process having due regard to the characteristics of tonality, impulsiveness and intermittency.

1.1.4 Since the installation of fixed plant along the SCL (TAW-HUH) and SCL (HHS) would be completed in stages, the fixed plant noise audit will be conducted in stages according to the testing and commissioning programmes in each area.

1.1.5 AECOM Asia Co. Ltd was commissioned by the MTR to prepare the fixed plant noise audit report to check the compliance of the maximum sound power levels (SWLs) and to undertake noise measurement at the representative Noise Sensitive Receivers (NSRs) for investigation of any characteristics of tonality, impulsiveness and intermittency from the fixed plant noise sources associated with the Project.

1.1.6 Based on the latest design information, the maximum allowable SWLs of fixed plant items has been updated to reflect the latest design of the Project, and therefore Proposals were prepared to present the updated maximum allowable sound power levels (SWLs) of the fixed plant items at different stations of the Project. The Proposal for Updating Maximum Allowable Sound Power Levels of Louvers (Batch 1 – To Kwa Wan Station (TKW)) (hereinafter referred to as "the Proposal (Batch 1 – TKW)") (**Appendix A** refers) was approved by DEP on 13 March 2019.

1.1.7 This Fixed Plant Noise Audit Report (Batch 1 – To Kwa Wan Station (TKW)) (hereinafter referred to as "the FPNAR (Batch 1 - TKW") presents the noise measurement methodology and measurement results at the fixed plant noise sources of TKW and at the representative NSRs near TKW, for checking compliance with the maximum allowable sound power levels (SWLs) determined in the Proposal (Batch 1 – TKW).

2 UPDATED SOUND POWER LEVELS OF FIXED PLANT NOISE SOURCES

2.1.1 The updated maximum allowable SWL of fixed plant noise sources at TKW are extracted from the Proposal (Batch 1 – TKW) and are summarised in **Table 2.1**. The updated fixed plant noise sources locations at TKW are shown in **Figure No. C1103/C/SCL/ACM/M52/041**. The measured noise level of fixed plant noise sources during the commissioning test shall comply with the maximum allowable SWLs as summarised in **Table 2.1**. Appropriate corrections in tonal, impulsive or intermittent characteristics should be applied, where applicable, in accordance with the IND-TM during the commissioning test conducted at the representative NSRs.

Table 2.1 Summary of Updated Maximum Allowable SWLs for Fixed Plant Noise Sources at TKW

Location	Fixed Plant ID. (1)	Fixed Plant Source	Maximum Allowable SWL, dB(A)	
			Daytime/Evening (2)	Night-time (2)
TKW	VS-TKW-1	Tunnel Ventilation Louver	87	77
	VS-TKW-2	Tunnel Ventilation Louver	90	80
	VS-TKW-3	Tunnel Ventilation Louver	87	77
	VS-TKW-4	Station Ventilation Louver	81	71
	VS-TKW-5	Station Ventilation Louver	85	75
	VS-TKW-6	Station Ventilation Louver	81	71
	VS-TKW-7	Tunnel Ventilation Louver	91	81
	VS-TKW-8	Tunnel Ventilation Louver	85	75
	VS-TKW-9	Station Ventilation Louver	80	70
	VS-TKW-22	Station Ventilation Louver	95	85
	VS-TKW-27-L	Station Ventilation Louver	78	68
	VS-TKW-27-R	Station Ventilation Louver	82	72
	VS-TKW-27A-L	Station Ventilation Louver	82	72
	VS-TKW-27A-R	Station Ventilation Louver	89	79
	VS-TKW-28	Station Ventilation Louver	85	75
	VS-TKW-48	Tunnel Ventilation Louver	87	81
	VS-TKW-49	Station Ventilation Louver	82	76
	VS-TKW-50	Tunnel Ventilation Louver	96	88
	VS-TKW-51	Tunnel Ventilation Louver	94	88
	VS-TKW-52	Tunnel Ventilation Louver	88	82
	VS-TKW-53	Tunnel Ventilation Louver	81	74
	VS-TKW-54	Station Ventilation Louver	84	78
	VS-TKW-55	Station Ventilation Louver	87	81
	VS-TKW-56	Station Ventilation Louver	92	86
	VS-TKW-57	Station Ventilation Louver	81	75
	VS-TKW-57A	Station Ventilation Louver	90	84
	VS-TKW-58	Station Ventilation Louver	90	84
	VS-TKW-59	Tunnel Ventilation Louver	84	78
	VS-TKW-60	Tunnel Ventilation Louver	85	79
	VS-TKW-61	Station Ventilation Louver	77	76
	VS-TKW-64	Station Ventilation Louver	79	73
	VS-TKW-65	Station Ventilation Louver	80	79
	VS-TKW-67	Station Ventilation Louver	88	87

Location	Fixed Plant ID. (1)	Fixed Plant Source	Maximum Allowable SWL, dB(A)	
			Daytime/Evening (2)	Night-time (2)
	VS-TKW-68	Station Ventilation Louver	79	77
	VS-TKW-71	Station Ventilation Louver	79	73
	CT-TKW-001	Cooling Tower	97	87
	CT-TKW-002	Cooling Tower	97	87

Notes:
(1) Ma Tau Wai Station as named in the EIA Reports have been recently renamed as To Kwa Wan Station (TKW). The fixed plant ID. are therefore updated from VS-MTW-XX to VS-TKW-XX to match with existing naming.
(2) Day: 0700 to 1900 hours, Evening: 1900 to 2300 hours, Night: 2300 to 0700 hours.

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LEGEND:

- REPRESENTATIVE NOISE SENSITIVE RECEIVERS (NSRs)
- ASSESSMENT POINT FOR FIXED PLANT NOISE CALCULATION
- APPROXIMATE NOISE SOURCE LOCATION (FACADE)
- APPROXIMATE NOISE SOURCE LOACTION (TOP)

TKW-12-3
TKW-12-4
TKW-12-10B
TKW-12-10A
TKW-12-5
TKW-17-1
TKW-18-1
VS-TKW-65
TKW-16-1
VS-TKW-61,
VS-TKW-68
VS-TKW-71
VS-TKW-67
VS-TKW-64
VS-TKW-28
VS-TKW-27-L
VS-TKW-27A-L
VS-TKW-27-R
VS-TKW-8
VS-TKW-1
VS-TKW-5
VS-TKW-4
VS-TKW-3
CT-TKW-002
CT-TKW-001
VS-TKW-27A-R
VS-TKW-7
VS-TKW-22
VS-TKW-2
VS-TKW-6,
VS-TKW-9
DETAIL '1'
TKW
KAU PUI LUNG ROAD
MAIDSTONE ROAD
KOWLOON CITY ROAD (Ground Level)
CHI KIANG STREET
ANHUI STREET
SZE CHUEN STREET
HA HEUNG ROAD
CHEUNG NING STREET
SHEUNG HEUNG ROAD
TAU WAI ROAD
CHUNG ROAD
HUNG KWONG STREET
WING YU STREET
MA HANG CHUNG ROAD
TO KWA WAN ROAD
819600 N
820000 N
820200 N
819800 N
819850 N
837200 E
837400 E
837600 E

DETAIL '1'
SCALE A3 1 : 500

0 7.5 15 22.5 30 37.5
METRES
1 : 1500 (A3)

REV	DESCRIPTION	BY	DATE	APPROVED

DRAWN	XH
DESIGNED	GL
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APPROVED	ST
DATE	09/JAN/2019

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MTR

SHATIN TO CENTRAL LINK

ORIGINATOR

AECOM

CADD REF. C11033_C_SCL_ACM_M52_041.dgn

TITLE
C11033
SCL (TAW-HUH)
LOCATIONS OF NSRs AND FIXED PLANT NOISE SOURCES AT TKW

SCALE 1 : 1500 (A3)

FIGURE NO. C11033/C/SCL/ACM/M52/041

REV. -

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EA (RtoC_8)

(Feb 2023)

3. ROAD TRAFFIC NOISE IMPACT ASSESSMENT

3.1 Introduction

3.1.1 In this assessment, potential road traffic noise impact arising from nearby existing and future roads on the proposed development of the Subject Site has been assessed by using modelling. Practicable environmental mitigation measures have been recommended, as required.

3.2 Assessment Criteria

3.2.1 Noise standards are recommended in the HKPSG for planning against noise impact from sources such as road traffic, railway and aircraft, etc.

3.2.2 The proposed development includes 5 residential towers in Northern Site and 2 residential blocks in Southern Site. The podia beneath the residential towers will be provided with centralized air condition and will not rely on opened window for ventilation, whilst the domestic dwellings will rely on opened window for ventilation. According to the guidelines, the maximum noise level from road traffic, measured in terms of L10 (1-hr) is recommended to be 70 dB(A) at typical facades of new dwellings.

3.3 Assessment Methodology and Assumptions

3.3.1 The methodology involved the prediction of future road traffic noise impacts on Noise Sensitive Receivers (NSRs) arising from traffic flows on existing and future road carriageways situated within 300m study area from the Subject Site.

3.3.2 The U.K. Department of Transport's procedure "Calculation of Road Traffic Noise" was used to predict the hourly L10 noise levels generated from road traffic at selected representative NSRs. The predicted noise levels are then compared with the relevant HKPSG noise standard (i.e. 70 dB(A)). Noise mitigation measures are recommended at situations when the predicted noise levels exceed the noise standard.

3.3.3 The tentative completion date of the development will be in Year 2033. Calculations of the predicted road traffic noise were based on the AM peak hour and PM peak hour traffic flows within a 15-year period (i.e. Year 2048) from the tentative completion date of the proposed development. The assessment year has been chosen to be Year 2048 because the traffic forecast for the Year 2048 is the maximum among the 15-year period. The projected traffic flows and vehicle composition of the road carriageways provided by the project traffic consultant are shown in **Appendix 3.1**. The endorsement from Transport Department will be provided once available.

3.4 Noise Sensitive Receivers (NSRs)

3.4.1 Representative NSRs were selected to represent the noise sensitive uses of the proposed development. Locations of the representative NSRs are shown in **Figures 3.1 to 3.2** for Northern Site and **Figure 3.3 to 3.4** for Southern Site respectively. The assessment points have been taken to be situated at 1.2m above floor slabs and at 1m away from the external façade of windows of the residential unit.

3.5 Incorporated Noise Mitigating Designs

3.5.1 In order to minimise the potential traffic noise impact, noise mitigating designs have been incorporated or considered when formulating the building layout. They are include:

- Building Setback and Orientation

  The residential towers have been set back from Ma Tau Wai Road as far as practicable in order to minimize the traffic noise impact to the domestic premises.

- Building Layout

  To ensure the remaining residential units would not have direct exposure to the major road traffic noise source, the façades of the residential towers have been orientated such that the respective openable windows of habitable rooms can be shielded by the projected façades of the other units of the towers against the more trafficked roads along the Southern Site boundary.

- Podium

  The residential towers are sitting above the podiums. Residential floors are elevated at 27.6mPD in Northern Site and Southern Site so as to increase the vertical buffer distance from the nearby more trafficked roads.

3.6 Assessment Results – Base Case Scenario

3.6.1 The predicted traffic noise levels of the NSRs for the Base Case Scenario (without proposed noise mitigation measures mentioned in section 3.7) with AM peak and PM peak traffic flows are shown in **Appendix 3.2**. The results are summarized in Table below.

3.6.2 By comparing with the predicted noise results of the Base Case Scenario with AM peak and PM peak traffic flows, it is concluded that the Base Case Scenario with AM peak traffic flow is the worst case scenario.

Scenario	**Total No. of Flats**	**No. of Flats Exceeding the Noise Criteria of 70 dB(A)**$_{(L10\ 1\text{-hour})}$	**Max Noise Levels, dB(A)**$_{(L10\ 1\text{-hour})}$	**Compliance Rate**
Base Case (AM peak)	2324	443	76	~81%
Base Case (PM peak)		369	76	~84%

3.7 Proposed Traffic Noise Mitigation Measures

3.7.1 In order to further minimise the potential traffic noise impact, at-receiver mitigation measures have been incorporated.

3.7.2 The recommended noise mitigation measures are listed as below in **Table 3.1** & **Table 3.2** and the locations are shown in **Figure 3.1** to **Figure 3.4**.

a. Acoustic Window (Baffle Type) and Enhanced Acoustic Balcony (Baffle Type)

3.7.3 The acoustic window (baffle type) (AW(BT)) and enhanced acoustic balcony (baffle type) (EAB(BT)) in the "*Practice Noise on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact*" (Practice Note) issued by EPD are proposed at the residential blocks. The location of the proposed AW(BT) and EAB(BT) can be referred to **Figures 3.1 to 3.4**. Extracts of the Practice Note can be referred to **Appendix 3.4**.

3.7.4 All of the sizes of room to be adopted with AW(BT) and EAB(BT) would be within +10% of the designated room size of 8m^2 and 14m^2 for AW(BT) and EAB(BT) in the Practice Note respectively. If the room size is smaller than -10% of 8m^2 and 14m^2 as compared

to the Reference Case, the sound attenuation will be deducted by a factor of 10 x log(R_{ref}/R_{design}), where R_{ref} and R_{design} are the area of the room of the Reference Case and the proposed development respectively. This methodology for adjusting the sound attenuation performance of an AW(BT) / EAB(BT) due to difference in room size has been widely adopted in numerous approved planning applications, e.g. A/TSW/63-1, A/TSW/70, A/K10/267 and A/K10/266.

3.7.5 Some of the AW(BT) facing Chi Kiang Street will be equipped with sound absorptive materials (SAM). The location of these windows have been indicated in **Figure 3.3**. As stated in the Practice Note, addition of SAM to the AW(BT) can offer an additional 1.5dB(A) reduction. On the other hand, none of the EAB(BT) will be equipped with SAM.

3.7.6 The sound attenuation performances of AW(BT) and EAB(BT) at each NSR after room size correction and addition of SAM, if applicable, can be referred to **Appendix 3.3**. Extracts of the Practice Note can be referred to **Appendix 3.4**.

b. Architectural Fin

3.7.7 1.0m and 1.5m long architectural fins are proposed to reduce the angle of view from the noise sensitive use to the nearby roads. Regarding the effectiveness provided by the fin, it is maximized to be not more than 3 dB(A) with reference to the EPD's website.

3.8 Assessment Results – Mitigated Scenario

3.8.1 Under mitigated scenario with AM peak traffic flow, the road traffic noise compliance rate for the proposed development is improved from 81% (base case scenario) to 94% (148 flats exceeding the noise criteria). **Appendix 3.2** shows the predicted noise results under mitigated scenario.

3.9 Schedule of Noise Mitigation Measures

3.9.1 The proposed mitigation measures for the traffic noise impact are summarized in **Table 3.1** for Northern Site and **Table 3.2** for Southern Site below.

Table 3.1 Proposed Mitigation Measures for Northern Site

Tower	Flat	NSR	Floor	Proposed Mitigation Measures
1	A	N1-01	1-35	AW(BT)
		N1-02	1-35	EAB(BT)
	B	N1-03	1-35	EAB(BT)
		N1-04	1-35	AW(BT)
		N1-05	1-35	AW(BT)
	H	N1-22	Full Height	1.5m long architectural fin
3	A	N3-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		N3-04	1-5	EAB(BT)
	B	N3-05	1-5	EAB(BT)
		N3-06	1-5	AW(BT)
	C	N3-07	1-5	AW(BT)
		N3-08	1-5	EAB(BT)
	D	N3-09	1-5	EAB(BT)
		N3-11	1-5 (up to 43.35mPD)	1.5m long architectural fin
4	A	N4-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		N4-03	1-4	EAB(BT)
	B	N4-04	1-4	AW(BT)
		N4-05	1-4	EAB(BT)
	C	N4-06	1-4	EAB(BT)
		N4-08	1-5 (up to 43.35mPD)	1.5m long architectural fin
5	E	N5-16	Full Height	1.0m long architectural fin

Note:

AW(BT) = Acoustic Window (Baffle Type) w/o SAM

EAB(BT) = Enhanced Acoustic Balcony (Baffle Type) w/o SAM

Table 3.2 Proposed Mitigation Measures for Southern Site

Block	Flat	NSR	Floor	Proposed Mitigation Measures
7	A	NAL-01	1-5 (up to 43.35mPD)	1.5m long architectural fin
		NAL-02	1-4	EAB(BT)
	B	NAL-03	1-4	EAB(BT)
		NAL-05	1-4	EAB(BT)
	C	NAL-06	1-4	EAB(BT)
		NAL-08	1-4	EAB(BT)
	D	NAL-10	1	EAB(BT)
			1-5 (up to 43.35mPD)	1.5m long architectural fin
	E	NAL-11	1-20	EAB(BT)
		NAH-11	21-35	EAB(BT)
		NAL-12	1-4	AW(BT) with SAM
			5-20	AW(BT)
		NAH-12	21-35	AW(BT)
		NAL-13	1-20	EAB(BT)
		NAH-13	21-35	EAB(BT)
	F	NAL-14	1-20	EAB(BT)
		NAH-14	21-35	EAB(BT)

		NAL-15	1-20	AW(BT)
		NAH-15	21-35	AW(BT)
	G	NAL-16	1-20	EAB(BT)
		NAH-16	21-35	EAB(BT)
		NAL-17	1-20	AW(BT)
		NAH-17	21-35	AW(BT)
		NAL-18	1-20	EAB(BT)
		NAH-18	21-35	EAB(BT)
	H	NAL-19	1-20	EAB(BT)
		NAH-19	21-35	EAB(BT)
		NAL-20	1-3	AW(BT) with SAM
			4-20	AW(BT)
		NAH-20	21-35	AW(BT)
		NAL-21	1-20	EAB(BT)
		NAH-21	21-35	EAB(BT)
	I	NAL-22	1-20	AW(BT)
		NAH-22	21-35	AW(BT)
		NAL-23	1-20	EAB(BT)
			Full Height	1.5m long architectural fin
		NAH-23	21-35	EAB(BT)
	J	NAL-25	Full Height	1.5m long architectural fin
		NAH-25	Full Height	1.5m long architectural fin
	N	NAL-34	Full Height	1.5m long architectural fin
		NAH-34	Full Height	1.5m long architectural fin
6	A	NB-01	1-4 (up to 40.2mPD)	1.5m long architectural fin
		NB-02	1-4	EAB(BT)
	B	NB-03	1-4	EAB(BT)
		NB-05	1-4	EAB(BT)
	C	NB-06	1-3	EAB(BT)
		NB-08	1-3	EAB(BT)
	D	NB-10	1	EAB(BT)
			1-4 (up to 40.2mPD)	1.5m long architectural fin
	E	NB-11	1-3 (up to 37.05mPD)	1.0m long architectural fin
	J	NB-24	Full Height	1.5m long architectural fin
	N	NB-34	Full Height	1.5m long architectural fin

Note:

AW(BT) = Acoustic Window (Baffle Type) w/o SAM

AW(BT) with SAM = Acoustic Window (Baffle Type) with SAM

EAB(BT) = Enhanced Acoustic Balcony (Baffle Type) w/o SAM

3.10 Design Constraints in the Proposed Layout

3.10.1 The current notional design has exhaustively explored all possible noise mitigation measures to minimize the traffic noise impact to the proposed development in order to achieve a 94% of noise compliance level. However, the design of layout has been restricted owing to various site constraints as stated in the following:

a. The Subject Site is a long and narrow rectangle shape and surrounded by local roads with adjacent existing buildings in close proximity which have limited the flexibility of the placement and orientation of towers within the site boundary. Furthermore, the proposed pedestrian avenue to improve connectivity and walkability and the building separations and 5m recommended setback (discussed in Section 2) to allow for better air ventilation provided within the site boundary have further reduced the flexibility of buildable area. Hence, potential to provide further building setback is limited by the site condition;

b. There is no window opening towards Ma Tau Wai Road directly due to compliance with the prescribed window requirement under the B(P)R, which affect orientation of towers (mainly Tower 1 & 5); and

c. Seven towers approach to accommodate more residential units to meet housing demand.

3.11 Conclusion

3.11.1 With the implementation of the proposed mitigation measures listed in Section 3.9, 94% of residential units comply with the road traffic noise standard (i.e. L_{10}(1-hr) 70 dB(A)).

3.11.2 For those residential units with residual noise impacts, based on the Appendix 4.4: Suitable Window Types for Noise of HKPSG, it is recommended to have openable well-gasketted window with 6mm pane as indirect mitigation measure. In this project, upgraded window/door will be provided for insulation as the last resort. The noise insulation of these upgraded window/door would be STC 31 as a minimum.

4.3.9 As advised by the management officer, the operation hours of the market is from 7am to 8pm.

5. Fixed plant noise sources of To Kwa Wan MTR Station

4.3.10 Tunnel ventilation louvers (TVL), station ventilation louvers (SVL) and cooling towers were identified at the Ventilation Shaft, To Kwa Wan MTR Station Exits A and D (refer to **Figure 4.2**). Their maximum allowable SWLs were adopted in this assessment with reference to the Fixed Plant Noise Audit Report (Batch 1 – To Kwa Wan Station), which is prepared pursuant to EP Condition 2.32 of the Environmental Permit (EP No: EP-438/2012/K). The relevant pages of the noise audit report are extracted in **Appendix 4.5**.

4.3.11 The operation hours of the noise sources are 24 hours.

4.4 Noise Sensitive Receivers

4.4.1 Three (3) representative NSRs N01, N02 and N03 are selected, which are located at the eastern part of the site boundary and nearest to the identified noise sources. **Figure 4.3** shows the location of the representative NSR.

4.5 Assessment Methodology

4.5.1 A façade correction of + 3dB(A) were assumed.

4.5.2 No tonality, impulsiveness and intermittency characteristics were identified during the on-site surveys. Therefore, no correction of tonality, impulsiveness and intermittency were applied in the calculations.

4.6 Assessment Result

4.6.1 The maximum predicted fixed noise levels during daytime/evening at the selected NSRs is 60dB(A), which comply with the noise standards (65dB(A) for ASR of B and 70dB(A) for ASR of C). During night-time period, the maximum predicted fixed noise levels at the selected NSRs is 53dB(A), which also comply with the noise standards (55dB(A) for ASR of B and 60dB(A) for ASR of C). Therefore, it is anticipated the remaining NSRs at the residential towers can comply with the noise standard. Detailed calculations are shown in **Appendix 4.4**.

4.7 Conclusion

4.7.1 The assessment results indicated that all the predicted noise level of NSRs from all identified fixed noise sources within 300m study area comply the criteria as stipulated in NCO. It is therefore anticipated that the proposed development will not be subject to adverse fixed noise impacts.

4.8 Fixed Noise Impact of the Proposed Development

4.8.1 The project is under preliminary planning stage, the information and design of the potential fixed noise sources in the proposed development is not available. However, in order to ensure the fixed noise generated by the Proposed Development would not cause excessive impact to neighbouring noise sensitive uses, potential noise sources from the Proposed Development (e.g. pump rooms, lift machine rooms, E&M rooms, refuse collection point, public latrine etc.) will be designed to meet the relevant noise criteria as stipulated in the HKPSG and NCO.

4.8.2 Provisions shall be made to control the noise sources by suitable silencers, acoustic louvers and enclosures, if necessary. As such, it is anticipated that the fixed noise impact on the surrounding NSRs due to the operation of the Proposed Development will not exceed the relevant noise standard of the HKPSG and NCO.

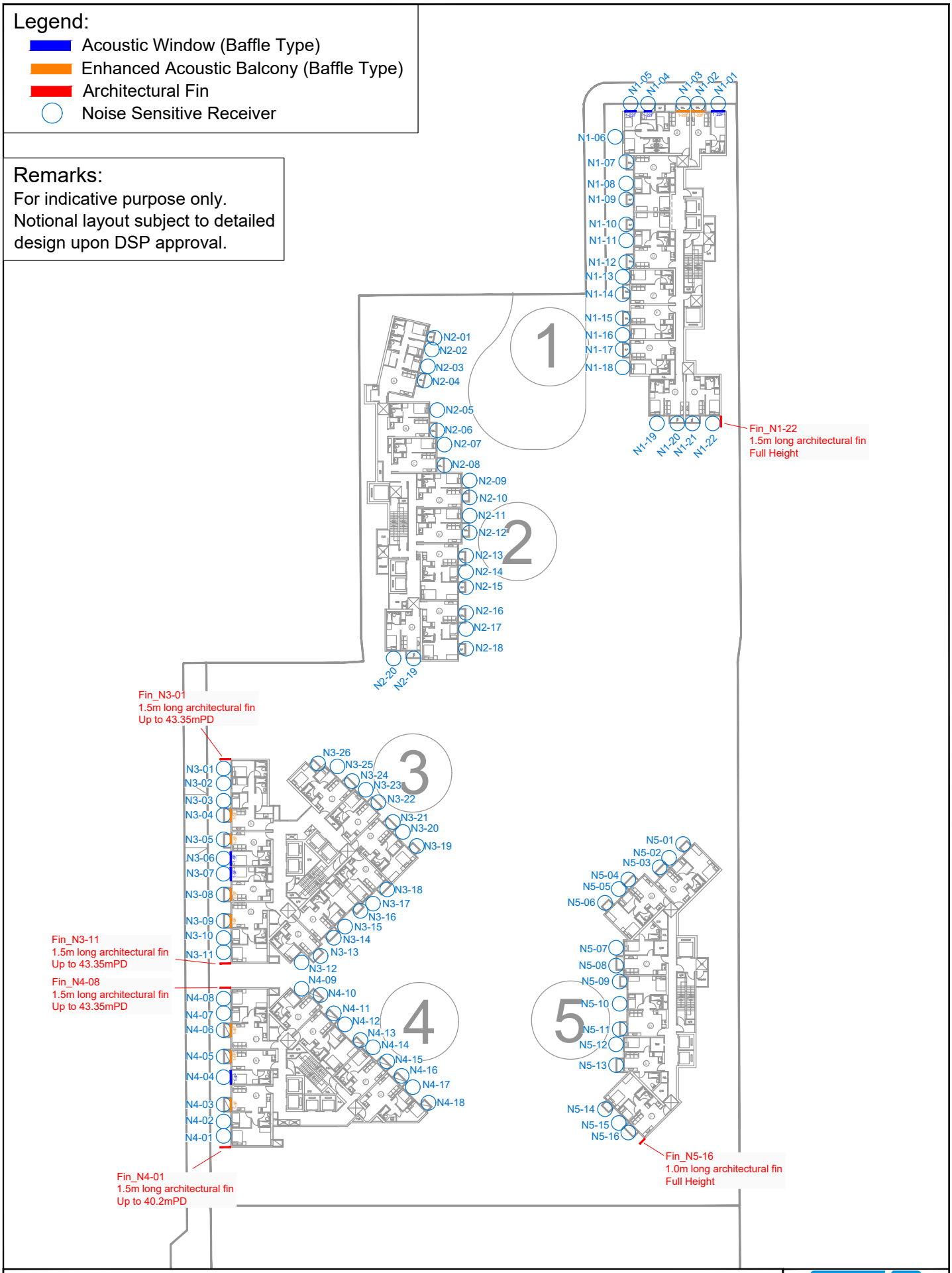

Figure: 3.1

Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Northern Site - Low Zone (1/F - 22/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	HC
Checked by:	TC
Rev.:	2.0
Date:	Dec 2022

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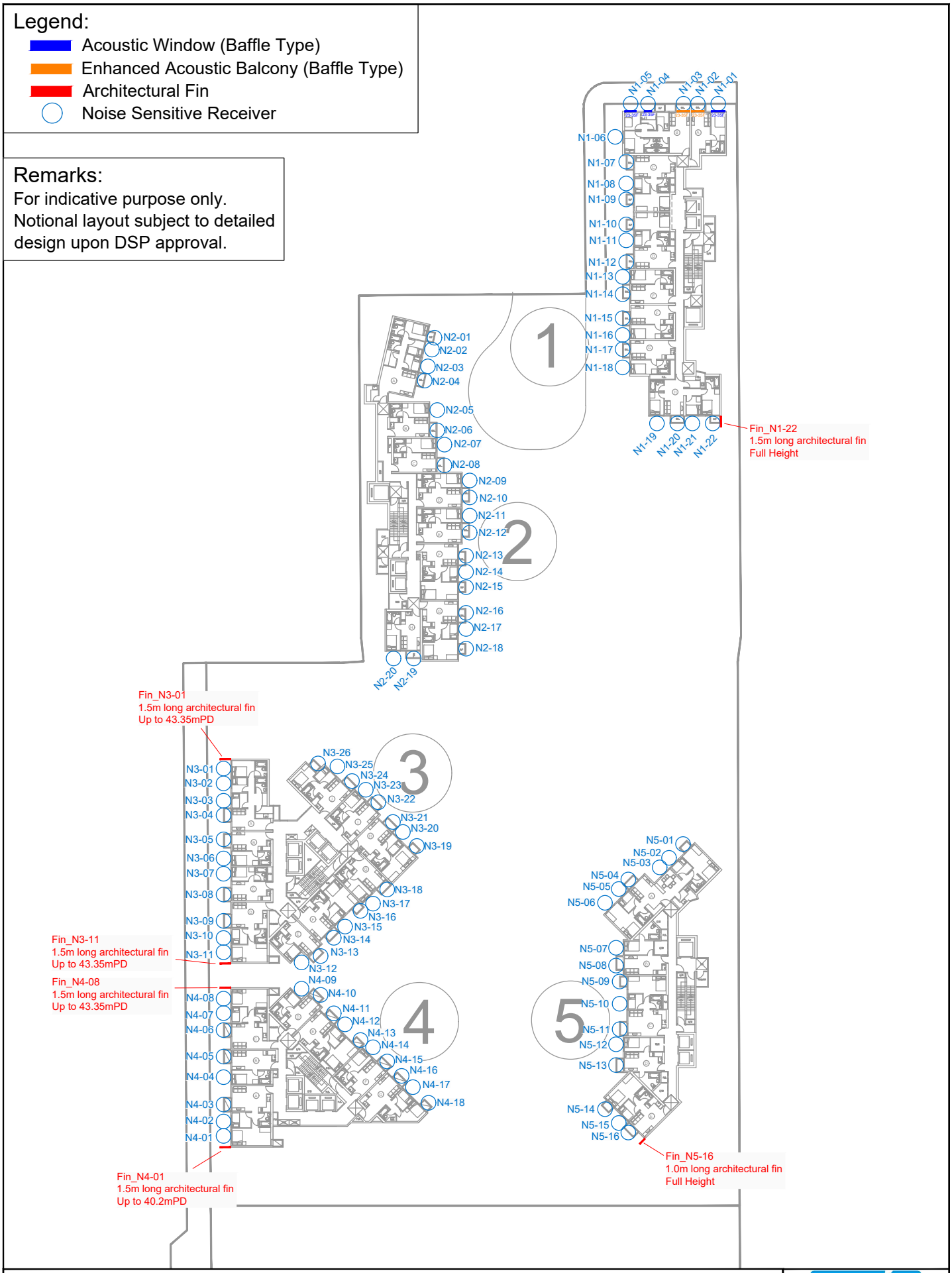


Figure: 3.2

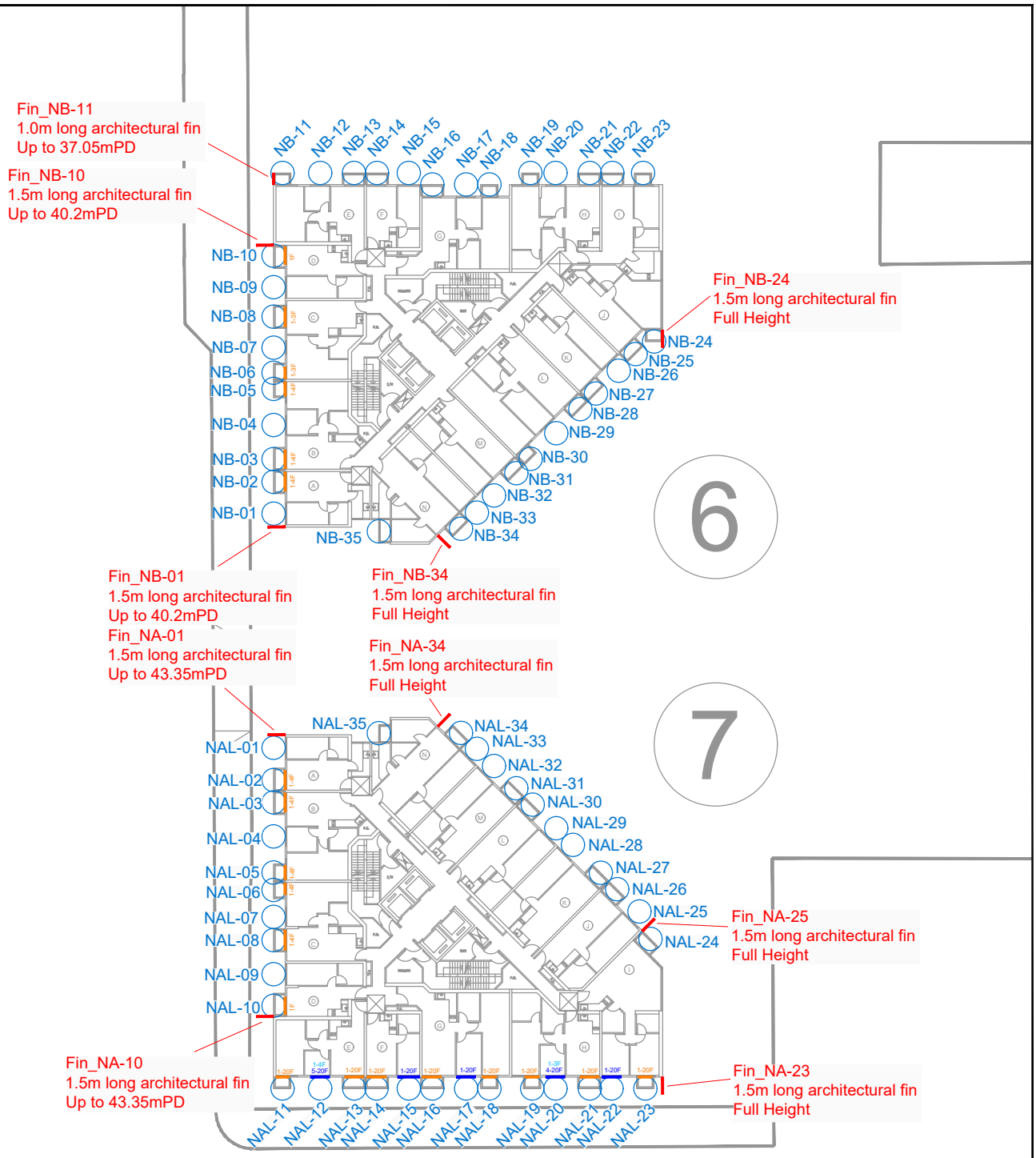
Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Northern Site - High Zone (23/F - 35/F)

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	HC
Checked by:	TC
Rev.:	2.0
Date:	Dec 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\02 Traffic\20221202\TNIA-20221202 (fig 3.1&3.2).dwg

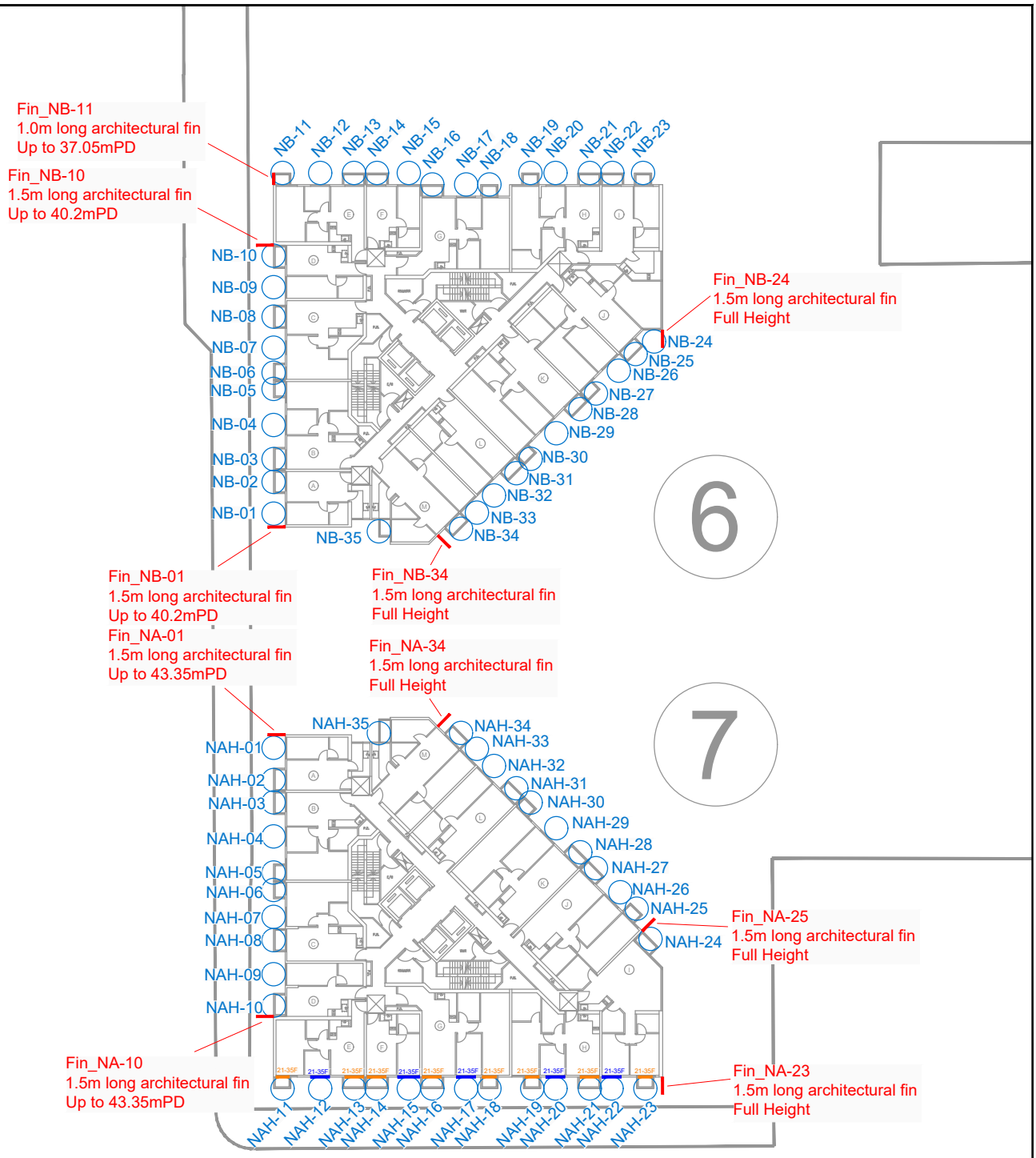


Remarks:
For indicative purpose only.
Notional layout subject to detailed design upon DSP approval.

Legend:
- Acoustic Window (Baffle Type)
- 1-5F Floors requiring SAM
- Enhanced Acoustic Balcony (Baffle Type)
- Architectural Fin
- Noise Sensitive Receiver

Figure: 3.3	RAMBOLL
Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Southern Site - Low Zone (1/F - 20/F)	Drawn by: HC Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Dec 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\02 Traffic\20221202\TNIA-20221202 (fig 3.1&3.2).dwg



Remarks:
For indicative purpose only.
Notional layout subject to detailed design upon DSP approval.

Legend:
- Acoustic Window (Baffle Type)
- Enhanced Acoustic Balcony (Baffle Type)
- Architectural Fin
- Noise Sensitive Receiver

Figure: 3.4	RAMBOLL
Title: Location of Noise Sensitive Receivers and Proposed Noise Mitigation Measures for Road Traffic Noise Impact Assessment for Southern Site - High Zone (21/F - 35/F)	Drawn by: HC Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Dec 2022

Q:\Projects\URACBS02EI00\05 Assessments\02 Noise\02 Traffic\20221202\TNIA-20221202 (fig 3.1&3.2).dwg

Appendix 3.2

Results of Road Traffic Noise Impact Assessment

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1a. AM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	72	72	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	73	73	72	73	73	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	64	64	63	63	63	51	48	48	49
4/F	37.05	73	73	73	73	72	69	66	67	66	66	65	65	65	64	64	63	63	63	51	49	49	49
5/F	40.2	73	73	73	72	72	69	66	66	66	66	65	65	64	64	64	63	63	63	52	50	50	50
6/F	43.35	73	73	73	72	72	68	66	66	66	65	65	64	64	64	63	63	63	63	52	51	51	52
7/F	46.5	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	63	53	52	53	54
8/F	49.65	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	55	54	55	56
9/F	52.8	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	57	57	58	60
10/F	55.95	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	62	63
11/F	59.1	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	63	63	64	65
12/F	62.25	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	64	64	64	65
13/F	65.4	73	73	73	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	64	64	65	66
14/F	68.55	73	73	72	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	64	64	65	66
15/F	71.7	73	73	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	65	65	65	67
16/F	74.85	73	72	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	65	65	66	67
17/F	78	73	72	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	65	66	66	68
18/F	81.15	73	72	72	72	72	66	64	65	65	64	64	64	64	64	63	63	63	63	66	66	67	69
19/F	84.3	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	66	67	68	71
20/F	87.45	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	69	71
21/F	90.6	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	70	72
22/F	93.75	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	69	70	72
Max. Noise Level		74	73	73	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	68	69	70	72
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		4	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	62	63	69	70	70	72
24/F	100.05	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	63	63	69	70	71	72
25/F	103.2	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
26/F	106.35	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	70	70	71	72
27/F	109.5	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	70	70	71	72
28/F	112.65	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	64	70	71	71	72
29/F	115.8	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	62	63	65	70	71	71	72
30/F	118.95	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	71	71	72
31/F	122.1	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	71	71	72
32/F	125.25	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	71	71	71	72
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	71	71	71	72
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	71	71	71	73
35/F	134.7	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	66	71	71	72	73
Max. Noise Level		73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	63	66	71	71	72	73
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	4	8	12	13
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		13			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	63
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	61	62	63
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	63
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
10/F	55.95	62	62	61	61	61	61	60	60	61	60	60	60	60	60	60	61	61	62	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	63	63	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	64	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	64	63	63	63	63	63	63	63	63	63	63	63	63	61	61
17/F	78	64	63	62	63	64	64	63	63	64	63	63	63	63	63	63	63	63	63	61	61
18/F	81.15	64	63	63	63	64	64	63	63	64	64	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	64	64	64	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
21/F	90.6	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	65	64	64	64	64	64	64	64	65	65	60	61
24/F	100.05	65	64	63	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	62
27/F	109.5	66	65	64	65	65	65	65	64	66	66	66	66	65	65	65	65	66	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	67	66	66	66	66	66	66	67	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	67	67	67	65	68	67	68	68	68	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	73	73	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	58	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	72	72	72	72	72	72	72	72	72	72	72	61	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	59	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	71	71	71	71	71	71	71	71	71	71	71	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	61	59	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	70	70	70	69	69	69	69	61	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	61	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	61	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	69	68	68	61	60	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	62	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	67	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	73	73	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		5	5	5	5	5	5	5	5	5	5	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	66	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	67	66	67	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	66	65	65	65	64	64	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	73	73	73	73	73	73	73	73	51	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	72	54	60	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	58	60	60	60	61	61	61	61	62	62
4/F	37.05	71	71	71	71	71	71	71	71	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	71	59	61	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	59	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	59	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	61	60	61	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	58	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	58	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	58	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	58	62	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	67	67	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		73	73	73	73	73	73	73	73	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		4	4	4	4	4	4	4	5	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		5			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	57	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	58	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	59	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	59	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	59	56	56	57	57	58	64	63	63
14/F	68.55	61	60	60	59	59	59	59	59	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	57	57	58	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	57	57	57	58	58	65	65	66
18/F	81.15	64	63	63	62	61	61	59	59	57	57	57	58	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	57	57	57	57	58	67	67	67
20/F	87.45	66	65	64	63	62	62	59	59	57	57	57	57	58	67	67	68
21/F	90.6	67	65	65	64	63	62	59	59	57	57	57	57	58	68	68	68
22/F	93.75	68	66	65	64	64	63	59	59	56	56	57	57	58	68	68	68
Max. Noise Level		68	66	65	64	64	63	59	59	57	57	57	58	58	68	68	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	59	56	56	57	57	58	68	69	69
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	58	68	69	69
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	69	69	70
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	69	69	70
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	69	69	70
28/F	112.65	69	67	67	67	66	66	59	58	56	56	57	57	57	69	70	70
29/F	115.8	69	67	67	67	66	66	59	58	56	56	56	57	57	69	70	70
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	69	70	71
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	69	70	71
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	70	70	71
35/F	134.7	69	67	67	67	67	66	59	58	56	56	57	57	57	70	70	71
Max. Noise Level		69	67	67	67	67	66	59	59	56	56	57	57	58	70	70	71
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6
No. of Flats with Noise Exceedance		0						0		0			0		6		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	126
Total no. of Flat =	1374
%Compliance =	91%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	73	72	72	72	73	73	76	75	75	76	76	76	76	76	76	76	76	76	76	65	63	59	58	57	56	56	56	56	56	56	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	75	75	76	76	76	76	66	65	63	61	60	59	58	58	58	58	58	60
3/F	33.9	71	71	71	71	72	71	71	71	72	72	75	75	75	75	75	75	75	75	75	75	75	75	75	67	67	64	63	62	62	61	60	60	60	60	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	75	74	74	74	75	75	75	75	75	75	75	75	75	68	67	66	65	64	63	63	63	62	62	62	65
5/F	40.2	71	71	71	71	71	70	71	71	71	71	74	74	74	74	74	74	74	74	74	75	75	75	75	68	68	67	66	65	65	64	64	64	64	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	74	74	74	74	74	74	74	74	74	75	75	75	69	68	67	67	66	66	65	65	65	65	65	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	74	73	74	74	74	74	74	74	74	74	74	74	74	69	68	68	67	67	66	66	66	66	66	66	65
8/F	49.65	69	69	69	69	70	69	69	69	70	70	73	73	73	73	74	73	74	74	74	74	74	74	74	69	69	68	67	67	67	67	66	66	66	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	74	74	74	74	74	74	69	69	68	68	67	67	67	67	67	67	67	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	74	74	74	74	69	69	68	68	68	67	67	67	67	67	67	64
11/F	59.1	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	74	74	74	69	69	68	68	68	68	68	68	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	69	73	73	73	73	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
15/F	71.7	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	69	68	68	68	68	68	68	68	69	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	69	69	69	69	68	68	68	68	68	69	69	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	73	69	69	69	69	69	69	69	69	69	69	69	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	73	73	70	69	69	69	69	69	69	69	69	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	73	73	73	73	73	73	70	70	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	72	72	72	73	72	72	72	73	73	76	75	75	76	76	76	76	76	76	76	76	76	76	70	70	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		5	5	5	5	5	4	5	5	5	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5		5			5			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	70	70	70	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	71	71	70	70	70	70	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	72	72	72	72	72	72	73	73	73	73	73	73	73	71	71	71	70	70	70	70	70	70	69	70	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	73	71	71	71	71	70	70	70	70	70	70	70	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	73	71	71	71	71	71	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	73	72	72	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	73	73	72	72	71	71	71	71	71	71	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	73	73	73	73	73	74	72	72	72	71	71	71	71	71	71	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	74	72	72	72	71	71	71	71	71	71	71	71	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	73	73	73	74	72	72	72	72	71	71	71	71	71	71	71	71	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	73	73	73	73	74	73	72	72	72	72	71	71	71	71	71	71	71	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	72	73	73	73	73	74	73	73	73	72	72	72	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	72	72	73	73	73	73	74	73	73	73	72	72	72	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	73	73	73	73	74	73	73	73	72	72	72	72	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	73	73	73	73	74	73	73	73	72	72	72	72	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	73	73	73	73	73	73	74	73	73	72	72	72	72	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	14	13	12	11	10	9	9	8	7	6	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		14		11			9			7		
No. of Flats		15		15			15			15		15			15		15			15			15		15		15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	65	65	66	66	66	67	67	63	62	60	59	58	57	57	57	57	57	57	56
2/F	30.75	72	72	72	72	72	72	72	72	72	72	71	69	68	68	67	66	66	66	66	67	67	67	67	65	64	63	62	61	60	60	59	59	59	59	61
3/F	33.9	71	71	71	71	71	71	71	71	71	71	71	69	68	68	67	66	66	66	66	67	67	67	67	66	66	65	64	64	63	62	62	62	61	61	65
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	69	68	68	67	66	66	66	66	67	67	67	67	67	67	66	66	66	65	65	65	64	64	64	65
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	68	67	67	66	66	66	66	67	66	67	67	67	67	67	67	67	66	66	66	66	66	66	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	67	66	66	66	66	66	67	66	67	68	68	68	68	67	67	67	67	67	67	67	65
7/F	46.5	70	70	70	69	69	69	69	69	69	69	69	68	67	67	67	66	66	66	66	67	67	67	67	68	68	68	68	68	68	68	68	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	66	66	66	67	67	67	67	69	69	69	69	68	68	68	68	68	68	68	65
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	66	65	66	67	67	67	67	69	69	69	69	69	69	69	69	68	68	68	64
10/F	55.95	69	69	69	69	69	68	69	69	69	69	68	67	67	66	66	66	66	65	66	67	67	67	68	69	69	69	69	69	69	69	69	69	69	69	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	67	66	66	66	65	65	66	67	67	67	68	70	70	70	70	69	69	69	69	69	69	69	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	66	65	65	66	67	67	67	68	70	70	70	70	70	70	70	69	69	69	69	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	66	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	69	69	69	64
14/F	68.55	68	68	68	68	68	67	68	67	68	67	68	67	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	70	70	70	70	70	70	70	70	70	70	70	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	71	70	70	70	70	70	70	70	70	70	70	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	71	71	71	70	70	70	70	70	70	70	70	63
19/F	84.3	67	66	67	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	70	70	70	70	70	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	71	69	68	68	67	66	66	66	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0	0	0	4	3	3	2	2	2	1	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			4		3			0		0			0			0		4		3		2			0			0	
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	72	71	71	71	71	71	71	71	71	70	70	62
26/F	106.35	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	68	68	70	72	71	71	71	71	71	71	71	71	70	70	62
27/F	109.5	66	66	66	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	67	67	68	68	70	72	72	71	71	71	71	71	71	71	71	71	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	72	72	72	71	71	71	71	71	71	71	71	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	72	72	72	72	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	72	72	72	72	72	71	71	71	71	71	71	62
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	68	68	69	70	72	72	72	72	72	72	71	71	71	71	71	62
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	71	71	71	71	71	62
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	72	72	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	14	11	9	9	0
No. of Flats with Noise Exceedance		0		0			0			0		0			0		0			0			0		15				15			14			9	
No. of Flats		15		15			15			15		15			15		15			15			15		15				15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	317
Total no. of Flat =	950
%Compliance =	67%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	443
Total no. of Flat =	2324
%Compliance =	81%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

1b. PM Peak - Unmitigated Scenario

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	72	72	72	72	72	69	66	67	66	65	65	64	64	64	63	63	63	62	49	47	47	48
2/F	30.75	72	72	72	72	72	69	66	66	66	65	65	64	64	63	63	63	62	62	50	48	48	48
3/F	33.9	72	72	72	72	72	68	65	66	66	65	65	64	64	63	63	63	62	62	50	48	48	48
4/F	37.05	72	72	72	72	72	68	65	66	65	65	64	64	64	63	63	62	62	62	51	48	48	49
5/F	40.2	72	72	72	72	72	68	65	66	65	65	64	64	63	63	63	62	62	62	51	49	49	50
6/F	43.35	72	72	72	72	72	67	65	65	65	64	64	64	63	63	63	62	62	62	52	50	50	51
7/F	46.5	73	72	72	72	72	67	65	65	65	64	64	64	63	63	62	62	62	62	53	52	52	53
8/F	49.65	73	72	72	72	71	67	64	65	65	64	64	64	63	63	62	62	62	62	54	54	54	55
9/F	52.8	73	72	72	72	71	67	64	65	65	64	64	64	63	63	63	62	62	62	57	57	58	59
10/F	55.95	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	60	61	62	63
11/F	59.1	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	63	63	63	64
12/F	62.25	73	72	72	72	71	66	64	65	65	64	64	64	63	63	63	62	62	62	64	64	64	65
13/F	65.4	73	72	72	71	71	66	64	65	65	64	64	64	63	63	63	62	62	62	64	64	64	65
14/F	68.55	73	72	72	71	71	66	64	65	64	64	64	63	63	63	63	62	62	62	64	64	64	65
15/F	71.7	73	72	72	71	71	66	63	64	64	64	64	63	63	63	63	62	62	62	64	64	65	66
16/F	74.85	73	72	72	71	71	66	63	64	64	64	64	63	63	63	63	62	62	62	65	65	65	67
17/F	78	73	72	71	71	71	65	63	64	64	64	64	63	63	63	63	62	62	62	65	65	66	67
18/F	81.15	73	72	71	71	71	65	63	64	64	64	64	63	63	63	62	62	62	62	65	66	66	68
19/F	84.3	73	71	71	71	71	65	63	64	64	64	63	63	63	63	62	62	62	62	66	66	67	69
20/F	87.45	73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	62	62	66	67	68	70
21/F	90.6	73	71	71	71	71	65	63	64	64	63	63	63	63	63	62	62	62	62	67	68	69	70
22/F	93.75	73	71	71	71	71	65	63	63	63	63	63	63	63	63	62	62	62	62	67	68	69	70
Max. Noise Level		73	72	72	72	72	69	66	67	66	65	65	64	64	64	63	63	63	62	67	68	69	70
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	70
24/F	100.05	72	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	62	63	68	69	69	71
25/F	103.2	72	71	71	71	71	65	62	63	63	63	63	63	63	62	62	62	62	63	69	69	69	71
26/F	106.35	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	63	69	69	70	71
27/F	109.5	72	71	71	71	70	64	62	63	63	63	63	63	63	62	62	62	62	63	69	69	70	71
28/F	112.65	72	71	71	70	70	64	62	63	63	63	63	63	63	62	62	62	62	64	69	69	70	71
29/F	115.8	72	71	71	70	70	64	62	63	63	63	63	63	62	62	62	62	62	64	69	70	70	71
30/F	118.95	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	69	70	70	71
31/F	122.1	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	69	70	70	71
32/F	125.25	72	71	71	70	70	64	62	63	63	63	63	62	62	62	62	62	62	64	70	70	70	71
33/F	128.4	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	62	64	70	70	70	71
34/F	131.55	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	62	65	70	70	70	71
35/F	134.7	72	71	71	70	70	64	62	63	63	63	62	62	62	62	62	62	63	65	70	70	70	71
Max. Noise Level		73	71	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	71
No. of Noise Exceedance		13	13	13	5	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		12			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	61	61	60	60	60	59	59	59	60	60	59	59	59	59	58	59	60	59	62	63
2/F	30.75	61	60	60	60	60	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
3/F	33.9	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
4/F	37.05	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
5/F	40.2	61	60	60	59	59	59	59	59	60	60	59	59	59	59	59	60	60	60	62	62
6/F	43.35	61	60	60	59	59	59	59	58	60	60	59	59	59	59	59	60	60	60	62	62
7/F	46.5	61	60	60	59	59	59	59	58	60	59	59	59	59	59	59	60	60	61	61	62
8/F	49.65	61	60	60	59	59	59	59	58	60	60	59	59	59	59	59	60	60	61	61	62
9/F	52.8	61	60	60	59	60	59	59	59	60	59	59	59	59	59	59	60	60	61	61	62
10/F	55.95	61	61	60	60	60	60	59	59	60	60	59	59	59	59	59	60	60	61	61	62
11/F	59.1	61	61	60	60	60	60	60	59	60	60	60	60	59	59	59	60	61	61	61	62
12/F	62.25	61	61	61	60	61	61	60	60	61	61	61	60	60	60	60	61	61	62	61	62
13/F	65.4	62	61	61	61	62	62	62	61	62	62	62	61	61	61	61	62	62	62	61	61
14/F	68.55	62	61	61	61	62	63	62	62	63	62	62	62	62	62	62	62	62	62	61	61
15/F	71.7	62	61	61	62	63	63	63	62	63	63	62	62	62	62	62	62	62	63	61	61
16/F	74.85	62	62	61	62	63	63	63	62	63	63	62	62	62	62	62	62	62	63	60	61
17/F	78	62	62	61	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	60	61
18/F	81.15	63	62	62	62	63	63	63	62	63	63	63	63	62	62	62	63	63	63	60	61
19/F	84.3	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
20/F	87.45	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
21/F	90.6	63	62	62	62	63	63	63	63	63	63	63	63	63	63	63	63	63	64	60	61
22/F	93.75	63	62	62	62	63	63	63	63	64	64	64	64	63	63	63	63	64	64	60	61
Max. Noise Level		63	62	62	62	63	63	63	63	64	64	64	64	63	63	63	63	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	62	62	63	63	64	63	63	64	64	64	64	64	64	64	64	64	64	60	61
24/F	100.05	64	63	62	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
25/F	103.2	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
26/F	106.35	64	63	63	63	64	64	64	63	65	64	65	65	64	64	64	64	64	65	60	61
27/F	109.5	64	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
28/F	112.65	65	64	63	64	65	65	64	63	65	65	65	65	65	65	65	65	65	65	60	62
29/F	115.8	65	64	64	64	65	65	65	63	65	65	65	65	65	65	65	65	65	65	61	62
30/F	118.95	65	64	64	64	65	65	65	63	65	65	66	66	65	65	65	65	65	66	61	62
31/F	122.1	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
32/F	125.25	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
33/F	128.4	65	64	64	64	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	63
34/F	131.55	65	65	64	65	66	66	66	64	66	66	67	67	67	66	67	67	67	67	61	63
35/F	134.7	66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
Max. Noise Level		66	65	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	73	73	73	73	73	73	73	73	73	72	73	56	55	49	47	47	47	47	50	50	51	56	58	58	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	58	57	51	49	47	47	47	52	53	53	56	58	59	63	64
3/F	33.9	72	72	72	72	71	72	72	71	71	71	71	60	57	53	50	47	47	48	53	53	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	54	50	48	48	48	54	54	55	57	58	59	63	64
5/F	40.2	71	71	71	71	71	71	71	70	70	70	70	61	58	54	51	48	49	49	55	55	56	58	59	60	63	64
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	54	51	49	49	50	56	56	57	59	60	61	63	64
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	54	51	50	50	51	56	57	58	60	60	61	63	64
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	60	58	54	52	50	51	51	57	58	58	60	61	61	63	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	58	55	52	51	51	52	58	58	59	60	61	61	63	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	60	61	61	63	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	60	59	56	55	54	54	54	58	59	59	60	61	61	63	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	60	59	57	56	56	55	55	59	59	59	60	61	61	63	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	59	58	57	57	57	57	59	60	60	61	61	62	63	63
14/F	68.55	68	68	68	68	68	68	68	68	68	67	68	61	60	58	58	58	57	57	60	60	60	61	61	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	61	60	59	58	58	58	58	60	60	60	61	61	62	63	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	61	60	59	59	58	58	58	60	61	60	61	61	62	63	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	61	61	59	59	59	59	59	60	61	60	61	61	62	63	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	61	60	59	59	59	59	60	61	61	61	61	62	63	63
19/F	84.3	67	67	67	67	67	67	67	66	66	66	66	62	61	60	60	60	60	60	61	61	61	61	62	62	63	63
20/F	87.45	66	66	66	66	66	66	66	66	66	66	66	62	62	61	60	60	60	60	61	61	61	61	62	62	63	63
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	62	62	61	61	61	61	61	61	62	61	62	62	62	63	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	63	63	62	62	62	62	62	62	62	61	62	62	62	63	63
Max. Noise Level		73	73	73	73	73	73	73	73	73	72	73	63	63	62	62	62	62	62	62	62	61	62	62	62	63	64
No. of Noise Exceedance		5	5	5	5	5	5	5	4	4	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	63	63	63	63	62	62	62	62	62	61	62	62	62	63	63
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	63	64	63	63	63	63	63	63	62	62	62	62	62	63	63
25/F	103.2	66	66	66	66	66	66	66	66	66	65	66	64	64	64	64	63	63	63	63	63	62	62	62	62	63	63
26/F	106.35	65	65	65	65	65	65	65	65	65	65	65	64	64	64	64	64	64	64	63	63	62	62	62	62	63	63
27/F	109.5	65	65	65	65	65	65	65	65	65	65	65	64	65	64	64	64	64	64	63	63	62	62	62	62	63	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	64	64	64	64	63	62	63	63	63	63	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	64	64	63	63	63	63	63	63	63
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	64	64	63	63	63	63	63	63
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	63	63	63	64	63
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	64	65	65	65	65	65	65	65	64	63	64	63	63	64	63
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	64	65	65	66	65	66	65	65	64	64	64	63	63	64	63
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	63
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	63
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	66	66	66	66	66	66	66	65	64	64	64	64	64	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	72	72	72	72	72	72	50	57	58	59	59	60	60	60	61	61
2/F	30.75	72	72	72	72	72	72	72	72	54	59	59	60	60	60	60	61	61	61
3/F	33.9	71	71	71	71	71	71	71	71	58	59	59	60	60	60	60	61	61	61
4/F	37.05	71	71	71	71	71	71	71	71	59	60	59	60	60	60	60	61	61	61
5/F	40.2	70	70	70	70	70	70	70	70	59	60	59	60	60	60	60	61	61	61
6/F	43.35	70	70	70	70	70	70	70	70	59	60	59	60	60	60	60	61	61	61
7/F	46.5	69	69	69	69	69	69	69	69	59	60	59	60	60	60	60	61	61	61
8/F	49.65	69	69	69	69	69	69	69	69	59	60	59	60	60	60	60	61	61	61
9/F	52.8	69	69	69	69	69	69	69	69	58	60	59	60	60	60	60	61	61	61
10/F	55.95	68	68	68	68	68	68	68	68	58	60	59	60	60	60	61	61	61	62
11/F	59.1	68	68	68	68	68	68	68	68	58	60	60	60	60	61	61	61	62	62
12/F	62.25	68	68	68	68	68	68	68	68	58	60	60	60	61	61	61	62	62	62
13/F	65.4	68	68	68	68	68	68	68	68	57	61	60	61	61	61	62	62	62	63
14/F	68.55	67	67	67	67	67	67	67	67	57	61	61	61	61	62	62	62	63	63
15/F	71.7	67	67	67	67	67	67	67	67	57	61	61	61	62	62	62	63	63	63
16/F	74.85	67	67	67	67	67	67	67	67	57	61	61	62	62	62	62	63	63	63
17/F	78	67	67	67	67	67	67	67	67	57	62	62	62	62	62	63	63	63	64
18/F	81.15	67	67	66	66	67	66	66	67	57	62	62	62	62	63	63	63	64	64
19/F	84.3	66	66	66	66	66	66	66	66	57	62	62	62	63	63	63	64	64	65
20/F	87.45	66	66	66	66	66	66	66	66	57	62	62	63	63	63	64	64	64	65
21/F	90.6	66	66	66	66	66	66	66	66	57	63	63	63	63	64	64	64	65	66
22/F	93.75	66	66	66	66	66	66	66	66	58	63	63	63	64	64	64	65	65	66
Max. Noise Level		72	72	72	72	72	72	72	72	59	63	63	63	64	64	64	65	65	66
No. of Noise Exceedance		4	4	4	4	4	4	4	4	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	63	63	63	64	64	65	65	66	66
24/F	100.05	66	66	65	65	65	65	65	66	58	64	64	64	64	65	65	66	66	66
25/F	103.2	65	65	65	65	65	65	65	65	58	64	64	64	64	65	65	66	66	67
26/F	106.35	65	65	65	65	65	65	65	65	59	64	64	64	64	65	65	66	66	67
27/F	109.5	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
28/F	112.65	65	65	65	65	65	65	65	65	59	64	64	64	65	65	65	66	66	67
29/F	115.8	65	65	65	65	65	65	65	65	59	64	64	65	65	65	66	66	66	67
30/F	118.95	65	65	65	65	65	65	65	65	60	65	64	65	65	65	66	66	67	67
31/F	122.1	65	65	65	65	65	65	65	65	60	65	65	65	65	65	66	66	67	68
32/F	125.25	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	66	67	68
33/F	128.4	65	65	65	65	65	65	65	65	60	65	65	65	65	66	66	67	67	68
34/F	131.55	65	65	65	65	65	65	65	65	61	65	65	65	65	66	66	67	67	68
35/F	134.7	65	65	64	64	64	64	64	64	61	65	65	65	66	66	67	67	68	68
Max. Noise Level		66	66	66	66	66	66	66	66	61	65	65	65	66	66	67	67	68	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	55	55	55	56	56	56	57	56	50	49	51	52	53	61	61	61
2/F	30.75	56	56	56	56	56	56	57	56	51	50	51	52	54	61	61	61
3/F	33.9	56	56	56	56	56	56	58	57	52	52	53	54	54	61	61	61
4/F	37.05	56	56	56	56	56	56	58	58	54	54	55	55	56	61	61	61
5/F	40.2	56	56	56	57	56	57	59	58	55	55	56	56	56	61	61	61
6/F	43.35	56	56	56	57	57	57	59	58	56	56	56	56	56	61	61	61
7/F	46.5	57	56	56	57	57	57	59	58	56	56	56	56	57	61	61	61
8/F	49.65	57	57	56	57	57	57	59	58	56	56	56	57	57	61	61	61
9/F	52.8	57	57	57	57	57	57	59	58	56	56	56	57	57	62	62	62
10/F	55.95	57	57	57	57	57	57	59	58	56	56	56	57	57	62	62	62
11/F	59.1	58	57	57	57	57	57	59	58	56	56	57	57	57	62	62	62
12/F	62.25	58	58	57	58	57	57	59	58	56	56	57	57	57	63	63	63
13/F	65.4	59	59	58	58	58	57	59	58	56	56	57	57	57	63	63	63
14/F	68.55	60	59	59	59	58	58	59	58	56	56	57	57	57	63	63	63
15/F	71.7	61	60	60	59	59	58	59	58	56	56	57	57	57	64	64	64
16/F	74.85	62	61	60	60	59	59	59	58	56	56	57	57	57	64	64	64
17/F	78	62	61	61	60	60	59	59	58	56	56	57	57	57	65	65	65
18/F	81.15	63	62	62	61	60	60	59	58	56	56	57	57	57	65	66	66
19/F	84.3	64	63	62	61	61	60	59	58	56	56	57	57	57	66	66	66
20/F	87.45	65	64	63	62	61	61	59	58	56	56	57	57	57	66	67	67
21/F	90.6	66	64	64	62	62	61	59	58	56	56	57	57	57	67	67	67
22/F	93.75	66	65	64	63	62	62	59	58	56	56	57	57	57	67	67	68
Max. Noise Level		66	65	64	63	62	62	59	58	56	56	57	57	57	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	67	65	65	64	63	62	59	58	56	56	57	57	57	67	68	68
24/F	100.05	67	66	65	64	63	63	59	58	56	56	57	57	57	68	68	69
25/F	103.2	67	66	65	65	64	63	59	58	56	56	57	57	57	68	68	69
26/F	106.35	68	66	65	65	65	64	58	58	56	56	56	57	57	68	69	69
27/F	109.5	68	66	65	65	65	64	58	58	56	56	56	57	57	68	69	69
28/F	112.65	68	66	65	66	65	64	58	58	56	56	56	57	57	68	69	70
29/F	115.8	68	66	65	66	65	64	58	58	56	56	56	57	57	69	69	70
30/F	118.95	68	66	65	66	65	65	58	58	56	56	56	57	57	69	69	70
31/F	122.1	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
32/F	125.25	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
33/F	128.4	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
34/F	131.55	68	66	65	66	65	65	58	58	56	56	56	56	57	69	69	70
35/F	134.7	68	66	66	66	65	65	58	58	56	56	57	57	57	69	69	70
Max. Noise Level		68	66	66	66	65	65	59	58	56	56	57	57	57	69	69	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	113
Total no. of Flat =	1374
%Compliance =	92%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	73	76	75	75	75	75	75	75	76	76	76	76	76	76	65	63	59	57	56	56	56	55	55	55	55	55
2/F	30.75	72	72	72	72	72	72	72	72	72	72	75	75	75	75	75	75	75	75	75	75	75	76	76	66	65	62	61	59	58	58	57	57	57	57	60
3/F	33.9	71	71	71	71	71	71	71	71	71	72	75	74	74	74	74	75	75	75	75	75	75	75	75	67	66	64	63	61	61	60	60	59	59	59	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	74	74	74	74	74	74	74	74	75	75	75	75	75	68	67	65	64	63	63	62	62	61	61	62	65
5/F	40.2	70	70	70	70	70	70	70	70	70	71	74	74	74	74	74	74	74	74	74	74	75	75	75	68	68	66	65	65	64	64	63	63	63	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	74	73	73	74	74	74	74	74	74	74	74	74	74	68	68	67	66	65	65	65	65	64	65	65	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	73	73	73	73	73	74	74	74	74	74	74	74	74	68	68	67	67	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	74	74	74	74	74	68	68	67	67	66	66	66	66	66	66	66	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	74	74	74	69	68	68	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	74	69	68	68	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	68	68	69	73	72	73	73	73	73	73	73	73	73	73	73	73	69	68	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	72	72	72	72	73	73	73	73	73	73	73	73	73	69	68	68	68	68	67	67	67	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	73	69	68	68	68	68	68	68	68	67	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	72	72	73	73	73	73	73	73	68	68	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	72	72	73	73	73	73	73	69	68	68	68	68	68	68	68	68	68	68	62
16/F	74.85	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	73	73	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	73	73	69	69	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	71	71	72	72	72	72	72	72	72	72	72	73	73	69	69	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	71	71	71	71	72	72	72	72	72	72	72	73	73	69	69	68	68	68	68	68	68	68	68	68	62
20/F	87.45	66	66	66	66	67	66	66	66	67	67	71	71	71	71	72	72	72	72	72	72	73	73	73	69	69	69	69	68	68	68	68	68	68	68	61
Max. Noise Level		72	72	72	72	72	72	72	72	72	73	76	75	75	75	75	75	75	76	76	76	76	76	76	69	69	69	69	68	68	68	68	68	68	68	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	5	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			5		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	71	71	71	72	72	72	72	72	72	72	73	73	73	70	69	69	69	69	69	68	68	68	68	69	61
22/F	93.75	66	66	66	66	66	66	66	66	66	67	71	71	71	72	72	72	72	72	72	72	73	73	73	70	70	70	69	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	66	66	66	66	66	66	71	72	72	72	72	72	72	72	72	72	73	73	73	70	70	70	70	69	69	69	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	70	70	70	70	69	69	69	69	69	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	71	71	70	70	70	70	70	70	69	69	69	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	71	70	70	70	70	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	71	71	70	70	70	70	70	70	70	70	60
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	71	71	71	70	70	70	70	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	73	72	71	71	71	70	70	70	70	70	70	70	60
30/F	118.95	65	65	66	66	66	65	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	72	71	71	71	70	70	70	70	70	70	70	60
31/F	122.1	65	65	65	65	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	71	71	71	70	70	70	70	70	70	60
32/F	125.25	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	71	71	71	71	70	70	70	70	70	60
33/F	128.4	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	70	70	70	70	70	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	71	70	70	70	70	59
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	73	73	72	72	72	71	71	71	71	70	70	70	70	60
Max. Noise Level		66	66	66	66	66	66	66	66	66	67	72	72	72	72	72	72	72	72	72	72	73	73	73	72	72	72	71	71	71	71	70	70	70	70	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	12	11	9	7	5	4	2	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		11			5			0			0		
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	65	65	65	65	66	66	66	66	63	61	60	58	57	57	57	56	56	56	56	56
2/F	30.75	72	72	72	72	72	71	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	66	66	64	63	62	61	60	59	59	59	58	58	58	61
3/F	33.9	71	71	71	71	71	71	71	71	71	71	70	69	68	67	67	66	66	65	66	66	66	66	66	65	65	64	63	63	62	62	61	61	61	60	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	70	68	68	67	67	66	66	65	66	66	66	66	66	66	66	66	65	65	64	64	64	63	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	70	70	68	67	67	67	66	65	65	66	66	66	66	66	67	67	66	66	66	66	65	65	65	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	65	65	66	66	66	66	66	67	67	67	67	67	67	66	66	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	66	66	66	68	67	67	67	67	67	67	67	67	67	67	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	68	67	67	66	66	66	65	65	66	66	66	66	66	68	68	68	68	68	68	68	67	67	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	68	67	66	66	66	65	65	65	66	66	66	66	67	68	68	68	68	68	68	68	68	68	68	68	64
10/F	55.95	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	68	68	68	68	68	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	68	68	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	66	66	66	66	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	68	68	63
13/F	65.4	68	68	68	68	68	67	67	67	68	67	67	66	66	66	65	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
14/F	68.55	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	67	69	69	69	69	69	69	69	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	68	69	69	69	69	69	69	69	69	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	65	65	65	65	65	66	66	66	66	68	70	70	70	69	69	69	69	69	69	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	65	65	65	65	65	65	66	66	66	66	68	70	70	70	70	70	69	69	69	69	69	69	63
18/F	81.15	67	66	67	66	66	66	66	66	66	66	67	66	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	69	69	69	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	72	71	69	68	67	67	66	66	65	66	66	66	67	68	70	70	70	70	70	70	70	70	69	69	69	65
No. of Noise Exceedance		4	4	4	4	4	4	4	4	4	4	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4			4			4		2		0		0			0			0		0		0		0			0			0	
No. of Flats		20			20			20			20		20		20		20			20			20		20		20		20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	70	70	70	70	70	70	70	70	69	69	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	70	70	70	70	70	70	70	69	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	70	70	70	70	70	70	70	70	62
24/F	100.05	66	66	66	66	66	65	66	66	65	65	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	71	70	70	70	70	70	70	70	62
25/F	103.2	66	66	66	66	66	65	66	65	65	65	66	65	65	65	65	65	65	65	66	66	67	67	69	71	71	71	71	70	70	70	70	70	70	70	62
26/F	106.35	66	65	66	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	66	67	68	69	71	71	71	71	71	70	70	70	70	70	70	62
27/F	109.5	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	66	67	68	69	71	71	71	71	71	71	70	70	70	70	70	61
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	70	70	70	70	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	66	67	67	68	69	71	71	71	71	71	71	71	71	70	70	70	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	69	71	71	71	71	71	71	71	71	70	70	70	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	65	65	65	65	65	65	65	67	67	68	68	69	71	71	71	71	71	71	71	71	70	70	70	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	65	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	65	65	65	66	65	66	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	65	65	65	66	65	66	66	67	67	68	68	69	72	71	71	71	71	71	71	71	70	70	70	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	14	14	12	10	9	8	5	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0			0		0		0		0			0			0		15				10			5			0	
No. of Flats		15			15			15			15		15		15		15			15			15		15				15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	256
Total no. of Flat =	950
%Compliance =	73%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	369
Total no. of Flat =	2324
%Compliance =	84%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

2. AM Peak - Mitigated Scenario (by Architectual Fins)

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	73	72	72	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	73	73	72	73	73	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	73	73	73	72	73	69	66	67	67	66	66	65	65	64	64	63	63	63	50	48	48	48
4/F	37.05	73	73	73	73	72	69	66	67	66	66	65	65	65	64	64	63	63	63	51	48	48	48
5/F	40.2	73	73	73	72	72	69	66	66	66	66	65	65	64	64	64	63	63	63	51	49	49	49
6/F	43.35	73	73	73	72	72	68	66	66	66	65	65	64	64	64	63	63	63	63	52	50	50	50
7/F	46.5	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	53	51	51	51
8/F	49.65	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	54	53	52	53
9/F	52.8	73	73	73	72	72	68	65	66	66	65	65	64	64	64	63	63	63	62	56	55	55	57
10/F	55.95	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	59	59	59	60
11/F	59.1	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	61	62
12/F	62.25	74	73	73	72	72	67	65	66	66	65	65	64	64	64	63	63	63	63	62	62	61	62
13/F	65.4	73	73	73	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
14/F	68.55	73	73	72	72	72	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
15/F	71.7	73	73	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
16/F	74.85	73	72	72	72	72	66	64	65	65	65	65	64	64	64	63	63	63	63	64	63	63	64
17/F	78	73	72	72	72	72	66	64	65	65	65	64	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	73	72	72	72	72	66	64	65	65	64	64	64	64	64	63	63	63	63	65	65	65	66
19/F	84.3	74	72	72	72	72	66	63	65	65	64	64	64	64	64	63	63	63	63	65	66	66	68
20/F	87.45	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	66	67	67	68
21/F	90.6	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	68	69
22/F	93.75	73	72	72	72	72	66	63	64	64	64	64	64	64	63	63	63	63	63	68	68	69	69
Max. Noise Level		74	73	73	73	73	70	67	68	67	66	66	65	65	65	64	64	63	63	68	68	69	69
No. of Noise Exceedance		22	22	22	22	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		22		22				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	62	63	68	69	69	69
24/F	100.05	73	72	72	72	71	65	63	64	64	64	64	63	63	63	63	63	62	63	69	69	69	69
25/F	103.2	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
26/F	106.35	73	72	72	71	71	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	73	72	72	71	71	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	73	72	72	71	71	65	62	64	64	63	63	63	63	63	63	62	63	65	70	70	70	69
30/F	118.95	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
31/F	122.1	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
32/F	125.25	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
33/F	128.4	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
34/F	131.55	73	72	71	71	71	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
35/F	134.7	73	72	71	71	71	65	62	63	63	63	63	63	63	63	63	62	63	66	70	70	70	70
Max. Noise Level		73	72	72	72	71	65	63	64	64	64	64	64	63	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		13	13	13	13	13	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		13		13				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	60	62	62
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	62
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	61	62
10/F	55.95	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	61	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	62	62	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	63	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
17/F	78	64	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
18/F	81.15	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	63	63	63	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	63	64	63	63	64	64	64	64	64	63	64	64	64	64	60	61
21/F	90.6	64	63	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	65	60	61
24/F	100.05	65	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	66	65	65	65	65	65	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	66	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	66	66	67	65	67	67	68	68	67	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	73	73	73	73	73	73	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	72	72	72	72	72	72	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	72	72	72	72	72	72	71	71	60	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	71	71	71	71	71	71	71	71	61	58	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	70	71	71	71	71	71	71	71	71	70	70	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	69	70	70	69	69	69	69	60	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	66	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		72	73	73	73	73	73	73	73	73	73	72	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		4	5	5	5	5	5	5	5	5	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				5		5		5			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	64	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	66	66	65	65	65	64	64	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	72	72	73	72	72	72	50	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	72	72	72	72	72	71	53	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	71	71	71	71	71	71	57	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	71	71	71	71	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	66	66	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		72	72	72	72	73	72	72	72	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		3	4	4	4	4	4	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4		4			0		0			0		0		
No. of Flats		22			22		22			22		22			22		22		

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0		0			0		0			0		0		
No. of Flats		13			13		13			13		13			13		13		

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	58	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	63	63	63
14/F	68.55	61	60	60	59	59	59	59	58	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	56	57	57	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	56	56	57	57	58	65	65	65
18/F	81.15	64	63	63	62	61	61	59	59	56	57	57	57	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	56	56	57	57	58	66	66	66
20/F	87.45	66	65	64	63	62	62	59	59	56	56	57	57	58	66	67	67
21/F	90.6	67	65	65	64	63	62	59	59	56	56	57	57	58	67	67	67
22/F	93.75	68	66	65	64	64	63	59	58	56	56	57	57	58	67	67	68
Max. Noise Level		68	66	65	64	64	63	59	59	56	57	57	57	58	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	68	68	69
28/F	112.65	69	67	67	67	66	65	59	58	56	56	56	57	57	68	68	69
29/F	115.8	69	67	67	67	66	66	58	58	56	56	56	57	57	68	69	69
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	67	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	67	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	74
No. of Noise Exceeded Flat =	102
Total no. of Flat =	1374
%Compliance =	93%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	76	75	75	76	76	76	76	76	76	76	76	76	75	65	60	57	57	56	56	56	56	56	55	55	55
2/F	30.75	71	72	72	72	72	72	72	71	71	70	75	75	75	75	75	75	75	75	75	75	76	76	75	66	62	60	59	59	58	58	58	57	57	57	60
3/F	33.9	71	71	71	71	71	71	71	71	71	69	75	75	75	75	75	75	75	75	75	75	75	75	74	67	64	62	62	61	61	60	60	60	60	59	64
4/F	37.05	70	71	71	71	71	71	71	71	70	69	75	74	74	74	74	75	75	75	75	75	75	75	74	68	64	64	64	63	63	62	62	62	62	61	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	74	74	74	74	74	74	74	74	74	74	75	74	73	68	65	65	65	65	64	64	64	63	63	63	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	74	74	74	74	74	74	74	74	74	74	74	74	73	69	66	66	66	65	65	65	65	64	64	64	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	74	73	74	74	74	74	74	74	74	74	74	74	73	69	66	66	66	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	73	73	73	73	73	73	74	74	74	74	74	74	73	69	66	67	67	66	66	66	66	66	66	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	74	74	74	72	69	67	67	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	67	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	69	69	69	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	73	73	73	73	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	73	72	72	72	73	73	73	73	73	73	73	73	72	69	67	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	72	72	72	72	72	73	73	73	73	73	73	73	71	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	68	68	67	68	68	68	68	72	72	72	72	72	72	73	73	73	73	73	73	71	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	72	72	72	72	72	72	72	72	73	73	73	73	71	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	72	71	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	72	72	71	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	72	72	71	70	68	69	69	69	68	69	68	68	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	72	72	72	72	72	72	72	72	72	72	73	72	71	70	69	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	76	75	75	76	76	76	76	76	76	76	76	76	75	70	69	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		3	4	4	4	4	4	4	4	3	1	20	20	20	20	20	20	20	20	20	20	20	20	20	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4		4			4			3		20			20		20			20			20		0		0		0		0		0		
No. of Flats		20		20			20			20		20			20		20			20			20		20		20		20		20		20		

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	72	73	72	71	70	69	69	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	72	72	72	71	71	70	70	70	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	72	72	72	72	72	72	72	72	73	73	72	72	71	71	70	70	70	70	70	70	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	71	70	70	70	70	70	70	70	70	70	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	71	70	71	71	70	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	70	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	71	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	72	71	71	71	71	71	71	71	71	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	71	72	71	71	71	71	71	71	71	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	71	71	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	71	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	72	71	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	72	72	72	72	72	72	72	72	72	72	72	72	71	73	72	72	72	72	71	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	72	72	72	72	72	72	72	72	73	73	73	72	71	73	72	72	72	72	71	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	15	15	15	15	15	15	15	15	15	15	15	15	15	14	10	11	11	10	10	8	7	6	5	4	0
No. of Flats with Noise Exceedance		0		0			0			0		15			15		15			15			15		11			10			7			5		
No. of Flats		15		15			15			15		15			15		15			15			15		15			15			15			15		

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	65	65	66	66	66	67	67	60	59	60	59	58	57	57	57	57	56	56	56
2/F	30.75	71	72	72	72	72	71	71	71	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	62	62	63	62	61	60	59	59	59	58	58	60
3/F	33.9	71	71	71	71	71	71	71	71	71	69	69	68	68	67	67	66	66	66	66	67	67	67	67	63	63	65	64	64	63	62	62	62	61	60	64
4/F	37.05	70	71	71	71	71	70	70	70	70	69	69	68	68	67	67	66	66	66	66	67	67	67	67	64	65	66	66	66	65	65	64	64	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	66	66	66	66	67	67	64	65	67	67	67	66	66	66	66	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	67	66	67	65	66	68	68	67	67	67	67	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	67	67	67	65	67	68	68	68	68	68	67	67	67	66	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	67	67	67	66	67	69	68	68	68	68	68	68	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	65	65	65	66	67	67	67	67	66	68	69	69	69	69	68	68	68	68	68	64
10/F	55.95	69	68	69	68	69	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	66	68	69	69	69	69	69	69	69	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	69	69	69	69	69	69	69	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	69	69	69	69	69	69	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	70	70	69	69	69	69	63
14/F	68.55	68	67	68	67	67	67	67	67	67	67	68	67	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	70	70	70	70	70	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	62
Max. Noise Level		72	72	72	72	72	72	72	72	72	71	70	69	68	67	67	66	66	66	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	65
No. of Noise Exceedance		3	4	4	4	4	3	3	3	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	2	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			4			3			3			0			0				0			0			0			3			2			0			0		
No. of Flats		20			20			20			20			20			20				20			20			20			20			20			20		

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	69	70	71	71	71	71	71	71	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	65	65	66	67	66	66	66	66	65	65	65	67	67	68	68	70	69	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	65	65	65	65	66	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	71	71	71	71	71	71	71	70	70	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	71	71	71	71	71	71	71	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	72	71	71	71	71	71	71	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	15	15	15	15	15	14	9	8	7	0
No. of Flats with Noise Exceedance		0			0			0			0			0			0				0			0			15			15			14			8		
No. of Flats		15			15			15			15			15			15				15			15			15			15			15			15		

Summary of Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	294
Total no. of Flat =	950
%Compliance =	69%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	76
No. of Noise Exceeded Flat =	396
Total no. of Flat =	2324
%Compliance =	83%

Note:

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Predicted Results for Road Traffic Noise Impact Assessment of Proposed Development

3. AM Peak - Mitigated Scenario (by Architectual Fins, Acoustic Window (Baffle Type) with/without SAM and Enhanced Acoustic Blacony (Baffle Type))

Northern Site

Block 1

Low Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
1/F	27.6	67	64	64	69	69	70	67	68	67	66	66	65	65	65	64	64	63	63	50	48	48	48
2/F	30.75	67	65	64	70	68	70	67	67	67	66	66	65	65	64	64	64	63	63	50	48	48	48
3/F	33.9	67	65	65	69	68	69	66	67	67	66	66	65	65	64	64	63	63	63	50	48	48	48
4/F	37.05	67	65	65	70	68	69	66	67	66	66	65	65	65	64	64	63	63	63	51	48	48	48
5/F	40.2	67	65	65	69	68	69	66	66	66	66	65	65	64	64	64	63	63	63	51	49	49	49
6/F	43.35	67	65	65	69	68	68	66	66	66	65	65	64	64	64	63	63	63	63	52	50	50	50
7/F	46.5	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	53	51	51	51
8/F	49.65	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	54	53	52	53
9/F	52.8	67	65	65	69	68	68	65	66	66	65	65	64	64	64	63	63	63	62	56	55	55	57
10/F	55.95	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	59	59	59	60
11/F	59.1	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	61	61	61	62
12/F	62.25	68	65	65	69	68	67	65	66	66	65	65	64	64	64	63	63	63	63	62	62	61	62
13/F	65.4	67	65	65	69	68	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
14/F	68.55	67	65	64	69	68	67	64	65	65	65	65	64	64	64	63	63	63	63	63	62	62	63
15/F	71.7	67	65	64	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	63	63	63	64
16/F	74.85	67	64	64	69	68	66	64	65	65	65	65	64	64	64	63	63	63	63	64	63	63	64
17/F	78	67	64	64	69	68	66	64	65	65	65	64	64	64	64	63	63	63	63	64	64	64	65
18/F	81.15	67	64	64	69	68	66	64	65	65	64	64	64	64	64	63	63	63	63	65	65	65	66
19/F	84.3	68	64	64	69	68	66	63	65	65	64	64	64	64	64	63	63	63	63	65	66	66	68
20/F	87.45	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	66	67	67	68
21/F	90.6	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	67	68	68	69
22/F	93.75	67	64	64	69	67	66	63	64	64	64	64	64	64	63	63	63	63	63	68	68	69	69
Max. Noise Level		68	65	65	70	69	70	67	68	67	66	66	65	65	65	64	64	63	63	68	68	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0		0	
No. of Flats		22		22				22			22			22		22		22		22		22	

High Zone

Floor	mPD	N1-01	N1-02	N1-03	N1-04	N1-05	N1-06	N1-07	N1-08	N1-09	N1-10	N1-11	N1-12	N1-13	N1-14	N1-15	N1-16	N1-17	N1-18	N1-19	N1-20	N1-21	N1-22
23/F	96.9	67	64	64	69	67	65	63	64	64	64	64	64	63	63	63	63	62	63	68	69	69	69
24/F	100.05	67	64	64	69	67	65	63	64	64	64	64	63	63	63	63	63	62	63	69	69	69	69
25/F	103.2	67	64	64	68	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
26/F	106.35	67	64	64	68	67	65	63	64	64	64	64	63	63	63	63	63	63	64	69	69	69	69
27/F	109.5	67	64	64	68	67	65	63	64	64	64	63	63	63	63	63	63	63	64	69	70	70	69
28/F	112.65	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	63	63	64	69	70	70	69
29/F	115.8	67	64	64	68	67	65	62	64	64	63	63	63	63	63	63	62	63	65	70	70	70	69
30/F	118.95	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
31/F	122.1	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	69
32/F	125.25	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	65	70	70	70	70
33/F	128.4	67	64	63	68	67	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
34/F	131.55	67	64	63	68	67	65	62	63	63	63	63	63	63	63	62	62	63	65	70	70	70	70
35/F	134.7	67	64	63	68	67	65	62	63	63	63	63	63	63	63	63	62	63	66	70	70	70	70
Max. Noise Level		67	64	64	69	67	65	63	64	64	64	64	64	63	63	63	63	63	66	70	70	70	70
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0		0				0			0			0		0		0		0			
No. of Flats		13		13				13			13			13		13		13		13			

Block 2

Low Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
1/F	27.6	62	62	61	61	61	60	60	60	61	60	60	60	60	59	59	60	60	59	62	63
2/F	30.75	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	60	62	62
3/F	33.9	62	61	61	61	61	60	60	60	61	60	60	60	60	59	60	61	61	60	62	62
4/F	37.05	62	61	61	60	60	60	60	60	61	60	60	60	60	60	60	61	61	61	62	62
5/F	40.2	62	61	61	60	60	60	60	60	60	60	60	60	60	60	60	61	61	61	62	62
6/F	43.35	62	61	61	60	60	60	60	60	60	60	60	60	60	59	60	61	61	61	62	62
7/F	46.5	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	61	61	61	62	62
8/F	49.65	62	61	61	60	60	60	60	59	60	60	60	60	60	60	60	60	61	61	62	62
9/F	52.8	62	61	61	60	61	60	60	60	60	60	60	60	60	60	60	61	61	61	61	62
10/F	55.95	62	62	61	61	61	60	60	60	61	60	60	60	60	60	60	61	61	61	61	62
11/F	59.1	62	62	61	61	61	61	61	60	61	61	61	60	60	60	60	61	61	62	61	62
12/F	62.25	62	62	62	61	62	62	61	61	62	62	61	61	61	61	61	61	62	62	61	62
13/F	65.4	63	62	62	62	62	62	62	62	63	62	62	62	62	62	62	62	62	63	61	62
14/F	68.55	63	62	62	62	63	63	63	62	63	63	63	62	62	62	62	62	63	63	61	62
15/F	71.7	63	63	62	63	63	63	63	63	63	63	63	63	62	62	62	63	63	63	61	61
16/F	74.85	63	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
17/F	78	64	63	62	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	60	61
18/F	81.15	64	63	63	63	63	63	63	63	64	63	63	63	63	63	63	63	63	64	60	61
19/F	84.3	64	63	63	63	63	63	63	63	64	64	64	63	63	63	63	64	64	64	60	61
20/F	87.45	64	63	63	63	63	64	63	63	64	64	64	64	64	63	64	64	64	64	60	61
21/F	90.6	64	63	63	63	63	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
22/F	93.75	64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	60	61
Max. Noise Level		64	63	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	64	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		22				22		22		22		22		22			22			22	

High Zone

Floor	mPD	N2-01	N2-02	N2-03	N2-04	N2-05	N2-06	N2-07	N2-08	N2-09	N2-10	N2-11	N2-12	N2-13	N2-14	N2-15	N2-16	N2-17	N2-18	N2-19	N2-20
23/F	96.9	64	64	63	63	64	64	64	63	64	64	64	64	64	64	64	64	64	65	60	61
24/F	100.05	65	64	63	64	64	64	64	63	65	65	65	65	65	65	65	65	65	65	60	61
25/F	103.2	65	64	64	64	64	64	64	64	65	65	65	65	65	65	65	65	65	65	60	61
26/F	106.35	65	64	64	64	65	65	65	64	65	65	65	65	65	65	65	65	65	65	60	61
27/F	109.5	66	65	64	65	65	65	65	64	65	65	66	66	65	65	65	65	65	66	60	62
28/F	112.65	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
29/F	115.8	66	65	65	65	65	65	65	64	66	66	66	66	66	66	66	66	66	66	61	62
30/F	118.95	66	65	65	65	66	66	66	64	66	66	66	66	66	66	66	66	66	66	61	63
31/F	122.1	66	65	65	65	66	66	66	64	67	66	67	67	67	67	67	67	67	67	61	63
32/F	125.25	66	66	65	65	66	66	66	64	67	67	67	67	67	67	67	67	67	67	61	63
33/F	128.4	66	66	65	66	66	66	66	65	67	67	67	67	67	67	67	67	67	67	61	63
34/F	131.55	66	66	66	66	66	66	67	65	67	67	68	68	67	68	68	68	68	68	61	63
35/F	134.7	67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
Max. Noise Level		67	66	66	66	67	67	67	65	68	68	68	68	68	68	68	68	68	68	62	63
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0		0		0			0			0	
No. of Flats		13				13		13		13		13		13			13			13	

Block 3

Low Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
1/F	27.6	72	73	73	65	65	67	68	65	65	73	72	57	56	49	48	47	47	48	50	51	52	56	58	59	63	64
2/F	30.75	72	72	72	64	65	67	67	65	64	72	72	59	57	52	49	48	48	48	52	53	54	57	58	59	63	64
3/F	33.9	71	72	72	64	64	66	67	64	64	71	71	60	58	54	50	48	48	48	53	54	54	57	58	59	63	64
4/F	37.05	71	71	71	63	64	66	66	64	63	71	71	61	58	54	51	48	49	49	54	55	55	57	59	60	63	64
5/F	40.2	70	71	71	63	63	65	66	63	63	70	70	61	59	55	51	49	49	50	56	56	56	59	59	60	64	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	70	61	58	55	52	50	50	51	57	57	58	60	61	61	64	65
7/F	46.5	70	70	70	70	70	70	70	70	70	70	70	60	58	55	52	51	51	52	57	58	59	60	61	62	64	64
8/F	49.65	70	70	70	70	69	70	70	69	69	69	69	60	59	55	53	51	51	52	58	59	59	60	61	62	64	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	60	59	55	53	52	52	53	58	59	59	61	61	62	64	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	69	60	59	56	54	53	53	54	59	59	60	61	61	62	64	64
11/F	59.1	69	69	69	69	69	69	69	68	68	68	68	61	59	57	56	55	55	55	59	59	60	61	61	62	64	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	61	60	58	57	57	57	56	59	60	60	61	62	62	63	64
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	61	60	59	58	58	58	58	60	60	60	61	62	62	63	64
14/F	68.55	68	68	68	68	68	68	68	68	68	68	68	61	61	59	59	59	59	59	60	61	61	62	62	62	64	64
15/F	71.7	68	68	68	68	68	68	68	68	68	67	68	62	61	60	59	59	59	59	61	61	61	62	62	62	64	64
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	59	59	61	61	61	62	62	62	64	64
17/F	78	67	67	67	67	67	67	67	67	67	67	67	62	61	60	60	60	60	60	61	61	61	62	62	62	64	64
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	62	62	61	60	60	60	60	61	62	61	62	62	62	64	64
19/F	84.3	67	67	67	67	67	67	67	67	67	67	67	63	62	61	61	61	61	61	62	62	61	62	62	62	64	64
20/F	87.45	67	67	67	67	66	67	67	66	66	66	66	63	63	62	62	61	61	61	62	62	62	62	62	62	64	64
21/F	90.6	66	67	66	66	66	66	66	66	66	66	66	63	63	63	62	62	62	62	62	62	62	62	62	63	64	63
22/F	93.75	66	66	66	66	66	66	66	66	66	66	66	64	64	63	63	63	63	63	63	63	62	62	62	63	64	63
Max. Noise Level		72	73	73	70	70	70	70	70	70	73	72	64	64	63	63	63	63	63	63	63	62	62	62	63	64	65
No. of Noise Exceedance		4	5	5	0	0	0	0	0	0	4	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		5				0		0		4			0		0			0			0		0			0	
No. of Flats		22				22		22		22			22		22			22			22		22			22	

High Zone

Floor	mPD	N3-01	N3-02	N3-03	N3-04	N3-05	N3-06	N3-07	N3-08	N3-09	N3-10	N3-11	N3-12	N3-13	N3-14	N3-15	N3-16	N3-17	N3-18	N3-19	N3-20	N3-21	N3-22	N3-23	N3-24	N3-25	N3-26
23/F	96.9	66	66	66	66	66	66	66	66	66	66	66	64	64	64	64	63	63	63	63	63	62	63	62	63	64	64
24/F	100.05	66	66	66	66	66	66	66	66	66	66	66	64	65	64	64	64	64	64	63	63	62	63	62	63	64	64
25/F	103.2	66	66	66	66	66	66	66	66	66	66	66	64	65	65	65	64	64	64	64	63	63	63	63	63	64	64
26/F	106.35	66	66	66	66	66	66	66	66	66	65	66	65	65	65	65	65	65	64	64	64	63	63	63	63	64	63
27/F	109.5	65	66	66	65	65	65	65	65	65	65	65	65	65	65	65	65	65	65	64	64	63	63	63	63	64	63
28/F	112.65	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	65	65	65	65	64	63	63	63	63	64	63
29/F	115.8	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	64	64	64	63	63	64	64
30/F	118.95	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	64	64	64	64	64	64	64
31/F	122.1	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	65	65	64	64	64	64	64	64
32/F	125.25	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	64	64	64	64	64
33/F	128.4	65	65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	65	64	65	64	64	65	64
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	66	66	65	65	65	64	64	65	64
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	66	66	67	67	67	67	67	67	67	66	65	65	65	65	65	64
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0				0		0		0			0		0			0			0		0			0	
No. of Flats		13				13		13		13			13		13			13			13		13			13	

Block 4

Low Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
1/F	27.6	72	72	64	67	65	64	72	72	50	58	59	59	60	60	61	61	61	62
2/F	30.75	72	72	64	66	64	64	72	71	53	59	60	60	61	61	61	61	62	62
3/F	33.9	71	71	63	66	63	63	71	71	57	60	60	60	61	61	61	61	62	62
4/F	37.05	70	71	63	65	63	63	71	70	59	60	60	60	61	61	61	61	62	62
5/F	40.2	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
6/F	43.35	70	70	70	70	70	70	70	70	59	60	60	60	61	61	61	61	62	62
7/F	46.5	70	70	70	70	70	70	70	70	58	60	60	60	60	61	61	61	62	62
8/F	49.65	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
9/F	52.8	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	61	62	62
10/F	55.95	69	69	69	69	69	69	69	69	58	60	60	60	61	61	61	62	62	62
11/F	59.1	68	68	68	68	68	68	68	68	57	61	61	61	61	61	62	62	62	63
12/F	62.25	68	68	68	68	68	68	68	68	57	61	61	61	61	62	62	62	63	63
13/F	65.4	68	68	68	68	68	68	68	68	57	61	61	61	62	62	63	63	63	64
14/F	68.55	68	68	68	68	68	68	68	68	57	61	62	62	62	62	63	63	63	64
15/F	71.7	67	67	67	67	67	67	67	67	57	62	62	62	62	63	63	63	64	64
16/F	74.85	67	67	67	67	67	67	67	67	57	62	62	62	63	63	63	64	64	64
17/F	78	67	67	67	67	67	67	67	67	57	62	62	63	63	63	64	64	64	65
18/F	81.15	67	67	67	67	67	67	67	67	57	63	63	63	63	64	64	64	65	65
19/F	84.3	67	67	66	66	67	66	66	67	58	63	63	63	64	64	64	65	65	65
20/F	87.45	66	66	66	66	66	66	66	66	58	63	63	64	64	64	65	65	65	66
21/F	90.6	66	66	66	66	66	66	66	66	58	64	64	64	64	65	65	65	66	66
22/F	93.75	66	66	66	66	66	66	66	66	58	64	64	64	65	65	65	66	66	67
Max. Noise Level		72	72	70	70	70	70	72	72	59	64	64	64	65	65	65	66	66	67
No. of Noise Exceedance		3	4	0	0	0	0	4	3	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		4			0			4		0		0			0			0	
No. of Flats		22			22			22		22		22			22			22	

High Zone

Floor	mPD	N4-01	N4-02	N4-03	N4-04	N4-05	N4-06	N4-07	N4-08	N4-09	N4-10	N4-11	N4-12	N4-13	N4-14	N4-15	N4-16	N4-17	N4-18
23/F	96.9	66	66	66	66	66	66	66	66	58	64	64	64	65	65	66	66	66	67
24/F	100.05	66	66	66	66	66	66	66	66	59	65	64	65	65	66	66	66	67	67
25/F	103.2	66	66	66	66	66	66	66	66	59	65	65	65	65	66	66	66	67	67
26/F	106.35	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	66	67	67
27/F	109.5	65	65	65	65	65	65	65	65	59	65	65	65	65	66	66	67	67	68
28/F	112.65	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
29/F	115.8	65	65	65	65	65	65	65	65	60	65	65	65	66	66	66	67	67	68
30/F	118.95	65	65	65	65	65	65	65	65	60	65	65	65	66	66	67	67	67	68
31/F	122.1	65	65	65	65	65	65	65	65	61	65	65	66	66	66	67	67	68	68
32/F	125.25	65	65	65	65	65	65	65	65	61	66	66	66	66	66	67	67	68	69
33/F	128.4	65	65	65	65	65	65	65	65	61	66	66	66	66	67	67	68	68	69
34/F	131.55	65	65	65	65	65	65	65	65	62	66	66	66	66	67	67	68	68	69
35/F	134.7	65	65	65	65	65	65	65	65	62	66	66	66	67	67	67	68	68	69
Max. Noise Level		66	66	66	66	66	66	66	66	62	66	66	66	67	67	67	68	68	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0			0	
No. of Flats		13			13			13		13		13			13			13	

Block 5

Low Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
1/F	27.6	56	56	56	57	57	56	57	56	50	50	51	52	54	61	61	61
2/F	30.75	57	57	57	57	57	56	58	57	51	51	52	53	54	61	61	61
3/F	33.9	57	57	57	57	57	57	58	57	52	52	53	54	55	61	61	61
4/F	37.05	57	57	57	57	57	57	58	58	54	54	55	56	56	61	61	61
5/F	40.2	57	57	57	57	57	57	59	58	56	56	56	56	57	61	61	61
6/F	43.35	57	57	57	57	57	57	59	58	56	56	56	57	57	62	61	61
7/F	46.5	57	57	57	57	57	57	59	59	56	56	56	57	57	62	61	62
8/F	49.65	57	57	57	57	57	57	59	59	56	56	56	57	57	62	62	62
9/F	52.8	57	57	57	58	57	57	59	59	56	56	57	57	57	62	62	62
10/F	55.95	58	58	57	58	57	57	59	59	56	56	57	57	57	62	62	62
11/F	59.1	58	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
12/F	62.25	59	58	58	58	58	58	59	58	56	56	57	57	57	63	63	63
13/F	65.4	60	59	59	59	58	58	59	58	56	56	57	57	58	63	63	63
14/F	68.55	61	60	60	59	59	59	59	58	56	56	57	57	58	64	64	64
15/F	71.7	62	61	61	60	60	59	59	59	56	56	57	57	58	64	64	64
16/F	74.85	63	62	61	61	60	60	59	59	56	56	57	57	58	65	65	65
17/F	78	63	62	62	61	61	60	59	59	56	56	57	57	58	65	65	65
18/F	81.15	64	63	63	62	61	61	59	59	56	57	57	57	58	66	66	66
19/F	84.3	65	64	63	62	62	61	59	59	56	56	57	57	58	66	66	66
20/F	87.45	66	65	64	63	62	62	59	59	56	56	57	57	58	66	67	67
21/F	90.6	67	65	65	64	63	62	59	59	56	56	57	57	58	67	67	67
22/F	93.75	68	66	65	64	64	63	59	58	56	56	57	57	58	67	67	68
Max. Noise Level		68	66	65	64	64	63	59	59	56	57	57	57	58	67	67	68
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0			0			0		0			0		0		
No. of Flats		22			22			22		22			22		22		

High Zone

Floor	mPD	N5-01	N5-02	N5-03	N5-04	N5-05	N5-06	N5-07	N5-08	N5-09	N5-10	N5-11	N5-12	N5-13	N5-14	N5-15	N5-16
23/F	96.9	68	67	66	65	64	63	59	58	56	56	57	57	58	67	68	68
24/F	100.05	69	67	66	65	65	64	59	58	56	56	57	57	57	68	68	68
25/F	103.2	69	67	67	66	65	64	59	58	56	56	57	57	57	68	68	68
26/F	106.35	69	67	67	66	66	65	59	58	56	56	57	57	57	68	68	68
27/F	109.5	69	67	67	67	66	65	59	58	56	56	57	57	57	68	68	69
28/F	112.65	69	67	67	67	66	65	59	58	56	56	56	57	57	68	68	69
29/F	115.8	69	67	67	67	66	66	58	58	56	56	56	57	57	68	69	69
30/F	118.95	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
31/F	122.1	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
32/F	125.25	69	67	67	67	67	66	58	58	56	56	56	57	57	68	69	69
33/F	128.4	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
34/F	131.55	69	67	67	67	67	66	58	58	56	56	56	57	57	69	69	69
35/F	134.7	69	67	67	67	67	66	58	58	56	56	57	57	57	69	69	69
Max. Noise Level		69	67	67	67	67	66	59	58	56	56	57	57	58	69	69	69
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		0						0		0			0		0		
No. of Flats		13						13		13			13		13		

Summary of Northern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	17
Total no. of Flat =	1374
%Compliance =	99%

Southern Site

Block 7

Low Zone

Floor	mPD	NAL-01	NAL-02	NAL-03	NAL-04	NAL-05	NAL-06	NAL-07	NAL-08	NAL-09	NAL-10	NAL-11	NAL-12	NAL-13	NAL-14	NAL-15	NAL-16	NAL-17	NAL-18	NAL-19	NAL-20	NAL-21	NAL-22	NAL-23	NAL-24	NAL-25	NAL-26	NAL-27	NAL-28	NAL-29	NAL-30	NAL-31	NAL-32	NAL-33	NAL-34	NAL-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	69	70	67	68	70	68	70	68	69	70	68	70	69	65	60	57	57	56	56	56	56	56	55	55	55
2/F	30.75	71	64	64	72	64	64	72	63	71	70	68	70	67	68	70	67	69	67	68	70	68	70	69	66	62	60	59	59	58	58	58	57	57	57	60
3/F	33.9	71	63	63	71	63	63	71	63	71	69	68	70	67	67	69	67	69	67	68	69	67	69	68	67	64	62	62	61	61	60	60	60	60	59	64
4/F	37.05	70	63	63	71	63	63	71	63	70	69	67	69	66	67	69	67	69	67	68	70	67	69	68	68	64	64	64	63	63	62	62	62	62	61	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	67	70	66	67	69	66	68	66	67	70	67	68	68	68	65	65	65	65	64	64	64	63	63	63	65
6/F	43.35	70	70	70	70	70	70	70	70	69	69	67	70	66	66	69	66	68	66	67	70	66	68	67	69	66	66	66	65	65	65	65	64	64	64	65
7/F	46.5	70	70	70	70	70	69	69	69	69	70	66	70	66	66	68	66	68	66	67	69	66	68	67	69	66	66	66	66	66	66	65	65	65	65	64
8/F	49.65	69	69	69	69	69	69	69	69	69	70	66	70	65	66	68	65	68	66	67	69	66	68	67	69	66	67	67	66	66	66	66	66	66	65	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	66	70	65	66	68	65	67	65	67	69	66	68	67	69	67	67	67	67	67	67	66	66	66	66	64
10/F	55.95	69	69	69	69	69	69	69	69	69	69	66	69	65	66	68	65	67	65	66	69	65	67	66	69	67	67	67	67	67	67	67	67	67	67	64
11/F	59.1	68	68	68	68	68	68	68	69	69	69	65	69	65	65	68	65	67	65	66	69	65	67	66	69	67	68	68	67	67	67	67	67	67	67	63
12/F	62.25	68	68	68	68	68	68	68	68	68	68	65	69	65	65	67	65	67	65	66	69	65	67	66	69	67	68	68	68	68	68	68	67	67	67	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
14/F	68.55	68	68	68	68	68	68	68	68	68	68	65	69	64	65	67	65	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
15/F	71.7	67	67	67	68	68	67	68	68	68	68	65	69	64	65	67	64	67	65	66	68	65	67	66	69	67	68	68	68	68	68	68	68	68	68	63
16/F	74.85	67	67	67	67	67	67	67	67	67	68	65	68	64	65	67	64	66	64	66	68	65	67	65	69	68	68	68	68	68	68	68	68	68	68	62
17/F	78	67	67	67	67	67	67	67	67	67	67	65	68	64	65	67	64	66	64	66	68	65	66	65	69	68	68	68	68	68	68	68	68	68	68	62
18/F	81.15	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	64	66	65	69	68	68	68	68	68	68	68	68	68	68	62
19/F	84.3	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	64	66	65	70	68	69	69	69	68	69	68	68	69	69	62
20/F	87.45	67	67	67	67	67	67	67	67	67	67	64	68	64	64	67	64	66	64	65	68	65	66	65	70	69	69	69	69	69	69	69	69	69	69	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	69	70	67	68	70	68	70	68	69	70	68	70	69	70	69	69	69	69	69	69	69	69	69	69	65
No. of Noise Exceedance		3	0	0	4	0	0	4	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			4		3		0			0		0			0			0			0		0		0		0				
No. of Flats		20			20			20		20		20			20		20			20			20			20		20		20		20				

High Zone

Floor	mPD	NAH-01	NAH-02	NAH-03	NAH-04	NAH-05	NAH-06	NAH-07	NAH-08	NAH-09	NAH-10	NAH-11	NAH-12	NAH-13	NAH-14	NAH-15	NAH-16	NAH-17	NAH-18	NAH-19	NAH-20	NAH-21	NAH-22	NAH-23	NAH-24	NAH-25	NAH-26	NAH-27	NAH-28	NAH-29	NAH-30	NAH-31	NAH-32	NAH-33	NAH-34	NAH-35
21/F	90.6	66	66	66	66	67	66	67	67	67	67	64	68	64	64	67	64	66	64	66	68	65	66	65	70	69	69	69	69	69	69	69	69	69	69	61
22/F	93.75	66	66	66	67	67	66	67	67	67	67	64	68	64	65	67	64	66	64	66	68	64	66	65	71	70	70	70	69	69	69	69	69	69	69	61
23/F	96.9	66	66	66	66	67	66	66	66	67	67	65	68	64	65	67	64	66	64	66	68	64	66	65	71	70	70	70	70	70	70	69	69	69	69	61
24/F	100.05	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	71	70	70	70	70	70	70	70	70	70	69	61
25/F	103.2	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	71	70	71	71	70	70	70	70	70	70	70	61
26/F	106.35	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	70	70	70	70	70	61
27/F	109.5	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	70	70	70	70	70	61
28/F	112.65	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	70	70	70	70	60
29/F	115.8	66	66	66	66	66	66	66	66	66	66	65	69	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	71	70	70	70	60
30/F	118.95	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	72	71	71	71	71	71	71	71	71	70	70	60
31/F	122.1	66	66	66	66	66	66	66	66	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	73	71	72	71	71	71	71	71	71	71	70	60
32/F	125.25	65	65	65	66	66	65	65	65	66	66	65	68	64	65	67	64	66	64	65	68	64	66	65	73	72	72	71	71	71	71	71	71	71	71	60
33/F	128.4	65	65	65	65	65	65	65	65	65	66	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	71	71	71	71	71	71	71	60
34/F	131.55	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	72	71	71	71	71	71	71	60
35/F	134.7	65	65	65	65	65	65	65	65	65	65	65	69	64	65	67	64	66	64	65	68	64	66	65	73	72	72	72	72	71	71	71	71	71	71	60
Max. Noise Level		66	66	66	67	67	66	67	67	67	67	65	69	64	65	67	64	66	64	66	68	65	66	65	73	72	72	72	72	71	71	71	71	71	71	61
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14	10	11	11	10	10	8	7	6	5	4	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			14			11			10			7			5	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Block 6

Low Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
1/F	27.6	72	64	64	72	64	64	72	64	72	63	70	69	68	67	67	66	65	65	66	66	66	67	67	60	59	60	59	58	57	57	57	57	56	56	56
2/F	30.75	71	64	64	72	64	63	71	63	71	70	69	69	68	67	67	66	66	66	66	67	67	67	67	62	62	63	62	61	60	59	59	59	58	58	60
3/F	33.9	71	63	63	71	63	63	71	63	71	69	69	68	68	67	67	66	66	66	66	67	67	67	67	63	63	65	64	64	63	62	62	62	61	60	64
4/F	37.05	70	63	63	71	63	70	70	70	70	69	69	68	68	67	67	66	66	66	66	67	67	67	67	64	65	66	66	66	65	65	64	64	63	63	65
5/F	40.2	70	70	70	70	70	70	70	70	70	69	70	68	67	67	67	66	66	66	66	66	66	67	67	64	65	67	67	67	66	66	66	66	65	65	65
6/F	43.35	70	70	70	70	70	70	70	70	70	70	69	68	67	67	66	66	66	65	66	66	67	66	67	65	66	68	68	67	67	67	67	66	66	66	65
7/F	46.5	69	69	69	69	69	69	69	69	69	69	69	67	67	67	66	66	65	65	66	66	67	67	67	65	67	68	68	68	68	68	67	67	67	66	65
8/F	49.65	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	66	65	65	66	66	67	67	67	66	67	69	68	68	68	68	68	68	67	67	64
9/F	52.8	69	69	69	69	69	69	69	69	69	69	69	67	67	66	66	65	65	65	66	67	67	67	67	66	68	69	69	69	69	68	68	68	68	68	64
10/F	55.95	69	68	69	68	69	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	66	68	69	69	69	69	69	69	69	68	68	64
11/F	59.1	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	69	69	69	69	69	69	69	68	64
12/F	62.25	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	69	69	69	69	69	69	63
13/F	65.4	68	68	68	68	68	68	68	68	68	68	68	67	66	66	66	65	65	65	66	67	67	67	68	67	68	70	70	70	70	70	69	69	69	69	63
14/F	68.55	68	67	68	67	67	67	67	67	67	67	68	67	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	69	69	69	69	63
15/F	71.7	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	69	69	69	63
16/F	74.85	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	68	67	69	70	70	70	70	70	70	70	69	69	63
17/F	78	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	69	70	70	70	70	70	70	70	69	69	63
18/F	81.15	67	67	67	67	67	67	67	67	67	67	67	66	66	66	66	65	65	65	66	67	67	67	69	68	70	71	70	70	70	70	70	70	70	69	63
19/F	84.3	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	70	70	70	70	70	69	62
20/F	87.45	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	62
Max. Noise Level		72	70	70	72	70	70	72	70	72	70	70	69	68	67	67	66	66	66	66	67	67	68	69	68	70	71	71	71	71	70	70	70	70	70	65
No. of Noise Exceedance		3	0	0	4	0	0	3	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	2	1	0	0	0	0	0	0
No. of Flats with Noise Exceedance		3			4			3		3		0			0		0			0			0			0		3		2			0			0	
No. of Flats		20			20			20		20		20			20		20			20			20			20		20		20			20			20	

High Zone

Floor	mPD	NB-01	NB-02	NB-03	NB-04	NB-05	NB-06	NB-07	NB-08	NB-09	NB-10	NB-11	NB-12	NB-13	NB-14	NB-15	NB-16	NB-17	NB-18	NB-19	NB-20	NB-21	NB-22	NB-23	NB-24	NB-25	NB-26	NB-27	NB-28	NB-29	NB-30	NB-31	NB-32	NB-33	NB-34	NB-35
21/F	90.6	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	70	70	70	70	62
22/F	93.75	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
23/F	96.9	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
24/F	100.05	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	66	67	67	68	69	68	70	71	71	71	71	71	71	70	70	70	62
25/F	103.2	66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	65	65	65	67	67	67	68	69	69	70	71	71	71	71	71	71	70	70	70	62
26/F	106.35	66	66	66	66	66	66	66	65	65	66	67	66	66	66	66	65	65	65	67	67	68	68	70	69	70	71	71	71	71	71	71	70	70	70	62
27/F	109.5	66	66	66	66	66	65	65	65	65	66	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	71	71	71	71	71	71	71	70	70	62
28/F	112.65	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	65	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	70	62
29/F	115.8	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	65	66	67	67	68	68	70	69	71	72	71	71	71	71	71	71	71	71	62
30/F	118.95	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	71	71	71	71	71	71	71	61
31/F	122.1	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	65	66	66	67	67	68	69	70	69	71	72	72	72	71	71	71	71	71	71	61
32/F	125.25	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
33/F	128.4	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
34/F	131.55	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	71	71	71	71	71	61
35/F	134.7	65	65	65	65	65	65	65	65	65	65	66	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	61
Max. Noise Level		66	66	66	66	66	66	66	66	66	66	67	66	66	66	66	66	66	66	67	68	68	69	70	69	71	72	72	72	72	72	71	71	71	71	62
No. of Noise Exceedance		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	15	15	15	15	15	14	9	8	7	0
No. of Flats with Noise Exceedance		0			0			0		0		0			0		0			0			0			15			15			14			8	
No. of Flats		15			15			15		15		15			15		15			15			15			15			15			15			15	

Summary of Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	131
Total no. of Flat =	950
%Compliance =	86%

Summary of Northern Site + Southern Site

Max. Noise Level, dB(A) =	73
No. of Noise Exceeded Flat =	148
Total no. of Flat =	2324
%Compliance =	94%

Note:

Adopted with Enhanced Acoustic Balcony (Baffle Type)

Adopted with Acoustic Window (Baffle Type) w/o SAM

Adopted with Acoustic Window (Baffle Type) with SAM

Shaded cell denotes predicted noise level exceeds the limit of 70dB(A)

Appendix 3.3

Sound Attenuation Performance of AW(BT) and EAB (BT) after Room Size Correction and addition of SAM

Innovative Noise Mitigation Measures Adopted In Traffic Noise Impact Assessment
Table of Major Parameters and Room Size of Proposed Case and Corresponding Reference Case, and Sound Attenuation Adjustment

Room	Type	Reference	
		Room area (RAref), m^2	Ref. sound attenuation, dB(A)
Living Room	Enhanced Acoustic Balcony (Baffle Type)	14.0	8.0
Bedroom	Acoustic Window (Baffle Type)	8.0	6.0

NSRs	Type	Application Site	Reference		Room Adjustment: 10xlog(RA / RAref) (adjust downward only), dB(A) RAref)	Sound attenuation after room adjustment, dB(A)	Sound attenuation with SAM, dB(A)
		Room area (RA), m^2	Room area (RAref), m^2	Ref. sound attenuation, dB(A)			
N1-01	Acoustic Window (Baffle Type)	7.4	8.0	6.0	0.0	6.0	--
N1-02	Enhanced Acoustic Balcony (Baffle Type)	15.1	14.0	8.0	0.0	8.0	--
N1-03	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
N1-04	Acoustic Window (Baffle Type)	4.0	8.0	6.0	-3.0	3.0	--
N1-05	Acoustic Window (Baffle Type)	5.3	8.0	6.0	-1.8	4.2	--
N3-04	Enhanced Acoustic Balcony (Baffle Type)	12.6	14.0	8.0	0.0	8.0	--
N3-05	Enhanced Acoustic Balcony (Baffle Type)	12.4	14.0	8.0	-0.5	7.5	--
N3-06	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
N3-07	Acoustic Window (Baffle Type)	5.9	8.0	6.0	-1.3	4.7	--
N3-08	Enhanced Acoustic Balcony (Baffle Type)	12.4	14.0	8.0	-0.5	7.5	--
N3-09	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
N4-03	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
N4-04	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
N4-05	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
N4-06	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-02	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAL-03	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-05	Enhanced Acoustic Balcony (Baffle Type)	12.8	14.0	8.0	0.0	8.0	--
NAL-06	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-08	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-10	Enhanced Acoustic Balcony (Baffle Type)	13.7	14.0	8.0	0.0	8.0	--
NAL-11	Enhanced Acoustic Balcony (Baffle Type)	11.9	14.0	8.0	-0.7	7.3	--
NAH-11	Enhanced Acoustic Balcony (Baffle Type)	11.9	14.0	8.0	-0.7	7.3	--
NAL-12	Acoustic Window (Baffle Type)	4.5	8.0	6.0	-2.5	3.5	5.0
NAH-12	Acoustic Window (Baffle Type)	4.5	8.0	6.0	-2.5	3.5	--
NAL-13	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
NAH-13	Enhanced Acoustic Balcony (Baffle Type)	14.2	14.0	8.0	0.0	8.0	--
NAL-14	Enhanced Acoustic Balcony (Baffle Type)	12.2	14.0	8.0	-0.6	7.4	--
NAH-14	Enhanced Acoustic Balcony (Baffle Type)	12.2	14.0	8.0	-0.6	7.4	--
NAL-15	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
NAH-15	Acoustic Window (Baffle Type)	6.8	8.0	6.0	-0.7	5.3	--
NAL-16	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAH-16	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-17	Acoustic Window (Baffle Type)	7.7	8.0	6.0	0.0	6.0	--
NAH-17	Acoustic Window (Baffle Type)	7.7	8.0	6.0	0.0	6.0	--
NAL-18	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAH-18	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NAL-19	Enhanced Acoustic Balcony (Baffle Type)	11.1	14.0	8.0	-1.0	7.0	--
NAH-19	Enhanced Acoustic Balcony (Baffle Type)	11.1	14.0	8.0	-1.0	7.0	--
NAL-20	Acoustic Window (Baffle Type)	5.6	8.0	6.0	-1.6	4.4	5.9
NAH-20	Acoustic Window (Baffle Type)	5.6	8.0	6.0	-1.6	4.4	--
NAL-21	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAH-21	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NAL-22	Acoustic Window (Baffle Type)	8.0	8.0	6.0	0.0	6.0	--
NAH-22	Acoustic Window (Baffle Type)	8.0	8.0	6.0	0.0	6.0	--
NAL-23	Enhanced Acoustic Balcony (Baffle Type)	8.5	14.0	8.0	-2.2	5.8	--
NAH-23	Enhanced Acoustic Balcony (Baffle Type)	8.5	14.0	8.0	-2.2	5.8	--
NB-02	Enhanced Acoustic Balcony (Baffle Type)	14.0	14.0	8.0	0.0	8.0	--
NB-03	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NB-05	Enhanced Acoustic Balcony (Baffle Type)	12.8	14.0	8.0	0.0	8.0	--
NB-06	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NB-08	Enhanced Acoustic Balcony (Baffle Type)	15.4	14.0	8.0	0.0	8.0	--
NB-10	Enhanced Acoustic Balcony (Baffle Type)	13.8	14.0	8.0	0.0	8.0	--

Note:

RA: Room Area,m^2

RAref: Reference Room Area,m^2

SAM: Sound Absorptive Material

*[1] The Sound Attenuation is determined according to the following equation: Sound Attenuation of Reference Case + 10*log[(RA of the habitable room at the Proposed Development)/ (RA of the habitable room at the reference case)]*

[2] According to the "Practice Noise on Application of Innovative Noise Mitigation Designs in Planning Private Residential Developments against Road Traffic Noise Impact" issued by EPD, addition of SAM to Acoustic Window (Baffle Type) can offer an additional 1.5dB(A) reduction.

Appendix 4.4

Detailed Calculations of Fixed Noise Impact Assessment

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N01** X coordinate = 837334.3
Y coordinate = 819801.6

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	91.7	-47.2	0	3	24
V02			68.0	837421.8	819770.2	93.0	-47.4	0	3	24
V03			68.0	837423.1	819769.6	94.4	-47.5	0	3	23
V04			68.0	837424.3	819768.9	95.8	-47.6	0	3	23
V05			68.0	837420.1	819769.5	91.6	-47.2	0	3	24
V06			68.0	837421.3	819768.9	92.9	-47.4	0	3	24
V07			68.0	837422.5	819768.4	94.3	-47.5	0	3	24
V08			68.0	837423.8	819767.7	95.7	-47.6	0	3	23
V09			64.0	837419.6	819768.5	91.5	-47.2	0	3	20
V10			64.0	837420.8	819767.9	92.8	-47.4	0	3	20
V11			64.0	837422.0	819767.3	94.2	-47.5	0	3	20
V12			64.0	837423.3	819766.7	95.6	-47.6	0	3	19
V13			68.0	837419.1	819767.5	91.4	-47.2	0	3	24
V14			68.0	837420.3	819766.9	92.8	-47.3	0	3	24
V15			68.0	837421.5	819766.3	94.2	-47.5	0	3	24
V16			68.0	837422.8	819765.7	95.5	-47.6	0	3	23
V17			64.0	837419.8	819765.8	92.7	-47.3	0	3	20
V18			64.0	837421.0	819765.2	94.1	-47.5	0	3	20
V19			64.0	837422.3	819764.6	95.5	-47.6	0	3	19
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	88.6	-47.0	0	3	44
C02			87.9	837425.9	819794.9	91.9	-47.3	0	3	44
C03			87.9	837426.2	819782.0	94.0	-47.5	0	3	43
C04			87.9	837430.8	819792.7	96.9	-47.7	0	3	43
C05		VRV	68.0	837432.5	819787.2	99.3	-47.9	0	3	23
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	101.1	-48.1	0	3	36
A02		Chiller	81.0	837431.0	819821.8	98.8	-47.9	0	3	36
A03		VRV	68.0	837429.3	819818.3	96.5	-47.7	0	3	23
A04		VRV	73.4	837424.9	819807.3	90.8	-47.2	0	3	29
A05		VRV	74.4	837427.7	819806.0	93.5	-47.4	0	3	30
A06		Chiller	81.0	837432.1	819802.0	97.9	-47.8	0	3	36
A07		Chiller	81.0	837438.4	819800.9	104.1	-48.4	0	3	36
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	231.2	-55.3	0	3	35
VS-TKW-2		TVL	90.0	837407.9	819581.6	232.0	-55.3	0	3	38
VS-TKW-3		TVL	87.0	837405.5	819572.2	240.3	-55.6	0	3	34
VS-TKW-4		SVL	81.0	837401.9	819571.9	239.5	-55.6	0	3	28
VS-TKW-5		SVL	85.0	837399.6	819571.9	238.9	-55.6	0	3	32
VS-TKW-6		SVL	81.0	837398.7	819586.0	225.1	-55.0	0	3	29
VS-TKW-7		TVL	91.0	837404.9	819590.1	223.0	-55.0	0	3	39
VS-TKW-8		TVL	85.0	837398.9	819579.6	231.3	-55.3	0	3	33
VS-TKW-9		SVL	80.0	837398.7	819585.9	225.2	-55.0	0	3	28
VS-TKW-22		SVL	95.0	837411.5	819582.8	232.1	-55.3	0	3	43
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	203.4	-54.2	0	3	27
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	212.5	-54.5	0	3	30
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	210.2	-54.5	0	3	31
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	211.7	-54.5	0	3	37
VS-TKW-28		SVL	85.0	837404.7	819617.1	197.5	-53.9	0	3	34
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	211.9	-54.5	0	3	45
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	203.5	-54.2	0	3	46
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	72.2	-45.2	0	3	45
VS-TKW-49		SVL	82.0	837394.9	819844.2	74.0	-45.4	0	3	40
VS-TKW-50		TVL	96.0	837400.7	819842.1	77.8	-45.8	0	3	53
VS-TKW-51		TVL	94.0	837399.2	819835.6	73.3	-45.3	0	3	52
VS-TKW-52		TVL	88.0	837407.8	819839.1	82.6	-46.3	0	3	45
VS-TKW-53		TVL	81.0	837404.6	819838.7	79.5	-46.0	0	3	38
VS-TKW-54		SVL	84.0	837407.3	819835.3	80.4	-46.1	0	3	41
VS-TKW-55		SVL	87.0	837407.3	819833.7	79.7	-46.0	0	3	44
VS-TKW-56		SVL	92.0	837407.4	819833.7	79.8	-46.0	0	3	49
VS-TKW-57		SVL	81.0	837406.3	819832.7	78.5	-45.9	0	3	38
VS-TKW-57A		SVL	90.0	837406.3	819832.5	78.4	-45.9	0	3	47
VS-TKW-58		SVL	90.0	837393.9	819839.2	70.5	-45.0	0	3	48
VS-TKW-59		TVL	84.0	837394.6	819840.5	71.8	-45.1	0	3	42
VS-TKW-60		TVL	85.0	837394.3	819841.3	72.0	-45.1	0	3	43
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	98.7	-47.9	0	3	32
VS-TKW-64		SVL	79.0	837403.8	819872.3	99.1	-47.9	0	3	34
VS-TKW-65		SVL	80.0	837393.3	819888.1	104.6	-48.4	0	3	35
VS-TKW-67		SVL	88.0	837397.3	819875.2	96.9	-47.7	0	3	43
VS-TKW-68		SVL	79.0	837387.1	819884.5	98.3	-47.8	0	3	34
VS-TKW-71		SVL	79.0	837404.0	819879.1	104.2	-48.4	0	3	34
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N01** X coordinate = 837334.3
Y coordinate = 819801.6

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	91.7	-47.2	0	3	NA
V02			0.0	837421.8	819770.2	93.0	-47.4	0	3	NA
V03			0.0	837423.1	819769.6	94.4	-47.5	0	3	NA
V04			0.0	837424.3	819768.9	95.8	-47.6	0	3	NA
V05			0.0	837420.1	819769.5	91.6	-47.2	0	3	NA
V06			0.0	837421.3	819768.9	92.9	-47.4	0	3	NA
V07			0.0	837422.5	819768.4	94.3	-47.5	0	3	NA
V08			0.0	837423.8	819767.7	95.7	-47.6	0	3	NA
V09			0.0	837419.6	819768.5	91.5	-47.2	0	3	NA
V10			0.0	837420.8	819767.9	92.8	-47.4	0	3	NA
V11			0.0	837422.0	819767.3	94.2	-47.5	0	3	NA
V12			0.0	837423.3	819766.7	95.6	-47.6	0	3	NA
V13			0.0	837419.1	819767.5	91.4	-47.2	0	3	NA
V14			0.0	837420.3	819766.9	92.8	-47.3	0	3	NA
V15			0.0	837421.5	819766.3	94.2	-47.5	0	3	NA
V16			0.0	837422.8	819765.7	95.5	-47.6	0	3	NA
V17			0.0	837419.8	819765.8	92.7	-47.3	0	3	NA
V18			0.0	837421.0	819765.2	94.1	-47.5	0	3	NA
V19			0.0	837422.3	819764.6	95.5	-47.6	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	88.6	-47.0	0	3	NA
C02			0.0	837425.9	819794.9	91.9	-47.3	0	3	NA
C03			0.0	837426.2	819782.0	94.0	-47.5	0	3	NA
C04			0.0	837430.8	819792.7	96.9	-47.7	0	3	NA
C05		VRV	0.0	837432.5	819787.2	99.3	-47.9	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	101.1	-48.1	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	98.8	-47.9	0	3	NA
A03		VRV	0.0	837429.3	819818.3	96.5	-47.7	0	3	NA
A04		VRV	0.0	837424.9	819807.3	90.8	-47.2	0	3	NA
A05		VRV	0.0	837427.7	819806.0	93.5	-47.4	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	97.9	-47.8	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	104.1	-48.4	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	231.2	-55.3	0	3	25
VS-TKW-2		TVL	80.0	837407.9	819581.6	232.0	-55.3	0	3	28
VS-TKW-3		TVL	77.0	837405.5	819572.2	240.3	-55.6	0	3	24
VS-TKW-4		SVL	71.0	837401.9	819571.9	239.5	-55.6	0	3	18
VS-TKW-5		SVL	75.0	837399.6	819571.9	238.9	-55.6	0	3	22
VS-TKW-6		SVL	71.0	837398.7	819586.0	225.1	-55.0	0	3	19
VS-TKW-7		TVL	81.0	837404.9	819590.1	223.0	-55.0	0	3	29
VS-TKW-8		TVL	75.0	837398.9	819579.6	231.3	-55.3	0	3	23
VS-TKW-9		SVL	70.0	837398.7	819585.9	225.2	-55.0	0	3	18
VS-TKW-22		SVL	85.0	837411.5	819582.8	232.1	-55.3	0	3	33
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	203.4	-54.2	0	3	17
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	212.5	-54.5	0	3	20
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	210.2	-54.5	0	3	21
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	211.7	-54.5	0	3	27
VS-TKW-28		SVL	75.0	837404.7	819617.1	197.5	-53.9	0	3	24
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	211.9	-54.5	0	3	35
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	203.5	-54.2	0	3	36
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	72.2	-45.2	0	3	39
VS-TKW-49		SVL	76.0	837394.9	819844.2	74.0	-45.4	0	3	34
VS-TKW-50		TVL	88.0	837400.7	819842.1	77.8	-45.8	0	3	45
VS-TKW-51		TVL	88.0	837399.2	819835.6	73.3	-45.3	0	3	46
VS-TKW-52		TVL	82.0	837407.8	819839.1	82.6	-46.3	0	3	39
VS-TKW-53		TVL	74.0	837404.6	819838.7	79.5	-46.0	0	3	31
VS-TKW-54		SVL	78.0	837407.3	819835.3	80.4	-46.1	0	3	35
VS-TKW-55		SVL	81.0	837407.3	819833.7	79.7	-46.0	0	3	38
VS-TKW-56		SVL	86.0	837407.4	819833.7	79.8	-46.0	0	3	43
VS-TKW-57		SVL	75.0	837406.3	819832.7	78.5	-45.9	0	3	32
VS-TKW-57A		SVL	84.0	837406.3	819832.5	78.4	-45.9	0	3	41
VS-TKW-58		SVL	84.0	837393.9	819839.2	70.5	-45.0	0	3	42
VS-TKW-59		TVL	78.0	837394.6	819840.5	71.8	-45.1	0	3	36
VS-TKW-60		TVL	79.0	837394.3	819841.3	72.0	-45.1	0	3	37
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	98.7	-47.9	0	3	31
VS-TKW-64		SVL	73.0	837403.8	819872.3	99.1	-47.9	0	3	28
VS-TKW-65		SVL	79.0	837393.3	819888.1	104.6	-48.4	0	3	34
VS-TKW-67		SVL	87.0	837397.3	819875.2	96.9	-47.7	0	3	42
VS-TKW-68		SVL	77.0	837387.1	819884.5	98.3	-47.8	0	3	32
VS-TKW-71		SVL	73.0	837404.0	819879.1	104.2	-48.4	0	3	28
									Total	**53**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N02** X coordinate = 837335.1
Y coordinate = 819641.1

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	155.3	-51.8	0	3	19
V02			68.0	837421.8	819770.2	155.5	-51.8	0	3	19
V03			68.0	837423.1	819769.6	155.7	-51.8	0	3	19
V04			68.0	837424.3	819768.9	155.9	-51.9	0	3	19
V05			68.0	837420.1	819769.5	154.0	-51.7	0	3	19
V06			68.0	837421.3	819768.9	154.2	-51.8	0	3	19
V07			68.0	837422.5	819768.4	154.4	-51.8	0	3	19
V08			68.0	837423.8	819767.7	154.6	-51.8	0	3	19
V09			64.0	837419.6	819768.5	152.9	-51.7	0	3	15
V10			64.0	837420.8	819767.9	153.0	-51.7	0	3	15
V11			64.0	837422.0	819767.3	153.2	-51.7	0	3	15
V12			64.0	837423.3	819766.7	153.4	-51.7	0	3	15
V13			68.0	837419.1	819767.5	151.7	-51.6	0	3	19
V14			68.0	837420.3	819766.9	151.9	-51.6	0	3	19
V15			68.0	837421.5	819766.3	152.1	-51.6	0	3	19
V16			68.0	837422.8	819765.7	152.3	-51.7	0	3	19
V17			64.0	837419.8	819765.8	150.7	-51.6	0	3	15
V18			64.0	837421.0	819765.2	151.0	-51.6	0	3	15
V19			64.0	837422.3	819764.6	151.2	-51.6	0	3	15
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	167.2	-52.5	0	3	38
C02			87.9	837425.9	819794.9	178.6	-53.0	0	3	38
C03			87.9	837426.2	819782.0	167.8	-52.5	0	3	38
C04			87.9	837430.8	819792.7	179.2	-53.1	0	3	38
C05		VRV	68.0	837432.5	819787.2	175.6	-52.9	0	3	18
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	208.4	-54.4	0	3	30
A02		Chiller	81.0	837431.0	819821.8	204.6	-54.2	0	3	30
A03		VRV	68.0	837429.3	819818.3	200.7	-54.0	0	3	17
A04		VRV	73.4	837424.9	819807.3	188.9	-53.5	0	3	23
A05		VRV	74.4	837427.7	819806.0	189.2	-53.5	0	3	24
A06		Chiller	81.0	837432.1	819802.0	187.9	-53.5	0	3	31
A07		Chiller	81.0	837438.4	819800.9	190.3	-53.6	0	3	30
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	88.5	-46.9	0	3	43
VS-TKW-2		TVL	90.0	837407.9	819581.6	94.0	-47.5	0	3	46
VS-TKW-3		TVL	87.0	837405.5	819572.2	98.5	-47.9	0	3	42
VS-TKW-4		SVL	81.0	837401.9	819571.9	96.2	-47.7	0	3	36
VS-TKW-5		SVL	85.0	837399.6	819571.9	94.6	-47.5	0	3	40
VS-TKW-6		SVL	81.0	837398.7	819586.0	84.2	-46.5	0	3	37
VS-TKW-7		TVL	91.0	837404.9	819590.1	86.5	-46.7	0	3	47
VS-TKW-8		TVL	85.0	837398.9	819579.6	88.7	-47.0	0	3	41
VS-TKW-9		SVL	80.0	837398.7	819585.9	84.2	-46.5	0	3	36
VS-TKW-22		SVL	95.0	837411.5	819582.8	96.1	-47.7	0	3	50
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	70.9	-45.0	0	3	36
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	75.6	-45.6	0	3	39
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	74.4	-45.4	0	3	40
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	75.1	-45.5	0	3	46
VS-TKW-28		SVL	85.0	837404.7	819617.1	73.6	-45.3	0	3	43
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	77.8	-45.8	0	3	54
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	73.4	-45.3	0	3	55
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	209.5	-54.4	0	3	36
VS-TKW-49		SVL	82.0	837394.9	819844.2	211.7	-54.5	0	3	30
VS-TKW-50		TVL	96.0	837400.7	819842.1	211.4	-54.5	0	3	44
VS-TKW-51		TVL	94.0	837399.2	819835.6	204.8	-54.2	0	3	43
VS-TKW-52		TVL	88.0	837407.8	819839.1	211.0	-54.5	0	3	37
VS-TKW-53		TVL	81.0	837404.6	819838.7	209.5	-54.4	0	3	30
VS-TKW-54		SVL	84.0	837407.3	819835.3	207.1	-54.3	0	3	33
VS-TKW-55		SVL	87.0	837407.3	819833.7	205.6	-54.3	0	3	36
VS-TKW-56		SVL	92.0	837407.4	819833.7	205.7	-54.3	0	3	41
VS-TKW-57		SVL	81.0	837406.3	819832.7	204.4	-54.2	0	3	30
VS-TKW-57A		SVL	90.0	837406.3	819832.5	204.2	-54.2	0	3	39
VS-TKW-58		SVL	90.0	837393.9	819839.2	206.7	-54.3	0	3	39
VS-TKW-59		TVL	84.0	837394.6	819840.5	208.1	-54.4	0	3	33
VS-TKW-60		TVL	85.0	837394.3	819841.3	208.8	-54.4	0	3	34
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	249.3	-55.9	0	3	24
VS-TKW-64		SVL	79.0	837403.8	819872.3	241.2	-55.6	0	3	26
VS-TKW-65		SVL	80.0	837393.3	819888.1	253.7	-56.1	0	3	27
VS-TKW-67		SVL	88.0	837397.3	819875.2	242.3	-55.7	0	3	35
VS-TKW-68		SVL	79.0	837387.1	819884.5	248.9	-55.9	0	3	26
VS-TKW-71		SVL	79.0	837404.0	819879.1	247.8	-55.9	0	3	26
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N02** X coordinate = 837335.1
Y coordinate = 819641.1

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	155.3	-51.8	0	3	NA
V02			0.0	837421.8	819770.2	155.5	-51.8	0	3	NA
V03			0.0	837423.1	819769.6	155.7	-51.8	0	3	NA
V04			0.0	837424.3	819768.9	155.9	-51.9	0	3	NA
V05			0.0	837420.1	819769.5	154.0	-51.7	0	3	NA
V06			0.0	837421.3	819768.9	154.2	-51.8	0	3	NA
V07			0.0	837422.5	819768.4	154.4	-51.8	0	3	NA
V08			0.0	837423.8	819767.7	154.6	-51.8	0	3	NA
V09			0.0	837419.6	819768.5	152.9	-51.7	0	3	NA
V10			0.0	837420.8	819767.9	153.0	-51.7	0	3	NA
V11			0.0	837422.0	819767.3	153.2	-51.7	0	3	NA
V12			0.0	837423.3	819766.7	153.4	-51.7	0	3	NA
V13			0.0	837419.1	819767.5	151.7	-51.6	0	3	NA
V14			0.0	837420.3	819766.9	151.9	-51.6	0	3	NA
V15			0.0	837421.5	819766.3	152.1	-51.6	0	3	NA
V16			0.0	837422.8	819765.7	152.3	-51.7	0	3	NA
V17			0.0	837419.8	819765.8	150.7	-51.6	0	3	NA
V18			0.0	837421.0	819765.2	151.0	-51.6	0	3	NA
V19			0.0	837422.3	819764.6	151.2	-51.6	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	167.2	-52.5	0	3	NA
C02			0.0	837425.9	819794.9	178.6	-53.0	0	3	NA
C03			0.0	837426.2	819782.0	167.8	-52.5	0	3	NA
C04			0.0	837430.8	819792.7	179.2	-53.1	0	3	NA
C05		VRV	0.0	837432.5	819787.2	175.6	-52.9	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	208.4	-54.4	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	204.6	-54.2	0	3	NA
A03		VRV	0.0	837429.3	819818.3	200.7	-54.0	0	3	NA
A04		VRV	0.0	837424.9	819807.3	188.9	-53.5	0	3	NA
A05		VRV	0.0	837427.7	819806.0	189.2	-53.5	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	187.9	-53.5	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	190.3	-53.6	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	88.5	-46.9	0	3	33
VS-TKW-2		TVL	80.0	837407.9	819581.6	94.0	-47.5	0	3	36
VS-TKW-3		TVL	77.0	837405.5	819572.2	98.5	-47.9	0	3	32
VS-TKW-4		SVL	71.0	837401.9	819571.9	96.2	-47.7	0	3	26
VS-TKW-5		SVL	75.0	837399.6	819571.9	94.6	-47.5	0	3	30
VS-TKW-6		SVL	71.0	837398.7	819586.0	84.2	-46.5	0	3	27
VS-TKW-7		TVL	81.0	837404.9	819590.1	86.5	-46.7	0	3	37
VS-TKW-8		TVL	75.0	837398.9	819579.6	88.7	-47.0	0	3	31
VS-TKW-9		SVL	70.0	837398.7	819585.9	84.2	-46.5	0	3	26
VS-TKW-22		SVL	85.0	837411.5	819582.8	96.1	-47.7	0	3	40
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	70.9	-45.0	0	3	26
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	75.6	-45.6	0	3	29
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	74.4	-45.4	0	3	30
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	75.1	-45.5	0	3	36
VS-TKW-28		SVL	75.0	837404.7	819617.1	73.6	-45.3	0	3	33
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	77.8	-45.8	0	3	44
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	73.4	-45.3	0	3	45
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	209.5	-54.4	0	3	30
VS-TKW-49		SVL	76.0	837394.9	819844.2	211.7	-54.5	0	3	24
VS-TKW-50		TVL	88.0	837400.7	819842.1	211.4	-54.5	0	3	36
VS-TKW-51		TVL	88.0	837399.2	819835.6	204.8	-54.2	0	3	37
VS-TKW-52		TVL	82.0	837407.8	819839.1	211.0	-54.5	0	3	31
VS-TKW-53		TVL	74.0	837404.6	819838.7	209.5	-54.4	0	3	23
VS-TKW-54		SVL	78.0	837407.3	819835.3	207.1	-54.3	0	3	27
VS-TKW-55		SVL	81.0	837407.3	819833.7	205.6	-54.3	0	3	30
VS-TKW-56		SVL	86.0	837407.4	819833.7	205.7	-54.3	0	3	35
VS-TKW-57		SVL	75.0	837406.3	819832.7	204.4	-54.2	0	3	24
VS-TKW-57A		SVL	84.0	837406.3	819832.5	204.2	-54.2	0	3	33
VS-TKW-58		SVL	84.0	837393.9	819839.2	206.7	-54.3	0	3	33
VS-TKW-59		TVL	78.0	837394.6	819840.5	208.1	-54.4	0	3	27
VS-TKW-60		TVL	79.0	837394.3	819841.3	208.8	-54.4	0	3	28
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	249.3	-55.9	0	3	23
VS-TKW-64		SVL	73.0	837403.8	819872.3	241.2	-55.6	0	3	20
VS-TKW-65		SVL	79.0	837393.3	819888.1	253.7	-56.1	0	3	26
VS-TKW-67		SVL	87.0	837397.3	819875.2	242.3	-55.7	0	3	34
VS-TKW-68		SVL	77.0	837387.1	819884.5	248.9	-55.9	0	3	24
VS-TKW-71		SVL	73.0	837404.0	819879.1	247.8	-55.9	0	3	20
									Total	**51**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Daytime/Evening)

NSRs: **N03** X coordinate = 837333.8
Y coordinate = 819875.5

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	68.0	837420.6	819770.7	136.1	-50.7	0	3	20
V02			68.0	837421.8	819770.2	137.3	-50.8	0	3	20
V03			68.0	837423.1	819769.6	138.5	-50.8	0	3	20
V04			68.0	837424.3	819768.9	139.8	-50.9	0	3	20
V05			68.0	837420.1	819769.5	136.7	-50.7	0	3	20
V06			68.0	837421.3	819768.9	137.9	-50.8	0	3	20
V07			68.0	837422.5	819768.4	139.1	-50.9	0	3	20
V08			68.0	837423.8	819767.7	140.4	-50.9	0	3	20
V09			64.0	837419.6	819768.5	137.1	-50.7	0	3	16
V10			64.0	837420.8	819767.9	138.4	-50.8	0	3	16
V11			64.0	837422.0	819767.3	139.6	-50.9	0	3	16
V12			64.0	837423.3	819766.7	140.9	-51.0	0	3	16
V13			68.0	837419.1	819767.5	137.7	-50.8	0	3	20
V14			68.0	837420.3	819766.9	138.9	-50.9	0	3	20
V15			68.0	837421.5	819766.3	140.1	-50.9	0	3	20
V16			68.0	837422.8	819765.7	141.4	-51.0	0	3	20
V17			64.0	837419.8	819765.8	139.4	-50.9	0	3	16
V18			64.0	837421.0	819765.2	140.6	-51.0	0	3	16
V19			64.0	837422.3	819764.6	141.9	-51.0	0	3	16
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	87.9	837421.2	819784.4	126.3	-50.0	0	3	41
C02			87.9	837425.9	819794.9	122.4	-49.8	0	3	41
C03			87.9	837426.2	819782.0	131.5	-50.4	0	3	41
C04			87.9	837430.8	819792.7	127.5	-50.1	0	3	41
C05		VRV	68.0	837432.5	819787.2	132.4	-50.4	0	3	21
A01	Roof of To Kwa Wan Market	Chiller	81.0	837432.6	819825.3	110.8	-48.9	0	3	35
A02		Chiller	81.0	837431.0	819821.8	111.0	-48.9	0	3	35
A03		VRV	68.0	837429.3	819818.3	111.3	-48.9	0	3	22
A04		VRV	73.4	837424.9	819807.3	113.8	-49.1	0	3	27
A05		VRV	74.4	837427.7	819806.0	116.8	-49.3	0	3	28
A06		Chiller	81.0	837432.1	819802.0	122.8	-49.8	0	3	34
A07		Chiller	81.0	837438.4	819800.9	128.5	-50.2	0	3	34
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	87.0	837398.7	819579.5	303.0	-57.6	0	3	32
VS-TKW-2		TVL	90.0	837407.9	819581.6	303.1	-57.6	0	3	35
VS-TKW-3		TVL	87.0	837405.5	819572.2	311.7	-57.9	0	3	32
VS-TKW-4		SVL	81.0	837401.9	819571.9	311.2	-57.9	0	3	26
VS-TKW-5		SVL	85.0	837399.6	819571.9	310.7	-57.8	0	3	30
VS-TKW-6		SVL	81.0	837398.7	819586.0	296.7	-57.4	0	3	27
VS-TKW-7		TVL	91.0	837404.9	819590.1	294.1	-57.4	0	3	37
VS-TKW-8		TVL	85.0	837398.9	819579.6	303.0	-57.6	0	3	30
VS-TKW-9		SVL	80.0	837398.7	819585.9	296.8	-57.4	0	3	26
VS-TKW-22		SVL	95.0	837411.5	819582.8	302.9	-57.6	0	3	40
VS-TKW-27-L		SVL	78.0	837398.0	819608.5	274.7	-56.8	0	3	24
VS-TKW-27-R		SVL	82.0	837397.8	819598.8	284.0	-57.1	0	3	28
VS-TKW-27A-L		SVL	82.0	837397.9	819601.3	281.7	-57.0	0	3	28
VS-TKW-27A-R		SVL	89.0	837397.8	819599.7	283.1	-57.0	0	3	35
VS-TKW-28		SVL	85.0	837404.7	819617.1	267.9	-56.6	0	3	31
CT-TKW-001		Cooling Tower	97.0	837401.6	819600.7	283.1	-57.0	0	3	43
CT-TKW-002		Cooling Tower	97.0	837401.3	819609.5	274.4	-56.8	0	3	43
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	87.0	837394.1	819842.1	68.9	-44.8	0	3	45
VS-TKW-49		SVL	82.0	837394.9	819844.2	68.6	-44.7	0	3	40
VS-TKW-50		TVL	96.0	837400.7	819842.1	74.8	-45.5	0	3	54
VS-TKW-51		TVL	94.0	837399.2	819835.6	76.6	-45.7	0	3	51
VS-TKW-52		TVL	88.0	837407.8	819839.1	82.5	-46.3	0	3	45
VS-TKW-53		TVL	81.0	837404.6	819838.7	79.8	-46.0	0	3	38
VS-TKW-54		SVL	84.0	837407.3	819835.3	83.7	-46.5	0	3	41
VS-TKW-55		SVL	87.0	837407.3	819833.7	84.5	-46.5	0	3	43
VS-TKW-56		SVL	92.0	837407.4	819833.7	84.7	-46.6	0	3	48
VS-TKW-57		SVL	81.0	837406.3	819832.7	84.2	-46.5	0	3	37
VS-TKW-57A		SVL	90.0	837406.3	819832.5	84.3	-46.5	0	3	46
VS-TKW-58		SVL	90.0	837393.9	819839.2	70.2	-44.9	0	3	48
VS-TKW-59		TVL	84.0	837394.6	819840.5	70.1	-44.9	0	3	42
VS-TKW-60		TVL	85.0	837394.3	819841.3	69.5	-44.8	0	3	43
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	77.0	837387.4	819884.8	54.4	-42.7	0	3	37
VS-TKW-64		SVL	79.0	837403.8	819872.3	70.1	-44.9	0	3	37
VS-TKW-65		SVL	80.0	837393.3	819888.1	60.8	-43.7	0	3	39
VS-TKW-67		SVL	88.0	837397.3	819875.2	63.5	-44.1	0	3	47
VS-TKW-68		SVL	79.0	837387.1	819884.5	54.0	-42.7	0	3	39
VS-TKW-71		SVL	79.0	837404.0	819879.1	70.2	-44.9	0	3	37
									Total	**60**
									Standard for ASR of B	**65**
									Standard for ASR of C	**70**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

Proposed Development in To Kwa Wan area
Predicted Industrial Noise Level at selected NSRs (Night-time)

NSRs: **N03** X coordinate = 837333.8
Y coordinate = 819875.5

Noise Source ID	Location	Noise Source	SWL	X coor.	Y coor.	Dist for apply correction (m)	Distance Correction, dB(A)	Screen Correctopm by building/barrier (-10dB(A)) [1]	Façade Correction, dB(A)	CNL dB(A)
V01	roof of BMW House	VRVs	0.0	837420.6	819770.7	136.1	-50.7	0	3	NA
V02			0.0	837421.8	819770.2	137.3	-50.8	0	3	NA
V03			0.0	837423.1	819769.6	138.5	-50.8	0	3	NA
V04			0.0	837424.3	819768.9	139.8	-50.9	0	3	NA
V05			0.0	837420.1	819769.5	136.7	-50.7	0	3	NA
V06			0.0	837421.3	819768.9	137.9	-50.8	0	3	NA
V07			0.0	837422.5	819768.4	139.1	-50.9	0	3	NA
V08			0.0	837423.8	819767.7	140.4	-50.9	0	3	NA
V09			0.0	837419.6	819768.5	137.1	-50.7	0	3	NA
V10			0.0	837420.8	819767.9	138.4	-50.8	0	3	NA
V11			0.0	837422.0	819767.3	139.6	-50.9	0	3	NA
V12			0.0	837423.3	819766.7	140.9	-51.0	0	3	NA
V13			0.0	837419.1	819767.5	137.7	-50.8	0	3	NA
V14			0.0	837420.3	819766.9	138.9	-50.9	0	3	NA
V15			0.0	837421.5	819766.3	140.1	-50.9	0	3	NA
V16			0.0	837422.8	819765.7	141.4	-51.0	0	3	NA
V17			0.0	837419.8	819765.8	139.4	-50.9	0	3	NA
V18			0.0	837421.0	819765.2	140.6	-51.0	0	3	NA
V19			0.0	837422.3	819764.6	141.9	-51.0	0	3	NA
C01	Roof of To Kwa Wan Complex and Government Offices	Chillers	0.0	837421.2	819784.4	126.3	-50.0	0	3	NA
C02			0.0	837425.9	819794.9	122.4	-49.8	0	3	NA
C03			0.0	837426.2	819782.0	131.5	-50.4	0	3	NA
C04			0.0	837430.8	819792.7	127.5	-50.1	0	3	NA
C05		VRV	0.0	837432.5	819787.2	132.4	-50.4	0	3	NA
A01	Roof of To Kwa Wan Market	Chiller	0.0	837432.6	819825.3	110.8	-48.9	0	3	NA
A02		Chiller	0.0	837431.0	819821.8	111.0	-48.9	0	3	NA
A03		VRV	0.0	837429.3	819818.3	111.3	-48.9	0	3	NA
A04		VRV	0.0	837424.9	819807.3	113.8	-49.1	0	3	NA
A05		VRV	0.0	837427.7	819806.0	116.8	-49.3	0	3	NA
A06		Chiller	0.0	837432.1	819802.0	122.8	-49.8	0	3	NA
A07		Chiller	0.0	837438.4	819800.9	128.5	-50.2	0	3	NA
VS-TKW-1	To Kwa Wan MTR Station Exit D	TVL	77.0	837398.7	819579.5	303.0	-57.6	0	3	22
VS-TKW-2		TVL	80.0	837407.9	819581.6	303.1	-57.6	0	3	25
VS-TKW-3		TVL	77.0	837405.5	819572.2	311.7	-57.9	0	3	22
VS-TKW-4		SVL	71.0	837401.9	819571.9	311.2	-57.9	0	3	16
VS-TKW-5		SVL	75.0	837399.6	819571.9	310.7	-57.8	0	3	20
VS-TKW-6		SVL	71.0	837398.7	819586.0	296.7	-57.4	0	3	17
VS-TKW-7		TVL	81.0	837404.9	819590.1	294.1	-57.4	0	3	27
VS-TKW-8		TVL	75.0	837398.9	819579.6	303.0	-57.6	0	3	20
VS-TKW-9		SVL	70.0	837398.7	819585.9	296.8	-57.4	0	3	16
VS-TKW-22		SVL	85.0	837411.5	819582.8	302.9	-57.6	0	3	30
VS-TKW-27-L		SVL	68.0	837398.0	819608.5	274.7	-56.8	0	3	14
VS-TKW-27-R		SVL	72.0	837397.8	819598.8	284.0	-57.1	0	3	18
VS-TKW-27A-L		SVL	72.0	837397.9	819601.3	281.7	-57.0	0	3	18
VS-TKW-27A-R		SVL	79.0	837397.8	819599.7	283.1	-57.0	0	3	25
VS-TKW-28		SVL	75.0	837404.7	819617.1	267.9	-56.6	0	3	21
CT-TKW-001		Cooling Tower	87.0	837401.6	819600.7	283.1	-57.0	0	3	33
CT-TKW-002		Cooling Tower	87.0	837401.3	819609.5	274.4	-56.8	0	3	33
VS-TKW-48	Ventilation Shaft (Next to To Kwa Wan Market)	TVL	81.0	837394.1	819842.1	68.9	-44.8	0	3	39
VS-TKW-49		SVL	76.0	837394.9	819844.2	68.6	-44.7	0	3	34
VS-TKW-50		TVL	88.0	837400.7	819842.1	74.8	-45.5	0	3	46
VS-TKW-51		TVL	88.0	837399.2	819835.6	76.6	-45.7	0	3	45
VS-TKW-52		TVL	82.0	837407.8	819839.1	82.5	-46.3	0	3	39
VS-TKW-53		TVL	74.0	837404.6	819838.7	79.8	-46.0	0	3	31
VS-TKW-54		SVL	78.0	837407.3	819835.3	83.7	-46.5	0	3	35
VS-TKW-55		SVL	81.0	837407.3	819833.7	84.5	-46.5	0	3	37
VS-TKW-56		SVL	86.0	837407.4	819833.7	84.7	-46.6	0	3	42
VS-TKW-57		SVL	75.0	837406.3	819832.7	84.2	-46.5	0	3	31
VS-TKW-57A		SVL	84.0	837406.3	819832.5	84.3	-46.5	0	3	40
VS-TKW-58		SVL	84.0	837393.9	819839.2	70.2	-44.9	0	3	42
VS-TKW-59		TVL	78.0	837394.6	819840.5	70.1	-44.9	0	3	36
VS-TKW-60		TVL	79.0	837394.3	819841.3	69.5	-44.8	0	3	37
VS-TKW-61	To Kwa Wan MTR Station Exit A	SVL	76.0	837387.4	819884.8	54.4	-42.7	0	3	36
VS-TKW-64		SVL	73.0	837403.8	819872.3	70.1	-44.9	0	3	31
VS-TKW-65		SVL	79.0	837393.3	819888.1	60.8	-43.7	0	3	38
VS-TKW-67		SVL	87.0	837397.3	819875.2	63.5	-44.1	0	3	46
VS-TKW-68		SVL	77.0	837387.1	819884.5	54.0	-42.7	0	3	37
VS-TKW-71		SVL	73.0	837404.0	819879.1	70.2	-44.9	0	3	31
									Total	**53**
									Standard for ASR of B	**55**
									Standard for ASR of C	**60**
									Complied?	**Yes**

Note:
[1] A negative correction of 10 dB(A) can be adopted to the direction facing of the ventilation shaft totally screened by buildings. As a worst case assessment, this correction is not applied.

SIA (Enhanced Scheme)
(Nov 2022)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Sewerage Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
October 2022

Reference Number:
R6775_v2.0

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Appendices

Appendix A Layout Plans
Appendix B Detailed Sewerage Impact Assessment Calculations
Appendix C Arrangement of New Sewers Pipes for the Adjacent Developments
Appendix D Extracted Pages from the SIA report for URA project KC-016

1. Introduction

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Sewage Impact Assessment (SIA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 Ramboll Hong Kong Limited has been commissioned by the URA to conduct this SIA to assess whether the capacity of the existing sewerage network serving the site is sufficient to cope with the sewage flow from the proposed redevelopment and existing development in the vicinity.

1.1.3 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.1.4 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the “Revised Design 2022”) are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.3 Proposed Development

1.3.1 The site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 Under notional layout of the Revised Design 2022, the Northern Site consists of five residential towers providing 1374 residential units, clubhouses (about 3,435m^2), retail (about

8,587m^2) and community facilities (about 500m^2). The Southern Site consists of two residential towers providing 950 residential units, clubhouses (about 2,755m^2), retail (about 6,888m^2) and community facilities (about 2,000m^2). A block plan of the notional layout is provided in **Appendix A**.

1.3.3 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objectives

1.4.1 To address the above changes in the draft DSP, it is considered necessary to revise the SIA to support the re-submission to TPB for consideration. In this SIA, apart from the proposed development parameters, internal boundary between the sites, and the types of housings, the calculation assumption, methodology, catchment area adopted in the last SIA (ref. no.: R6775_v1.5 dated January 2022) remain unchanged.

1.4.2 The last version of SIA (ref. no.: R6775_v1.5 dated January 2022), was submitted to the TPB in March 2022 in support of the draft DSP submission. The Environmental Protection Department (EPD) then has no objection to the previously submitted draft DSP based on the findings of the submitted Environmental Assessment (EA) and SIA, understanding that the URA has committed to carry out further reviews on noise impact, sewerage impact and land contamination issues at detailed design stage.

2. Sewerage Impact Assessment

2.1 Scope of Work

2.1.1 The aim of this study is to assess whether the capacity of the existing sewerage network serving the Subject Site is sufficient to cope with the sewage flow from the proposed redevelopment and existing development in the vicinity. Information from the Drainage Records were adopted for this SIA.

2.2 Existing Sewerage System

2.2.1 According to the Drainage Records, there are a group of existing sewers with diameter of 150mm to 225mm running within and around the Subject Site, and then connecting to the existing trunk sewer network (600mm diameter) along Chi Kiang Street.

2.2.2 The existing sewer network along Ma Tau Wai Road, Kau Pui Lung Road and Chi Kiang Street is also connected to adjoining residential clusters in the To Kwa Wan Area, such as Lok Man Sun Chuen, and are included as catchment areas as shown in **Figure 3**.

2.3 Assessment Criteria and Methodology

2.3.1 Environmental Protection Department's (EPD's) Guidelines for Estimating Sewage Flows for Sewage Infrastructure Planning, Version 1 (GESF) is referred to estimate the quantity of the sewage generated from the proposed development and the existing development. Sewage flow parameters and global peaking factors in this document are adopted.

2.3.2 According to the Table T-1 of GESF, the unit flow factor of Domestic Flow – Private R2 is 0.27 m^3/day.

2.3.3 According to the Table T-2 of GESF, the unit flow factor of J4 – Wholesale & Retail is 0.20 m^3/day and the flow of commercial employee is 0.08 m^3/day.

2.3.4 According to the Table T-2 of GESF, the unit flow factor of J10 – Restaurant and Hotel is 1.50 m^3/day and the flow of commercial employee is 0.08 m^3/day.

2.3.5 According to the Table T-2 of GESF, the unit flow factor of J11 – Community, Social & Personal Services is 0.20 m^3/day and the flow of commercial employee is 0.08 m^3/day.

2.3.6 According to the Table T-2 of GESF, the unit flow factor of School Student is 0.04 m^3/day.

2.3.7 According to the Table T-3 of GESF, the unit flow factor of Industrial Flow (Central Kowloon) is 0.55 m^3/day.

2.3.8 According to the Table T-4 of GESF, the catchment inflow factor (Central Kowloon) is 1.

2.4 Wastewater Generated by the Proposed Development

2.4.1 Wastewater arising from the proposed development will be primarily contributed by the residents, and commercial employees of the clubhouse, community facilities and retail.

2.4.2 As a conservative assessment, it is assumed Northern Site provides 1450 residential units, clubhouses (about 3,900m^2), retail (about 9,100m^2) and community facilities (about 500m^2).

2.4.3 It is also assumed that Southern Site provides 960 residential units, clubhouses (about 3,000m^2), retail (about 7,000m^2) and community facilities (about 2,000m^2).

2.4.4 The usage of the retail for both Northern Site and Southern Site has yet been confirmed. As a conservative approach, the area of retail for restaurant : shop is assumed as 1:4 for this assessment.

2.4.5 A Person-per-Flat (PPF) of 2.3 is assumed for the area, which has made reference to HKPSG and adopted a more conservative assumption than HKPSG recommendation. In order to assess the sewer capacities, a sensitivity test adding 22% is adopted to assess the adequacy of the sewer capacities (i.e. PPF 2.3 x 122%).

2.5 Assessment of Sewerage Impact

2.5.1 After the redevelopment, sewage generated from Northern Site is proposed to be discharged to the existing sewerage system along Kau Pui Lung Road to manhole S1 (FMH4024246). Sewage generated from Southern Site is proposed to be discharged to the existing sewerage system along Chi Kiang Street to manhole S5 (FMH4024250), as shown in **Figure 2**.

2.5.2 The sewage generation rate of the proposed development is summarized in **Table 1** below and the detailed calculation is shown in **Table 1 of Appendix B**.

Table 1 Estimated Average and Peak Flow Rate from the Proposed Development

	Northern Site	Southern Site	Total
Average Flow Rate (m^3/day)	1354.9	939.7	-
Peak Flow Rate (L/s)	78.41	65.25	143.66

2.5.3 **Table 2 of Appendix B** shows the detailed calculation on the estimated hydraulic capacity of the existing sewer sections. According to **Table 4 of Appendix B**, it is found that the existing sewerage system has sufficient capacity to cater the sewage generated from the proposed development and the catchment, except 3 existing sewer segments S14-S17 (manhole no. FMH4024258 - FMH4025856) along Chi Kiang Street.

2.5.4 The 3 existing sewer segments S14-S17 are proposed to be upgraded from 600mm dia. to 750mm dia. The material for the proposed sewer pipe is slimed clayware. The project proponent (URA), or its joint venture partner(s), or its assignee will be responsible for the necessary upgrades prior to the sewer connection works from the proposed development to public sewerage.

2.6 Arrangement of New Sewers Pipes for the Adjacent Developments

2.6.1 According to the Drainage Records shown in **Appendix C**, some existing sewers connecting the residential developments pass though the Subject Site. It is intended to divert sewer pipes for 3 adjacent residential buildings (Morning Joy Building, City 151 and 80 Maidstone Road).

2.6.2 As shown in **Figure 4**, 7 new sewer pipes (A3-A4, A5-A4, A4-A6, A6-A7, A7-A8, A8-A9, A9-S2) with 300mm dia. are proposed and ultimately reconnected to the existing public sewer manhole S2 (manhole no. FMH4024247) at Kau Pui Lung Road.

2.6.3 **Table C3 of Appendix C** shows the new sewerage system can cater the sewerage generation from the 3 buildings. The material for the proposed sewer pipe is slimed clayware. The project proponent (URA), or its joint venture partner(s), or its assignee will be responsible for the necessary upgrades prior to the sewer connection works from the proposed development to public sewerage.

2.6.4 The exact dimension and alignment of the proposed new sewer pipes will be reviewed in the detailed design stage. If the proposed alignment would be modified, update of the SIA will be conducted accordingly.

3. Overall Conclusion

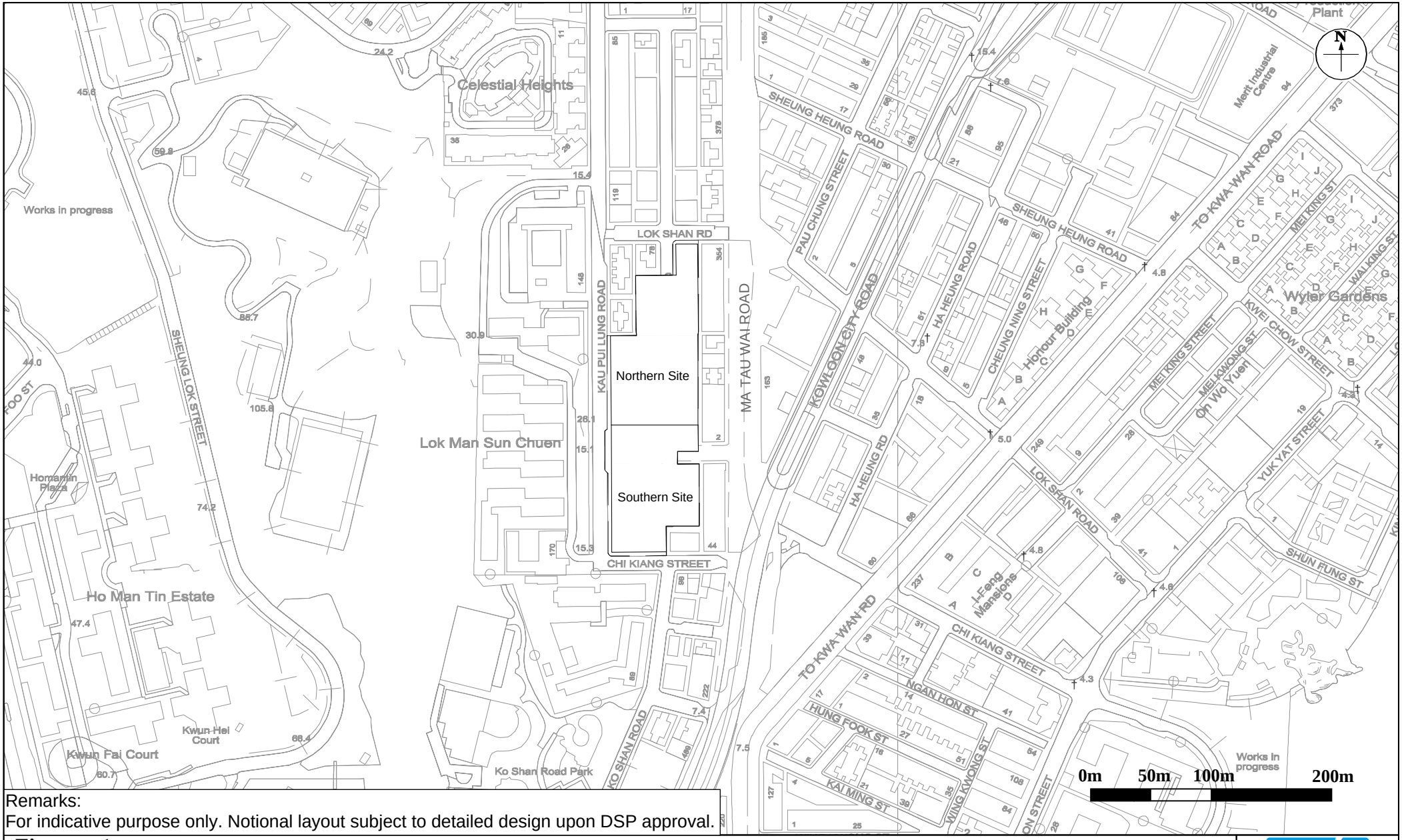
3.1.1 Sewerage impact assessments was conducted based on the latest proposed development parameters for the redevelopment project at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

3.1.2 Based on the sewerage impact assessment results, it is found that the capacity of the existing sewerage system serving the area would be sufficient to cater for the sewage generation from the proposed development, except 3 existing sewer segments are required to be upgraded. After upgrading work, the capacity of the concerned sewer network will be capable to collect sewage from the Proposed Development and the existing buildings upstream of the Proposed Development.

3.1.3 Seven (7) new sewer pipes are proposed for the proposed development, which will be connected to the existing public sewer manhole S2 (manhole no. FMH4024247) at Kau Pui Lung Road. Besides, diversion works for some existing sewer pipes serving the adjoining existing residential developments and currently passing through the subject site will be made at implementation.

3.1.4 With the above assessment and proposed diversion/upgrading measures, this SIA confirms that there are no unacceptable sewerage impacts as a result of the proposed development.

FIGURES



Remarks:
For indicative purpose only. Notional layout subject to detailed design upon DSP approval.

Figure: 1

Title: Location of the Subject Site and Its Environs

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	2.0
Date:	Sep 2022

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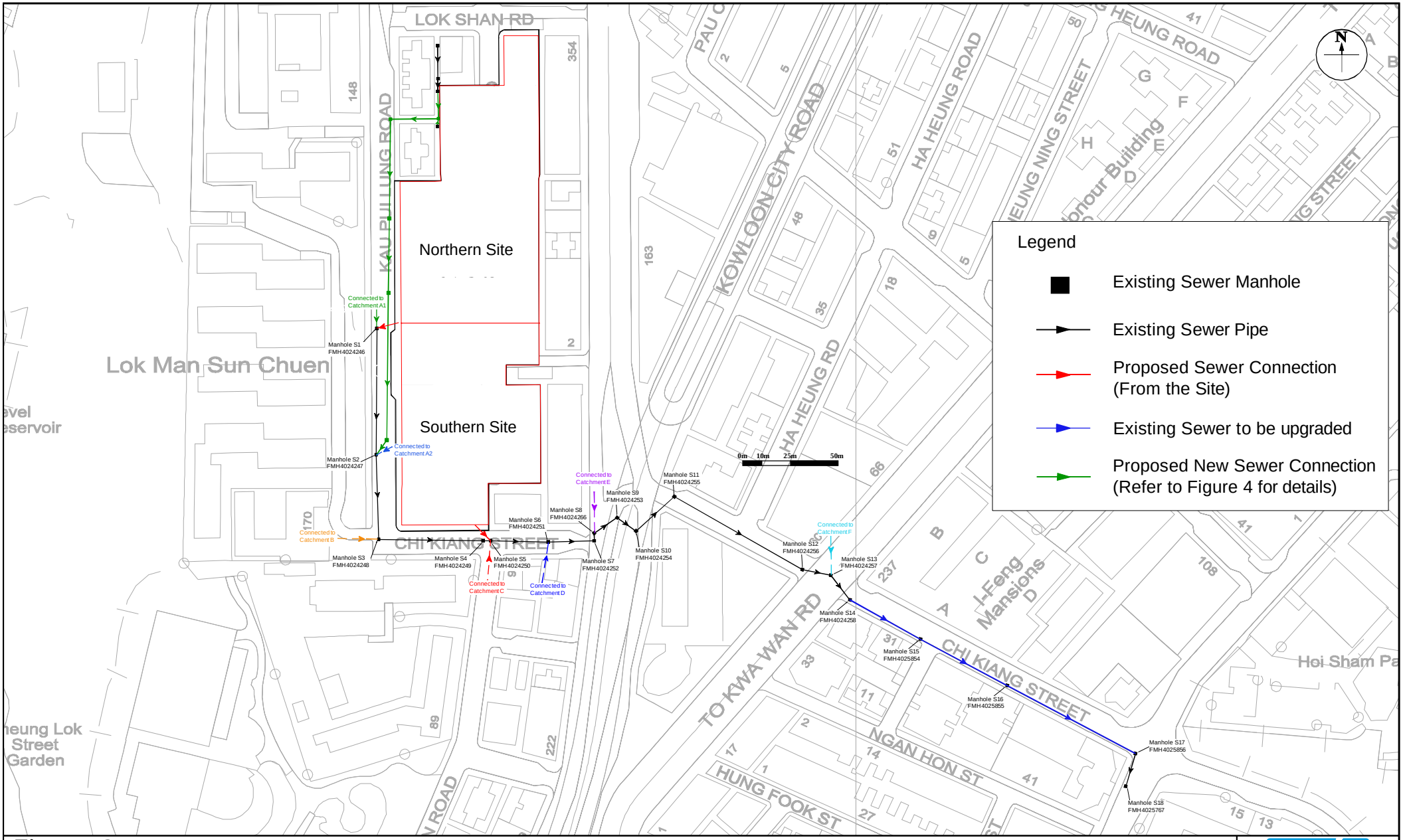

Figure: 2	RAMBOLL
Title: Existing Sewerage System in Vicinity of the Subject Site	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Sep 2022

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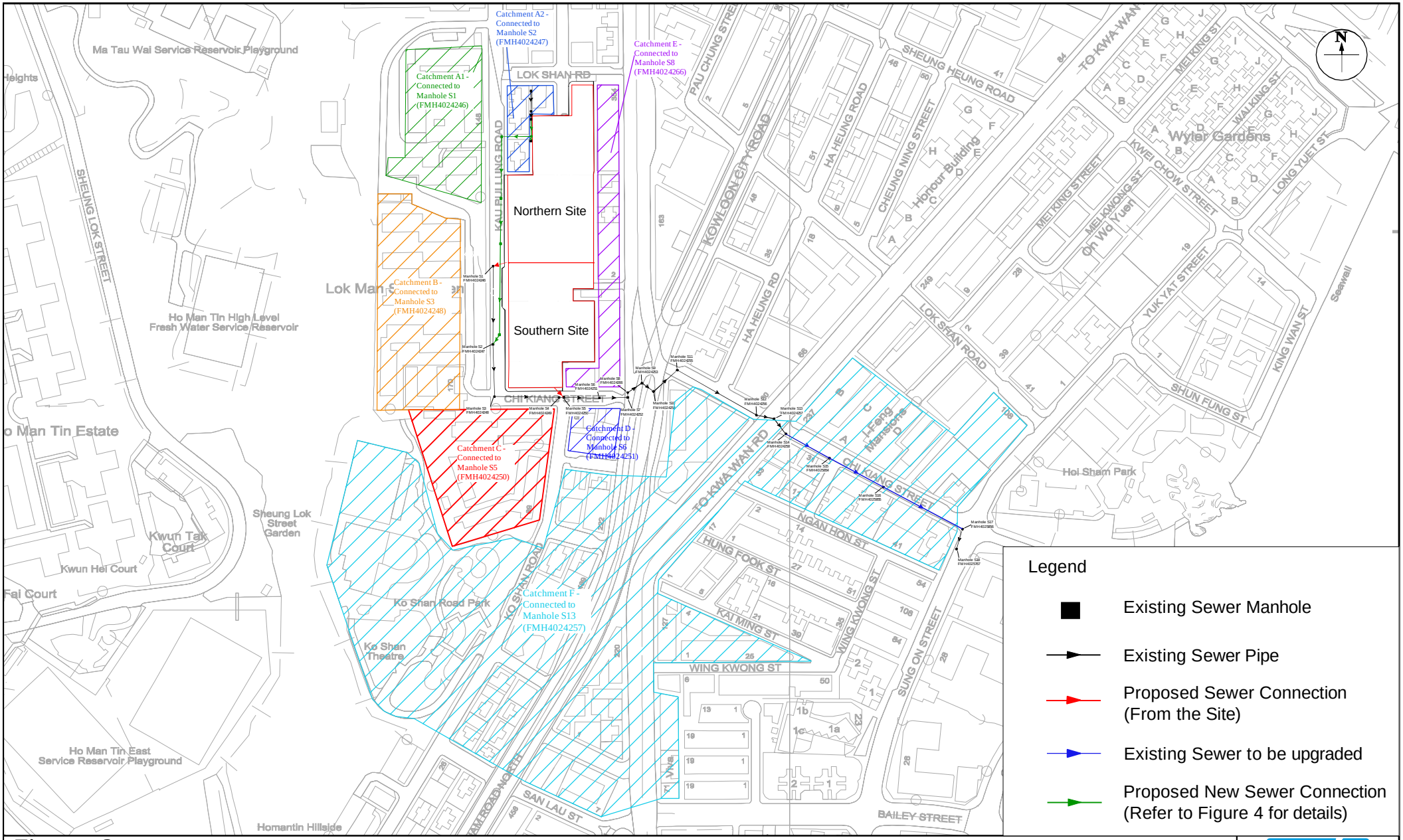

Figure: 3	RAMBOLL
Title: Existing Sewerage System and Catchment Areas in the Vicinity of the Subject Site	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Sep 2022

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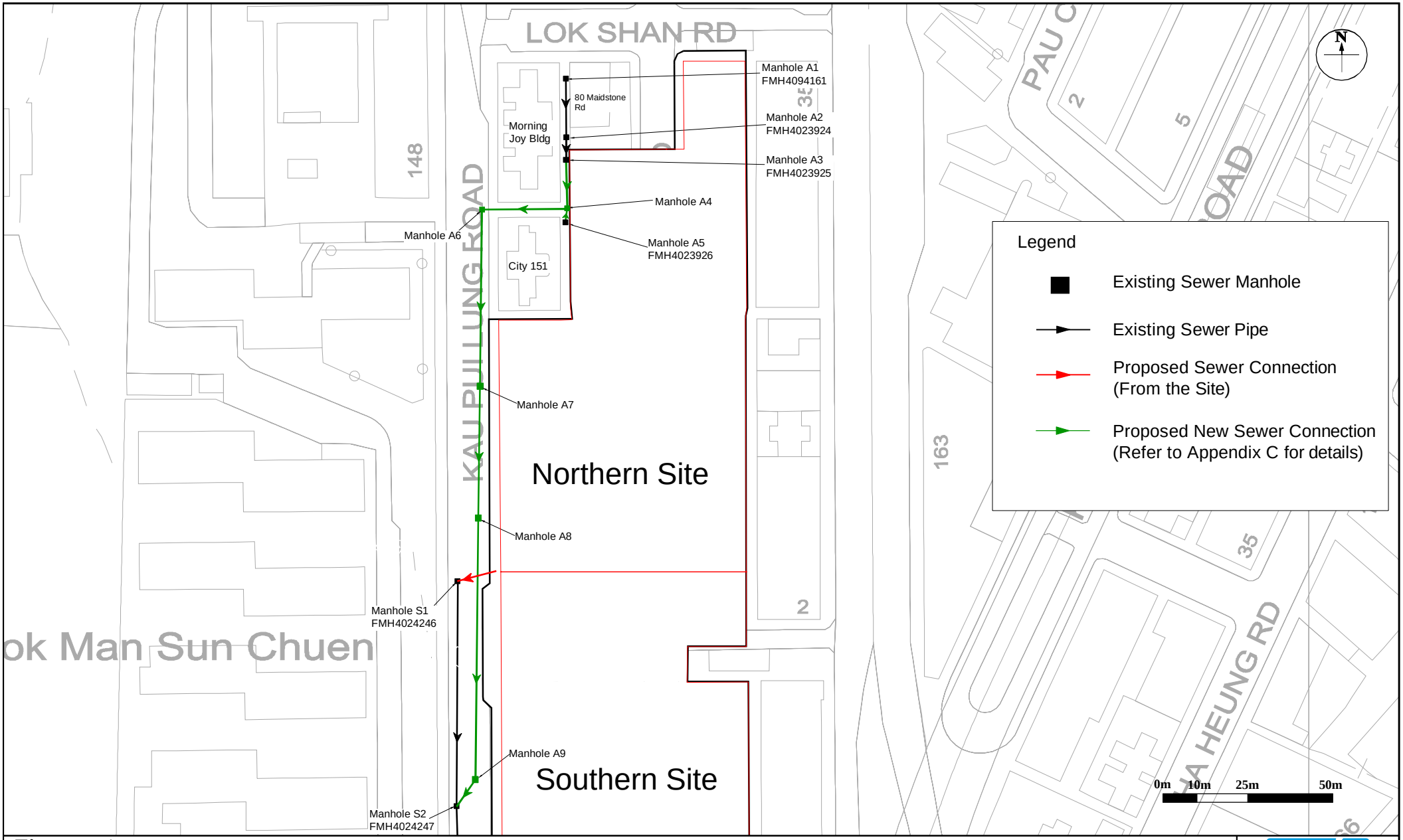
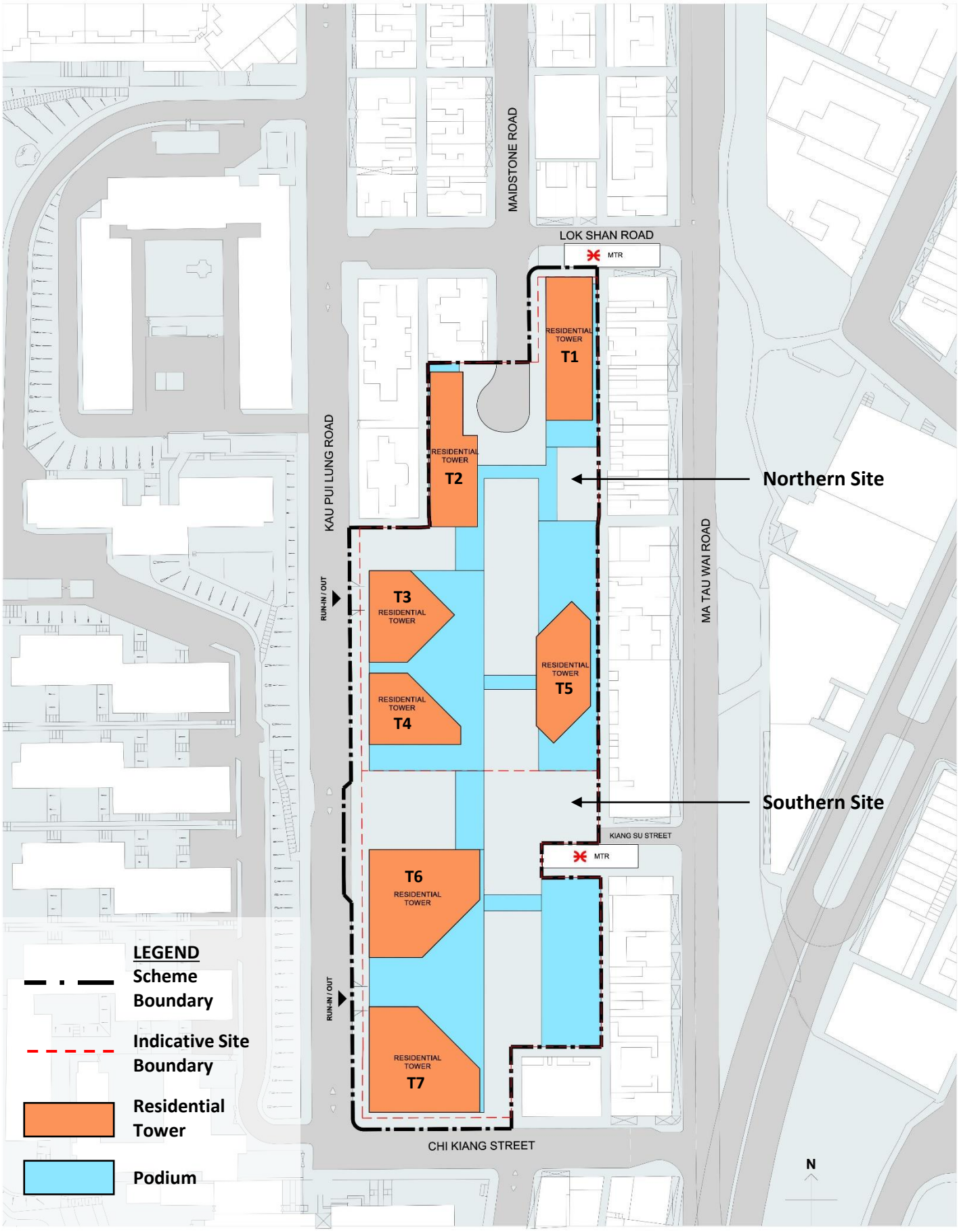


Figure: 4	RAMBOLL
Title: Arrangement of New Sewers Pipes for the 3 Adjacent Developments (Morning Joy Building, City 151 and 80 Maidstone Road)	Drawn by: KW Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 2.0 Date: Sep 2022

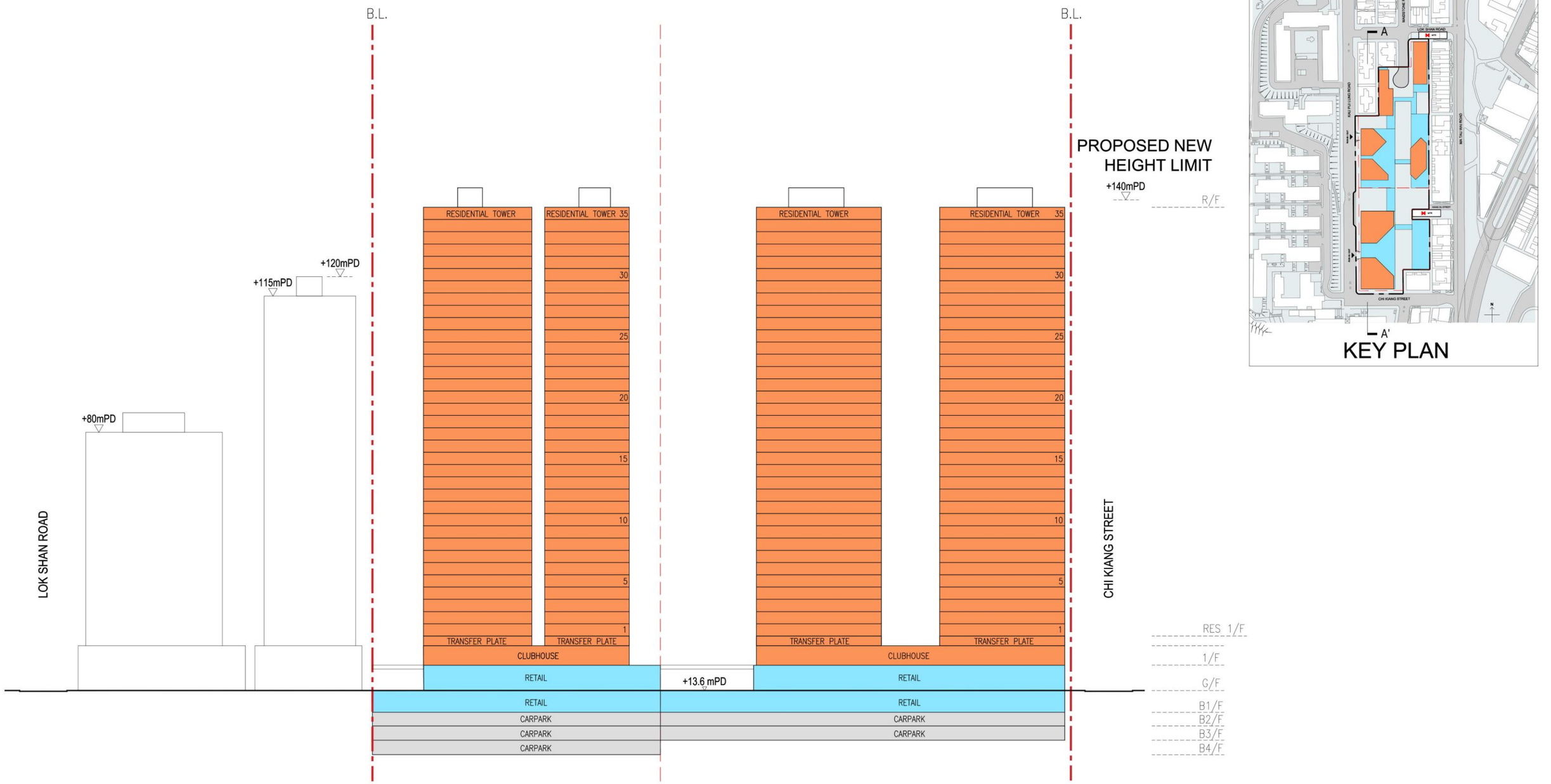
Q:\Projects\URACBS02EI00\05 Assessments\03 Water\v2.0\Fig 2 & 3 4 Sewer_v2.0.dwg

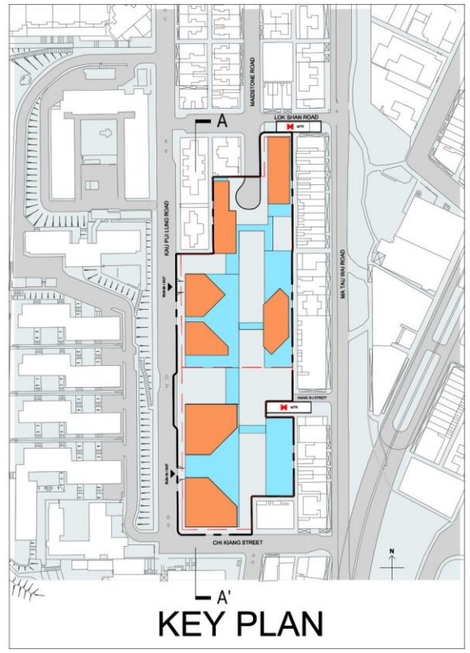
APPENDIX A:
LAYOUT PLANS



(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Indicative Block Plan	**Figure 1.1**





KEY PLAN

(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

APPENDIX B:
DETAILED SEWERAGE IMPACT ASSESSMENT CALCULATIONS

Table 1 Calculation for Sewage Generation Rate of the Proposed Development at the Subject Site

Northern Site

1. Residential Tower

1a. Total number of residential units	=	1450	units
1b. Total number of residents	=	4060	people -- (2016 Population Census: Average Household Size of 2.8)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**1096.2**	m^3/day

2. Clubhouse

2a. Assumed Area	=	3900	m^2
2b. Assumed floor area per employee	=	30.3	m^2 per worker -- (refer to Table 8 of CIFSUS - Community, Social & Personal Services)
2c. Total number of employees	=	129	employees
2d. Design flow for commercial activities	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
2e. Sewage Generation rate	=	**36.0**	m^3/day

3. Community Facilities

3a. Assumed Area	=	500	m^2
3b. Assumed floor area per employee	=	30.3	m^2 per worker -- (refer to Table 8 of CIFSUS - Community, Social & Personal Services)
3c. Total number of employees	=	17	employees
3d. Design flow for commercial activities and employee	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
3e. Sewage Generation rate	=	**4.6**	m^3/day

4. Retail (Restaurant)

4a. Assumed Area (1/5 of total area of Retail)	=	1820	m^2
4b. Assumed floor area per employee	=	19.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Restaurants)
4c. Total number of employees	=	93	employees
4d. Design flow for commercial activities and employee	=	1.58	m^3/employee/day -- (refer to Table T-2 of GESF - J10)
4e. Sewage Generation rate	=	**146.7**	m^3/day

5. Retail (Shop)

5a. Assumed Area (4/5 of total area of Retail)	=	7280	m^2
5b. Assumed floor area per employee	=	28.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Retail Trade)
5c. Total number of employees	=	255	employees
5d. Design flow for commercial activities and employee	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
5e. Sewage Generation rate	=	**71.3**	m^3/day

Total Flow from Proposed Development (Northern Site), connected to Manhole S1 (FMH4024246)

Flow Rate	=	1354.9	m^3/day
Contributing Population	=	5018	people
Peaking factor	=	5	Refer to Table T-5 of GESF for population 1,000-5,000 incl. stormwater allowance
Peak Flow	=	**78.41**	litre/sec

Table 1 Calculation for Sewage Generation Rate of the Proposed Development at the Subject Site

Southern Site

1. Residential Tower

1a. Total number of residential units	=	960	units
1b. Total number of residents	=	2688	people -- (2016 Population Census: Average Household Size of 2.8)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**725.8**	m^3/day

2. Community Facilities

2a. Assumed Area	=	2000	m^2
2b. Assumed floor area per employee	=	30.3	m^2 per worker -- (refer to Table 8 of CIFSUS - Community, Social & Personal Services)
2c. Total number of employees	=	66	employees
2d. Design flow for commercial activities and employee	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
2e. Sewage Generation rate	=	**18.5**	m^3/day

3. Retail (Restaurant)

3a. Assumed Area (1/5 of total area of Retail)	=	1400	m^2
3b. Assumed floor area per employee	=	19.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Restaurants)
3c. Total number of employees	=	71	employees
3d. Design flow for commercial activities and employee	=	1.58	m^3/employee/day -- (refer to Table T-2 of GESF - J10)
3e. Sewage Generation rate	=	**112.8**	m^3/day

4. Retail (Shop)

4a. Assumed Area (4/5 of total area of Retail)	=	5600	m^2
4b. Assumed floor area per employee	=	28.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Retail Trade)
4c. Total number of employees	=	196	employees
4d. Design flow for commercial activities and employee	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
4e. Sewage Generation rate	=	**54.9**	m^3/day

5. Clubhouse

5a. Assumed Area	=	3000	m^2
5b. Assumed floor area per employee	=	30.3	m^2 per worker -- (refer to Table 8 of CIFSUS - Community, Social & Personal Services)
5c. Total number of employees	=	99	employees
5d. Design flow for commercial activities	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
5e. Sewage Generation rate	=	**27.7**	m^3/day

Total Flow from Proposed Development (Southern Site), connected to Manhole S5 (FMH4024250)

Flow Rate	=	939.7	m^3/day
Contributing Population	=	3480	people
Peaking factor	=	6	Refer to Table T-5 of GESF for population 1,000-5,000 incl. stormwater allowance
Peak Flow	=	**65.25**	litre/sec

Table 2 Hydraulic Capacity of Existing Sewers

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
S1-S2	FMH4024246	FMH4024247	375	66.2	12.10	11.63	9.81	0.00060	0.007	0.000001	1.52	0.11	0.17	168.4
S2-S3	FMH4024247	FMH4024248	450	44.1	11.63	11.39	9.81	0.00060	0.005	0.000001	1.50	0.16	0.24	238.0
S3-S4	FMH4024248	FMH4024249	450	54.5	11.39	9.11	9.81	0.00060	0.042	0.000001	4.17	0.16	0.66	663.5
S4-S5	FMH4024249	FMH4024250	450	4.0	9.11	8.89	9.81	0.00060	0.055	0.000001	4.79	0.16	0.76	761.1
S5-S6	FMH4024250	FMH4024251	450	30.1	8.89	7.10	9.81	0.00060	0.059	0.000001	4.98	0.16	0.79	791.5
S6-S7	FMH4024251	FMH4024252	450	24.1	7.10	6.26	9.81	0.00060	0.035	0.000001	3.81	0.16	0.61	605.5
S7-S8	FMH4024252	FMH4024266	600	4.0	5.82	5.45	9.81	0.00060	0.093	0.000001	7.43	0.28	2.10	2101.8
S8-S9	FMH4024266	FMH4024253	600	14.5	5.44	5.24	9.81	0.00060	0.014	0.000001	2.86	0.28	0.81	809.3
S9-S10	FMH4024253	FMH4024254	600	12.3	5.24	4.99	9.81	0.00060	0.020	0.000001	3.48	0.28	0.98	983.3
S10-S11	FMH4024254	FMH4024255	600	27.1	4.99	4.60	9.81	0.00060	0.014	0.000001	2.92	0.28	0.83	826.8
S11-S12	FMH4024255	FMH4024256	600	77.1	4.60	3.33	9.81	0.00060	0.016	0.000001	3.13	0.28	0.88	884.8
S12-S13	FMH4024256	FMH4024257	600	15.1	3.33	2.58	9.81	0.00060	0.050	0.000001	5.44	0.28	1.54	1539.1
S13-S14	FMH4024257	FMH4024258	600	16.1	2.58	2.07	9.81	0.00060	0.032	0.000001	4.34	0.28	1.23	1228.4
S14-S15	FMH4024258	FMH4025854	600	42.4	1.86	1.68	9.81	0.00060	0.004	0.000001	1.58	0.28	0.45	447.4
S15-S16	FMH4025854	FMH4025855	600	51.3	1.68	1.43	9.81	0.00060	0.005	0.000001	1.70	0.28	0.48	479.6
S16-S17	FMH4025855	FMH4025856	600	76.1	1.43	1.11	9.81	0.00060	0.004	0.000001	1.57	0.28	0.45	445.3
S17-S18	FMH4025856	FMH4025767	600	17.7	1.11	-1.20	9.81	0.00060	0.131	0.000001	8.83	0.28	2.50	2497.2

Remarks: (1) g=gravitational acceleration; k_s=equivalent sand roughness; s=gradient; v=kinematic viscosity of water; V=mean velocity

(2a) The value of k_s = 0.6mm is adopted for slimed clayware sewer with V of approximately 1.2m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(2b) The value of k_s = 3.0mm is adopted for slimed clayware sewer with V of approximately 0.75m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(3) The value of velocity (V) is referred to the Tables for the hydraulic design of pipes, sewers and channels (8th edition)

(4) Equation used: $$V = -\sqrt{(8gDs)}\log\left(\frac{k_s}{3.7D} + \frac{2.51v}{D\sqrt{(2gDs)}}\right)$$

Table 2a Hydraulic Capacity of Proposed Upgraded Sewers

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
S14-S15	FMH4024258	FMH4025854	750	42.4	1.86	1.68	9.81	0.00060	0.004	0.000001	1.82	0.44	0.80	803.6
S15-S16	FMH4025854	FMH4025855	750	51.3	1.68	1.43	9.81	0.00060	0.005	0.000001	1.95	0.44	0.86	861.4
S16-S17	FMH4025855	FMH4025856	750	76.1	1.43	1.11	9.81	0.00060	0.004	0.000001	1.81	0.44	0.80	799.8

Table 3-1a Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment A1)

Catchment A1

1. Residential (Lok Man Sun Chuen (Block F & G))

1a. Total number of units	=	1223	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	3424	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**924.6**	m^3/day

Sub-total Catchment A1

Flow Rate	=	924.6	m^3/day

Total Flow at Manhole S1 (FMH4024246), including Proposed Development (Northern Site) and Catchment A1

Flow Rate	=	2279.4	m^3/day (Northern Site + Catchment A1)
Contributing Population	=	8442	people
Peaking factor	=	5	Refer to Table T-5 of GESF for population 5,000-10,000 incl. stormwater allowance
Peak Flow	=	**131.91**	litre/sec

Table 3-1b Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment A2)

Catchment A2

1. Residential (City 151, Morning Joy Bldg and 80 Maidstone Road)

1a. Total number of units	=	329	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	921	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**248.7**	m^3/day

Sub-total Catchment A2

Flow Rate	=	248.7	m^3/day

Total Flow at Manhole S2 (FMH4024247), including Proposed Development (Northern Site) and Catchment A1+A2

Flow Rate	=	2528.2	m^3/day (Northern Site + Catchment A1+A2)
Contributing Population	=	9364	people
Peaking factor	=	5	Refer to Table T-5 of GESF for population 5,000-10,000 incl. stormwater allowance
Peak Flow	=	**146.31**	litre/sec

Table 3-2 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment B)

Catchment B

1. Residential (Lok Man Sun Chuen (Block A to E)

1a. Total number of units	=	1542	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	4318	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**1165.8**	m^3/day

2. C.C.C WanChai Church Kei To Primary School (Kowloon City) *(https://ktkc.edu.hk/)*

2a. Total number of teachers & staff	=	37	teachers & staff
2c. Design flow for teachers & staff	=	0.28	m3/employee/day -- (refer to Table T-2 of GESF - J11)
2b. Total number of students	=	450	students
2d. Design flow for students	=	0.04	m^3/person/day (refer to Table T-2, School Student)
2e. Sewage Generation rate	=	**28.4**	m^3/day

Sub-total Catchment B

Flow Rate	=	1194.1	m^3/day

Total Flow at Manhole S3 (FMH4024248), including Proposed Development (Northern Site) and Catchment A1+A2+B

Flow Rate	=	3722.3	m^3/day (Northern Site + Catchment A1+A2+B)
Contributing Population	=	13786	people
Peaking factor	=	4	Refer to Table T-5 of GESF for population 10,000-50,000 incl. stormwater allowance
Peak Flow	=	**172.33**	litre/sec

Table 3-3 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment C)

Catchment C

1. Residential (Lok Man Sun Chuen (Block H & I)

1a. Total number of units	=	896	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	2509	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**677.4**	m^3/day

Sub-total Catchment C

Flow Rate	=	677.4	m^3/day

Total Flow at Manhole S5 (FMH4024250), including Proposed Development (Northern Site + Southern Site) and Catchment A1+A2+B+C

Flow Rate	=	5339.3	m^3/day (Northern Site + Southern Site + Catchment A1+A2+B+C)
Contributing Population	=	19775	people
Peaking factor	=	4	Refer to Table T-5 of GESF for population 10,000-50,000 incl. stormwater allowance
Peak Flow	=	**247.19**	litre/sec

Table 3-4 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment D)

Catchment D

1. Existing Residential Developments within Catchment Area

1a. Total number of units	=	204	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	571	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**154.2**	m^3/day

2. Commercial (Hop Shing Commercial Building)

2a. Assumed Area	=	2200	m^2 (20 storeys * ~110m2 per storey)
2b. Assumed floor area per employee	=	28.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Retail Trade)
2c. Total number of employees	=	77	employees
2d. Design flow for commercial activities	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
2e. Sewage Generation rate	=	**21.5**	m^3/day

Sub-total Catchment D

Flow Rate	=	175.8	m^3/day

Total Flow at Manhole S6 (FMH4024251), including Proposed Development (Northern Site + Southern Site) and Catchment A1+A2+B+C+D

Flow Rate	=	5515.1	m^3/day (Northern Site + Southern Site + Catchment A1+A2+B+C+D)
Contributing Population	=	20426	people
Peaking factor	=	4	Refer to Table T-5 of GESF for population 10,000-50,000 incl. stormwater allowance
Peak Flow	=	**255.33**	litre/sec

Table 3-5 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment E)

Catchment E

1. Existing Residential Developments within Catchment Area

1a. Total number of units	=	639	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	1789	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**483.1**	m^3/day

Sub-total Catchment E

Flow Rate	=	483.1	m^3/day

Total Flow at Manhole S8 (FMH4024266), including Proposed Development (Northern Site + Southern Site) and Catchment A1+A2+B+C+D+E

Flow Rate	=	5998.2	m^3/day (Northern Site + Southern Site + Catchment A1+A2+B+C+D+E)
Contributing Population	=	22215	people
Peaking factor	=	4	Refer to Table T-5 of GESF for population 10,000-50,000 incl. stormwater allowance
Peak Flow	=	**277.69**	litre/sec

Table 3-6 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment F)

Catchment F

1. Existing Residential Developments within Catchment Area

1a. Total number of units	=	3582	units (refer to Table 5 for the breakdown of units)
1b. Total number of residents	=	10030	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	**2708.0**	m^3/day

2. Existing Factory / Industrial Buildings

2a. Assumed Area	=	35070	m^2 (refer to Table 6 for the breakdown)
2b. Assumed floor area per employee	=	43.5	m^2 per employee -- (refer to Table 8 of CIFSUS - Manufacturing)
2c. Total number of employees	=	806	employees
2d. Design flow for industrial employee	=	0.63	m^3/employee/day -- (refer to Table T-3 of GESF - Central Kowloon)
2e. Sewage Generation rate	=	**507.9**	m^3/day

3. The Church of the God Shepherd

3a. Assumed area	=	700	m^2 (2 storeys * ~350m2 per storey)
3b. Assumed floor area per employee	=	30.3	m^2 per employee -- (refer to Table 8 of CIFSUS - Community, Social & Personal
3c. Total number of employees	=	23	employees
3d. Design flow for commercial activities	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
3e. Sewage Generation rate	=	**6.5**	m^3/day

4. Ko Shan Theatre

4a. Assumed area	=	18900	m^2 (refer to Table 6 for the breakdown)
4b. Assumed floor area per employee	=	30.3	m^2 per employee -- (refer to Table 8 of CIFSUS - Community, Social & Personal
4c. Assumed employees	=	624	employees
4d. Design flow for commercial activities	=	0.28	m^3/employee/day -- (refer to Table T-2 of GESF - J11)
4e. Sewage Generation rate	=	**174.6**	m^3/day

5. Planned URA Residential Developments, from Tower 2 of KC-016 (Catchment T2) and KC-012/013 (Catchment B) (Refer to Appendix D for the details)

5a. Sewage Generation rate	=	**738.2**	m^3/day

Sub-total Catchment F

Flow Rate	=	4135.2	m^3/day

Total Flow at Manhole S13 (FMH40424257), including Proposed Development (Northern Site + Southern Site) and Catchment A1+A2+B+C+D+E+F

Flow Rate	=	10133.4	m^3/day (Northern Site + Southern Site + Catchment A1+A2+B+C+D+E+F)
Contributing Population	=	37531	people
Peaking factor	=	4	Refer to Table T-5 of GESF for population 10,000-50,000 incl. stormwater allowance
Peak Flow	=	**469.14**	litre/sec

Table 4 Comparision of the Hydraulic Capacity of Existing Sewers for Sewerage generated from the Proposed Development and Surrounding Catchment Areas

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Proposed Development only (L/s)	Contribution from the Proposed Development only (%)	Status	Included Catchment Area	Peak Flow from the Proposed Development and Catchment Areas (L/s)	Contribution from the Proposed Development and the Surrounding Catchment Areas (%)	Status *
S1-S2	375	66.2	0.007	168.4	78.41	46.6%	OK	A1	131.91	78.3%	OK
S2-S3	450	44.1	0.005	238.0	78.41	32.9%	OK	A1 + A2	146.31	61.5%	OK
S3-S4	450	54.5	0.042	663.5	78.41	11.8%	OK	A1 + A2 + B	172.33	26.0%	OK
S4-S5	450	4.0	0.055	761.1	78.41	10.3%	OK	A1 + A2 + B	172.33	22.6%	OK
S5-S6	450	30.1	0.059	791.5	143.66	18.2%	OK	A1 + A2 + B + C	247.19	31.2%	OK
S6-S7	450	24.1	0.035	605.5	143.66	23.7%	OK	A1 + A2 + B + C + D	255.33	42.2%	OK
S7-S8	600	4.0	0.093	2101.8	143.66	6.8%	OK	A1 + A2 + B + C + D	255.33	12.1%	OK
S8-S9	600	14.5	0.014	809.3	143.66	17.8%	OK	A1 + A2 + B + C + D + E	277.69	34.3%	OK
S9-S10	600	12.3	0.020	983.3	143.66	14.6%	OK	A1 + A2 + B + C + D + E	277.69	28.2%	OK
S10-S11	600	27.1	0.014	826.8	143.66	17.4%	OK	A1 + A2 + B + C + D + E	277.69	33.6%	OK
S11-S12	600	77.1	0.016	884.8	143.66	16.2%	OK	A1 + A2 + B + C + D + E	277.69	31.4%	OK
S12-S13	600	15.1	0.050	1539.1	143.66	9.3%	OK	A1 + A2 + B + C + D + E	277.69	18.0%	OK
S13-S14	600	16.1	0.032	1228.4	143.66	11.7%	OK	A1 + A2 + B + C + D + E + F	469.14	38.2%	OK
S14-S15	600	42.4	0.004	447.4	143.66	32.1%	OK	A1 + A2 + B + C + D + E + F	469.14	104.9%	Spill
S15-S16	600	51.3	0.005	479.6	143.66	30.0%	OK	A1 + A2 + B + C + D + E + F	469.14	97.8%	Spill
S16-S17	600	76.1	0.004	445.3	143.66	32.3%	OK	A1 + A2 + B + C + D + E + F	469.14	105.4%	Spill
S17-S18	600	17.7	0.131	2497.2	143.66	5.8%	OK	A1 + A2 + B + C + D + E + F	469.14	18.8%	OK

Table 4a Comparision of the Hydraulic Capacity of Existing Sewers for Sewerage generated from the Proposed Development and Surrounding Catchment Areas (After Upgrade)

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Proposed Development only (L/s)	Contribution from the Proposed Development only (%)	Status	Included Catchment	Peak Flow from the Proposed Development and Catchment Areas (L/s)	Contribution from the Proposed Development and the Surrounding Catchment Areas (%)	Status *
S14-S15	750	42.4	0.004	803.6	143.66	17.9%	OK	A1 + A2 + B + C + D + E + F	469.14	58.4%	OK
S15-S16	750	51.3	0.005	861.4	143.66	16.7%	OK	A1 + A2 + B + C + D + E + F	469.14	54.5%	OK
S16-S17	750	76.1	0.004	799.8	143.66	18.0%	OK	A1 + A2 + B + C + D + E + F	469.14	58.7%	OK

Note: * "Spill" if the contribution is larger than 90%.

Table 5 Breakdown for the estimation of residential units within each catchment area

Catchment A1	Units
Lok Man Sun Chuen (Block F and G)	1223

Catchment A2	Units
City 151	71
Morning Joy Bldg	166
80 Maidstone Road	92
Total	**329**

Catchment B	Units
Lok Man Sun Chuen (Block A to E)	1542

Catchment C	Units
Lok Man Sun Chuen (Block H & I)	896

Catchment D	Units
Tai Tung Court	12
Fook Yue Mansion	30
Loyal Mansion	140
Chap On Building	12
4 & 6 Anhui Street	10
Total	**204**

Catchment E	Units
Ming Fat Building	83
Seng Cheong Building	10
On Chun Mansion	56
282 Ma Tau Wai Road	5
284 Ma Tau Wai Road	3
284A Ma Tau Wai Road	4
286 Ma Tau Wai Road	3
Pak Kin Building	28
Hau Hing Mansion	15
Wah On Court	9
Lucky Building	214
Braemar Court	48
Kwong Yiu Mansion	42
Mai Lok Building	27
324 Ma Tau Wai Road	4
326 Ma Tau Wai Road	6
328 Ma Tau Wai Road	5
330 Ma Tau Wai Road	8
332 Ma Tau Wai Road	8
334 Ma Tau Wai Road	5
336 Ma Tau Wai Road	5
338 Ma Tau Wai Road	5
340 Ma Tau Wai Road	5
342 Ma Tau Wai Road	5
344 Ma Tau Wai Road	2
346 Ma Tau Wai Road	7
348 Ma Tau Wai Road	5
350 Ma Tau Wai Road	5
352-354 Ma Tau Wai Road	17
Total	**639**

Catchment F	Units
I-Feng Mansions	823
Tung Shun Hing Building	182
L-harbour 18	84
Wang Fung Building	152
Ngan Hon Mansion	78
Po Teck Mansion	180
Lung Teck Mansion	180
Sunrise Villa	180
Eiver House	0
4-18 Kai Min Street	0
1-27 Wing Kwong Street	0
111-127 Ma Tau Wai Road	0
Wing Kwong Mansion	0
Wan Tat House	0
2-4 Wing Kwong Street	0
71-73 Ma Tau Wai Road	12
Viva	75
95-109 Ma Tau Wai Road	42
Sin Hua Mansion	37
Fuk Shing Mansion	50
1-19 Wan Fat Street	0
2-20 Wan Hing Street	0
1-19 Wan Hing Street	0
2-20 Wan Lok Street	0
1-19 Wan Lok Street	0
3-21 Bailey Street	0
Chat Ma Mansion	65
204-206 Ma Tau Wai Road	26
Axis	120
Honour Court	36

Catchment F	Units
Morning Ray Mansion	22
Co-tack Building	56
1-9 Shek Tong Street	15
480, 482, 494 Chatham Road North	9
Cheong Shing Court	120
Tsun Kit House	20
470-478 Chatham Road North	37
90-92 Ko Shan Road	12
Kar Shun Building	44
222- 236 Ma Tau Wai Road	28
Faerie Court	156
On Hang Building	35
Chatham Mansion	23
Lee Wing Building (3 Shansi Street)	87
Comfort House	75
The City Culture	19
Fortuna Building	72
Wing Wo Building	84
Lung Wah Court	21
Wealthy Court	72
Wing Lam Mansion	92
Po Fai Building	48
75 Ma Tau Wai Road	2
Planned use for 18-24 Ko Shan Rd	60
Planned use for 3 San Lau Street	51
Total	**3582**

Note:

The existing buildings will be redeveloped to URA Project KC-009, they will not be included in Catchment F

The existing buildings will be redeveloped to URA Project KC-012/013, their sewage generation is calculated seperately in Table 3-6, Item 5

The existing buildings will be redeveloped to URA Project KC-016, their sewage generation is calculated seperately in Table 3-6, Item 5

Table 6 Breakdown for the estimation of Area of Industrial Buildings and Ko Shan Theatre within catchment area F

Catchment F	**Estimated Gross Floor Area (m2) / Storey**	**Storey**	**Total Estimated Gross Floor Area (m2)**
Industrial Buildings			
Gee Chang Industrial Building	1400	9	12600
Fook Shing Industrial Building	700	12	8400
Man Shun Factory Building	315	11	3465
The World Wide Industrial Building	315	12	3780
Fung Yu Industrial Building	525	13	6825
		Total	**35070**
Ko Shan Theatre			
Ko Shan Theatre	1900	3	5700
Ko Shan Theatre New Wing	2200	6	13200
		Total	**18900**

APPENDIX C:
ARRANGEMENT OF NEW SEWERS PIPES FOR THE ADJACENT DEVELOPMENTS

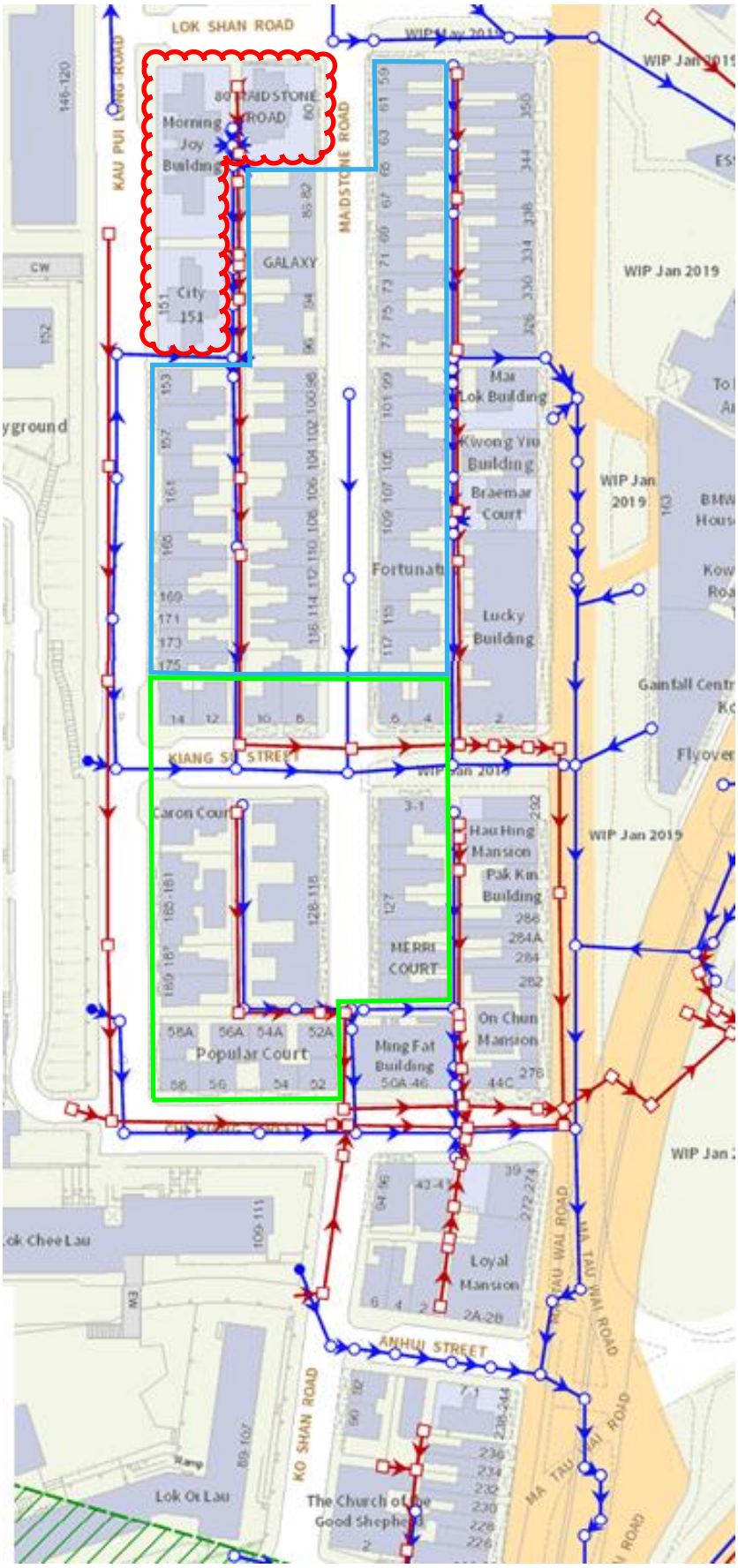

LOK SHAN ROAD
KAU PUI LUNG ROAD
MADSTONE ROAD
Morning Joy Building
GALAXY
City 151
Mai Lok Building
Kwong Yiu Building
Braemar Court
Fortunat
Lucky Building
KIANG ST STREET
Caron Cour
Hau Hing Mansion
Pak Kin Building
MERRI COURT
Popular Court
Ming Fat Building
On Chun Mansion
Loyal Mansion
ANHUI STREET
KO SHAN ROAD
MA TAU WAI ROAD
Lok Chee Lau
Lok Oi Lau
The Church of the Good Shepherd
WIP Jan 2019
Northern Site
Southern Site
Sewer pipe

Table C1 Calculation for Sewage Generation Rate of the Existing Surrounding Building (Catchment A2)

Catchment A2

1. Residential (Morning Joy Bldg and 80 Maidstone Road)

1a. Total number of units	=	258	units
1b. Total number of residents	=	722	people -- (average household size of 2.8 from 2016 Population Census)
1c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
1d. Sewage Generation rate	=	195.0	m^3/day
1e. Contributing Population	=	722	people
1f. Peaking factor	=	8	Refer to Table T-5 of GESF for population <1,000 incl. stormwater allowance
1g. Peak Flow	=	**18.06**	litre/sec

2. Residential (City 151)

2a. Total number of units	=	71	units
2b. Total number of residents	=	199	people -- (average household size of 2.8 from 2016 Population Census)
2c. Design flow	=	0.27	m^3/person/day -- (Private R2 in Table T-1 of GESF)
2d. Sewage Generation rate	=	53.7	m^3/day
2e. Contributing Population	=	199	people
2f. Peaking factor	=	8	Refer to Table T-5 of GESF for population <1,000 incl. stormwater allowance
2g. Peak Flow	=	**4.97**	litre/sec

Table C2 Hydraulic Capacity of Existing and New Sewers

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
A1-A2	FMH4094161	FMH4023924	225	17.4	13.17	13.02	9.81	0.00060	0.009	0.000001	1.21	0.04	0.05	48.2
A2-A3	FMH4023924	FMH4023925	150	6.6	12.72	12.51	9.81	0.00060	0.032	0.000001	1.80	0.02	0.03	31.8
A3-A4	FMH4023925	A4	300	14.0	12.51	12.35	9.81	0.00060	0.011	0.000001	1.68	0.07	0.12	118.9
A5-A4	FMH4023926	A4	300	3.5	12.45	12.35	9.81	0.00060	0.029	0.000001	2.67	0.07	0.19	188.5
A4-A6	A4	A6	300	25.0	12.35	12.25	9.81	0.00300	0.004	0.000001	0.79	0.07	0.06	55.5
A6-A7	A6	A7	300	52.0	12.25	12.10	9.81	0.00300	0.003	0.000001	0.67	0.07	0.05	47.1
A7-A8	A7	A8	300	39.0	12.10	11.90	9.81	0.00060	0.005	0.000001	1.12	0.07	0.08	79.3
A8-A9	A8	A9	300	77.0	11.90	11.70	9.81	0.00300	0.003	0.000001	0.63	0.07	0.04	44.7
A9-S2	A9	FMH4024247	300	9.8	11.70	11.63	9.81	0.00060	0.007	0.000001	1.33	0.07	0.09	93.8

Remarks: (1) g=gravitational acceleration; k_s=equivalent sand roughness; s=gradient; v=kinematic viscosity of water; V=mean velocity

(2a) The value of k_s = 0.6mm is adopted for slimed clayware sewer with V of approximately 1.2m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(2b) The value of k_s = 3.0mm is adopted for slimed clayware sewer with V of approximately 0.75m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(3) The value of velocity (V) is referred to the Tables for the hydraulic design of pipes, sewers and channels (8th edition)

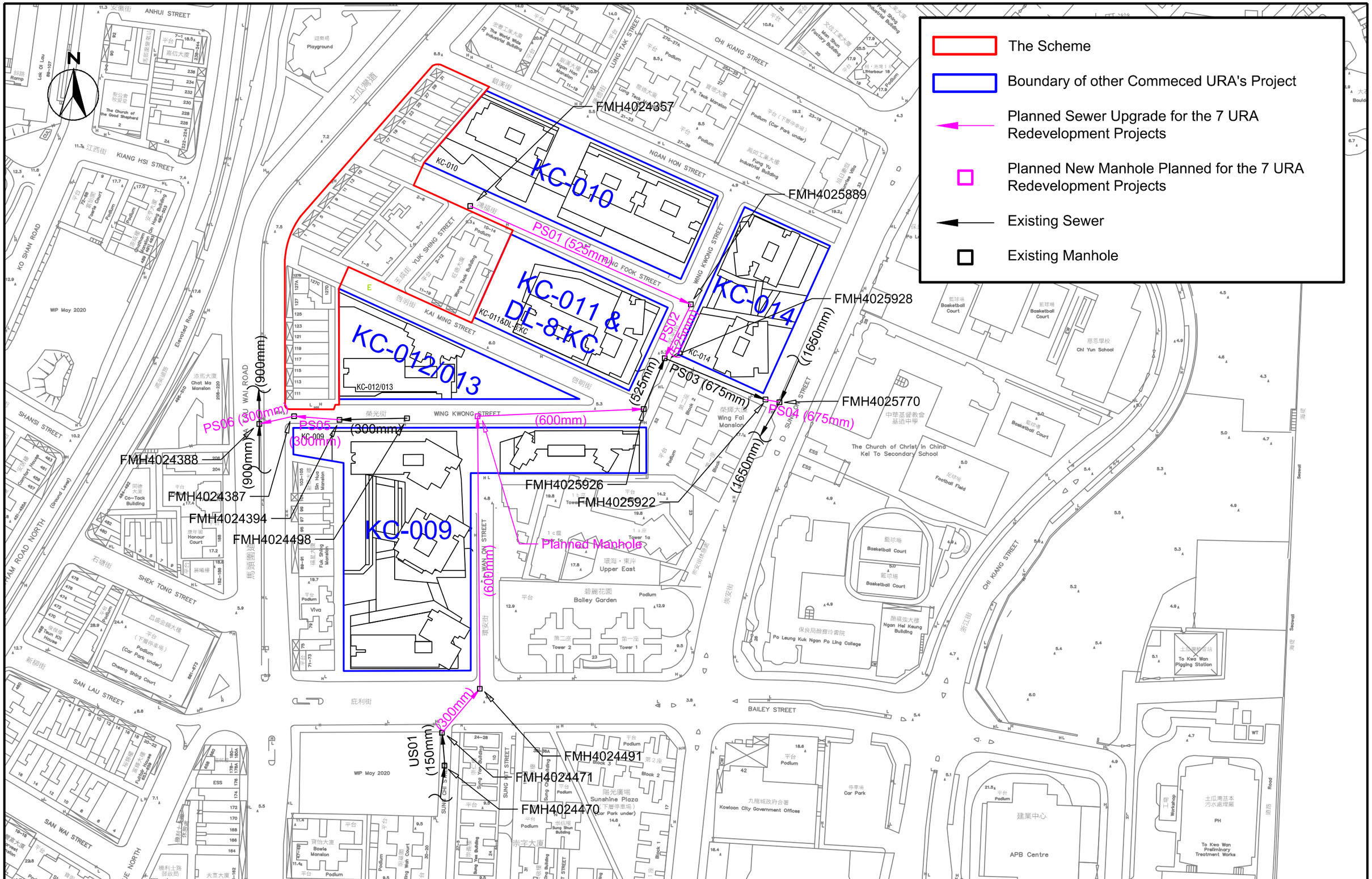
(4) Equation used: $$V = -\sqrt{(8gDs)}\log\left(\frac{k_s}{3.7D} + \frac{2.51v}{D\sqrt{(2gDs)}}\right)$$

Table C3 Comparision of the Hydraulic Capacity of Existing and Propsoed Sewers for Sewerage generated from Catchment A2

Segment	Manhole Reference	Manhole Reference	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Catchment (L/s)	Contribution from Catchment A2 only (%)	Status
A1-A2	FMH4094161	FMH4023924	225	17.4	0.009	48.2	18.06	37.4%	OK
A2-A3	FMH4023924	FMH4023925	150	6.6	0.032	31.8	18.06	56.7%	OK
A3-A4	FMH4023925	A4	300	14.0	0.011	118.9	18.06	15.2%	OK
A5-A4	FMH4023926	A4	300	3.5	0.029	188.5	4.97	2.6%	OK
A4-A6	A4	A6	300	25.0	0.004	55.5	23.03	41.5%	OK
A6-A7	A6	A7	300	52.0	0.003	47.1	23.03	48.9%	OK
A7-A8	A7	A8	300	39.0	0.005	79.3	23.03	29.0%	OK
A8-A9	A8	A9	300	77.0	0.003	44.7	23.03	51.5%	OK
A9-S2	A9	FMH4024247	300	9.8	0.007	93.8	23.03	24.6%	OK

Note: * "Spill" if the contribution is larger than 90%.

APPENDIX D:
EXTRACTED PAGES FROM THE SIA REPORT FOR URA PROJECT KC-016



CINOTECH
Cinotech Consultants Limited

Urban Renewal Authority Development Scheme To Kwa Wan Road / Wing Kwong Street (KC-016)

Planned Sewer Upgrade for the 7 URA Redevelopment Projects and the Neighborhood

SCALE	1:1500 @ A3	DATE	July 2020
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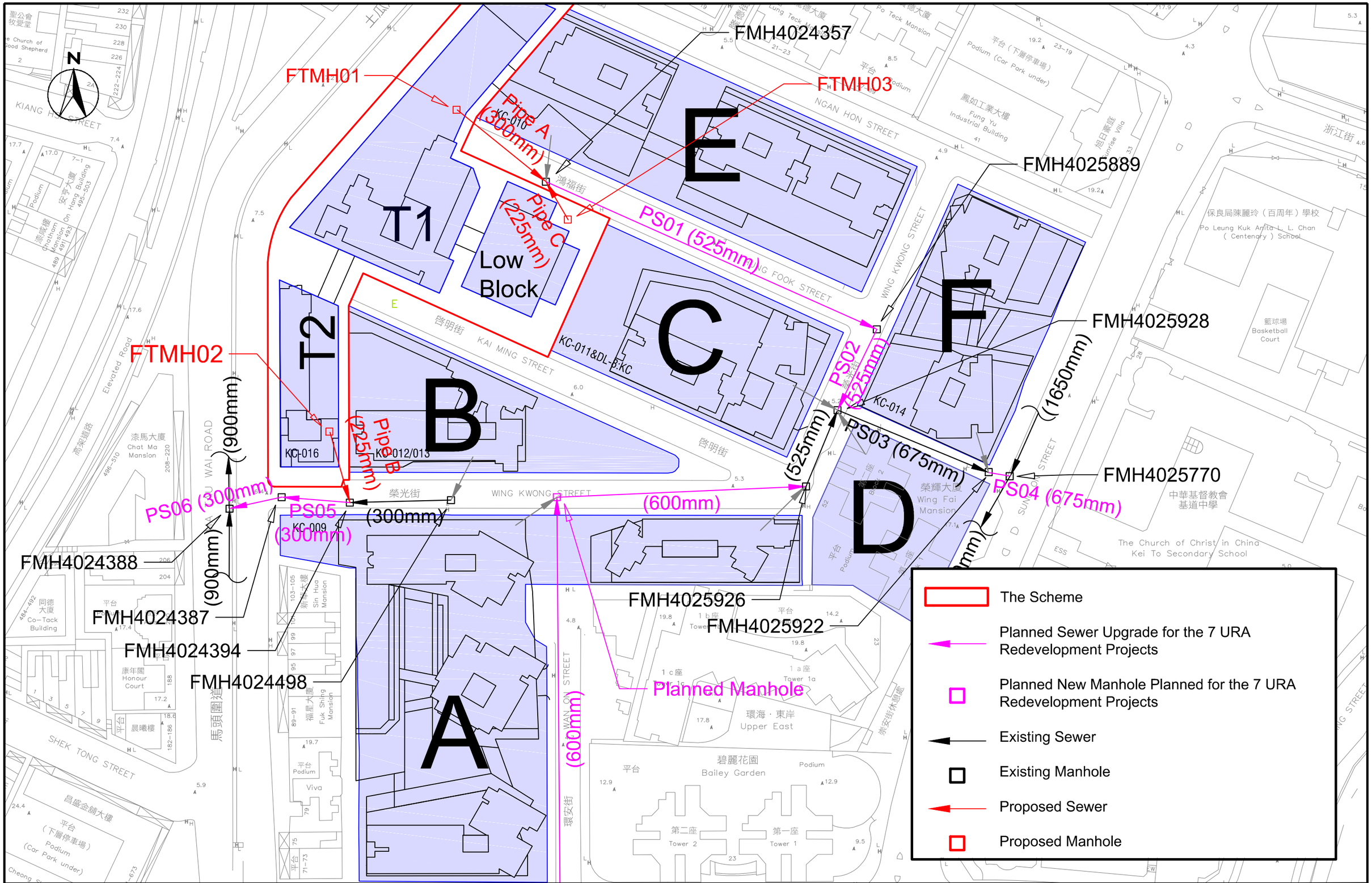
JOB No.	IA19021-KCAA101	DRAWING No.	2-2
		REV	-



CINOTECH
Cinotech Consultants Limited

Urban Renewal Authority Development Scheme To Kwa Wan Road / Wing Kwong Street (KC-016)

Sewage Catchments in the Vicinity with the Scheme

SCALE	1:1000 @ A3	DATE	March 2021
CHECK	TL	DRAWN	CC
JOB No.	IA19021-KCAA101	DRAWING No.	3-2
		REV	-

Appendix III

Table B - Proportion of Peak Flow to Full Capacity without the Scheme

Segment	Upstream Manhole	Downstream Manhole	Full Capacity (L/s)	Catchment	Total Daily Flow (m^3/day)[5]	Contribution Population [1]	Peaking Factor [2]	Peak Flow (L/s) [3][5]	Inflow factor [4]	Peak Flow with Inflow factor (L/s)	% of full capacity
PS01	FMH4024357	FMH4025889	396.6	Site Area - Northern Portion + E	1141.3	4227	6	79.3	1.3	103.0	26.0%
PS02	FMH4025889	FMH4025928	392.4	Site Area - Northern Portion + E	1141.3	4227	6	79.3	1.3	103.0	26.3%
PS03	FMH4025928	FMH4025922	735.1	Site Area - Northern Portion + A + C + D + E + US01	3076.9	11396	4	156.5	1.3	203.5	27.7%
PS04	FMH4025922	FMH4025770	756.6	Site Area - Northern Portion + A + C + D + E + F + US01	3593.4	13309	4	180.4	1.3	234.6	31.0%
PS05	FMH4024394	FMH4024387	122.8	Site Area - Southern Portion + B	596.1	2208	6	41.4	1.3	53.8	43.8%
PS06	FMH4024387	FMH4024388	113.4	Site Area - Southern Portion + B	596.1	2208	6	41.4	1.3	53.8	47.5%

Table C - Proportion of Peak Flow to Full Capacity with the Scheme

Segment	Upstream Manhole	Downstream Manhole	Full Capacity (L/s)	Catchment	Total Daily Flow (m^3/day)[5]	Contribution Population [1]	Peaking Factor [2]	Peak Flow (L/s) [3]	Inflow factor [4]	Peak Flow with Inflow factor (L/s)	% of full capacity
PS01	FMH4024357	FMH4025889	396.6	T1 + Low Block + E	1721.3	6375	5	99.6	1.3	129.5	32.7%
PS02	FMH4025889	FMH4025928	392.4	T1 + Low Block + E	1721.3	6375	5	99.6	1.3	129.5	33.0%
PS03	FMH4025928	FMH4025922	735.1	T1 + Low Block + A + C + D + E + US01	3657.0	13544	4	183.4	1.3	238.4	32.4%
PS04	FMH4025922	FMH4025770	756.6	T1 + Low Block + A + C + D + E + F + US01	4173.4	15457	4	207.3	1.3	269.5	35.6%
PS05	FMH4024394	FMH4024387	122.8	T2 + B	738.2	2734	6	51.3	1.3	66.6	54.3%
PS06	FMH4024387	FMH4024388	113.4	T2 + B	738.2	2734	6	51.3	1.3	66.6	58.8%

Note:

1 The contribution population is total flow rate (m^3/day) / 0.27 (m^3/day/person)

2 - Peaking Factor of 8 for contributing population < 1,000 ;
- Peaking Factor of 6 for contributing population 1,000 - 5,000.
- Peaking Factor of 4 for contributing population 10,000 - 50,000.
are adopted.

3 The peak flow is total flow rate of each pipe segment * peaking factor.

4 Catchment inflow factor of 1.3 for North West Kowloon, instead of Central kowloon, according to EPD's Guidelines for Estimating Sewage Flows Table T-4 has been adopted as suggested by EPD.

5 The discharge from the upsteam sewer US01 is not included in the daily flow. Instead, the capacity of US01 has been added to Peak flow directly for conservative assessment.

SIA (RtoC_8)

(Feb 2023)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Sewerage Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
December 2022

Reference Number:
R6775_v2.1

2.4.2 As a conservative assessment, it is assumed Northern Site provides 1450 residential units, clubhouses (about 3,900m^2), retail (about 9,100m^2) and community facilities (about 500m^2).

2.4.3 It is also assumed that Southern Site provides 960 residential units, clubhouses (about 3,000m^2), retail (about 7,000m^2) and community facilities (about 2,000m^2).

2.4.4 The usage of the retail for both Northern Site and Southern Site has yet been confirmed. As a conservative approach, the area of retail for restaurant : shop is assumed as 1:4 for this assessment.

2.4.5 A Person-per-Flat (PPF) of 2.3 is assumed for the area, which has made reference to HKPSG and adopted a more conservative assumption than HKPSG recommendation. In order to assess the sewer capacities, a sensitivity test adding 22% is adopted to assess the adequacy of the sewer capacities (i.e. PPF 2.3 x 122%).

2.5 Assessment of Sewerage Impact

2.5.1 After the redevelopment, sewage generated from Northern Site is proposed to be discharged to the existing sewerage system along Kau Pui Lung Road to manhole S1 (FMH4024246). Sewage generated from Southern Site is proposed to be discharged to the existing sewerage system along Chi Kiang Street to manhole S5 (FMH4024250), as shown in **Figure 2**.

2.5.2 The sewage generation rate of the proposed development is summarized in **Table 1** below and the detailed calculation is shown in **Table 1 of Appendix B**.

Table 1 Estimated Average and Peak Flow Rate from the Proposed Development

	Northern Site	Southern Site	Total
Average Flow Rate (m^3/day)	1354.9	939.7	-
Peak Flow Rate (L/s)	78.41	65.25	143.66

2.5.3 **Table 2 of Appendix B** shows the detailed calculation on the estimated hydraulic capacity of the existing sewer sections. According to **Table 4 of Appendix B**, it is found that the existing sewerage system has sufficient capacity to cater the sewage generated from the proposed development and the catchment, except 3 existing sewer segments S14-S17 (manhole no. FMH4024258 - FMH4025856) along Chi Kiang Street.

2.5.4 The 3 existing sewer segments S14-S17 are proposed to be upgraded from 600mm dia. to 750mm dia. The material for the proposed sewer pipe is slimed clayware or concrete with protective liner or other materials preferred from operation and maintenance aspects as appropriate. The project proponent (URA), or its joint venture partner(s), or its assignee will be responsible for the necessary upgrades of 3 existing sewer segments S14-S17 prior to the sewer connection works from the proposed development to public sewerage.

2.6 Arrangement of New Sewers Pipes for the Adjacent Developments

2.6.1 According to the Drainage Records shown in **Appendix C**, some existing sewers connecting the residential developments pass though the Subject Site. It is intended to divert sewer pipes for 3 adjacent residential buildings (Morning Joy Building, City 151 and 80 Maidstone Road).

2.6.2 As shown in **Figure 4**, 7 new sewer pipes (A3-A4, A5-A4, A4-A6, A6-A7, A7-A8, A8-A9, A9-S2) with 300mm dia. are proposed and ultimately reconnected to the existing public sewer manhole S2 (manhole no. FMH4024247) at Kau Pui Lung Road.

2.6.3 **Table C3 of Appendix C** shows the new sewerage system can cater the sewerage generation from the 3 buildings. The material for the proposed sewer pipe is slimed clayware. The project proponent (URA), or its joint venture partner(s), or its assignee will be responsible for the sewer construction and connection of 7 new sewer pipes for the 3 adjacent residential buildings prior to the sewer connection works from the proposed development to public sewerage.

2.6.4 The exact dimension and alignment of the proposed new sewer pipes will be reviewed in the detailed design stage. If the proposed alignment would be modified, update of the SIA will be conducted accordingly.

3. Overall Conclusion

3.1.1 Sewerage impact assessments was conducted based on the latest proposed development parameters for the redevelopment project at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

3.1.2 Based on the sewerage impact assessment results, it is found that the capacity of the existing sewerage system serving the area would be sufficient to cater for the sewage generation from the proposed development, except 3 existing sewer segments are required to be upgraded. After upgrading work, the capacity of the concerned sewer network will be capable to collect sewage from the Proposed Development and the existing buildings upstream of the Proposed Development.

3.1.3 Seven (7) new sewer pipes are proposed for the proposed development, which will be connected to the existing public sewer manhole S2 (manhole no. FMH4024247) at Kau Pui Lung Road. Besides, diversion works for some existing sewer pipes serving the adjoining existing residential developments and currently passing through the subject site will be made at implementation, by the project proponent (URA), or its joint venture partner(s), or its assignee.

3.1.4 With the above assessment and proposed diversion/upgrading measures, this SIA confirms that there are no unacceptable sewerage impacts as a result of the proposed development.

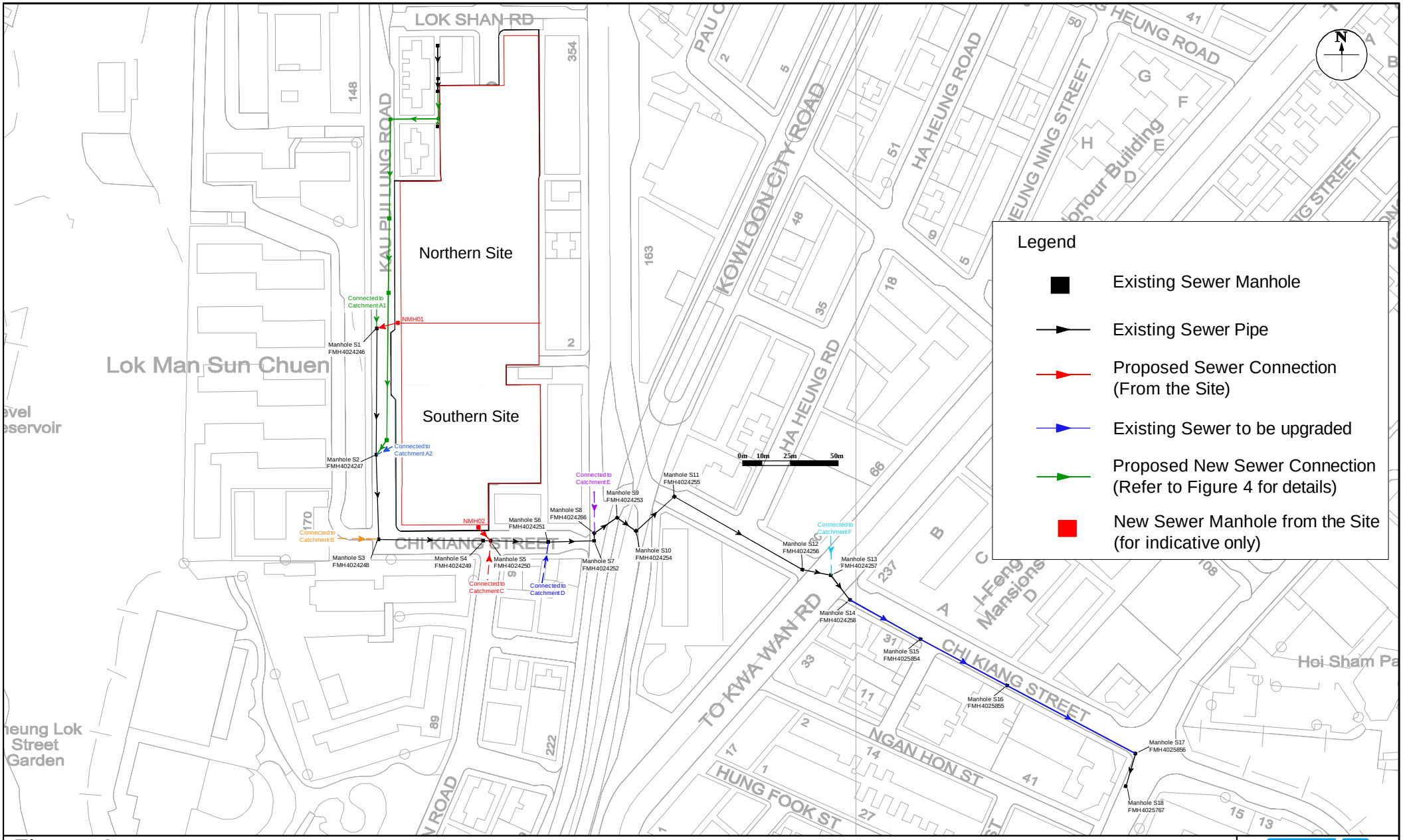


Figure: 2

Title: Existing Sewerage System in Vicinity of the Subject Site

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	2.1
Date:	Dec 2022

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APPENDIX B:
DETAILED SEWERAGE IMPACT ASSESSMENT CALCULATIONS

Table 2 Hydraulic Capacity of Existing Sewers

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
S1-S2	FMH4024246	FMH4024247	375	66.2	12.10	11.63	9.81	0.00060	0.007	0.000001	1.52	0.11	0.17	168.4
S2-S3	FMH4024247	FMH4024248	450	44.1	11.63	11.39	9.81	0.00060	0.005	0.000001	1.50	0.16	0.24	238.0
S3-S4	FMH4024248	FMH4024249	450	54.5	11.39	9.11	9.81	0.00060	0.042	0.000001	4.17	0.16	0.66	663.5
S4-S5	FMH4024249	FMH4024250	450	4.0	9.11	8.89	9.81	0.00060	0.055	0.000001	4.79	0.16	0.76	761.1
S5-S6	FMH4024250	FMH4024251	450	30.1	8.89	7.10	9.81	0.00060	0.059	0.000001	4.98	0.16	0.79	791.5
S6-S7	FMH4024251	FMH4024252	450	24.1	7.10	6.26	9.81	0.00060	0.035	0.000001	3.81	0.16	0.61	605.5
S7-S8	FMH4024252	FMH4024266	600	4.0	5.82	5.45	9.81	0.00060	0.093	0.000001	7.43	0.28	2.10	2101.8
S8-S9	FMH4024266	FMH4024253	600	14.5	5.44	5.24	9.81	0.00060	0.014	0.000001	2.86	0.28	0.81	809.3
S9-S10	FMH4024253	FMH4024254	600	12.3	5.24	4.99	9.81	0.00060	0.020	0.000001	3.48	0.28	0.98	983.3
S10-S11	FMH4024254	FMH4024255	600	27.1	4.99	4.60	9.81	0.00060	0.014	0.000001	2.92	0.28	0.83	826.8
S11-S12	FMH4024255	FMH4024256	600	77.1	4.60	3.33	9.81	0.00060	0.016	0.000001	3.13	0.28	0.88	884.8
S12-S13	FMH4024256	FMH4024257	600	15.1	3.33	2.58	9.81	0.00060	0.050	0.000001	5.44	0.28	1.54	1539.1
S13-S14	FMH4024257	FMH4024258	600	16.1	2.58	2.07	9.81	0.00060	0.032	0.000001	4.34	0.28	1.23	1228.4
S14-S15	FMH4024258	FMH4025854	600	42.4	1.86	1.68	9.81	0.00060	0.004	0.000001	1.58	0.28	0.45	447.4
S15-S16	FMH4025854	FMH4025855	600	51.3	1.68	1.43	9.81	0.00060	0.005	0.000001	1.70	0.28	0.48	479.6
S16-S17	FMH4025855	FMH4025856	600	76.1	1.43	1.11	9.81	0.00060	0.004	0.000001	1.57	0.28	0.45	445.3
S17-S18	FMH4025856	FMH4025767	600	17.7	1.11	-1.20	9.81	0.00060	0.131	0.000001	8.83	0.28	2.50	2497.2

Remarks: (1) g=gravitational acceleration; k_s=equivalent sand roughness; s=gradient; v=kinematic viscosity of water; V=mean velocity

(2a) The value of k_s = 0.6mm is adopted for slimed clayware sewer with V of approximately 1.2m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(2b) The value of k_s = 3.0mm is adopted for slimed clayware sewer with V of approximately 0.75m/s, poor condition (based on Table 5: Recommended roughness values in Sewerage Manual)

(3) The value of velocity (V) is referred to the Tables for the hydraulic design of pipes, sewers and channels (8th edition)

(4) Equation used: $$V = -\sqrt{(8gDs)}\log\left(\frac{k_s}{3.7D} + \frac{2.51v}{D\sqrt{(2gDs)}}\right)$$

Table 2a Hydraulic Capacity of Proposed Upgraded Sewers

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
S14-S15	FMH4024258	FMH4025854	750	42.4	1.86	1.68	9.81	0.00060	0.004	0.000001	1.82	0.44	0.80	803.6
S15-S16	FMH4025854	FMH4025855	750	51.3	1.68	1.43	9.81	0.00060	0.005	0.000001	1.95	0.44	0.86	861.4
S16-S17	FMH4025855	FMH4025856	750	76.1	1.43	1.11	9.81	0.00060	0.004	0.000001	1.81	0.44	0.80	799.8

Table 2b Hydraulic Capacity of Proposed Sewers (Connection from the Sites to existing terminal manholes S1 and S5)

Segment	Manhole Reference	Manhole Reference	Pipe Dia.	Pipe Length	Upstream Invert Level	Downstream Invert Level	g	k_s	s	v	V	Area	Q	Estimated Capacity
			mm	m	mPD	mPD	m/s^2	m		m^2/s	m/s	m^2	m^3/s	L/s
NMH01-S1	NMH01	FMH4024246	225	10.7	13.00	12.10	9.81	0.00060	0.084	0.000001	3.82	0.04	0.15	151.7
NMH02-S5	NMH02	FMH4024250	225	8.8	10.40	8.89	9.81	0.00060	0.172	0.000001	5.46	0.04	0.22	216.9

Table 4 Comparision of the Hydraulic Capacity of Existing Sewers for Sewerage generated from the Proposed Development and Surrounding Catchment Areas

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Proposed Development only (L/s)	Contribution from the Proposed Development only (%)	Status	Included Catchment Area	Peak Flow from the Proposed Development and Catchment Areas (L/s)	Contribution from the Proposed Development and the Surrounding Catchment Areas (%)	Status *
S1-S2	375	66.2	0.007	168.4	78.41	46.6%	OK	A1	131.91	78.3%	OK
S2-S3	450	44.1	0.005	238.0	78.41	32.9%	OK	A1 + A2	146.31	61.5%	OK
S3-S4	450	54.5	0.042	663.5	78.41	11.8%	OK	A1 + A2 + B	172.33	26.0%	OK
S4-S5	450	4.0	0.055	761.1	78.41	10.3%	OK	A1 + A2 + B	172.33	22.6%	OK
S5-S6	450	30.1	0.059	791.5	143.66	18.2%	OK	A1 + A2 + B + C	247.19	31.2%	OK
S6-S7	450	24.1	0.035	605.5	143.66	23.7%	OK	A1 + A2 + B + C + D	255.33	42.2%	OK
S7-S8	600	4.0	0.093	2101.8	143.66	6.8%	OK	A1 + A2 + B + C + D	255.33	12.1%	OK
S8-S9	600	14.5	0.014	809.3	143.66	17.8%	OK	A1 + A2 + B + C + D + E	277.69	34.3%	OK
S9-S10	600	12.3	0.020	983.3	143.66	14.6%	OK	A1 + A2 + B + C + D + E	277.69	28.2%	OK
S10-S11	600	27.1	0.014	826.8	143.66	17.4%	OK	A1 + A2 + B + C + D + E	277.69	33.6%	OK
S11-S12	600	77.1	0.016	884.8	143.66	16.2%	OK	A1 + A2 + B + C + D + E	277.69	31.4%	OK
S12-S13	600	15.1	0.050	1539.1	143.66	9.3%	OK	A1 + A2 + B + C + D + E	277.69	18.0%	OK
S13-S14	600	16.1	0.032	1228.4	143.66	11.7%	OK	A1 + A2 + B + C + D + E + F	469.14	38.2%	OK
S14-S15	600	42.4	0.004	447.4	143.66	32.1%	OK	A1 + A2 + B + C + D + E + F	469.14	104.9%	Spill
S15-S16	600	51.3	0.005	479.6	143.66	30.0%	OK	A1 + A2 + B + C + D + E + F	469.14	97.8%	Spill
S16-S17	600	76.1	0.004	445.3	143.66	32.3%	OK	A1 + A2 + B + C + D + E + F	469.14	105.4%	Spill
S17-S18	600	17.7	0.131	2497.2	143.66	5.8%	OK	A1 + A2 + B + C + D + E + F	469.14	18.8%	OK

Table 4a Comparision of the Hydraulic Capacity of Existing Sewers for Sewerage generated from the Proposed Development and Surrounding Catchment Areas (After Upgrade)

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Proposed Development only (L/s)	Contribution from the Proposed Development only (%)	Status	Included Catchment	Peak Flow from the Proposed Development and Catchment Areas (L/s)	Contribution from the Proposed Development and the Surrounding Catchment Areas (%)	Status *
S14-S15	750	42.4	0.004	803.6	143.66	17.9%	OK	A1 + A2 + B + C + D + E + F	469.14	58.4%	OK
S15-S16	750	51.3	0.005	861.4	143.66	16.7%	OK	A1 + A2 + B + C + D + E + F	469.14	54.5%	OK
S16-S17	750	76.1	0.004	799.8	143.66	18.0%	OK	A1 + A2 + B + C + D + E + F	469.14	58.7%	OK

Table 4b Comparision of the Hydraulic Capacity of Proposed Sewers (Connection from the Sites to existing terminal manholes S1 and S5)

Segment	Pipe Dia. (mm)	Pipe Length (m)	Gradient	Estimated Capacity (L/s)	Peak Flow from the Proposed Development only (L/s)	Contribution from the Proposed Development only (%)	Status *
NMH01-S1	225	10.7	0.084	151.7	78.41	51.7%	OK
NMH02-S5	225	8.8	0.172	216.9	65.25	30.1%	OK

Note: * "Spill" if the contribution is larger than 90%.

DIA (Enhanced Scheme)
(Nov 2022)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Drainage Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
October 2022

\Reference Number:
R6839_v1.6

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Appendix A Layout Plans
Appendix B Drainage Record Plans
Appendix C Hydraulic Calculations

1. Introduction

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Drainage Impact Assessment (DIA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 Ramboll Hong Kong Limited has been commissioned by the URA to conduct this DIA to assess whether the capacity of the existing drainage network serving the site is sufficient to cope with the drainage flow from the proposed redevelopment and existing development in the vicinity.

1.1.3 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.1.4 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the “Revised Design 2022”) are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.3 Proposed Development

1.3.1 The subject site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 Under notional layout of the Revised Design 2022, the Northern Site consists of five residential towers providing 1374 residential units, clubhouses (about 3,435m^2), retail (about 8,587m^2) and community facilities (about 500m^2). The Southern Site consists of two residential towers

providing 950 residential units, clubhouses (about 2,755m^2), retail (about 6,888m^2) and community facilities (about 2,000m^2). A block plan of the notional layout is provided in **Appendix A**.

1.3.3 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objectives

1.4.1 To address the above changes in the draft DSP, it is considered necessary to update the DIA to support the re-submission to TPB for consideration. In this DIA, apart from the proposed development parameters, internal boundary between the sites and the types of housing, the calculation assumption, methodology, catchment area adopted in the last DIA (ref. no.: R6839_v1.5 dated February 2022) remain unchanged.

2. Drainage Impact Assessment

2.1 Existing Drainage System

2.1.1 Based on the currently available Drainage Record Plans (from Lands Department's GeoInfo Map), there are stormwater drains and manholes within and around the Subject Site (see **Appendix B** and **Figure 2**). The Subject Site is currently fully paved, mainly comprising medium-rise domestic buildings.

2.1.2 According to the Drainage Services Department (DSD) website, there are no flooding blackspots in the vicinity of the Subject Site.

2.2 Assessment and Design Criteria

2.2.1 As the catchment areas are all fairly small, the Rational Method (as set out in Section 7.5.2 of Drainage Services Department's Stormwater Drainage Manual, "the SDM") has been used for the calculation of runoff. Times of concentration have been calculated from the topography of the various catchment areas.

2.2.2 The existing Site has been assumed to be effectively fully paved, i.e. a runoff coefficient, C of 1.0 has been adopted. The upstream catchment areas to the west of the Site comprise steep vegetated slopes and a value of C=0.35 has been adopted for these areas. The future development will comprise hard paving (C=1.0) and some flat landscaping (C=0.15).

2.2.3 The Site drains to urban drainage branch systems and a 50 years design return period has therefore been adopted, as set out in Table 10 of the SDM.

2.2.4 In accordance with Section 6.8 of the SDM, allowances have been included in the runoff calculations for potential increased rainfall intensities to mid 21st century and to end 21st century, with the runoff at end 21st century adopted for design purposes. The Site and surrounding areas are not tidally affected, so no consideration has been given to potential future sea level rises.

2.2.5 The Colebrook-White Equation has been used for the calculation of pipe capacities, with pipe roughness values taken from Table 14 of the SDM.

2.3 Discussion

2.3.1 The existing drainage facilities within the Subject Site(s) will be replaced by new facilities, to suit the detailed layouts of the proposed developments. Based on the layouts of the surrounding existing drainage systems, the drainage for the Northern Site will be connected to manhole SMH4114280 on Kiang Su Street, while the drainage for the Southern Site will be connected to manhole SMH4029273 on Chi Kiang Street, with ultimate discharge to the main drains along Ma Tau Wai Road.

2.3.2 As both the existing and future conditions will involve effectively full paving, there will be no change to the expected runoff from the Subject Site(s) and therefore no adverse impact on the existing drainage systems. Also, the areas will drain to the same existing main drainage routes, so there will be little overall impact on the drainage regimes as a result of the proposed development.

2.3.3 Although the proposed redevelopment itself will not result in any adverse drainage impacts, URA will consider the provision of blue-green drainage infrastructure (e.g. porous paving and on-site storage), in accordance with the DSD's Stormwater Drainage Manual (SDM, Section 3.2.2) in the subsequent detailed design stage to reduce the quantity and improve the quality of site runoff as far as practicable.

2.3.4 Overall, no unacceptable adverse drainage impacts are expected as a result of the proposed development and a detailed DIA is considered unnecessary.

2.4 Arrangement of New Drainage Pipes for the Adjacent Developments

2.4.1 According to the Drainage Record Plans included in **Appendix B**, some existing drainage pipes serving adjacent developments run through the Subject Site and it will therefore be necessary to rearrange some of these drainage systems to suit the proposed development at the Site.

2.4.2 For the adjacent buildings: Morning Joy Building, City 151 and 80 Maidstone Road, it is proposed to simply reconstruct the existing drainage in the rear access alleyway to run northwards towards Lok Shan Road, with a new connection drain (and manholes) on Lok Shan Road to connect to the existing manholes SMH4114290 (B1) (**Figure 3**).

2.4.3 For the adjacent buildings (Lok Man Sun Chuen Blocks A to E and Kei To Primary School), new drainage pipes (and manholes) are proposed to connect to existing manholes SMH4029171 (P1) and SMH4029270 (D1) on Kau Pui Lung Road.

2.4.4 Based on the drainage layout shown in **Figure 4a** and the hydraulic assessment included in **Tables 3a-4d of Appendix C**, it is proposed to construct a new 750mm diameter drain between Manhole P1 and D1 and adjust the invert levels of Manholes P1 to P3. Furthermore, it is proposed to upgrade the existing drains between Manholes D1 and D6 (along Chi Kiang Street) from (existing) 525mm diameter to 750mm diameter. The exact dimensions and alignments of the new drainage facilities will be subject to detailed design stage.

2.4.5 The designs of the new drainage facilities will take due consideration of the potential future increases in rainfall intensity as a result of climate change, as set out in Section 6.8 of the DSD's SDM and as calculated in **Appendix C**. The overall catchment areas are shown in **Figure 5**.

2.4.6 It is proposed to upgrade the drains along Lok Shan Road, between Manholes SMH4114290 (B1) and SMH4114294 (B4), from 750mm diameter to 900mm diameter (refer to **Figure 4b** and **Tables 5a-6d of Appendix C**). It is also proposed to reconstruct the drains (and manholes) from SMH4028832 (A1) to SMH4110924 (A6) to flow in the opposite direction to existing, with an increased diameter of 450mm, and to provide a new connection from SMH4110924 (A6) to SMH4114290 (B1), with at least one new intermediate manhole (NM1) in Lok Shan Road. The exact dimensions and alignments of the new drainage facilities will be subject to detailed design stage.

2.4.7 All new drainage infrastructure within the Site Boundary will be maintained by URA, or its joint venture partner(s), or its assignee. All new drainage infrastructure outside the Site Boundary will be handed over to DSD for maintenance.

Table 1 Summary of proposed upgrading of existing pipes and proposed new pipes

Segment	Manhole No.	Manhole No.	Existing pipe size (mm)	Proposed pipe size (mm)	Remarks
Kau Pui Lung Road / Chi Kiang Street					
P3-P2	SMH4029168	SMH4029170	450	450	Invert levels adjustment
P2-P1	SMH4029170	SMH4029171	450	450	Invert levels adjustment
P1-D1	SMH4029171	SMH4029270	-	750	New drain
D1-D2	SMH4029270	SMH4029271	525	750	Pipe upgrading
D2-D3	SMH4029271	SMH4029272	525	750	Pipe upgrading
D3-D4	SMH4029272	SMH4029273	525	750	Pipe upgrading
D4-D5	SMH4029273	SMH4029274	525	750	Pipe upgrading
D5-D6	SMH4029274	SMH4029177	525	750	Pipe upgrading
Lok Shan Road / Ma Tau Wai Road					
A1-A2	SMH4028832	SMH4028831	300	450	Pipe upgrading
A2-A3	SMH4028831	SMH4028830	300	450	Pipe upgrading
A3-A4	SMH4028830	SMH4028829	300	450	Pipe upgrading
A4-A5	SMH4028829	SMH4028828	225	450	Pipe upgrading
A5-A6	SMH4028828	SMH4110924	225	450	Pipe upgrading
A6-NM1	SMH4110924	New Manhole	-	450	New drain
NM1-B1	New Manhole	SMH4114290	-	450	New drain
B1-B2	SMH4114290	SMH4114291	750	900	Pipe upgrading
B2-B3	SMH4114291	SMH4114292	750	900	Pipe upgrading
B3-B4	SMH4114292	SMH4114294	750	900	Pipe upgrading

3. Overall Conclusion

3.1.1 Drainage assessments were conducted for the redevelopment at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

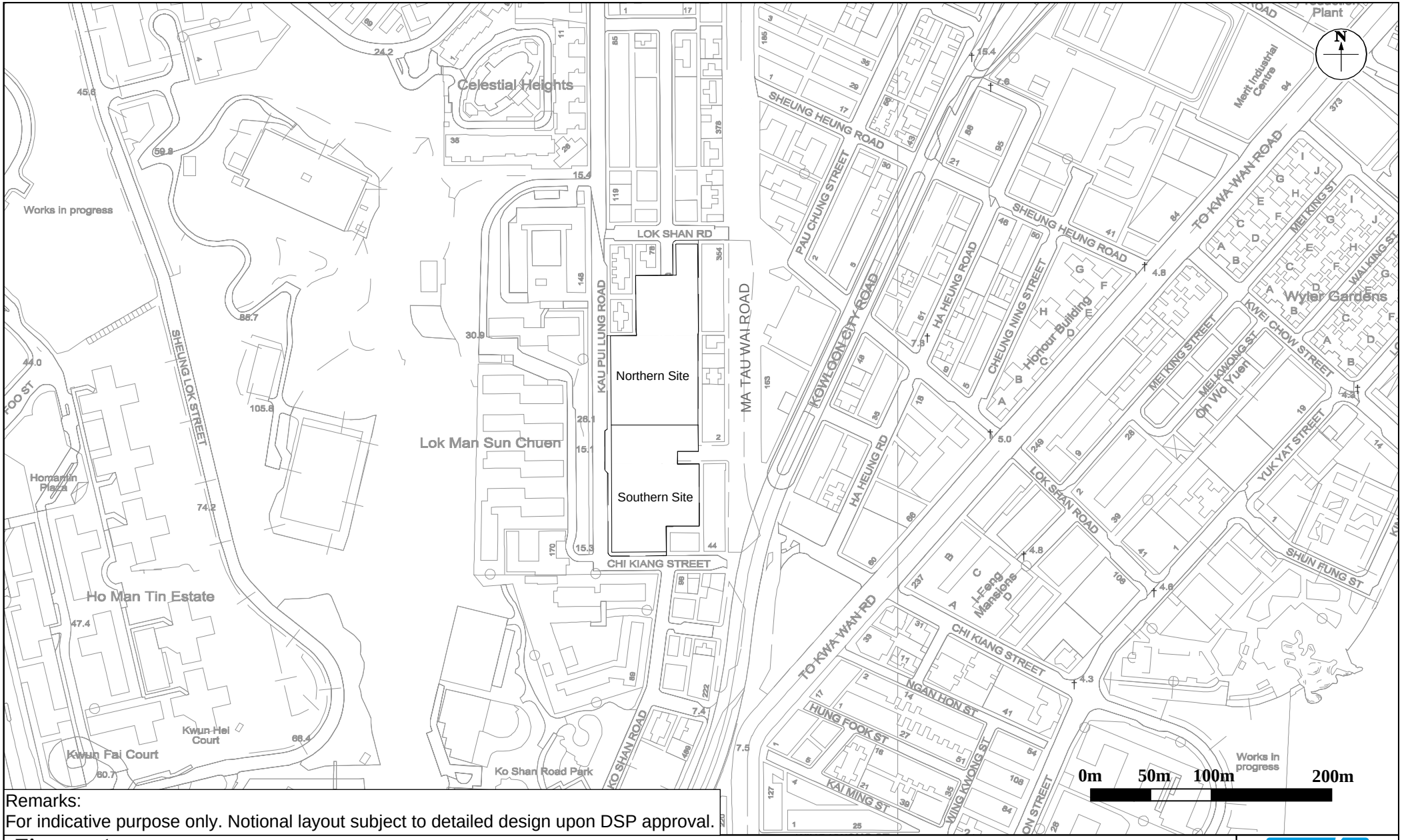
3.1.2 It is anticipated that the proposed development would not affect the main drainage paths or lead to unacceptable adverse drainage impacts.

3.1.3 It is intended to re-arrange drainage pipes for some existing buildings in the vicinity. Based on the assessment result, it is proposed to construct a new drainage pipe with diameter of 750mm and upgrade 7 existing drainage pipes along Kau Pui Lung Road / Chi Kiang Road. For the drainage system around Lok Shan Road / Ma Tau Wai Road, it is proposed to construct a new manhole (NM1) and 2 new drains with diameter of 450mm and upgrade 8 existing drainage pipes. The exact dimension and alignment of the proposed new drainage pipes will be determined in the detailed design stage.

3.1.4 To facilitate the proposed drainage diversion plan, it is proposed to re-arrange, reconstruct and revert the existing drainage flow direction for the drainage system located at the rear access alleyway (e.g. City 151, Morning Joy Building and 80 Maidstone Road). As revealed in the assessment result, 2 nos. of existing 225mm drain and 3 nos. of existing 300mm drain will be upgraded to 450mm drain, 3 nos. of existing 750mm drain will be upgraded to 900mm drain, 2 nos. of 450mm drain and one new manhole (NM1) will be constructed and to be connected to the existing manholes SMH4114290 (B1) at Lok Shan Road. For drainage system at Kau Pui Lung Road/ Chi Kiang Street, it is proposed to replace two new 450mm drains, install 1 new 750mm drain and upgrading 5 nos. of existing 525mm drain to 750mm drain. The exact dimension and alignment of the proposed new drainage pipe will be determined in detail design stage.

3.1.5 This DIA confirms the feasibility of the proposed development, with no unacceptable adverse drainage impact anticipated.

FIGURES



Remarks:
For indicative purpose only. Notional layout subject to detailed design upon DSP approval.

Figure: 1

Title: Location of the Subject Site and Its Environs

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	2.0
Date:	Sep 2022

Q:\Projects\URACBS02EI00\04 Deliverables\01 EA Report\01 Figures\v2.0\Fig 1 Subject Site.dwg

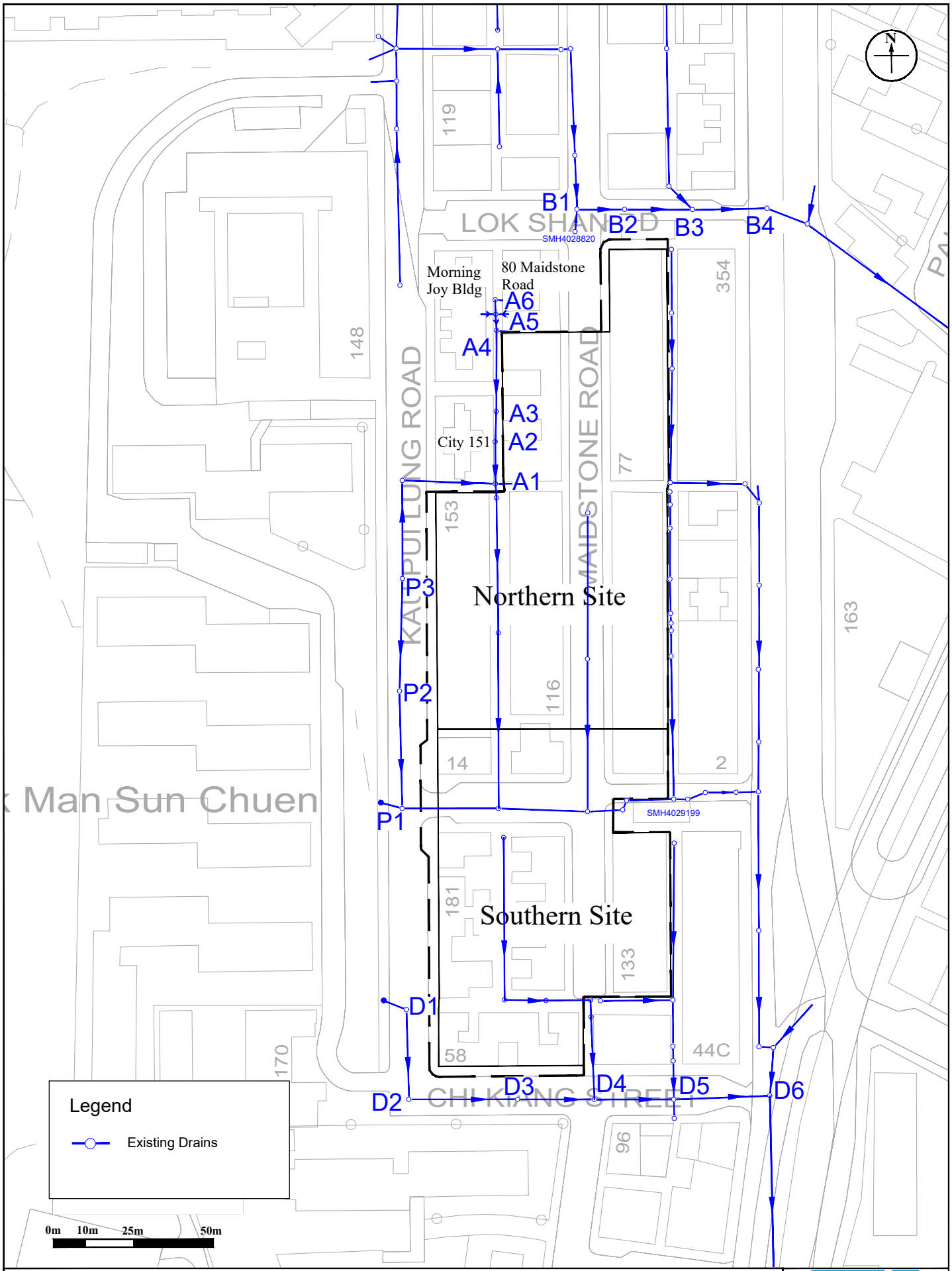


Figure: 2	RAMBOLL
Title: Existing drainage system in the vicinity of the Project Sites	Drawn by: LL
	Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.6
	Date: Aug 2022

Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.6\Figure 2 Existing drains.dwg

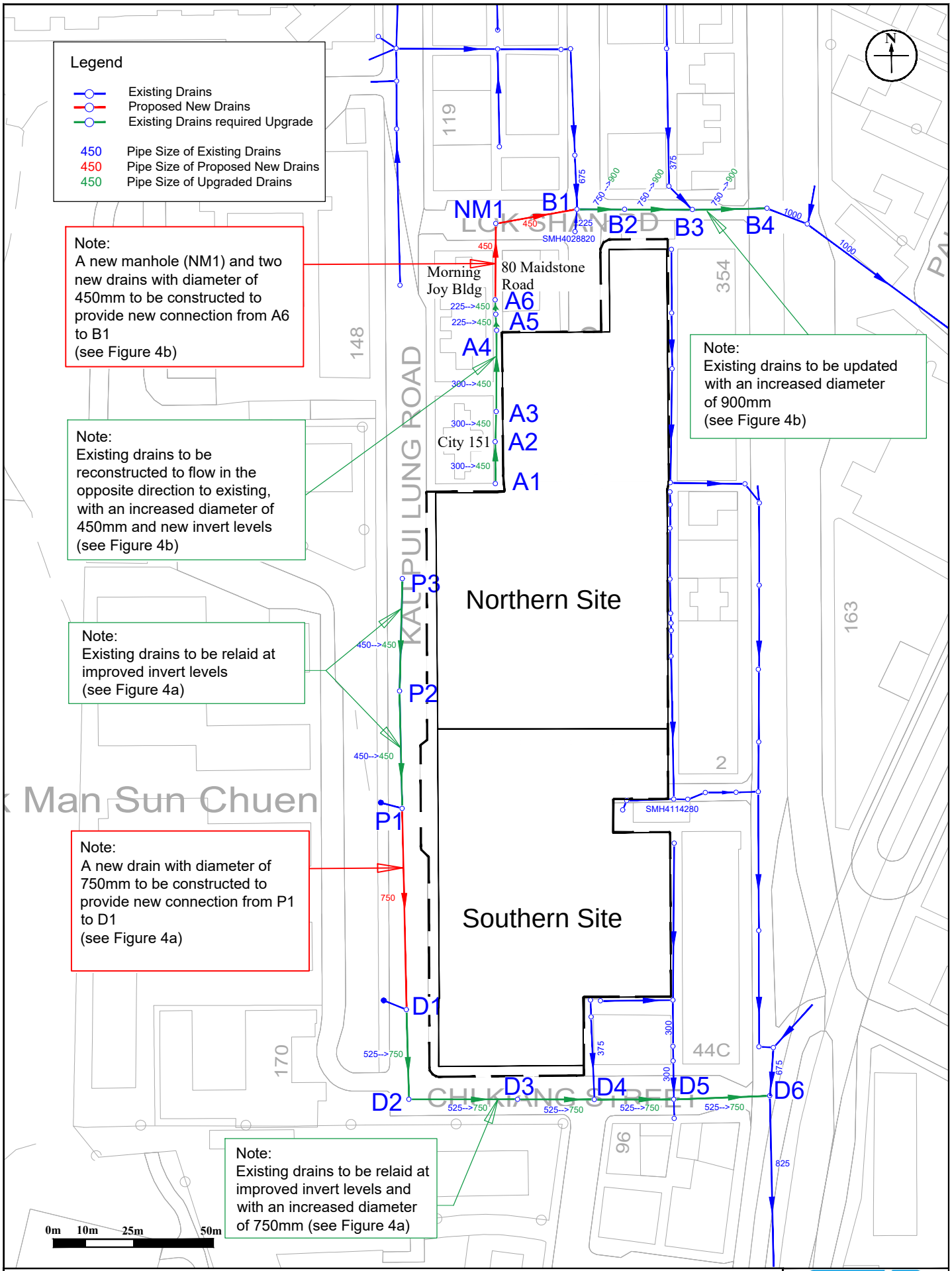


Figure: 3

Title: Proposed drainage system in the vicinity of the Project Sites

Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	1.6
Date:	Aug 2022

Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.6\Figure 3 proposed drains.dwg

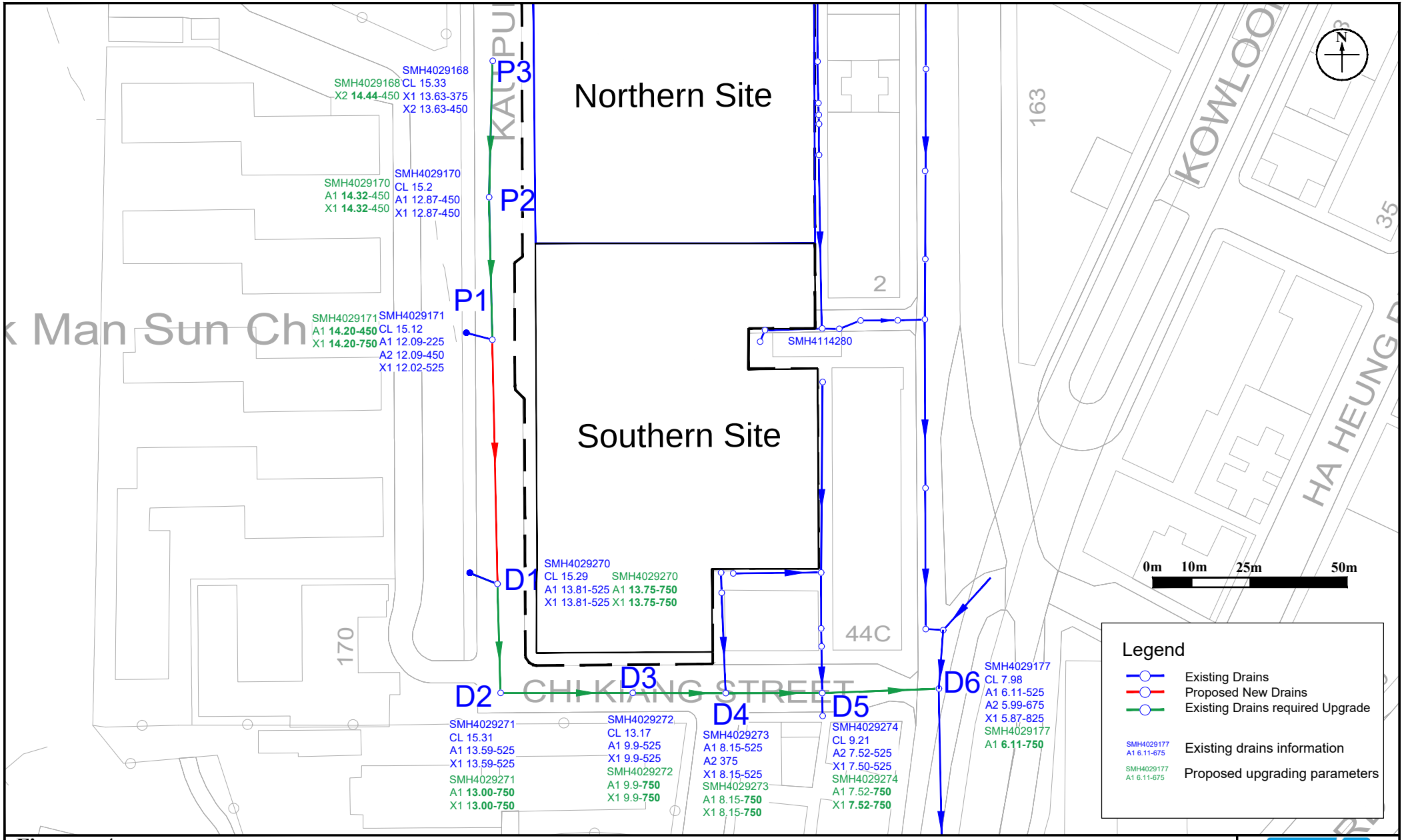


Figure: 4a	RAMBOLL
Title: Proposed Drainage Diversion and the Upgrade of the Drainage System (with details)	Drawn by: LL Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.6 Date: Sep 2022

Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.6\Figure 4 Proposed draiange diversion.dwg

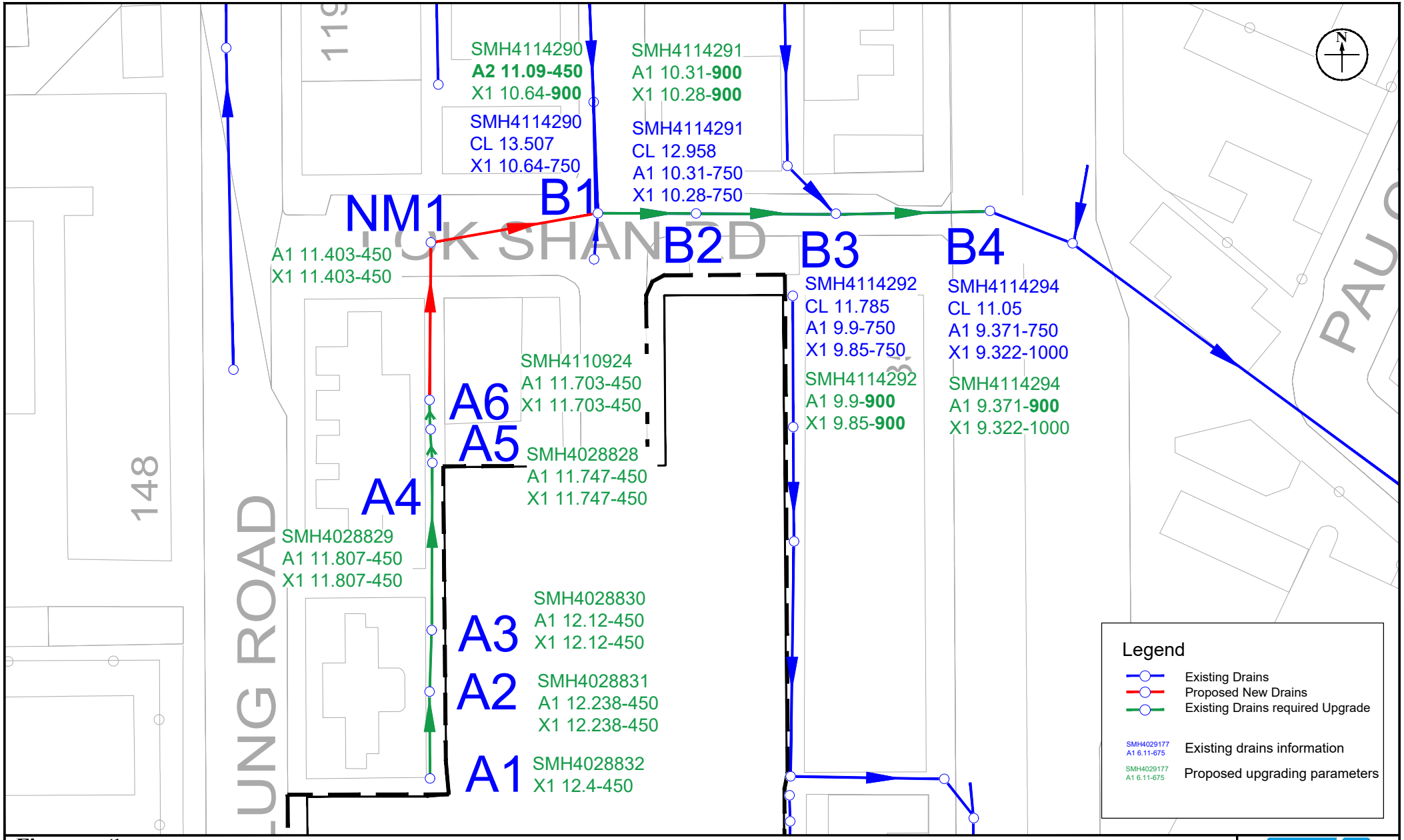
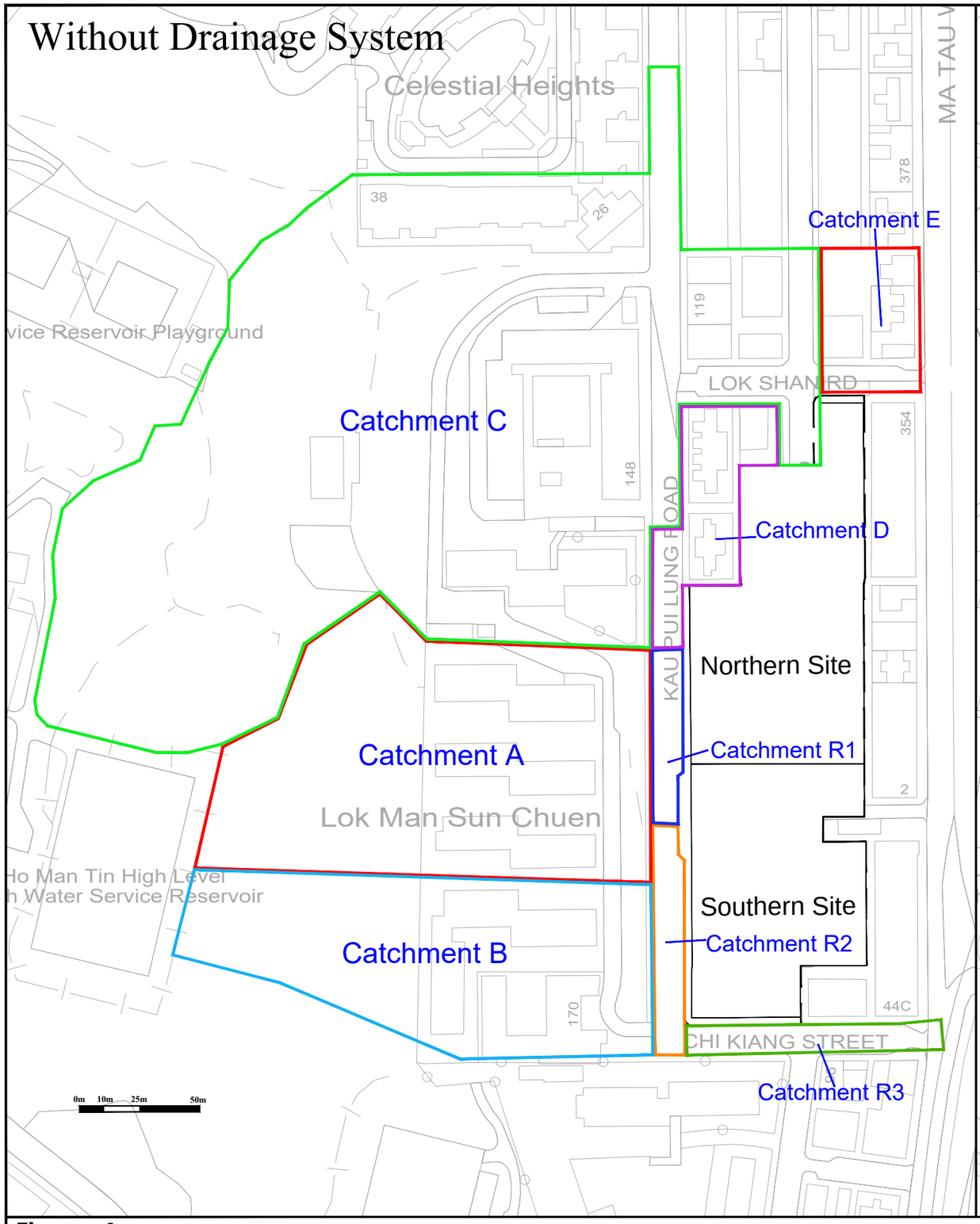


Figure: 4b	RAMBOLL
Title: Proposed Drainage Diversion and the Upgrade of the Drainage System (with details)	Drawn by: LL Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.5 Date: Feb 2022

Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.5\Figure 4 Proposed draiange diversion.dwg

Without Drainage System



With Drainage System

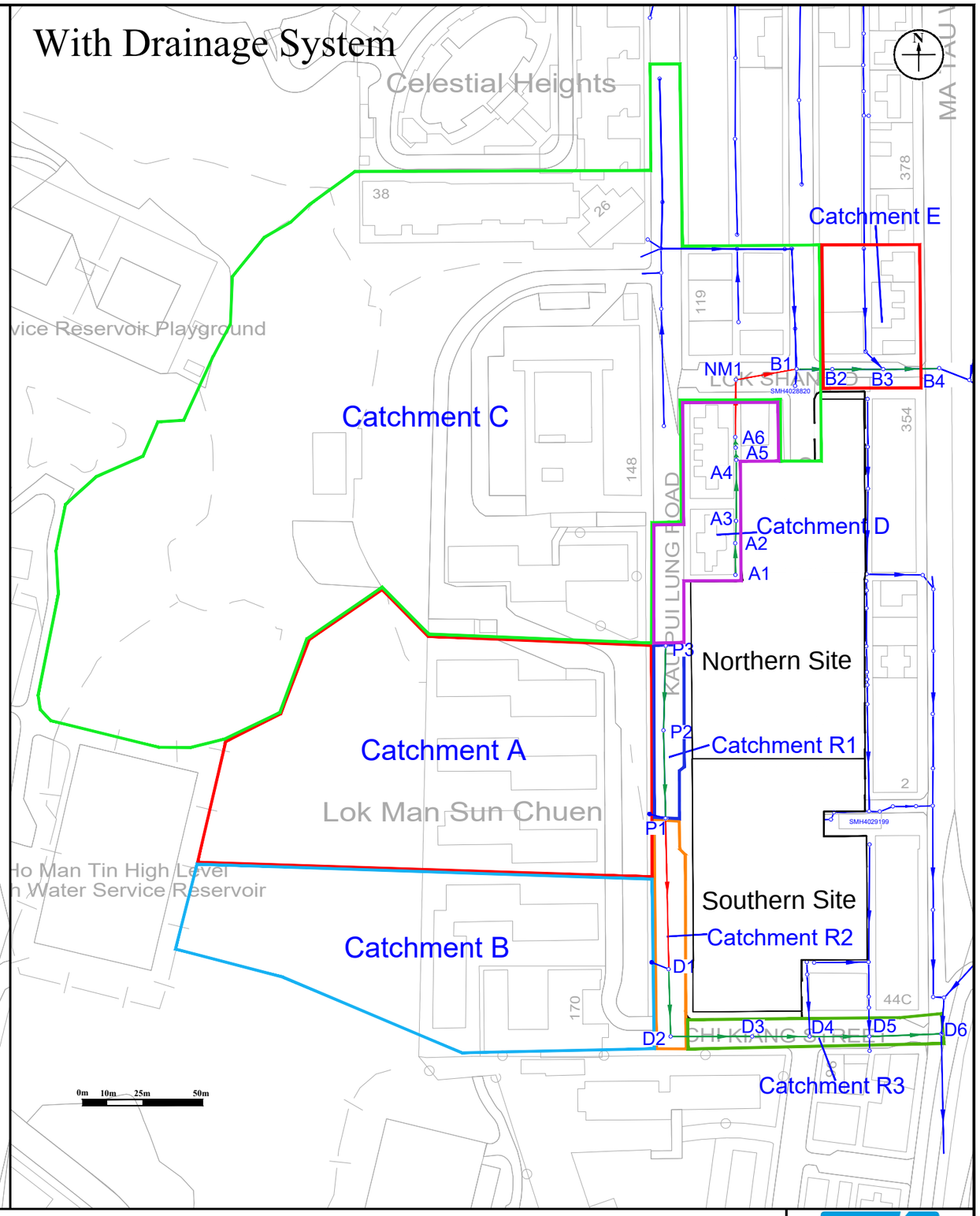


Figure: 5

Title: Catchment Area

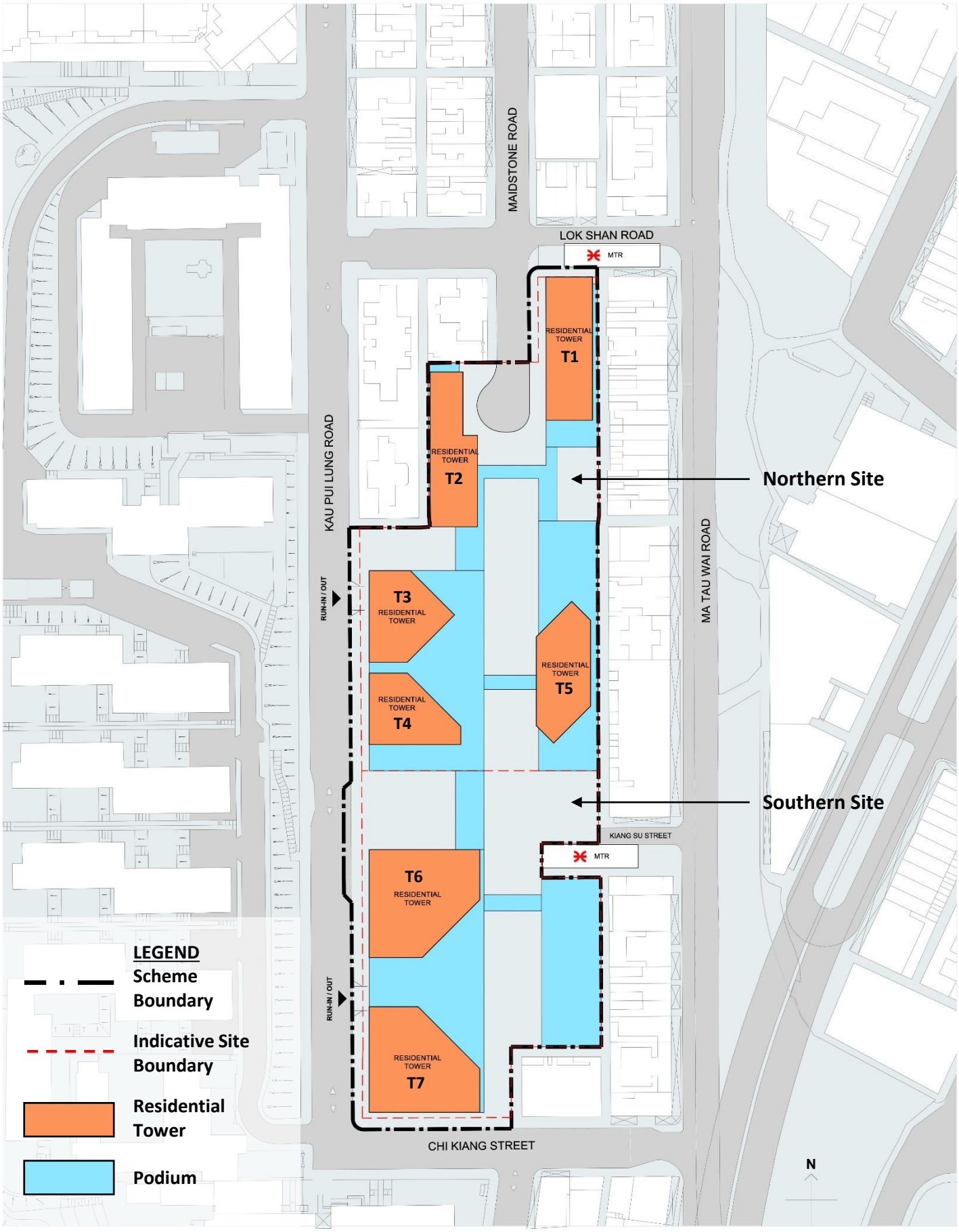
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

RAMBOLL

Drawn by:	KW
Checked by:	TC
Rev.:	1.6
Date:	Aug 2022

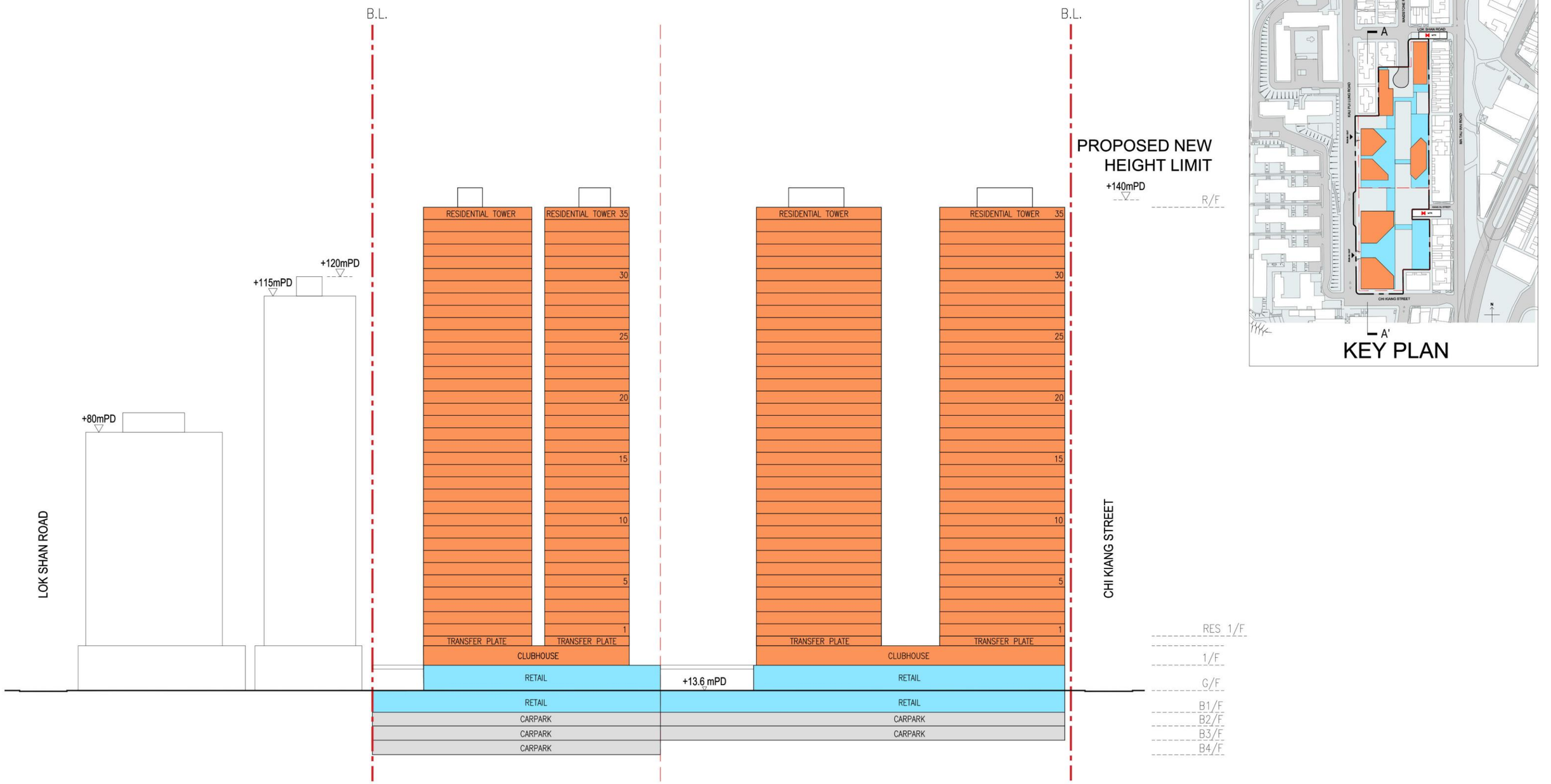
Q:\Projects\URACBS02EI00\04 Deliverables\04 DIA Report\v1.6\Figure 5 Catchment Area_2.dwg

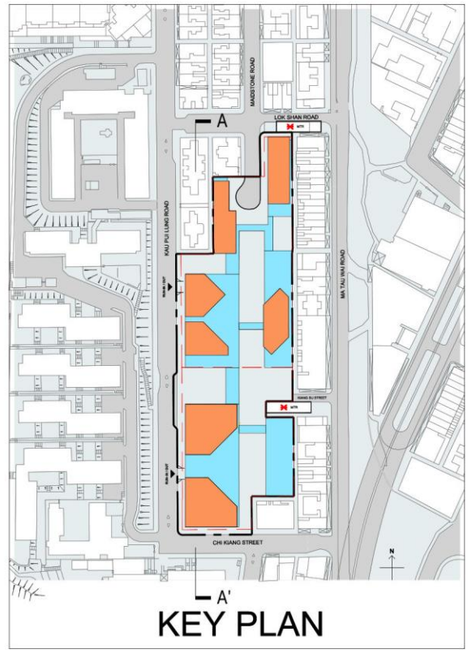
APPENDIX A:
LAYOUT PLANS



(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Indicative Block Plan	**Figure 1.1**

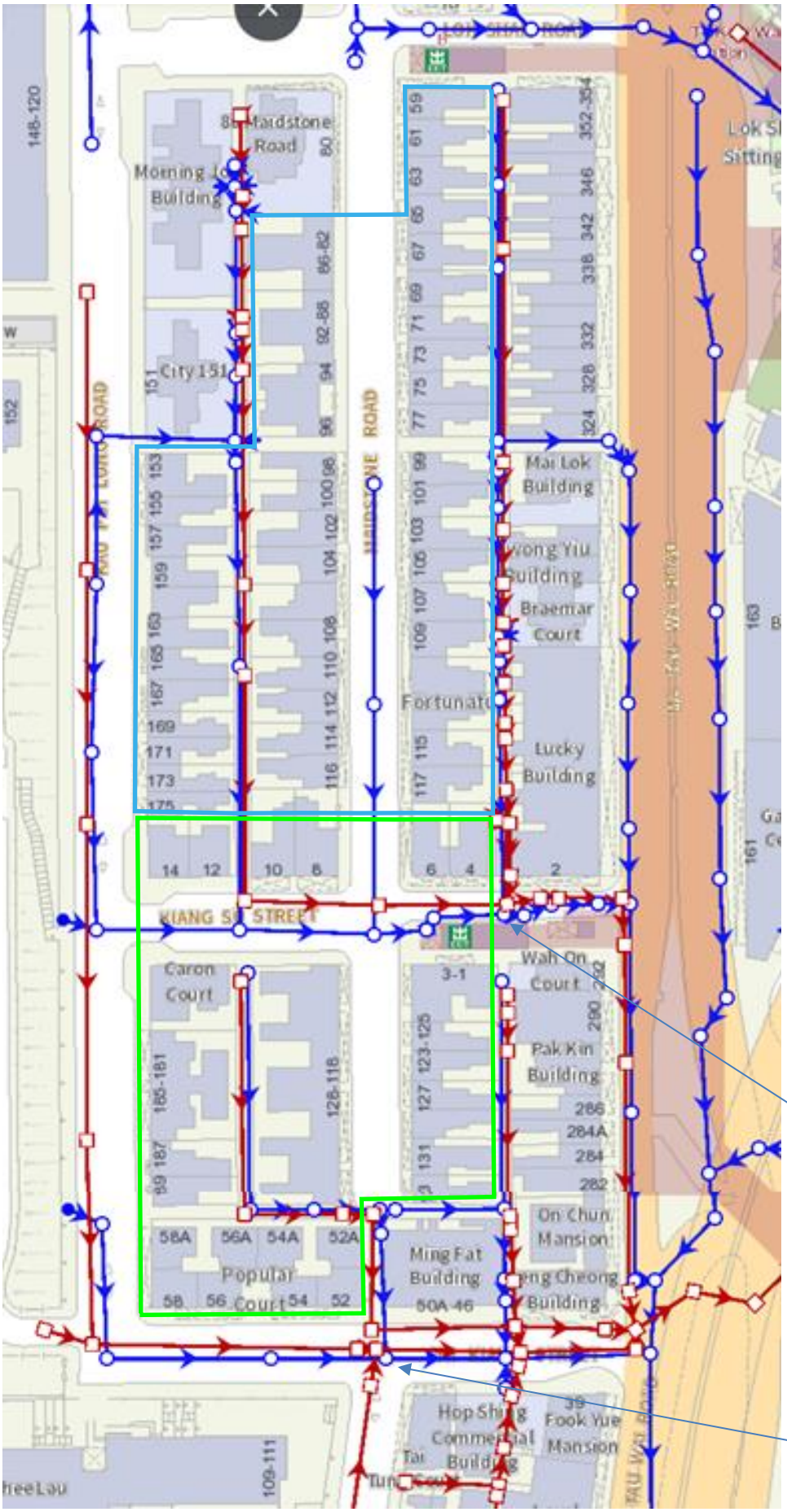




KEY PLAN

(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

APPENDIX B:
DRAINAGE RECORD PLANS


Northern Site
Southern Site
Storm water pipe
Storm water manhole no. SMH4114280
Storm water manhole no. SMH4029273
Madstone Road
Caron Court
Popular
Mar Lok Building
Wong Yiu Building
Braemar Court
Lucky Building
Wah On Court
Pak Kin Building
On Chun Mansion
Ming Fat Building
Fook Yue Mansion
Hop Shing Commercial Building
Lok Sitting
Morning Building
City 151
Fortunat
KIANG SU STREET
HARBOUR ROAD
RAMBOLL

APPENDIX C:
HYDRAULIC CALCULATIONS

Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)
Table 1 - Proposed Catchment Areas and Run-off (1 in 50 year)

$$Q_p = 0.278\ C\ i\ A$$

where Q_p = peak runoff in m^3/s
C = runoff coefficient (dimensionless)
i = rainfall intensity in mm/hr
A = catchment area in km^2

Surface Characteristics	*Runoff coefficient, C**
Asphalt	0.70 - 0.95
Concrete	0.80 - 0.95
Brick	0.70 - 0.85
Grassland (heavy soil**)	
Flat	0.13 - 0.25
Steep	0.25 - 0.35
Grassland (sandy soil)	
Flat	0.05 - 0.15
Steep	0.15 - 0.20

1 in 50 year (according to Table 3 of DSD Manual)
a= 451.3
b= 2.46
c= 0.337

Increases from SDM: 10.4% 13.8%

Notes:
Existing Site comprises concrete paving, C = 1; Steep Grassland, C = 0.35
Future Site Development will include Paved Areas, C = 1, with Soft Landscaping, C = 0.15
Catchments are small, so Rational Method is appropriate

Catchment		Area	Levels (mPD)		Fall	Overland, L	Fall, H	Overland t_c	t_0	Total t_f[1]	Total t_c[2]	Intensity	Weighted Runoff Coefficient	Run-off	Run-off Mid-21st Century	Run-off End-21st Century
		(m^2)	Upstream	Downstream	(m)	(m)	(m/100m)	(min)	(min)	(min)	(min)	(mm/h)		(m^3/s)	(m^3/s)	(m^3/s)
Existing Catchments involve drainage diversion	Catchment A Lok Man Sun Chuen (46% unpaved)	16,897	103.0	26.1	76.9	184	41.8	4.8	4.8	0.5	5.3	227	0.70	0.75	0.82	0.85
	Catchment B Lok Man Sun Chuen (41% unpaved)	12,048	103.0	15.3	87.7	232.0	37.8	6.3	6.3	0.5	6.8	213	0.73	0.52	0.58	0.60
	Catchment R1 Fully Paved Road	925	15.3	15.2	0.2	73.8	0.2	7.1	7.1	0.5	7.6	207	0.94	0.05	0.05	0.06
	Catchment R2 Fully Paved Road	1,285	15.5	15.3	0.2	97.8	0.2	9.5	9.5	0.5	10.0	193	0.94	0.06	0.07	0.07
	Catchment R3 Fully Paved Road	1,232	15.3	8.0	7.3	106.3	6.9	5.1	5.1	0.5	5.6	223	0.94	0.07	0.08	0.08
	Sub-total	**32,387**												**1.45**	1.61	1.66
Discharge to SMH4028820	Catchment C (Existing)[See Remark 1] Lok Man Sun Chuen (50% unpaved)	49,573	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.7	190	0.68	1.76	1.95	2.01
	Catchment C+E (Existing) Lok Man Sun Chuen (47% unpaved)	52,021	103.0	15.4	87.6	370	23.7	9.6	9.6	1.5	11.1	187	0.69	1.88	2.08	2.14
	Catchment D (Proposed)[See Remark 2] Fully Paved	2,786	-	-	-	-	-	-	-	-	3.0	255	1.00	0.20	0.22	0.22
	Catchment C+D (Proposed) Lok Man Sun Chuen (o/a 47% unpaved)	52,359	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.6	190	0.69	1.92	2.12	2.18
	Catchment C+D+E (Proposed) Lok Man Sun Chuen (o/a 45% unpaved)	54,807	103.0	15.4	87.6	370	23.7	9.5	9.5	1.5	11.0	188	0.71	2.02	2.23	2.30

Remarks:
1. Assumed Time of Concentration through stream flow. Velocity of 2m/s assumed for pipe flow in Catchment C
2. Nominal 3 minutes t_c adopted for Catchment D, with drains over a length of approximately 160m

Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)
Hydraulic Calculations of Existing and Proposed Drainage System

Table 2a - 1 in 50 year Runoff of Existing Catchments (m/s^3)

	Catchment A	Catchment B	Catchment R1	Catchment R2	Catchment R3	Catchment C	Catchment C+E	Catchment D	Catchment C+D	Catchment C+D+E
Runoff	0.75	0.52	0.05	0.06	0.07	1.76	1.88	0.20	1.92	2.02
Mid-21st C	0.82	0.58	0.05	0.07	0.08	1.95	2.08	0.22	2.12	2.23
End-21st C	0.85	0.60	0.06	0.07	0.08	2.01	2.14	0.22	2.18	2.30

Table 3a - Hydraulic Capacities for Existing Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
D1-D2	SMH4029270	SMH4029271	Circular	525	28.1	13.81	13.59	9.81	0.0003	0.008	128	0.000001	2.14	0.22	0.46	0.42
D2-D3	SMH4029271	SMH4029272	Circular	525	34.1	13.59	9.90	9.81	0.0003	0.108	9	0.000001	8.02	0.22	1.74	1.65
D3-D4	SMH4029272	SMH4029273	Circular	525	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	6.58	0.22	1.42	1.35
D4-D5	SMH4029273	SMH4029274	Circular	525	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	3.86	0.22	0.84	0.75
D5-D6	SMH4029274	SMH4029177	Circular	525	30.1	7.50	6.11	9.81	0.0003	0.046	22	0.000001	5.23	0.22	1.13	1.08

Table 3b - Hydraulic Capacities for Proposed Drainage System (Kau Pui Lung Road)/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
P3-P2	SMH4029168	SMH4029170	Circular	450	35.2	14.44	14.32	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P2-P1	SMH4029170	SMH4029171	Circular	450	36.8	14.32	14.20	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P1-D1	SMH4029171	SMH4029270	Circular	**750**	63.0	14.20	**13.75**	9.81	0.0003	0.007	140	0.000001	2.55	0.44	1.12	1.01
D1-D2	SMH4029270	SMH4029271	Circular	**750**	28.1	**13.75**	**13.00**	9.81	0.0003	0.027	37	0.000001	4.94	0.44	2.18	1.97
D2-D3	SMH4029271	SMH4029272	Circular	**750**	34.1	**13.00**	9.90	9.81	0.0003	0.091	11	0.000001	9.15	0.44	4.04	3.84
D3-D4	SMH4029272	SMH4029273	Circular	**750**	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	8.19	0.44	3.62	3.44
D4-D5	SMH4029273	SMH4029274	Circular	**750**	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	4.81	0.44	2.13	1.91
D5-D6	SMH4029274	SMH4029177	Circular	**750**	30.1	**7.52**	6.11	9.81	0.0003	0.047	21	0.000001	6.56	0.44	2.90	2.75

Table 4a - Comparison of Runoff from Existing Catchments and Hydraulic Capacities of Existing Drains (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
D1-D2	SMH4029270	SMH4029271	525	0.42	A-B-R1-R2	1.38	332.0%	NO
D2-D3	SMH4029271	SMH4029272	525	1.65	A-B-R1-R2	1.38	83.9%	YES
D3-D4	SMH4029272	SMH4029273	525	1.35	A-B-R1-R2-R3	1.45	107.6%	NO
D4-D5	SMH4029273	SMH4029274	525	0.75	A-B-R1-R2-R3	1.45	193.3%	NO
D5-D6	SMH4029274	SMH4029177	525	1.08	A-B-R1-R2-R3	1.45	135.3%	NO

Table 4b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.05	27.6%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.05	27.6%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.01	A-R1-R2	0.86	85.0%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.97	A-B-R1-R2	1.38	70.4%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.38	36.0%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.45	42.3%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.45	76.0%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.45	52.8%	YES

Table 4c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - Mid-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.05	30.5%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.05	30.5%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.01	A-R1-R2	0.95	93.8%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.97	A-B-R1-R2	1.53	77.7%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.53	39.8%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.61	46.7%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.61	83.9%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.61	58.3%	YES

Table 4d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.06	31.4%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.06	31.4%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.01	A-R1-R2	0.98	96.7%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.97	A-B-R1-R2	1.57	80.1%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.57	41.0%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.66	48.2%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.66	86.5%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.66	60.1%	YES

Table 5a - Hydraulic Capacities for Existing Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt} [3]
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
SMH4028820-B1	SMH4028820	SMH4114290	Circular	225	5.3	11.728	11.238	9.81	0.0003	0.092	11	0.000001	4.37	0.04	0.17	0.17
B1-B2	SMH4114290	SMH4114291	Circular	750	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	4.71	0.44	2.08	1.87
B2-B3	SMH4114291	SMH4114292	Circular	750	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.19	0.44	1.85	1.67
B3-B4	SMH4114292	SMH4114294	Circular	750	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.46	0.44	1.97	1.77

Table 5b - Hydraulic Capacities for Proposed Drainage System (Lok Shan Road)/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt} [3]
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
A1-A2	SMH4028832	SMH4028831	Circular	**450**	13.1	12.4	12.238	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A2-A3	SMH4028831	SMH4028830	Circular	**450**	9.6	12.238	12.120	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A3-A4	SMH4028830	SMH4028829	Circular	**450**	25.4	12.120	11.807	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A4-A5	SMH4028829	SMH4028828	Circular	**450**	4.8	11.807	11.747	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A5-A6	SMH4028828	SMH4110924	Circular	**450**	3.6	11.747	11.703	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A6-NM1	SMH4110924	New Manhole	Circular	**450**	24.3	11.703	11.403	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
NM1-B1	New Manhole	SMH4114290	Circular	**450**	25.4	11.403	11.090	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
B1-B2	SMH4114290	SMH4114291	Circular	**900**	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	5.27	0.64	3.35	3.02
B2-B3	SMH4114291	SMH4114292	Circular	**900**	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.68	0.64	2.98	2.68
B3-B4	SMH4114292	SMH4114294	Circular	**900**	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.99	0.64	3.17	2.86

Table 6a - Comparison of Runoff from Existing Catchments and Hydraulic Capacities of Existing Drains (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt} [1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
NM1-B1	New Manhole	SMH4114290	225	0.17	Minor Local	0.00	0.0%	YES
B1-B2	SMH4114290	SMH4114291	750	1.87	C	1.76	94.1%	YES
B2-B3	SMH4114291	SMH4114292	750	1.67	C	1.76	105.9%	NO
B3-B4	SMH4114292	SMH4114294	750	1.77	C+E	1.88	106.1%	NO

Table 6b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt} [1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.20	56.4%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	1.92	63.6%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	1.92	71.6%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.02	70.8%	YES	

Table 6c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - Mid-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt} [1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.22	62.2%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	2.12	70.2%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	2.12	79.0%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.23	78.2%	YES	

Table 6d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt} [1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.22	64.1%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	2.18	72.4%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	2.18	81.4%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.30	80.6%	YES	

Table 6e - Summary of Flow Rates as a Result of Proposed Drainage Diversion (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Flow Rate (m^3/s)						Remarks
			Without Diversion		With Diversion		Increases		
			Existing	End 21st C	Existing	End 21st C	Existing	End 21st C	
NM1-B1	New Manhole	SMH4114290	0.00	0.00	0.20	0.22	0.20	0.22	Existing drains to be upgraded to accommodate flow to End 21st Century
B1-B2	SMH4114290	SMH4114291	1.76	2.01	1.92	2.18	0.16	0.18	
B2-B3	SMH4114291	SMH4114292	1.76	2.01	1.92	2.18	0.16	0.18	
B3-B4	SMH4114292	SMH4114294	1.88	2.14	2.02	2.30	0.14	0.16	

Remarks:

1. Cross Section Area of U-channel: (D^2 x PI) / 4 / 2 + (H x D) / 2
2. Cross Section Area of Circular Pipe: D^2 x PI / 4
3. Qsilt: 10% reduction in capacity for gradients not greater than 1 in 25; 5% reduction in flow for gradients greater than 1 in 25

DIA (RtoC_8)

(Feb 2023)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Drainage Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
December 2022

\Reference Number:
R6839_v1.7

providing 950 residential units, clubhouses (about 2,755m^2), retail (about 6,888m^2) and community facilities (about 2,000m^2). A block plan of the notional layout is provided in **Appendix A**.

1.3.3 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objectives

1.4.1 To address the above changes in the draft DSP, it is considered necessary to update the DIA to support the re-submission to TPB for consideration. In this DIA, apart from the proposed development parameters, internal boundary between the sites and the types of housing, the calculation assumption, methodology, catchment area adopted in the last DIA (ref. no.: R6839_v1.6 dated October 2022) remain generally unchanged. However, the runoff calculations have been updated to include the rainfall parameters set out in Stormwater Drainage Manual Corrigendum No. 1/2022.

2. Drainage Impact Assessment

2.1 Existing Drainage System

2.1.1 Based on the currently available Drainage Record Plans (from Lands Department's GeoInfo Map), there are stormwater drains and manholes within and around the Subject Site (see **Appendix B** and **Figure 2**). The Subject Site is currently fully paved, mainly comprising medium-rise domestic buildings.

2.1.2 According to the Drainage Services Department (DSD) website, there are no flooding blackspots in the vicinity of the Subject Site.

2.2 Assessment and Design Criteria

2.2.1 As the catchment areas are all fairly small, the Rational Method (as set out in Section 7.5.2 of Drainage Services Department's Stormwater Drainage Manual, "the SDM") has been used for the calculation of runoff. Times of concentration have been calculated from the topography of the various catchment areas.

2.2.2 The existing Site has been assumed to be effectively fully paved, i.e. a runoff coefficient, C of 1.0 has been adopted. The upstream catchment areas to the west of the Site comprise steep vegetated slopes and a value of C=0.35 has been adopted for these areas. The future development will comprise hard paving (C=1.0) and some flat landscaping (C=0.15).

2.2.3 The Site drains to urban drainage branch systems and a 50 years design return period has therefore been adopted, as set out in Table 10 of the SDM.

2.2.4 In accordance with Section 6.8 of the SDM (Corrigendum No. 1/2022), allowances have been included in the runoff calculations for potential increased rainfall intensities to end 21st century plus a further Design Allowance, with the runoff at end 21st century including Design Allowance adopted for design purposes. The Site and surrounding areas are not tidally affected, so no consideration has been given to potential future sea level rises.

2.2.5 The Colebrook-White Equation has been used for the calculation of pipe capacities, with pipe roughness values taken from Table 14 of the SDM.

2.3 Discussion

2.3.1 The existing drainage facilities within the Subject Site(s) will be replaced by new facilities, to suit the detailed layouts of the proposed developments. Based on the layouts of the surrounding existing drainage systems, the drainage for the Northern Site will be connected to manhole SMH4114280 on Kiang Su Street, while the drainage for the Southern Site will be connected to manhole SMH4029273 on Chi Kiang Street, with ultimate discharge to the main drains along Ma Tau Wai Road.

2.3.2 As both the existing and future conditions will involve effectively full paving, there will be no change to the expected runoff from the Subject Site(s) and therefore no adverse impact on the existing drainage systems. Also, the areas will drain to the same existing main drainage routes, so there will be little overall impact on the drainage regimes as a result of the proposed development.

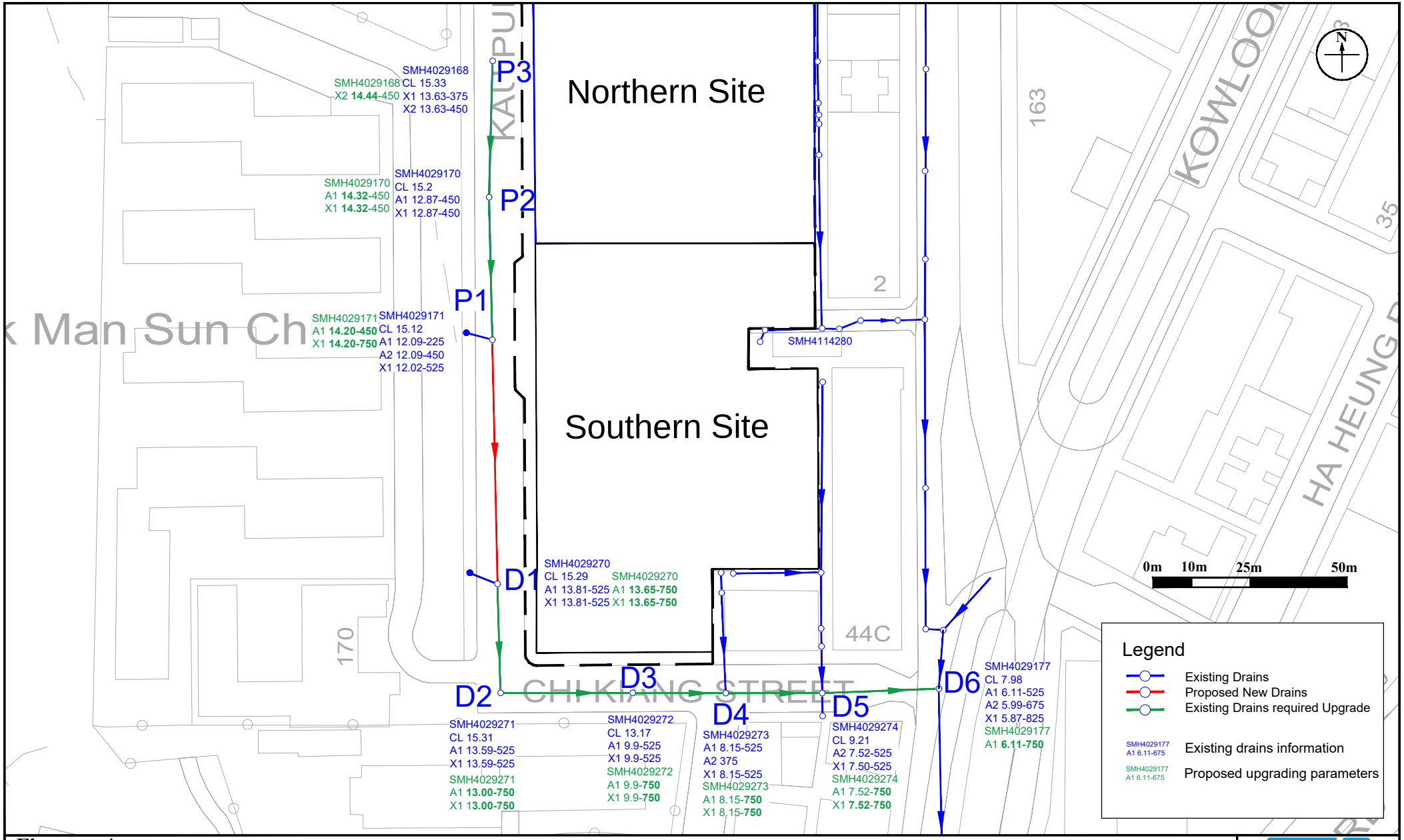


Figure: 4a	RAMBOLL
Title: Proposed Drainage Diversion and the Upgrade of the Drainage System (with details)	Drawn by: LL Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.7 Date: Dec 2022

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APPENDIX C:
HYDRAULIC CALCULATIONS

Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)
Table 1 - Proposed Catchment Areas and Run-off (1 in 50 year)

$$Q_p = 0.278\ C\ i\ A$$

where Q_p = peak runoff in m^3/s
C = runoff coefficient (dimensionless)
i = rainfall intensity in mm/hr
A = catchment area in km^2

Surface Characteristics	*Runoff coefficient, C**
Asphalt	0.70 - 0.95
Concrete	0.80 - 0.95
Brick	0.70 - 0.85
Grassland (heavy soil**)	
Flat	0.13 - 0.25
Steep	0.25 - 0.35
Grassland (sandy soil)	
Flat	0.05 - 0.15
Steep	0.15 - 0.20

1 in 50 year (according to Table 3 of DSD Manual)
a= 451.3
b= 2.46
c= 0.337

Increases from SDM 16.0% 12.1%

Catchment		Area	Levels (mPD)		Fall	Overland, L	Fall, H	Overland t_c	t_0	Total t_f[1]	Total t_c[2]	Intensity	Weighted Runoff Coefficient	Run-off	Run-off End-21st Century	Including Design Allowance
		(m^2)	Upstream	Downstream	(m)	(m)	(m/100m)	(min)	(min)	(min)	(min)	(mm/h)		(m^3/s)	(m^3/s)	(m^3/s)
Existing Catchments involve drainage diversion	Catchment A Lok Man Sun Chuen (46% unpaved)	16,897	103.0	26.1	76.9	184	41.8	4.8	4.8	0.5	5.3	227	0.70	0.75	0.87	0.97
	Catchment B Lok Man Sun Chuen (41% unpaved)	12,048	103.0	15.3	87.7	232.0	37.8	6.3	6.3	0.5	6.8	213	0.73	0.52	0.61	0.68
	Catchment R1 Fully Paved Road	925	15.3	15.2	0.2	73.8	0.2	7.1	7.1	0.5	7.6	207	0.94	0.05	0.06	0.06
	Catchment R2 Fully Paved Road	1,285	15.5	15.3	0.2	97.8	0.2	9.5	9.5	0.5	10.0	193	0.94	0.06	0.07	0.08
	Catchment R3 Fully Paved Road	1,232	15.3	8.0	7.3	106.3	6.9	5.1	5.1	0.5	5.6	223	0.94	0.07	0.08	0.09
	Sub-total	**32,387**												**1.45**	1.69	1.89
Discharge to SMH4028820	Catchment C (Existing)[See Remark 1] Lok Man Sun Chuen (50% unpaved)	49,573	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.7	190	0.68	1.76	2.05	2.29
	Catchment C+E (Existing) Lok Man Sun Chuen (47% unpaved)	52,021	103.0	15.4	87.6	370	23.7	9.6	9.6	1.5	11.1	187	0.69	1.88	2.18	2.45
	Catchment D (Proposed)[See Remark 2] Fully Paved	2,786	-	-	-	-	-	-	-	-	3.0	255	1.00	0.20	0.23	0.26
	Catchment C+D (Proposed) Lok Man Sun Chuen (o/a 47% unpaved)	52,359	103.0	15.4	87.6	370	23.7	9.6	9.6	1.0	10.6	190	0.69	1.92	2.23	2.50
	Catchment C+D+E (Proposed) Lok Man Sun Chuen (o/a 45% unpaved)	54,807	103.0	15.4	87.6	370	23.7	9.5	9.5	1.5	11.0	188	0.71	2.02	2.35	2.63

Notes:
Existing Site comprises concrete paving, C = 1; Steep Grassland, C = 0.35
Future Site Development will include Paved Areas, C = 1, with Soft Landscaping, C = 0.15
Catchments are small, so Rational Method is appropriate

Remarks:
1. Assumed Time of Concentration through stream flow. Velocity of 2m/s assumed for pipe flow in Catchment C
2. Nominal 3 minutes t_c adopted for Catchment D, with drains over a length of approximately 160m

Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC)
Hydraulic Calculations of Existing and Proposed Drainage System

Table 2a - 1 in 50 year Runoff of Existing Catchments (m/s^3)

	Catchment A	Catchment B	Catchment R1	Catchment R2	Catchment R3	Catchment C	Catchment C+E	Catchment D	Catchment C+D	Catchment C+D+E
Runoff	0.75	0.52	0.05	0.06	0.07	1.76	1.88	0.20	1.92	2.02
End-21st C	0.87	0.61	0.06	0.07	0.08	2.05	2.18	0.23	2.23	2.35
With Design Allowance	0.97	0.68	0.06	0.08	0.09	2.29	2.45	0.26	2.50	2.63

Table 3a - Hydraulic Capacities for Existing Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
D1-D2	SMH4029270	SMH4029271	Circular	525	28.1	13.81	13.59	9.81	0.0003	0.008	128	0.000001	2.14	0.22	0.46	0.42
D2-D3	SMH4029271	SMH4029272	Circular	525	34.1	13.59	9.90	9.81	0.0003	0.108	9	0.000001	8.02	0.22	1.74	1.65
D3-D4	SMH4029272	SMH4029273	Circular	525	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	6.58	0.22	1.42	1.35
D4-D5	SMH4029273	SMH4029274	Circular	525	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	3.86	0.22	0.84	0.75
D5-D6	SMH4029274	SMH4029177	Circular	525	30.1	7.50	6.11	9.81	0.0003	0.046	22	0.000001	5.23	0.22	1.13	1.08

Table 3b - Hydraulic Capacities for Proposed Drainage System (Kau Pui Lung Road)/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
P3-P2	SMH4029168	SMH4029170	Circular	450	35.2	14.44	14.32	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P2-P1	SMH4029170	SMH4029171	Circular	450	36.8	14.32	14.20	9.81	0.0003	0.003	300	0.000001	1.26	0.16	0.20	0.18
P1-D1	SMH4029171	SMH4029270	Circular	**750**	63.0	14.20	**13.65**	9.81	0.0003	0.009	115	0.000001	2.82	0.44	1.24	1.12
D1-D2	SMH4029270	SMH4029271	Circular	**750**	28.1	**13.65**	**13.00**	9.81	0.0003	0.023	43	0.000001	4.60	0.44	2.03	1.83
D2-D3	SMH4029271	SMH4029272	Circular	**750**	34.1	**13.00**	9.90	9.81	0.0003	0.091	11	0.000001	9.15	0.44	4.04	3.84
D3-D4	SMH4029272	SMH4029273	Circular	**750**	24.0	9.90	8.15	9.81	0.0003	0.073	14	0.000001	8.19	0.44	3.62	3.44
D4-D5	SMH4029273	SMH4029274	Circular	**750**	24.9	8.15	7.52	9.81	0.0003	0.025	40	0.000001	4.81	0.44	2.13	1.91
D5-D6	SMH4029274	SMH4029177	Circular	**750**	30.1	**7.52**	6.11	9.81	0.0003	0.047	21	0.000001	6.56	0.44	2.90	2.75

Table 4a - Comparison of Runoff from Existing Catchments and Hydraulic Capacities of Existing Drains (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
D1-D2	SMH4029270	SMH4029271	525	0.42	A-B-R1-R2	1.38	332.0%	NO
D2-D3	SMH4029271	SMH4029272	525	1.65	A-B-R1-R2	1.38	83.9%	YES
D3-D4	SMH4029272	SMH4029273	525	1.35	A-B-R1-R2-R3	1.45	107.6%	NO
D4-D5	SMH4029273	SMH4029274	525	0.75	A-B-R1-R2-R3	1.45	193.3%	NO
D5-D6	SMH4029274	SMH4029177	525	1.08	A-B-R1-R2-R3	1.45	135.3%	NO

Table 4b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.05	27.6%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.05	27.6%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.12	A-R1-R2	0.86	76.8%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.83	A-B-R1-R2	1.38	75.6%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.38	36.0%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.45	42.3%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.45	76.0%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.45	52.8%	YES

Table 4c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.06	32.0%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.06	32.0%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.12	A-R1-R2	1.00	89.1%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.83	A-B-R1-R2	1.60	87.7%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.60	41.8%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.69	49.1%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.69	88.2%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.69	61.3%	YES

Table 4d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Kau Pui Lung Road/Chi Kiang Street) - End-21st Century with Design Allowance

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
P3-P2	SMH4029168	SMH4029170	450	0.18	R1	0.06	35.9%	YES
P2-P1	SMH4029170	SMH4029171	450	0.18	R1	0.06	35.9%	YES
P1-D1	SMH4029171	SMH4029270	**750**	1.12	A-R1-R2	1.12	99.9%	YES
D1-D2	SMH4029270	SMH4029271	**750**	1.83	A-B-R1-R2	1.80	98.3%	YES
D2-D3	SMH4029271	SMH4029272	**750**	3.84	A-B-R1-R2	1.80	46.8%	YES
D3-D4	SMH4029272	SMH4029273	**750**	3.44	A-B-R1-R2-R3	1.89	55.0%	YES
D4-D5	SMH4029273	SMH4029274	**750**	1.91	A-B-R1-R2-R3	1.89	98.8%	YES
D5-D6	SMH4029274	SMH4029177	**750**	2.75	A-B-R1-R2-R3	1.89	68.7%	YES

Table 5a - Hydraulic Capacities for Existing Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
SMH4028820-B1	SMH4028820	SMH4114290	Circular	225	5.3	11.728	11.238	9.81	0.0003	0.092	11	0.000001	4.37	0.04	0.17	0.17
B1-B2	SMH4114290	SMH4114291	Circular	750	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	4.71	0.44	2.08	1.87
B2-B3	SMH4114291	SMH4114292	Circular	750	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.19	0.44	1.85	1.67
B3-B4	SMH4114292	SMH4114294	Circular	750	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.46	0.44	1.97	1.77

Table 5b - Hydraulic Capacities for Proposed Drainage System (Lok Shan Road)/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Type of Channel	Pipe Dia.	Pipe Length	Invert Level 1	Invert Level 2	g	k_s	s	Gradient	v	V	Area	Q	Q_{silt}^3
				mm	m	mPD	mPD	m/s^2	m		1 in	m^2/s	m/s	m^2	m^3/s	m^3/s
A1-A2	SMH4028832	SMH4028831	Circular	**450**	13.1	12.4	12.238	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A2-A3	SMH4028831	SMH4028830	Circular	**450**	9.6	12.238	12.120	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A3-A4	SMH4028830	SMH4028829	Circular	**450**	25.4	12.120	11.807	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A4-A5	SMH4028829	SMH4028828	Circular	**450**	4.8	11.807	11.747	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A5-A6	SMH4028828	SMH4110924	Circular	**450**	3.6	11.747	11.703	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
A6-NM1	SMH4110924	New Manhole	Circular	**450**	24.3	11.703	11.403	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
NM1-B1	New Manhole	SMH4114290	Circular	**450**	25.4	11.403	11.090	9.81	0.0003	0.012	81	0.000001	2.45	0.16	0.39	0.35
B1-B2	SMH4114290	SMH4114291	Circular	**900**	13.6	10.640	10.310	9.81	0.0003	0.024	41	0.000001	5.27	0.64	3.35	3.02
B2-B3	SMH4114291	SMH4114292	Circular	**900**	19.8	10.280	9.900	9.81	0.0003	0.019	52	0.000001	4.68	0.64	2.98	2.68
B3-B4	SMH4114292	SMH4114294	Circular	**900**	22.0	9.850	9.371	9.81	0.0003	0.022	46	0.000001	4.99	0.64	3.17	2.86

Table 6a - Comparison of Runoff from Existing Catchments and Hydraulic Capacities of Existing Drains (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?
NM1-B1	New Manhole	SMH4114290	225	0.17	Minor Local	0.00	0.0%	YES
B1-B2	SMH4114290	SMH4114291	750	1.87	C	1.76	94.1%	YES
B2-B3	SMH4114291	SMH4114292	750	1.67	C	1.76	105.9%	NO
B3-B4	SMH4114292	SMH4114294	750	1.77	C+E	1.88	106.1%	NO

Table 6b - Comparison of Runoff from Proposed Catchments and Hydraulic Capacities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.20	56.4%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	1.92	63.6%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	1.92	71.6%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.02	70.8%	YES	

Table 6c - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - End-21st Century

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.23	65.4%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	2.23	73.8%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	2.23	83.0%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.35	82.1%	YES	

Table 6d - Comparison of Runoff from Proposed Catchments and Hydraulic Capcities of Proposed Drainage System (Lok Shan Road/Ma Tau Wai Road) - End-21st Century with Design Allowance

Segment	Manhole Reference	Manhole Reference	Pipe Dia. mm	Q_{silt}[1] m^3/s	Catchment Involved	Runoff m^3/s	Occupancy	Sufficient Capacity?	
NM1-B1	New Manhole	SMH4114290	450	0.35	D	0.26	73.3%	YES	Proposed Upstream Drains have the same capacity
B1-B2	SMH4114290	SMH4114291	900	3.02	C+D	2.50	82.7%	YES	
B2-B3	SMH4114291	SMH4114292	900	2.68	C+D	2.50	93.0%	YES	
B3-B4	SMH4114292	SMH4114294	900	2.86	C+D+E	2.63	92.1%	YES	

Table 6e - Summary of Flow Rates as a Result of Proposed Drainage Diversion (Lok Shan Road/Ma Tau Wai Road)

Segment	Manhole Reference	Manhole Reference	Flow Rate (m^3/s)						Remarks
			Without Diversion		With Diversion		Increases		
			Existing	End 21st C + Design Allowance	Existing	End 21st C + Design Allowance	Existing	End 21st C + Design Allowance	
NM1-B1	New Manhole	SMH4114290	0.00	0.00	0.20	0.26	0.20	0.26	Existing drains to be upgraded to accommodate flow to End 21st Century plus Design Allowance
B1-B2	SMH4114290	SMH4114291	1.76	2.29	1.92	2.50	0.16	0.20	
B2-B3	SMH4114291	SMH4114292	1.76	2.29	1.92	2.50	0.16	0.20	
B3-B4	SMH4114292	SMH4114294	1.88	2.45	2.02	2.63	0.14	0.18	

Remarks:

1. Cross Section Area of U-channel: (D^2 x PI) / 4 / 2 + (H x D) / 2
2. Cross Section Area of Circular Pipe: D^2 x PI / 4
3. Qsilt: 10% reduction in capacity for gradients not greater than 1 in 25; 5% reduction in flow for gradients greater than 1 in 25

AVA (RtoC_8)

(Feb 2023)

Prepared for

Urban Renewal Authority

Prepared by

Ramboll Hong Kong Limited

FEASIBILITY STUDY FOR CBS-2: KC

QUANTITATIVE AIR VENTILATION ASSESSMENT

Date	**1 February 2023**
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1. INTRODUCTION

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). An Air Ventilation Assessment (AVA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 Ramboll Hong Kong Limited has been commissioned to undertake this AVA for the Scheme. This AVA contains a quantitative Computational Fluid Dynamics (CFD) assessment to evaluate the potential ventilation impact of the proposed development on the surrounding future pedestrian wind environment.

1.1.3 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.1.4 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.2 Subject Site and its Environs

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one development site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two parts, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.3 Proposed Development

1.3.1 The site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 Under notional layout of the Revised Design 2022, the Northern Site consists of five residential towers providing 1374 residential units, clubhouses (about 3,435m^2), retail (about 8,587m^2) and community facilities (about 500m^2). The Southern Site consists of two residential towers providing 950 residential units, clubhouses (about 2,755m^2), retail (about 6,888m^2) and community facilities (about 2,000m^2). A block plan of the notional layout is provided in **Appendix 2**.

1.3.3 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objectives

1.4.1 To address the above changes in the draft DSP, it is considered necessary to revise the AVA to support the re-submission to TPB for consideration. In this AVA, apart from the proposed development parameters, internal boundary between the sites and the types of housings, the methodology adopted in the last AVA (ref. no.: R6917_v1.5 dated February 2022) remain unchanged.

1.5 Future/ Committed Development

1.5.1 It is noted that there are several future/ committed developments in the nearby area. Furthermore, referring to the GeoInfo Map from Lands Department and site visit on 02 September 2022, there are several "work-in-progress" (WIP) sites in the area. **Figure 2** illustrated the locations of these future/ committed development and **Figure 3** shows the building block with building height assumed in the CFD simulation.

1.5.2 Following sites are under construction and almost completed. Therefore, building bulk could be observed during site visit or from the sale brochure.

1. No. 10 Maidstone Road
2. 41, 43 and 45 Pau Chung Street
3. Public Housing Development at Ko Shan Road
4. Proposed Residential Redevelopment at 470-478 Chatham Road North

1.5.3 Following are future re-development site for Urban Renewal Authority (URA), the building information was provided by URA.

5. KC-016
6. KC-010
7. KC-011
8. KC-014
9. DL-8KC
10. KC-013
11. KC-012
12. KC-009

1.5.4 The East Kowloon Corridor is the major elevated structure within the surrounding area.

1.5.5 There are two To Kwa Wan Station entrances/ exits located on Kiang Su Street and Lok Shan Road for MTR Tuen Ma Line, respectively. One storey structure for both entrances/ exits is included in the assessment.

1.6 Baseline Scheme

1.6.1 **Appendix 1** shows that the layout of the Baseline Scheme for assessment purposes. The Baseline Scheme comprises of 7 residential towers on top of three storeys podium. The main roof level is not more than 120 mPD. It is noted that the Baseline Scheme complies with the stipulated OZP development restrictions and SBD guidelines. The assumption of development follows the market practice.

1.6.2 The following mitigation measures have been identified in the Baseline Scheme.

- 15m building separation at grade along Maidstone Road; and
- 18m breezeway along Kiang Su Street at the direction of E-W.

1.7 Proposed Scheme

1.7.1 The Proposed Scheme comprises of 7 residential towers on top of 2 storeys podium and 4 storeys basement of carpark and retail. The main roof level is not more than 140 mPD. All the towers are located along the eastern and western boundary. However,

it must be noted that this Proposed Scheme is for indicative purpose only that the notional layout is subject to detailed design upon DSP approval.

1.7.2 The following are the podia separation proposed in the Proposed Scheme (i.e. wind enhancement features).

- At least 17m podia separation at grade along the N-S pedestrianised avenue (i.e. existing Maidstone Road); and
- 23m breezeway between the podia along Kiang Su Street at the direction of E-W.

1.7.3 On top of the 2 wind enhancement features, the proposed building height of 140mPD can reduce the bulkiness of buildings, number of blocks, and size of podia, which can facilitate wider building/podia separation in the notional design to further enhance wind flow environment. Under the notional design of the Proposed Scheme, the following wider building/podia separation can be achieved:

- over 50m building separation at Tower between T1 and T5;
- about 13m podia separation between T2 and T3;
- over 20m building separation at Tower between T4 and T5; and
- over 30m building separation at Tower between T4 and T6 at the direction of E-W.

1.7.4 In addition, there are several permeable elevated footbridges on the podium level at about 20.1 mPD to connect among different towers in both Northern Site and Southern Site.

1.7.5 **Appendix 2** shows the MLP of the Proposed Scheme.

1.8 Comparison of the Baseline Scheme and Proposed Scheme

1.8.1 The building height and GFA are higher in the Proposed Scheme compared to the Baseline Scheme. The building height of each building of both the Baseline Scheme and the Proposed Scheme has been indicated on the MLPs in **Appendix 1 and 2**. Comparison table of the development parameter proposed for two schemes is listed in **Table 1.1** below.

1.8.2 In both schemes, there is a N-S building separation; and the effective width is ~15m and 17m for the Baseline Scheme and the Proposed Scheme respectively.

1.8.3 In addition, the podia separation aligned with Kiang Su Street is 23m for the Proposed Scheme, which is much larger than that of 18m in the Baseline Scheme.

1.8.4 The building separation between T1 and T5 has been enlarged from about 30m to above 50m.

1.8.5 Compared with the continuous bulky podia between T2 and T3 as well as T1 and T5 in the Baseline Scheme, smaller podia with additional separation of 13m width between T2 and T3 can be achieved in the design of the podia under the Proposed Scheme. In addition, the podium under T6 is reduced, and the podia separation between it and Ming Fat Building is increased from 3m to 11m in the Proposed Scheme.

1.8.6 The footprint of T6 has been reduced and T7 has been moved to the southwest corner of the Subject Site in the Proposed Scheme, namely T6 and T7 in Southern Site.

Table 1.1 Development Parameter of the Baseline Scheme and Proposed Scheme

	Baseline Scheme			**Proposed Scheme**		
Building Height Restriction	120 mPD			140 mPD		
Towers Height	Varies from 105 -120 mPD			140 mPD		
Net Site Area	11,369 sqm *			15,475 sqm		
Proposed Total GFA	102,321 sqm			123,800 sqm		
	Northern	Southern	Overall	#Northern	#Southern	Overall
Proposed Domestic PR	7.5	7.5	7.5	8.0	8.0	8.0
Proposed Non-domestic PR	1.5	1.5	1.5	1.0	1.0	1.0
Proposed Total PR	9.0	9.0	9.0	9.0	9.0	9.0

* All the public road like Kiang Su Road and Maidstone Road are excluded in the site area under the Baseline Scheme.

The Site boundaries between Northern Site and Southern Site in the Proposed Scheme is indicative and subject to change.

2. SITE WIND AVAILABILITY

2.1 Site Wind Availability Data

2.1.1 According to the Planning Department's website, a meso-scale Regional Atmospheric Modeling System (RAMS) has been used to produce a simulated 10-year wind climate at the horizontal resolution of 0.5 km x 0.5 km covering the whole territory of Hong Kong. The simulated wind data represents the annual, winter and summer wind condition at various levels, i.e. 200 m, 300 m, and 500 m above terrain.

2.1.2 It is considered acceptable to use the simulated RAMS data for site wind availability. The use of RAMS data (grid: 083, 042) is preferred over measurement data at Waglan Island as it can reflect the effect of topography on wind availability.

2.1.3 The relevant annual windrose for the concerned district has been extracted from the Planning Department's website for site wind availability data. **Figure 4** shows the relevant windrose diagram (at 500 m) representing the frequency and wind speed distribution of the concerned district for both summer and annual conditions.

2.1.4 The windroses results illustrate the wind environment is affected by topography and buildings. **Table 2.1** below sets out a summary of the simulated site wind availability data including the probability of occurrence. In this quantitative AVA a CFD software has been used. According to the Technical Guide, simplification of wind data for the initial study has been adopted. The wind directions with highest probability of occurrence are selected for AVA purpose. A total of 11 wind directions has been selected (as highlighted in **Table 2.1**) with overall frequency of occurrence equivalent to 78.8 % and 81.9 % respectively of the time in a year (for both annual and summer conditions).

Table 2.1 Summary of RAMS Data and Wind Direction

Wind Direction	Probability for Annual Condition (%)	Probability for Summer Condition (%)
N	2.3	0.9
NNE	6.4	1.1
NE	7.8	1.4
ENE	12.3	2.6
E	22.3	9.1
ESE	11.8	9.9
SE	5.9	8.1
SSE	4.1	7.3
S	4.4	9.1
SSW	6	13.5
SW	6.3	15.1
WSW	3.9	9.8
W	2.6	5.7
WNW	1.4	2.8
NW	1.2	2.3
NNW	1.2	1.2

2.2 Topography and Building Morphology

Topography

2.2.1 The waterfront is located 500m to the east of the Subject Site. The topography close to the Subject Site is generally flat to the east. The ground elevation increases gradually to about 80 mPD from the Kau Pui Lung Road towards west. The Ho Man Tin area with elevation up to 70 mPD is located to 150m to the southwest of the Subject Site.

Building Morphology

2.2.2 The Subject Site is immediately surrounded by mid- to high- rise developments. The building height information of these identified developments is extracted from Geo-Reference Database (BG1000) provided by Survey and Mapping Office/ Lands Department.

2.2.3 **Table 2.2** and **Figure 4** highlights the building height of the surrounding developments.

Table 2.2 Surrounding Development

Name of Development	Building Height mPD	Location relative to the Application Site
324 – 354 Ma Tau Wai Road	~31 - ~40	East
Mai Lok Building	~48	East
Kong Yiu Mansion	~64	East
Braemar Court	~84	East
Lucky Building	~70	East
Wah On Court	~43	East
Hau Hing Mansion	~31	East
Pak Kin Building	~58	East
278 – 286 Ma Tau Wai Road	~25	East
On Chun Mansion	~56	East
Seng Cheong Building	~45	East
Ming Fat Building	~78	South
C.C.C. Wanchai Church Kei To Primary School	~36	Southwest
Lok Man Sun Chuen	~62 - ~81	South and West
Fu Yu Court	~47	North
Maxim Mansion	~46	North
1A – 1C Lok Shan Road	~32	North
356 Ma Tau Wai Road	~31	Northeast

3. QUANTITATIVE ASSESSMENT METHODOLOGY

3.1 Atmospheric Conditions

3.1.1 Simulated wind profile curves are extracted from the Planning Department's website using RAMS site wind availability data and is directly adopted for this quantitative AVA. **Figure 5** shows the wind profile curves for grid X:083, Y:042.

3.1.2 Wind profile curves 0, 1 and 2 would be utilized for quantitative AVA according to the selected wind directions in **Table 2.1**.

3.1.3 For elevation from 0 to 10 m where wind profile information is not available, the wind speed is assumed based on fitted Log Law and measured wind speed value at 10 m from the RAMS site wind availability data for each wind profile curve.

3.1.4 The wind profile of 0 m to 10 m is interpolated and then combined with the wind profile curves on RAMS site wind availability data.

3.1.5 **Figure 5, 6 and 7** shows the assessment area and surrounding area of the CFD model, the windrose diagram and the wind profile curve respectively

3.2 CFD Code and Major Parameters

3.2.1 A quantitative assessment based on requirement for Initial Study stipulated in the relevant Technical Guide has been conducted for the purpose of comparing the air ventilation performance between the Proposed and the Baseline Schemes.

3.2.2 The quantitative assessment is conducted by using a commercial CFD code, FLUENT. FLUENT model had been widely applied for various AVA research and studies worldwide. The accuracy level of the FLUENT model is well-accepted by the industry for AVA application.

3.2.3 Realizable K-epsilon turbulence providing better prediction of separation and vortexes has been adopted for air ventilation assessment as recommended in COST action C14.

3.2.4 Generally, the assessment area is determined by the height (H = 160m) of the highest building within the surrounding area. The domain covers the model area of over 320m. The surrounding area is determined by 2 times of the assessment area from the project site boundary. It is confirmed that all major noise barriers, elevated structures, and planned / committed / existing developments as discussed in section 1.3 and 2.2 have been modelled in the simulation. **Figure 6** indicated the assessment area and surrounding area of the CFD model.

3.2.5 The domain dimension is about 5500m x 5700m and with an elevation of 1500m. More than 11,900,000 grid cells has been defined to simulate the air flow. Given the large domain adopted in this assessment and the physical limitation on the computational resources of the CFD model, the horizontal and vertical grid size employed in the CFD model in the vicinity of the Project Area is taken as a global minimum size of 2m and increase for the grid cells further away from the Project Area at a growth ratio of 1.3. The global maximum size of cells is 32m and smaller cell size up to 0.5m was used. Besides, four layers of prism cells (each layer of 0.5m thick) are employed above the terrain of Subejct Site. The blockage ratio is less than 3%.

3.2.6 The windward boundary is defined as inflow with the wind profile defined. The leeward boundary is defined as outflow. The sky and lateral boundaries are defined as symmetric boundary condition.

3.2.7 **Appendix 3** shows the domain size and the CFD model in different views. **Figure 5** shows the wind profile curve adopted.

3.2.8 The advection terms of the momentum and viscous terms are resolved with the second order numerical schemes. The scaled residuals are converged to an order of magnitude of at least 1 x 10-4 as recommended in COST action C14.

3.3 Important Areas

3.3.1 The important surrounding areas that the public would often access have been identified as follows:

(1)	Lok Man Sun Chuen	(14)	Anhui Street
(2)	Kau Pui Lung Road	(15)	Ko Shan Road Park
(3)	Maidstone Road	(16)	Kau Pui Lung Road Playground
(4)	Lok Shan Road	(17)	C. C. C. Wanchai Church Kei To Primary School (Kowloon City)
(5)	Ma Tau Wai Road	(18)	Po Leung Kuk Madam Chan Wai Chow Memorial School
(6)	Sheung Heung Road	(19)	Po Leung Kuk Lam Man Chan English Primary School
(7)	Pau Chung Street	(20)	E.L.C.H.K. Hung Hom Lutheran Primary School
(8)	Kowloon City Road	(21)	S.K.H. Good Shepherd Primary School
(9)	Sze Chuen Street	(22)	Ball Court on rooftop of To Kwa Wan Market
(10)	Ha Heung Road	(23)	Kiang Su Street
(11)	Chi Kiang Street	(24)	Ma Tau Wai Road/ To Kwa Wan Road Garden
(12)	Ko Shan Road	(25)	To Kwa Wan Road
(13)	Kiang His Street		

3.4 Test Point Location

3.4.1 A total of 176 test points (including 30 numbers of perimeter test points defined along the boundary of the Application Site, 139 numbers of overall test points and 7 numbers of special test points) have been selected for quantitative air ventilation assessment. The overall test points generally representing important pedestrian areas are listed in section 3.3. All test points are located at 2 m above ground level.

3.4.2 **Figures 8** shows the location of test points for quantitative air ventilation assessment.

4. KEY FINDINGS

4.1 Spatial Average Wind Velocity Ratios

4.1.1 The velocity ratio under a specific wind direction at a test point is calculated by dividing the simulated wind speed at the test point under this wind direction with the velocity at gradient height under the same wind direction. All test points are located at 2 m above ground level.

4.1.2 **Table 4.1** shows the Site spatial average velocity ratio (SVR), local spatial average velocity ratio (LVR) and average wind velocity ratio along surrounding air sensitive area during annual condition and summer condition (for the Baseline Scheme (BS) and Proposed Scheme (PS)).

4.1.3 The wind velocity ratios of individual test points are shown in **Figure 9a** and **Figure 10a** for annual condition of the Baseline Scheme and Proposed Scheme respectively, and **Figure 9b** and **Figure 10b** for summer condition of the Baseline Scheme and Proposed Scheme respectively. **Appendix 4** shows detailed simulation results of the Baseline Scheme and the Proposed Scheme respectively.

Table 4.1 Summary of Spatial Average Wind Velocity Ratios (VR) – Annual and Summer Condition

Location	Tests Point	Annual Condition		Summer Condition	
		BS	PS	BS	PS
SVR	P01-P30	0.08	**0.09**	0.08	**0.09**
LVR	P01-P30, T01-T139	0.08	0.08	0.09	0.09
Lok Man Sun Chuen	T01-T13, T105-T111, T125-T132	0.07	**0.08**	0.09	0.09
Kau Pui Lung Road	T14-T24, P17, P19, P21, P23, P25	0.13	0.13	**0.15**	0.14
Maidstone Road	T27-T31, S01-S05, P01, P14-P15, P30	0.08	**0.09**	0.08	**0.10**
Lok Shan Road	P01, T32-T38	0.07	**0.08**	0.08	**0.09**
Ma Tau Wai Road	T39-T50, T33-T34, T77, T116-T119	0.07	0.07	0.07	0.07
Sheung Heung Road	T40, T52-T53	0.07	**0.08**	0.06	0.06
Pau Chung Street	T35, T53-T55	**0.08**	0.07	0.06	0.06
Kowloon City Road	T37, T56-T61	0.08	0.08	**0.06**	0.05
Sze Chuen Street	T59, T62-T63	0.05	**0.06**	0.04	**0.05**
Ha Heung Road	T63-T66	0.06	**0.07**	0.06	**0.07**
Chi Kiang Street	P15-P17, T66-T70, T48	0.09	**0.11**	0.09	**0.10**
Ko Shan Road	T67, T71-T75	0.08	**0.09**	0.13	**0.14**
Kiang His Street	T74, T76-T77	0.14	0.14	0.18	0.18
Anhui Street	T50, T72, T78	0.11	0.11	0.09	0.09
Ko Shan Road Park	T79-T87	0.10	0.10	0.16	0.16
Kau Pui Lung Road Playground	T25-T26, T51	**0.11**	0.09	**0.13**	0.12
C.C.C. Wanchai Church Kei To Primary School (Kowloon City)	T88-T91	0.03	0.03	**0.06**	0.05

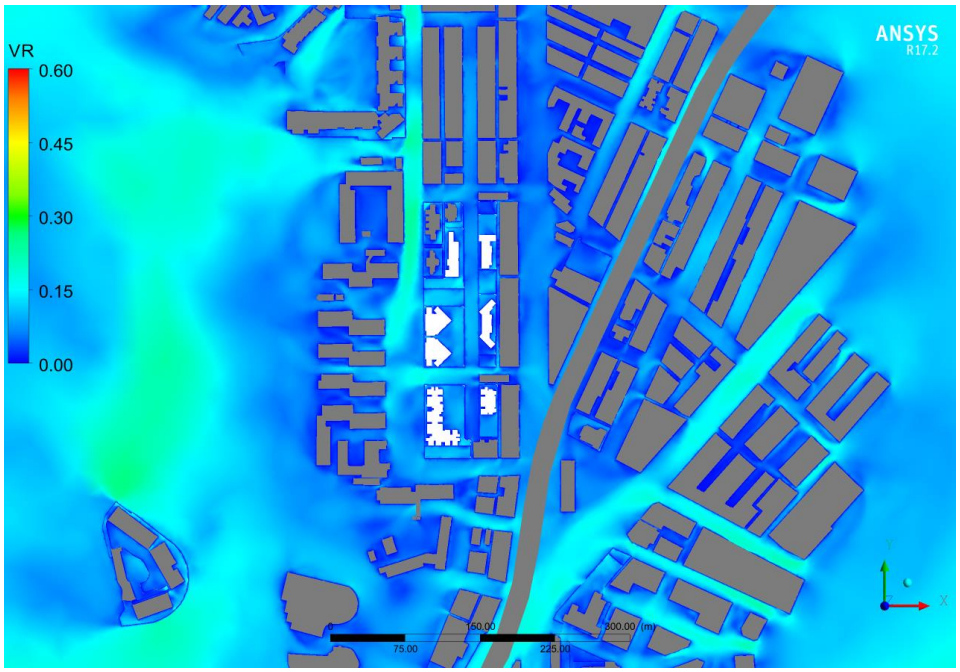
Location	Tests Point	Annual Condition		Summer Condition	
		BS	PS	BS	PS
Po Leung Kuk Madam Chan Wai Chow Memorial School	T92-T94	0.04	0.04	0.04	0.04
Po Leung Kuk Lam Man Chan English Primary School	T95-T97	0.02	0.02	0.02	0.02
E.L.C.H.K. Hung Hom Lutheran Primary School	T42, T98-T100	0.03	0.03	0.03	0.03
S.K.H. Good Shepherd Primary School	T101-T104	0.02	0.02	0.03	0.03
Ball Court on rooftop of To Kwa Wan Market	T112-T115	0.05	0.05	0.04	0.04
Kiang Su Street	P10, P11, P21, S04, S06, S07	**0.11**	0.09	**0.10**	0.09
Ma Tau Wai Road/ To Kwa Wan Playground	T120-T124	0.11	0.11	**0.13**	0.12
To Kwa Wan Road	T70, T124, T133-T139	0.13	0.13	0.14	0.14
Pedestrianised Avenue	S01-S05	0.08	**0.09**	0.07	**0.10**

Note: Highlighted in **red** where VR is higher in the Proposed Scheme

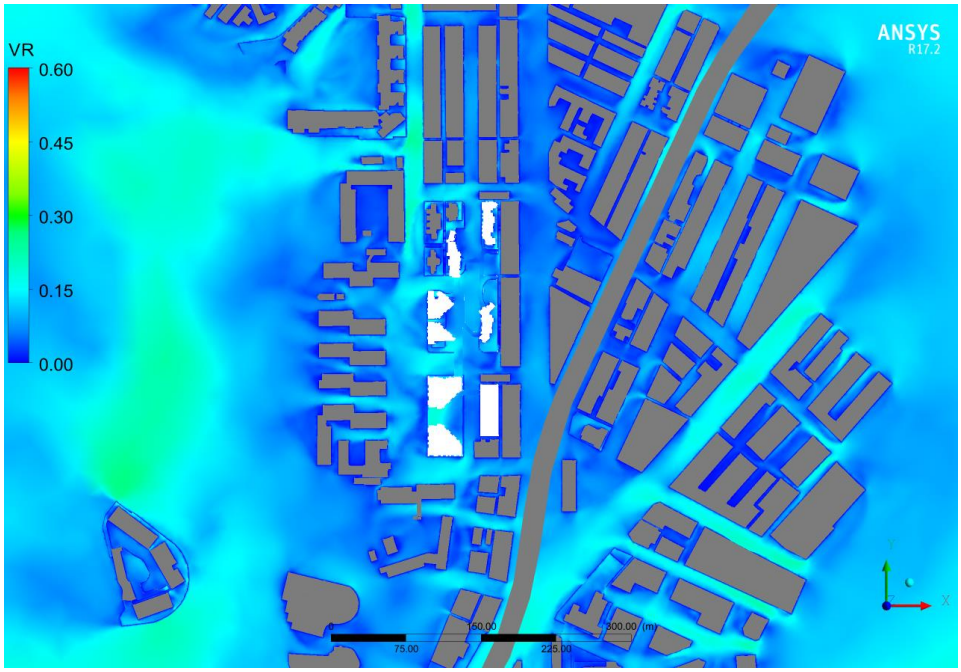
Highlighted in **blue** where VR is higher in the Baseline Scheme

4.2 Annual and Summer Weighted Average Contour

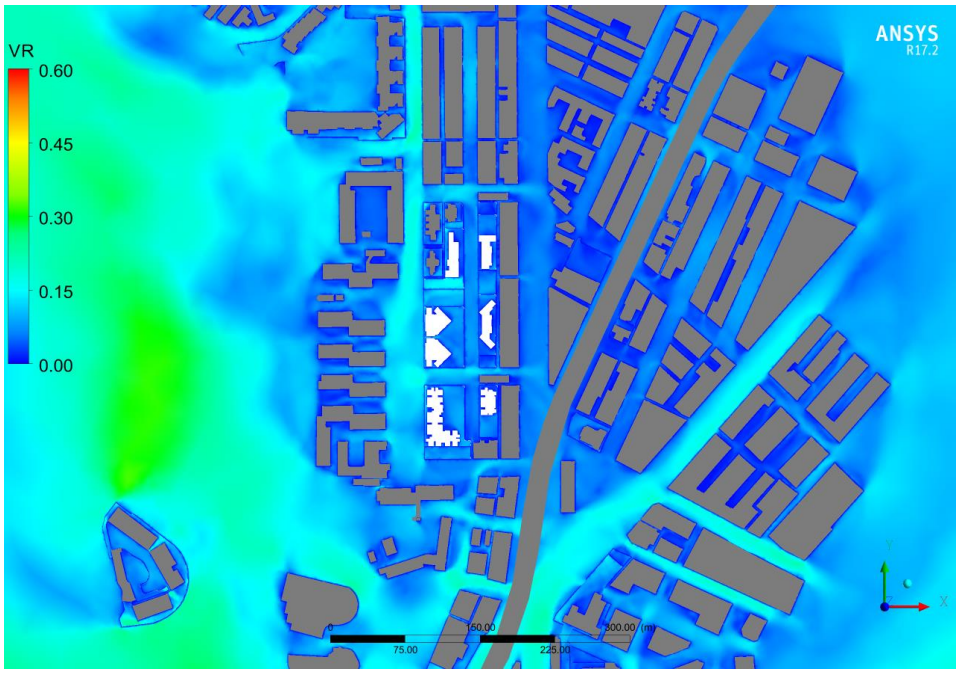
4.2.1 The annual and summer weighted average contour extracted below.



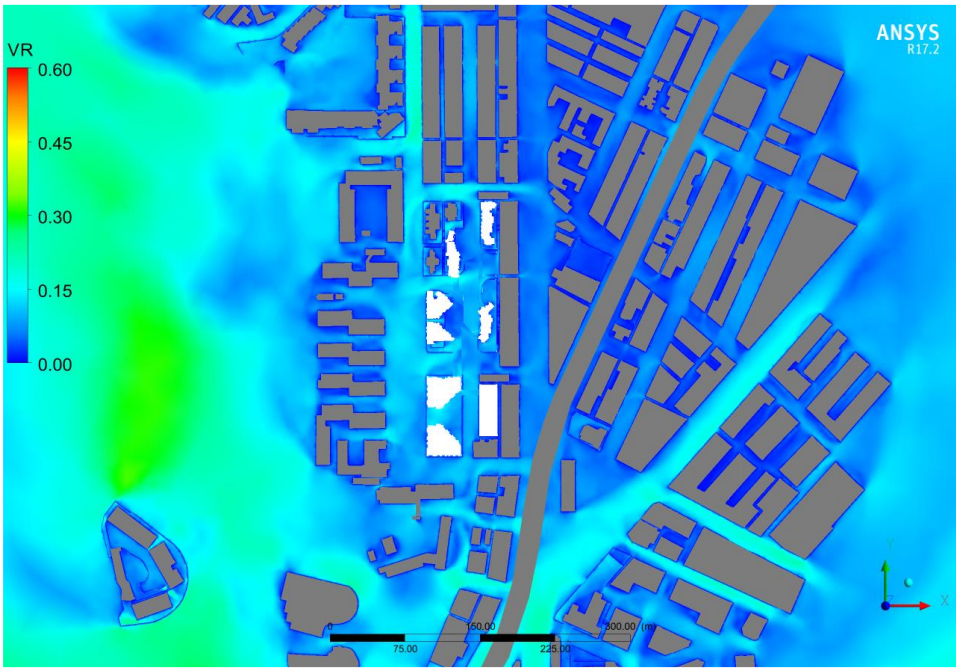
Annual Weighted Average Contour plot for Baseline Scheme



Annual Weighted Average Contour plot for Proposed Scheme



Summer Weighted Average Contour plot for Baseline Scheme



Summer Weighted Average Contour plot for Proposed Scheme

4.3 Discussion on Air Ventilation Performance

4.3.1 According to **Table 4.1** and the weighted average contour above, it is noted that the LVR is similar between the Proposed Scheme and Baseline Scheme under both annual and summer condition. The SVR is slightly better in the Proposed Scheme, compared to the Baseline Scheme, under both annual and summer condition. Based on the result, the increase in building height would not induce a significant impact to the nearby area in air ventilation term under both annual and summer condition.

4.3.2 There are some variations in VR between two schemes. Under the annual condition, the VR of some areas is higher under the Proposed Scheme, including Lok Man Sun Chuen, Maidstone Road, Lok Shan Road, Sheung Heung Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, VR is lower at Pau Chung Street, Kau Pui Lung Road Playground and Kiang Su Street under the Proposed Scheme.

4.3.3 Under the summer condition, the areas with higher VR under the Proposed Scheme are Maidstone Road, Lok Shan Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, the areas with higher VR under the Baseline Scheme are Kau Pui Lung Road, Kowloon City Road, Kau Pui Lung Road Playground, C.C.C. Wanchai Church Kei To Primary School (Kowloon City), Kiang Su Street and Ma Tau Wai Road/ To Kwa Wan Playground.

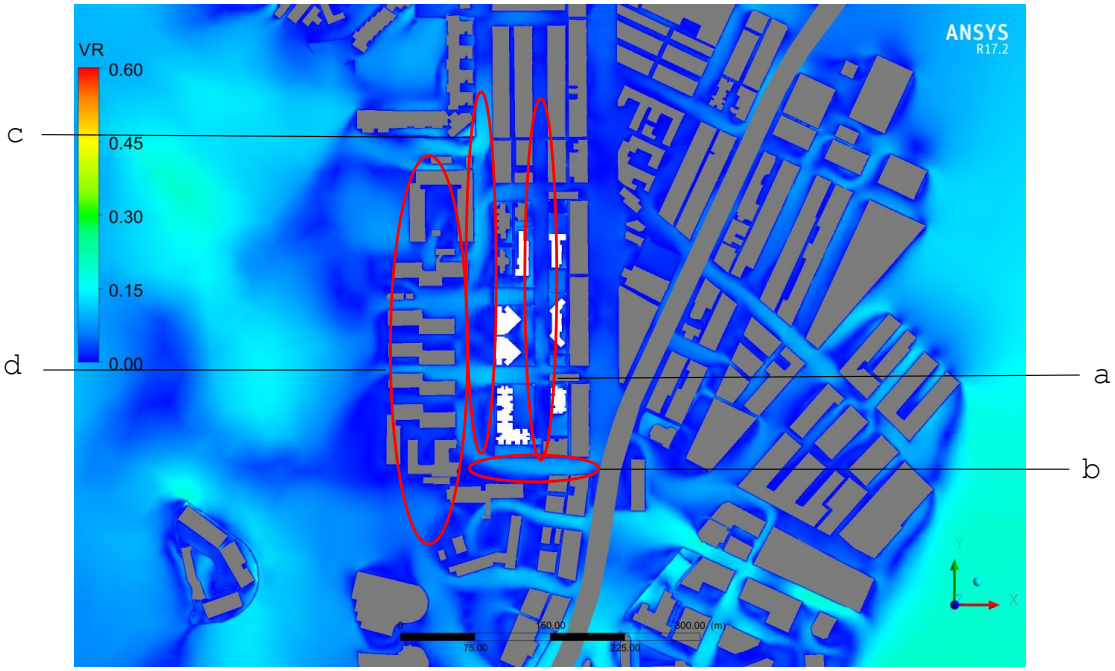
4.4 Wind Enhancement Features

4.4.1 Overall speaking, the Proposed Scheme and Baseline Scheme are comparable in performance in air ventilation terms.

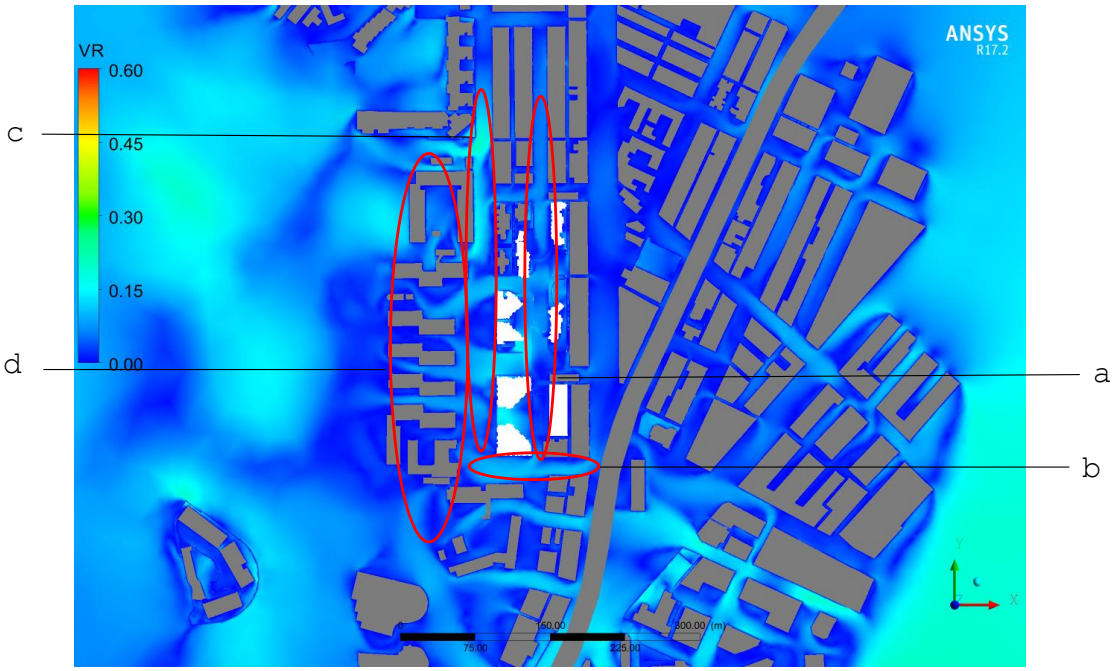
4.4.2 The Proposed Scheme offers one north-south building separation along Maidstone Road at the Subject Site. Also, the reduced podium extent under the Proposed Scheme improved the east-west wind penetration. Thus, it enhanced the internal ventilation and the immediate nearby area.

4.5 Directional Analysis

Wind performance under wind direction of NNE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.1 Under NNE wind, the wind would mainly flow from Ma Tau Wai Road and To Kwa Wan Road to reach the Subject Site.

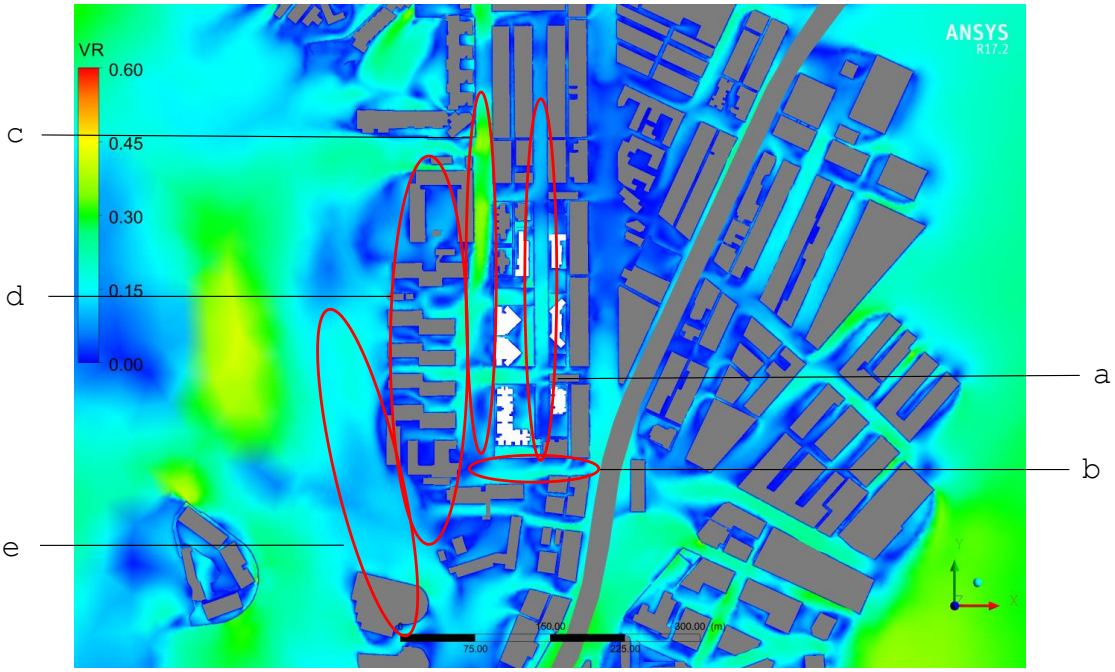
a. The wider building separation along Maidstone Road/ future pedestrianised avenue within the Subject Site in the Proposed Scheme enhanced the north-south wind penetration. Therefore, the VR is slightly higher at Maidstone Road/ future pedestrianised avenue.

b. The upcoming wind flows along Chi Kiang Street from east to west. Since the building disposition of T7 in Southern Site of the Proposed Scheme is closer to the southern boundary, the air flow at part of Chi Kiang Street to the south of the Subject Site is accelerated due to the channelling effect.

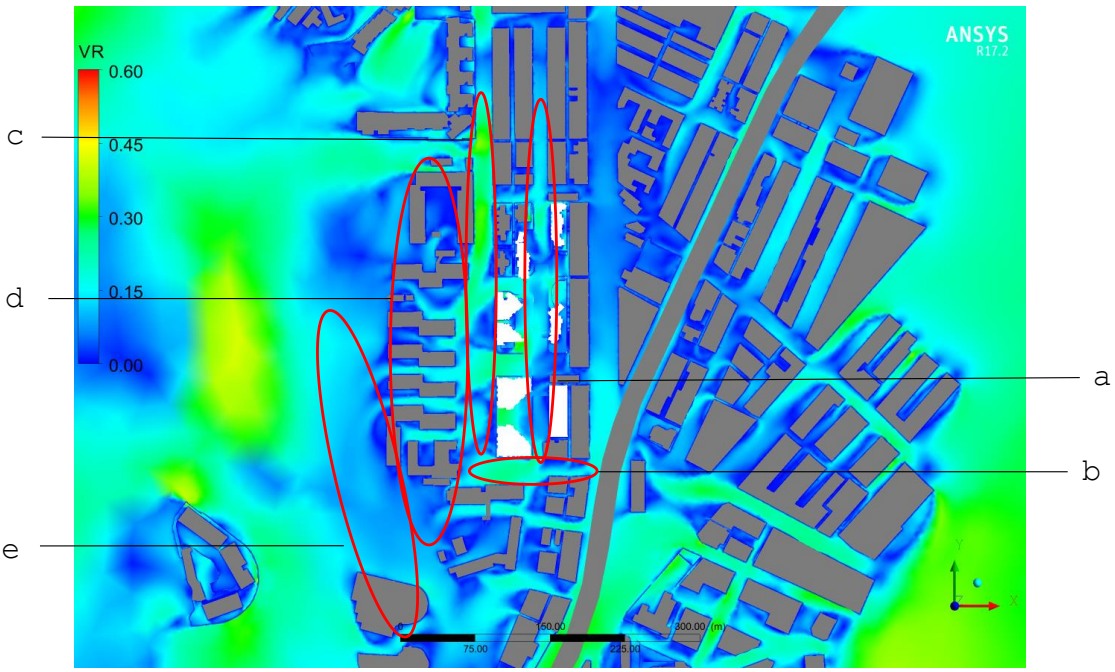
c. The wider building separation along Kiang Su Street and the split podia between T2 and T3 at ~13m distance in the Proposed Scheme enhanced the east-west wind penetration in the area. The same wind enhancement is created between T4 and T6 with about 33m building separation and 23m gap between podia in the Proposed Scheme. The enhanced wind flows continuous toward west and benefit Kau Pui Lung Road under the Proposed Scheme.

d. Better E-W direction flows within the Subject Site and Kau Pui Lung Road continuously flows towards west and benefits Lok Man Sun Chuen under the Proposed Scheme.

Wind performance under wind direction of NE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.2 Under NE wind, the wind would mainly flow from Ma Tau Wai Road and To Kwa Wan Road to reach the Subject Site.

a. The larger podium separation along Maidstone Road/ future pedestrianised avenue within the Subject Site from north to south direction in the Proposed Scheme enhances the north-south wind penetration. Therefore, the VR is higher at Maidstone Road/ future pedestrianised avenue under the Proposed Scheme.

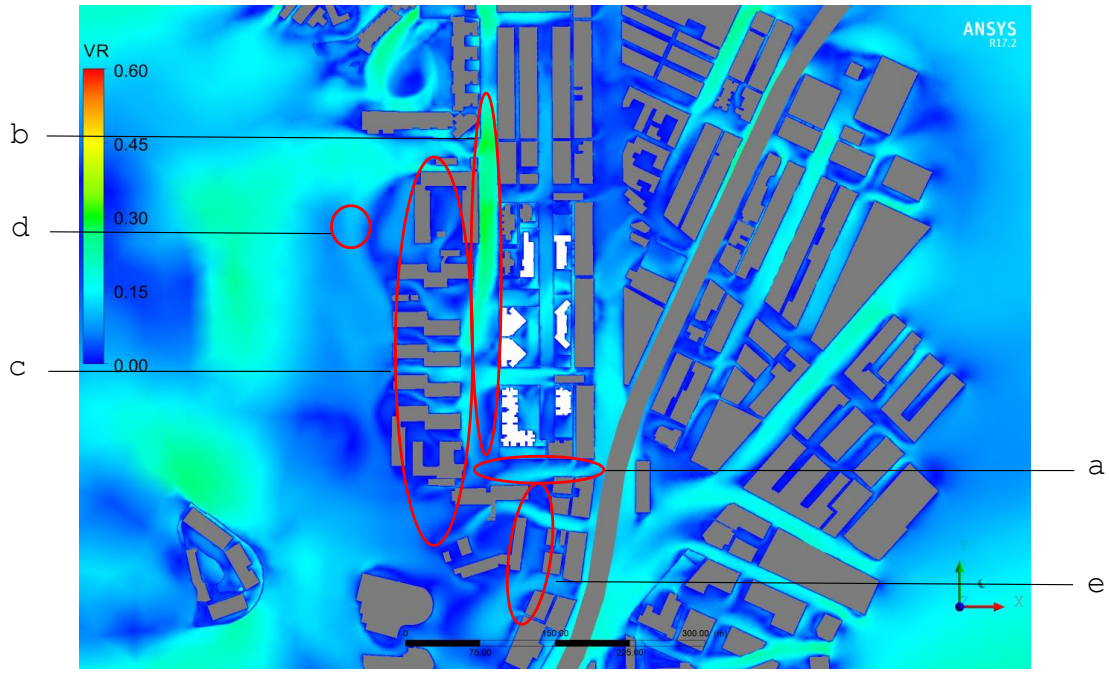
b. On the other hand, the upcoming wind flows along Chi Kiang Street from east to west. Since the building disposition of T7 in Southern Site of the Proposed Scheme is closer to the southern boundary, the air flow at part of Chi Kiang Street to the south of the Subject Site has better wind performance due to the channelling effect.

c. The wider building separation along Kiang Su Street and the split podia between T2 and T3 at ~13m distance in the Proposed Scheme enhanced the east-west wind penetration in the area. The same wind enhancement is created between T4 and T6 with about 33m building separation and 23m gap between podia in the Proposed Scheme. The enhanced wind flows continuous toward west and benefit Kau Pui Lung Road under the Proposed Scheme.

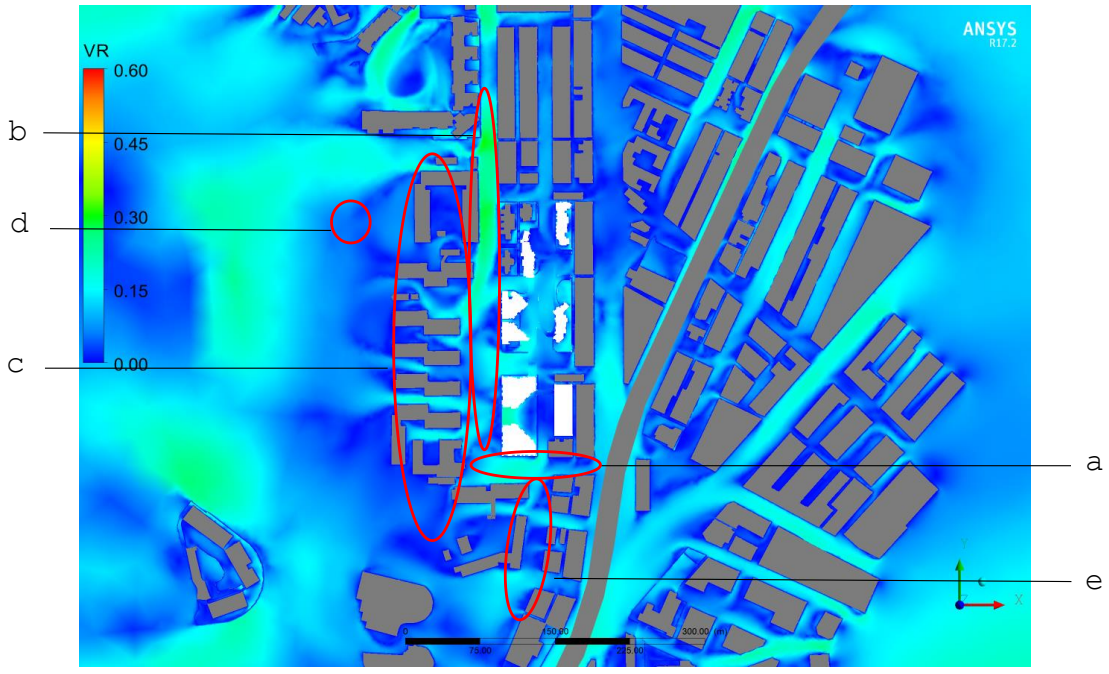
d. The more diverted wind flow from Kiang Su Street and the wider building separation of about 58m between T1 and T5 in the Proposed Scheme continuously flows toward the west and benefits the Lok Man Sun Chuen.

e. Upcoming NE wind flows along the private road to the north of Lok Seen Lau and continuously flows towards south due to the slope to the immediate west of Lok Man Sun Chuen. The stronger wind flow within Lok Man Sun Chuen from east to west along the building separations counter with the abovementioned flow which leads to lower VR in Ko Shan Road Park and the hillside to the west of the Subject Site under the Proposed Scheme.

Wind performance under wind direction of ENE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.3 Under ENE wind, the wind would mainly flow from To Kwa Wan Road to reach the Subject Site.

a. The upcoming wind flows along Chi Kiang Street from east to west. Since the building disposition of T7 in Southern Site of the Proposed Scheme is closer to the southern boundary, the air flow at part of Chi Kiang Street to the south of the Subject Site is accelerated due to the channelling effect.

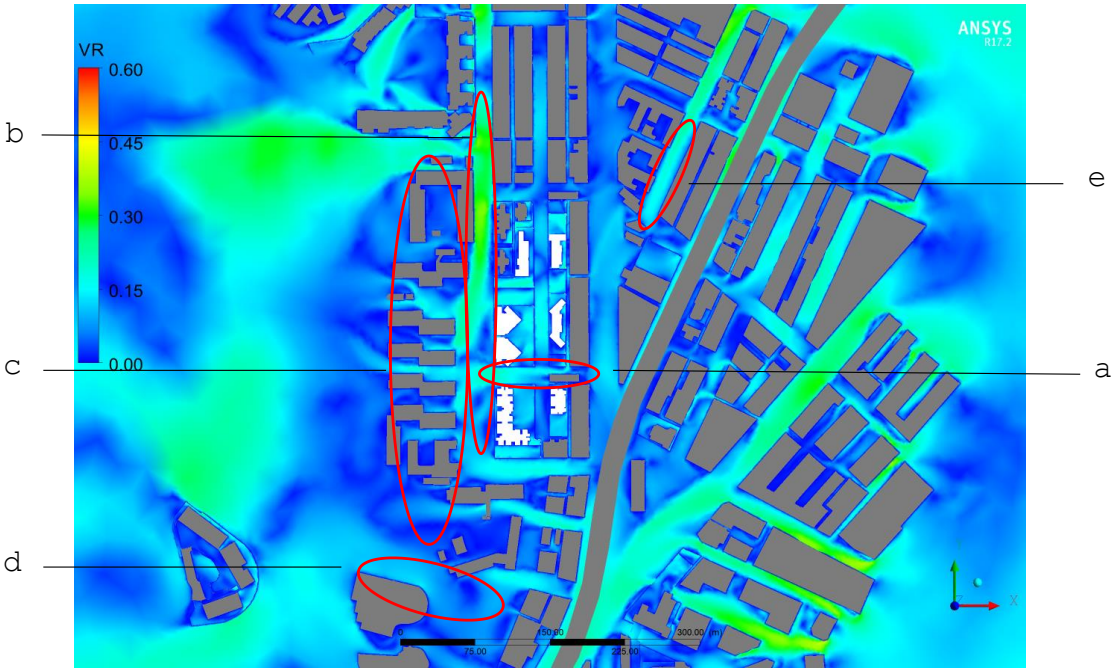
b. The building separation at tower level between T1 and T5 is much larger than that of the Baseline Scheme. In addition, podium between T2 and T3 is split with ~13m width in the Proposed Scheme, which allows more wind penetration through the Subject Site. While the podium at this location is continuous in the Baseline Scheme which would block the wind passing via the site, the smaller podia with separation in between would facilitate better wind flow to the inner area of the Site as well as passing through via the site towards hillside. Furthermore, the gap between the podia of Northern Site and Southern Site in the Proposed Scheme is larger than that in the Baseline Scheme, which also facilitates more wind flowing from east to west. Thus, the VR in Kau Pui Lung Road is higher under the Proposed Scheme.

c. The diverted wind flow from Kiang Su Street and the building separation between T1 and T5 in the Proposed Scheme continuously flows toward the west and benefits the Lok Man Sun Chuen.

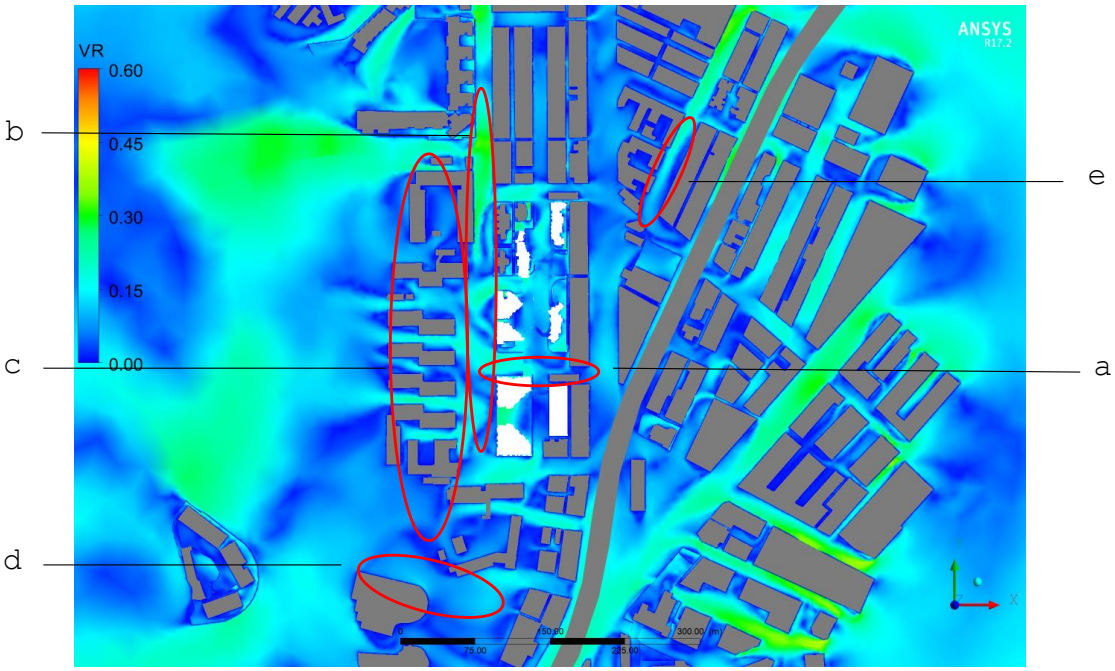
d. The upcoming ENE wind flows along the private road to the north of Lok Seen Lau and diverts towards south along the area between Lok Man Sun Chuen and the slope to the immediate west. The stronger wind flow within the building separations aligned to E-W direction counters with the diverted wind. Thus, the VR is lower at Kau Pui Lung Road Playground under the Proposed Scheme.

e. The stronger wind along Chi Kiang Street to the south of the Subject Site due to channelling effect continuously flows towards south at Ko Shan Street. Therefore, the VR at Ko Shan Road is higher under the Proposed Scheme.

Wind performance under wind direction of E



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.4 Under E wind, the wind penetrates through the building clusters in To Kwa Wan area and reach the Subject Site.

a. The upcoming E wind skims over the building clusters to the east of Ma Tau Wai Road and passes through Kiang Su Street. Although the podium gap between the podia of Northern Site and Southern Site is wider, the building outline of T6 in Southern Site is shifted towards north, which means it is closer to Kiang Su Street. Thus, the VR is slightly lower in Kiang Su Street under the Proposed Scheme.

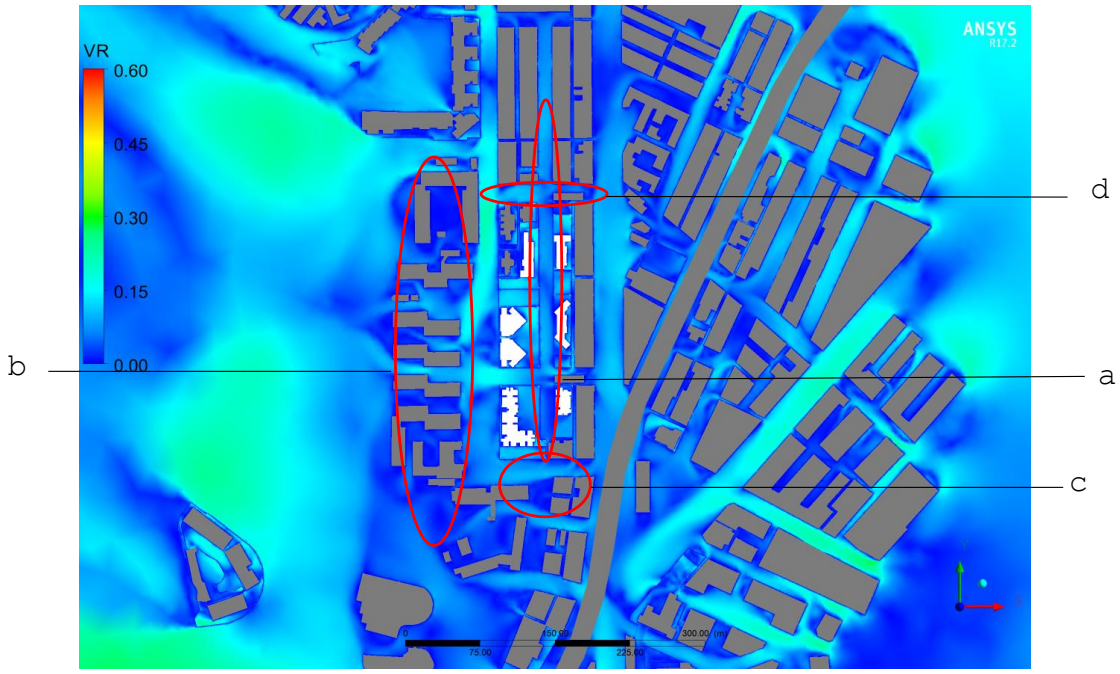
b. Despite the lower wind speed along Kiang Su Street, there is additional at grade gap between the podium under T2 and T3, and the original T6 in the Baseline Scheme is split into two blocks with 15m separation, there are more wind penetration via the Subject Site from east to west. The more penetrated air counters with the flow along Kau Pui Lung Road, which leads to lower VR at Kau Pui Lung Road under the Proposed Scheme.

c. However, the abovementioned more wind flow from east to west allows the wind to flow continuously to Lok Man Sun Chuen.

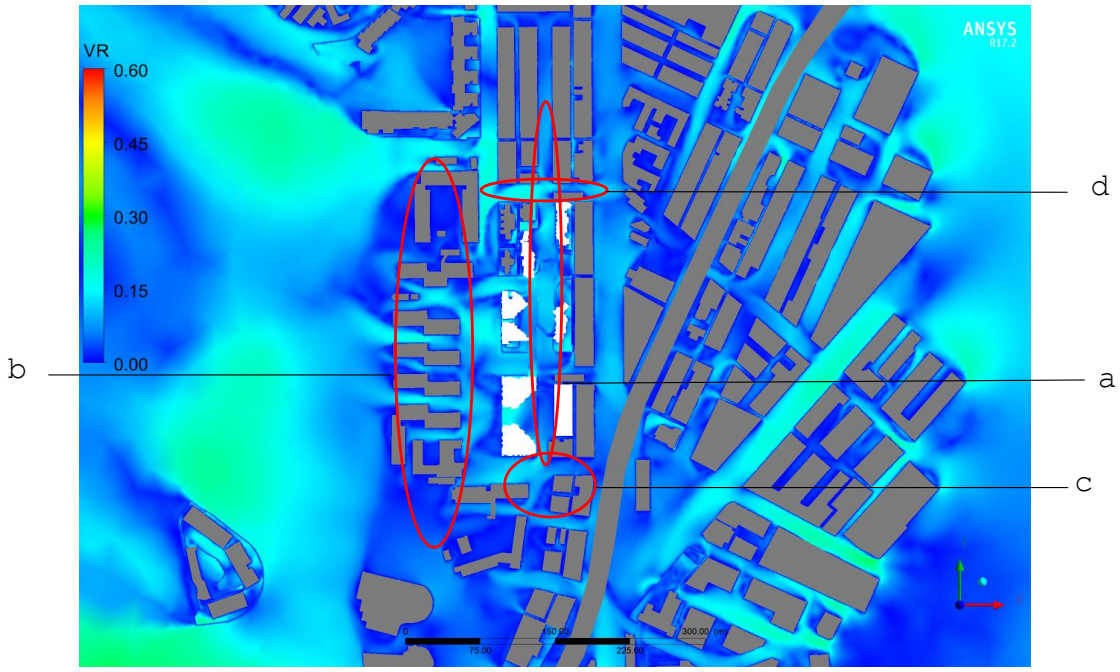
d. The E wind passes through the private road to the north of Lok Seen Lau and was diverted towards south along the slope to the west of Lok Man Sun Chuen. The higher penetration among the blocks under the Proposed Scheme counters with the diverted wind and reduces the air to flow towards Ko Shan Road Park. However, Kiang Hsi Street is one important path to facilitate E wind to reach the downwind area Ko Shan Park. The stronger diverted air flow from north under the Baseline Scheme counters the flow from Kiang Hsi Street, thus, the VR at Ko Shan Road Park is slightly higher under the Proposed Scheme.

e. It is noted the disposition of T1 is closer to the northern boundary of the Subject Site. Not only the disposition but also the additional building height cause the downwash effect and slows down the wind speed of part of Pau Chung Street.

Wind performance under wind direction of ESE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.5 Under ESE wind, the wind penetrates through the building clusters in To Kwa Wan area and reach the Subject Site.

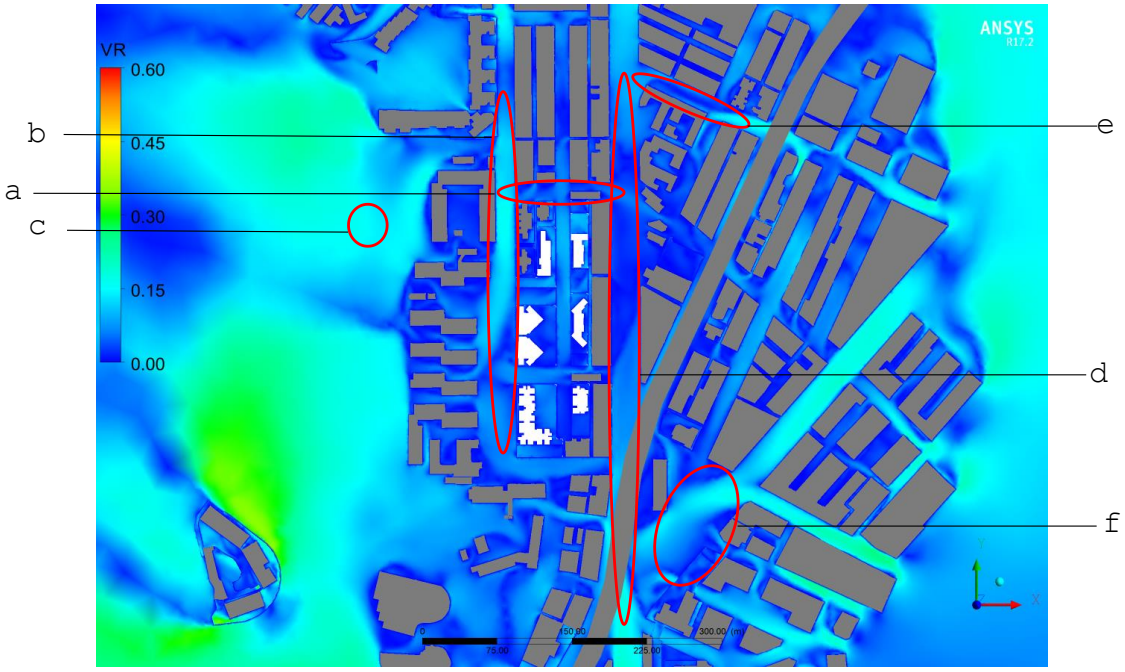
a. Under the Baseline Scheme, the high-level ESE wind flows from east to west along Kiang Su Street, hits the high-rise tower and flows to the pedestrian level due to the downwash effect. While for the Proposed Scheme, the building separation at tower level between T1 and T5 is much larger and allows much wind to penetrate. Also, the building height of the Proposed Scheme is taller. More high-level wind is captured and diverted to the pedestrian level. The air flow along Maidstone Road / future pedestrianised avenue within the Subject Site is thus stronger under the Proposed Scheme.

b. The larger building separation along Kiang Su Street, between T1 and T5 and the additional at grade separation between podia under T2 and T3 in the Proposed Scheme enhanced the east-west wind penetration in the area. The enhanced wind flows continuously towards the west and benefits Lok Man Sun Chuen in the Proposed Scheme.

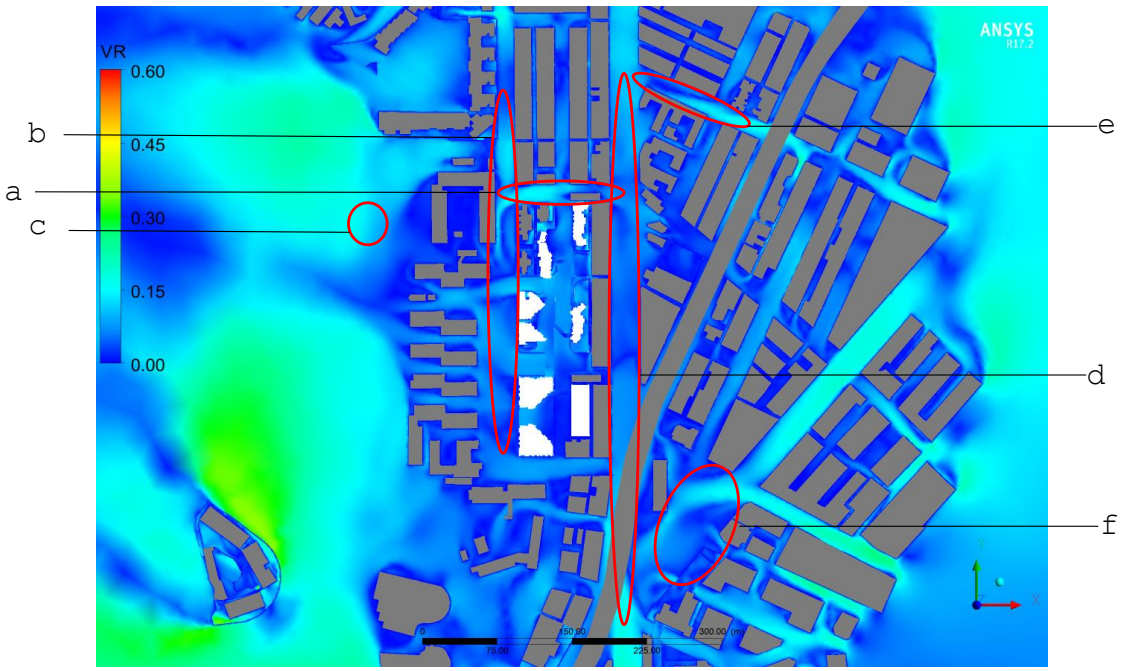
c. The stronger air flow towards south along Maidstone Road under the Proposed Scheme continuously moves and benefits Chi Kiang Street. Therefore, the VR at Chi Kiang Street is slightly higher under the Proposed Scheme.

d. The taller building height and closer distance between Tower 1 and the northern site boundary in the Proposed Scheme induces a stronger channelized wind along the northern boundary. Thus, the VR is slightly higher along Lok Shan Road under the Proposed Scheme.

Wind performance under wind direction of SE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.6 Under SE wind, the wind penetrates through the building cluster in To Kwa Wan area and Chi Kiang Street to reach the Subject Site.

a. Due to the different disposition of T1 under the two schemes, the upcoming SE wind skims over the podium under T1 in Baseline Scheme near the northern site boundary and hits on the high-rise of 80 Maidstone Road, then the downwash air flows towards south along Maidstone Road. On the other hand, since the T5 under the Proposed Scheme has been moved towards north, the upcoming SE wind pass through the separation and hit on T2, the downwash wind splits to two directions, in which one is towards north along Maidstone Road, together with the flow from east to west along Lok Shan Road, causes air acceleration at Lok Shan Road to the immediate north of the site boundary.

b. The additional separation between podia under T1 and T5, together with the wider separation along Kiang Su Road, enhance the wind penetration within the site along E-W direction. The stronger penetrated wind flow counters with the wind along Kau Pui Lung Road from north to south and reduces the wind velocity along Kau Pui Lung Road under the Proposed Scheme.

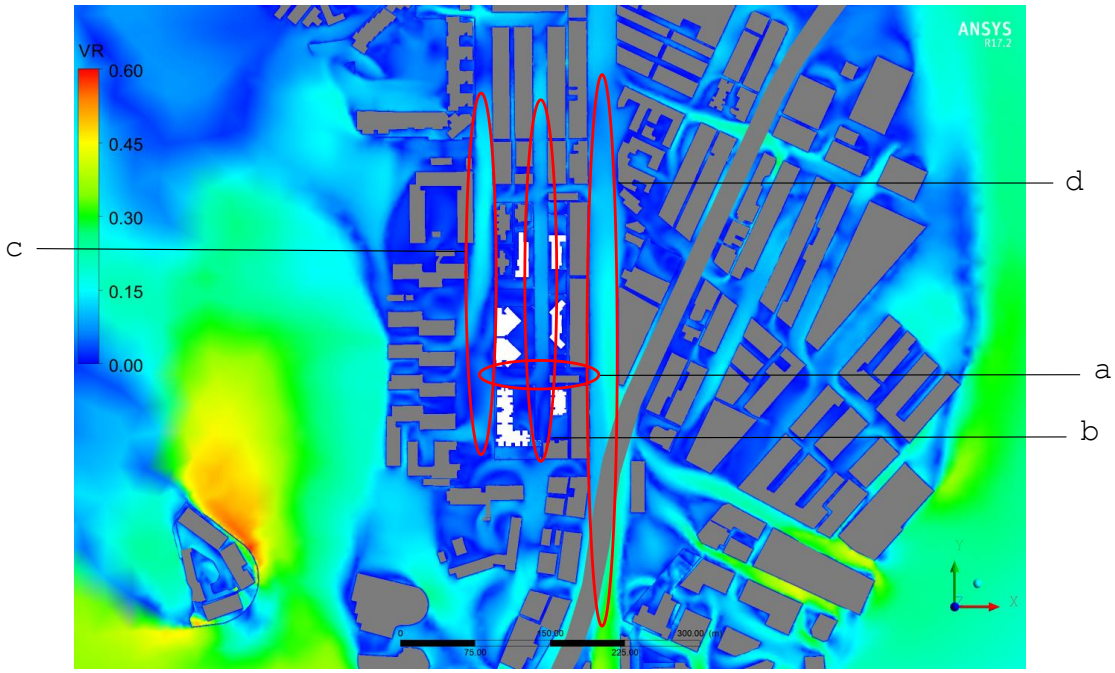
c. The upcoming wind flows along the private road to the north of Lok Seen Lau and was diverted to south along the hillside to the immediate west of Lok Man Sun Chuen. Under the Proposed Scheme, better penetration on E-W direction due to the larger building separations causes some counter flow towards north direction at the west of Lok Seen Lau. The turbulence slows down the wind speed at Kau Pui Lung Playground.

d. The taller building height in the Proposed Scheme induce a stronger downwash wind at Ma Tau Wai Road. Therefore, the VR is slightly higher under the Proposed Scheme at Ma Tau Wai Road.

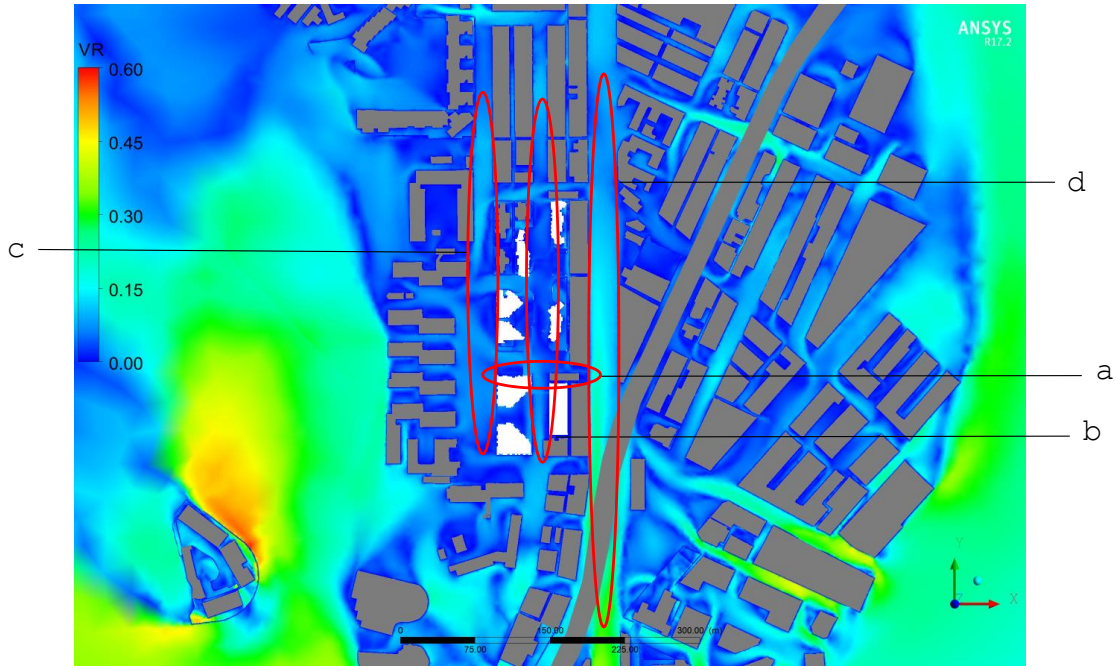
e. The stronger flow along Pau Chung Road joins the upcoming wind along Sheung Heung Road and accelerates the velocity at Sheung Heung Road under the Proposed Scheme.

f. The stronger downwash wind towards south along Ma Tau Wai Road counters with the upcoming wind from Chi Kiang Street and Kai Ming Street, slows down the wind speed at Ma Tau Wai Road/ To Kwa Wan Playground and To Kwa Wan Road as well.

Wind performance under wind direction of SSE



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.7 Under SSE wind, the building cluster in To Kwa Wan area reduce the wind flow to reach the Subject Site.

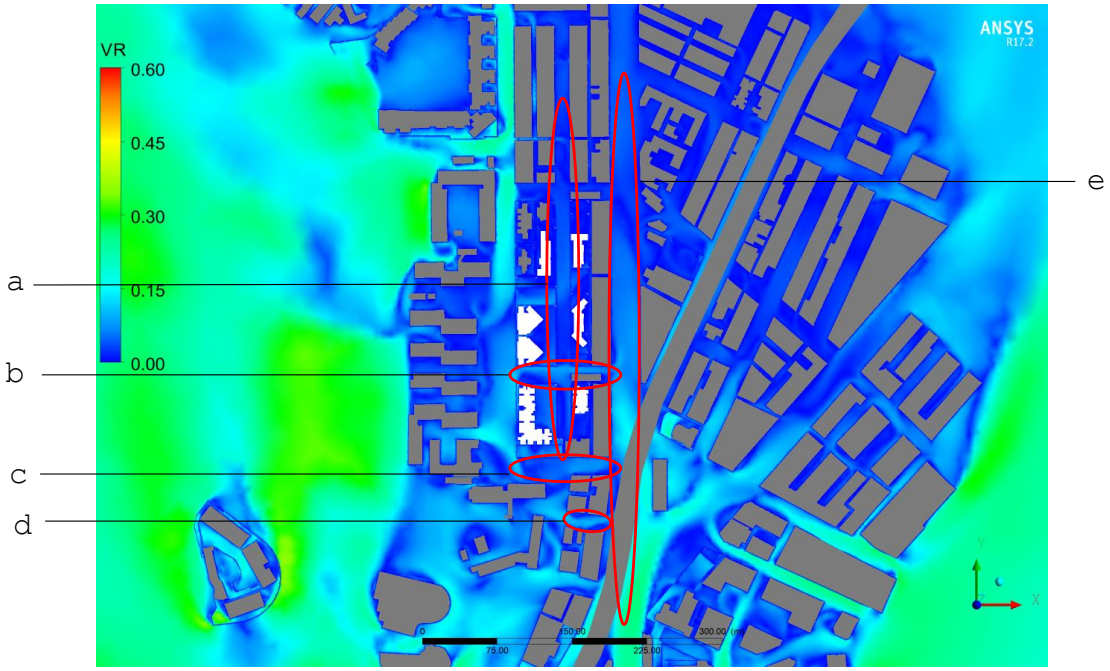
a. The podium under T6 and T7 is reduced so that the separation between the podium and Ming Fat Building is widened in the Proposed Scheme. It allows the wind to penetrate into the site. Therefore, the VR at Kiang Su Street is slightly higher under the Proposed Scheme.

b. The upcoming SSE wind skims over the clusters in To Kwa Wan area, hits on the high-rise buildings and induces the downwash effect to the pedestrian level from north to south along Maidstone Road. However, under the Proposed Scheme, due to the wider separation of the podium and Ming Fat Building, more wind could penetrate into the site along N-S direction, which counters with the downwash flow. Thus, the VR is lower at Maidstone Road / future pedestrianised avenue within the Subject Site under the Proposed Scheme.

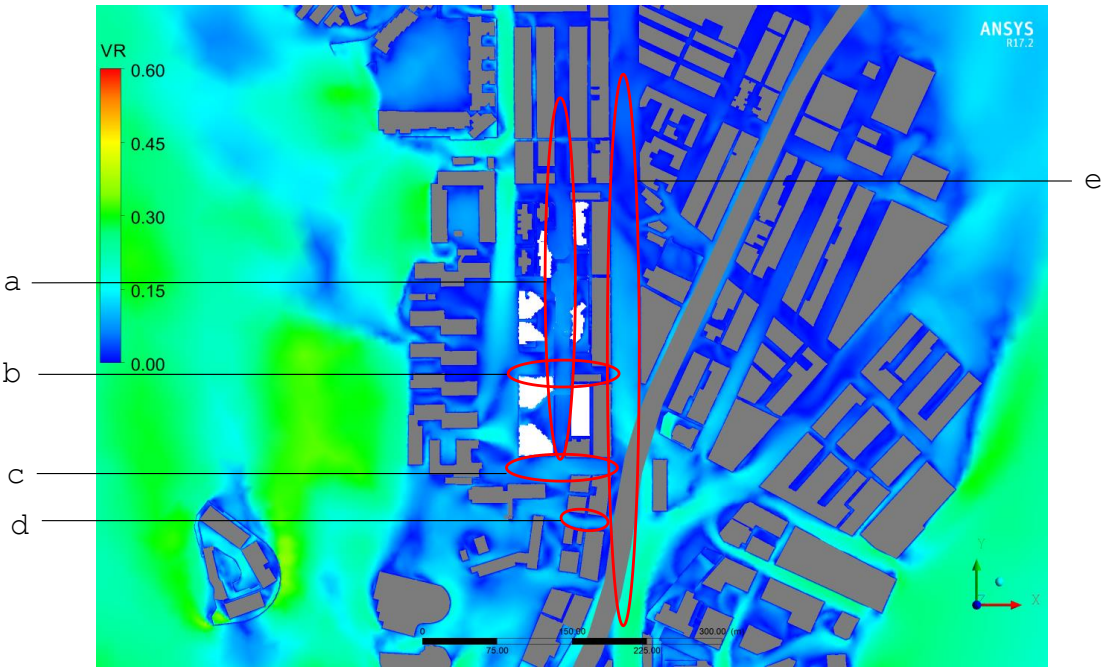
c. The additional separation between podia under T1 and T5, together with the wider separation along Kiang Su Road, enhances the wind penetration within the site along E-W direction. The stronger penetrated wind flow counters with the wind along Kau Pui Lung Road from north to south and reduces the wind velocity along Kau Pui Lung Road under the Proposed Scheme.

d. The upcoming wind flows from south to north along Ma Tau Wai Road. Since the podium T6 in the Baseline Scheme is larger and closer to Ming Fat Building than the Proposed Scheme, part of the upwind from Ko Shan Road was diverted to east and west along Chi Kiang Road. The diverted wind to east would reach and counter with the upcoming flow at Ma Tau Wai Road, which slows down the wind velocity on Ma Tau Wai Road. Moreover, T7 in the Baseline Scheme is moved to the southwest corner of the site, which is less unlikely to cause downwash effect and affect the wind flow on Ma Tau Wai Road. Thus, the VR is slightly higher on Ma Tau Wai Road under the Proposed Scheme.

Wind performance under wind direction of S



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.8 Under S wind, the wind would mainly flow from Ma Tau Wai Road to reach inland area.

a. The wider separation between the podium under T6 & 7 and Ming Fat Building in the Proposed Scheme allows more wind to penetrate from south to north inside the Subject Site. Therefore, the VR is higher at Maidstone Road under the Proposed Scheme.

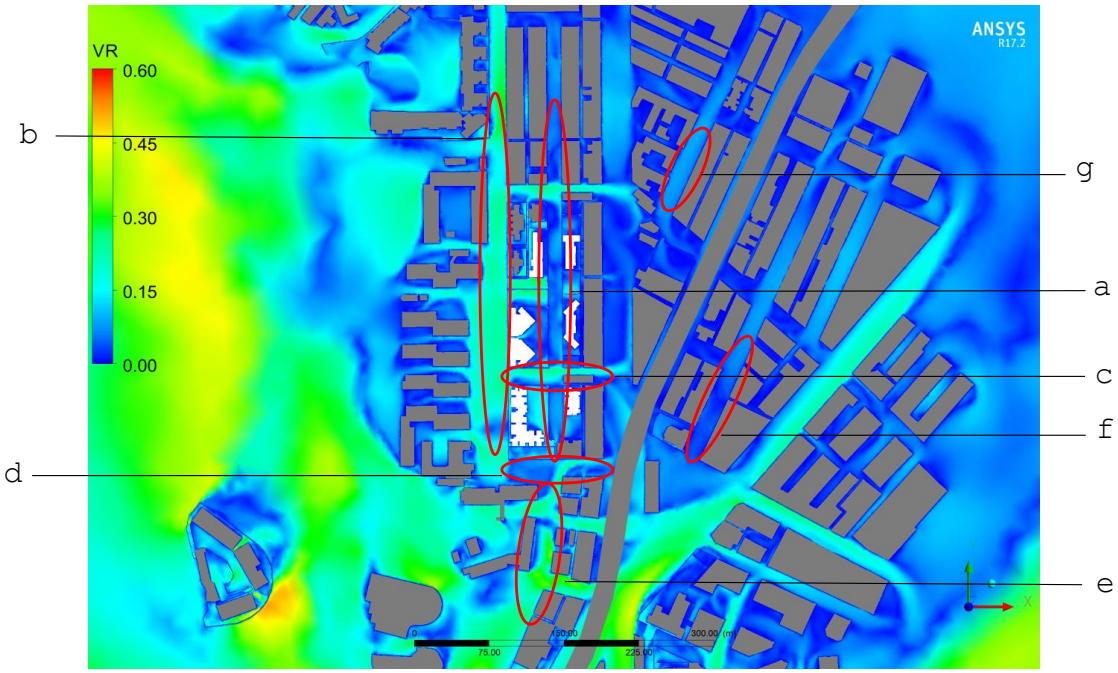
b. Although the building separation between Northern Site and Southern Site is enlarged, Lucky Building which abuts Kiang Su Street would still block parts of the flow penetration at E-W direction. In addition, compared with T6 in the Baseline Scheme, T6 of Southern Site in the Proposed Scheme is shifted towards north and closer to Kiang Su Street. Thus, the VR is slightly lower at Kiang Su Street.

c. The upcoming S wind passes through the building gap between Lok Kei Lau and The Church of Christ in China Wanchai Church Kei To Primary School (Kowlooon City) and hits on the high-rise building of the Subject Site. Part of the downwash air flows along Chi Kiang Street. Due to the taller building height and the disposition of T7 under the Proposed Scheme, the VR along Chi Kiang Road under the Proposed Scheme is slightly higher.

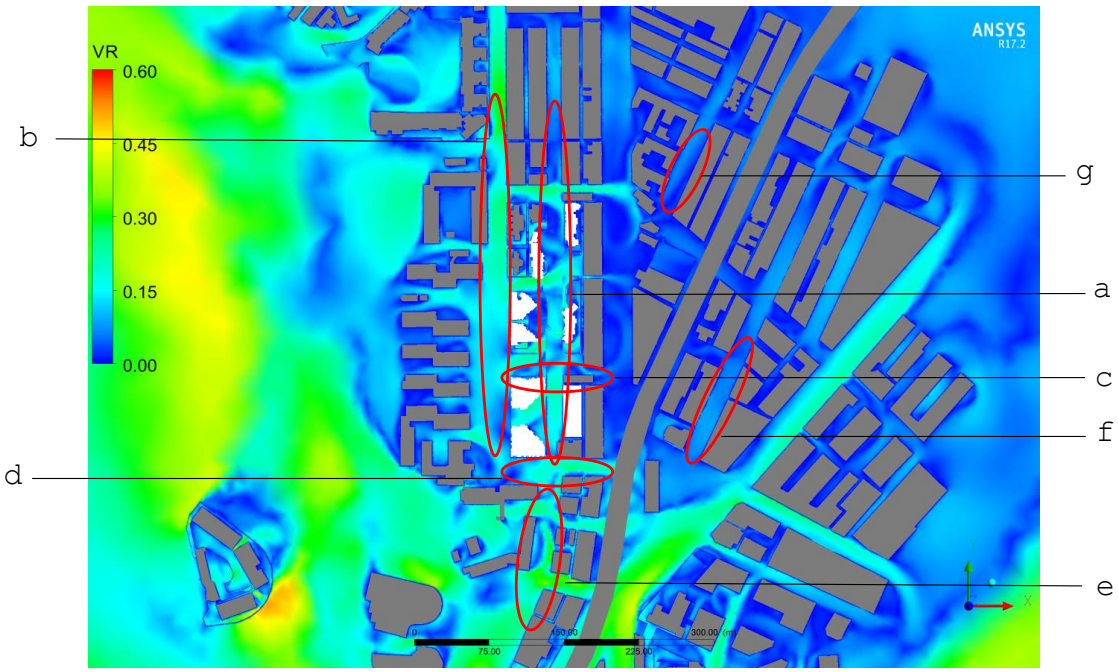
d. The stronger downwash wind continuously flows along Ko Shan Road, reaches Anhui Street and benefits Anhui Street.

e. The taller buildings in the Proposed Scheme would induce stronger downwash wind and benefit Ma Tau Wai Road.

Wind performance under wind direction of SSW



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.9 Under SSW wind, the wind would mainly flow from Ho Man Tin Area to reach inland area.

a. The wider separation at pedestrianised avenue in the Proposed Scheme allows more wind to penetrate from south to north inside the Subject Site. Therefore, the VR is higher at Maidstone Road / future pedestrianised avenue within the Subject Site under the Proposed Scheme.

b. The upcoming SSW wind skims over Lok Man Sun Chuen and flows along Kau Pui Lung Road to north. Due to the taller building height of the Proposed Scheme, stronger downwash wind would be induced and creates wake area to the west of the Subject Site. Thus, the VR at Kau Pui Lung Road is lower under the Proposed Scheme.

c. Although the building separation between Northern Site and Southern Site is enlarged, Lucky Building which abuts Kiang Su Street would still block parts of the flow penetration at E-W direction. In addition, compared with T6 in the Baseline Scheme, T6 of Southern Site in the Proposed Scheme is shifted and closer to Kiang Su Street. Thus, the VR is slightly lower at Kiang Su Street.

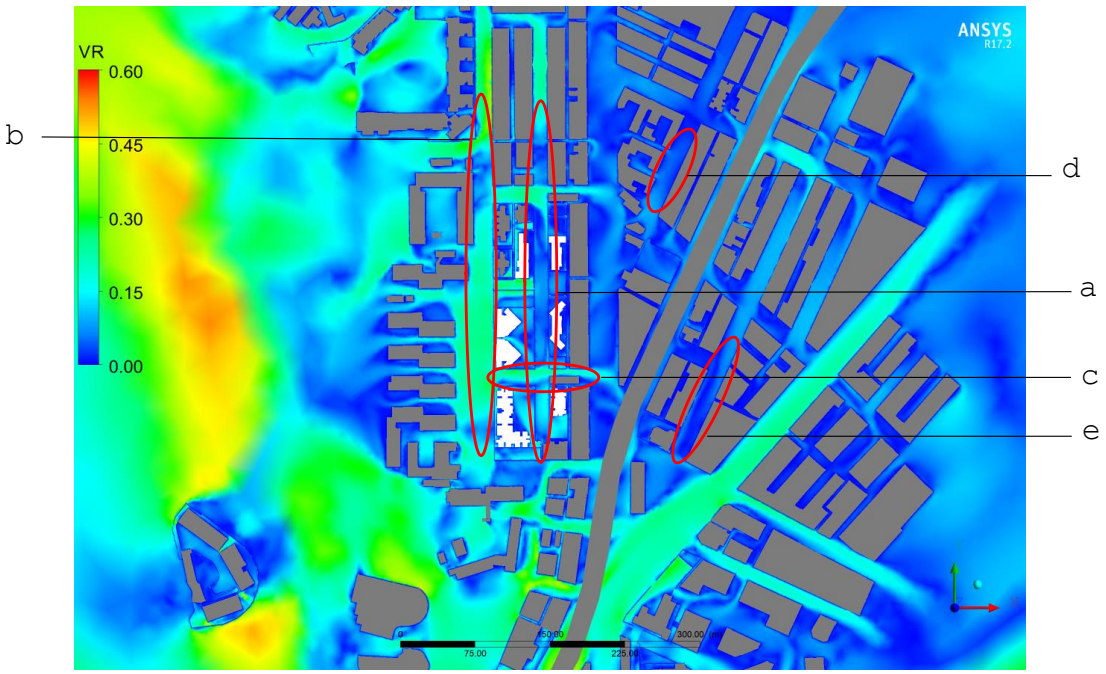
d. The upcoming SSW wind passes through the building gap between Lok Chee Lau and Lok Oi Lau and channelized along Ko Shan Road to reach Chi Kiang Road and Anhui Street Part of the downwash air flows along Chi Kiang Street. On the other hand, the air flows from the south of Lok Kei Lau hits on the high-rise building of the Subject Site and channelized to the Chi Kiang Road effected by downwash effect. Due to the taller building height in the Proposed Scheme, the wind speed is higher along Chi Kiang Road under the Proposed Scheme.

e. The reduced podium under T7 & B widen the separation between the podium and Ming Fat Building. More upcoming wind from Ko Shan Road could be penetrate into the Subject Site along Maidstone Road. Thus, the VR at Ko Shan Road is better under the Proposed Scheme.

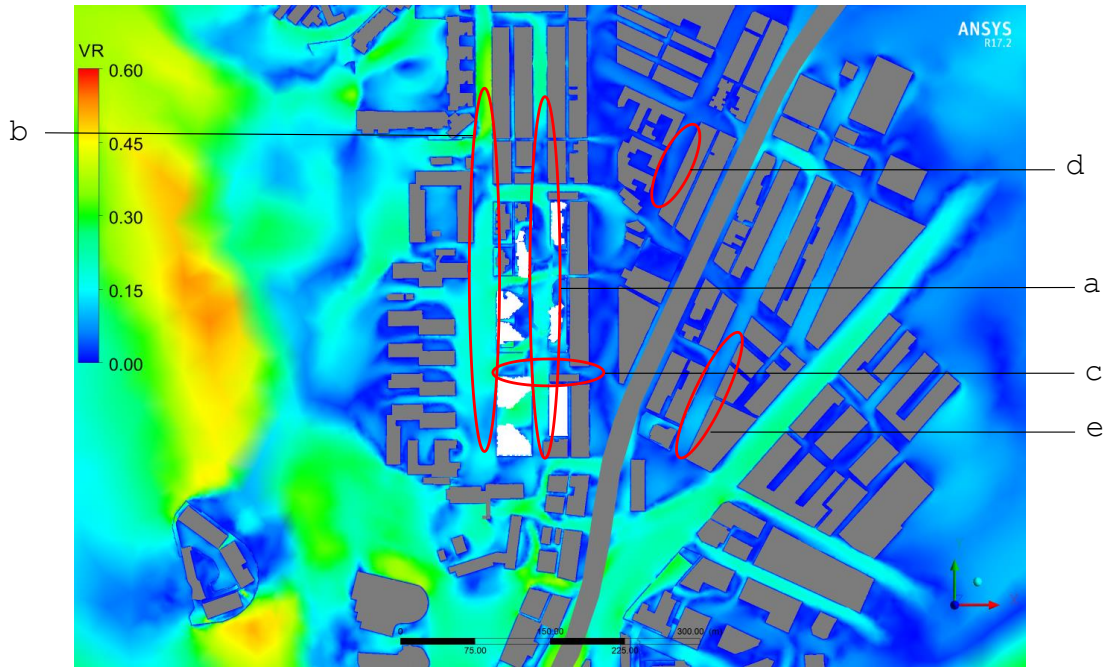
f. The accelerated air flow along Chi Kiang Road continuously moves towards east and joins the upcoming wind from Ma Tau Wai Road. Therefore, the VR at Ha Heung Road is higher under the Proposed Scheme.

g. The disposition of T1 is shifted to the northern site boundary, the building separation between T1 and T5 is much wider in the Proposed Scheme. This allows more wind to penetrate along the building separation towards east and reach Ma Tau Wai Road. This flow would counter with the upcoming wind from north along Pau Chung Steet, so slightly lower VR is observed along under the Proposed Scheme at Pau Chung Street.

Wind performance under wind direction of SW



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.10 Under SW wind, the wind would mainly flow from Ho Man Tin Area to reach inland area.

a. The wider separation at pedestrianised avenue in the Proposed Scheme allows more wind to penetrate from south to north inside the Subject Site. Therefore, the VR is higher at Maidstone Road under the Proposed Scheme.

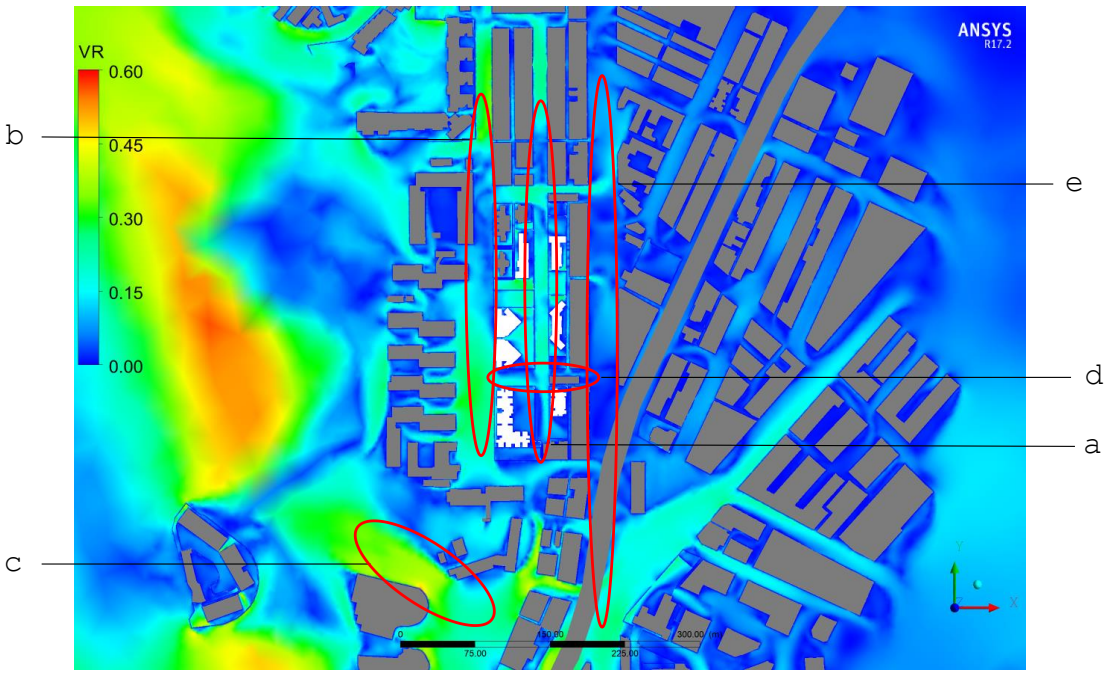
b. The upcoming SSW wind skims over Lok Man Sun Chuen and flows along Kau Pui Lung Road to north. Due to the taller building height of the Proposed Scheme, stronger downwash wind would be induced and creates wake area to the west of the Subject Site. Thus, the VR at Kau Pui Lung Road is lower under the Proposed Scheme.

c. Although the building separation between Northern Site and Southern Site is enlarged, Lucky Building which abuts Kiang Su Street would still block parts of the flow penetration at E-W direction. In addition, compared with T6 in the Baseline Scheme, T6 of Southern Site in the Proposed Scheme is closer to Kiang Su Street. Thus, lower VR is observed at Kiang Su Street.

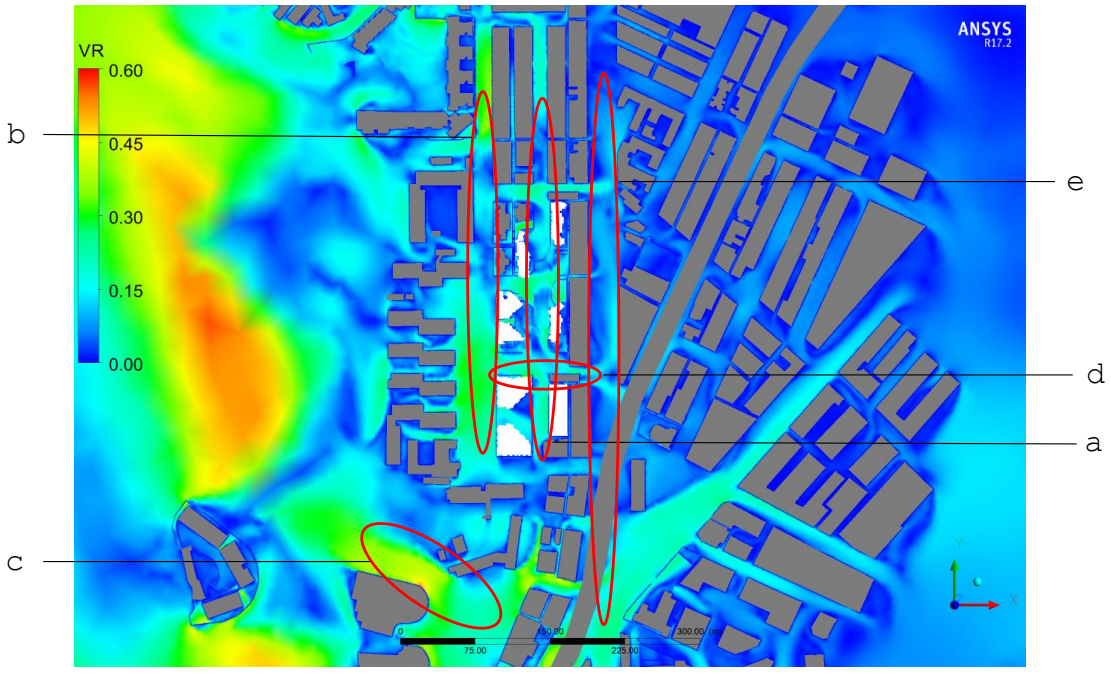
d. The disposition of T1 is much closer to the northern site boundary, which may accelerate the wind speed of air flowing along part of Lok Shan Road near the site boundary. Part of this flow would counteract with the coming flow from north along Pau Chung Street, so the VR is slightly lower along under the Proposed Scheme at Pau Chung Street.

e. The taller building height and the tower disposition of T7 in the Proposed Scheme causes stronger downwash effect at part of Chi Kiang Street near the southern boundary. As such, the wind velocity is higher along Chi Kiang Street towards east. This stronger flow joints the SW wind from upwind area, i.e. Ma Tau Wai Road and benefits part of Ha Heung Road under the Proposed Scheme.

Wind performance under wind direction of WSW



Contour plot for Baseline Scheme



Contour plot for Proposed Scheme

4.5.11 Under WSW wind, the wind would mainly flow from Ho Man Tin Area to reach inland area.

a. The upcoming WSW wind skims over Lok Man Sun Chuen, hits on the high-rise buildings in the Subject Site and diverted to south and north along Kau Pui Lung Street. Under the Baseline Scheme, the wind could penetrate to the site through Kiang Su Street and reaches Maidstone Street. On the other hand, under the Proposed Scheme, the wider gap between T4 and T6 and the split podium under T2 and T3 could facilitate more wind to penetrate into the site. Thus, the VR is slightly higher at Maidstone Road / future pedestrianised avenue within the Subject Site under the Proposed Scheme.

b. Lok Man Sun Chuen which is located to the upwind side would block most of the wind to reach Kau Pui Lung Road. On the other hand, the upcoming wind from hillside is diverted to north and south direction along Kau Pui Lung Road due to the downwash effect caused by City 151 as well as T3 and T4 of the Subject Site. The increased building height of the Proposed Scheme induces stronger downwash flow and accelerate the wind speed along Kau Pui Lung Road.

c. The wind coming from hillside flows along the east side of Ko Shan Theatre and passes through the building separation between Lok Oi Lau and Ko Shan Theatre New Wing. Larger wake area is generated as stronger wind flows from north along Kau Pui Lung Road. Therefore, the VR of Ko Shan Road Park is slightly lower under the Proposed Scheme.

d. The enlarged building separation between the Northern Site and Southern Site at both tower and ground level allows more wind to flow through Kiang Su Street. Thus, it is observed that the VR of Kiang Su Road is higher under the Proposed Scheme.

e. Not only Kiang Su Road, but also the split podia under T2 and T3 enhance the air penetration at E-W direction. Ma Tau Wai Road, which is located at the downwind area of the Subject Site, also is benefited and thus shows higher VR under the Proposed Scheme.

5. CONCLUSION

5.1.1 The proposed development located in To Kwa Wan area has been evaluated from an air ventilation perspective.

5.1.2 To enhance the wind flow circulation of the Proposed Scheme, the following 2 enhancement features are provided:

(a) 17m podia separation along the N-S pedestrianised avenue for N-S wind flow; and

(b) 23m breezeway between podia along Kiang Su Street for E-W wind flow.

5.1.3 According to Section 4.3, it is noted that the LVR is similar between the Proposed Scheme and Baseline Scheme under both annual and summer condition. The SVR is slightly better in the Proposed Scheme, compared to the Baseline Scheme, under both annual and summer condition.

5.1.4 There are some variations in VR between two schemes. Under the annual condition, the VR of some areas is higher under the Proposed Scheme, including Lok Man Sun Chuen, Maidstone Road, Lok Shan Road, Sheung Heung Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, VR is lower at Pau Chung Street, Kau Pui Lung Road Playground and Kiang Su Street under the Proposed Scheme.

5.1.5 Under the summer condition, the areas with higher VR under the Proposed Scheme are Maidstone Road, Lok Shan Road, Sze Chuen Street, Ha Heung Road, Chi Kiang Street and Ko Shan Road. However, the areas with higher VR under the Baseline Scheme are Kau Pui Lung Road, Kowloon City Road, Kau Pui Lung Road Playground, C.C.C. Wanchai Church Kei To Primary School (Kowloon City), Kiang Su Street and Ma Tau Wai Road/ To Kwa Wan Playground.

5.1.6 It is observed that the increase in building height would not induce significant impact to the To Kwa Wan area in air ventilation term under both annual and summer condition. With the two wind enhancement features discussed in Section 4.4, the Proposed Scheme could slightly enhance the wind flow in the Subject Site and nearby area.

Figures

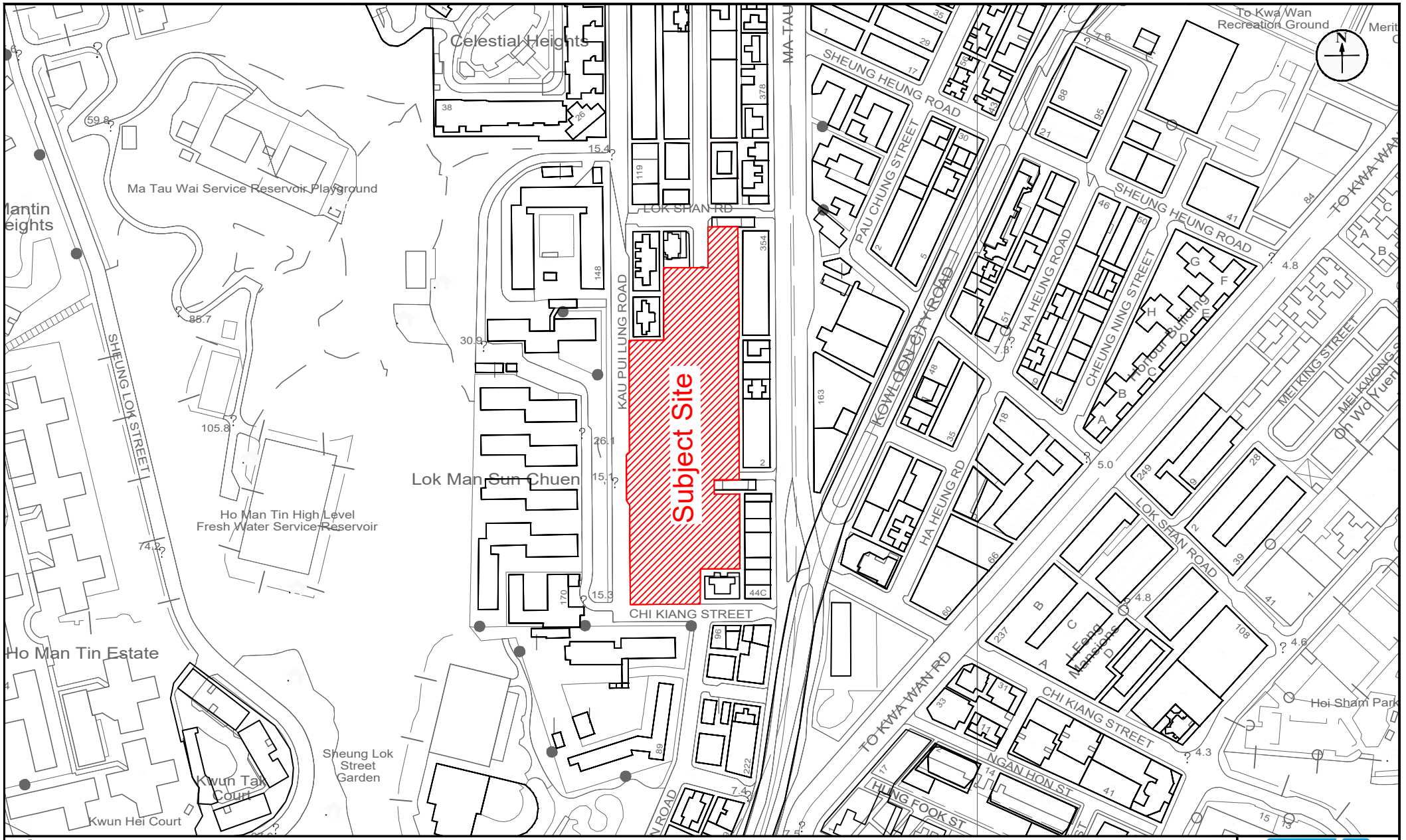


Figure: 1

Title: Location of Site and its Environs

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.3
Date:	Sept 2022

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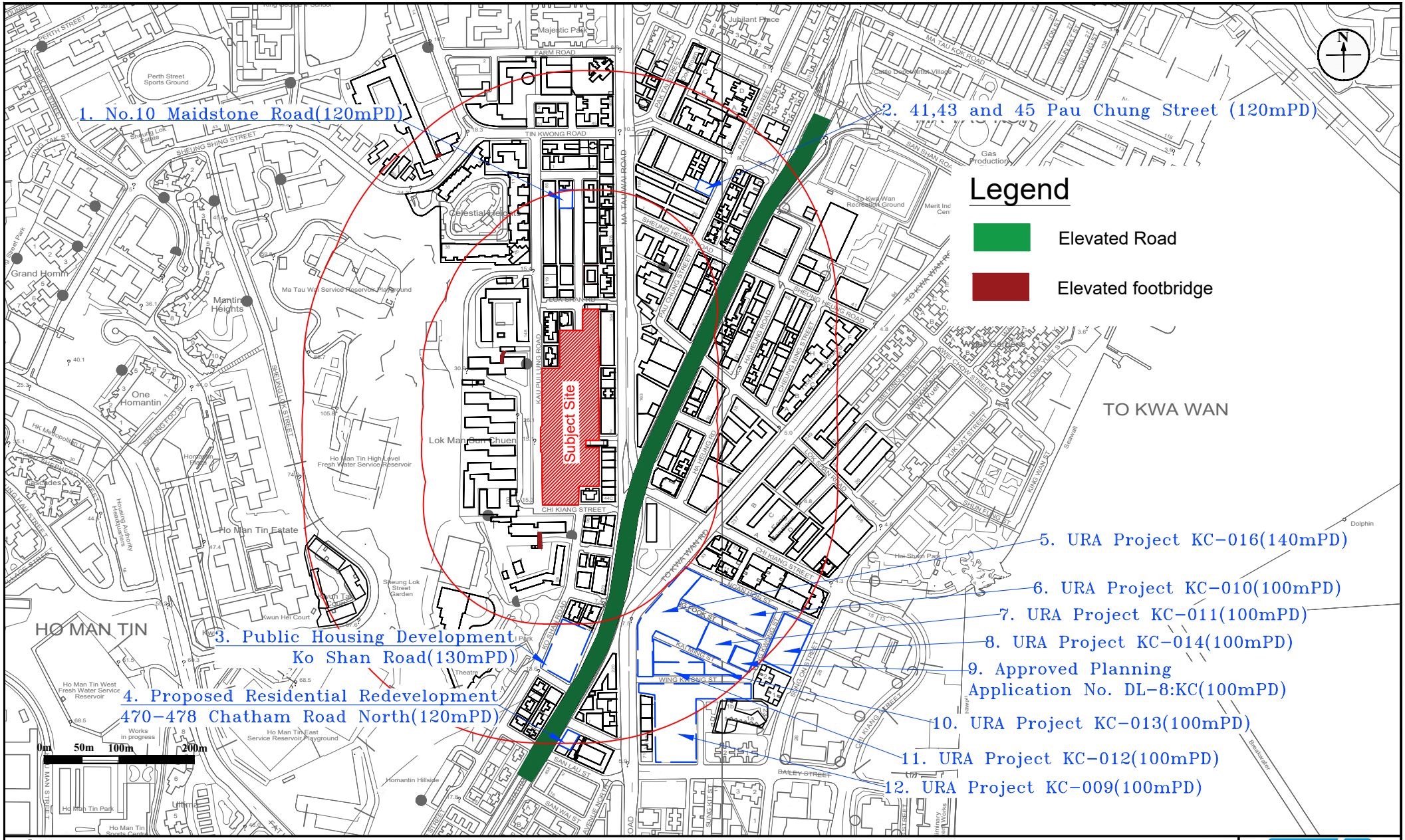

Figure: 2

Title: Location of Surrounding Future/ Committed Development

Project: URA Kau Pui Lung Road/ Chi Kinag Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by: WT

Checked by: EC

Rev.: 1.0

Date: Oct 2022

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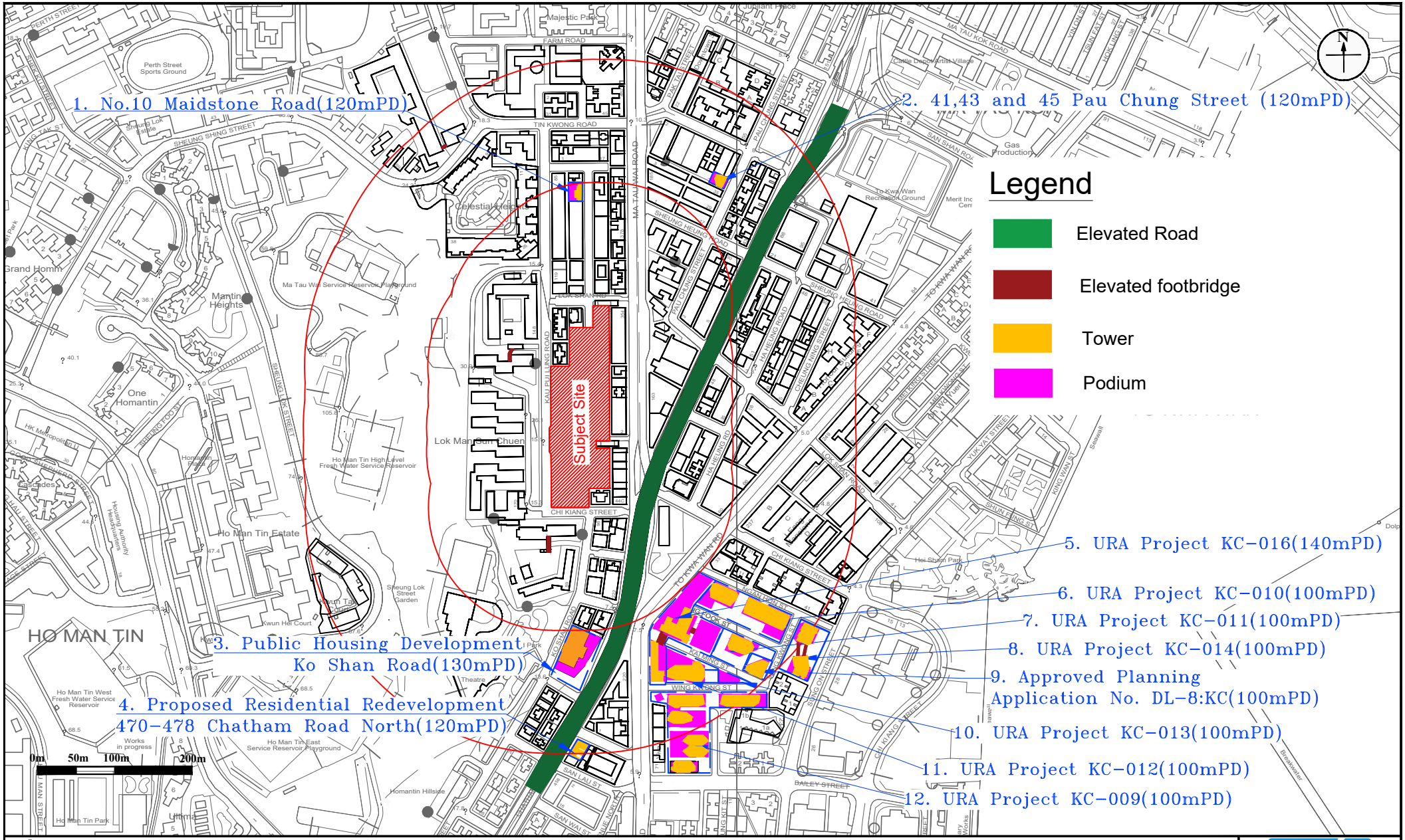

Figure: 3

Title: Building Blocks of the Surrounding Future/ Committed Development Assumed in the CFD Model

Project: URA Kau Pui Lung Road/ Chi Kinag Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by: WT

Checked by: EC

Rev.: 1.0

Date: Oct 2022

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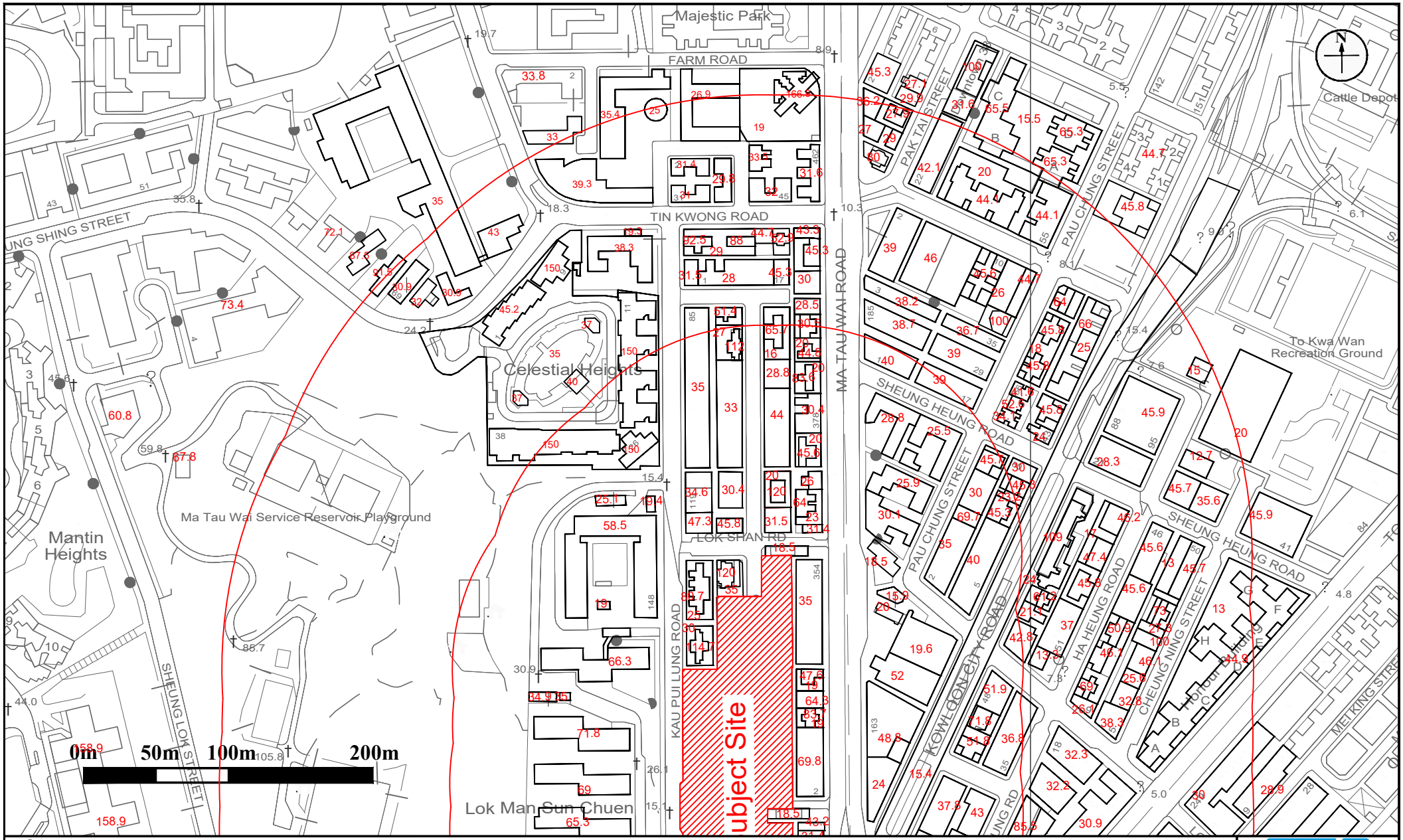

Figure: 4a

Title: Building Height of the Existing Buildings within the Surrounding Area (Northern Part)

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.0
Date:	Dec 2022

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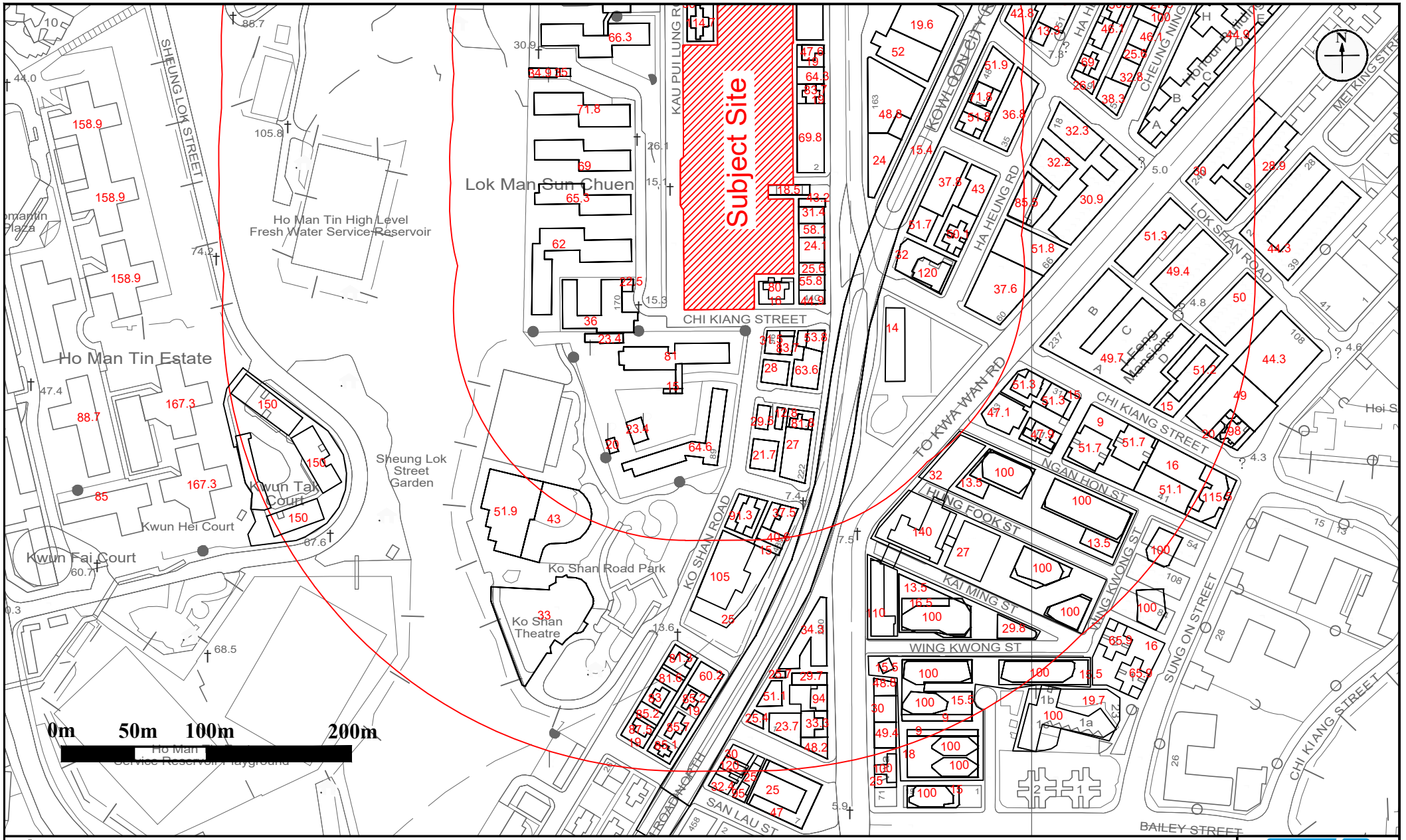

Figure: 4b

Title: Building Height of the Existing Buildings within the Surrounding Area (Southern Part)

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.0
Date:	Dec 2022

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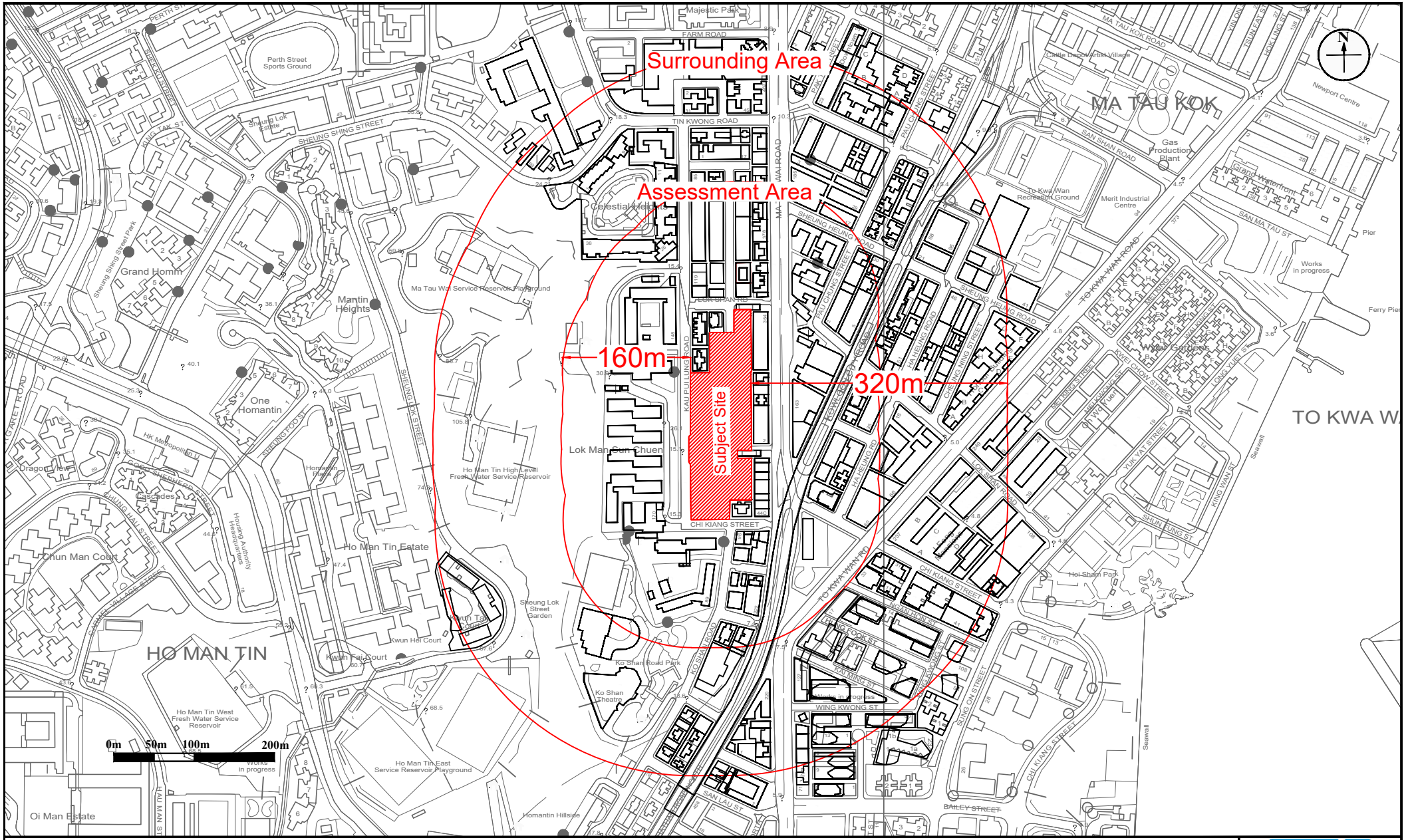

Figure: 5	RAMBOLL
Title: Assessment Area and Surrounding Area of the CFD model	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.3 Date: Sept 2022

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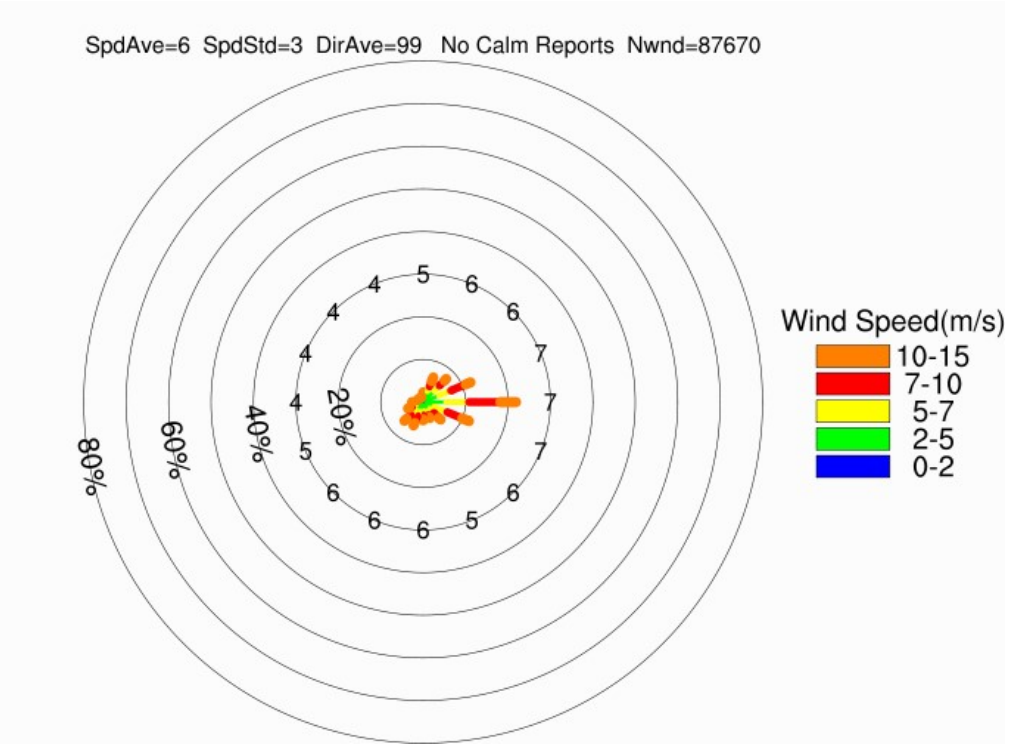
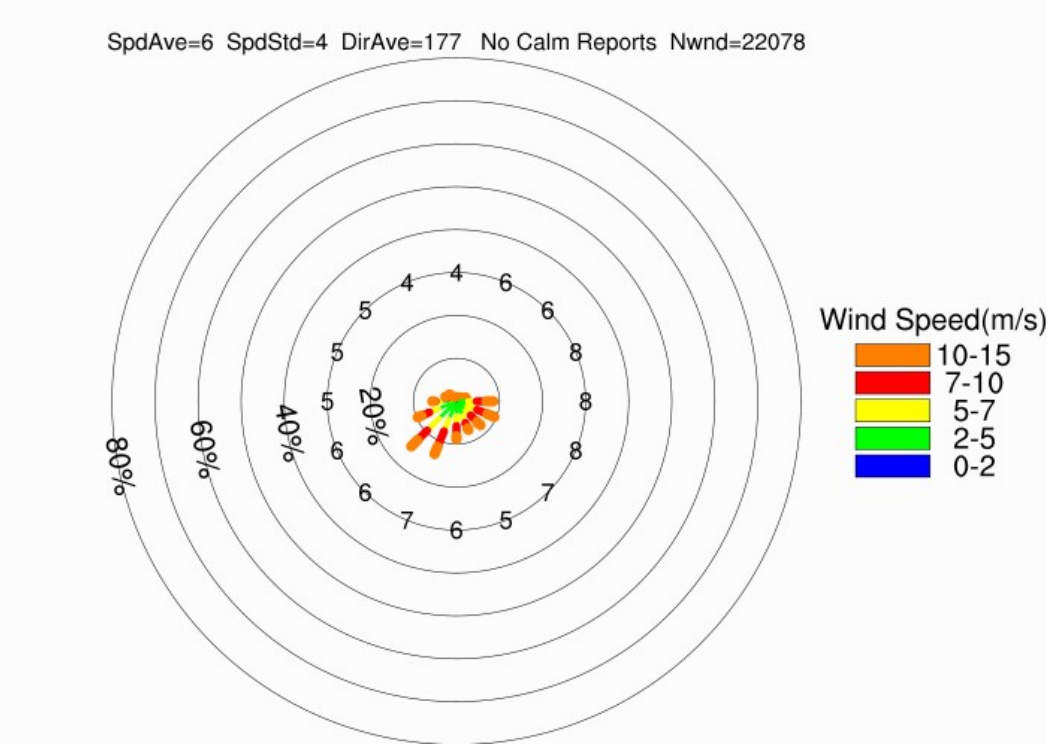


Annual Condition



Summer Condition

Figure: 6	RAMBOLL
Title: Windrose Diagram representing V∞ of the Area under Concern	Drawn by: EC Checked by: SL
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2:KC) Development Scheme	Rev.: 1.2 Date: Sept 2019

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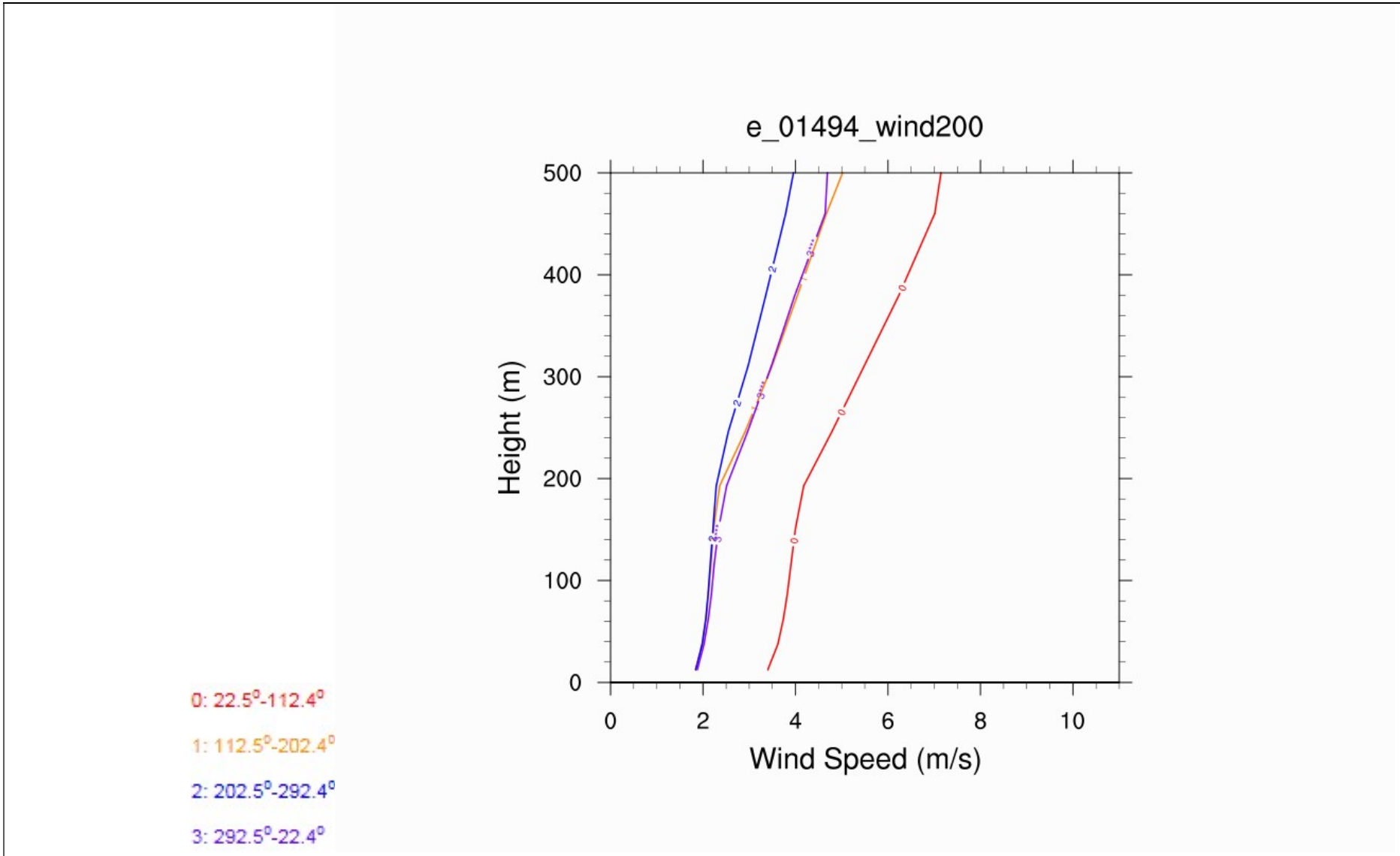

Figure: 7	RAMBOLL
Title: Wind Profile Curve for Grid X:083, Y:042	Drawn by: EC
	Checked by: SL
Project: URA Kau Pui Lung Road/Chi Kiang Street (CBS-2:KC) Development Scheme	Rev.: 1.2
	Date: Sept 2019

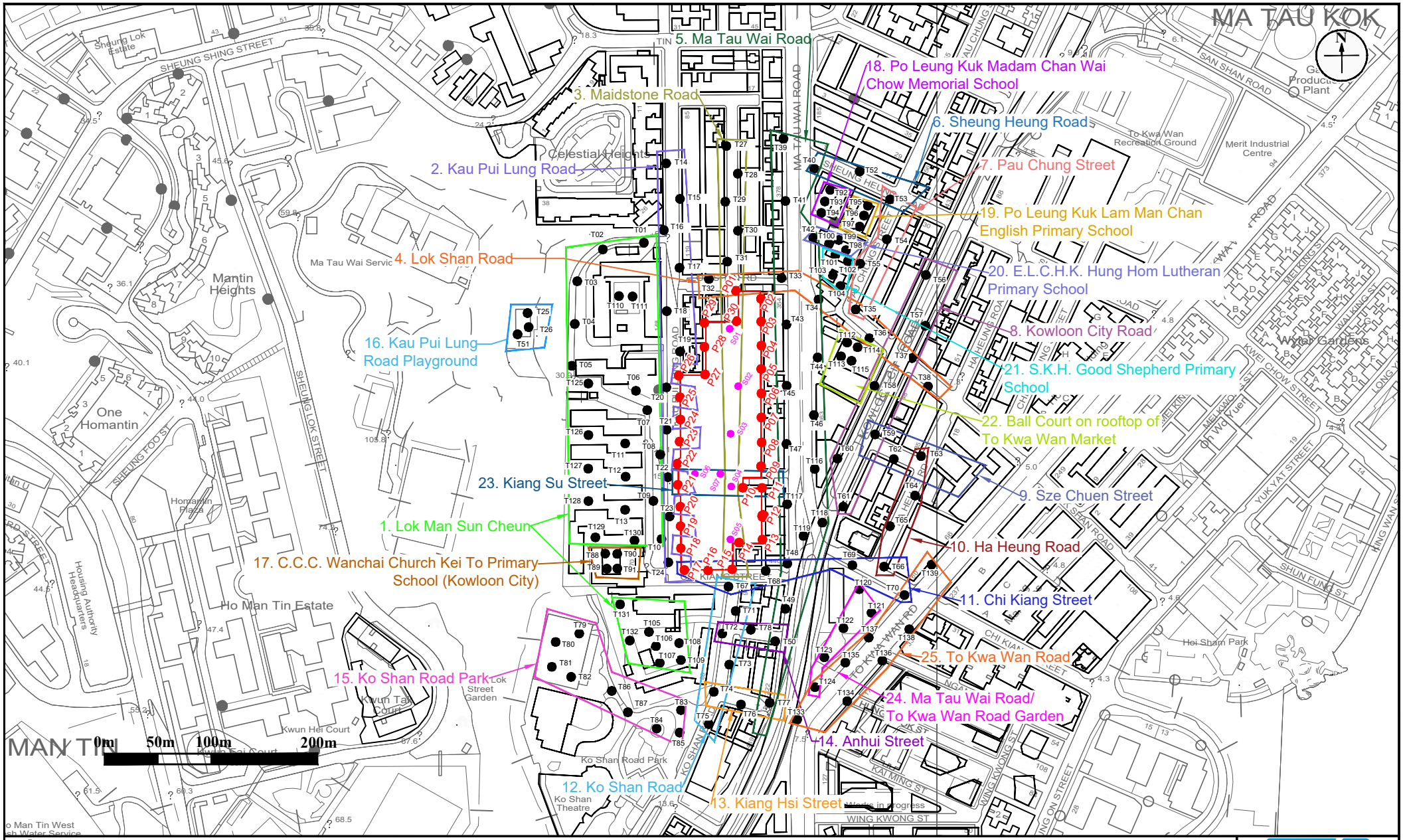

Figure: 8

Title: Test Points Selected for Quantitative Air Ventilation Assessment

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2:KC) Development Scheme

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.1
Date:	Dec 2022

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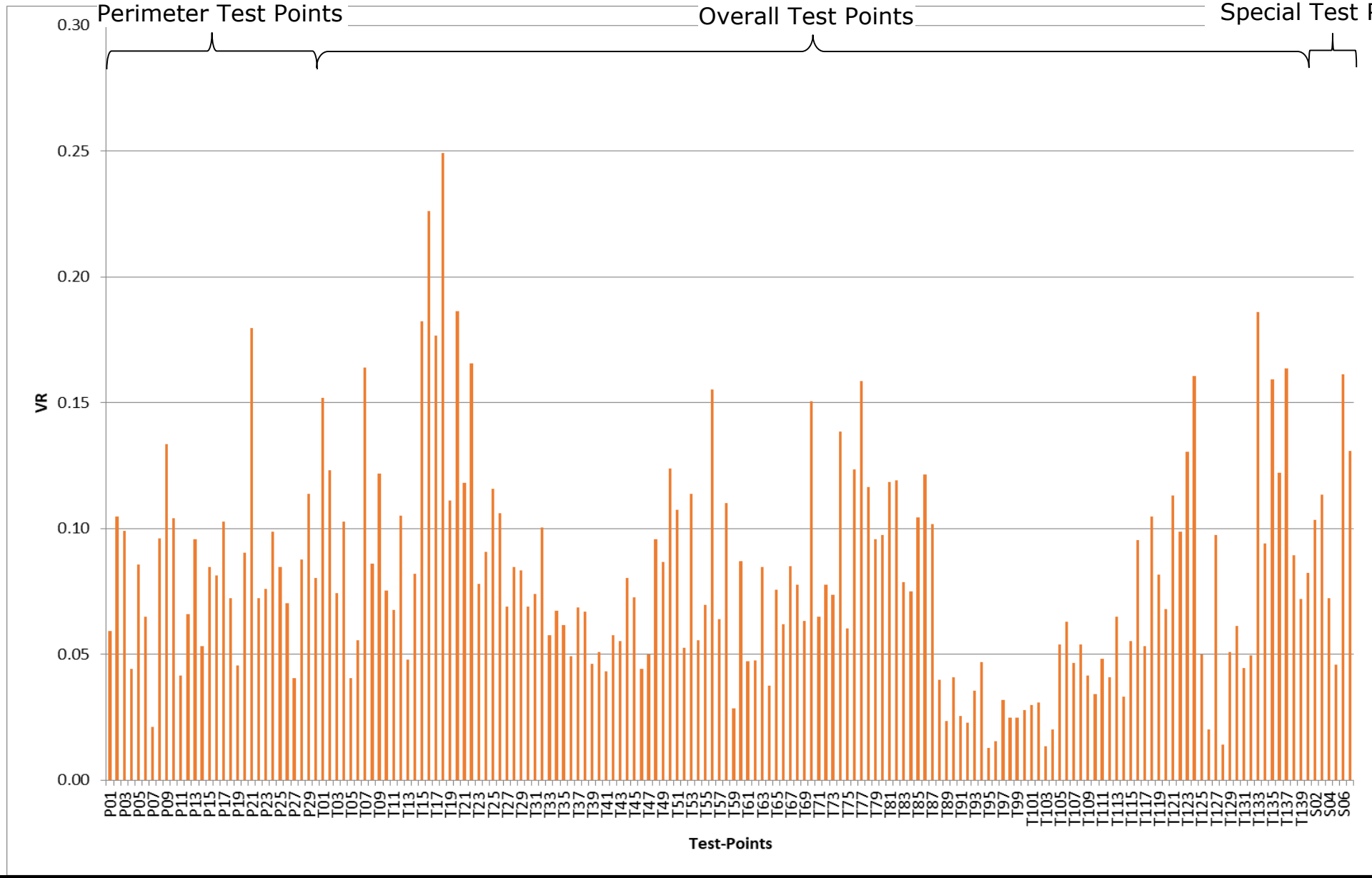

Figure: 9a

Title: **Wind Velocity Ratios of Individual Test Points for Baseline Scheme (Annual)**

RAMBOLL

Drawn by:	WT
Checked by:	EC
Rev.:	1.0
Date:	Dec 2022

Project: **URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme**

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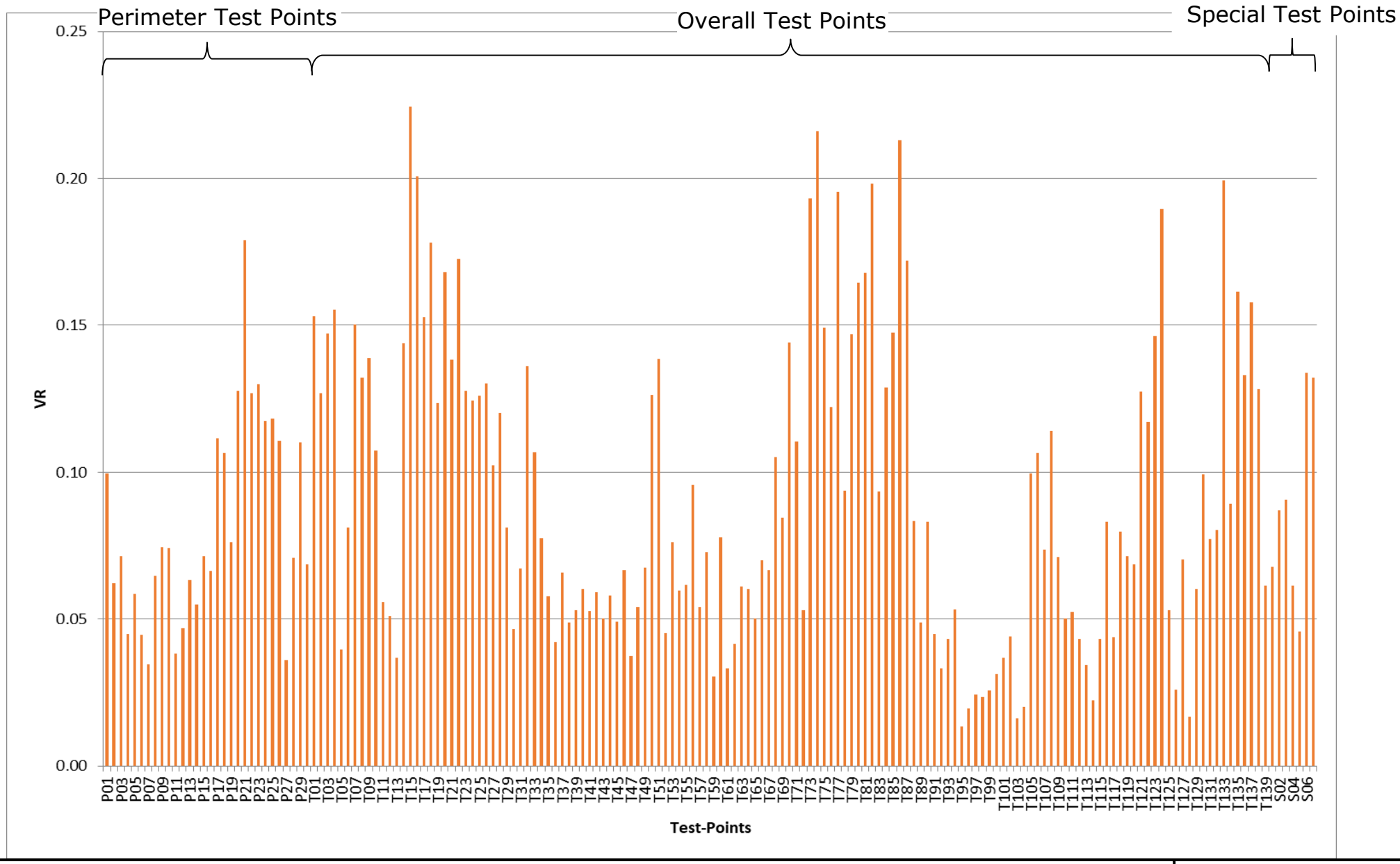

Figure: 9b	RAMBOLL
Title: Wind Velocity Ratios of Individual Test Points for Baseline Scheme (Summer)	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.0 Date: Dec 2022

Q:\Projects\URACBS02EI00\04 Deliverables\03 AVA Report\Figures\20220902\Figure 10b_BS-Summer.doc

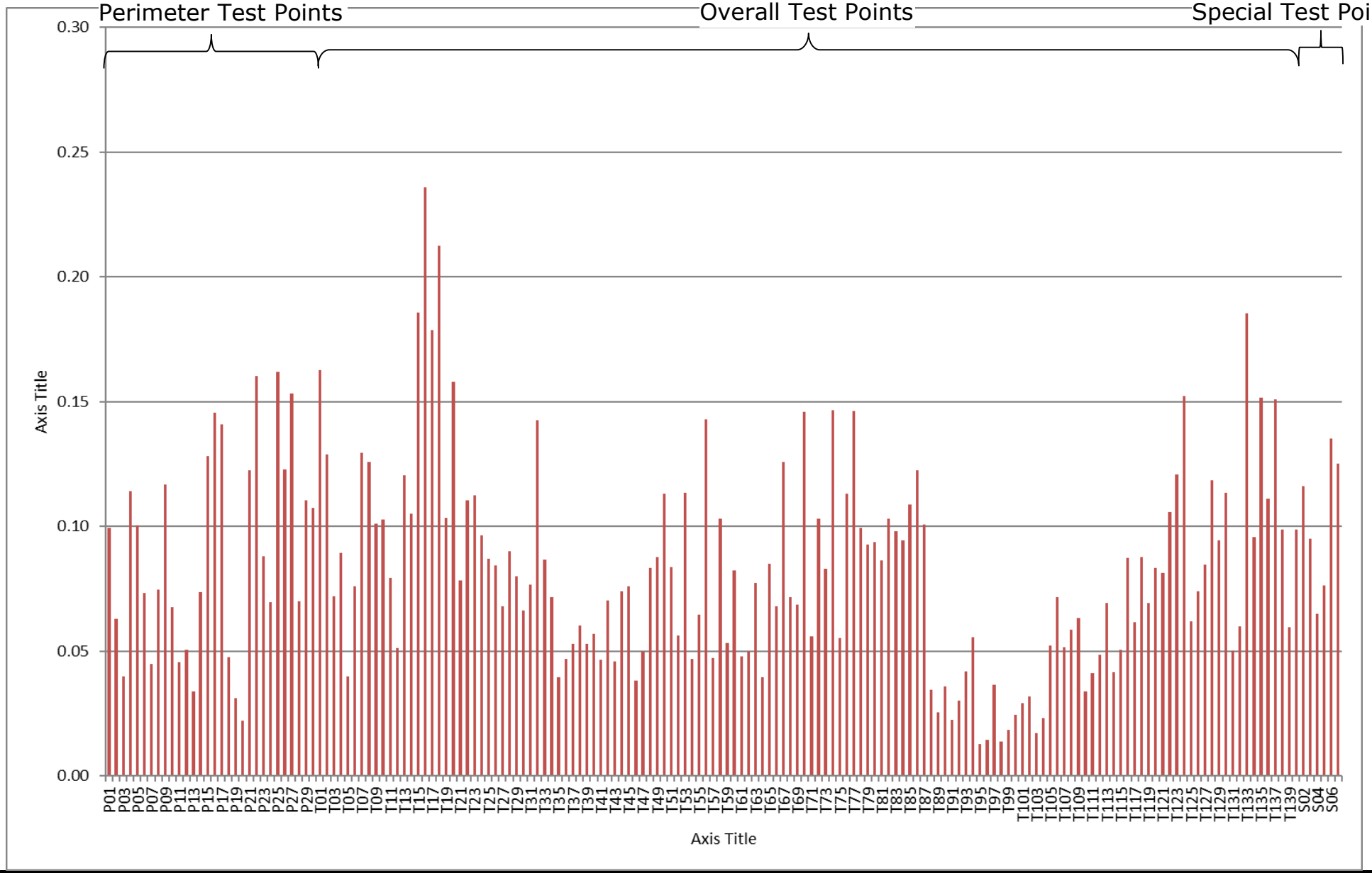

Figure: 10a	RAMBOLL
Title: Wind Velocity Ratios of Individual Test Points for Proposed Scheme (Annual)	Drawn by: WT Checked by: EC
Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme	Rev.: 1.0 Date: Dec 2022

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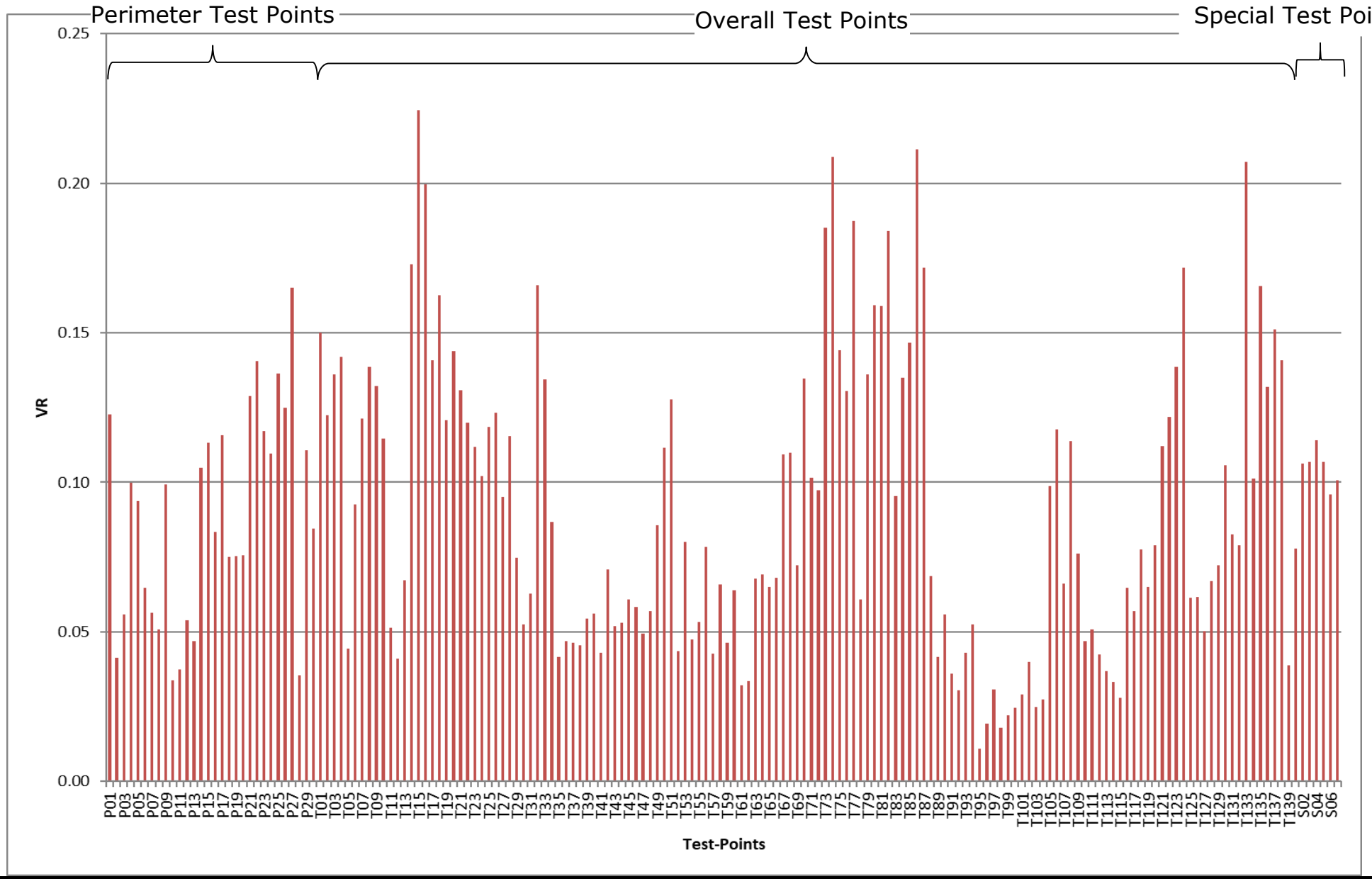

Figure: 10b

Title: Wind Velocity Ratios of Individual Test Points for Proposed Scheme (Summer)

RAMBOLL

Drawn by: WT

Checked by: EC

Project: URA Kau Pui Lung Road/ Chi Kiang Street (CBS-2: KC) Development Scheme

Rev.: 1.0

Date: Dec 2022

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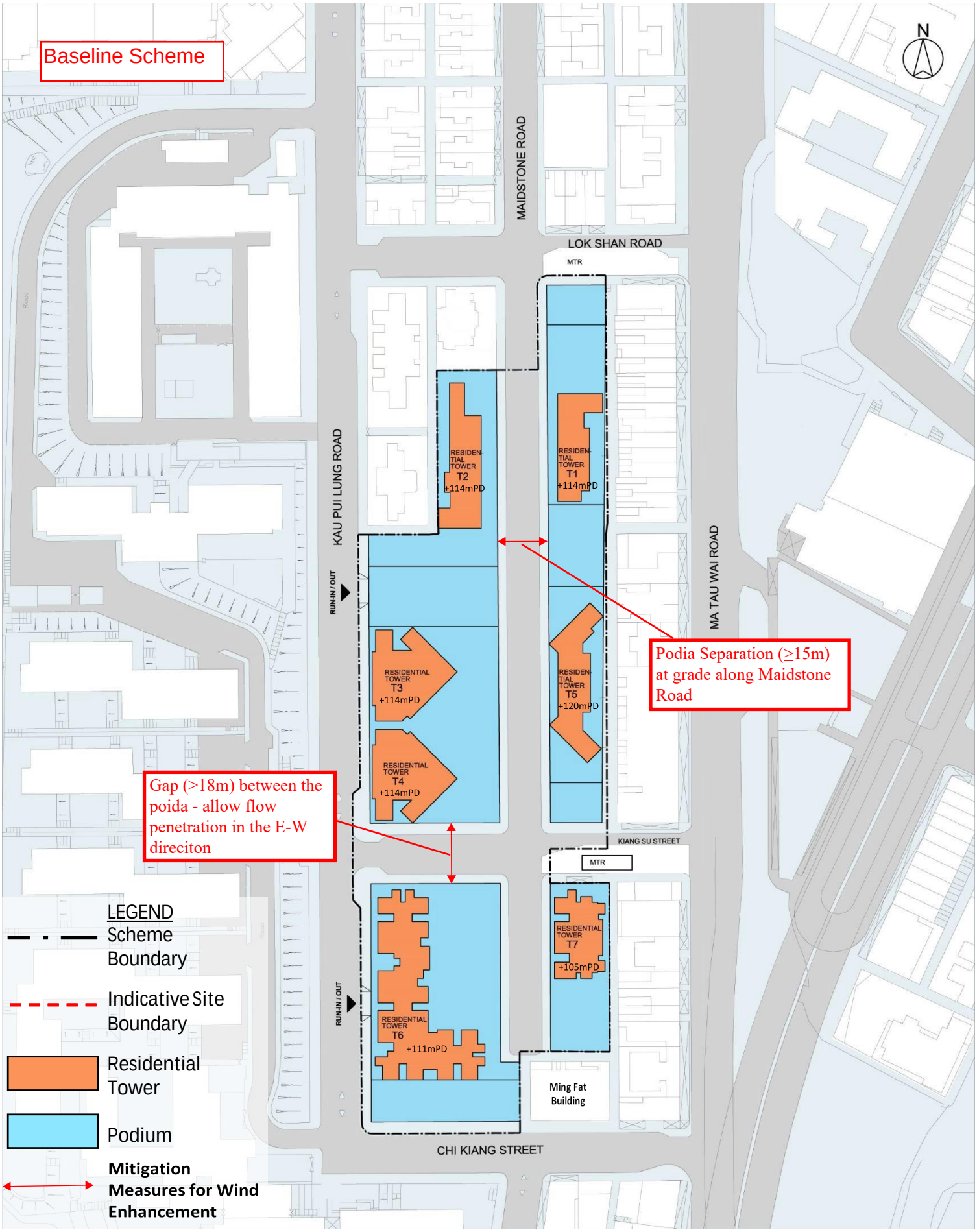
Appendix 1

Master Layout Plan for Baseline Scheme



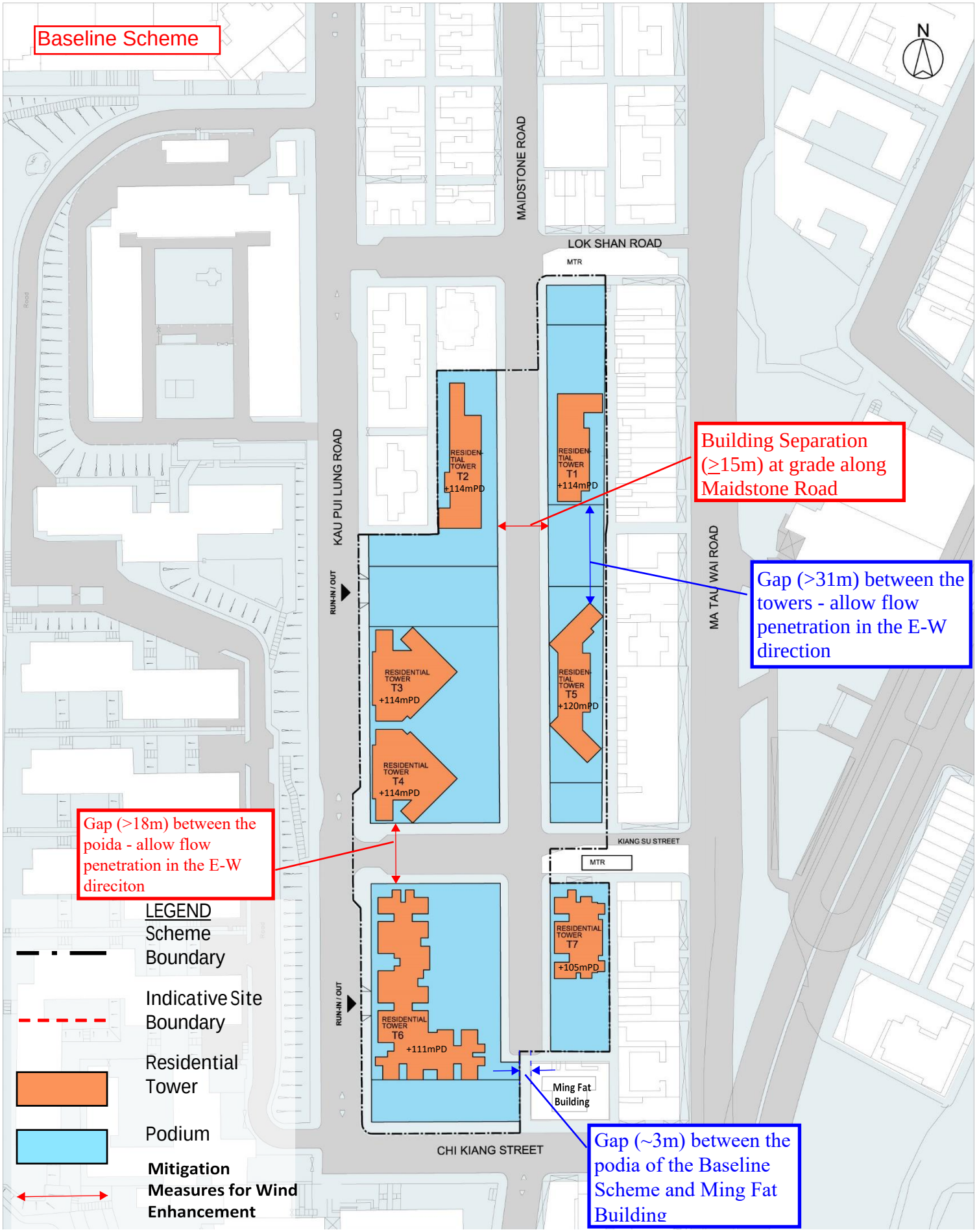
(Notional layout subject to detailed design upon DSP approval.)

URBAN RENEWAL AUTHORITY 市區重建局

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

120mPD Scheme – Layout Plan 1:1500

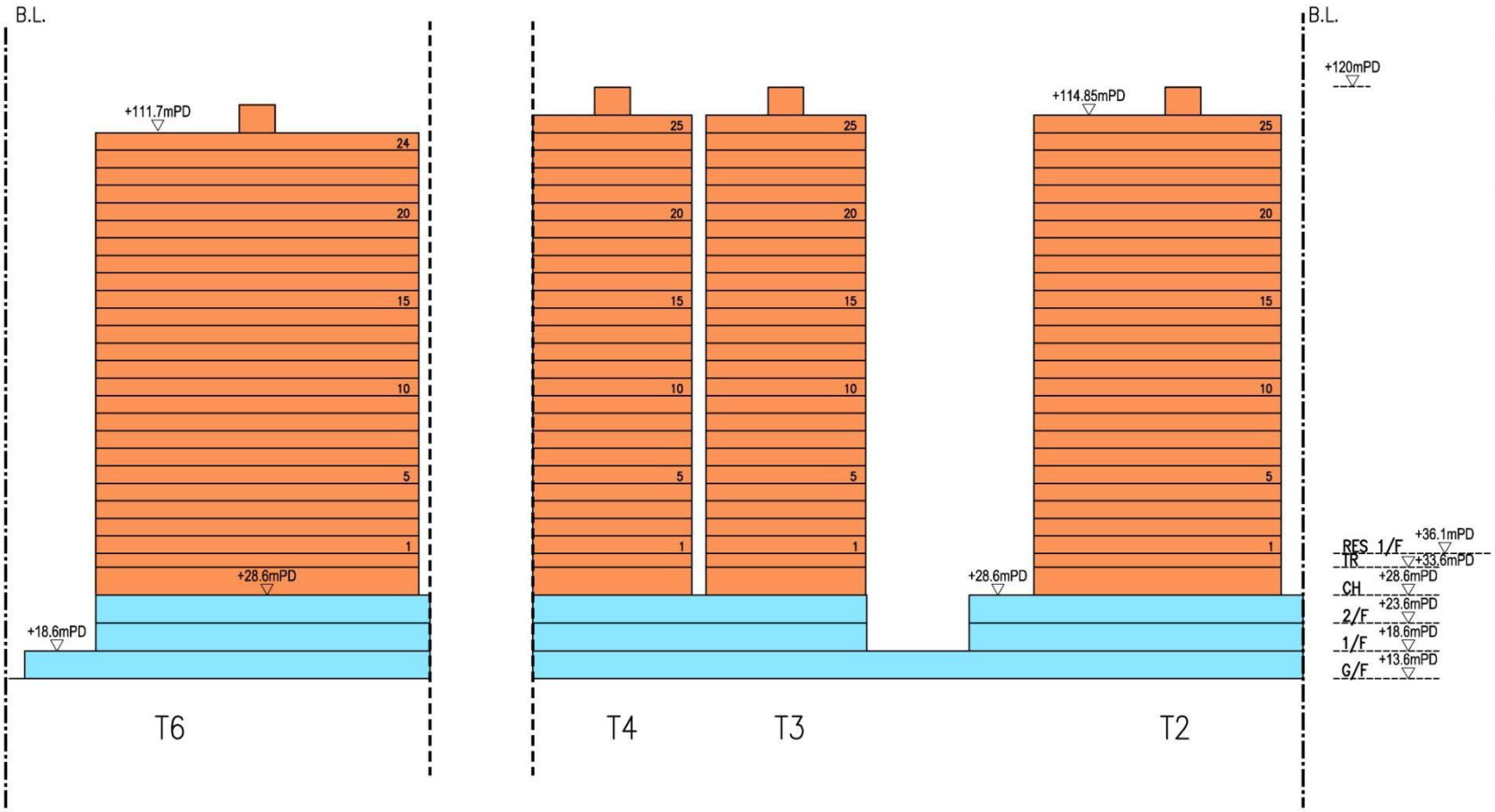
Figure 01

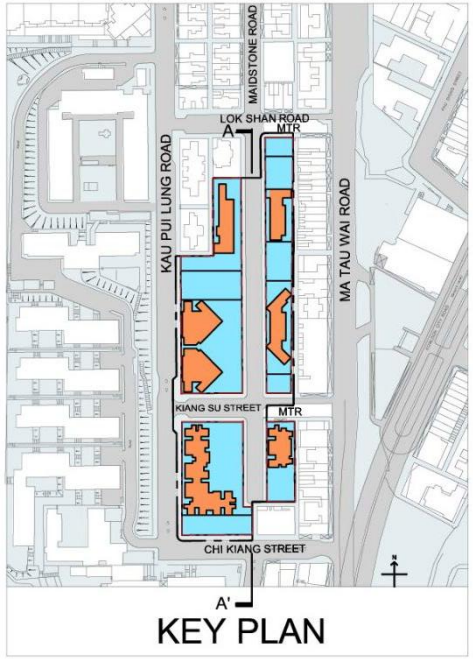


(Notional layout subject to detailed design upon DSP approval.)

市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	120mPD Scheme - Ventilation Diagram	**Figure 02**

Baseline Scheme





(Notional layout subject to detailed design upon DSP approval.)

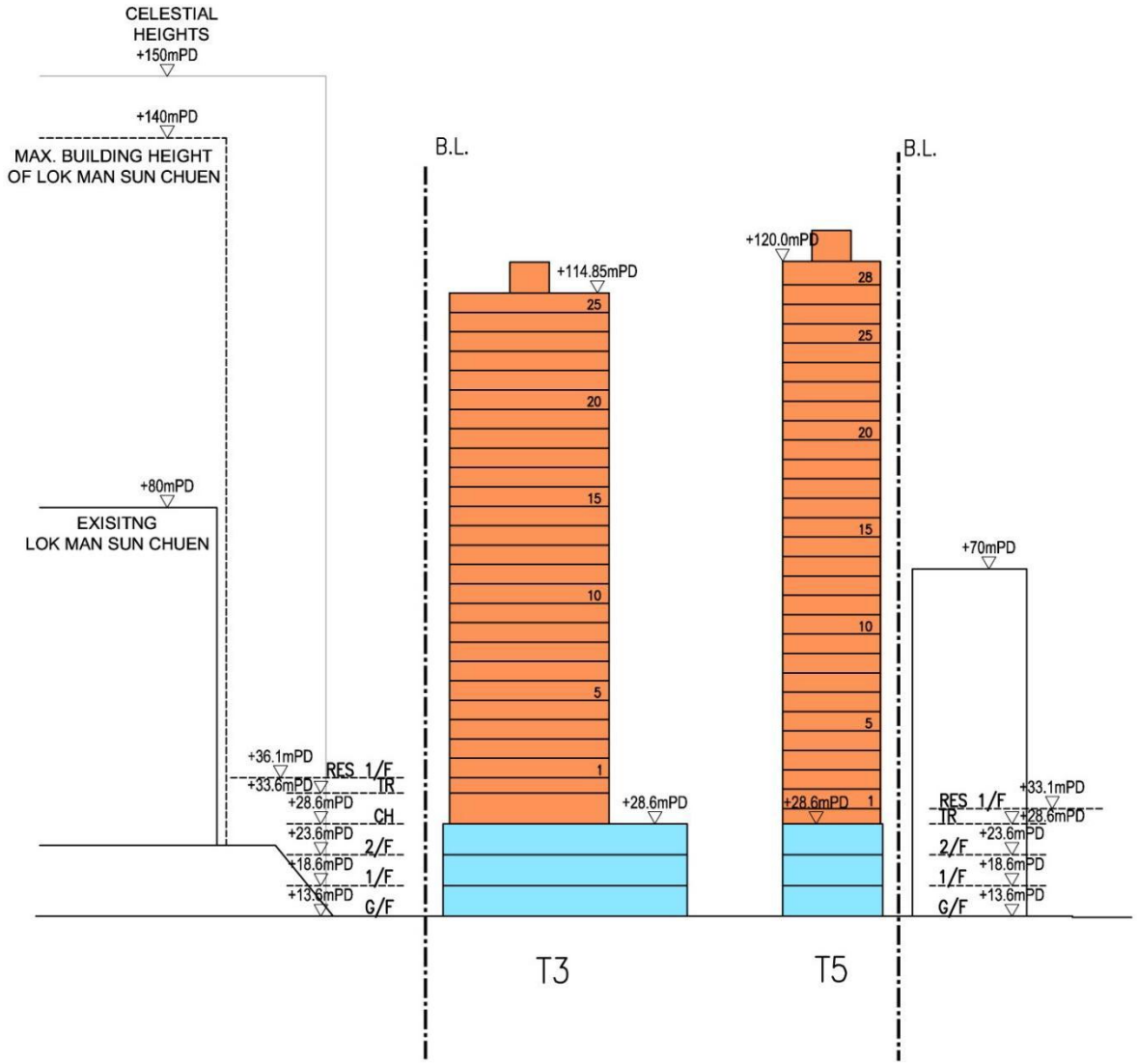
URBAN RENEWAL AUTHORITY 市區重建局

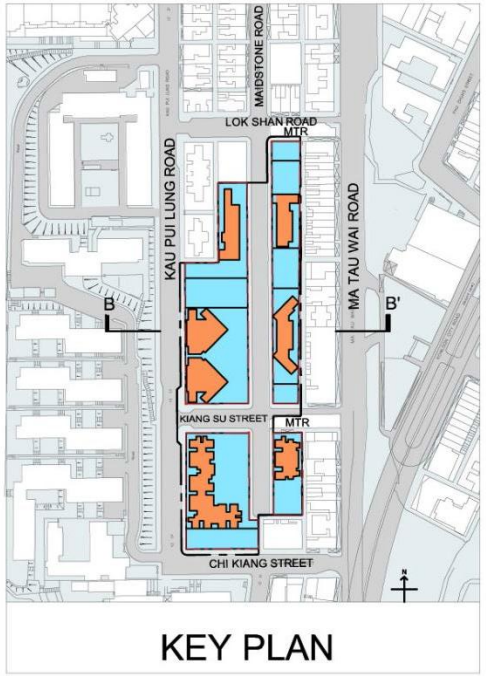
URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

120mPD Scheme – Block Section A-A' 1:1500

Figure 03

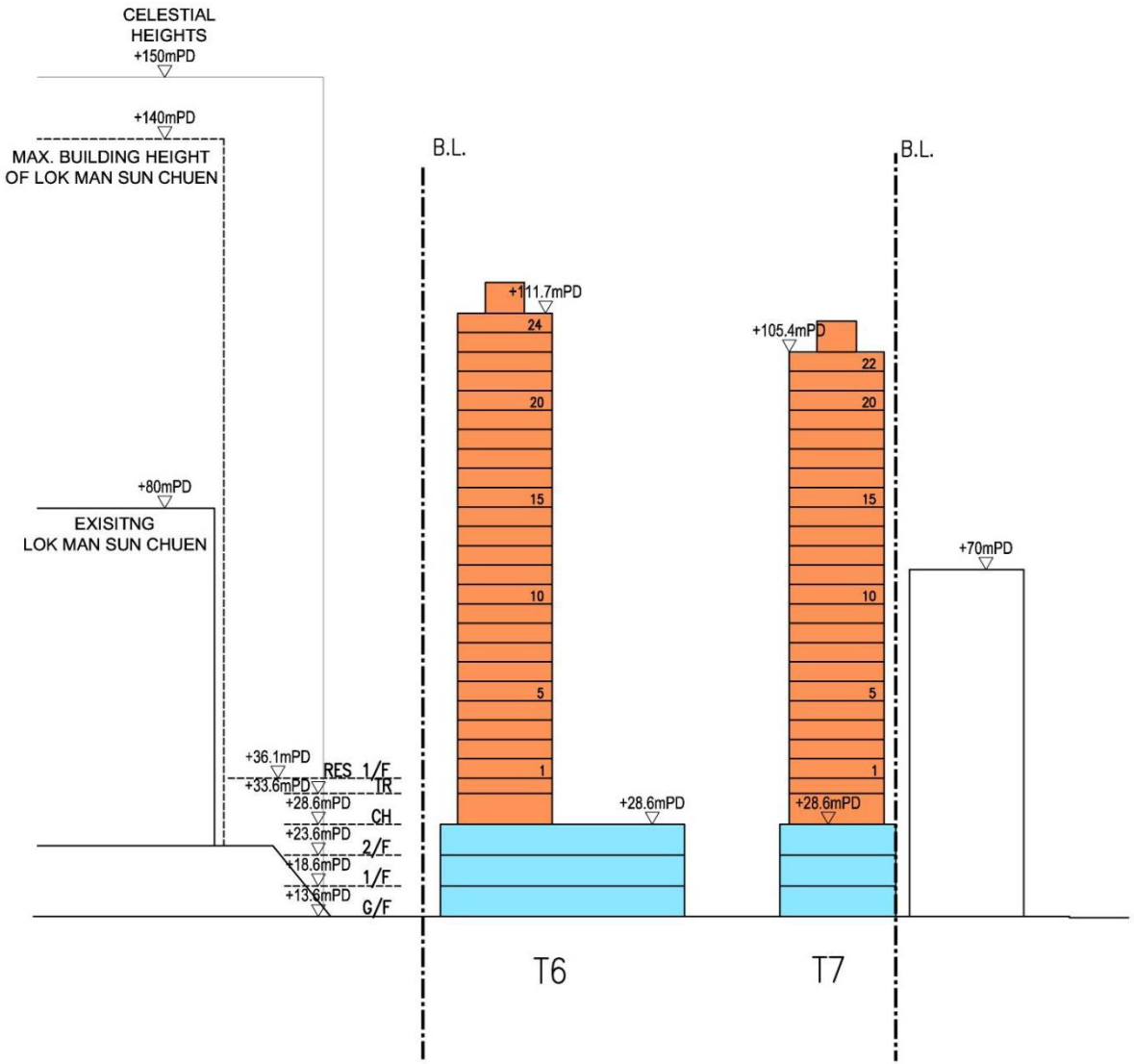
Baseline Scheme

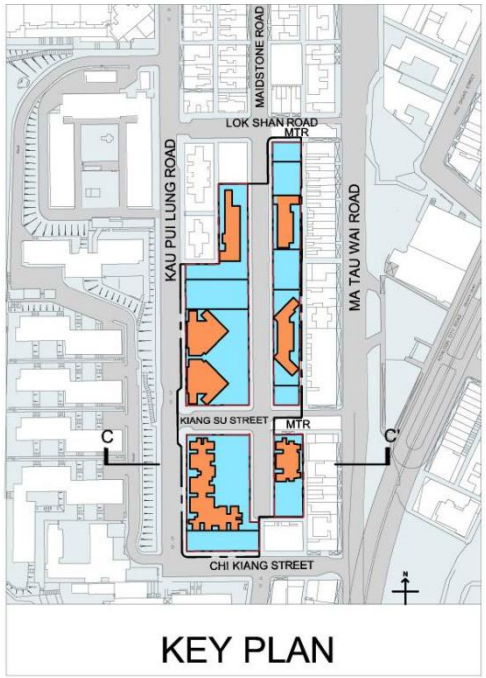




(Notional layout subject to detailed design upon DSP approval.)

Baseline Scheme





(Notional layout subject to detailed design upon DSP approval.)

URBAN RENEWAL AUTHORITY 市區重建局

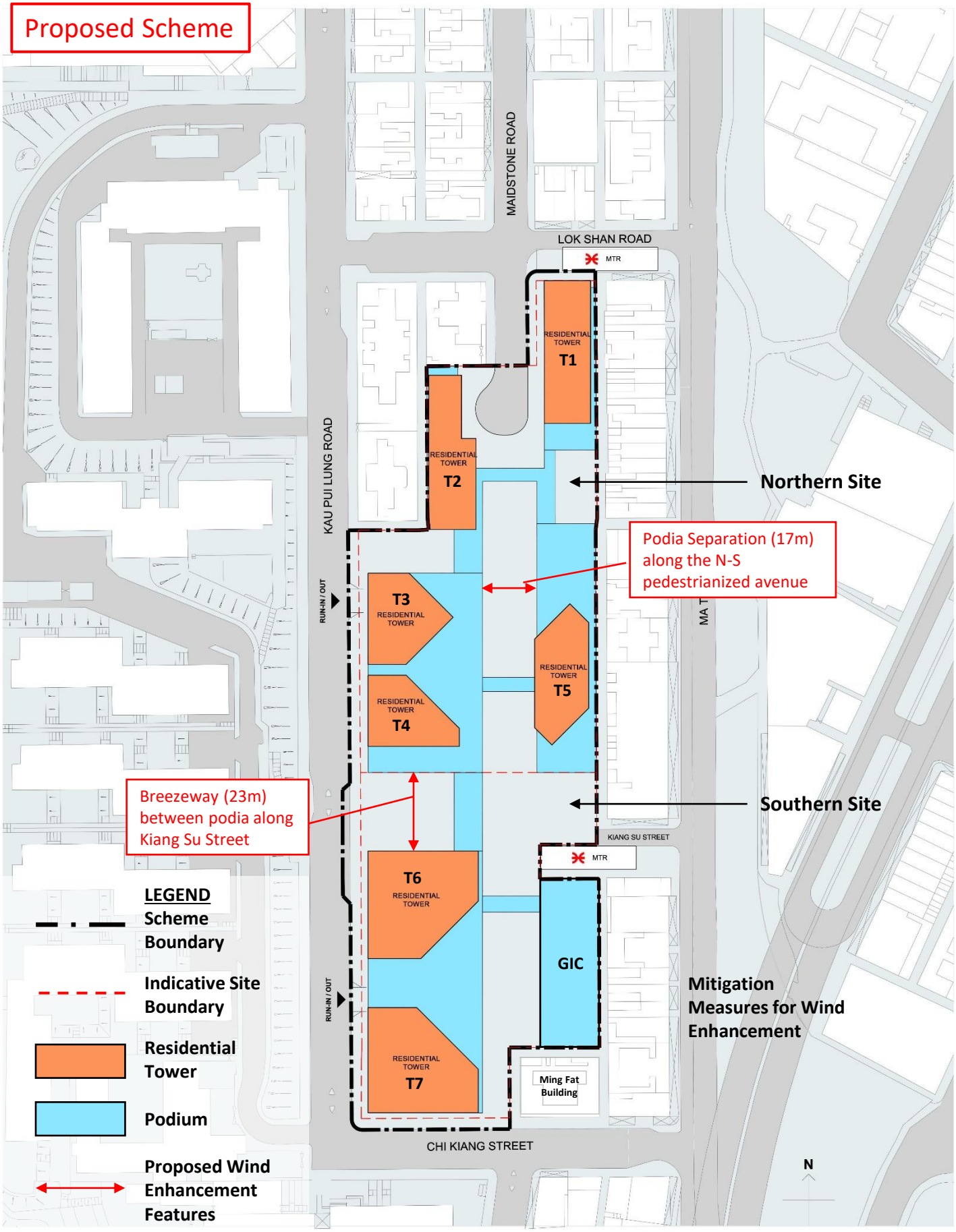
URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

120mPD Scheme – Block Section C-C'
1:1500

Figure 05

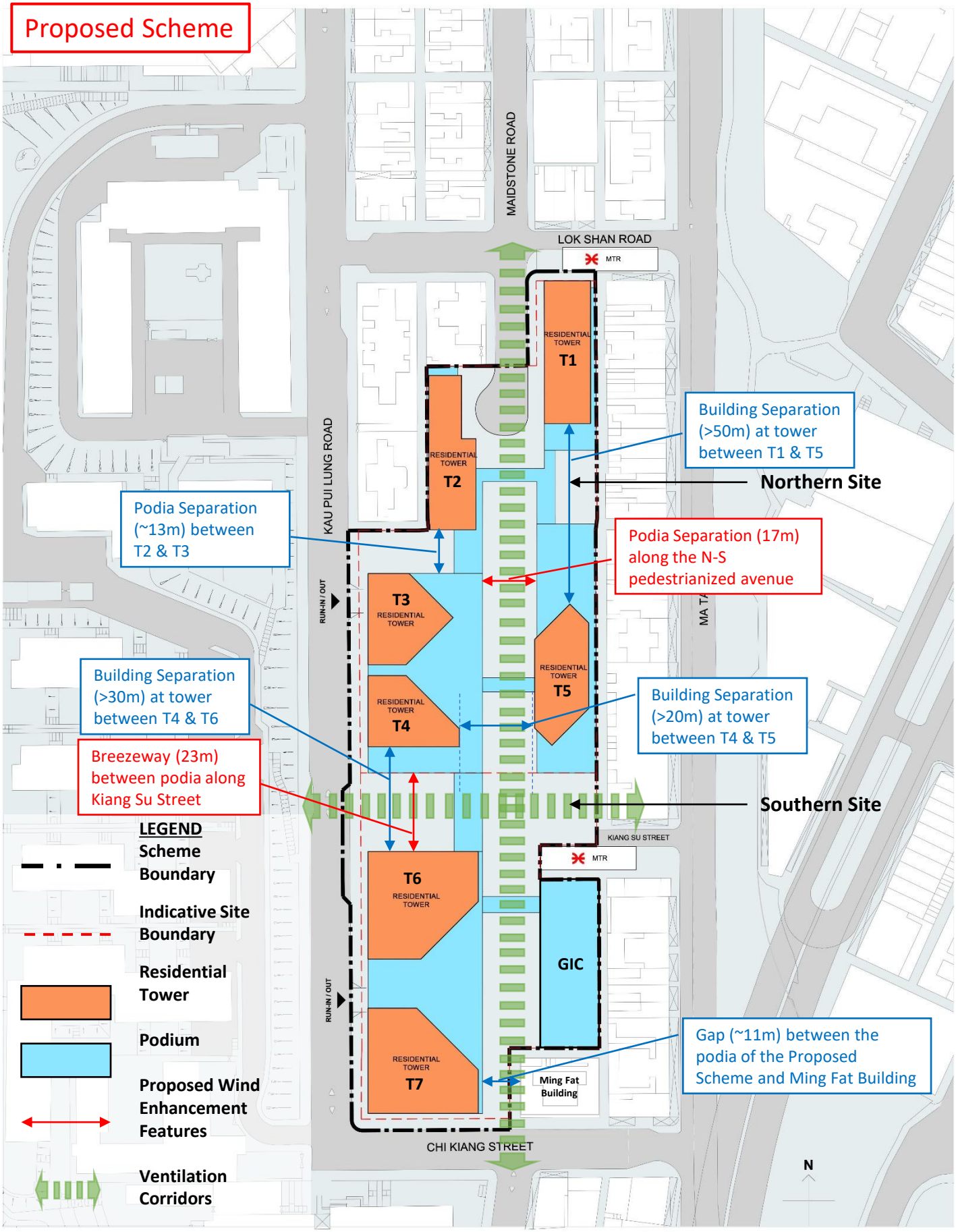
Appendix 2

Master Layout Plan for Proposed Scheme



(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

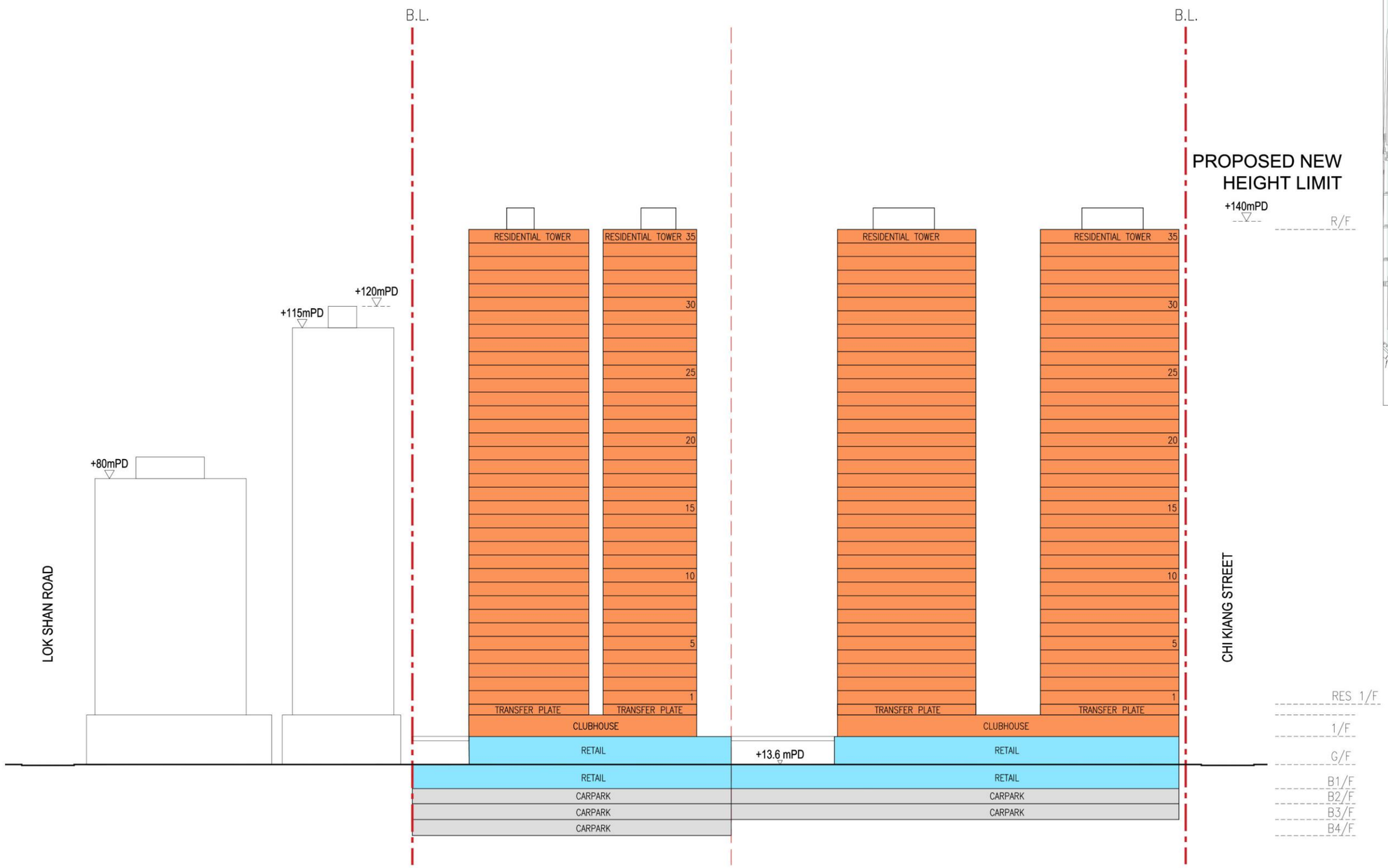
URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Notional Design – Indicative Block Plan	**Figure 1.1**

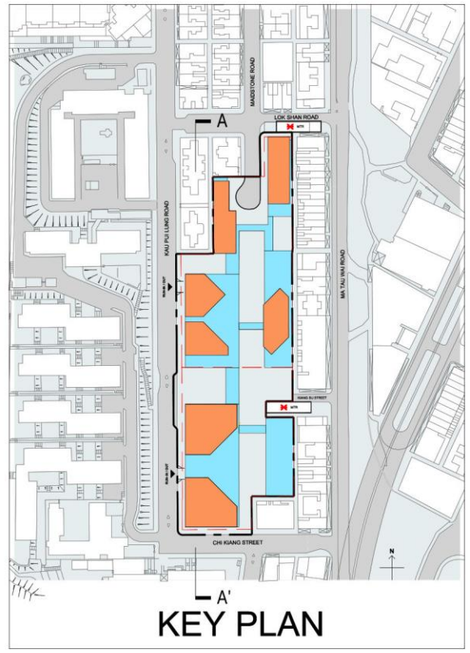


(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Proposed Scheme – Ventilation Diagram	**Figure 1.1**

Proposed Scheme





(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

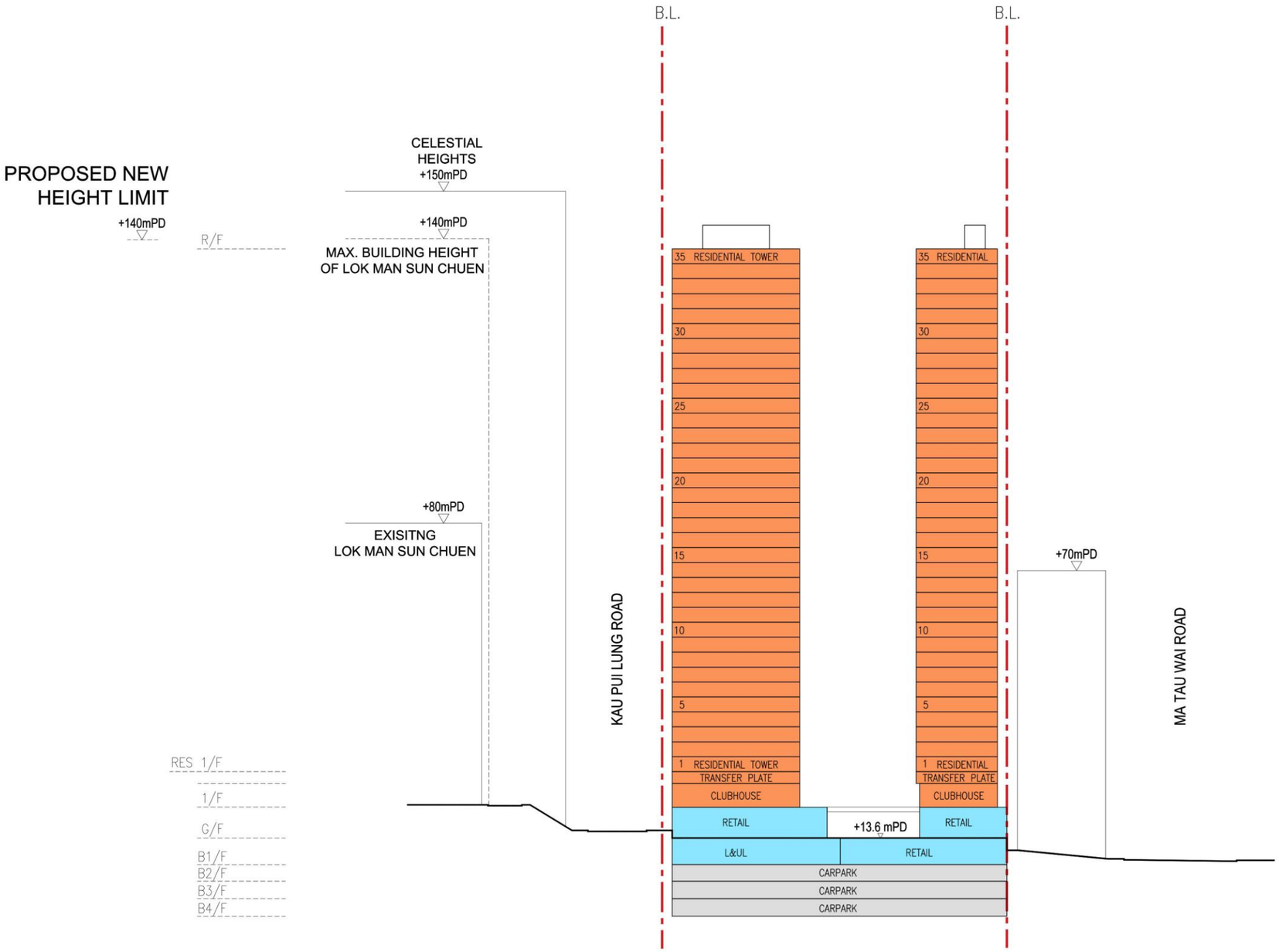
URBAN RENEWAL AUTHORITY 市區重建局

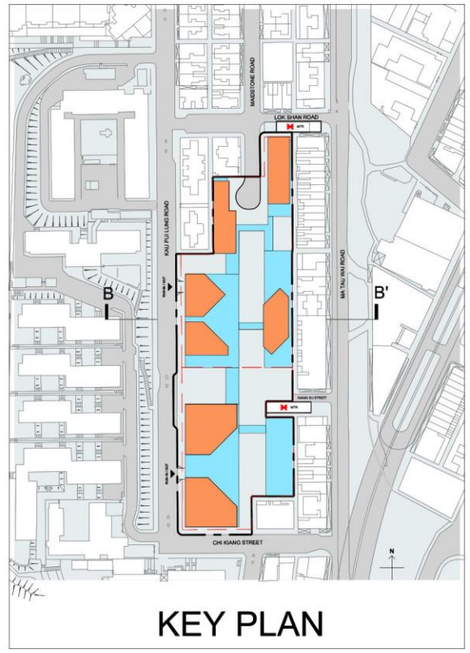
URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Notional Design – Schematic Section AA'

Figure 1.2

Proposed Scheme





(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

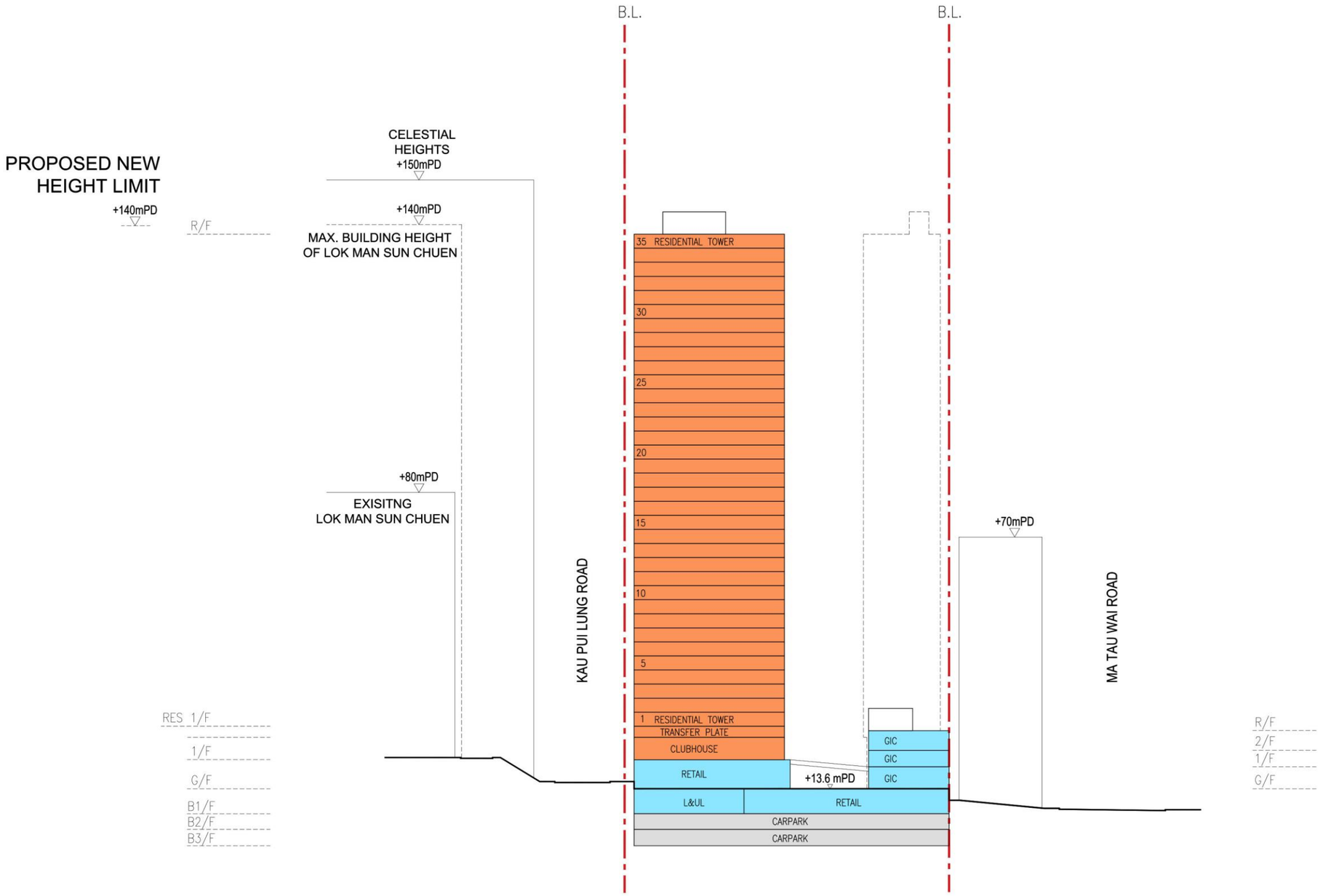
URBAN RENEWAL AUTHORITY 市區重建局

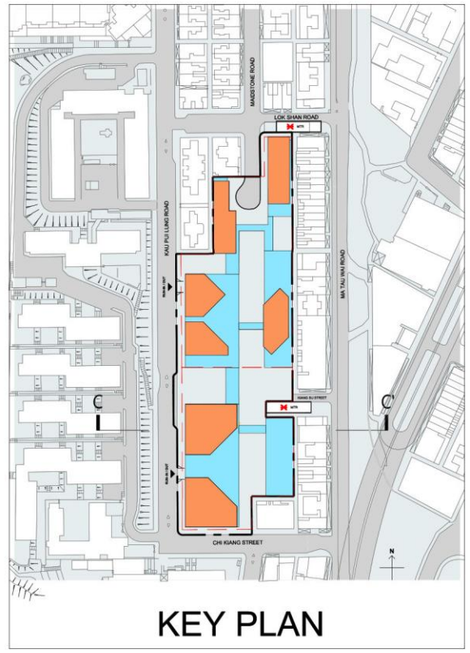
URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Notional Design – Schematic Section BB'

Figure 1.3

Proposed Scheme

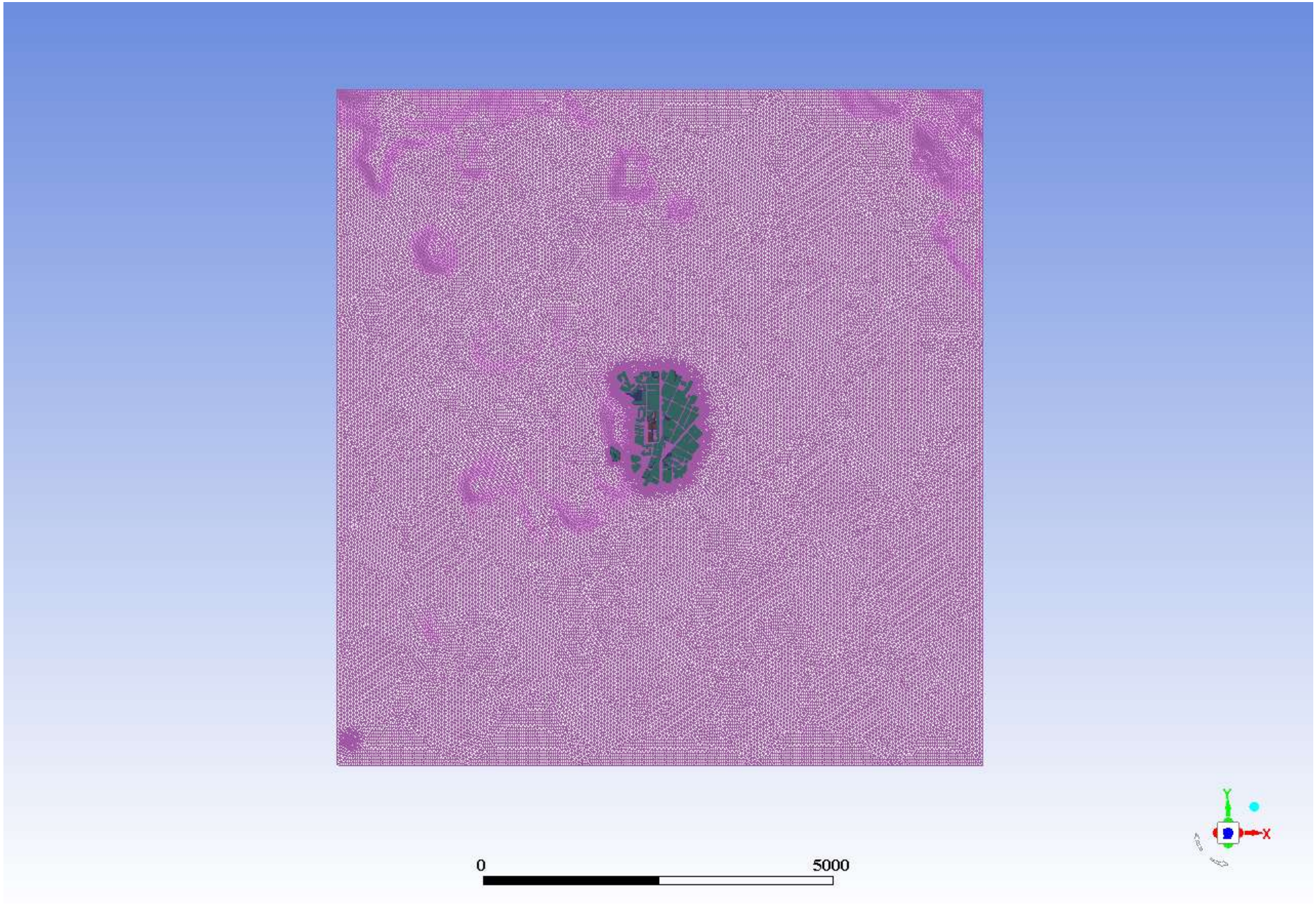




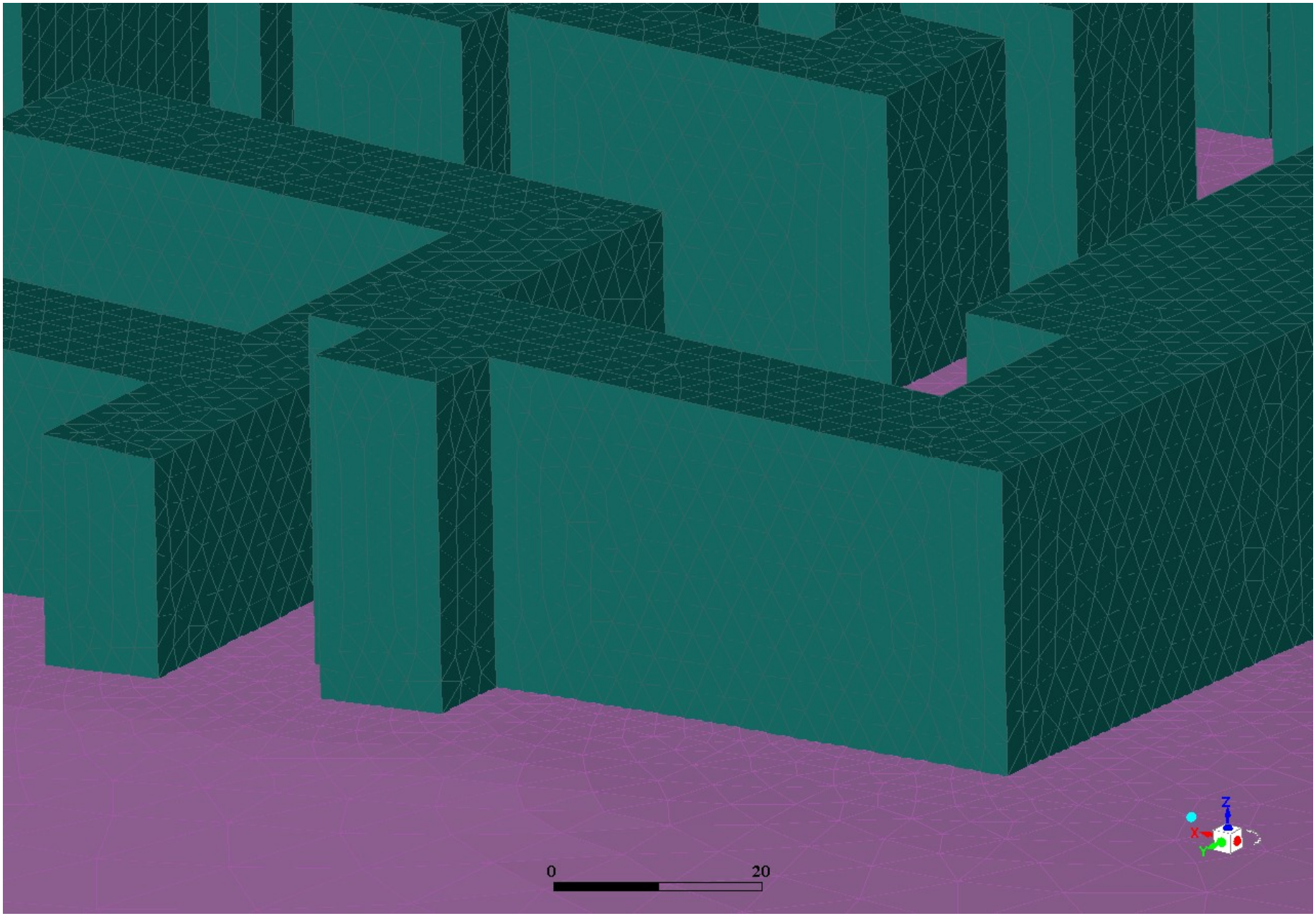
(Remarks: For indicative purpose only. Notional layout subject to detailed design upon DSP approval.)

Appendix 3

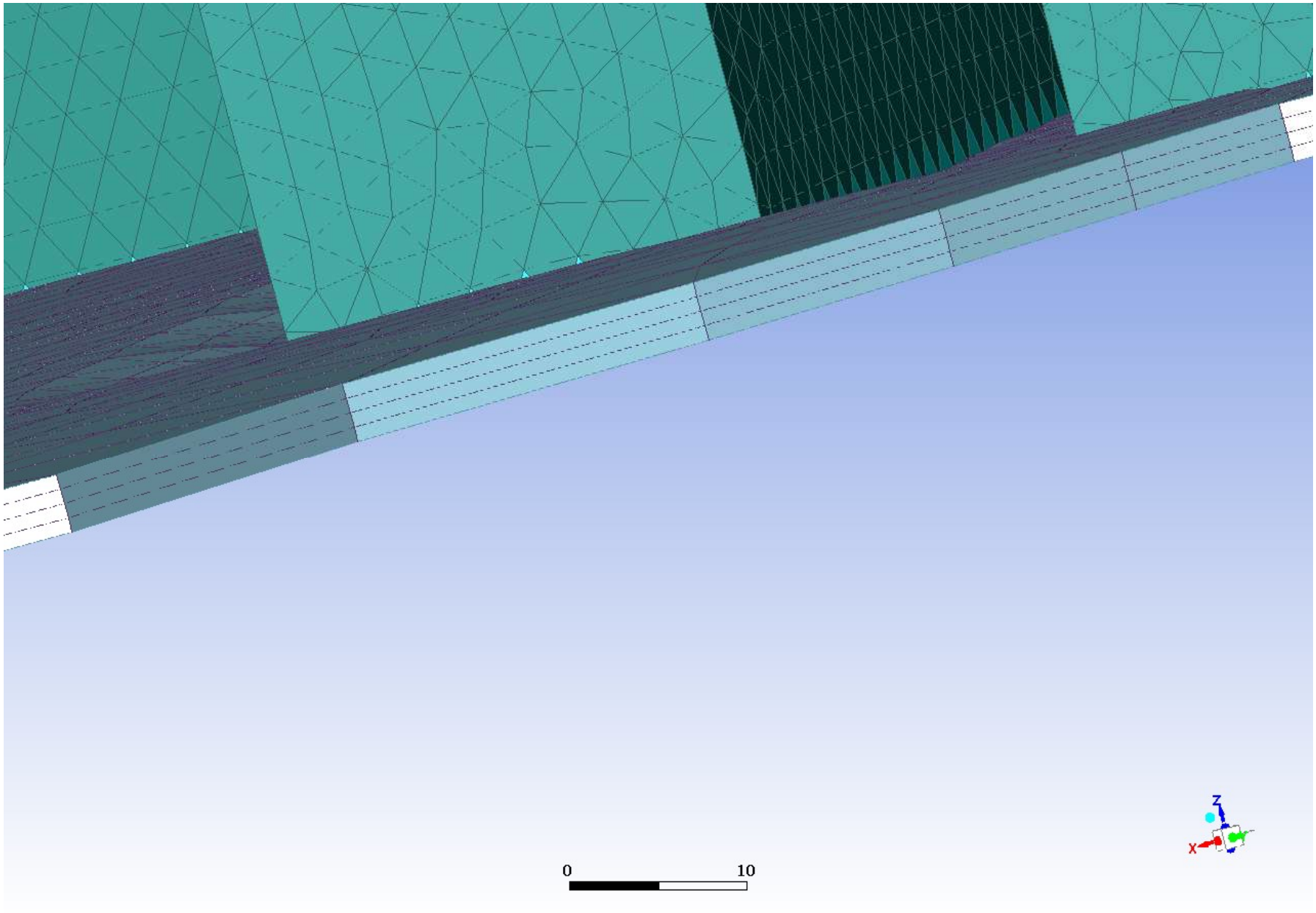
Captured Pictures of the CFD Model



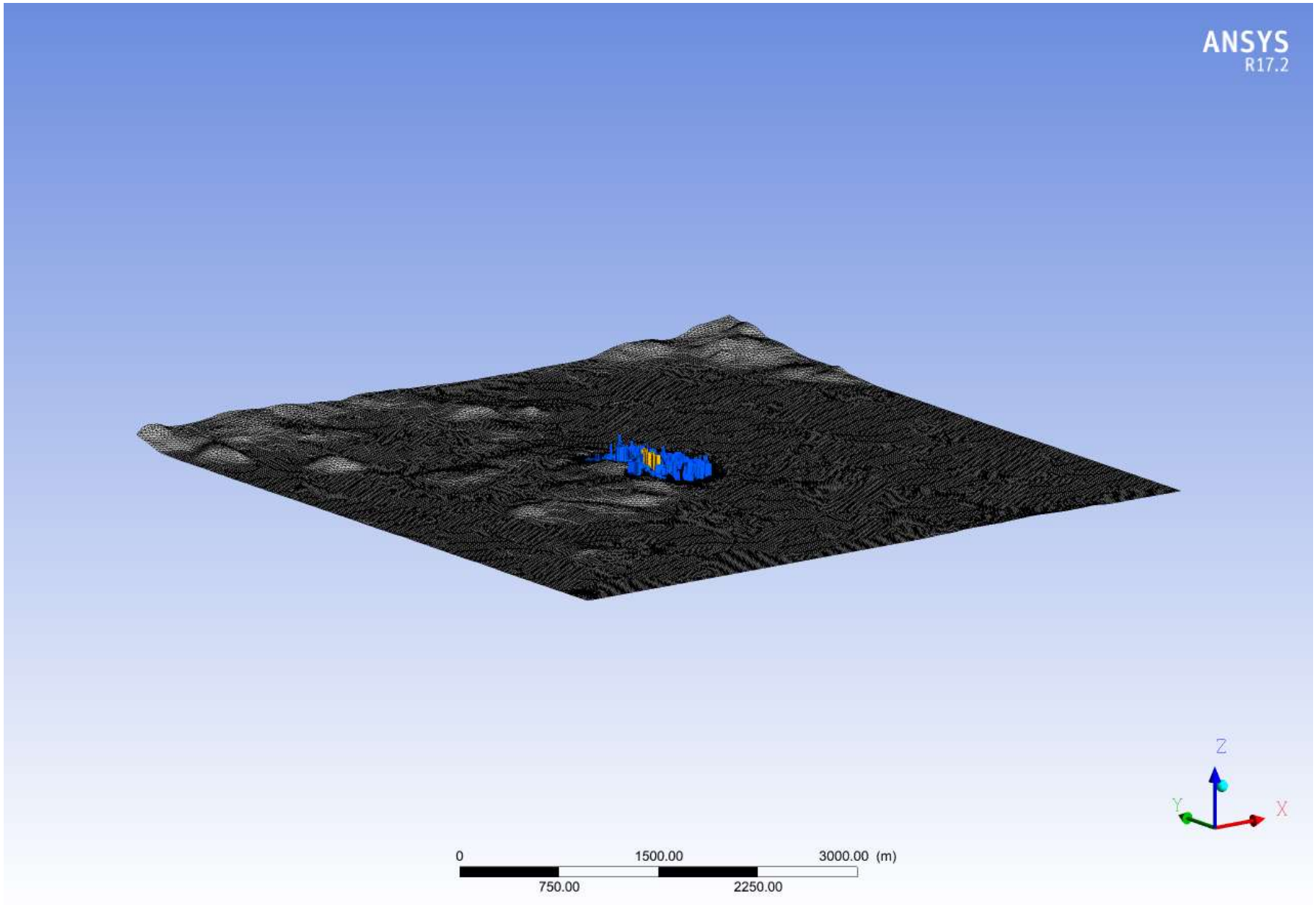
Domain



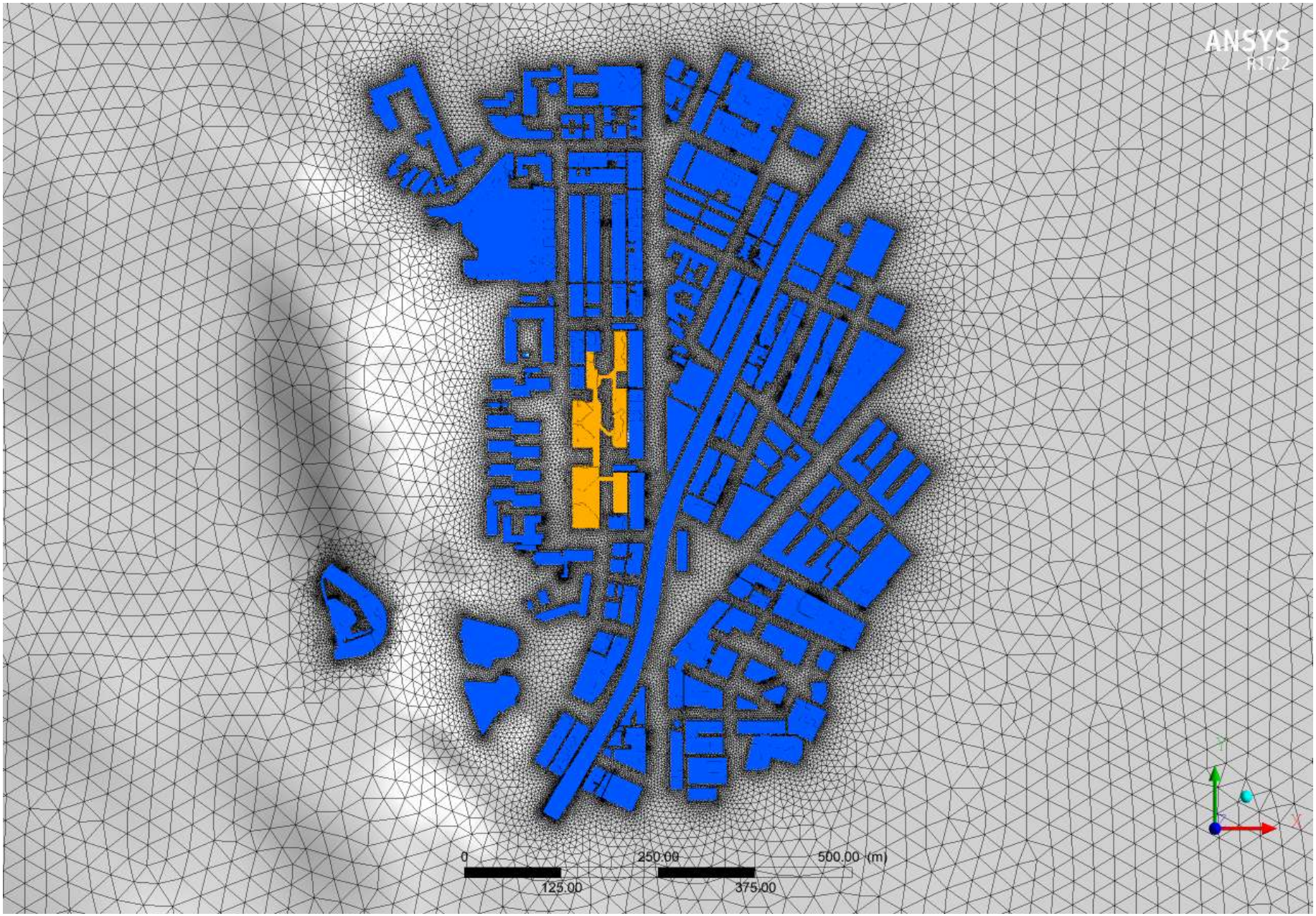
Surface Mesh in the Model



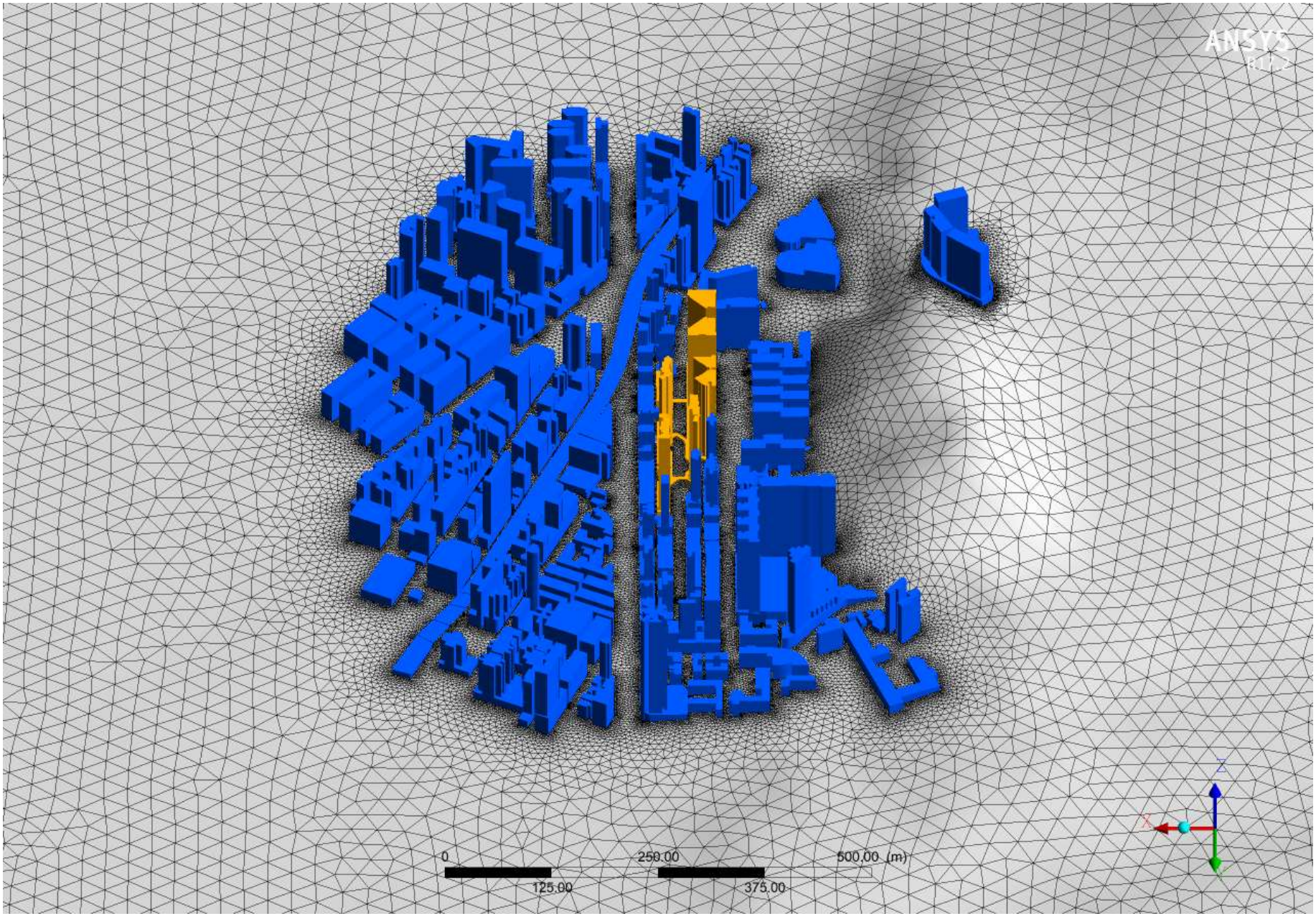
4 Layers Prism



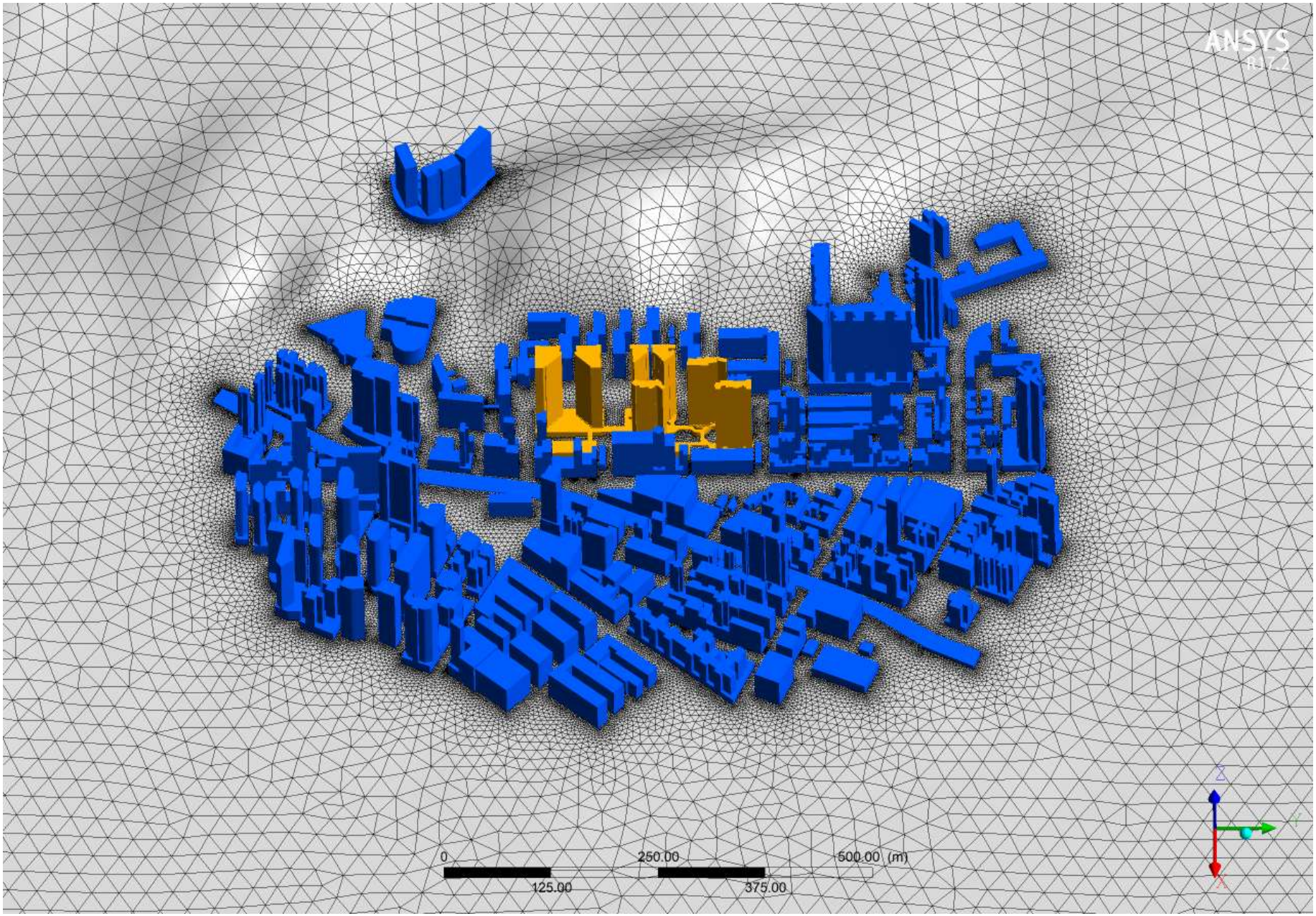
Topography



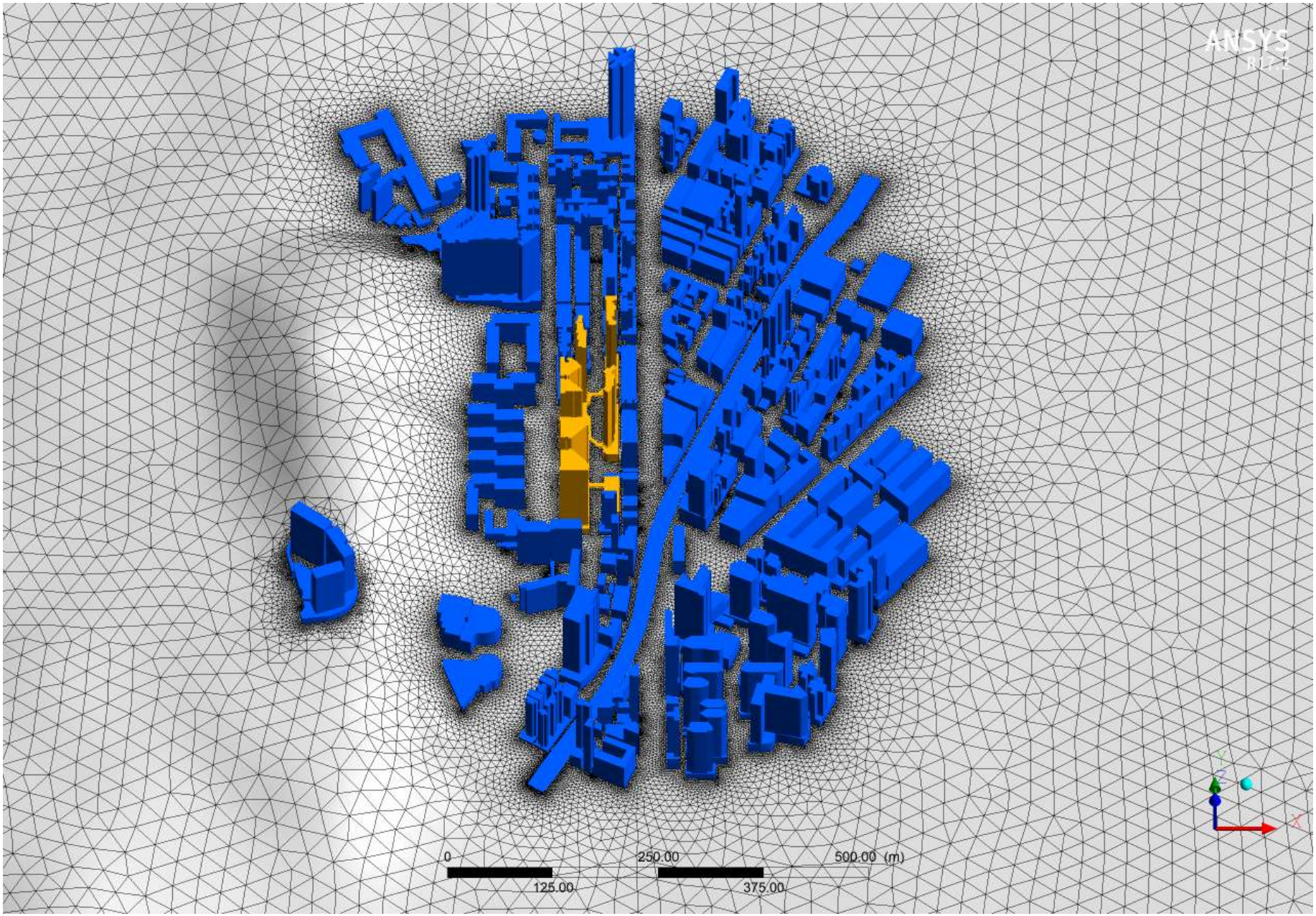
Surroundings - Top View



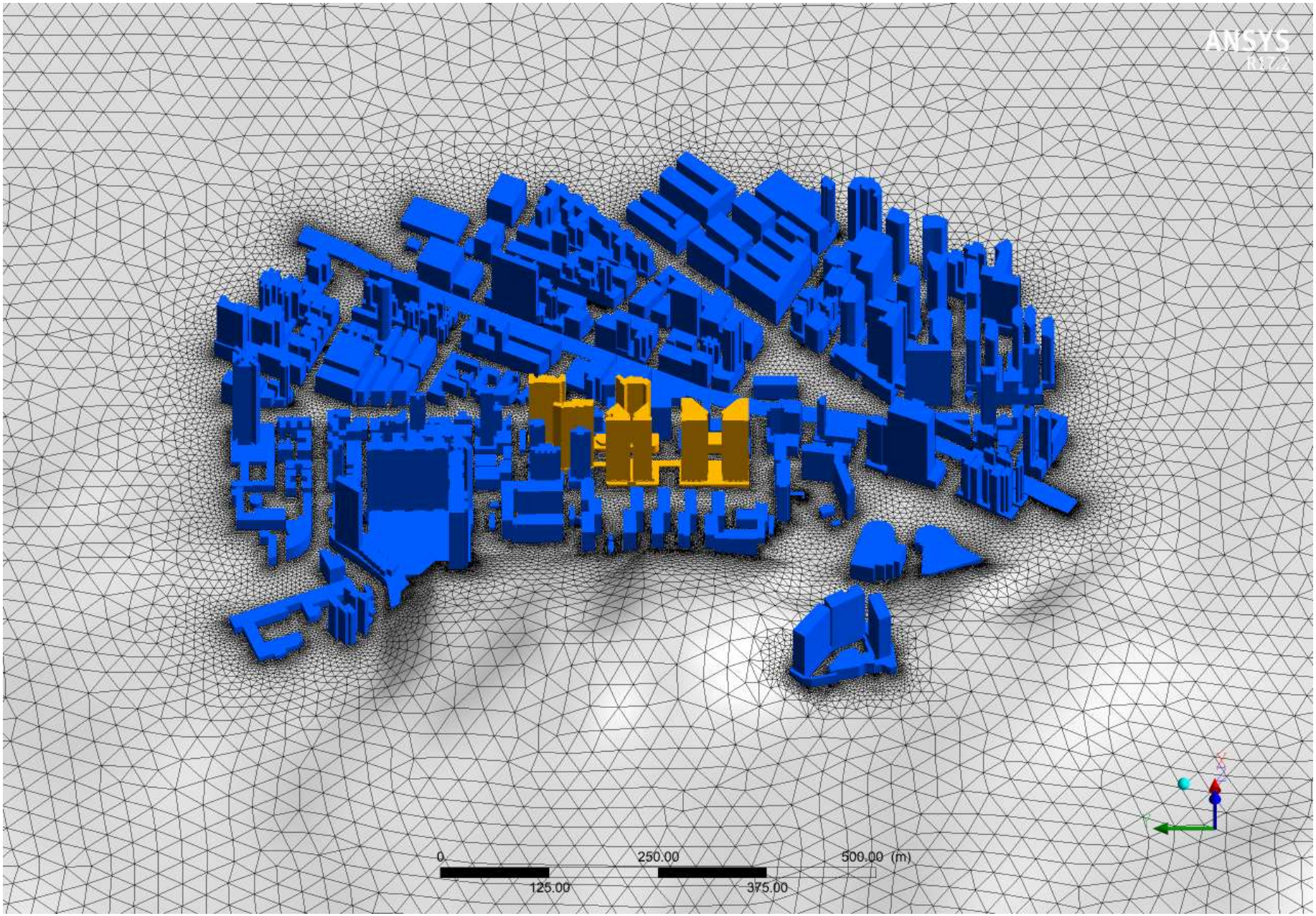
Surroundings - North View



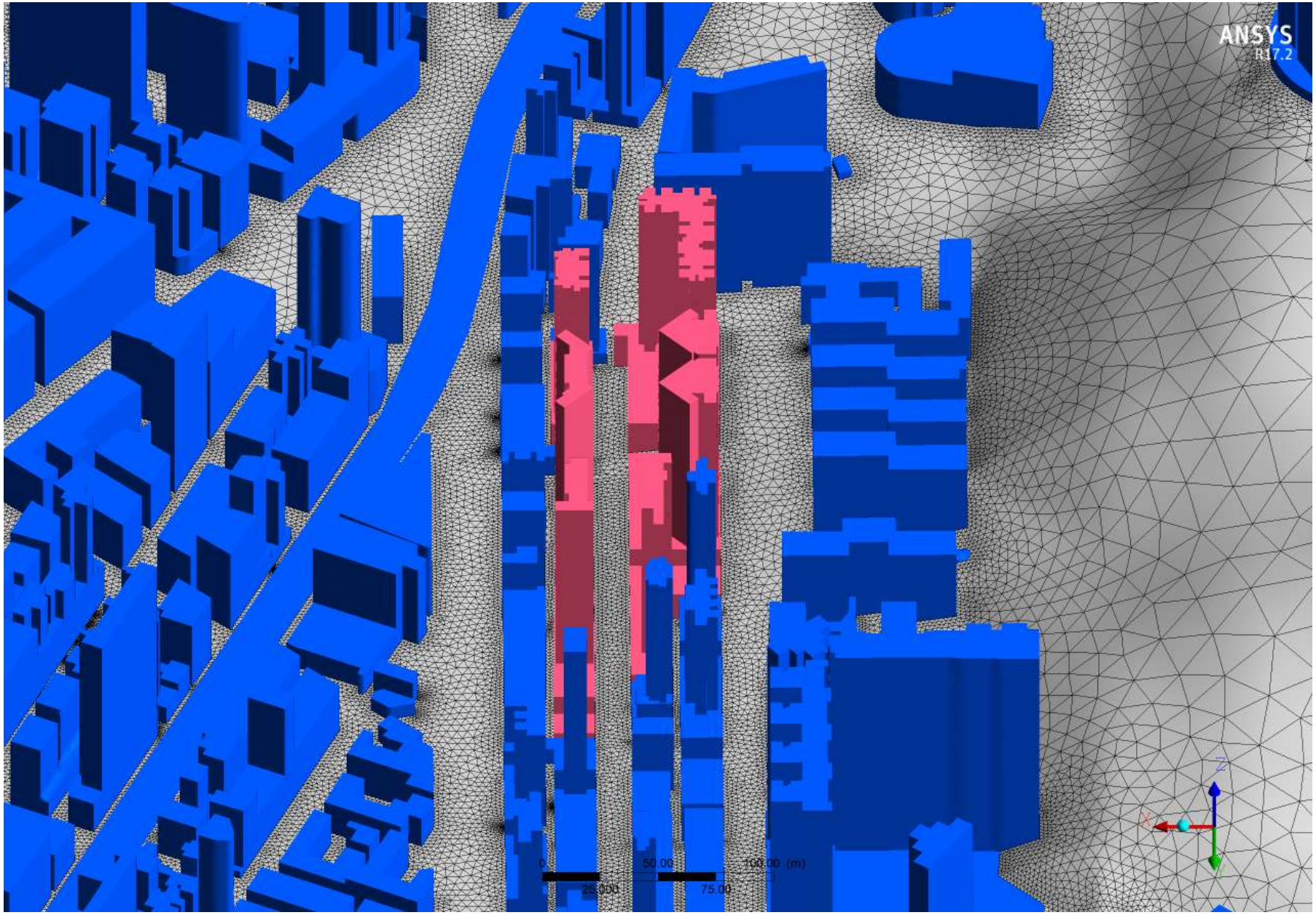
Surroundings - East View



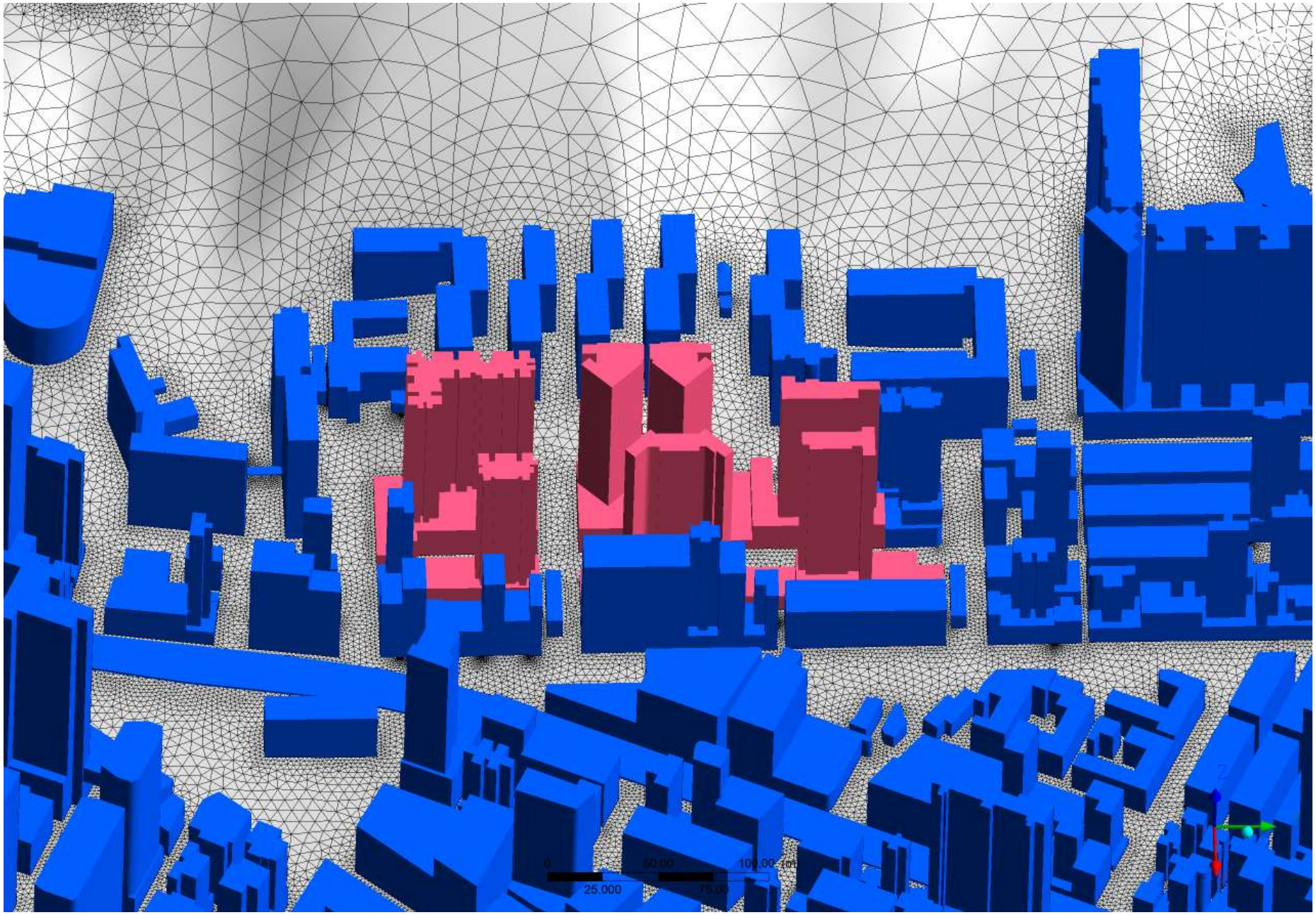
Surroundings - South View



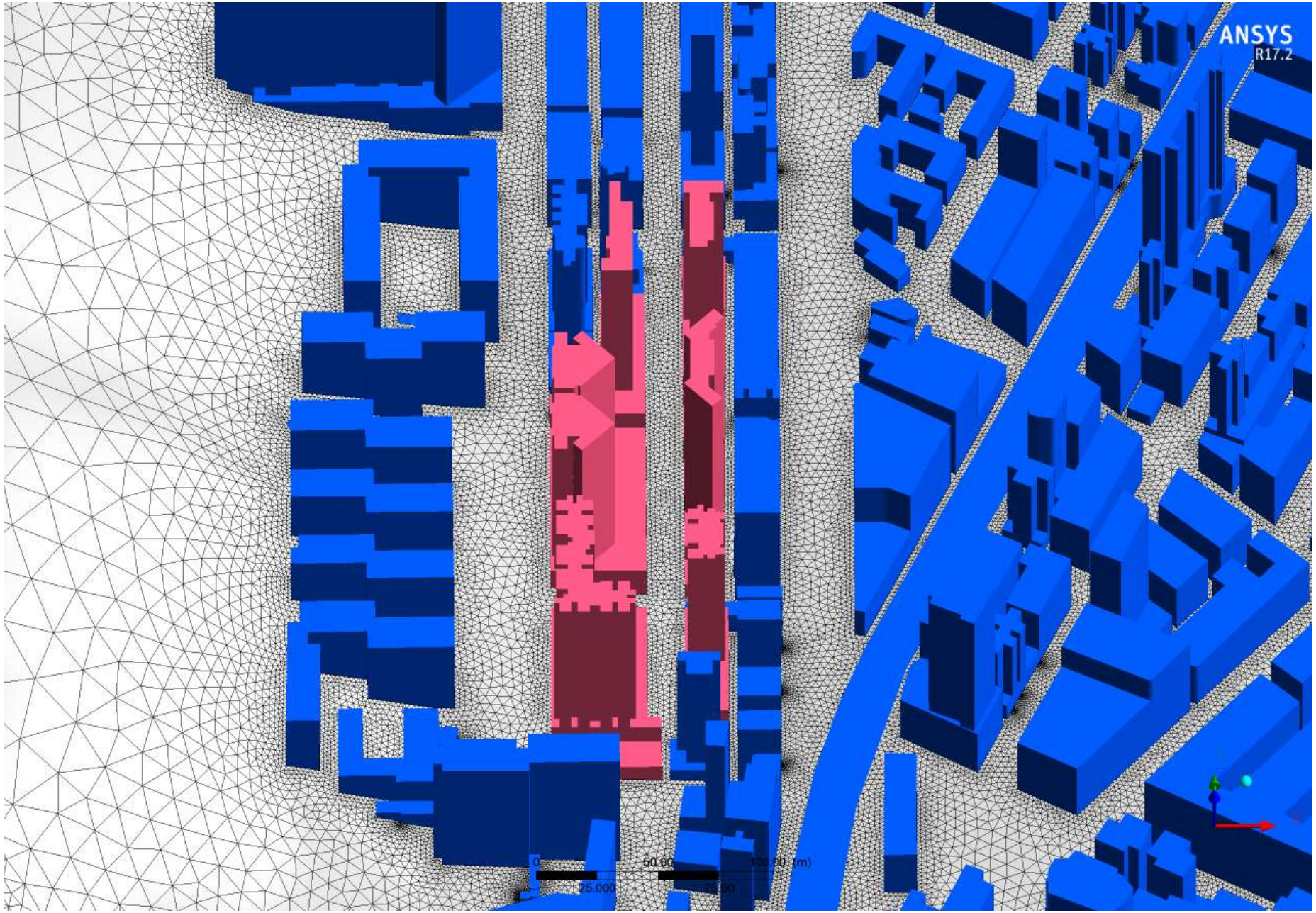
Surroundings - West View



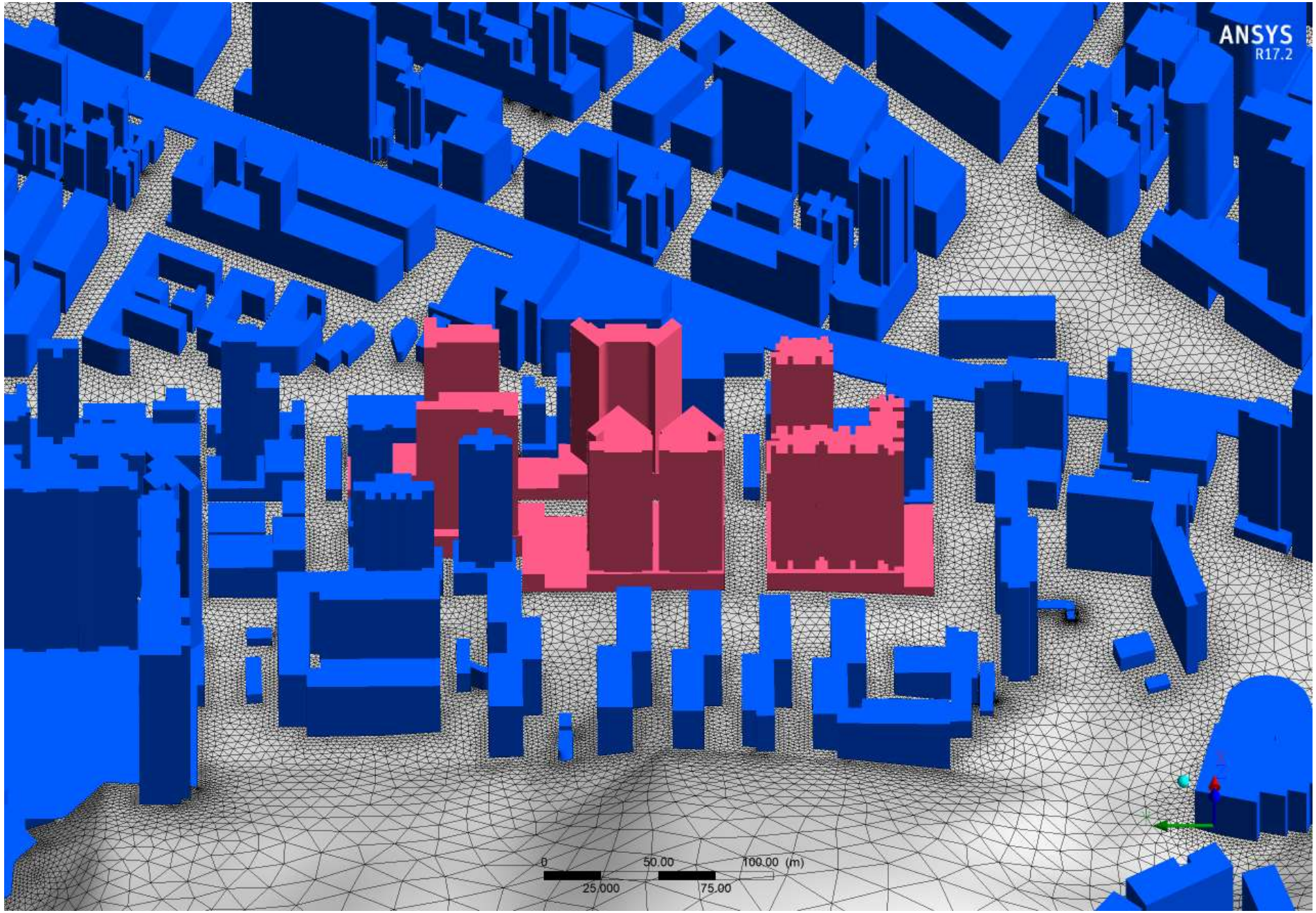
Baseline Scheme - N



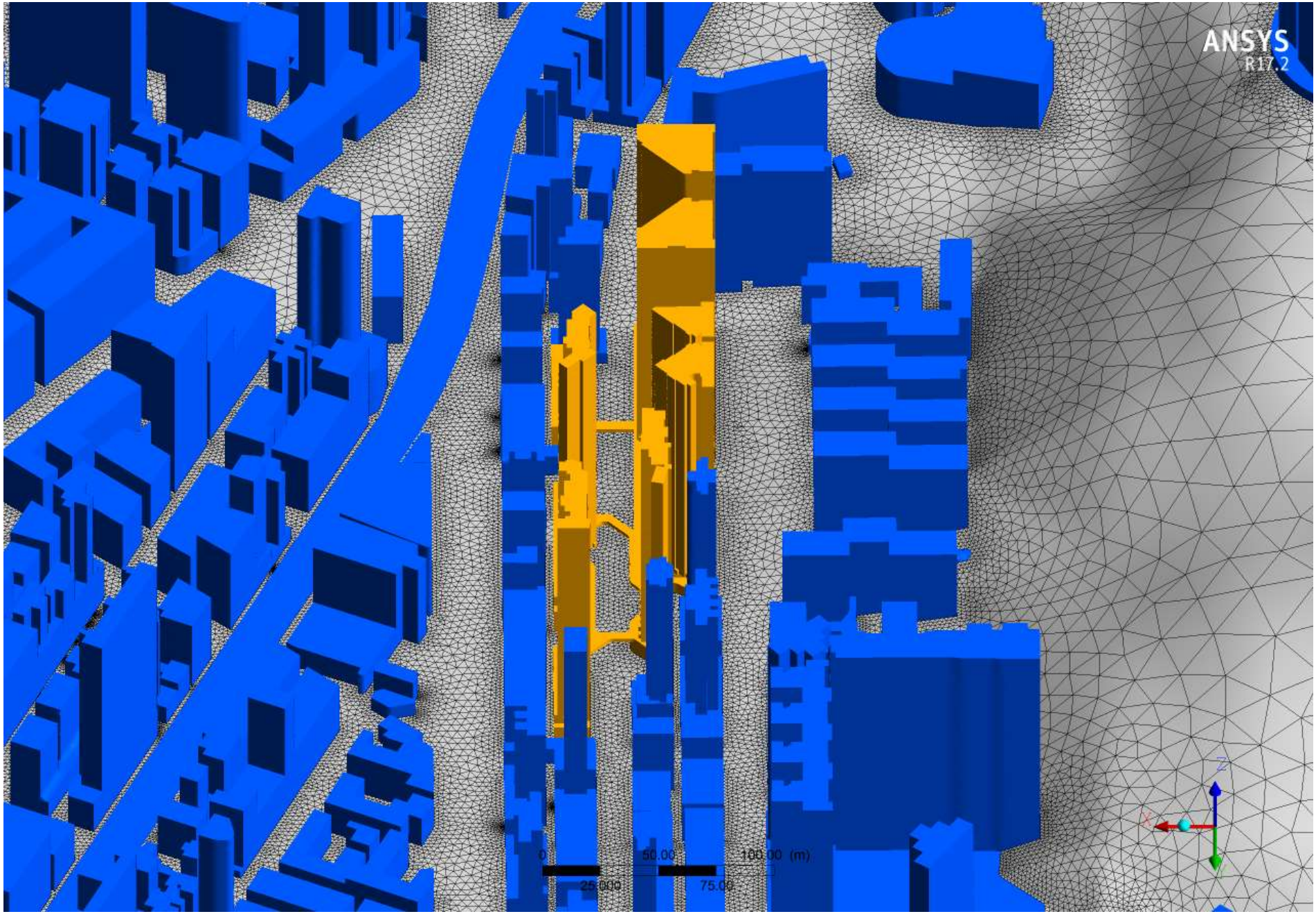
Baseline Scheme - E



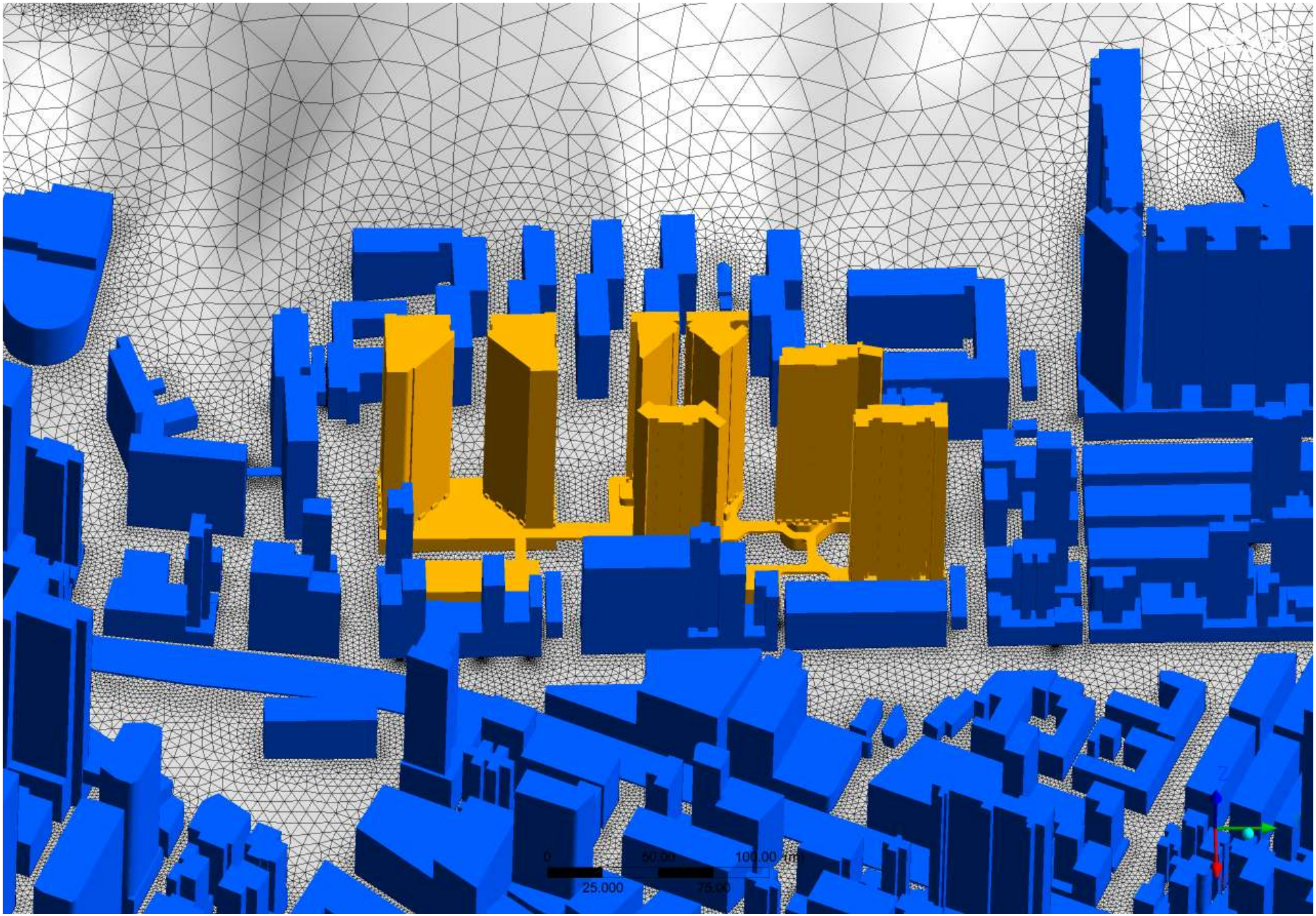
Baseline Scheme - S



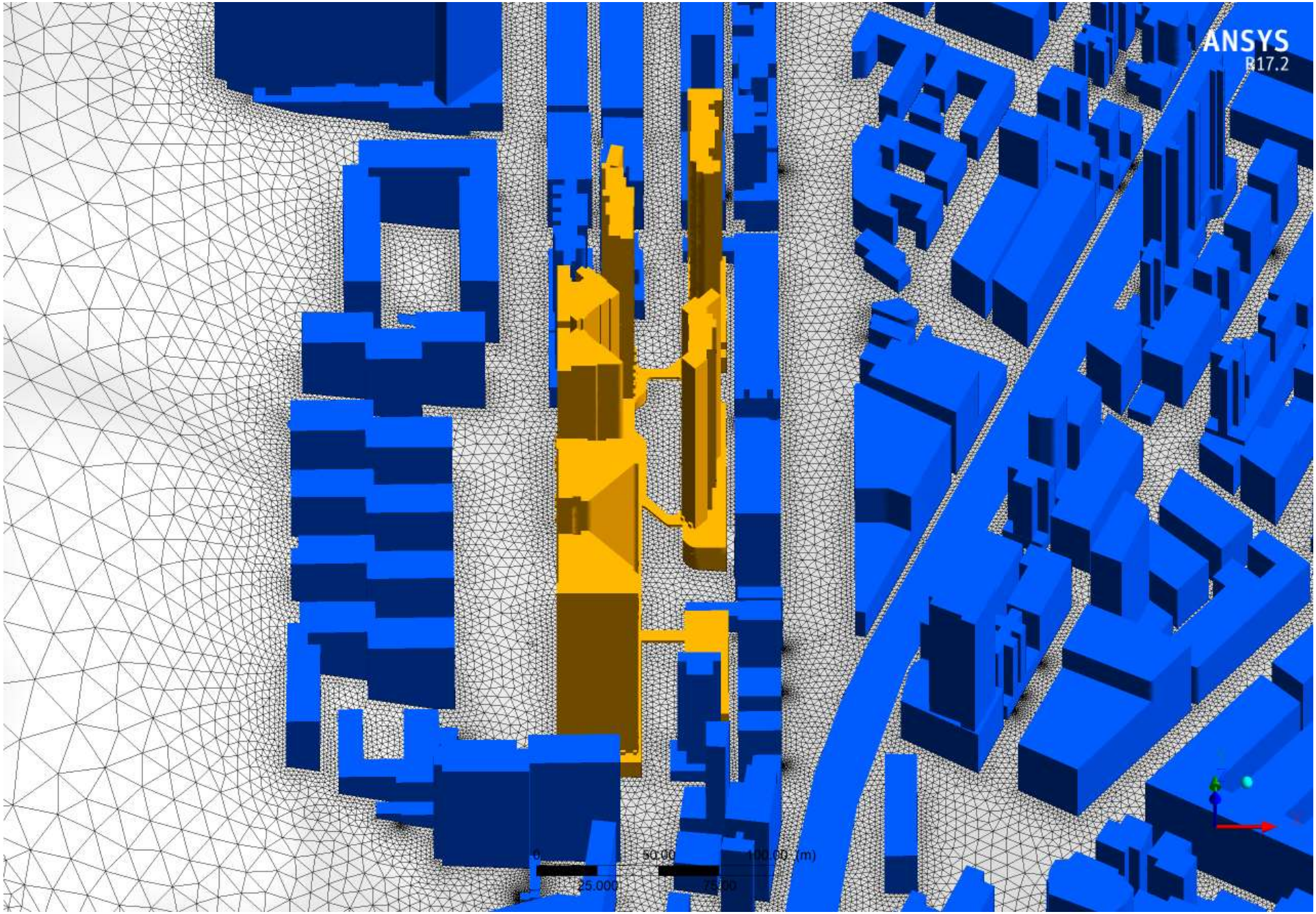
Baseline Scheme - W



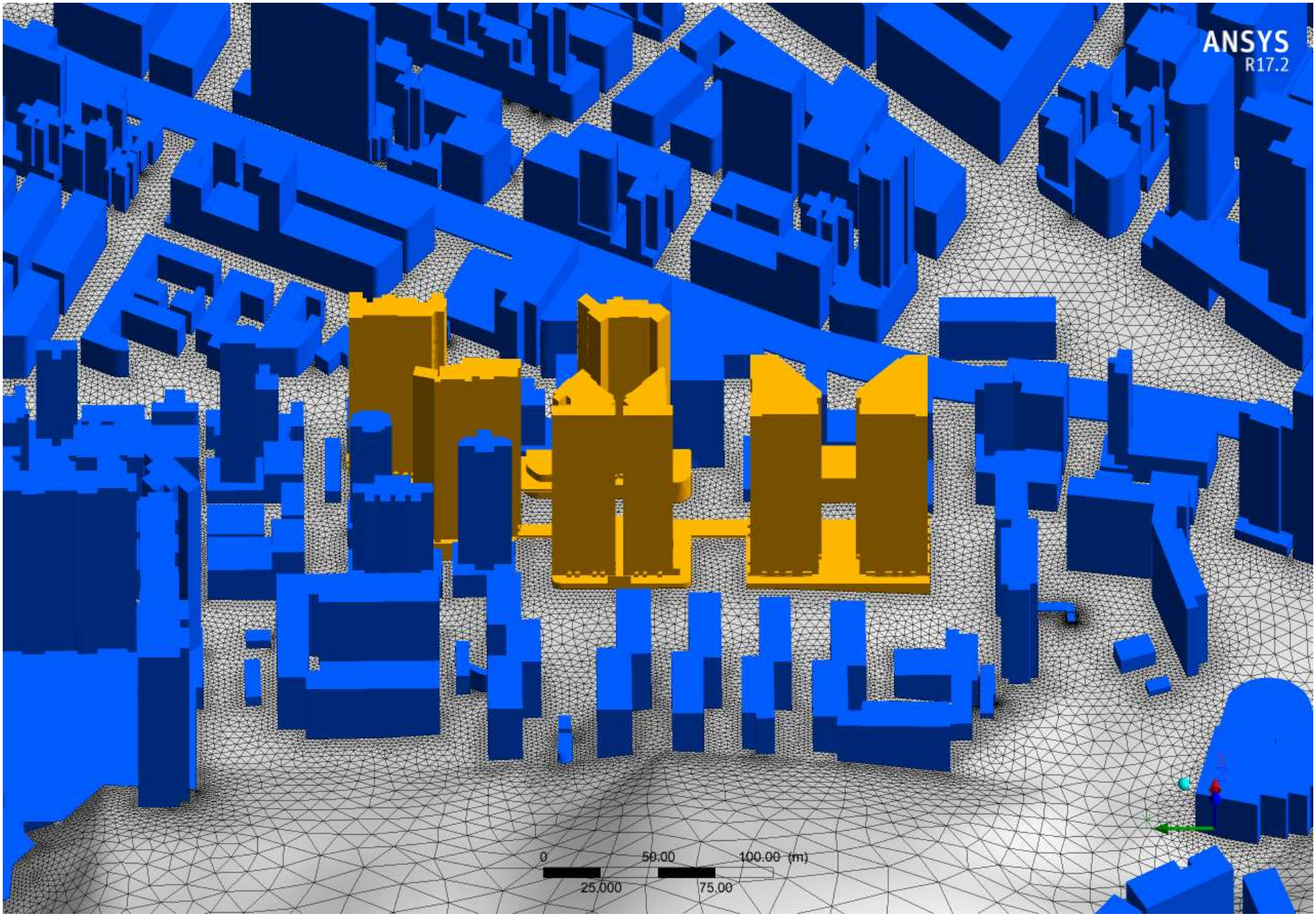
Proposed Scheme - N



Proposed Scheme - E



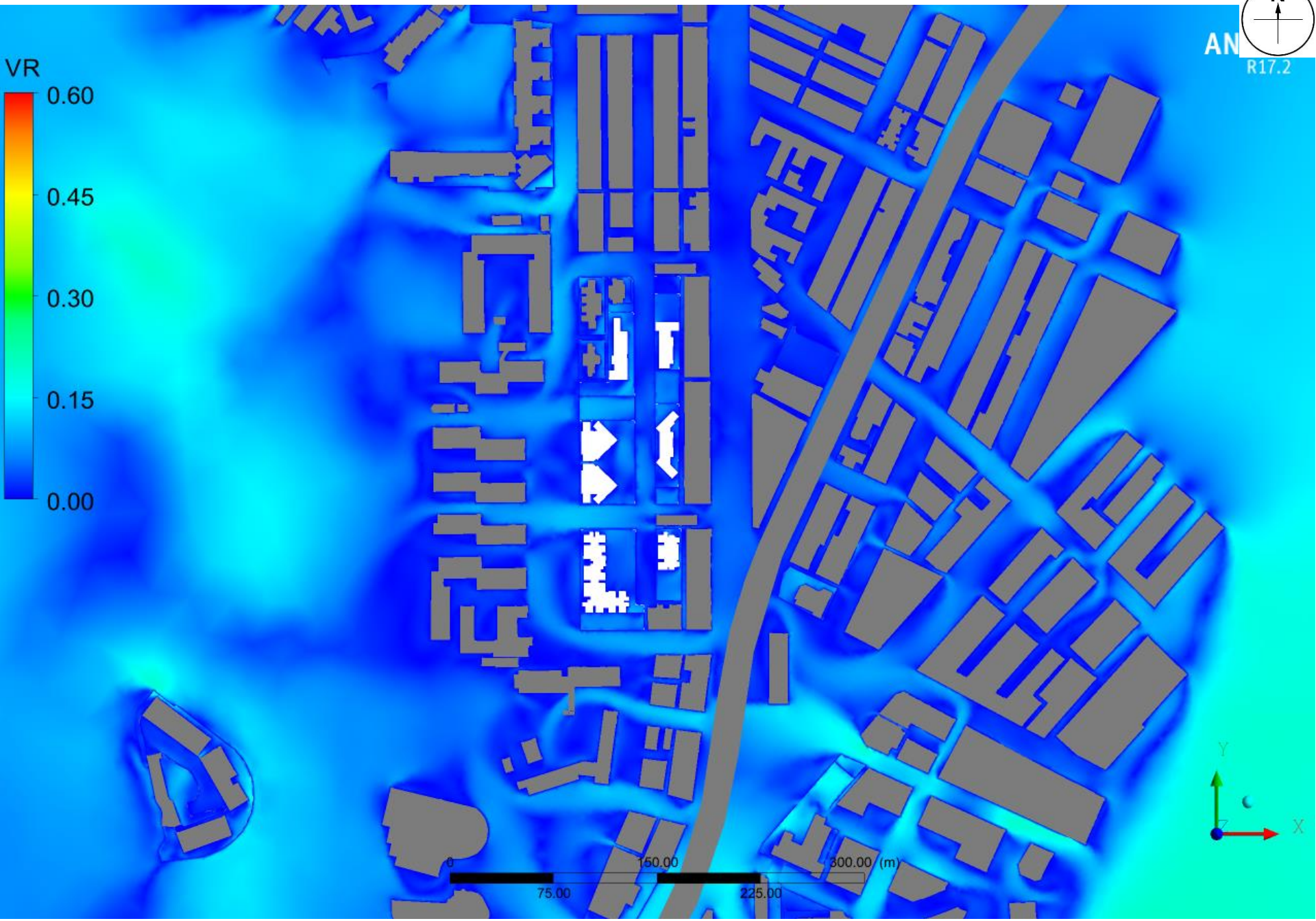
Proposed Scheme - S



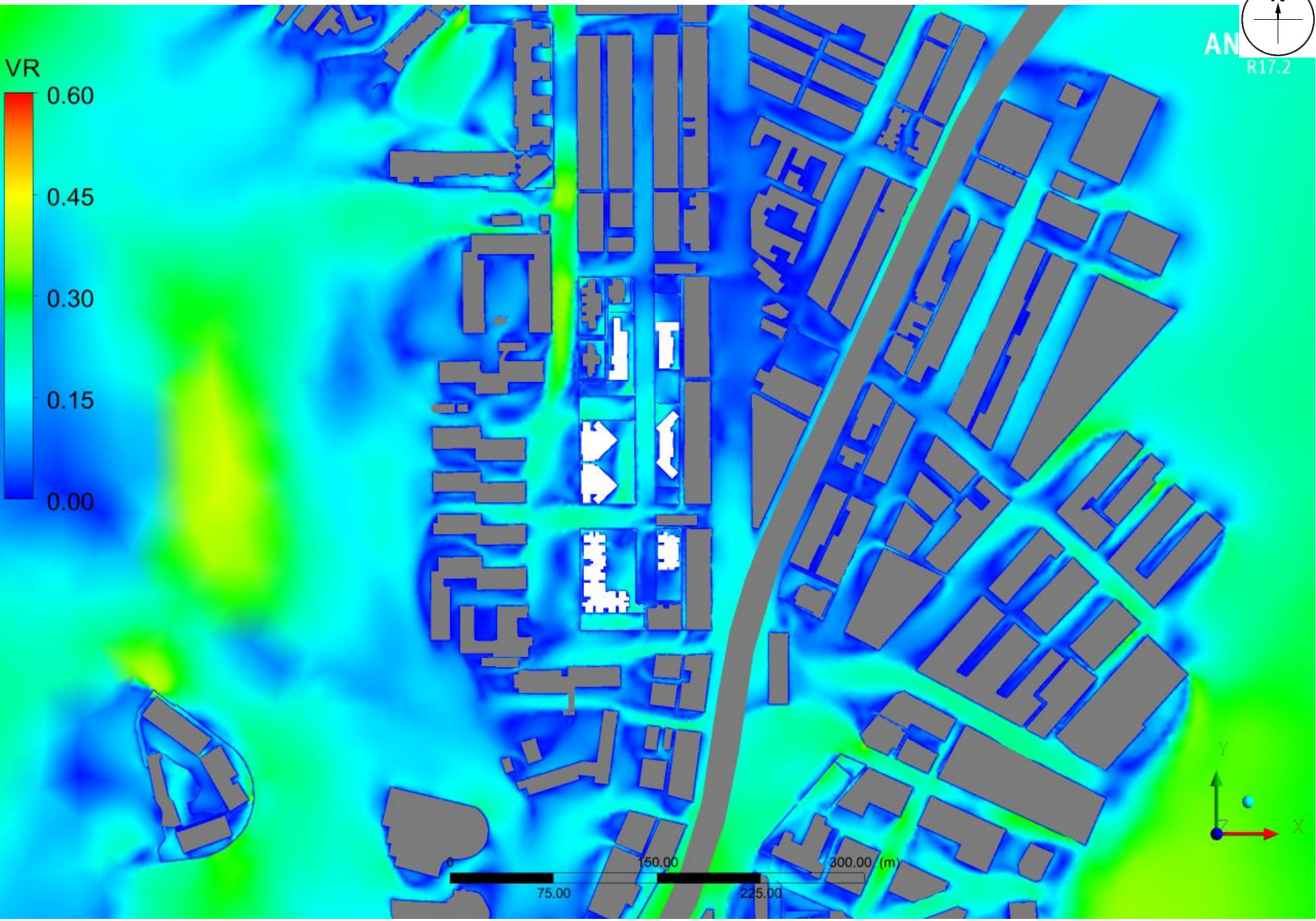
Proposed Scheme - W

Appendix 4

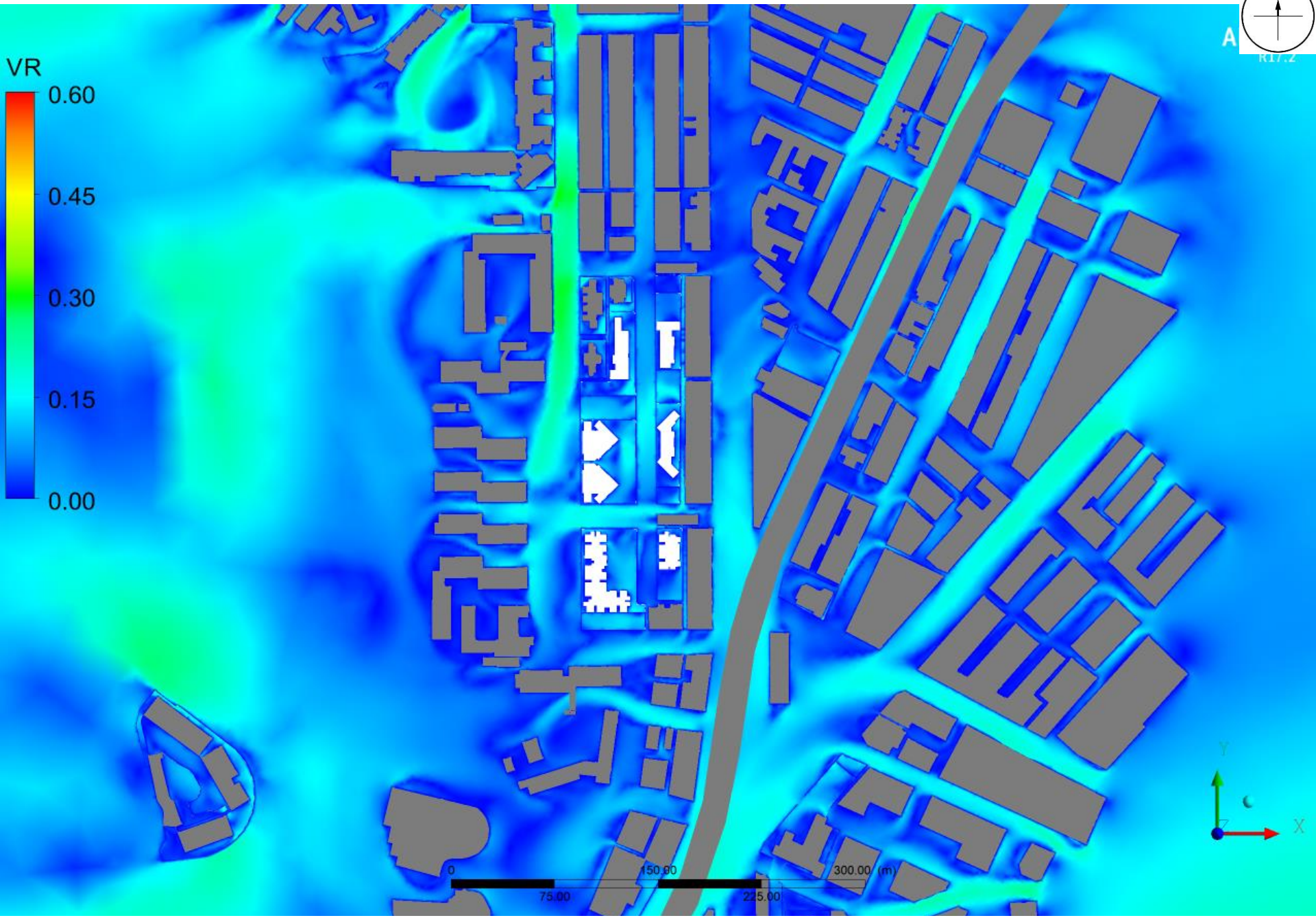
Contour and Vector Plot for CFD Simulation



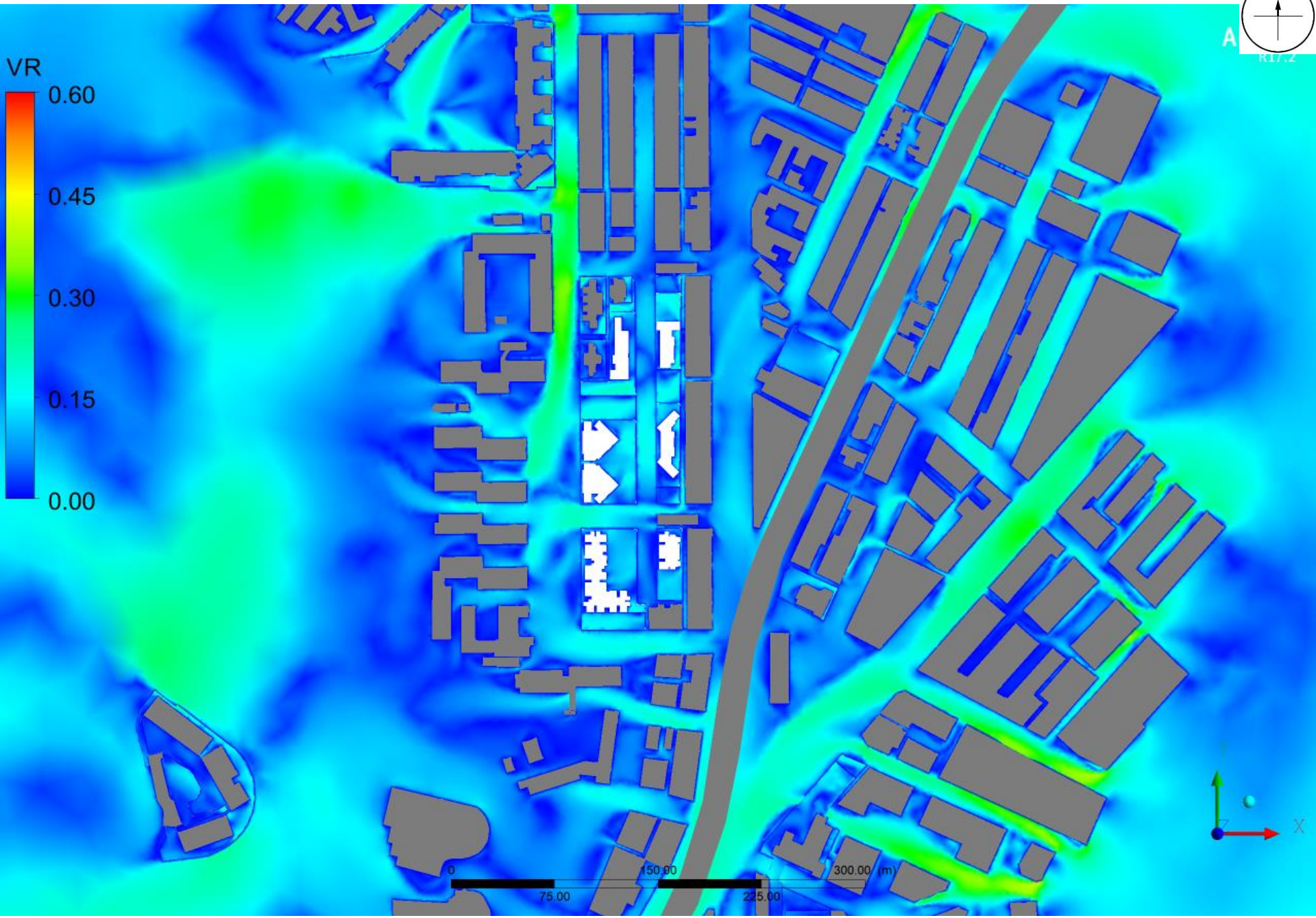
Baseline Scheme - Contour plot at pedestrian level under NNE Wind



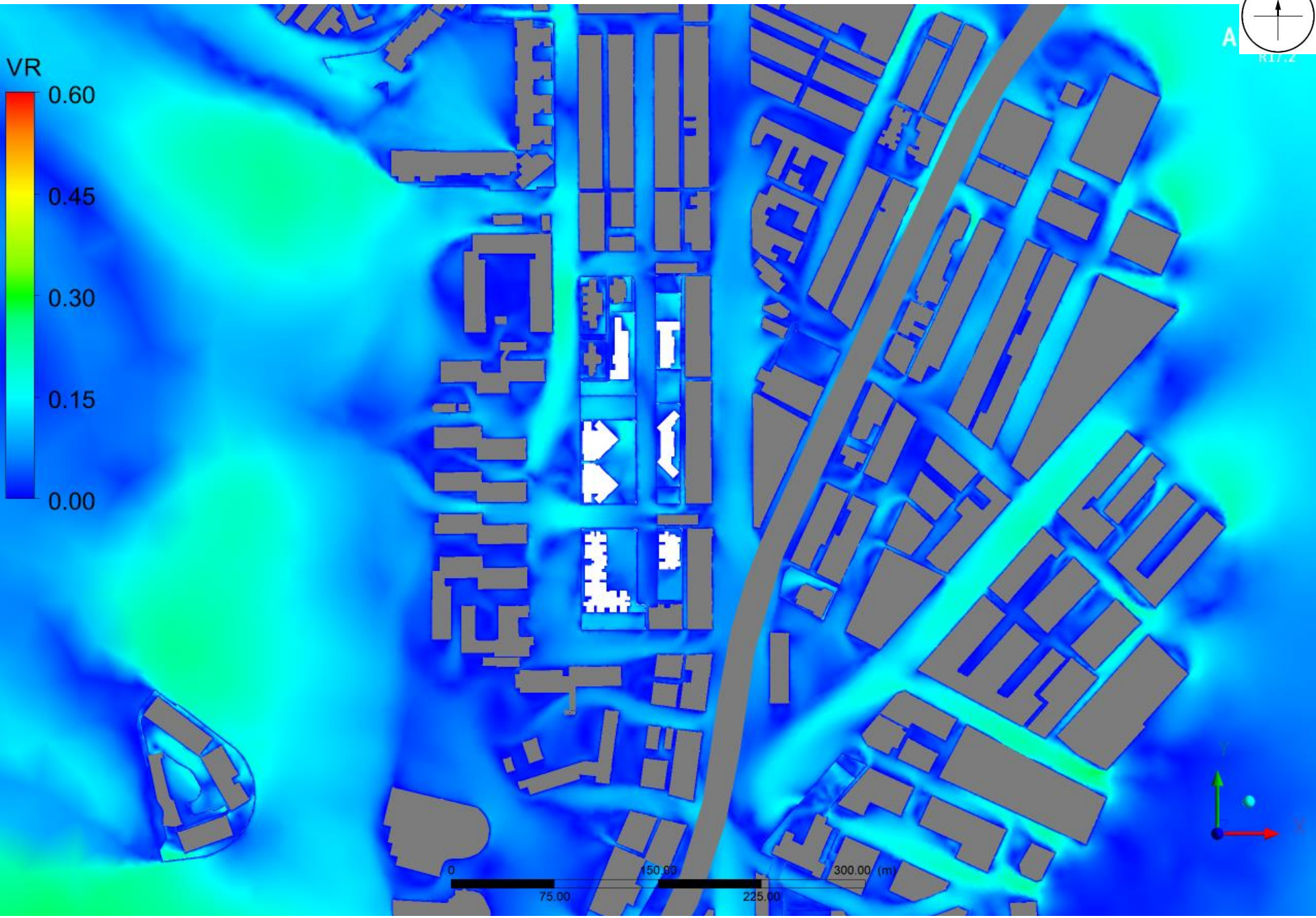
Baseline Scheme - Contour plot at pedestrian level under NE Wind



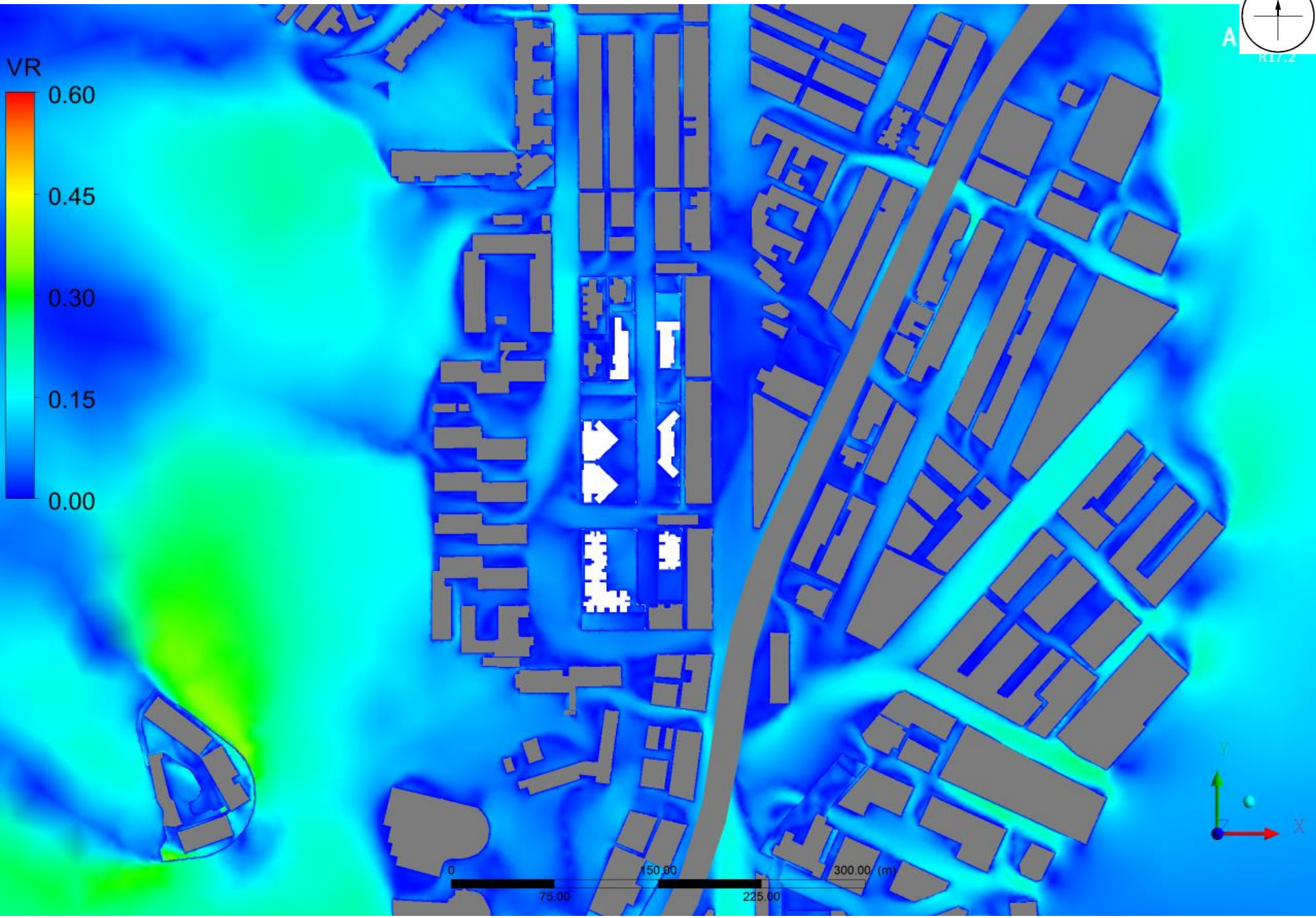
Baseline Scheme - Contour plot at pedestrian level under ENE Wind



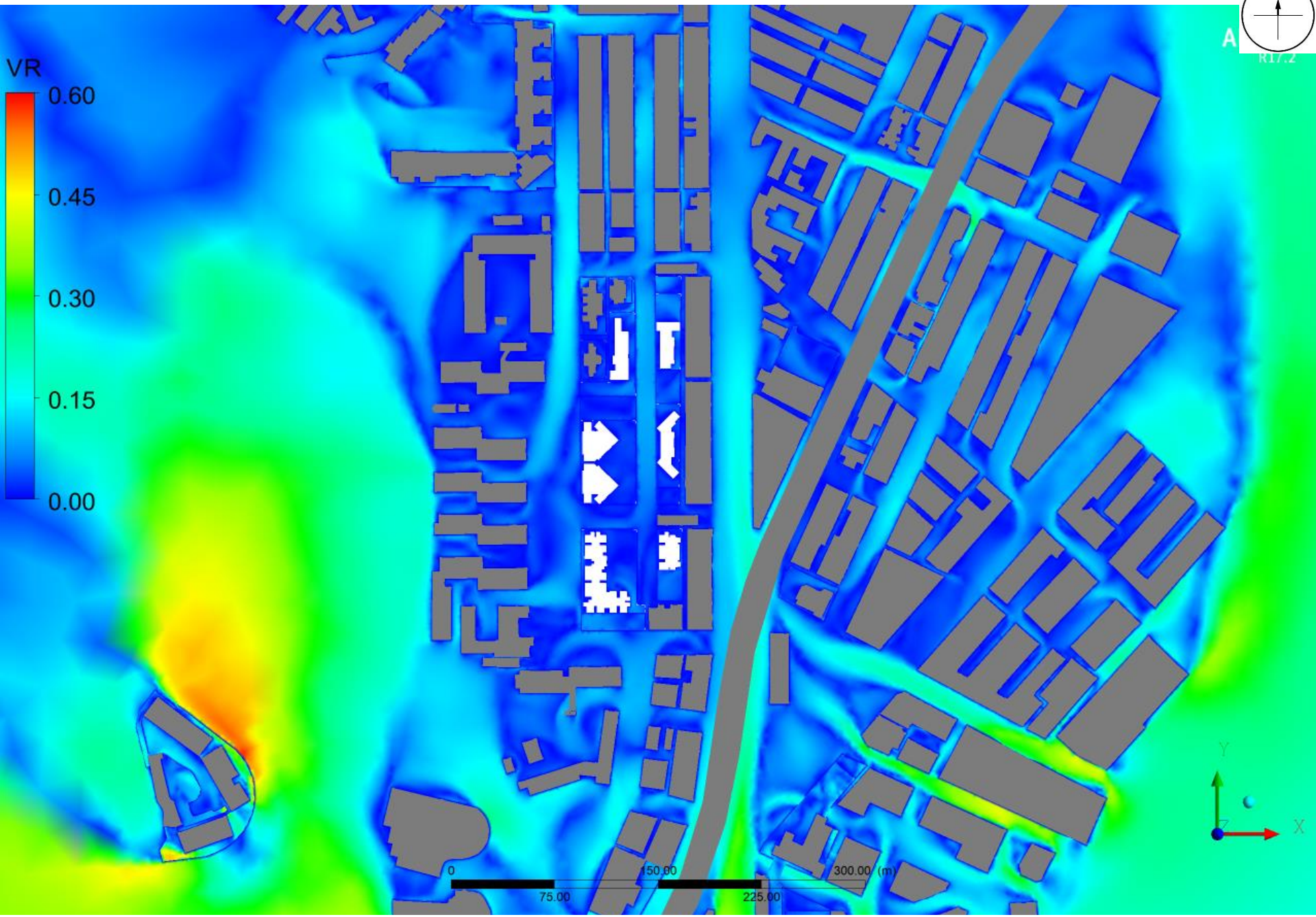
Baseline Scheme - Contour plot at pedestrian level under E Wind



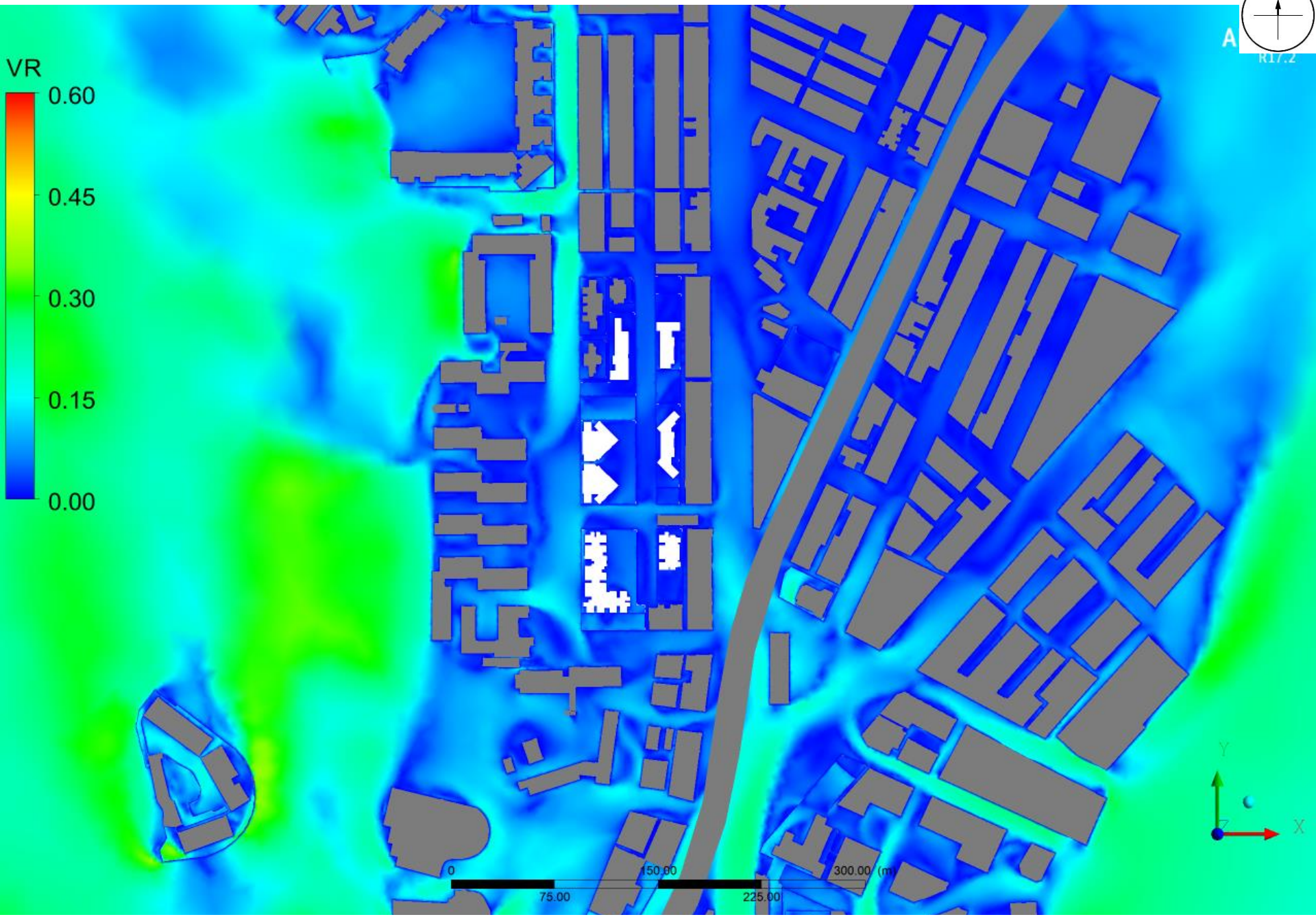
Baseline Scheme - Contour plot at pedestrian level under ESE Wind



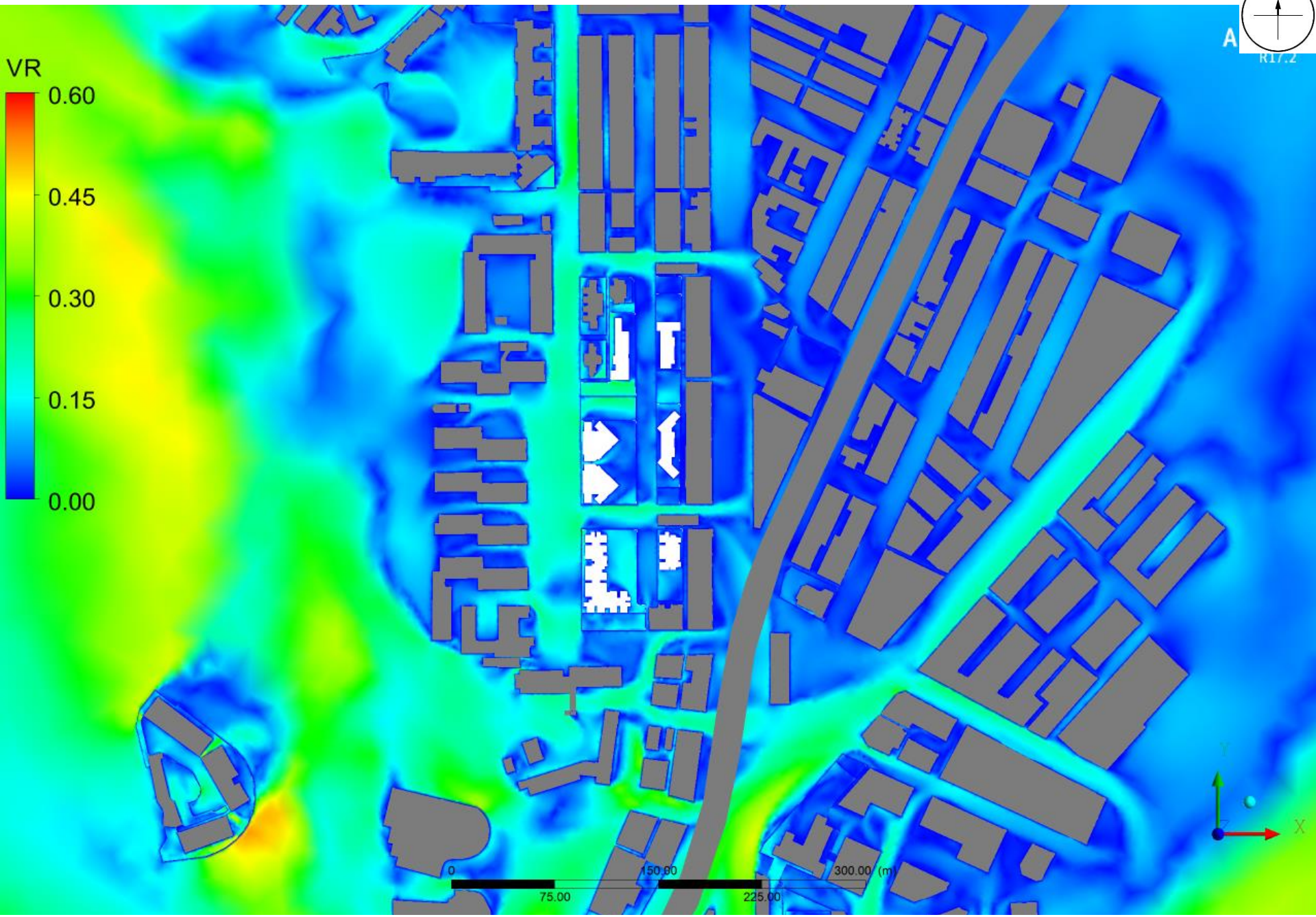
Baseline Scheme - Contour plot at pedestrian level under SE Wind



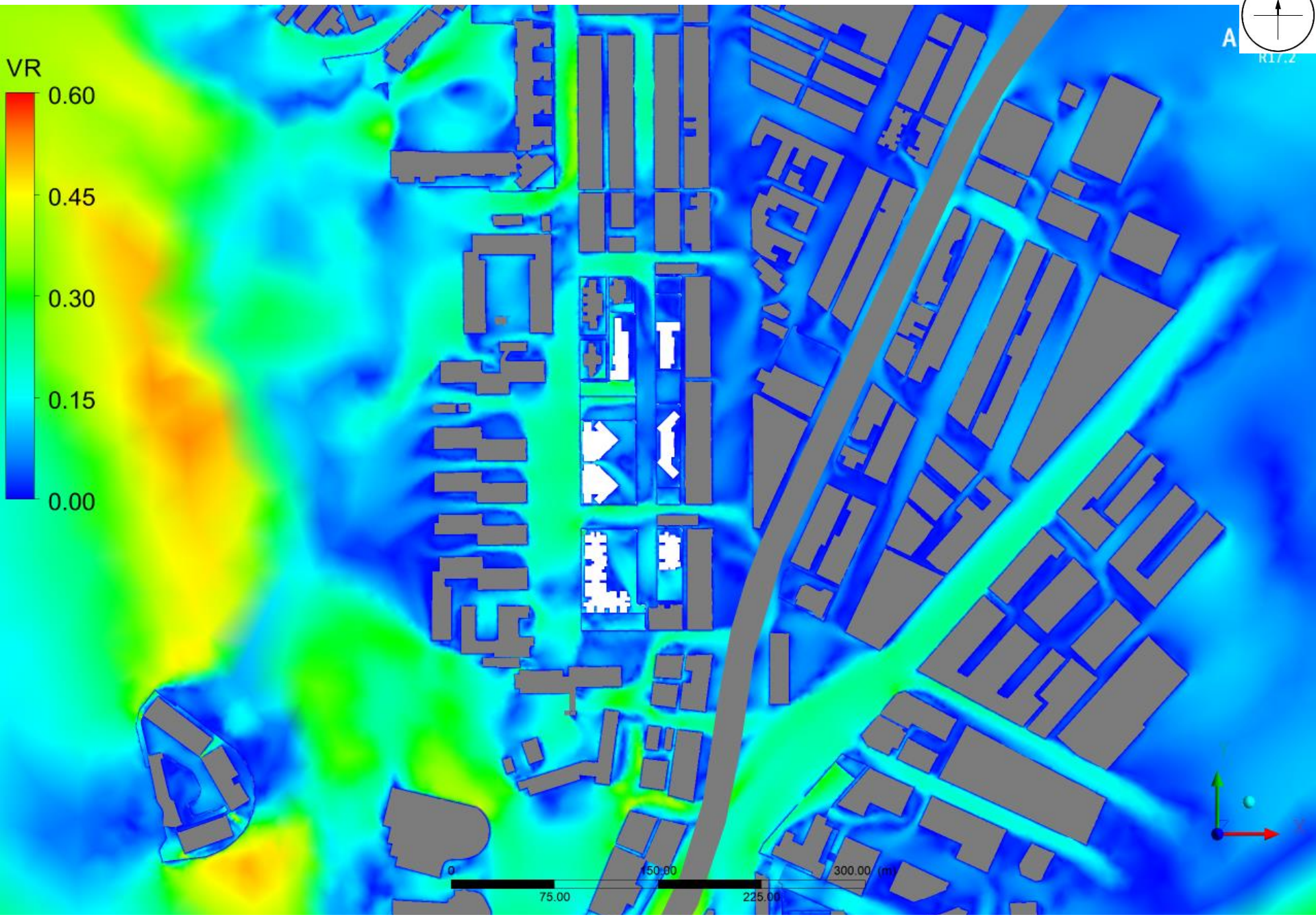
Baseline Scheme - Contour plot at pedestrian level under SSE Wind



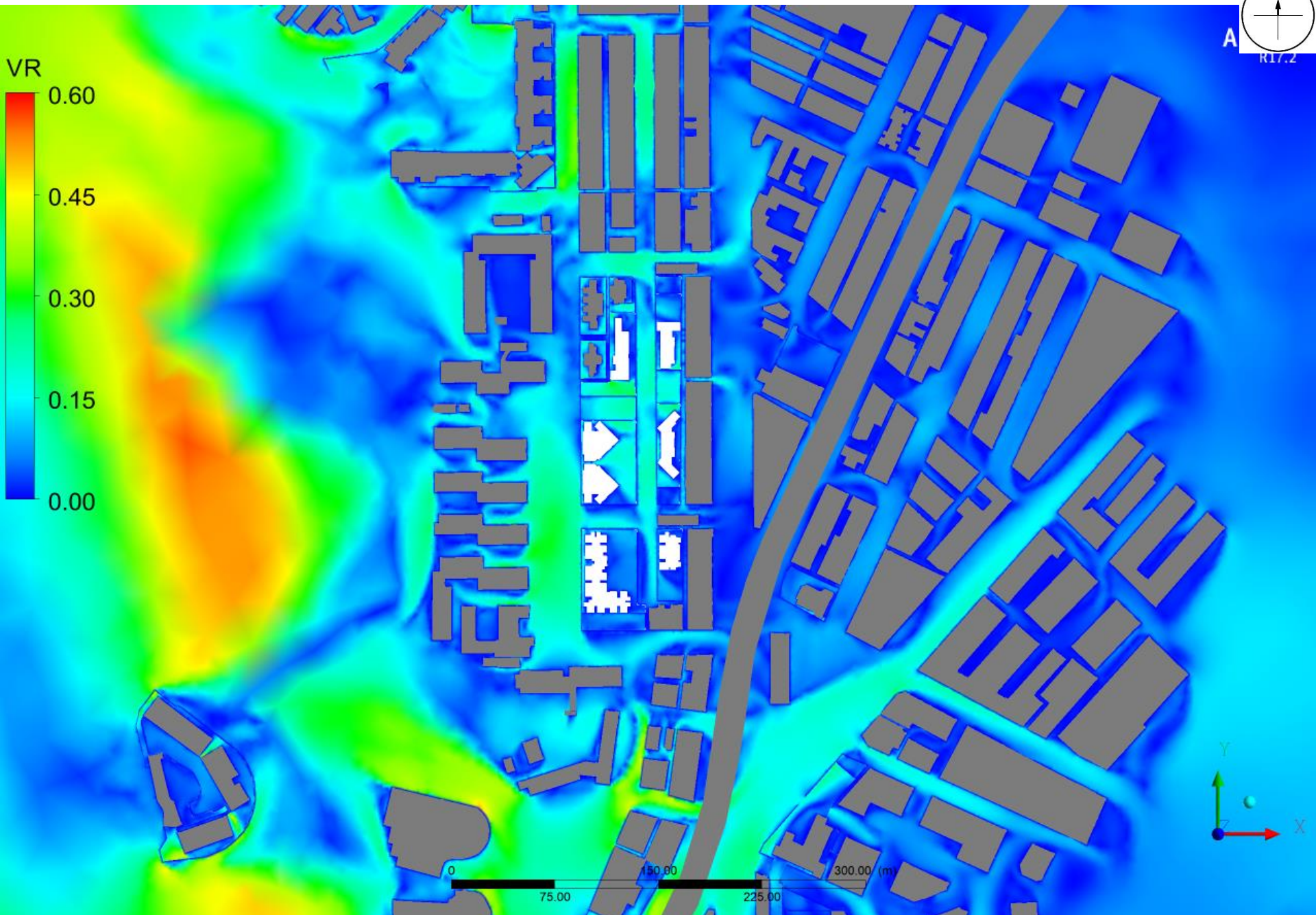
Baseline Scheme - Contour plot at pedestrian level under S Wind



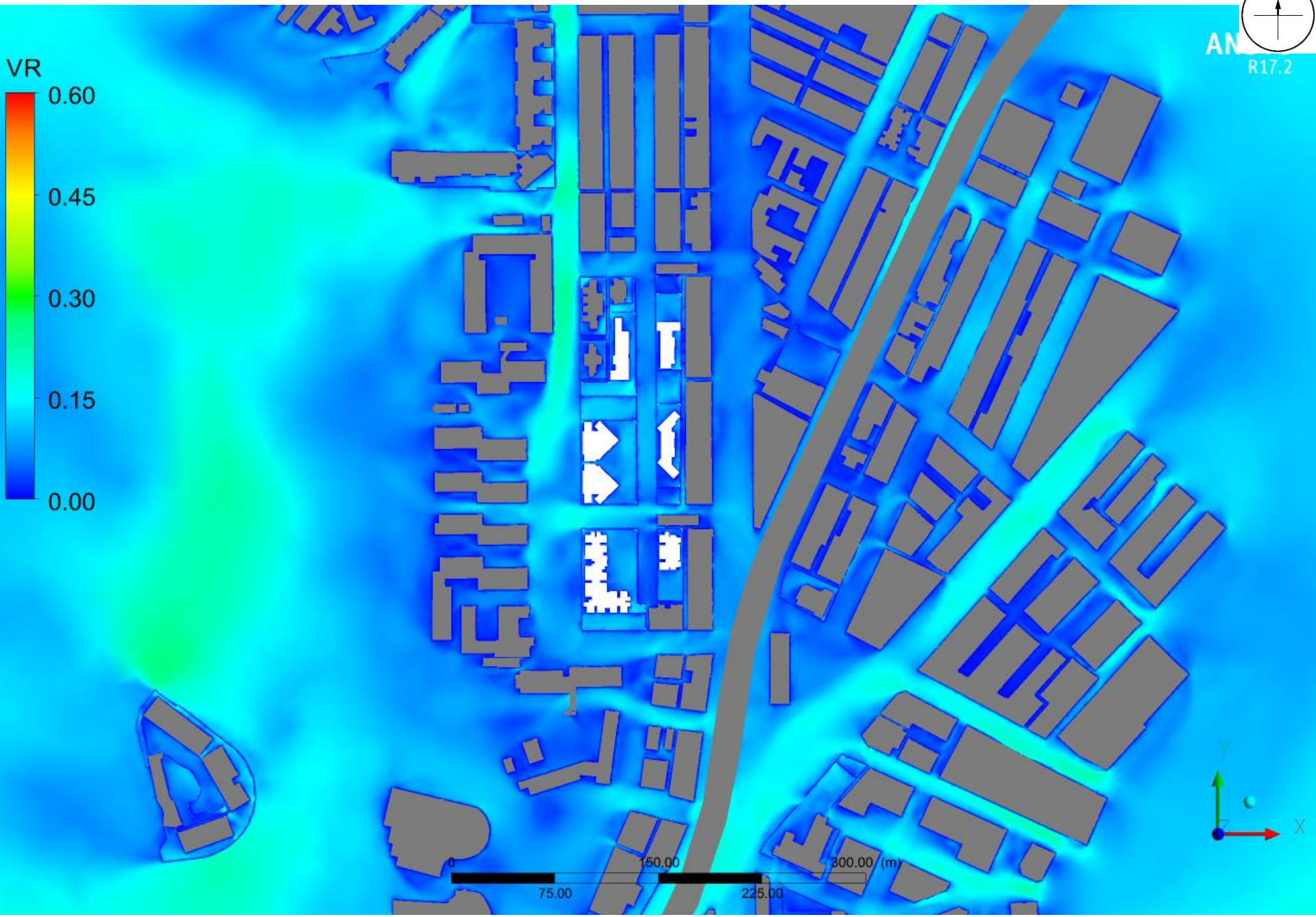
Baseline Scheme - Contour plot at pedestrian level under SSW Wind



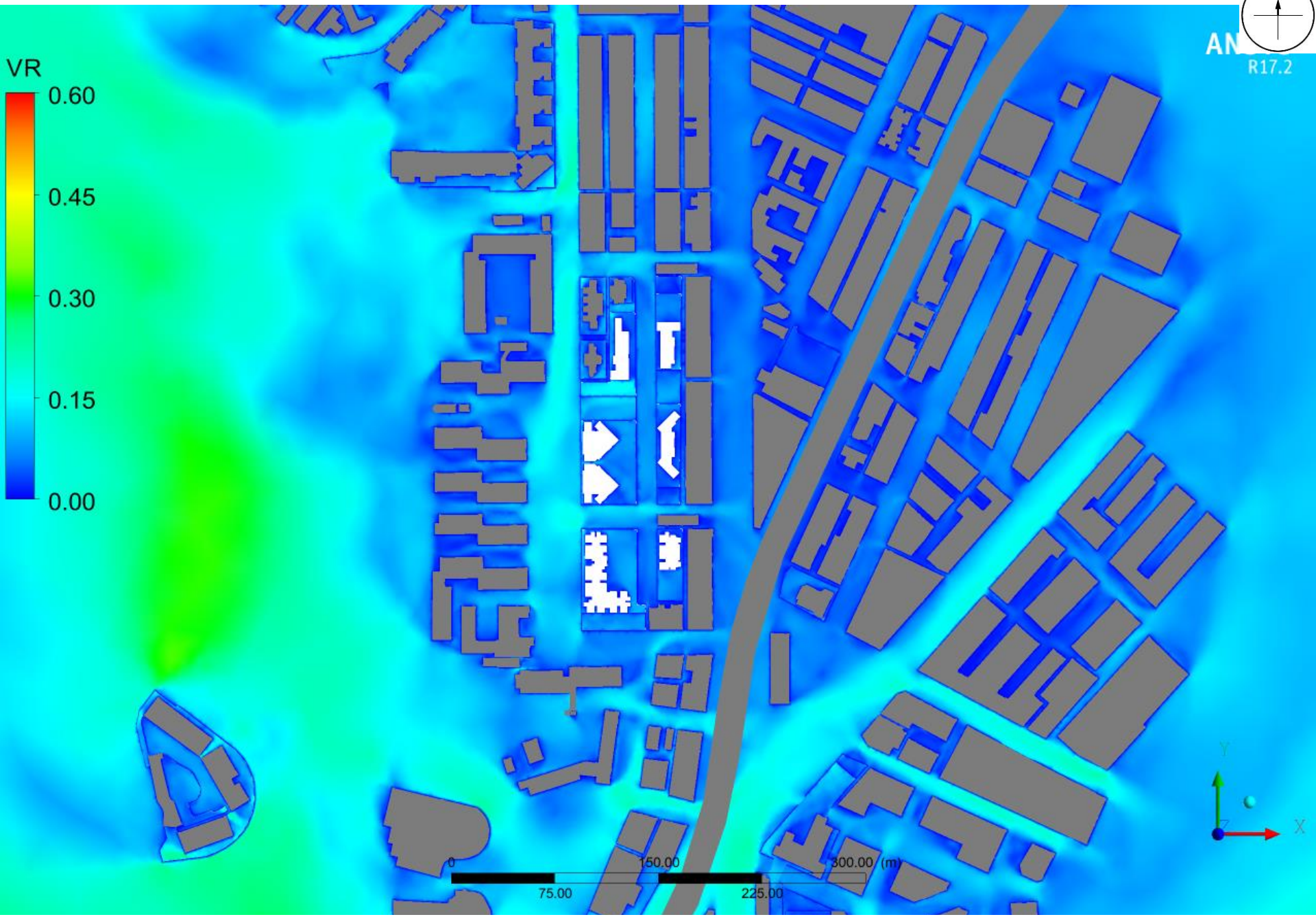
Baseline Scheme - Contour plot at pedestrian level under SW Wind



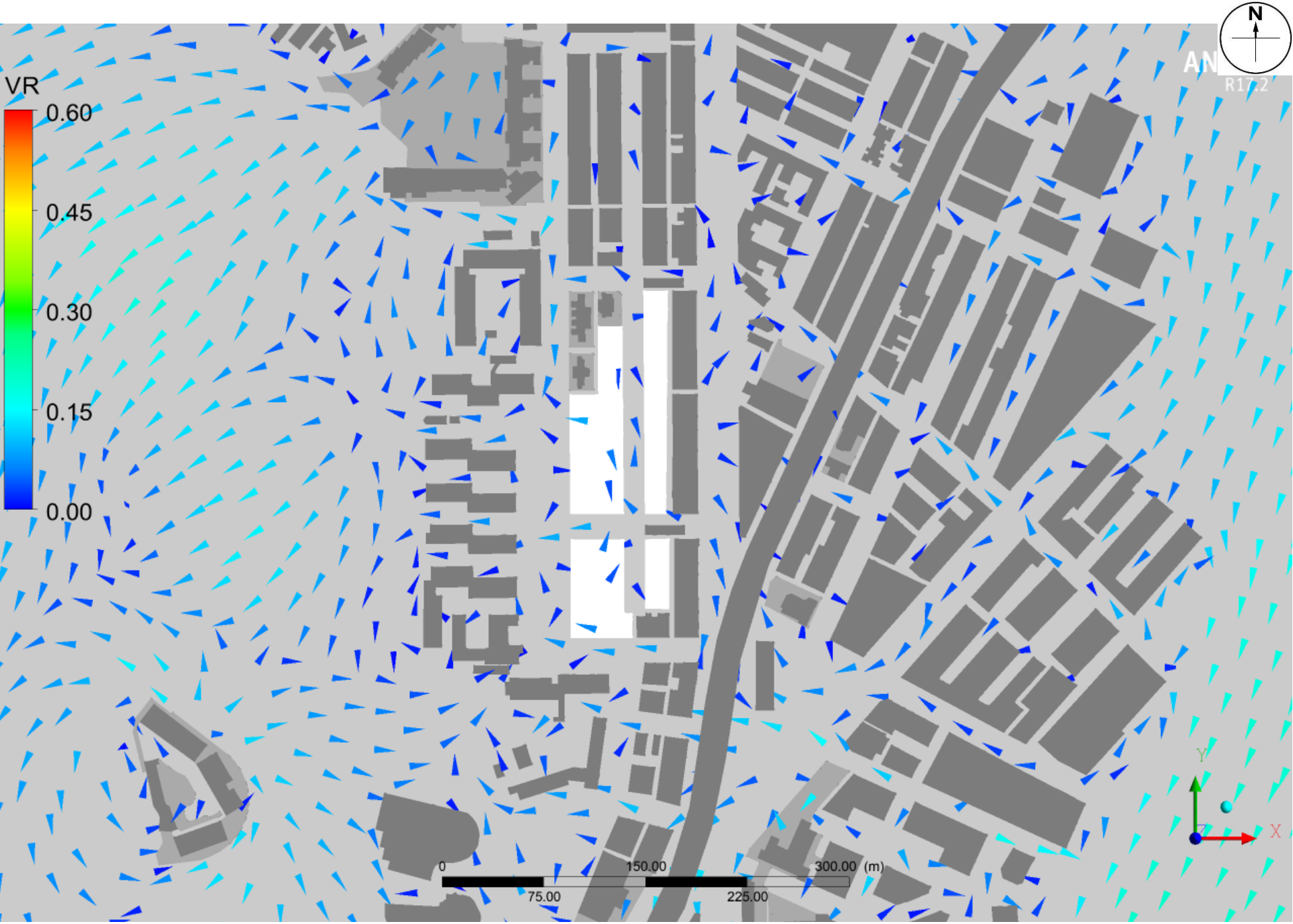
Baseline Scheme - Contour plot at pedestrian level under WSW Wind



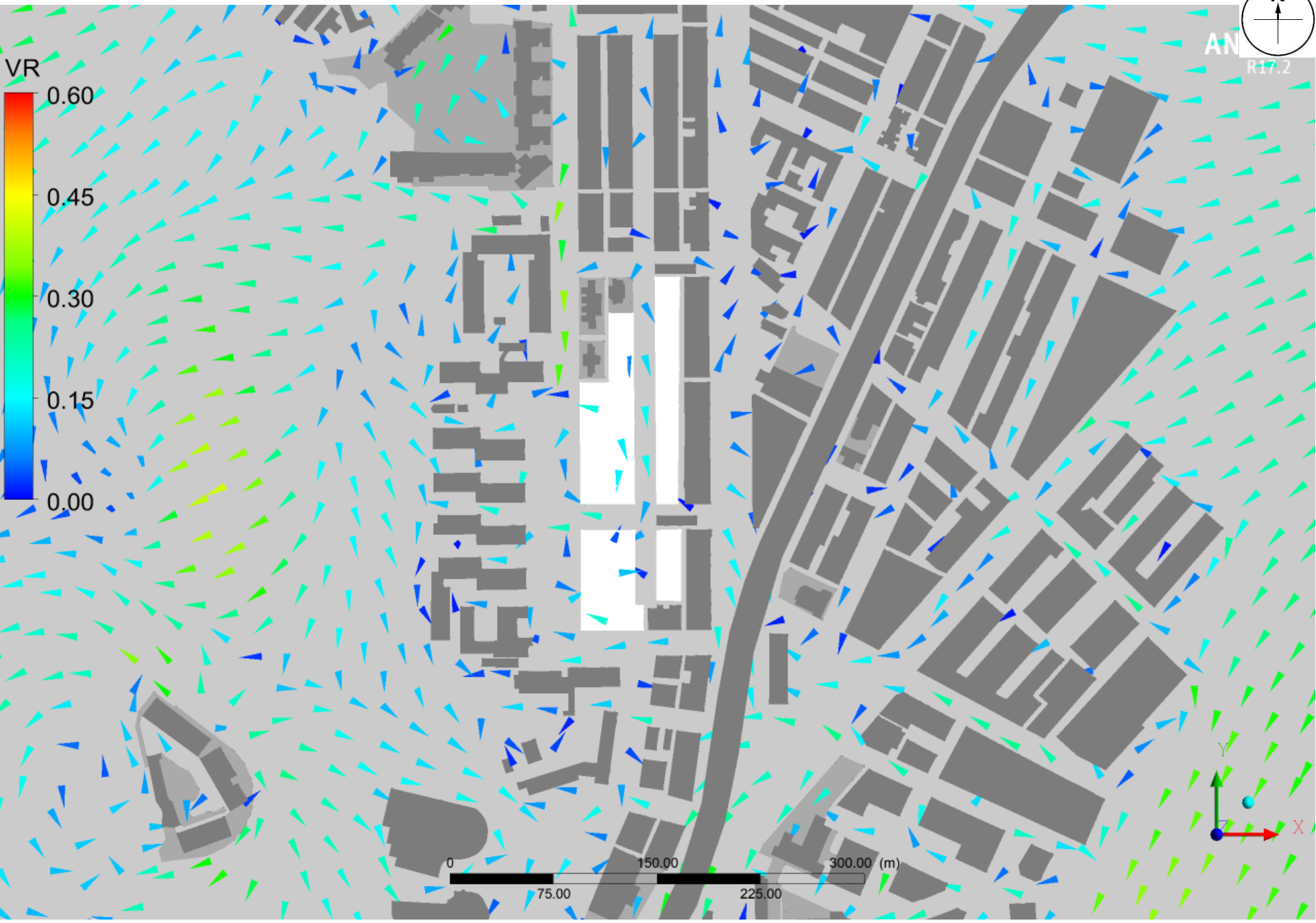
Baseline Scheme - Annual weighted wind speed colour at pedestrian level



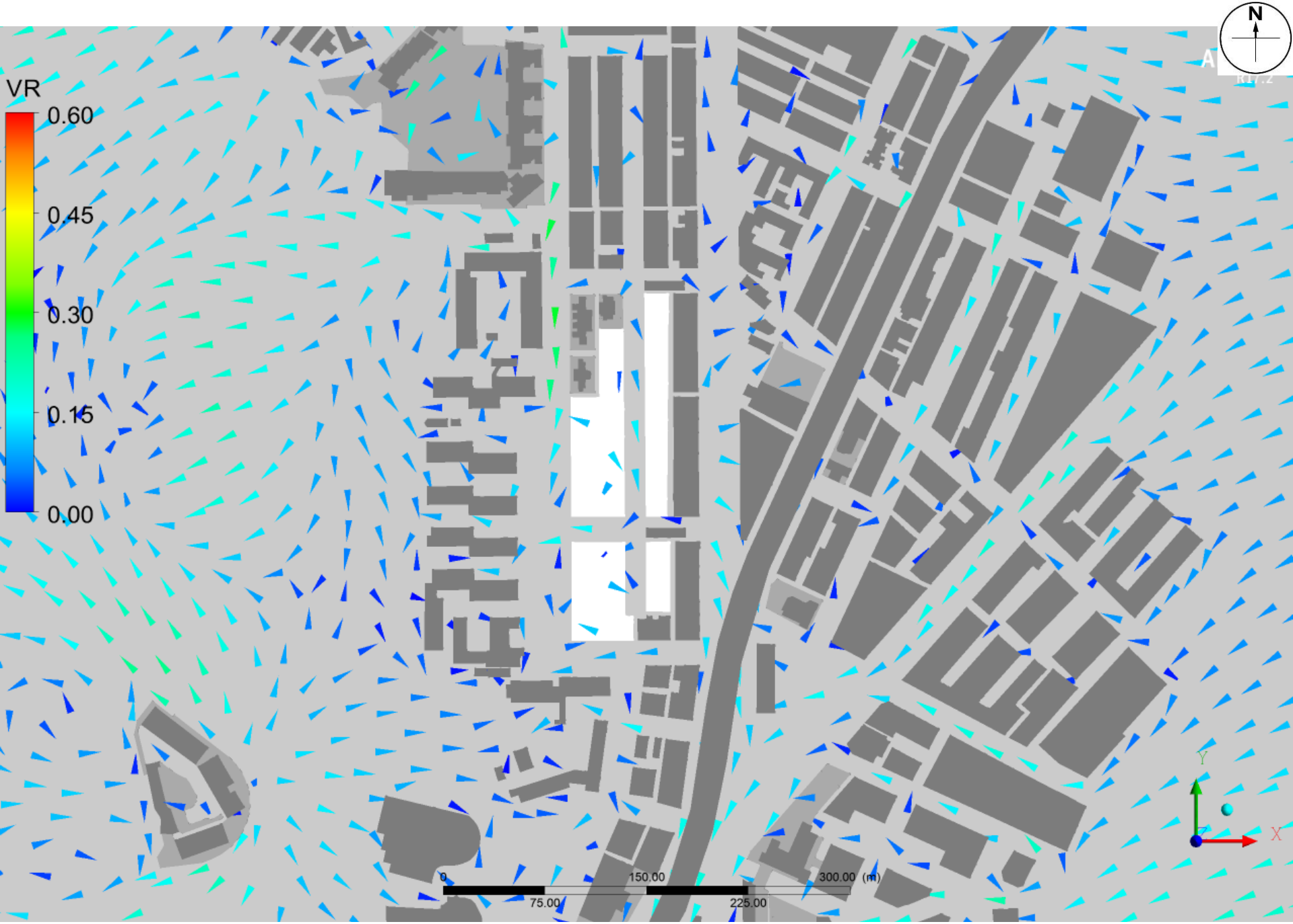
Baseline Scheme - Summer weighted wind speed colour at pedestrian level



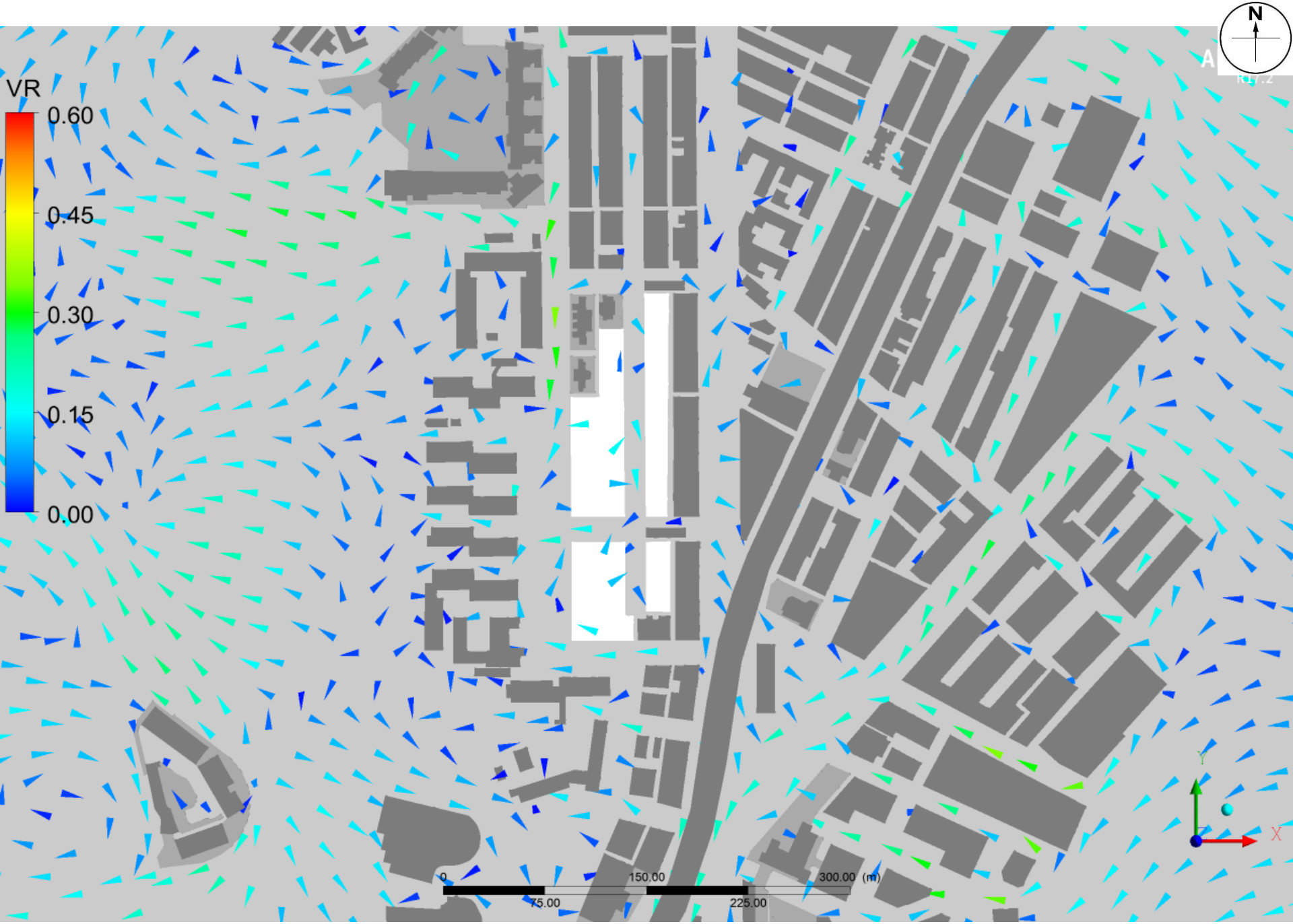
Baseline Scheme - Vector plot at pedestrian level under NNE Wind



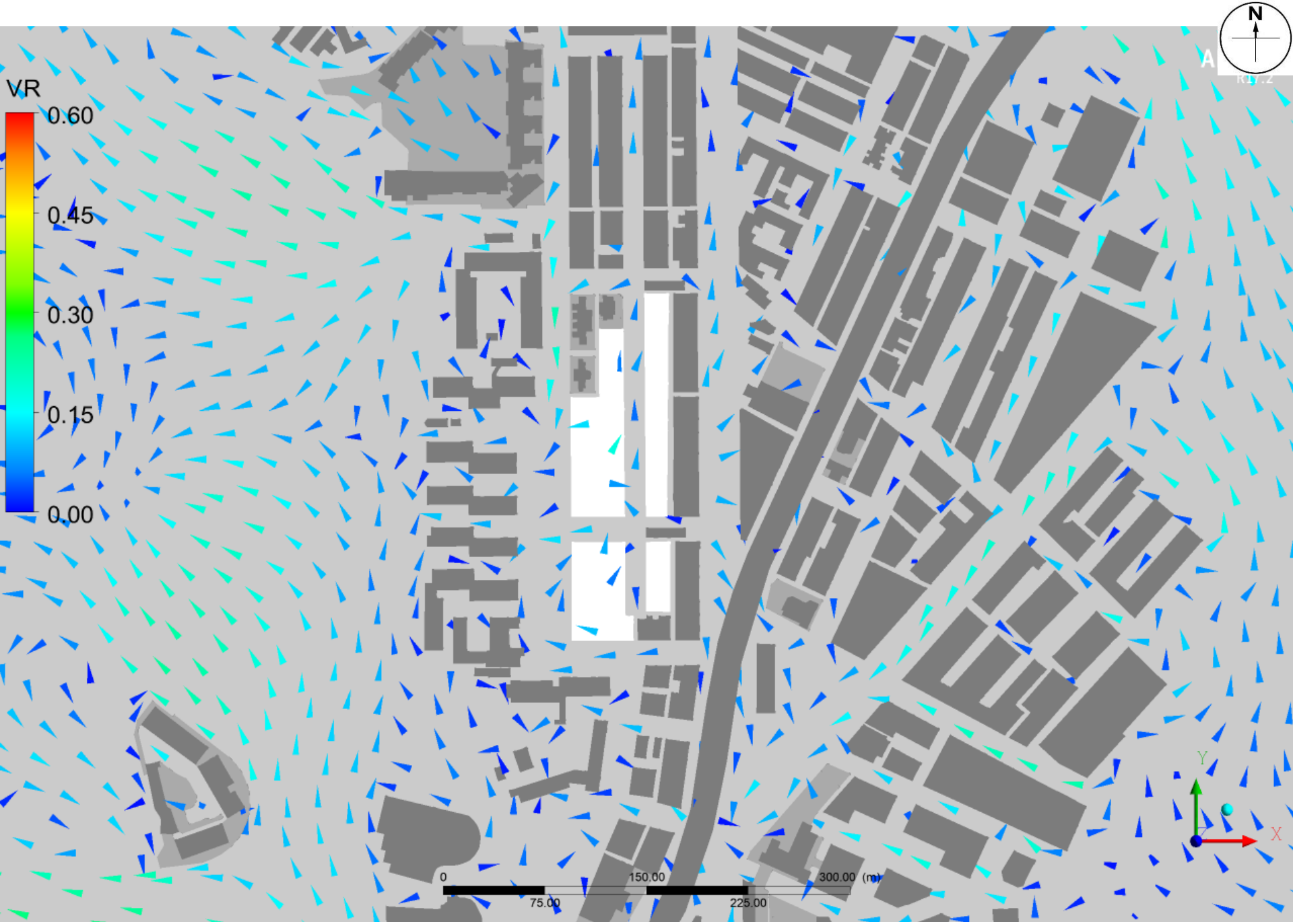
Baseline Scheme - Vector plot at pedestrian level under NE Wind



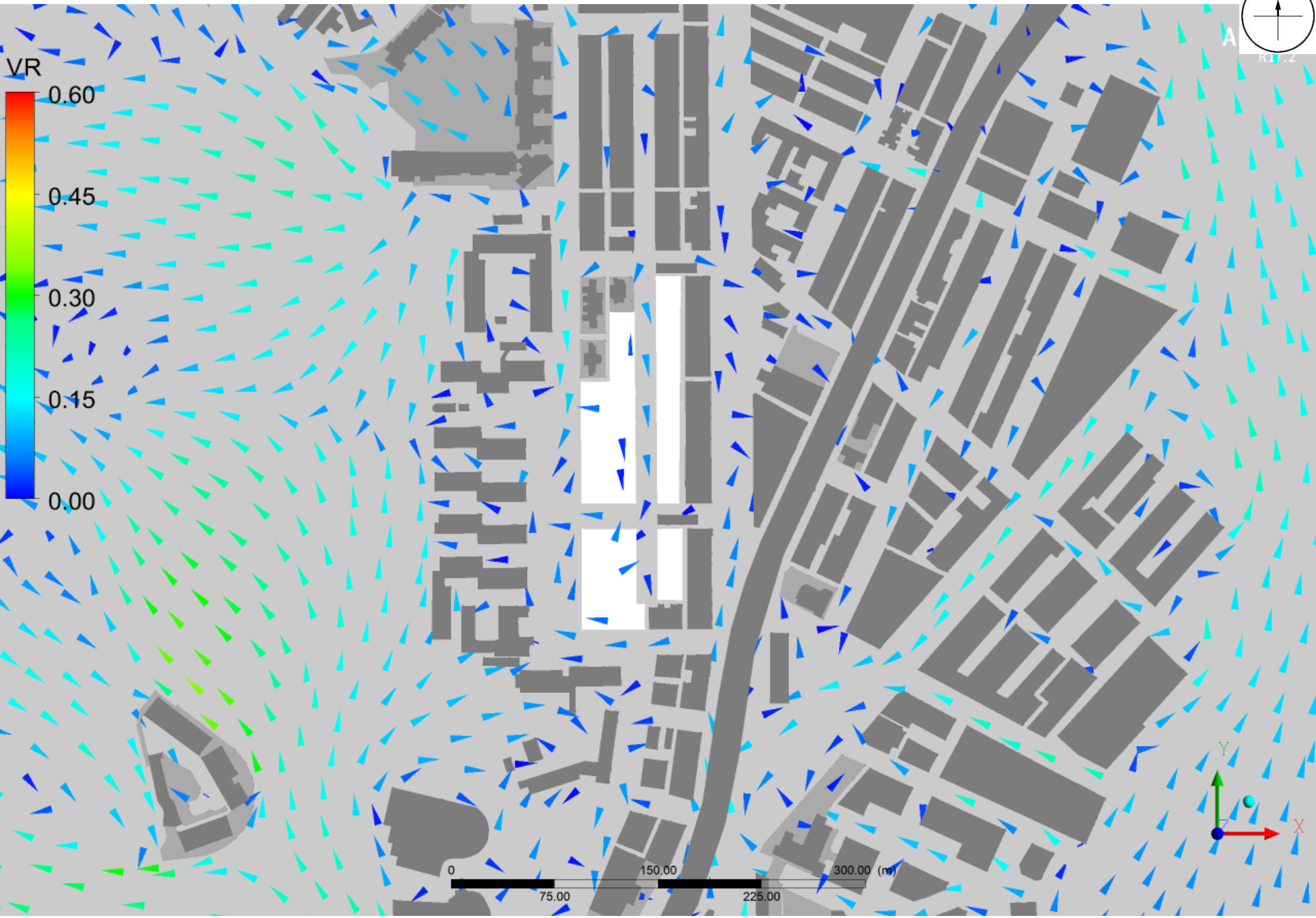
Baseline Scheme - Vector plot at pedestrian level under ENE Wind



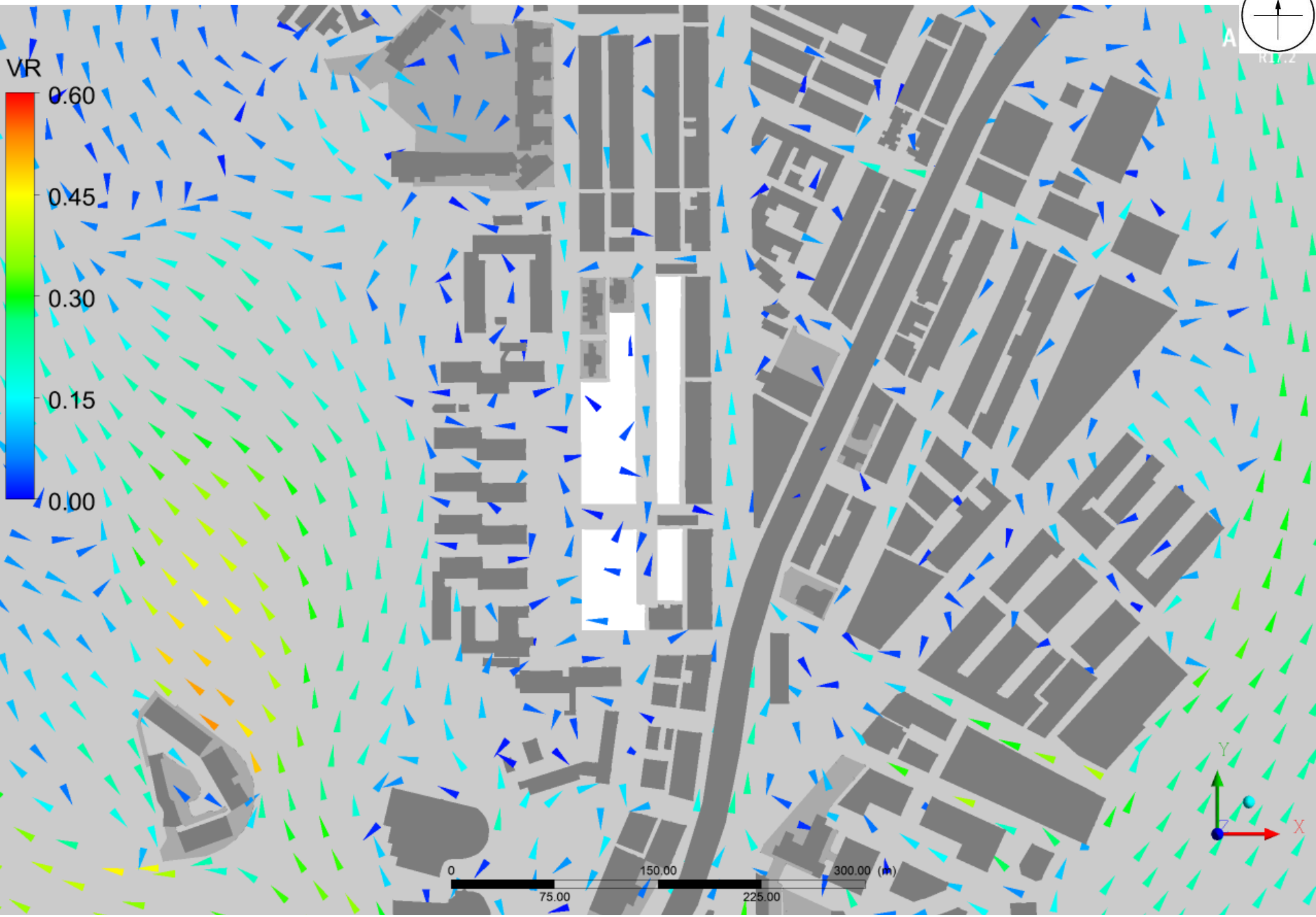
Baseline Scheme - Vector plot at pedestrian level under E Wind



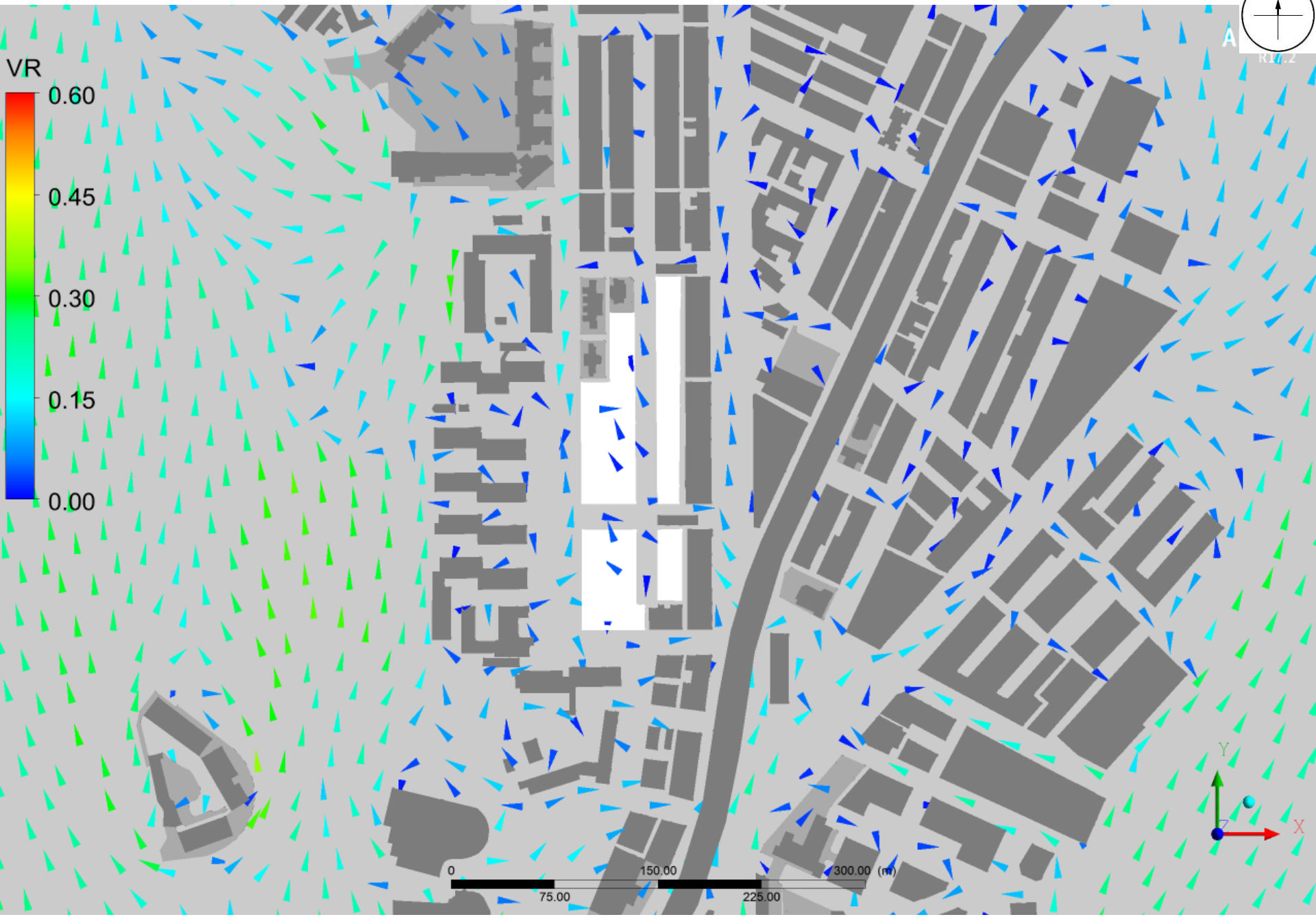
Baseline Scheme - Vector plot at pedestrian level under ESE Wind



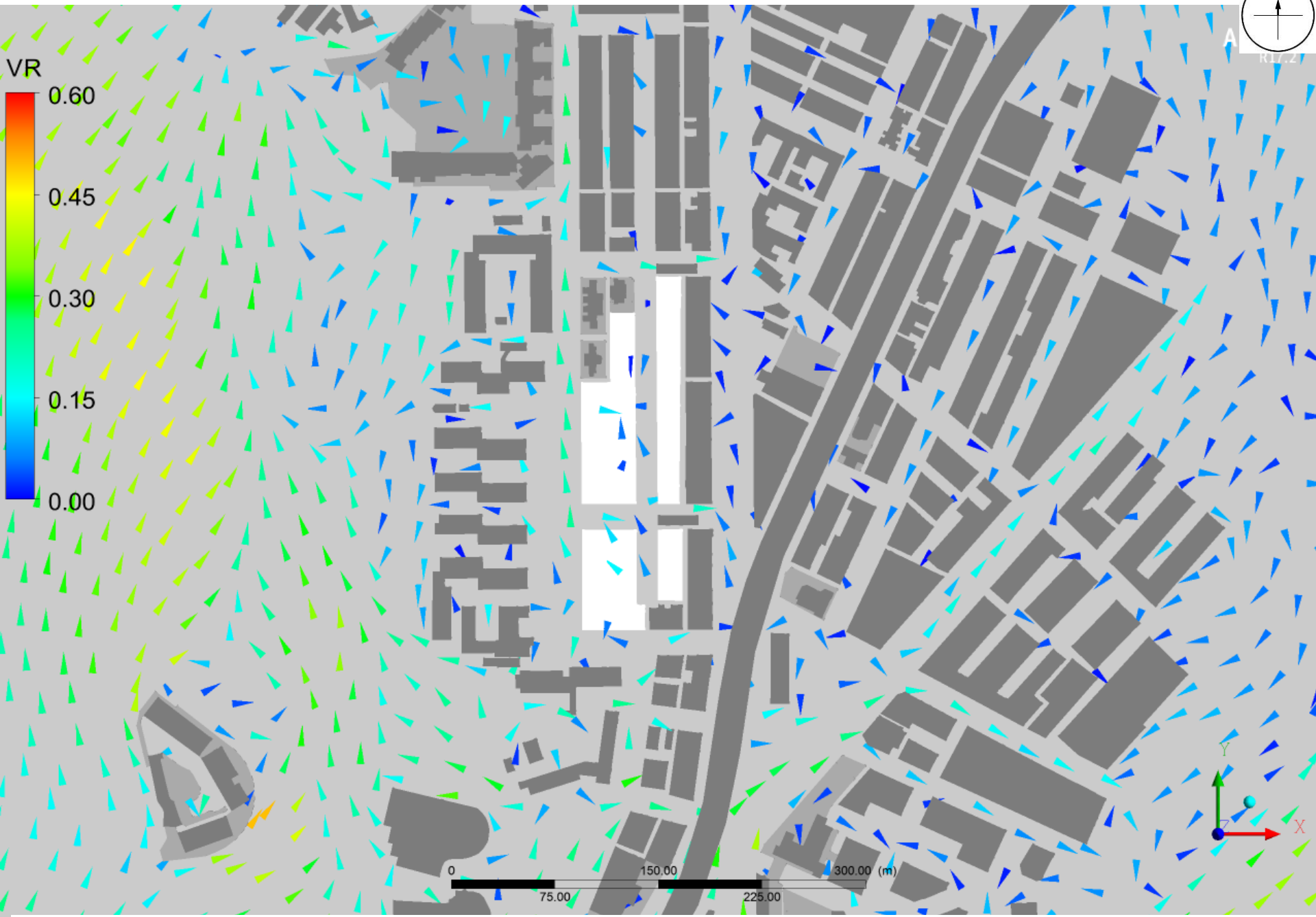
Baseline Scheme - Vector plot at pedestrian level under SE Wind



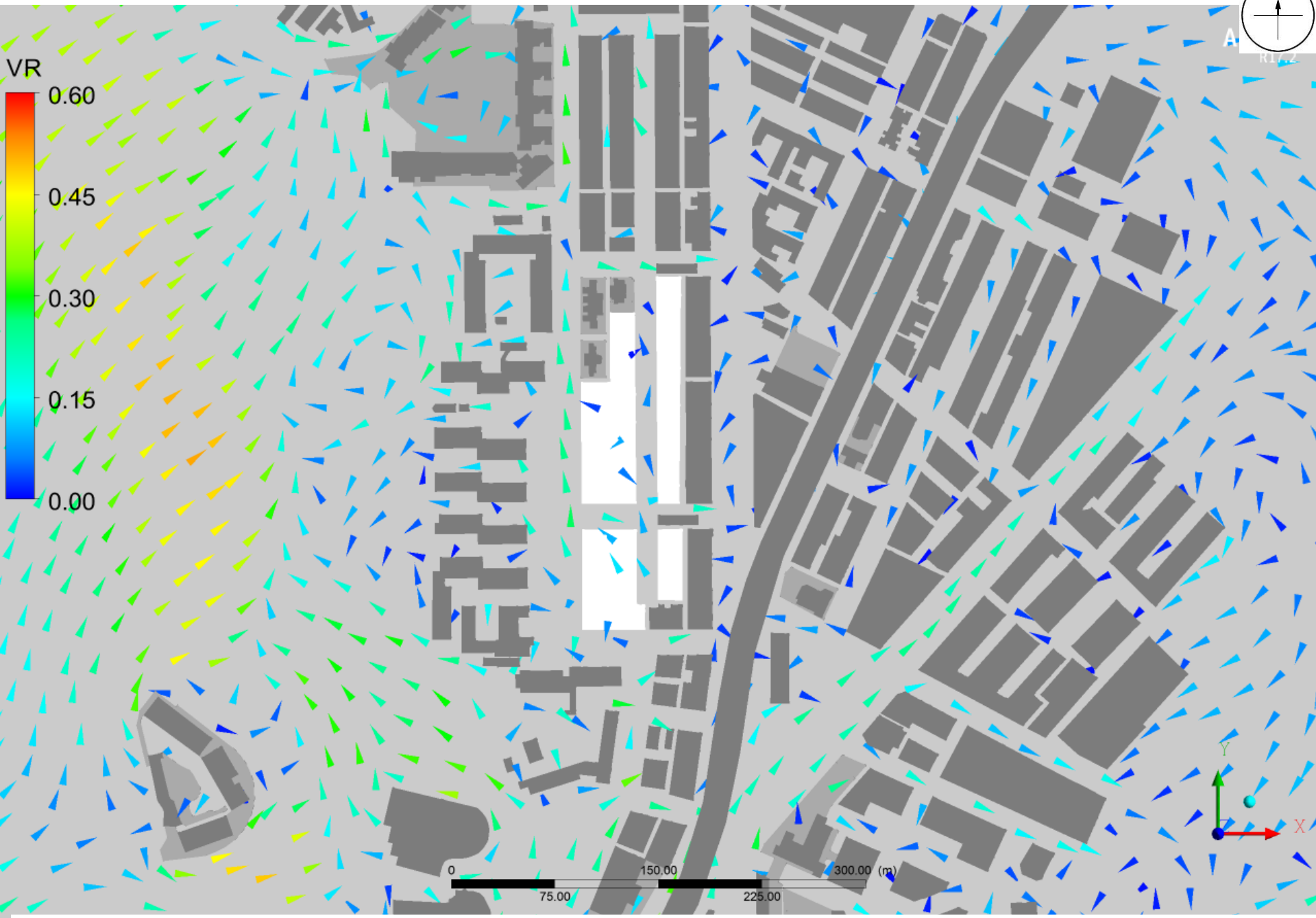
Baseline Scheme - Vector plot at pedestrian level under SSE Wind



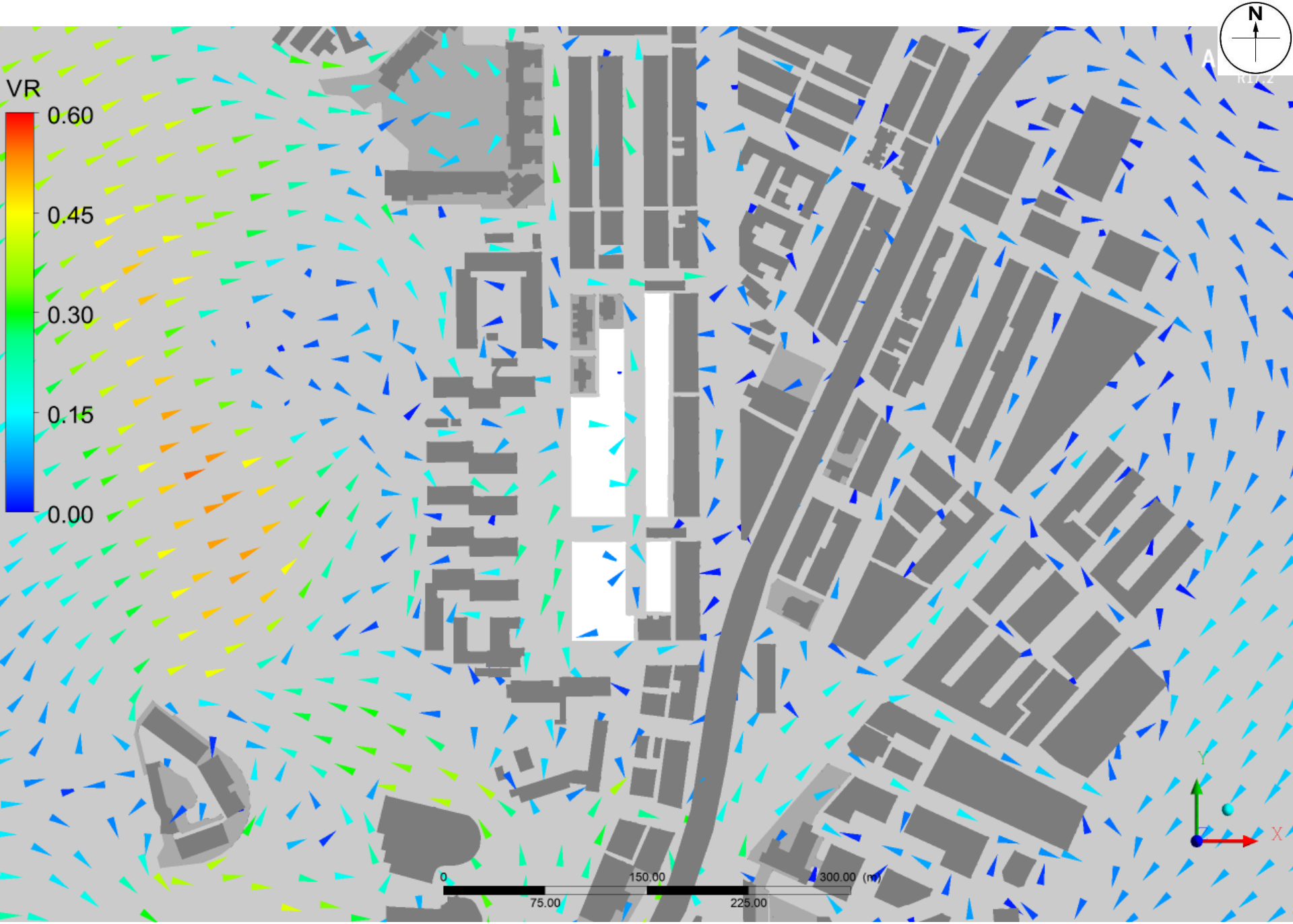
Baseline Scheme - Vector plot at pedestrian level under S Wind



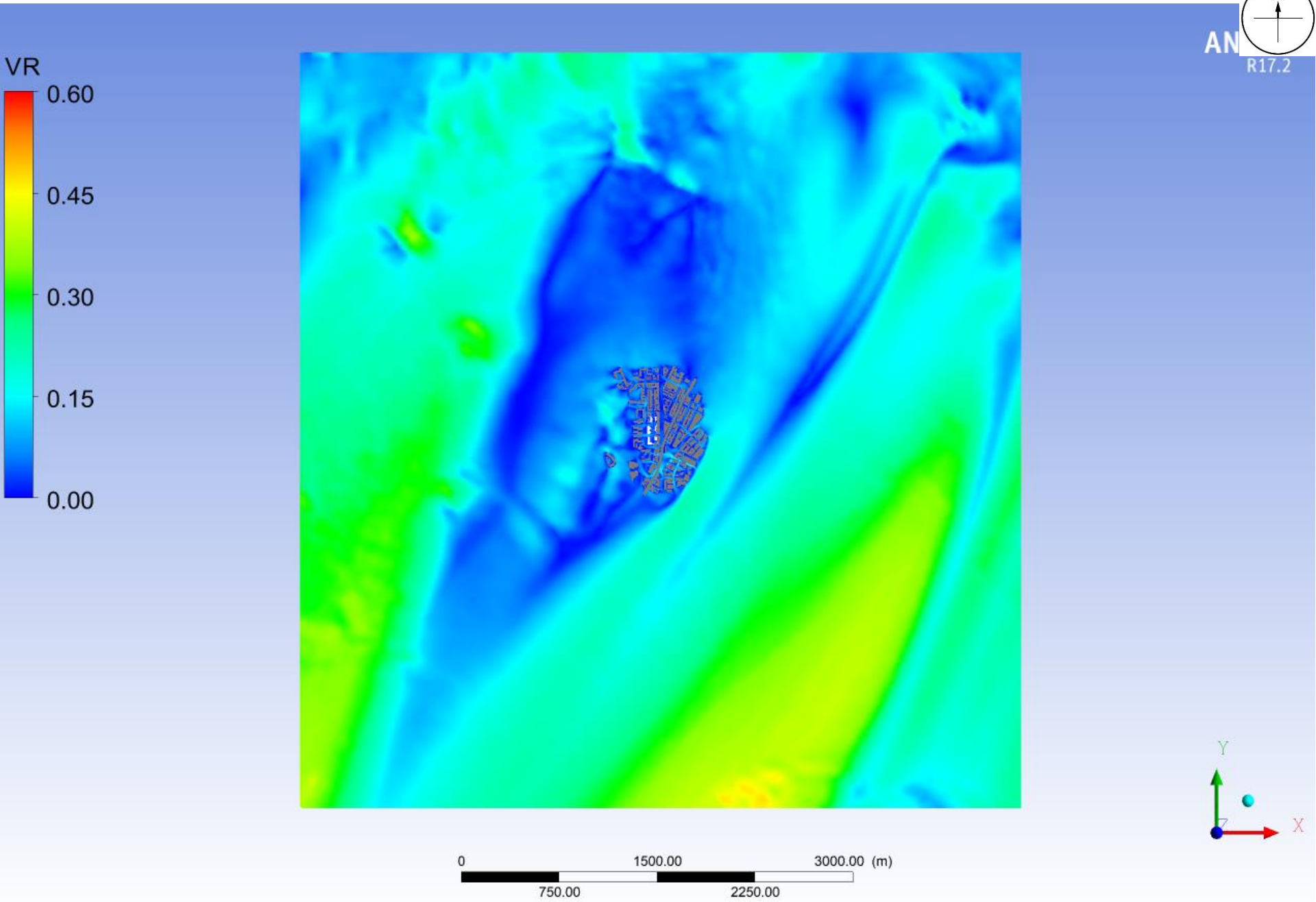
Baseline Scheme - Vector plot at pedestrian level under SSW Wind



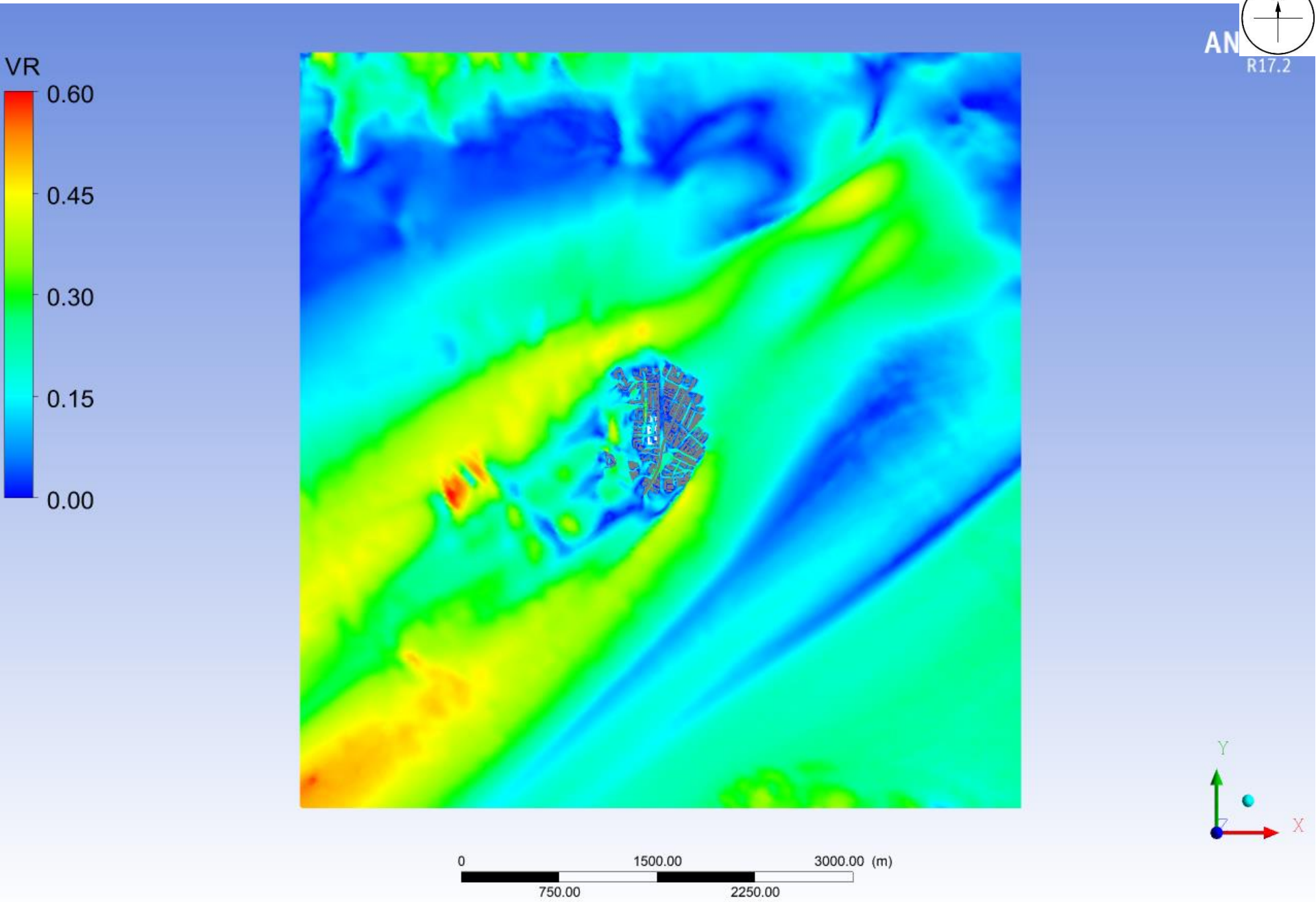
Baseline Scheme - Vector plot at pedestrian level under SW Wind



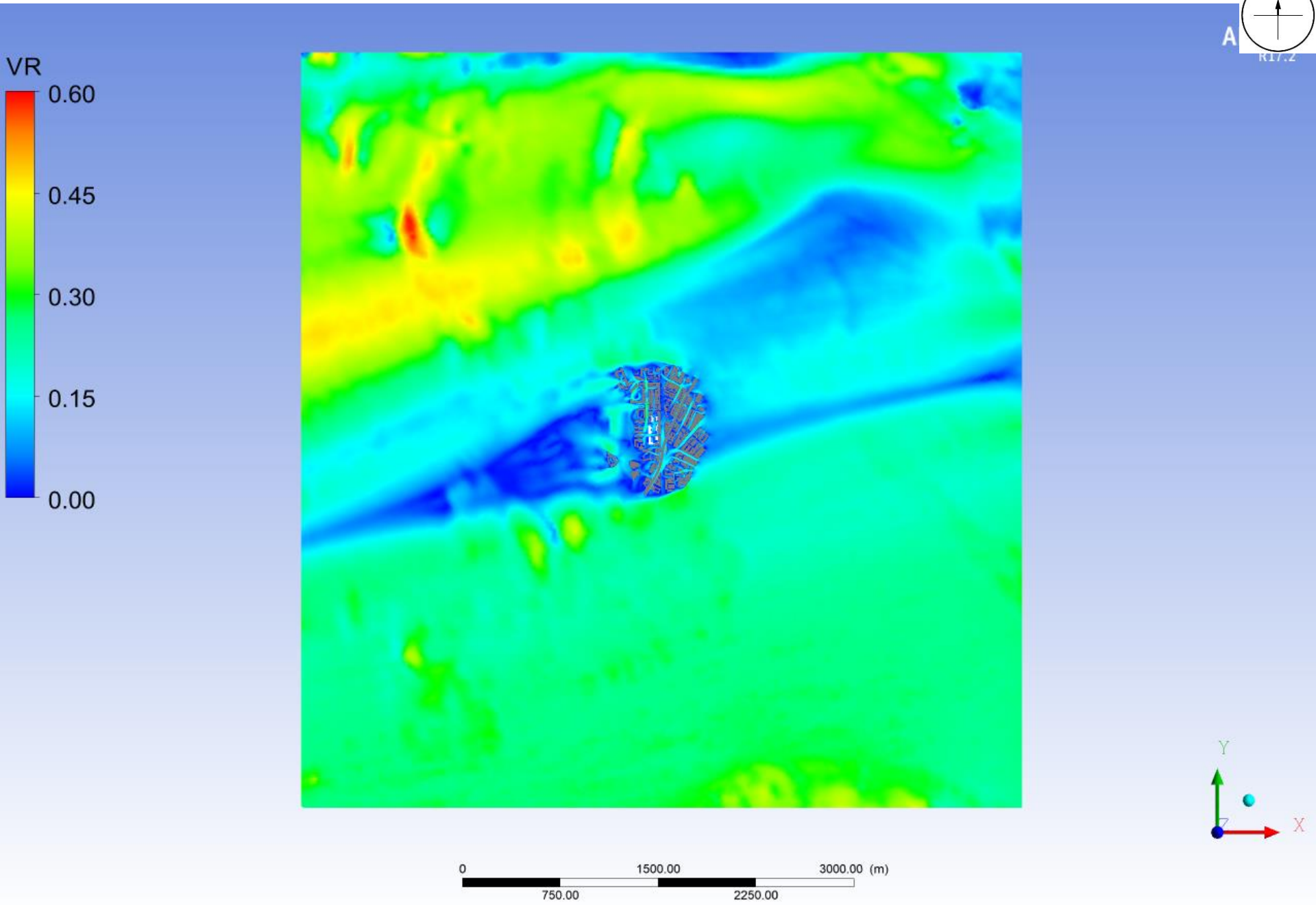
Baseline Scheme - Vector plot at pedestrian level under WSW Wind



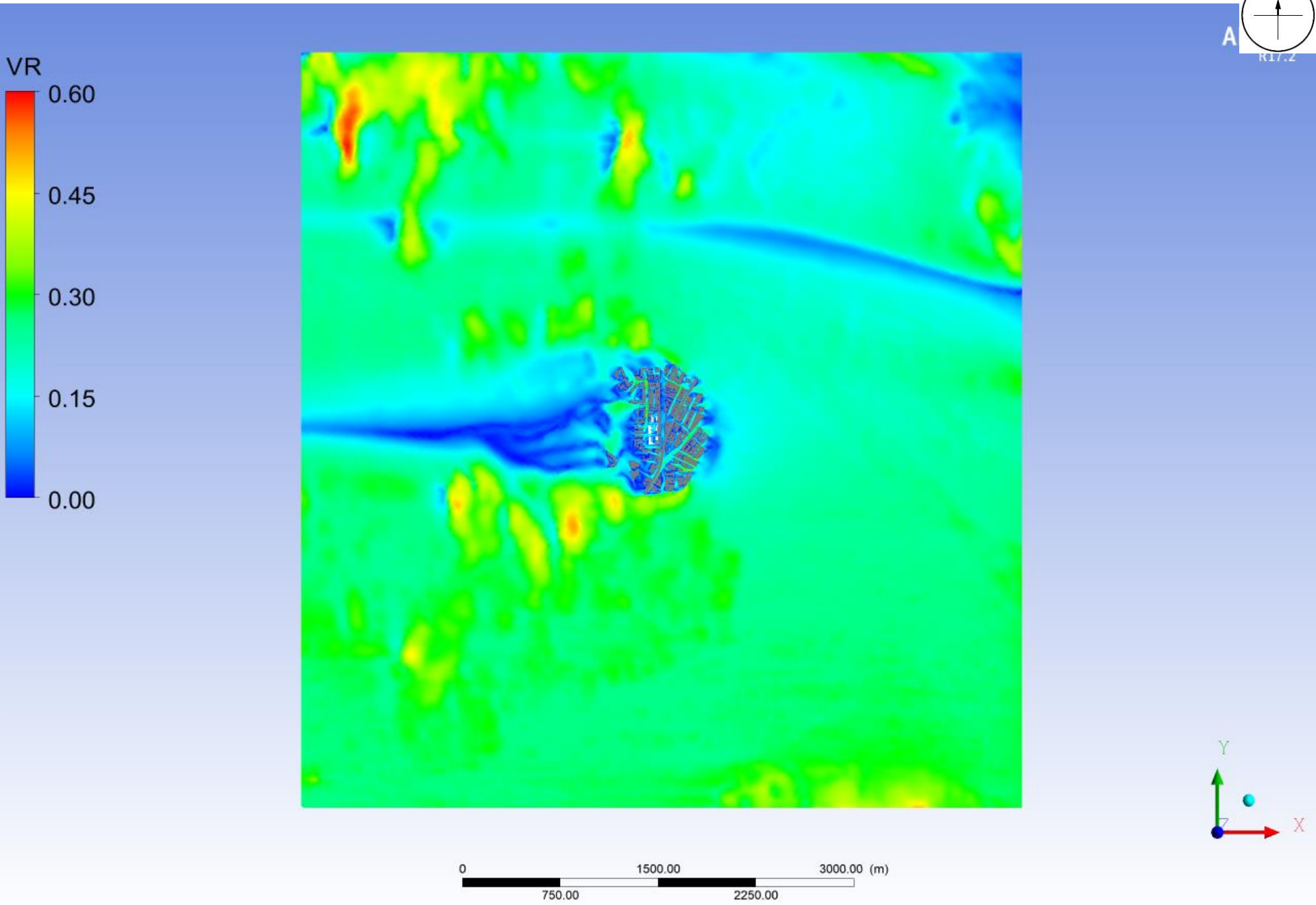
Baseline Scheme - Domain Contour plot at pedestrian level under NNE Wind



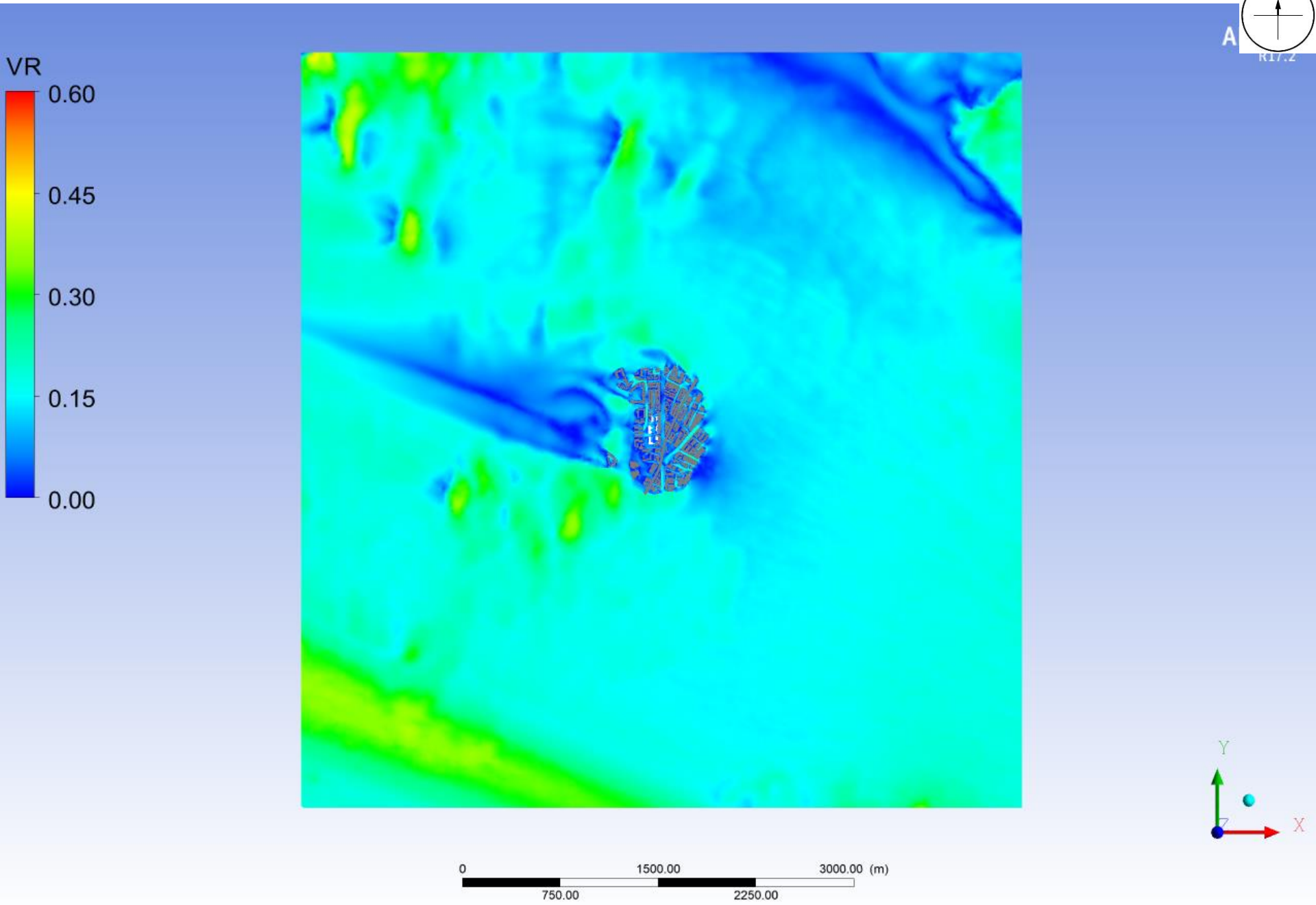
Baseline Scheme - Domain Contour plot at pedestrian level under NE Wind



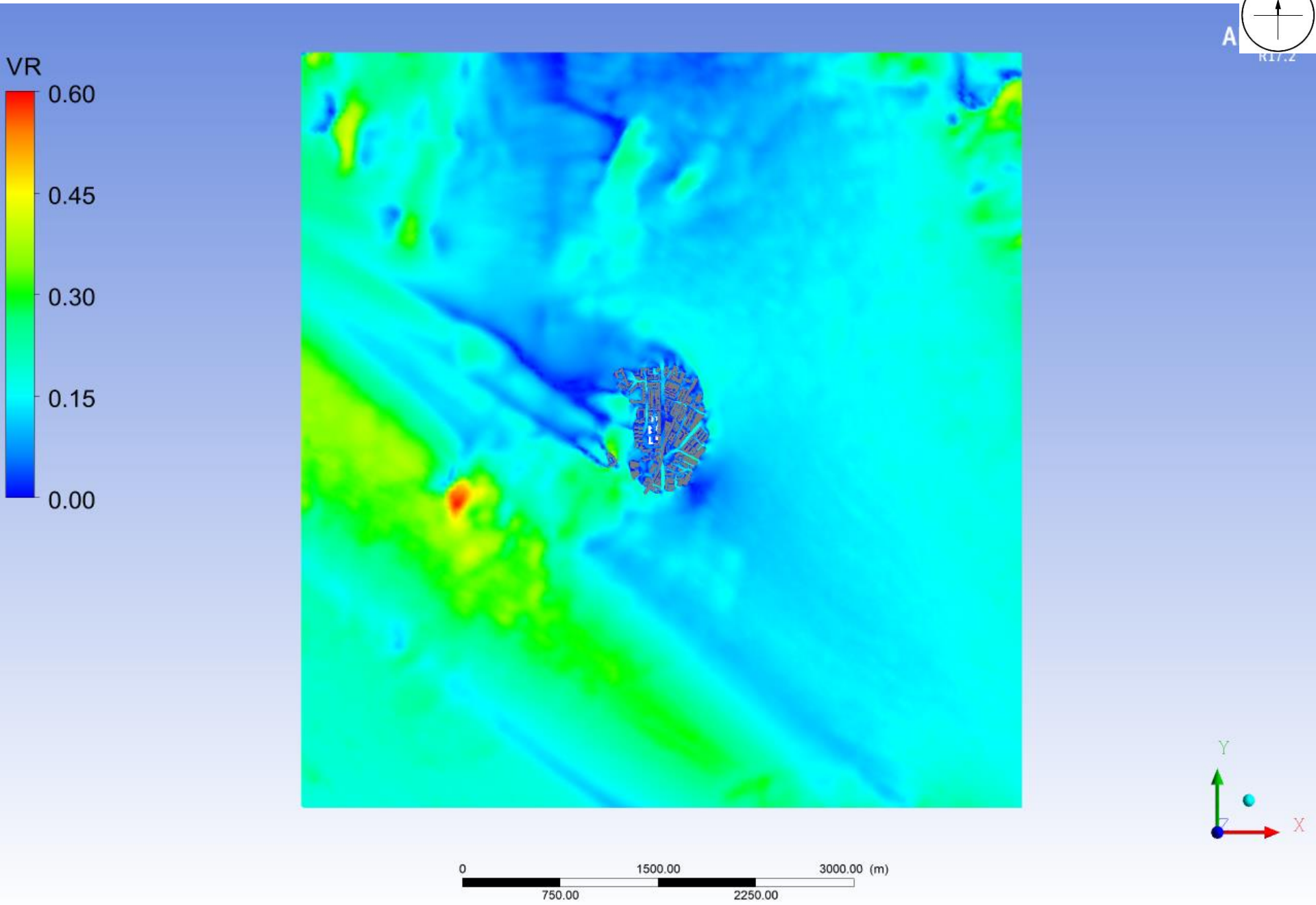
Baseline Scheme - Domain Contour plot at pedestrian level under ENE Wind



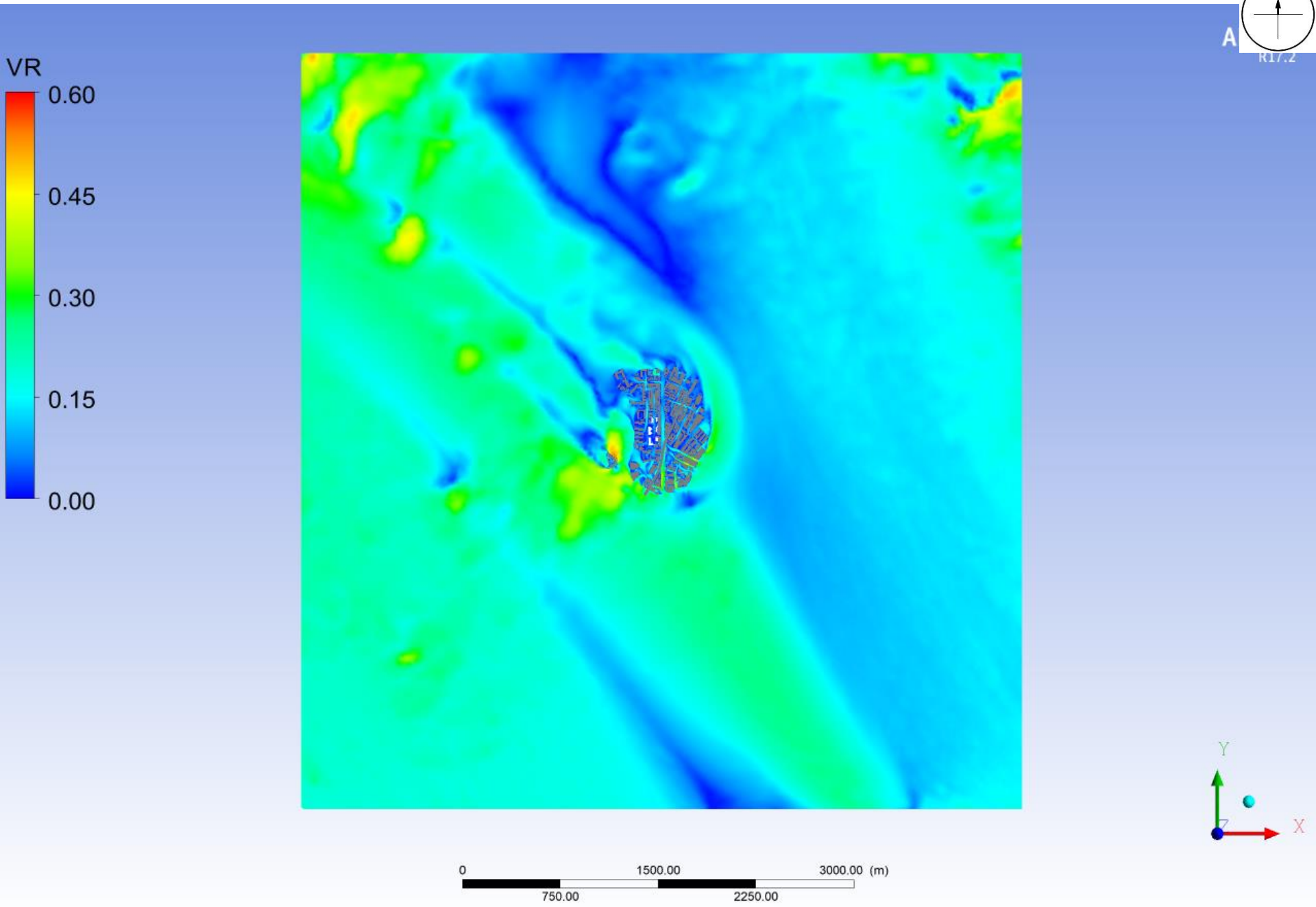
Baseline Scheme - Domain Contour plot at pedestrian level under E Wind



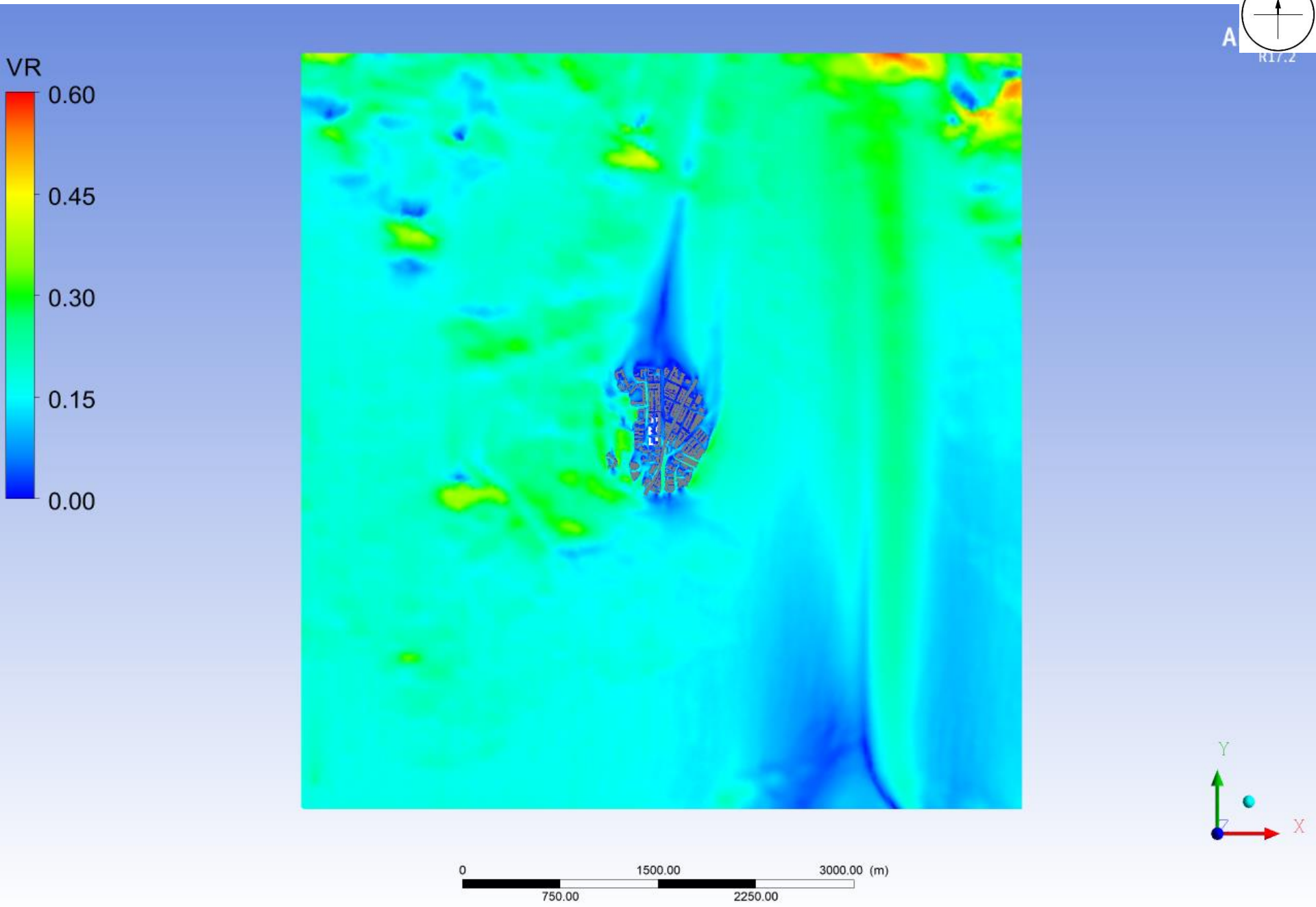
Baseline Scheme - Domain Contour plot at pedestrian level under ESE Wind



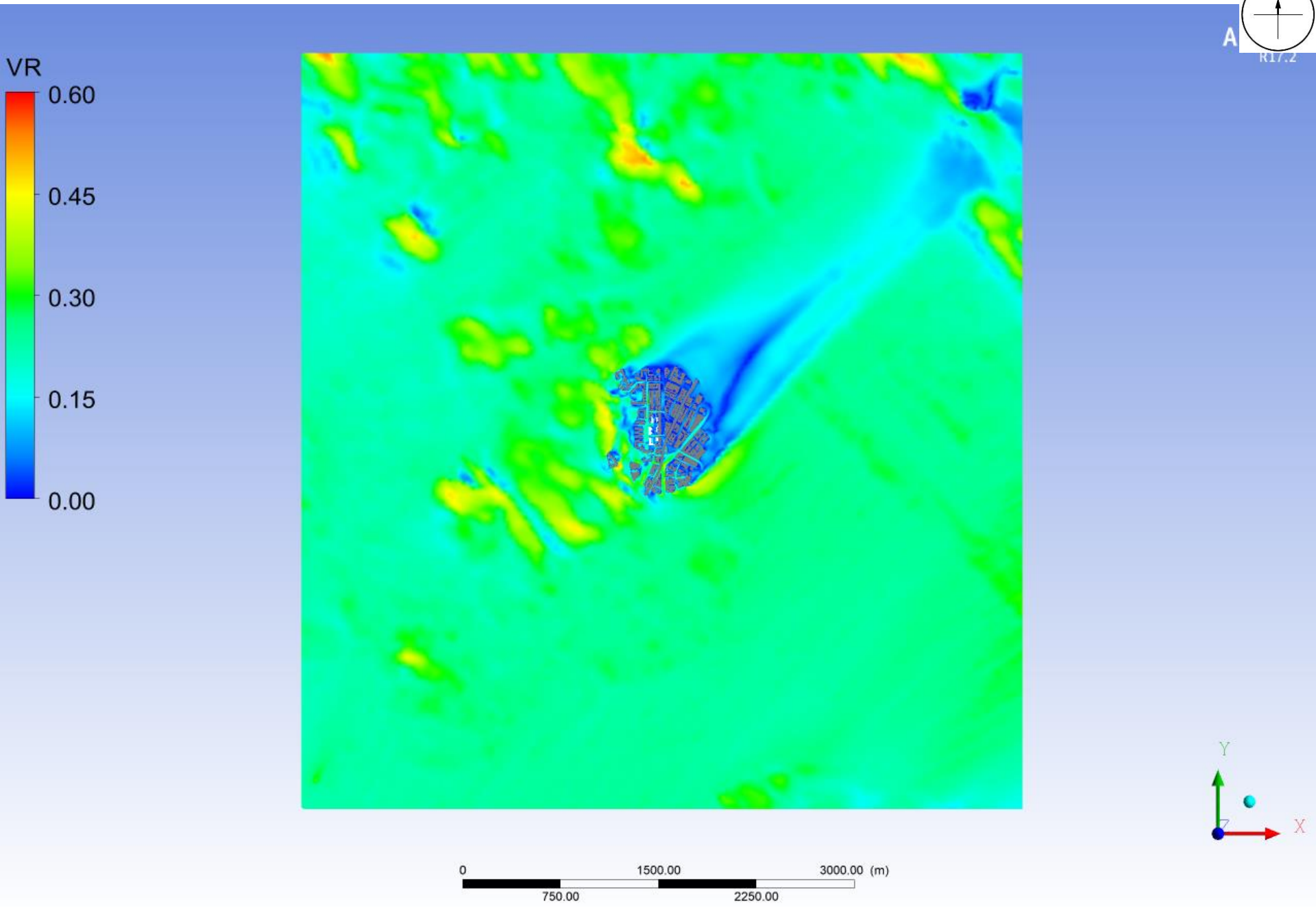
Baseline Scheme - Domain Contour plot at pedestrian level under SE Wind



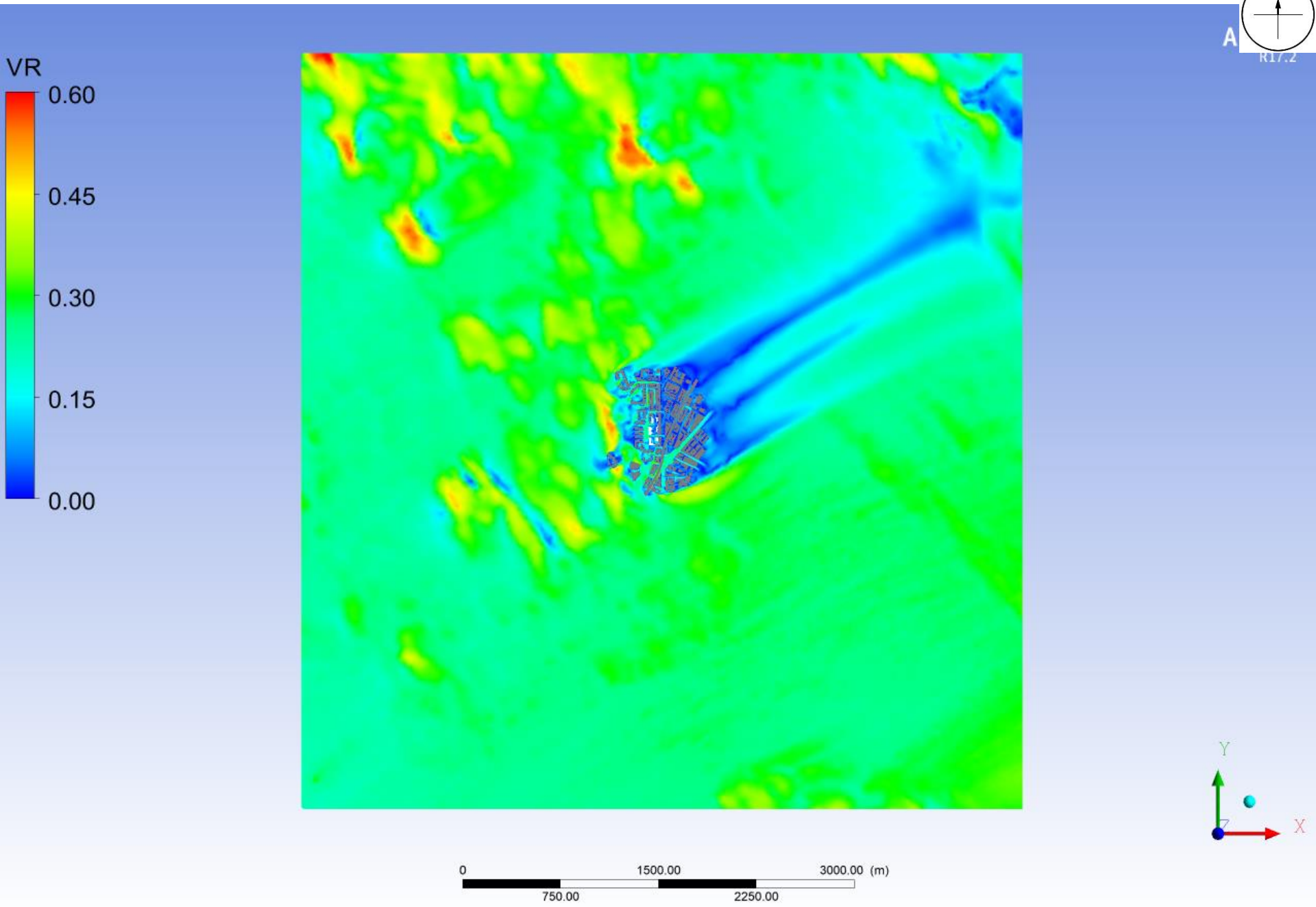
Baseline Scheme - Domain Contour plot at pedestrian level under SSE Wind



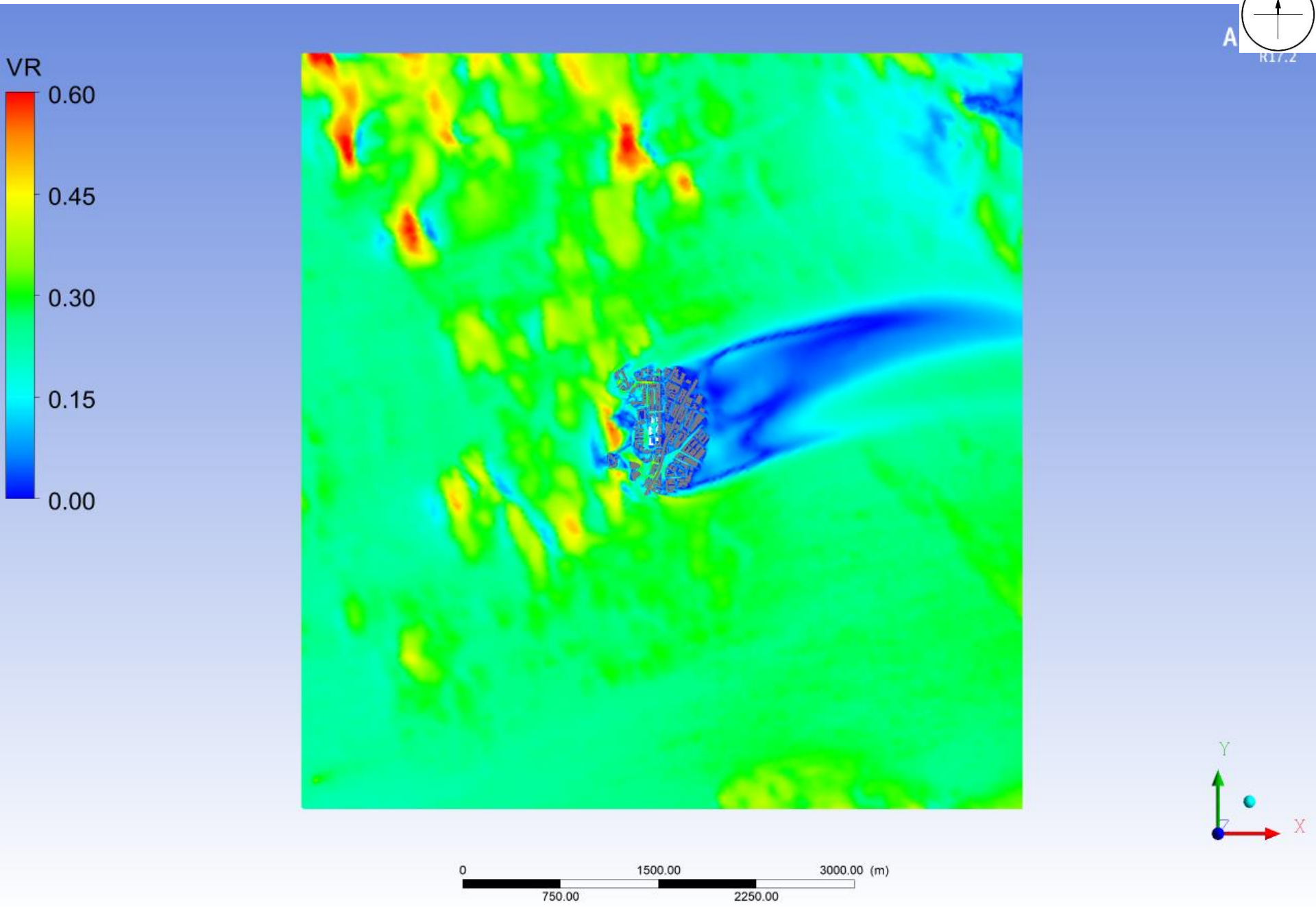
Baseline Scheme - Domain Contour plot at pedestrian level under S Wind



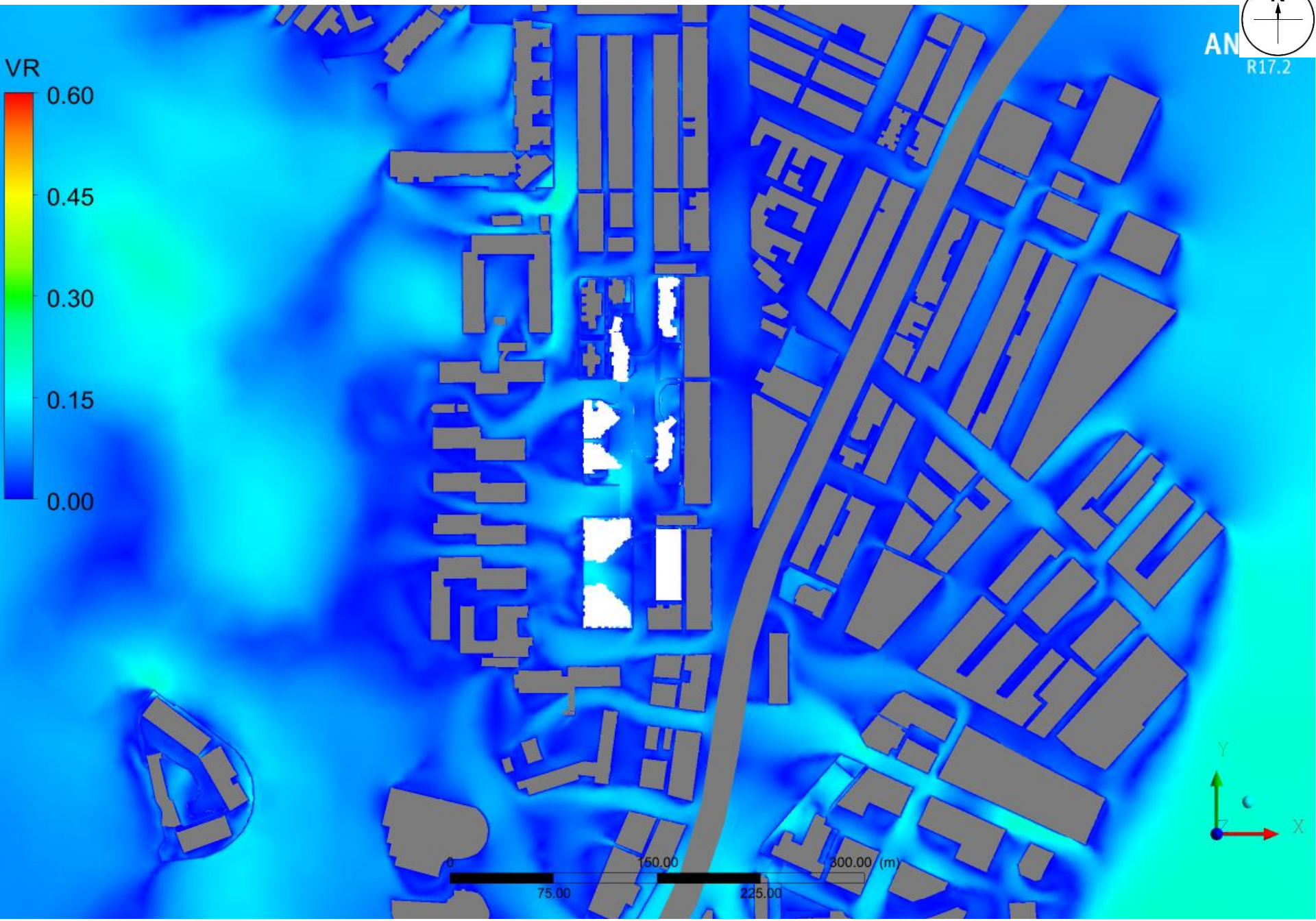
Baseline Scheme - Domain Contour plot at pedestrian level under SSW Wind



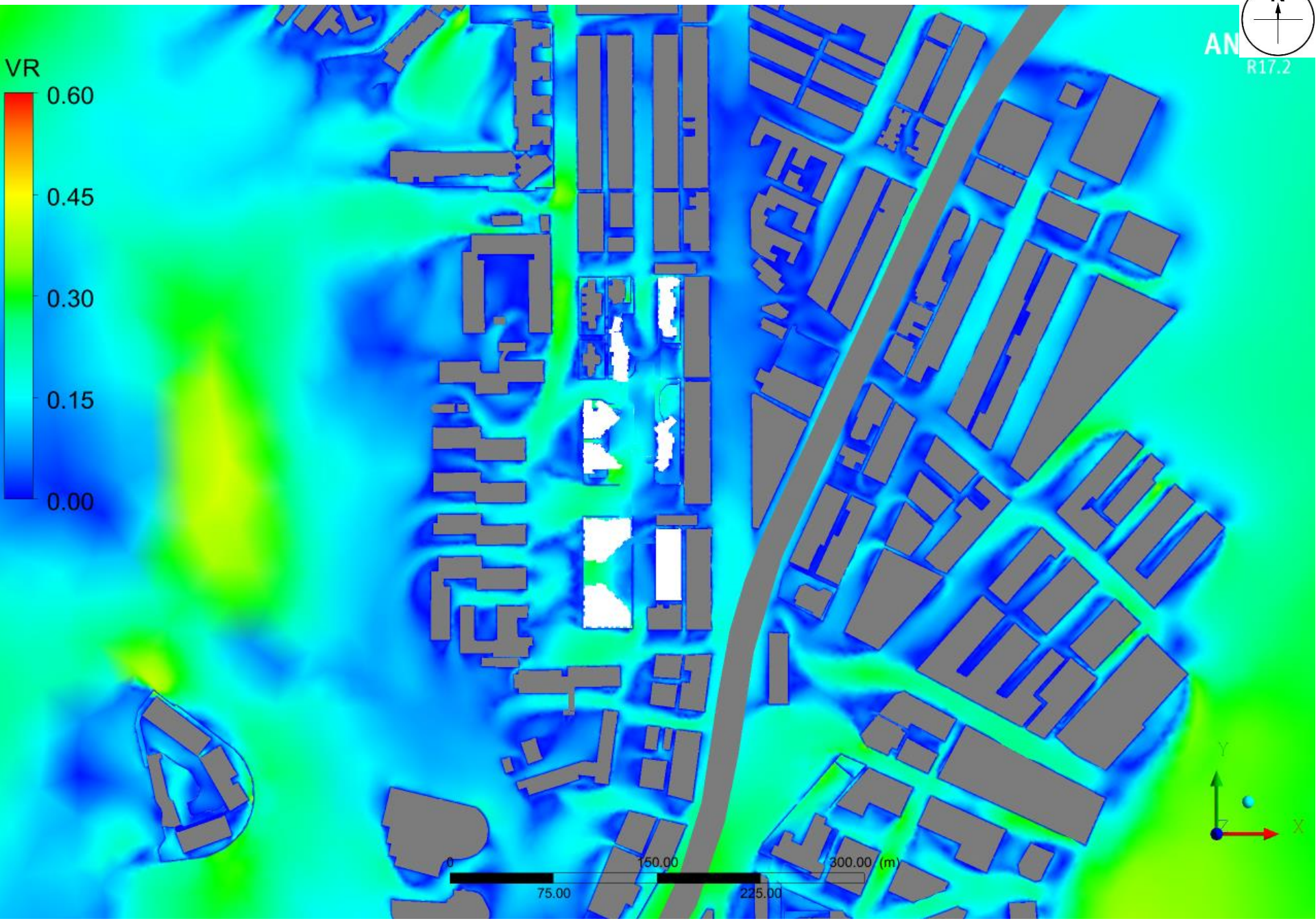
Baseline Scheme - Domain Contour plot at pedestrian level under SW Wind



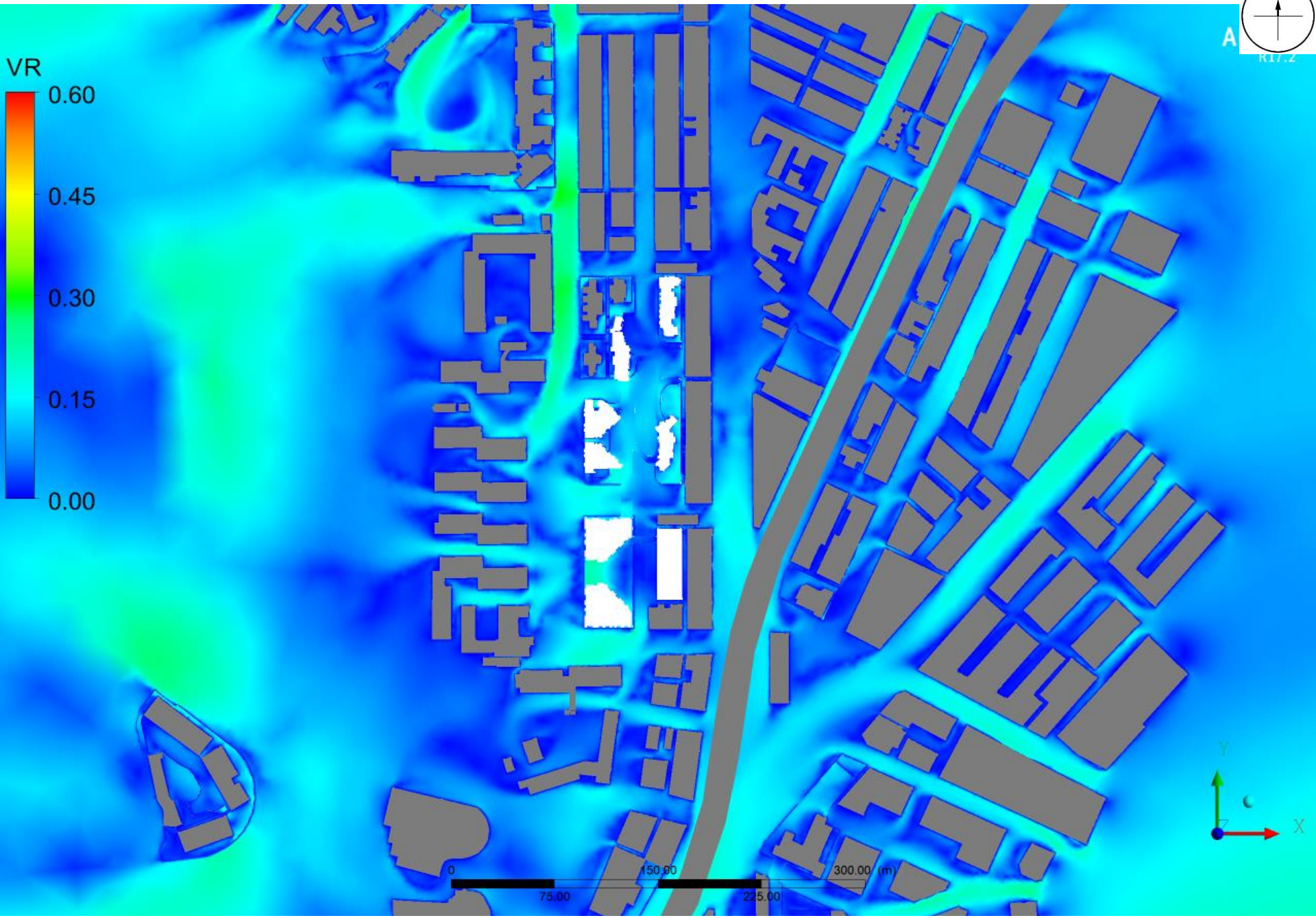
Baseline Scheme - Domain Contour plot at pedestrian level under WSW Wind



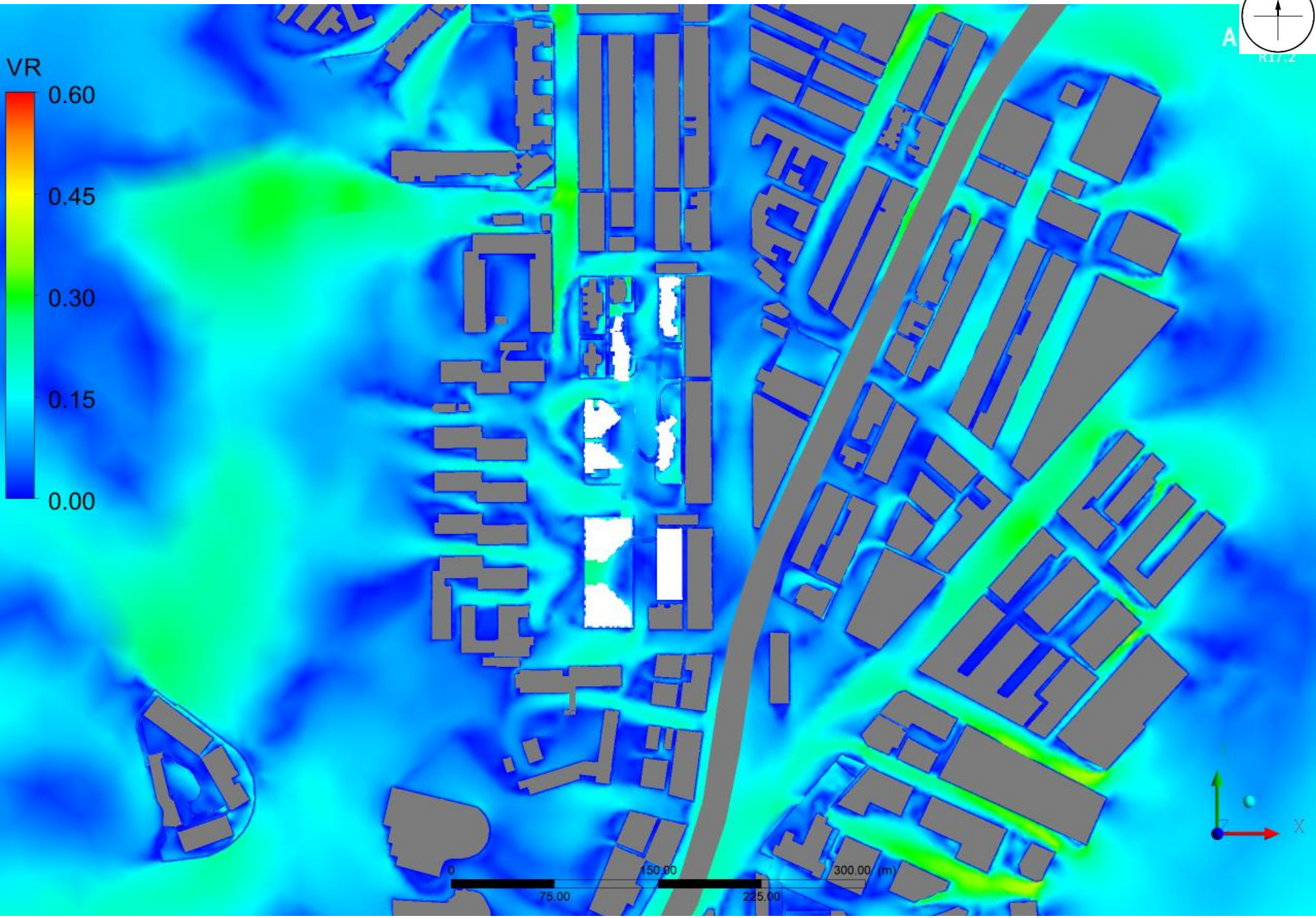
Proposed Scheme - Contour plot at pedestrian level under NNE Wind



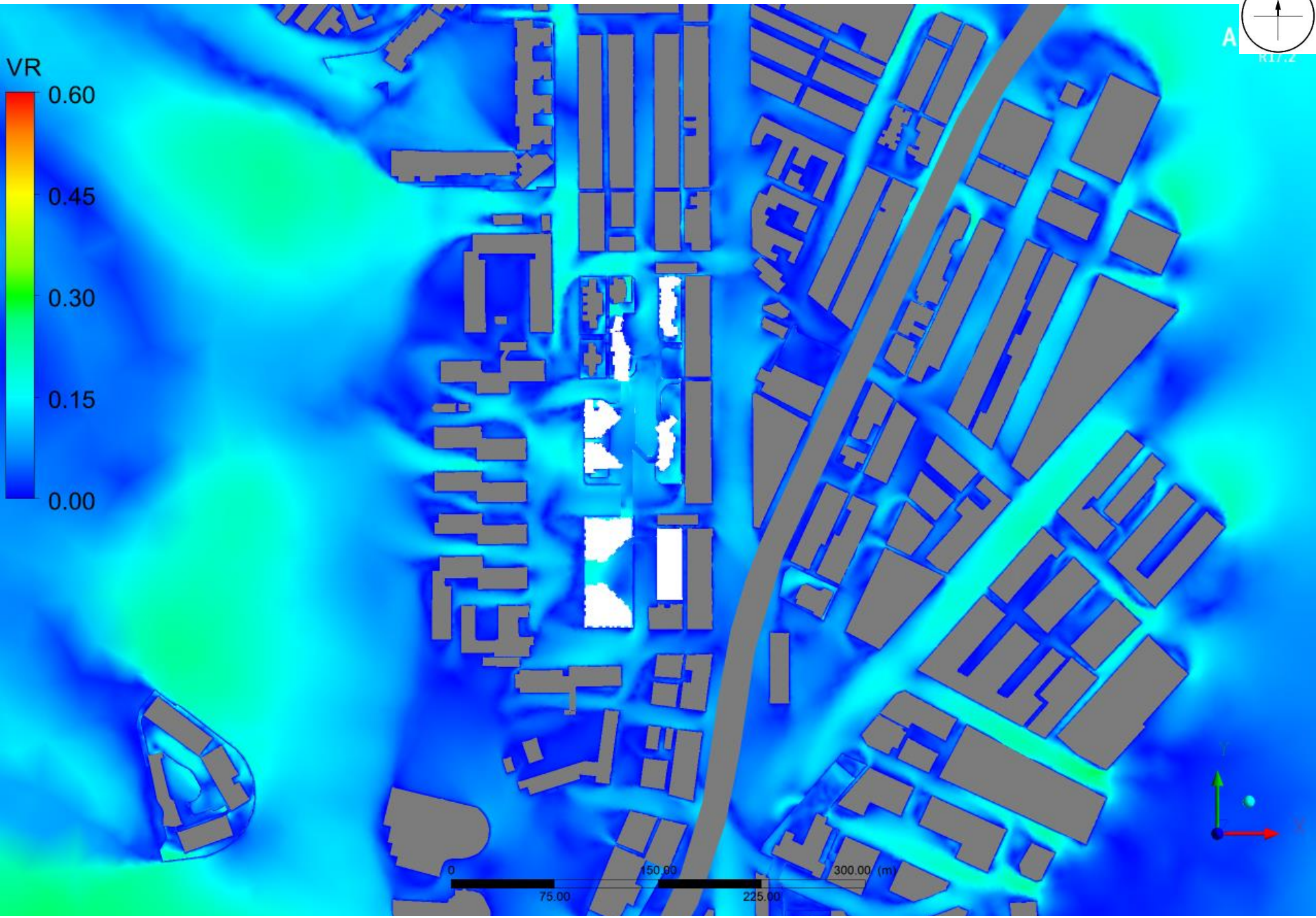
Proposed Scheme - Contour plot at pedestrian level under NE Wind



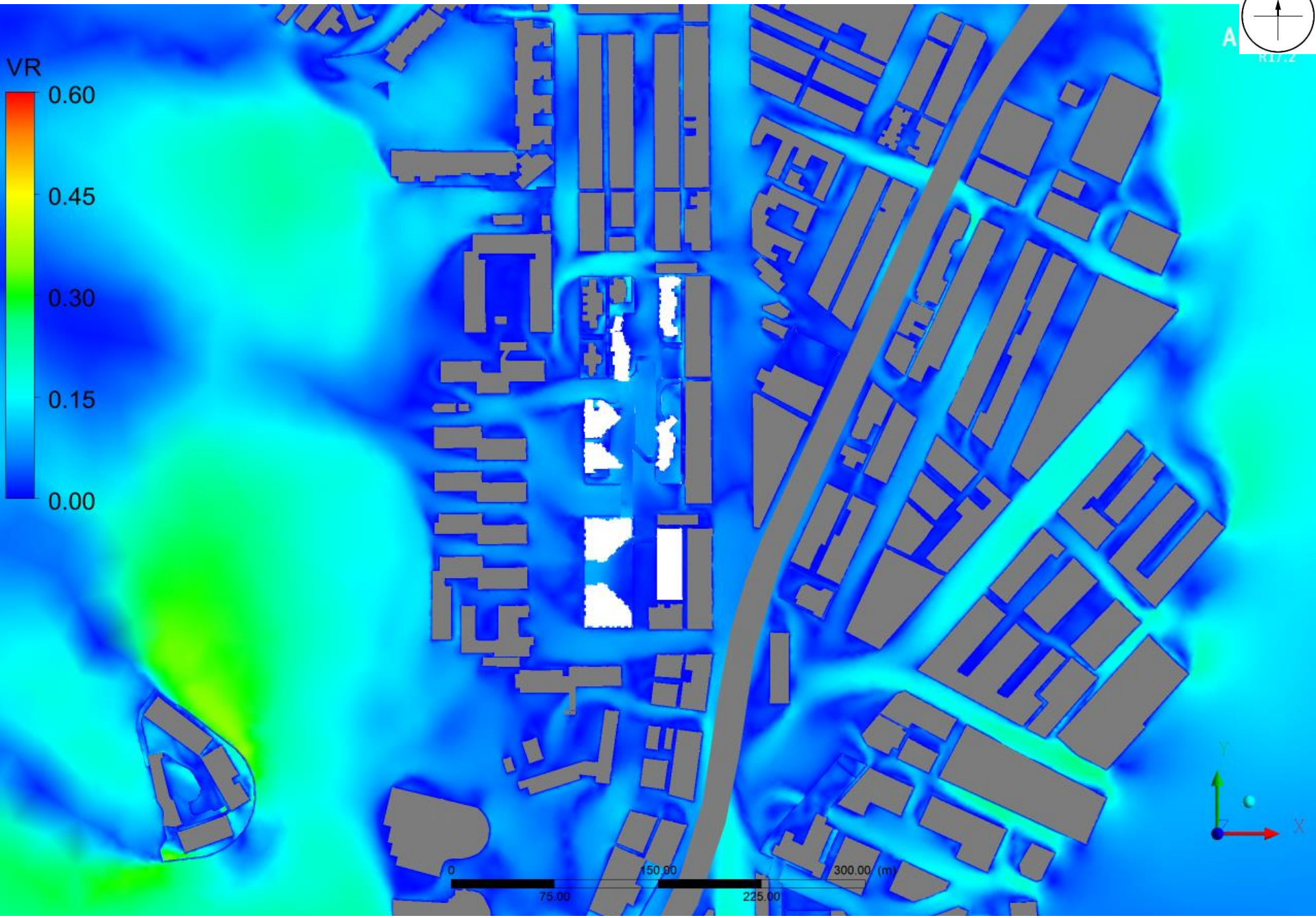
Proposed Scheme - Contour plot at pedestrian level under ENE Wind



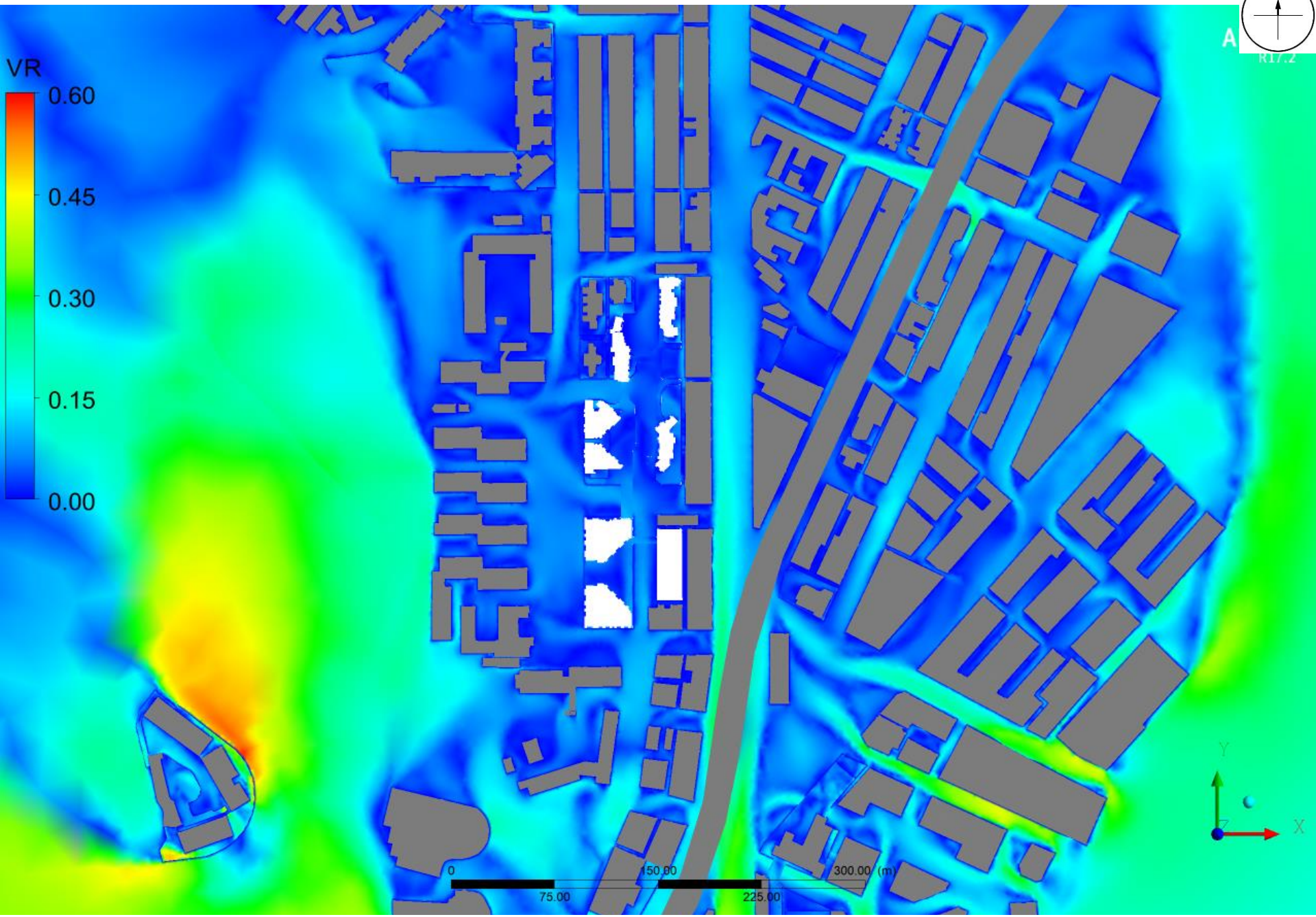
Proposed Scheme - Contour plot at pedestrian level under E Wind



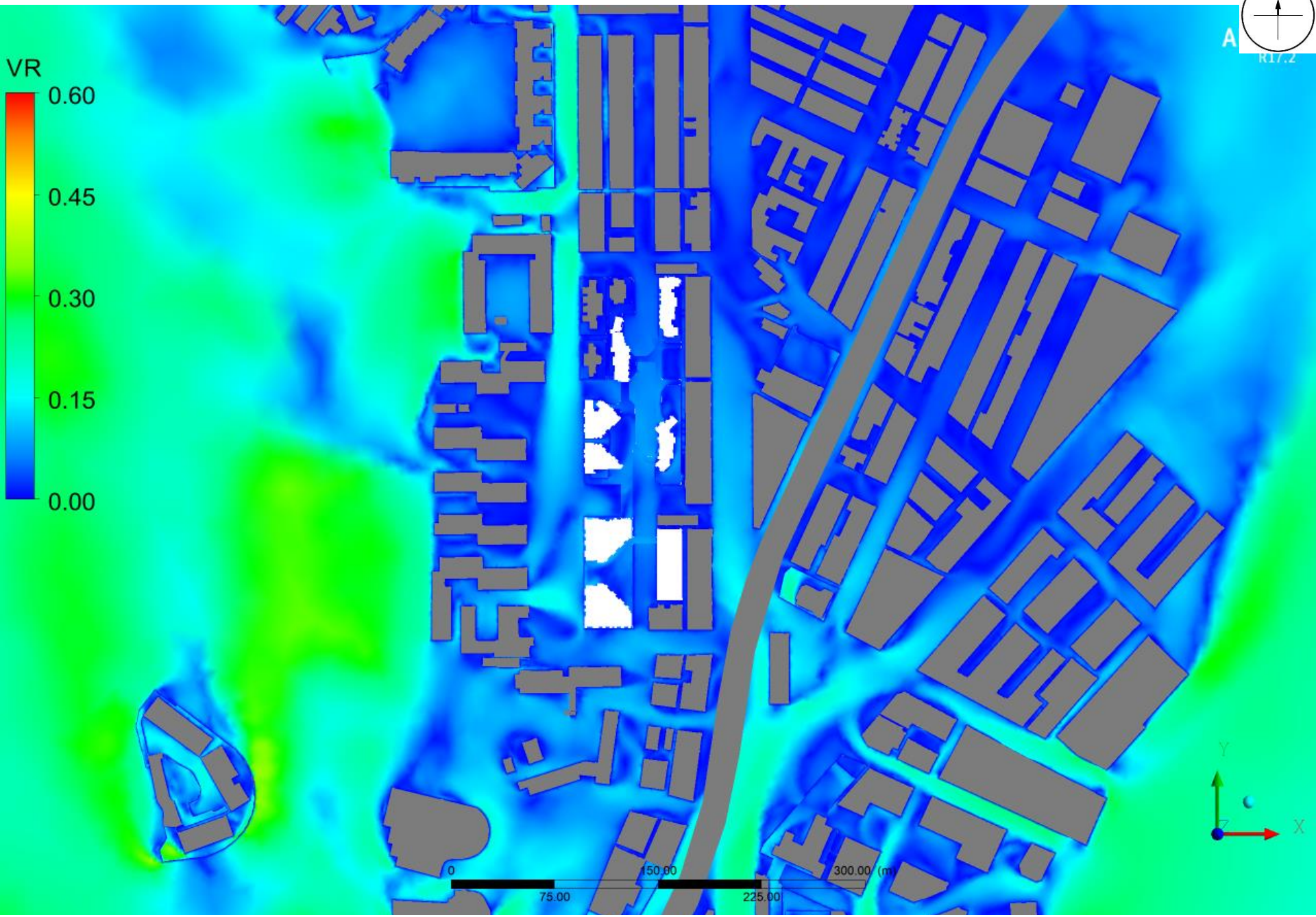
Proposed Scheme - Contour plot at pedestrian level under ESE Wind



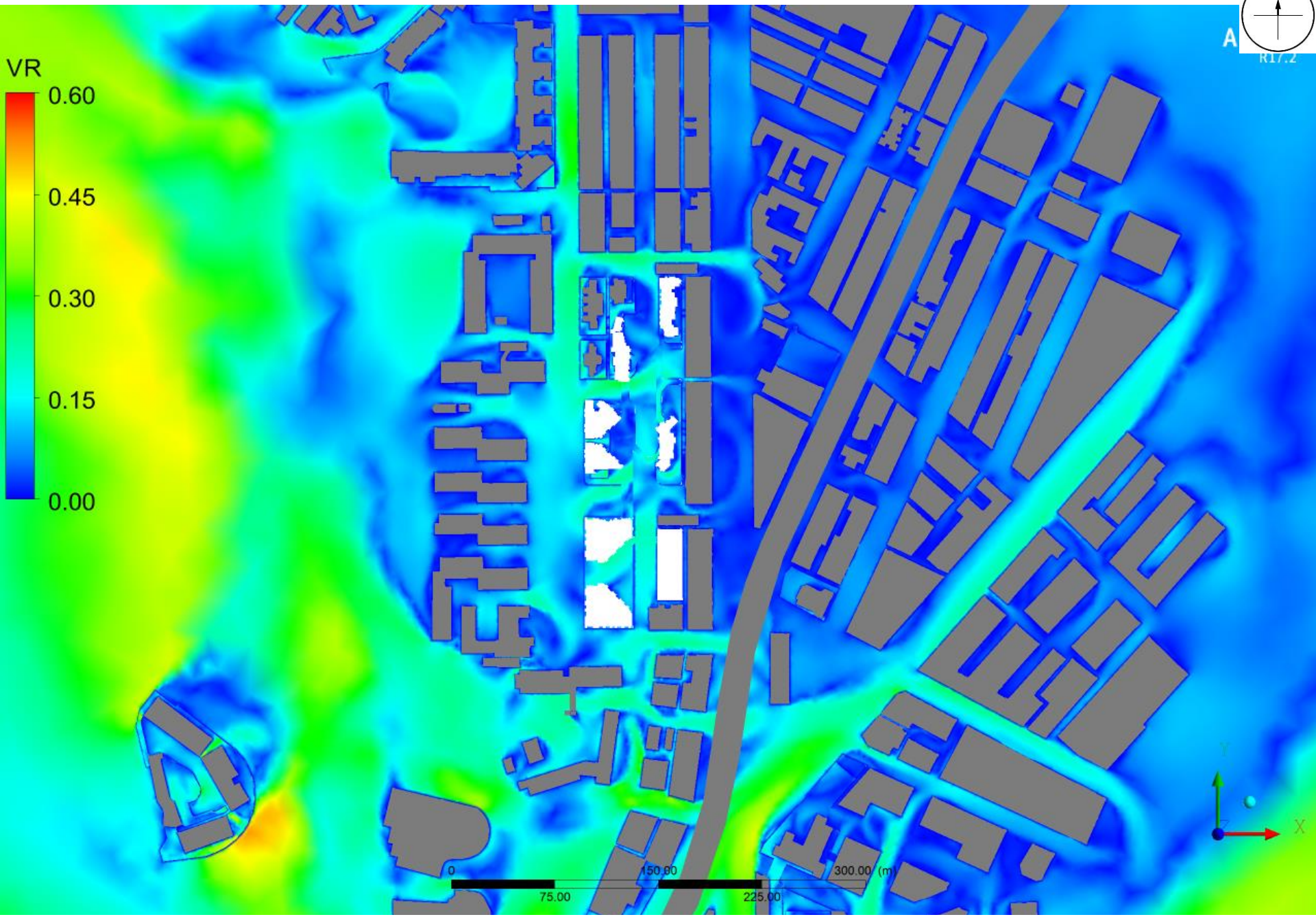
Proposed Scheme - Contour plot at pedestrian level under SE Wind



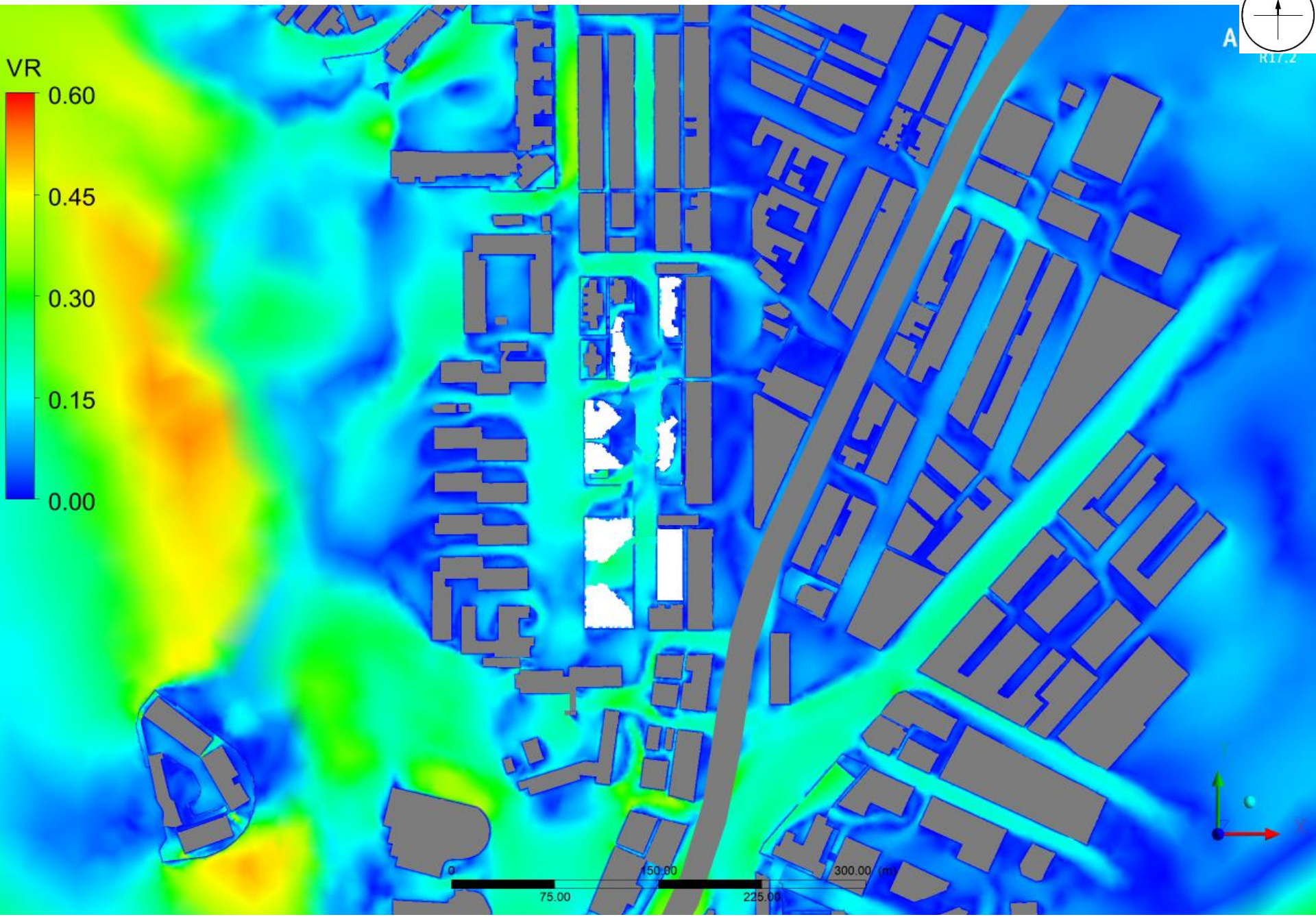
Proposed Scheme - Contour plot at pedestrian level under SSE Wind



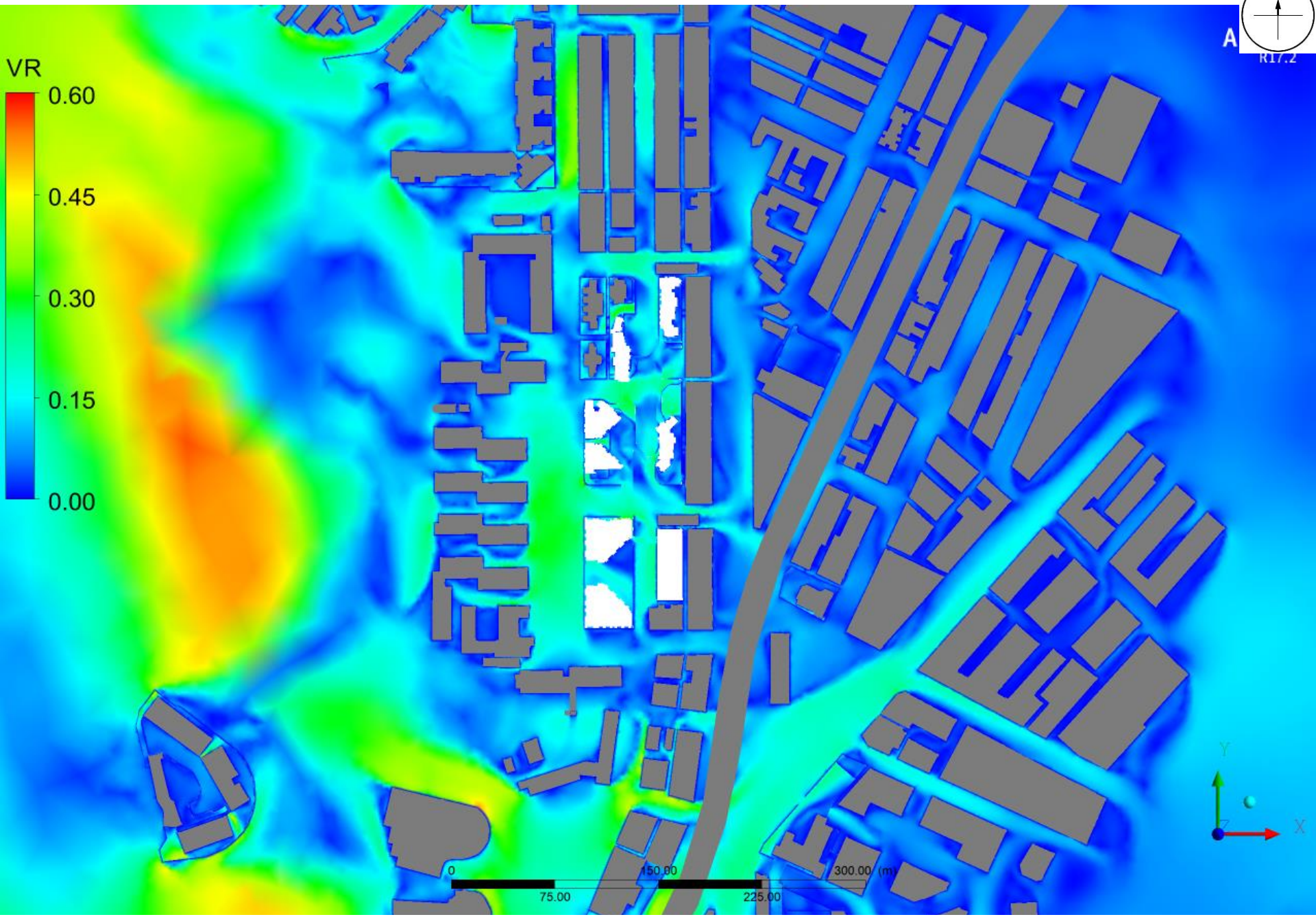
Proposed Scheme - Contour plot at pedestrian level under S Wind



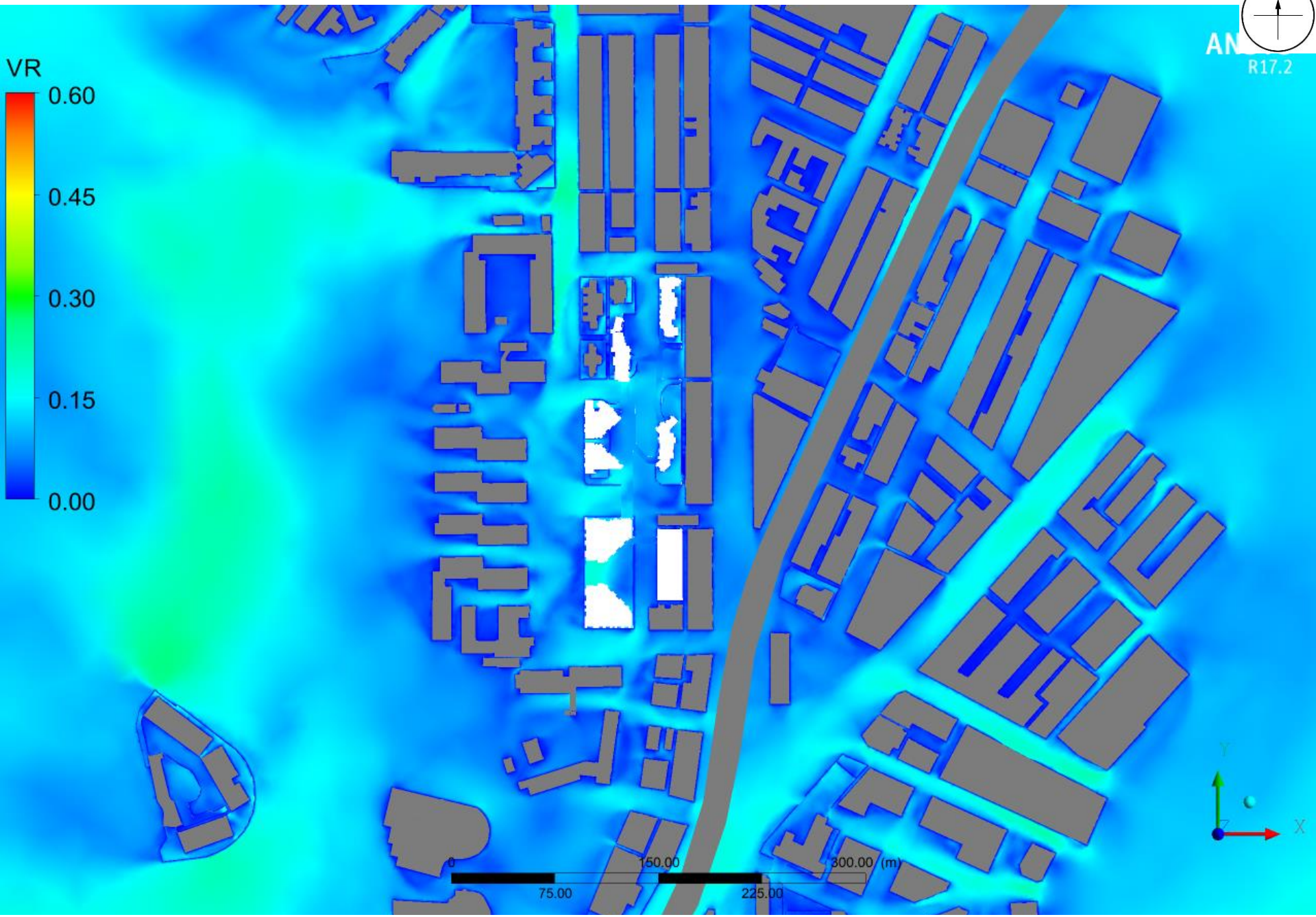
Proposed Scheme - Contour plot at pedestrian level under SSW Wind



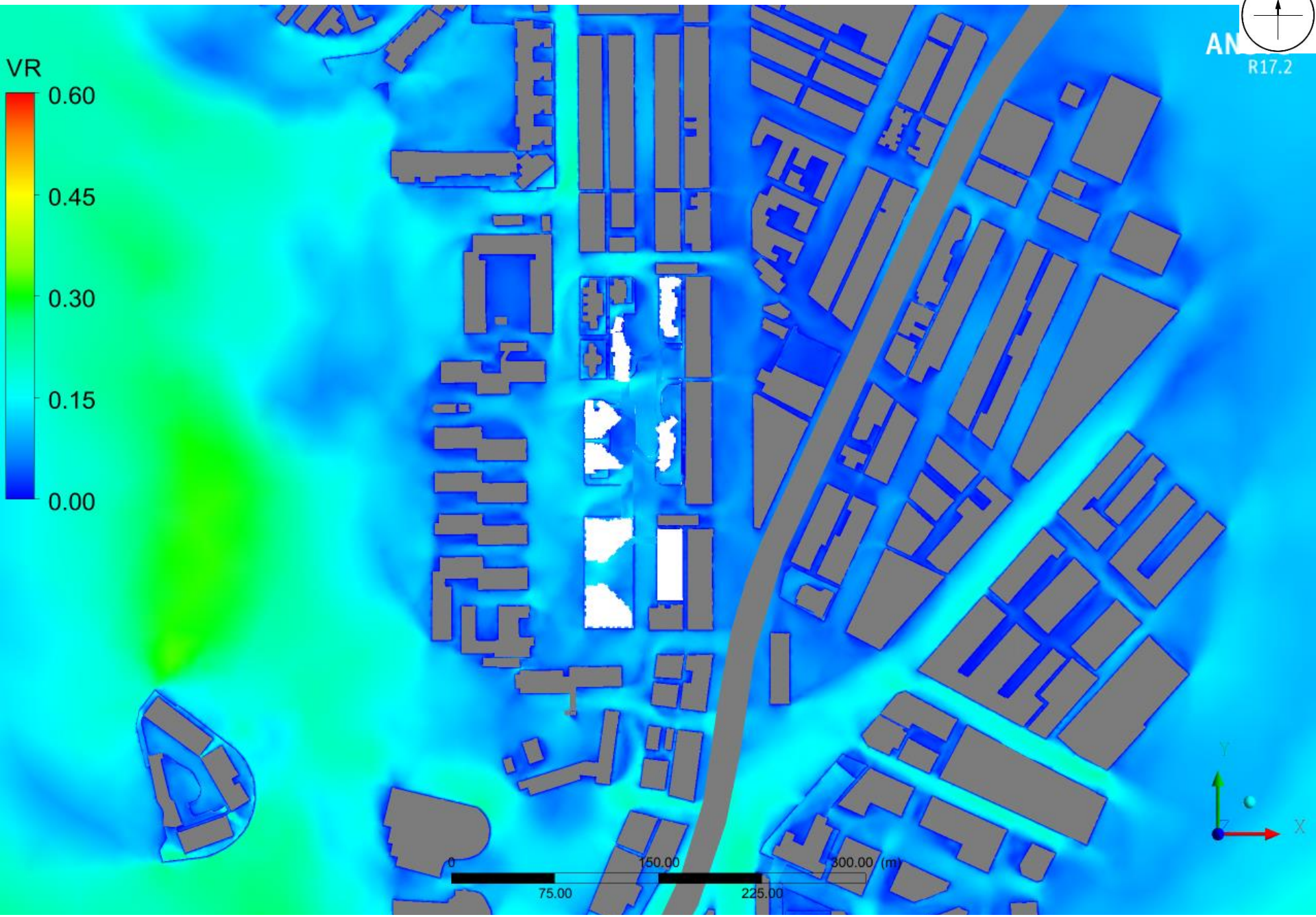
Proposed Scheme - Contour plot at pedestrian level under SW Wind



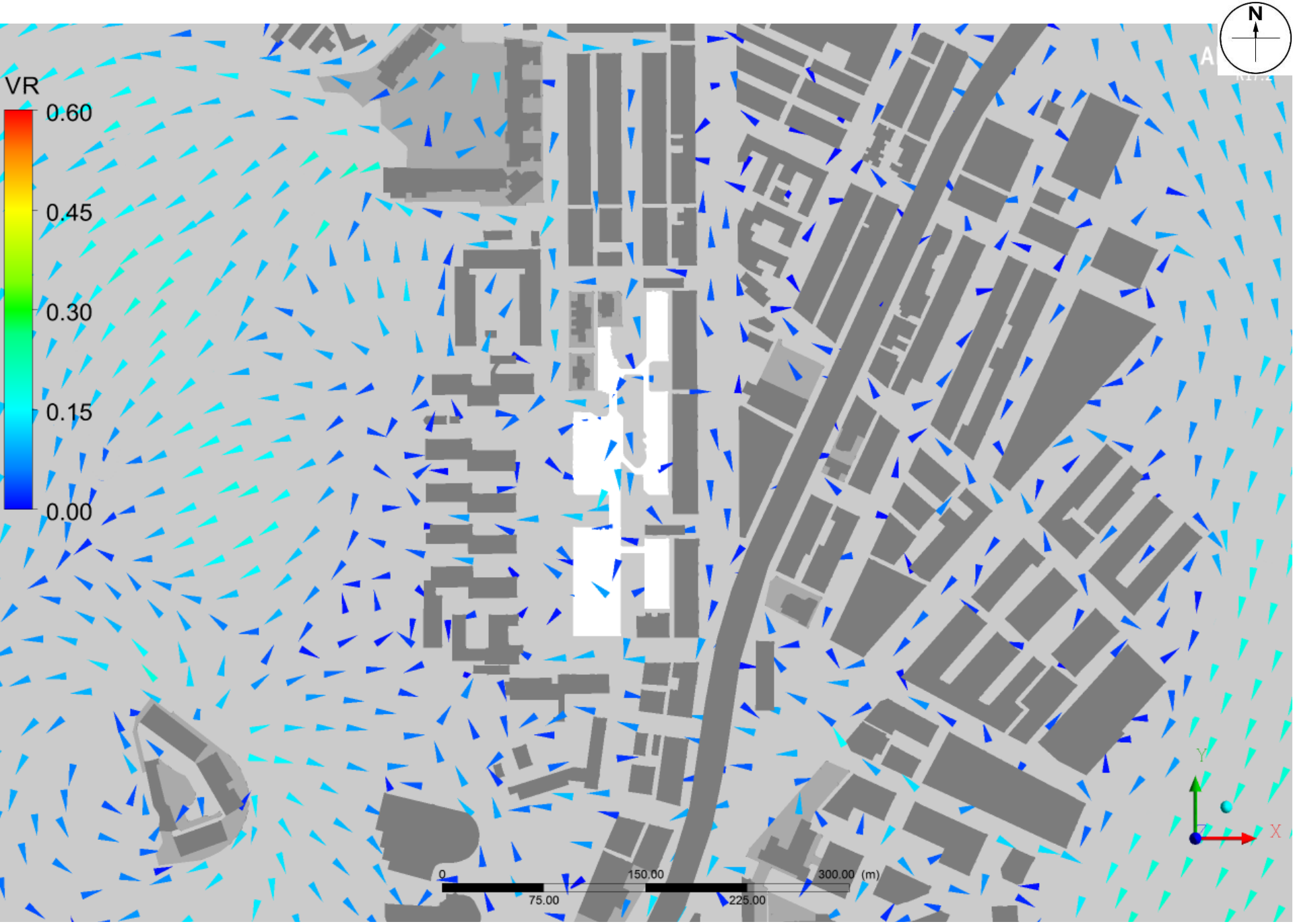
Proposed Scheme - Contour plot at pedestrian level under WSW Wind



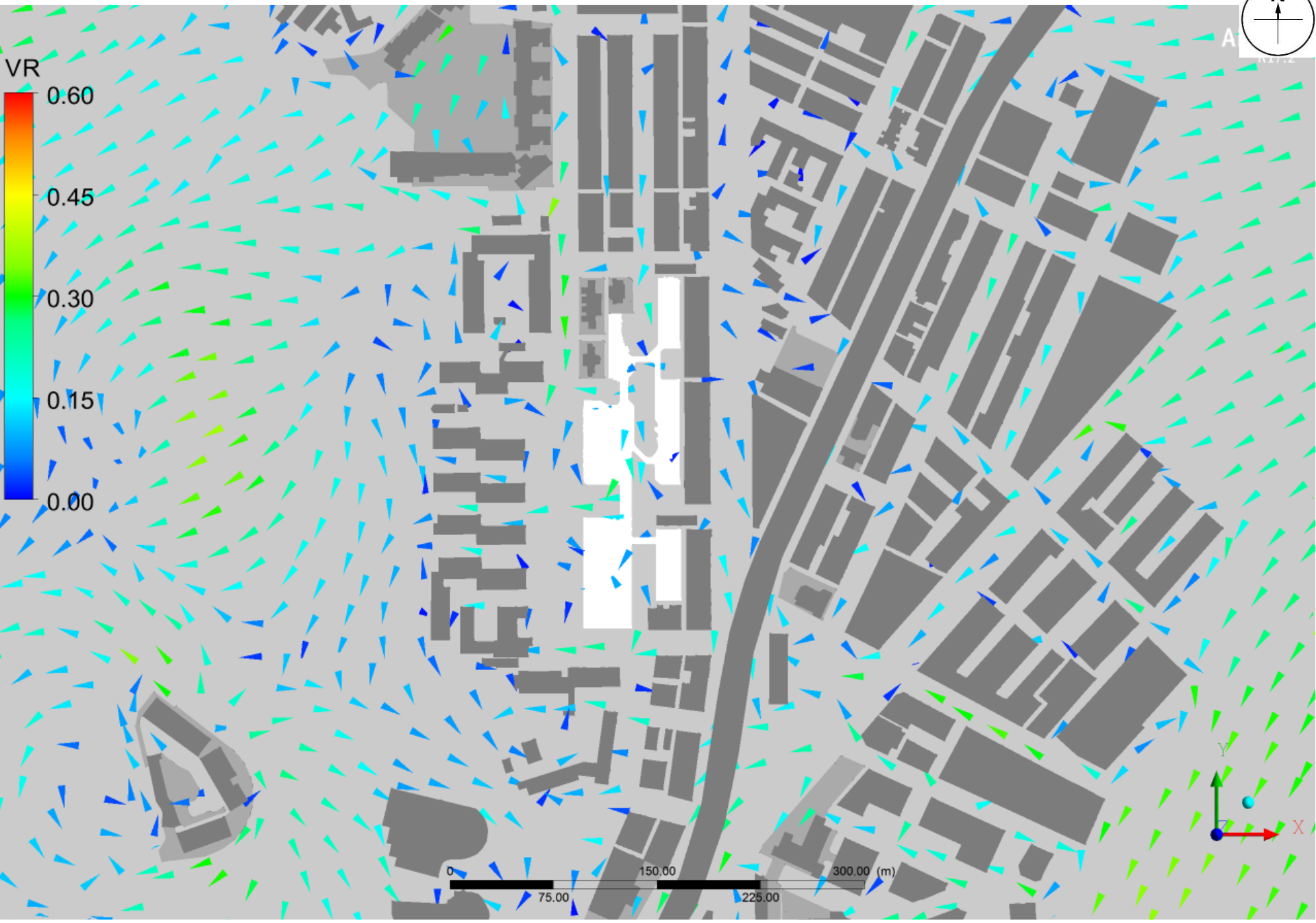
Proposed Scheme - Annual weighted wind speed colour at pedestrian level



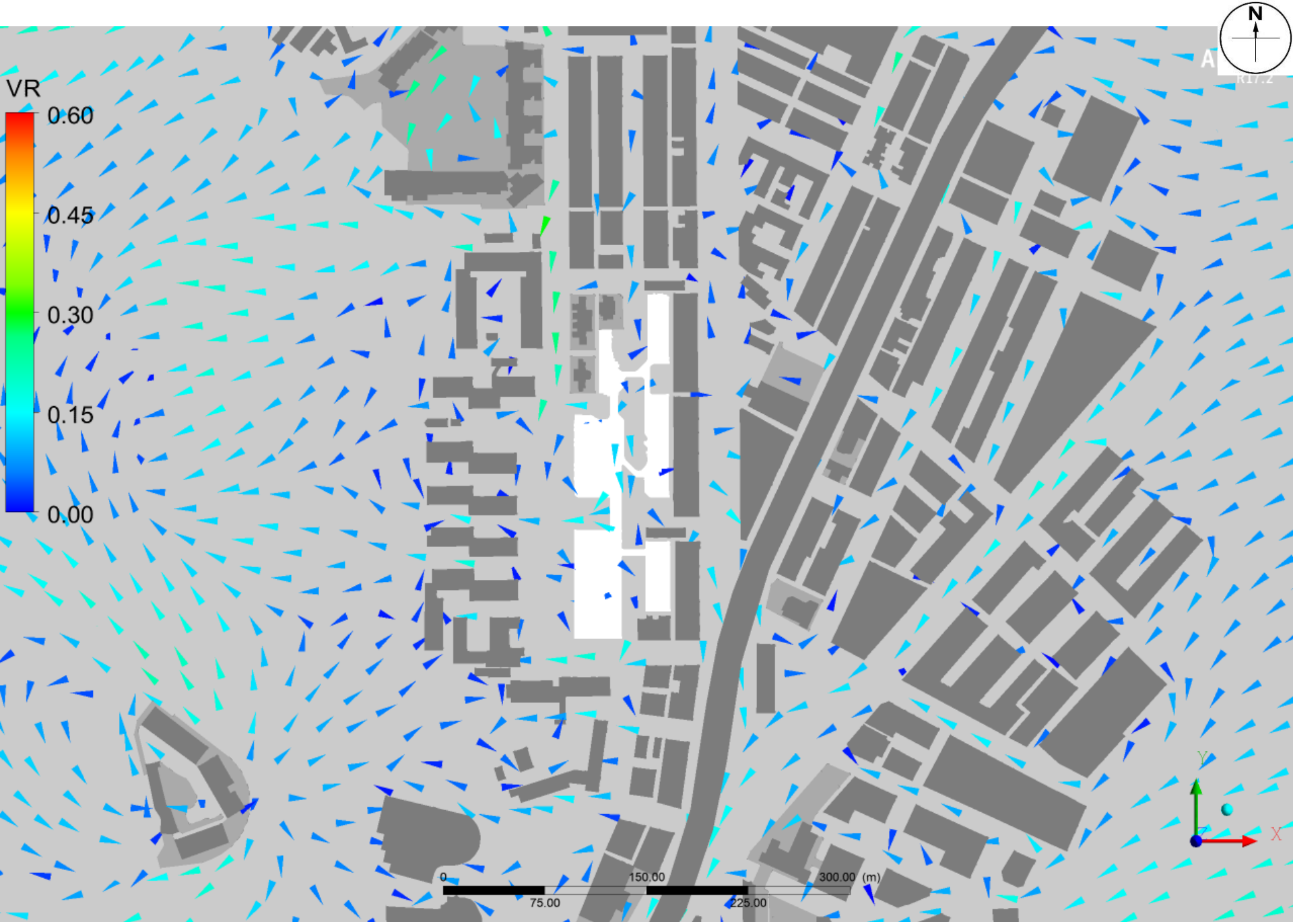
Proposed Scheme - Summer weighted wind speed colour at pedestrian level



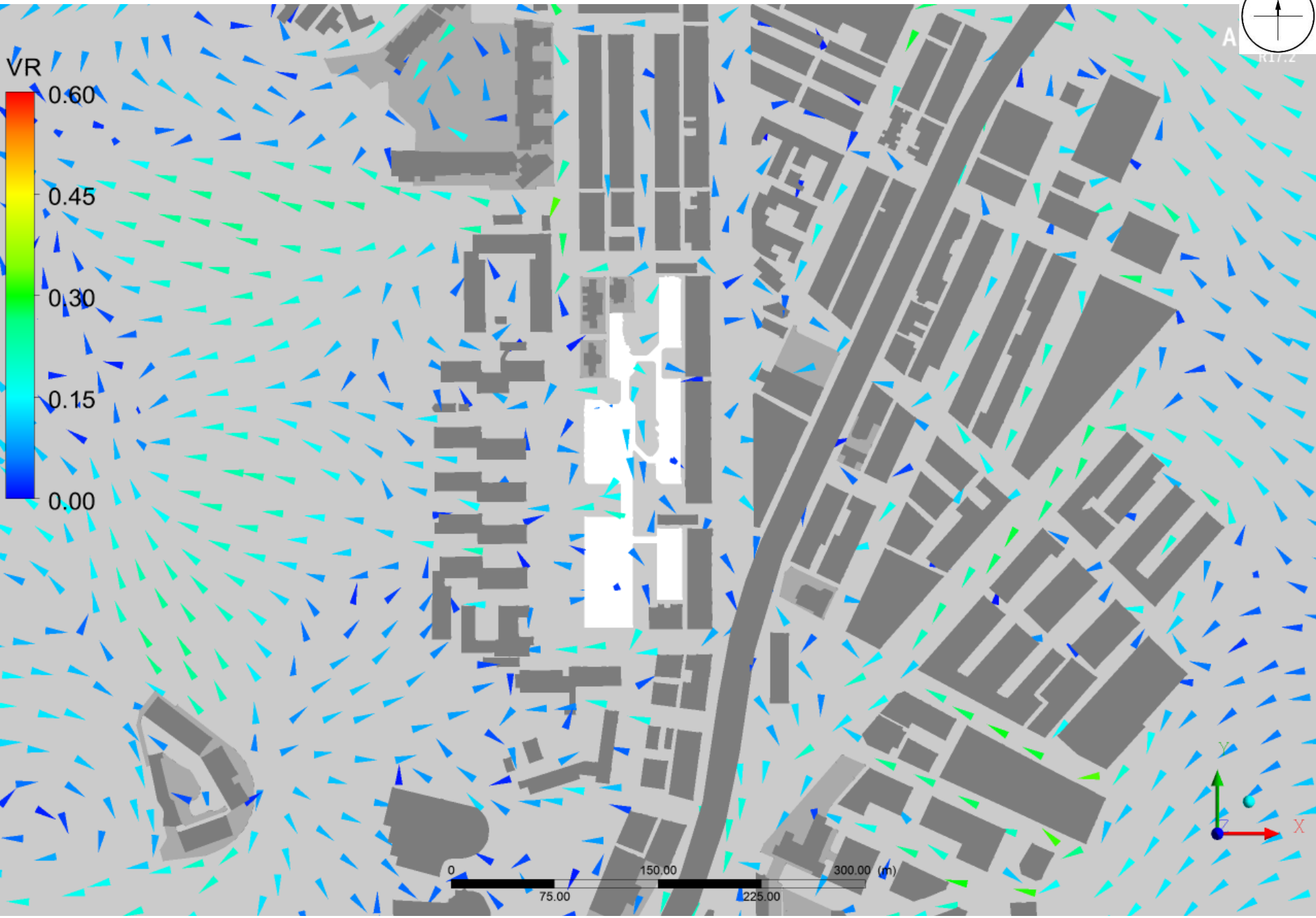
Proposed Scheme - Vector plot at pedestrian level under NNE Wind



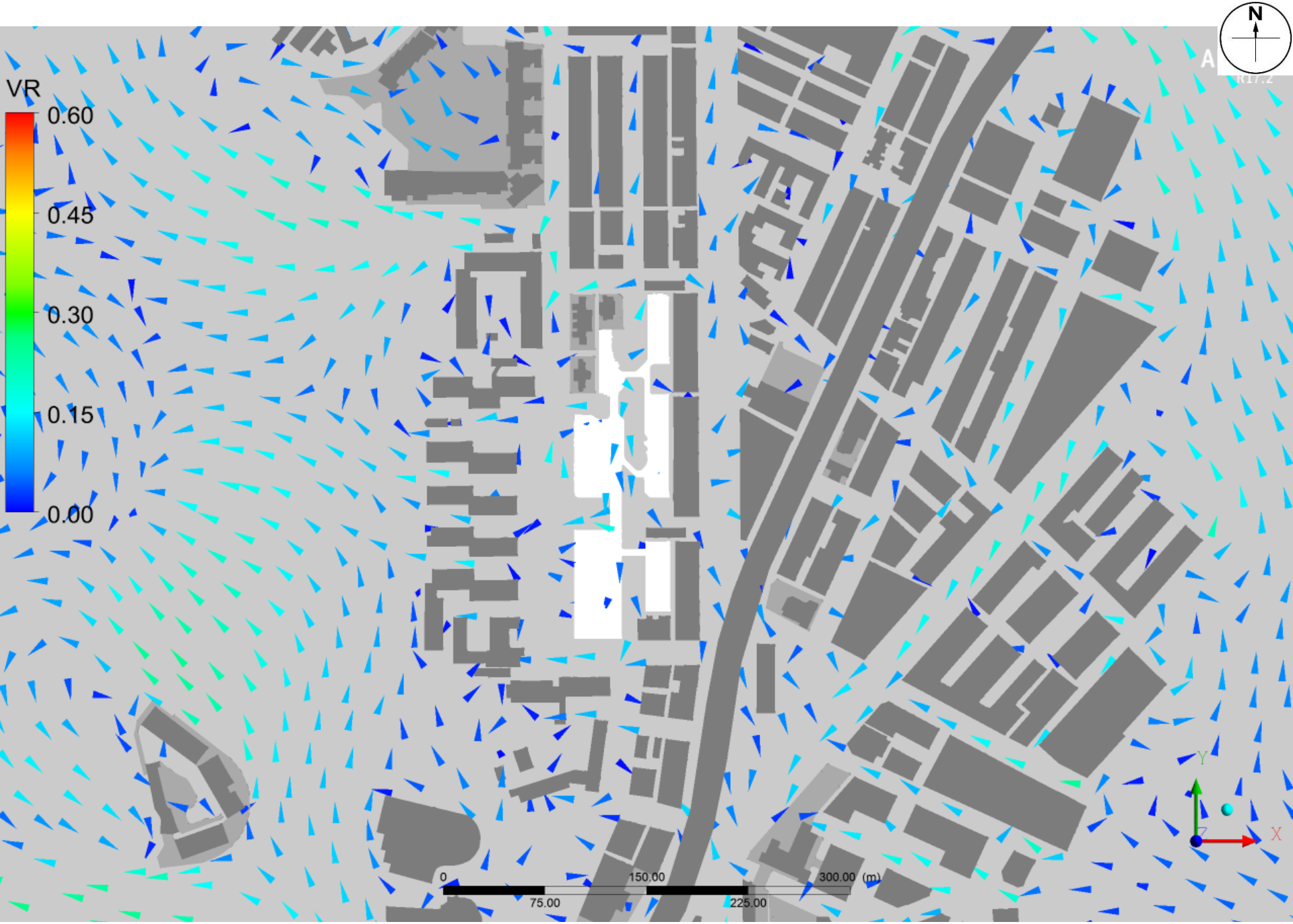
Proposed Scheme - Vector plot at pedestrian level under NE Wind



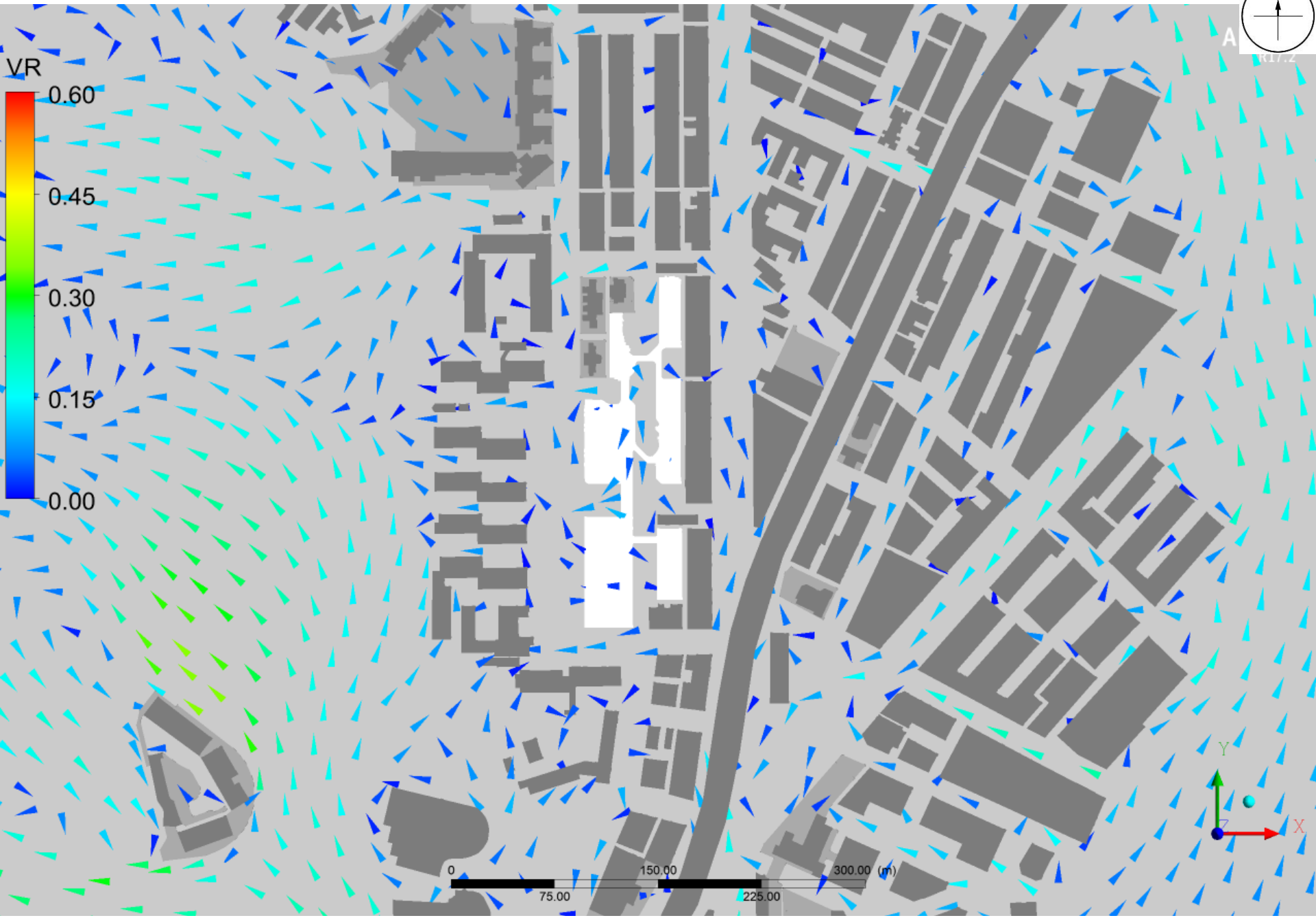
Proposed Scheme - Vector plot at pedestrian level under ENE Wind



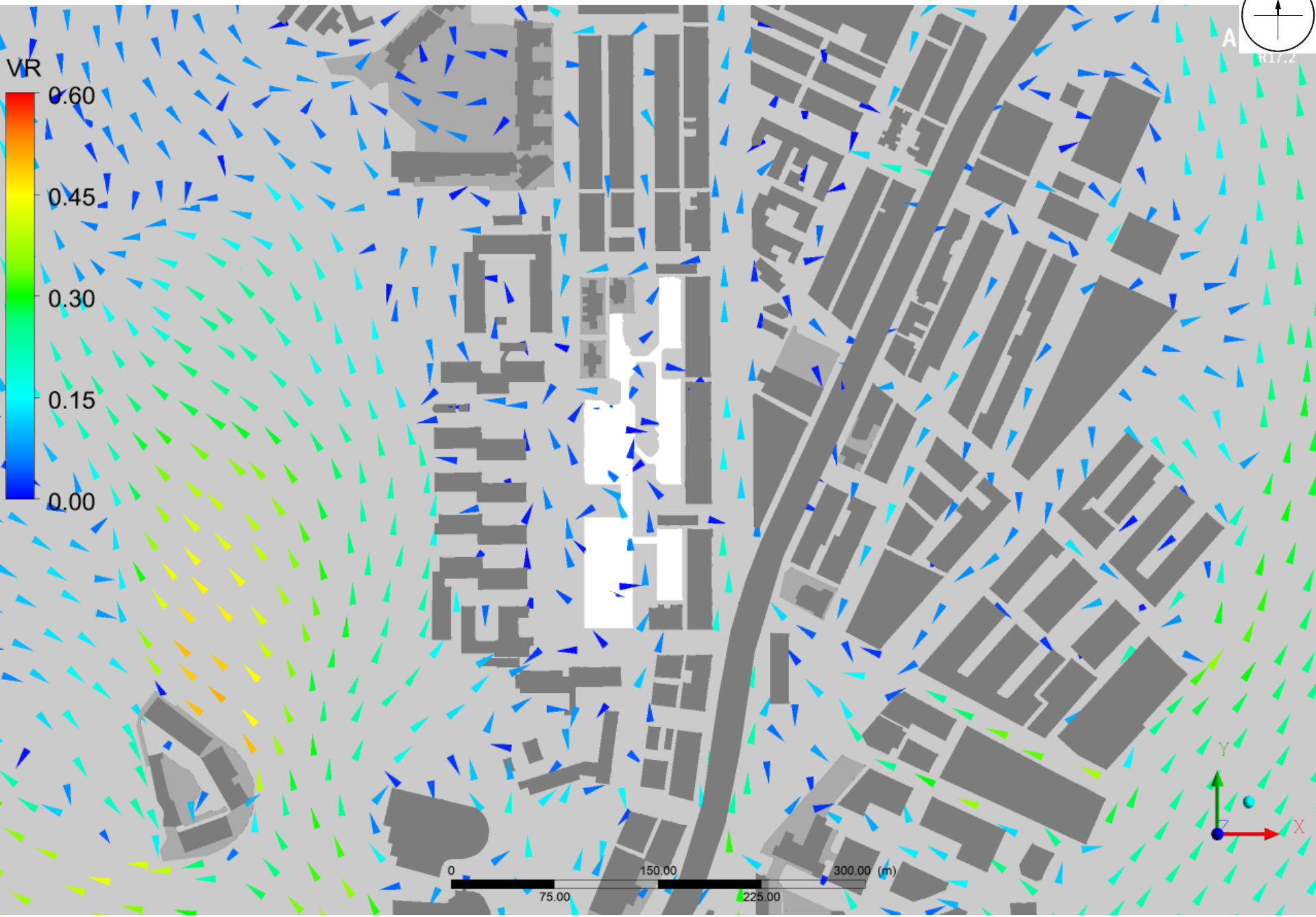
Proposed Scheme - Vector plot at pedestrian level under E Wind



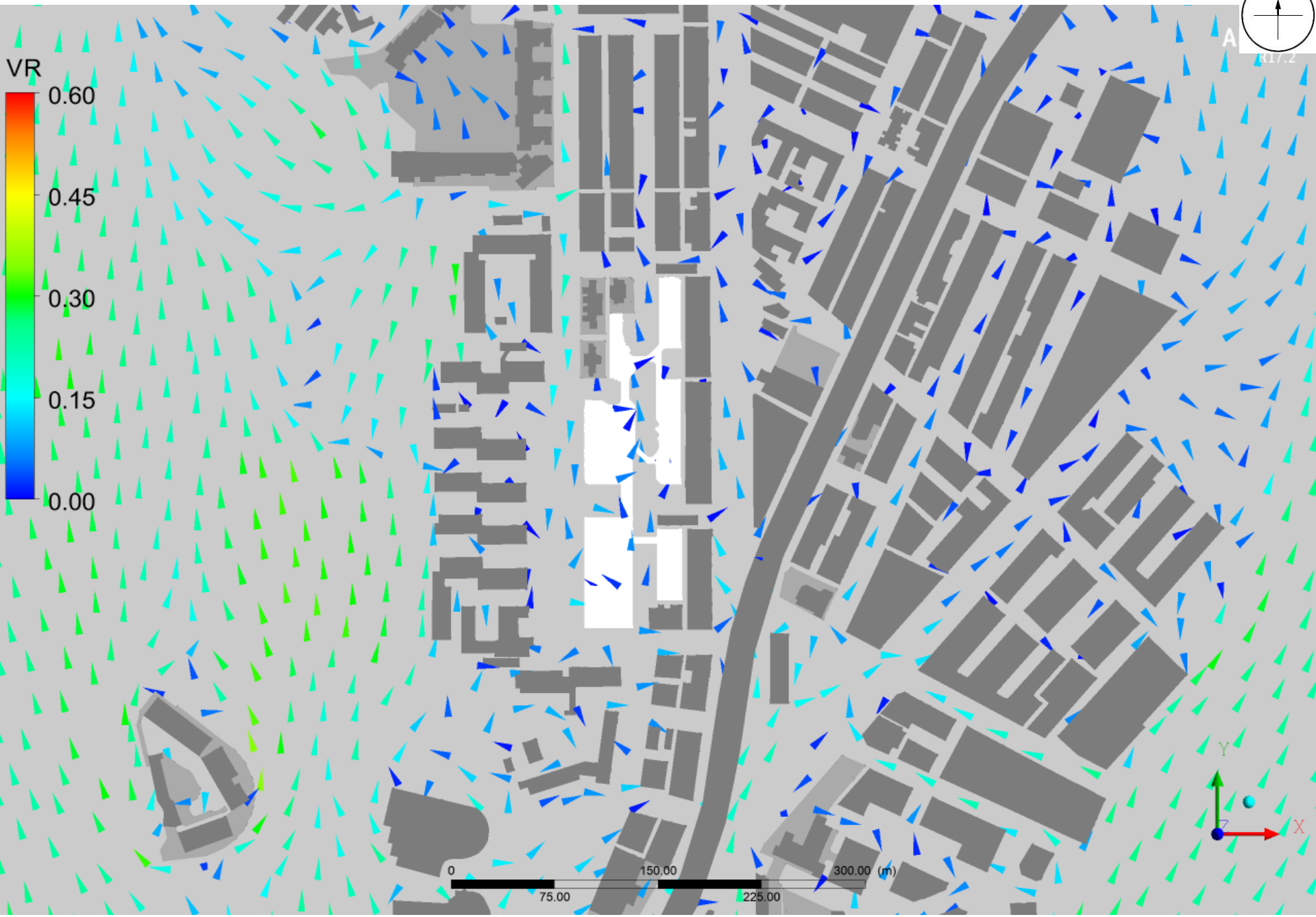
Proposed Scheme - Vector plot at pedestrian level under ESE Wind



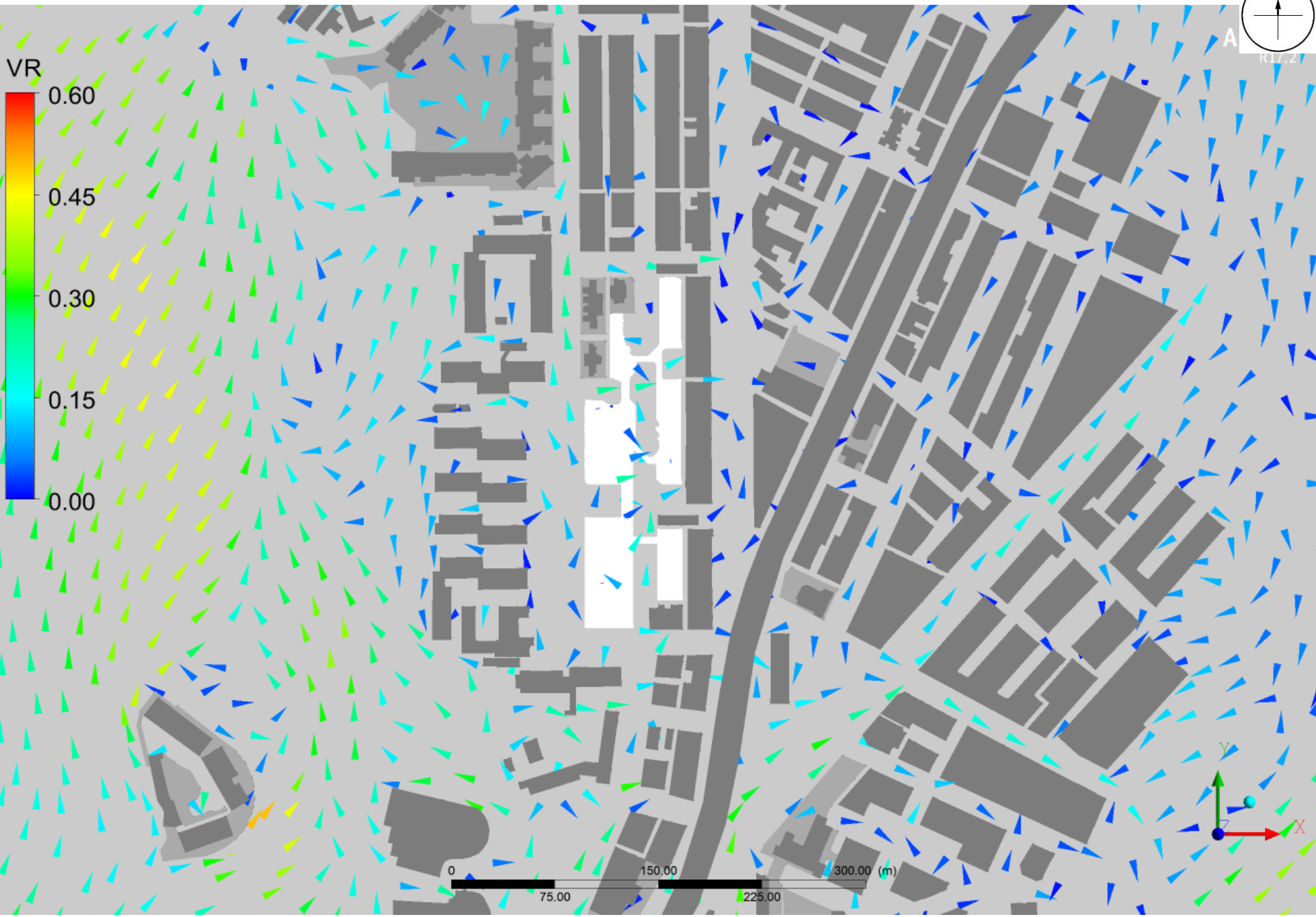
Proposed Scheme - Vector plot at pedestrian level under SE Wind



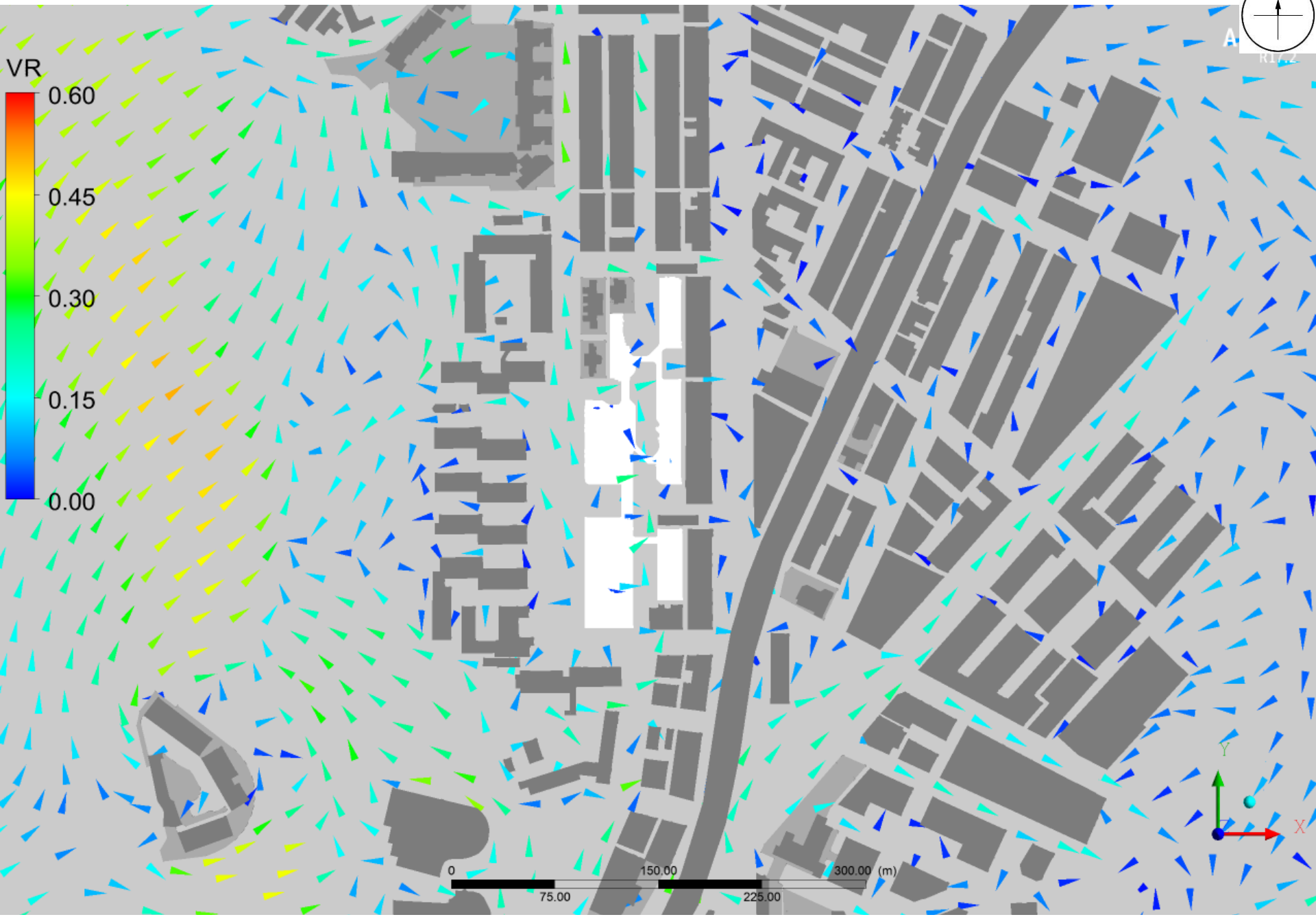
Proposed Scheme - Vector plot at pedestrian level under SSE Wind



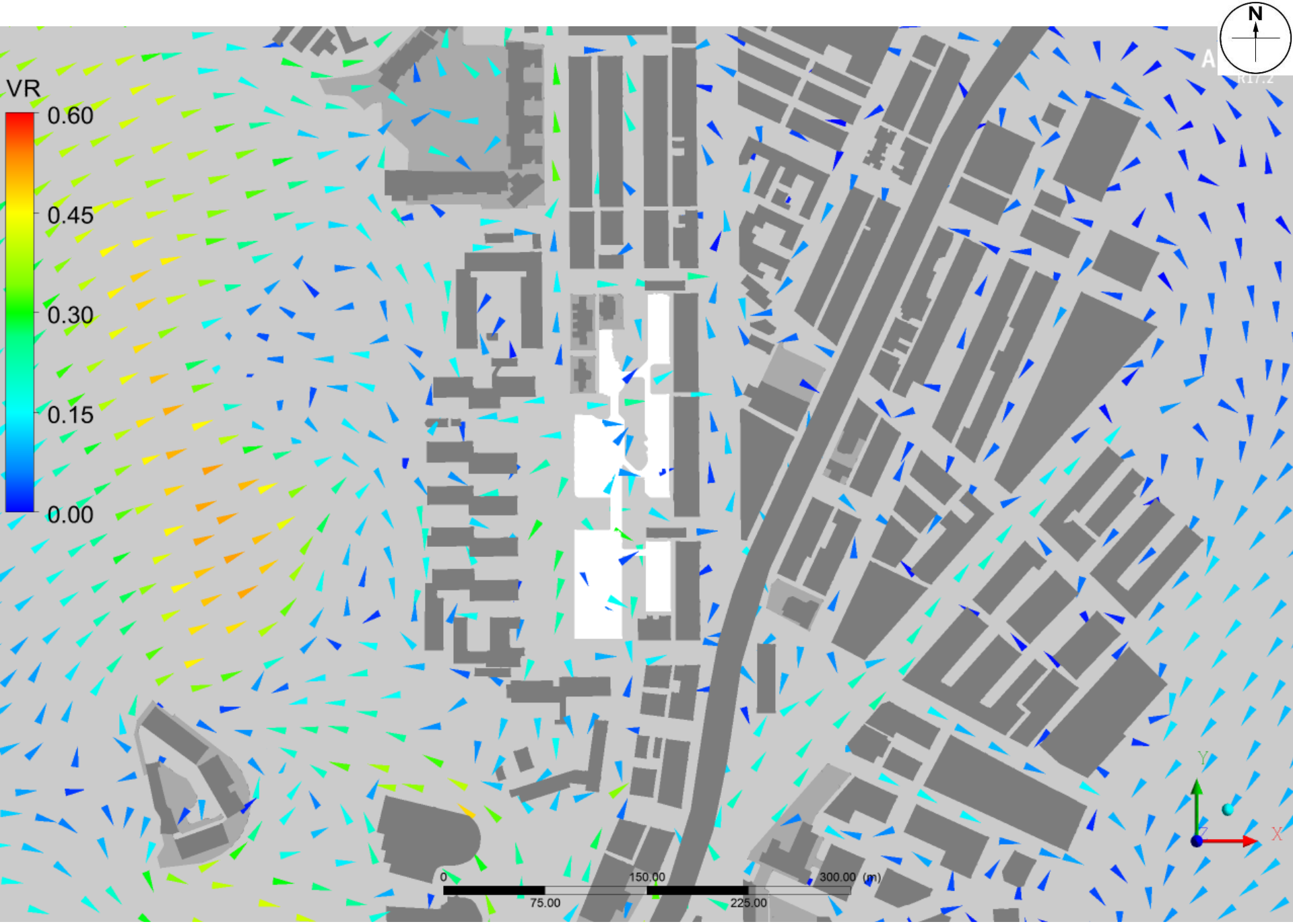
Proposed Scheme - Vector plot at pedestrian level under S Wind



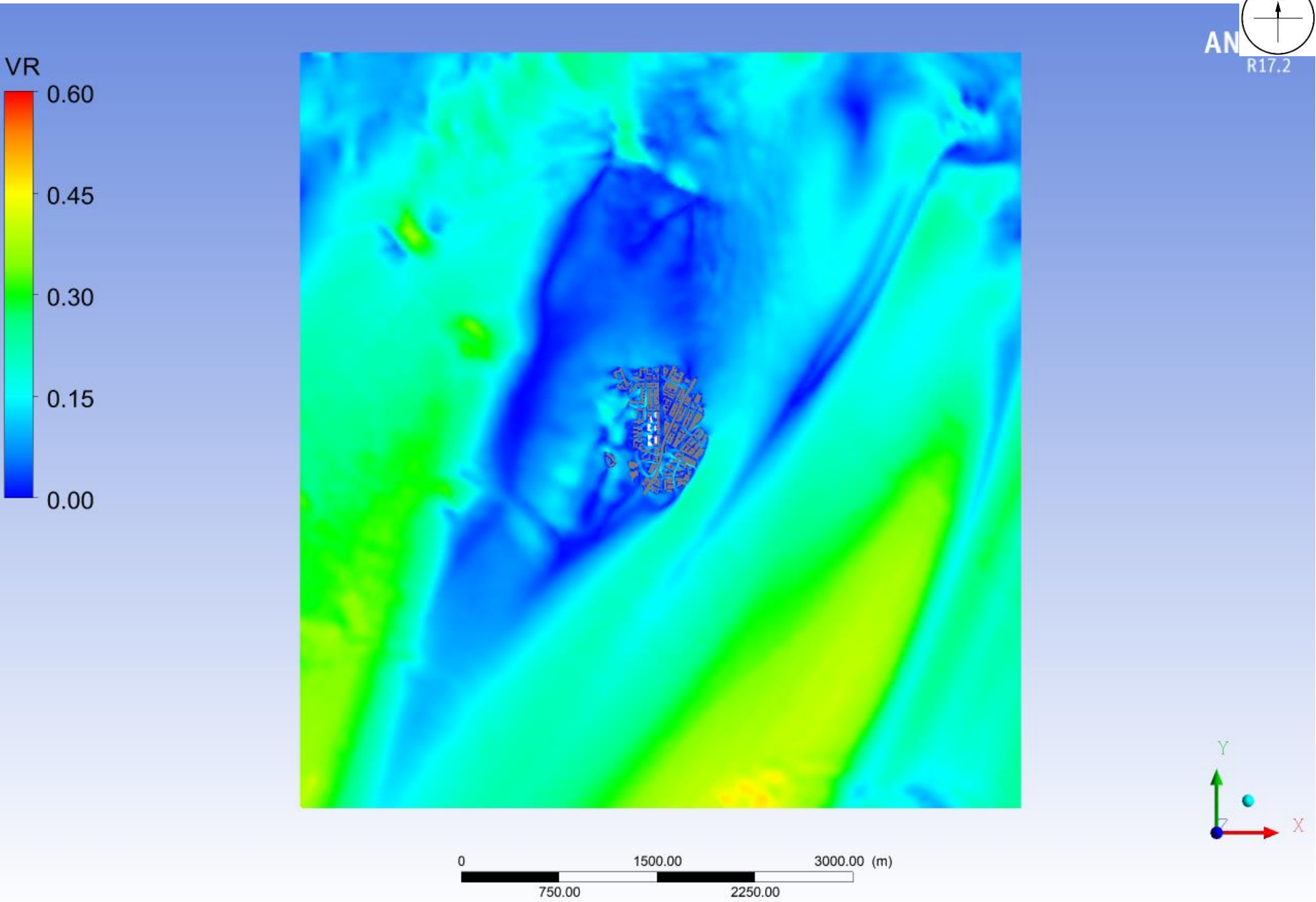
Proposed Scheme - Vector plot at pedestrian level under SSW Wind



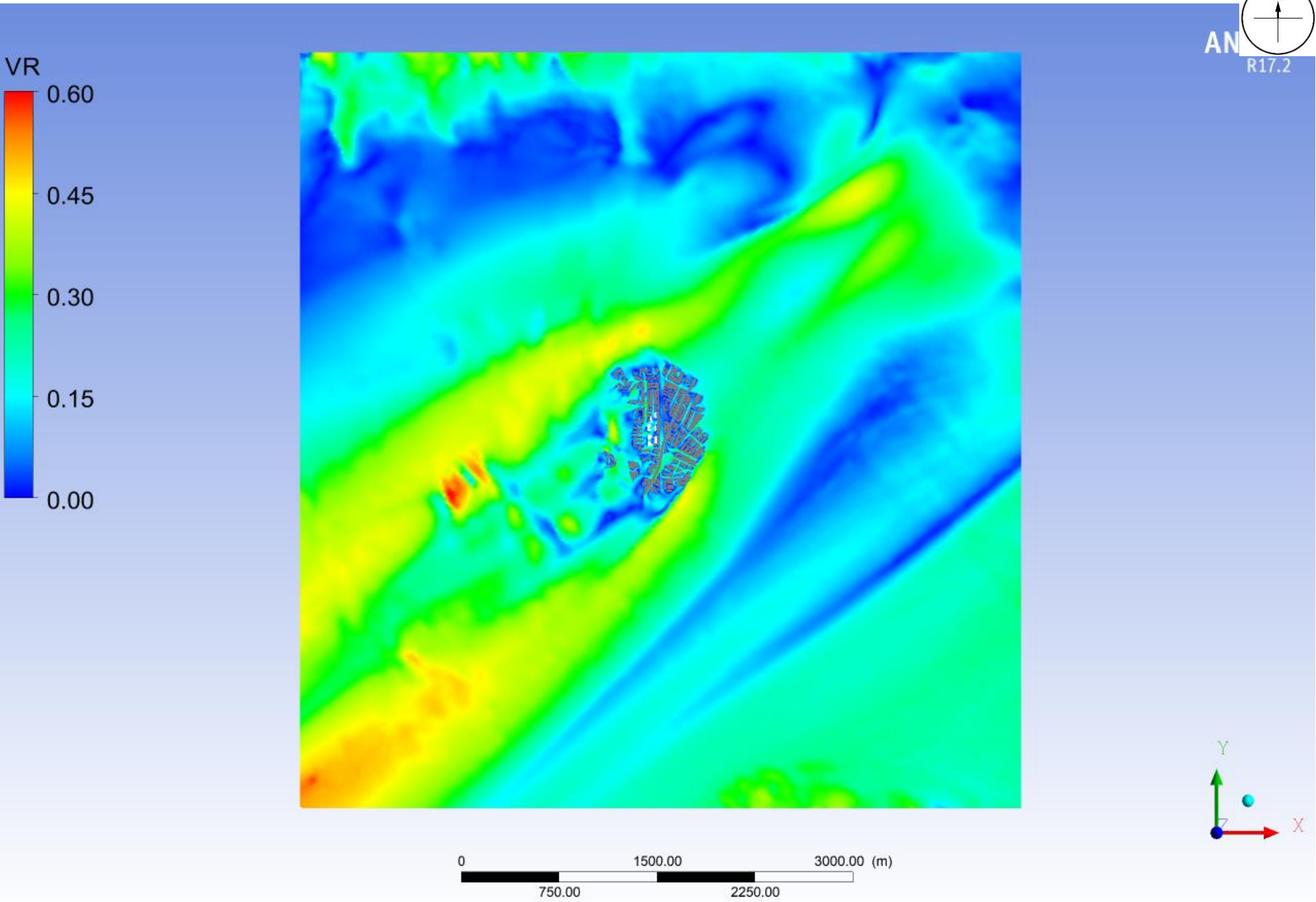
Proposed Scheme - Vector plot at pedestrian level under SW Wind



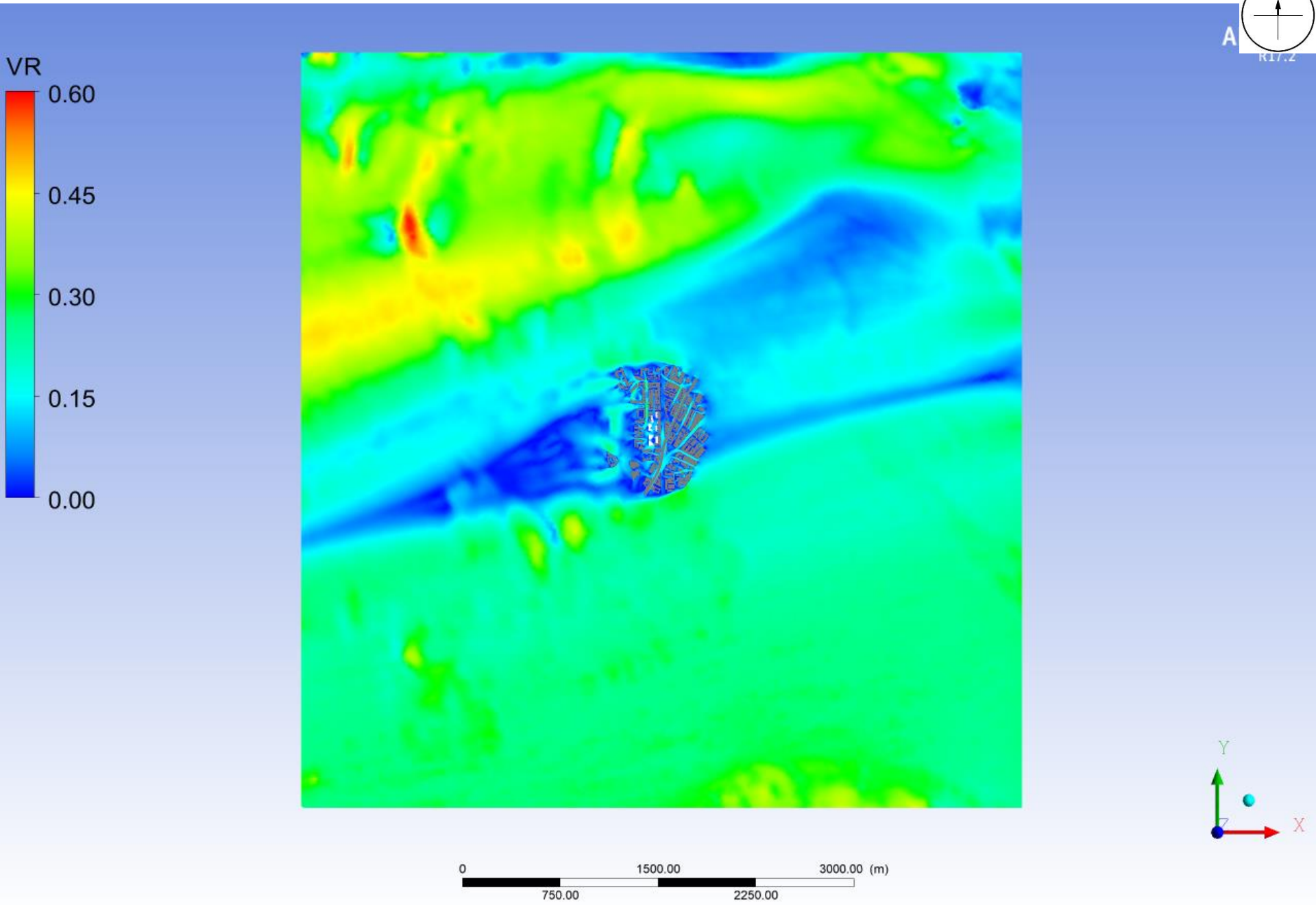
Proposed Scheme - Vector plot at pedestrian level under WSW Wind



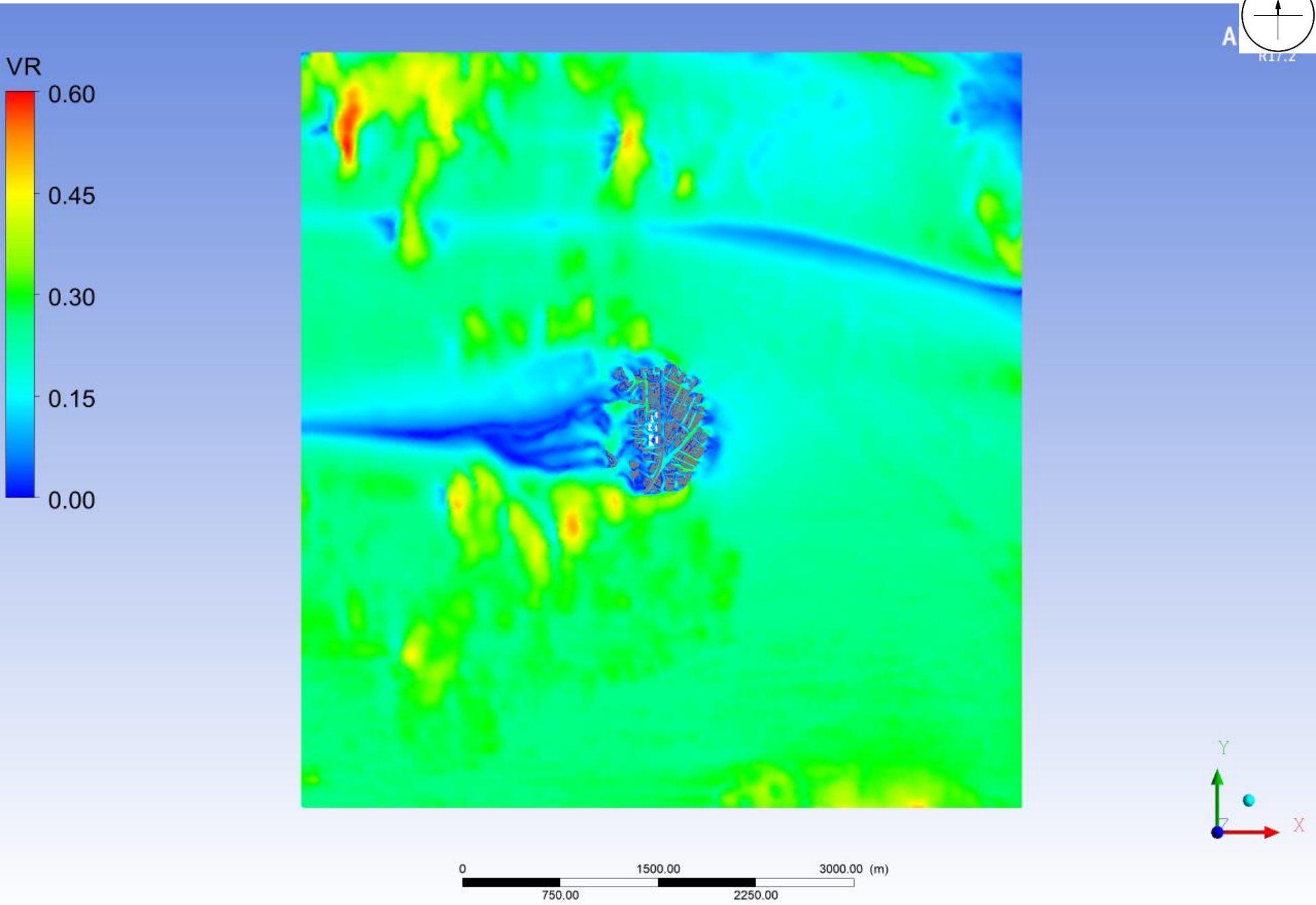
Proposed Scheme - Domain Contour plot at pedestrian level under NNE Wind



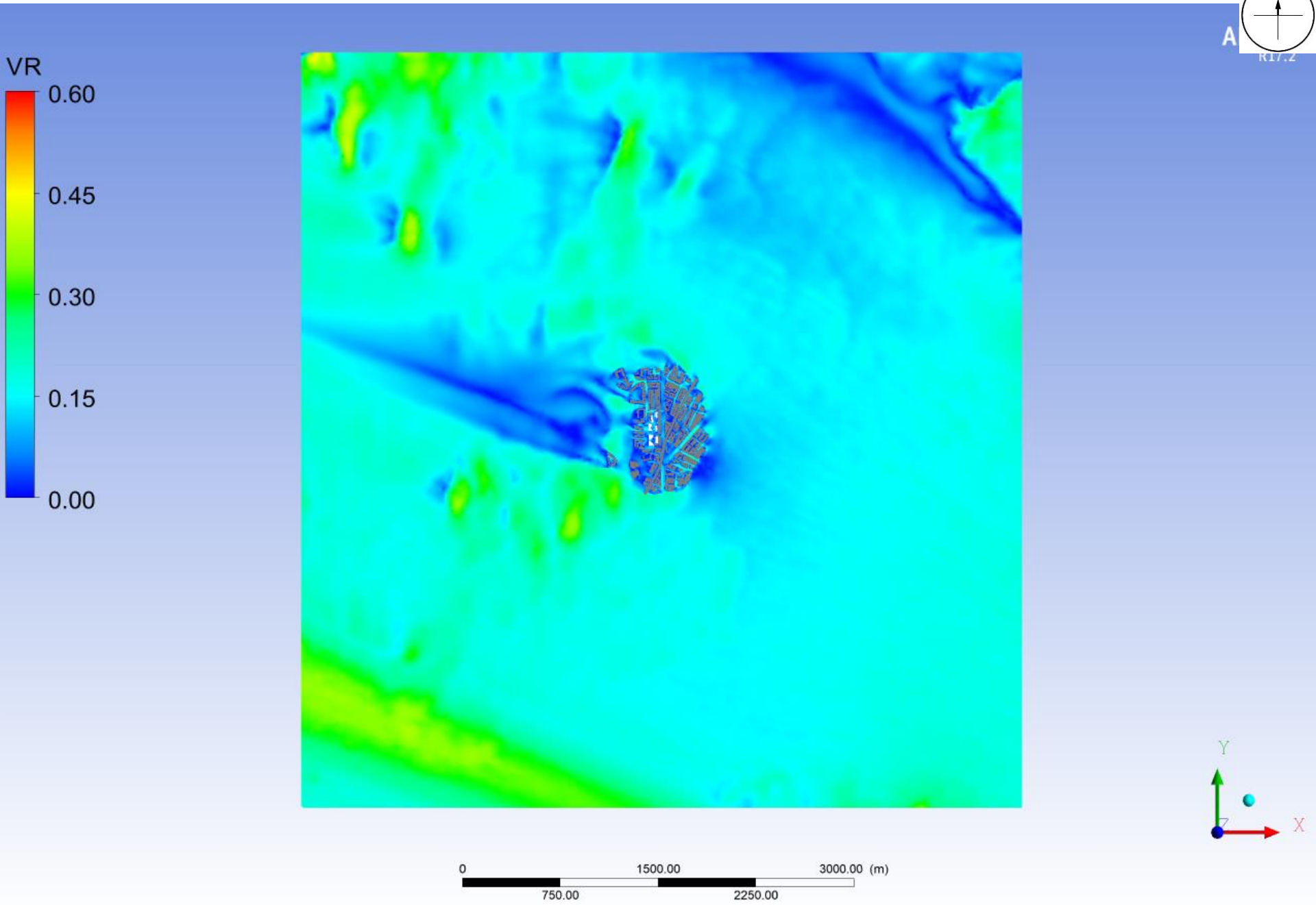
Proposed Scheme - Domain Contour plot at pedestrian level under NE Wind



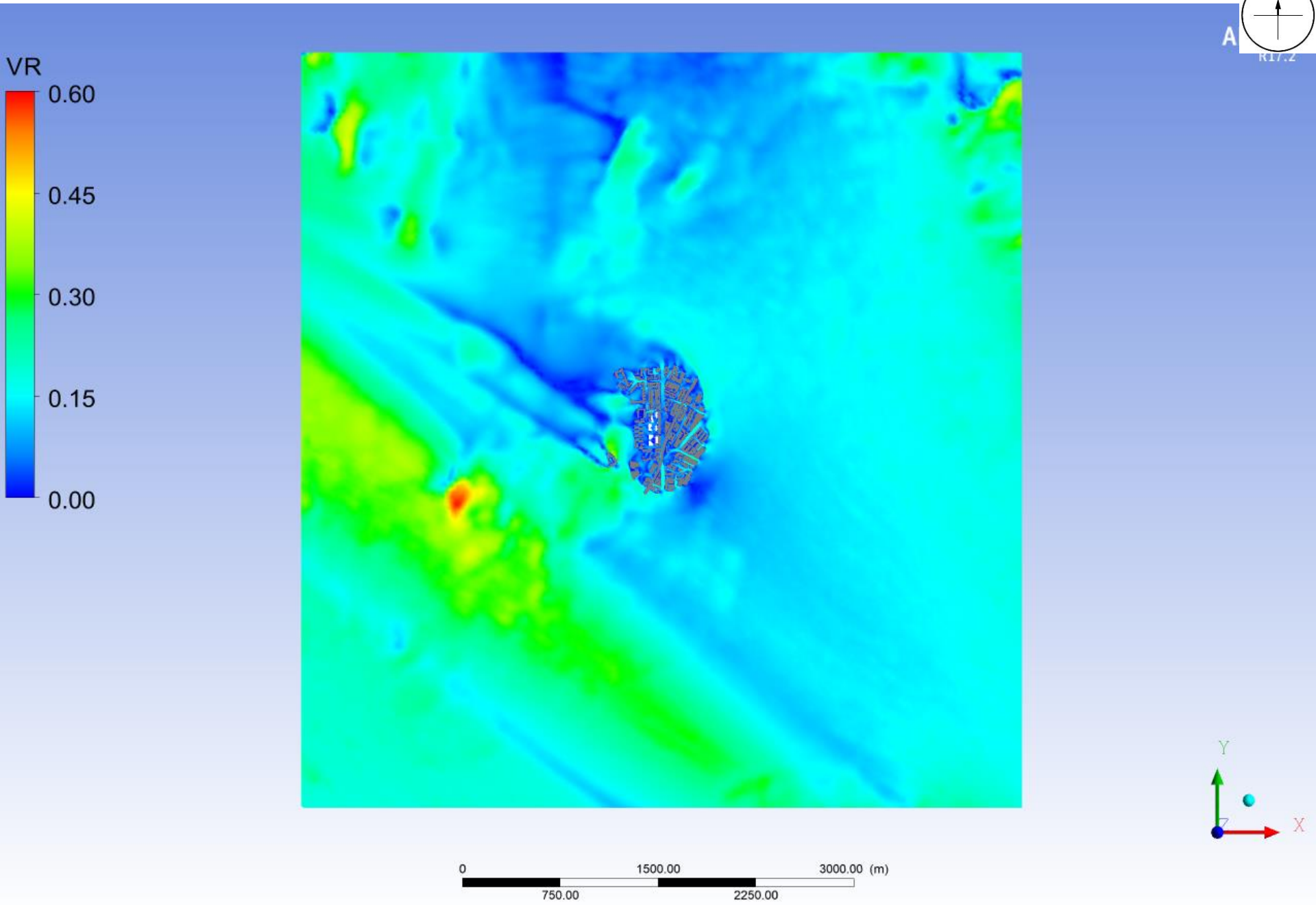
Proposed Scheme - Domain Contour plot at pedestrian level under ENE Wind



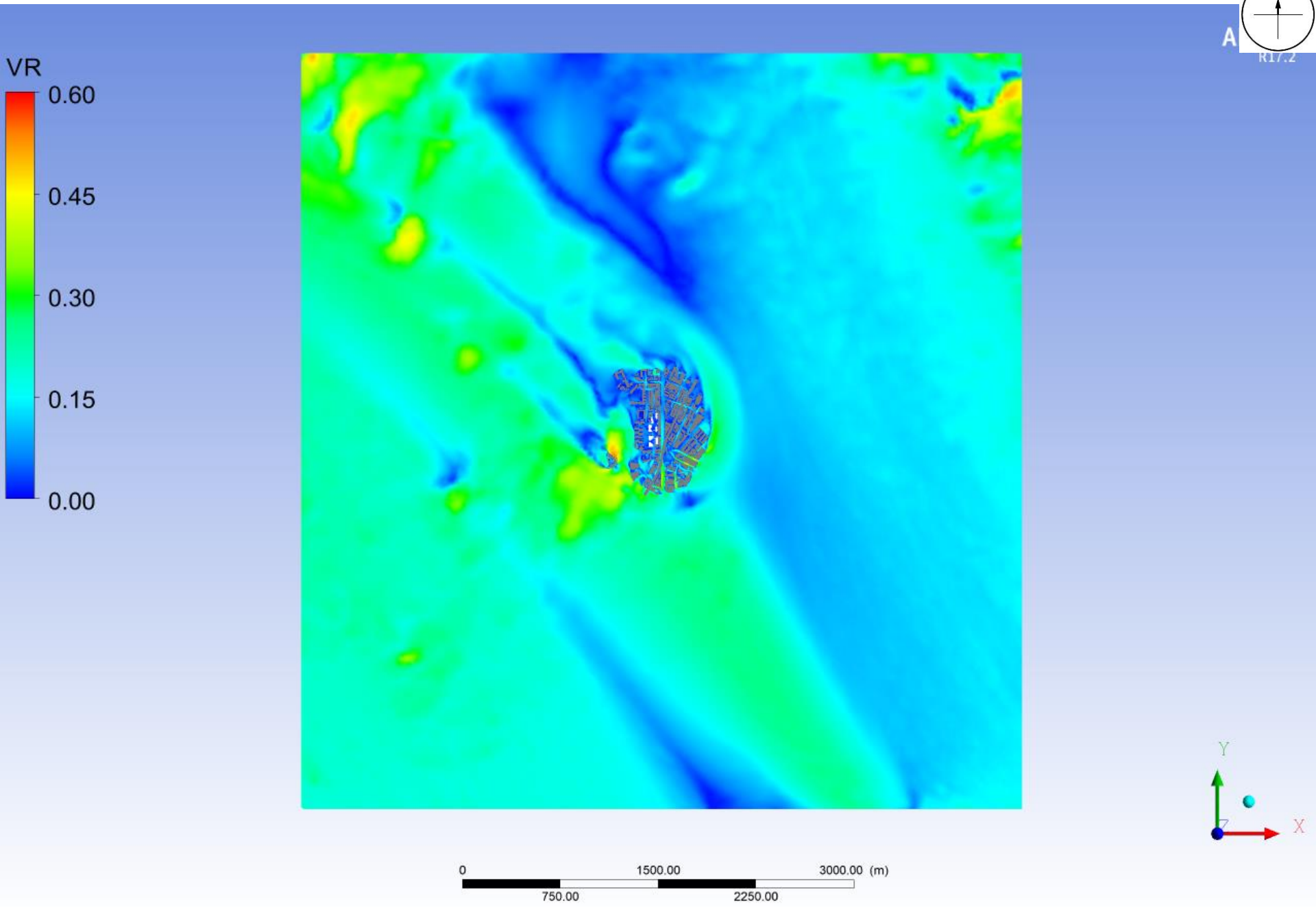
Proposed Scheme - Domain Contour plot at pedestrian level under E Wind



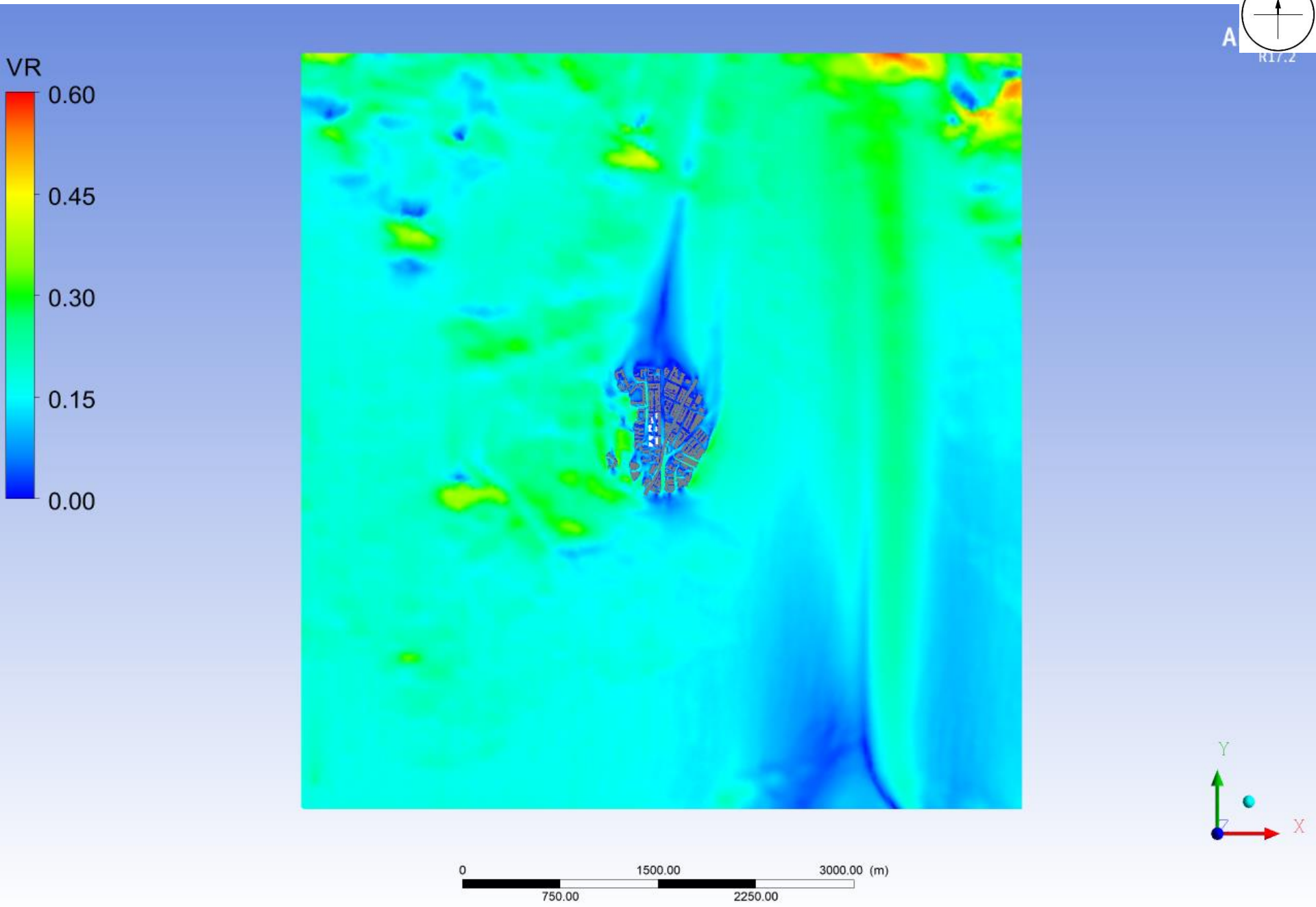
Proposed Scheme - Domain Contour plot at pedestrian level under ESE Wind



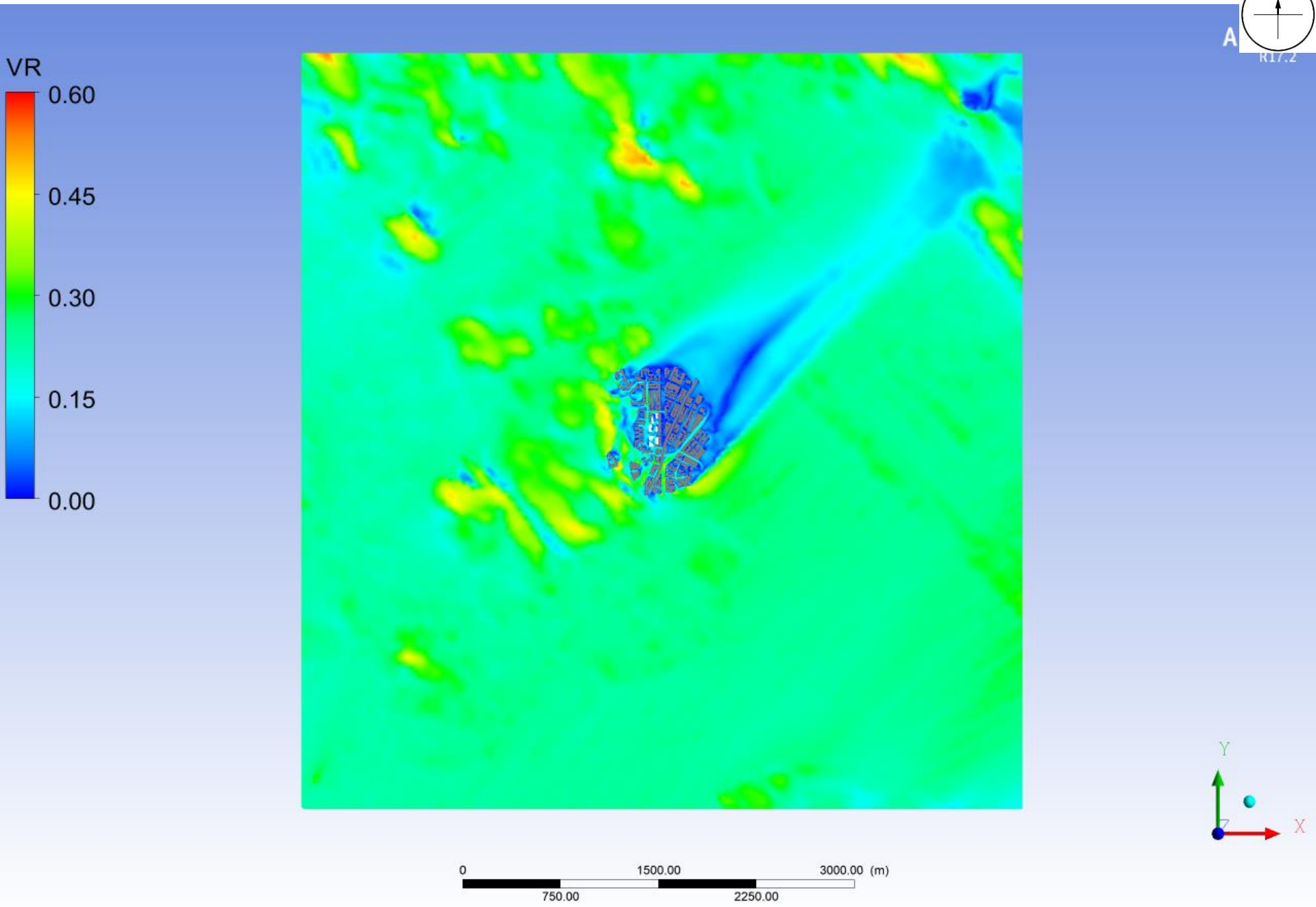
Proposed Scheme - Domain Contour plot at pedestrian level under SE Wind



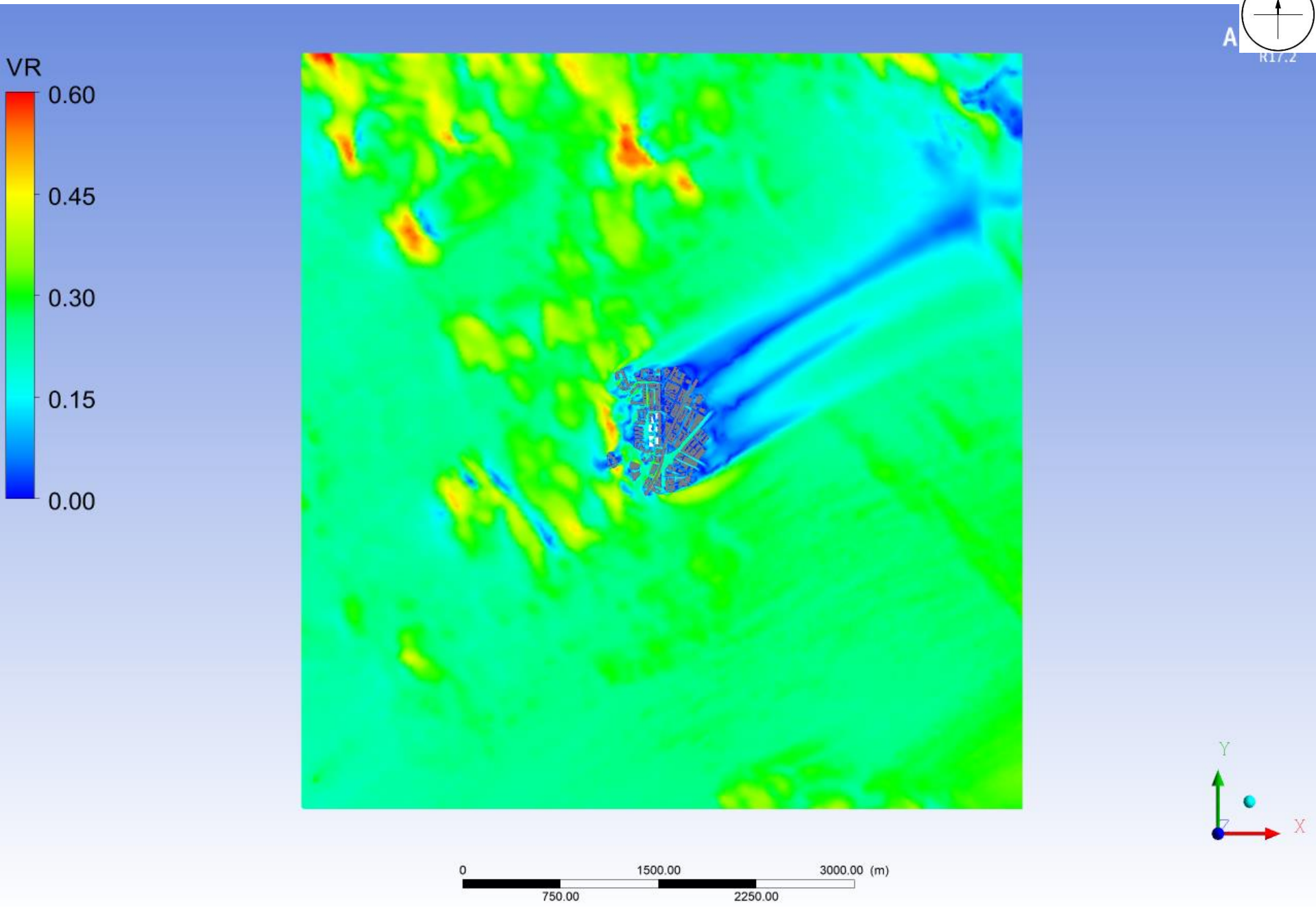
Proposed Scheme - Domain Contour plot at pedestrian level under SSE Wind



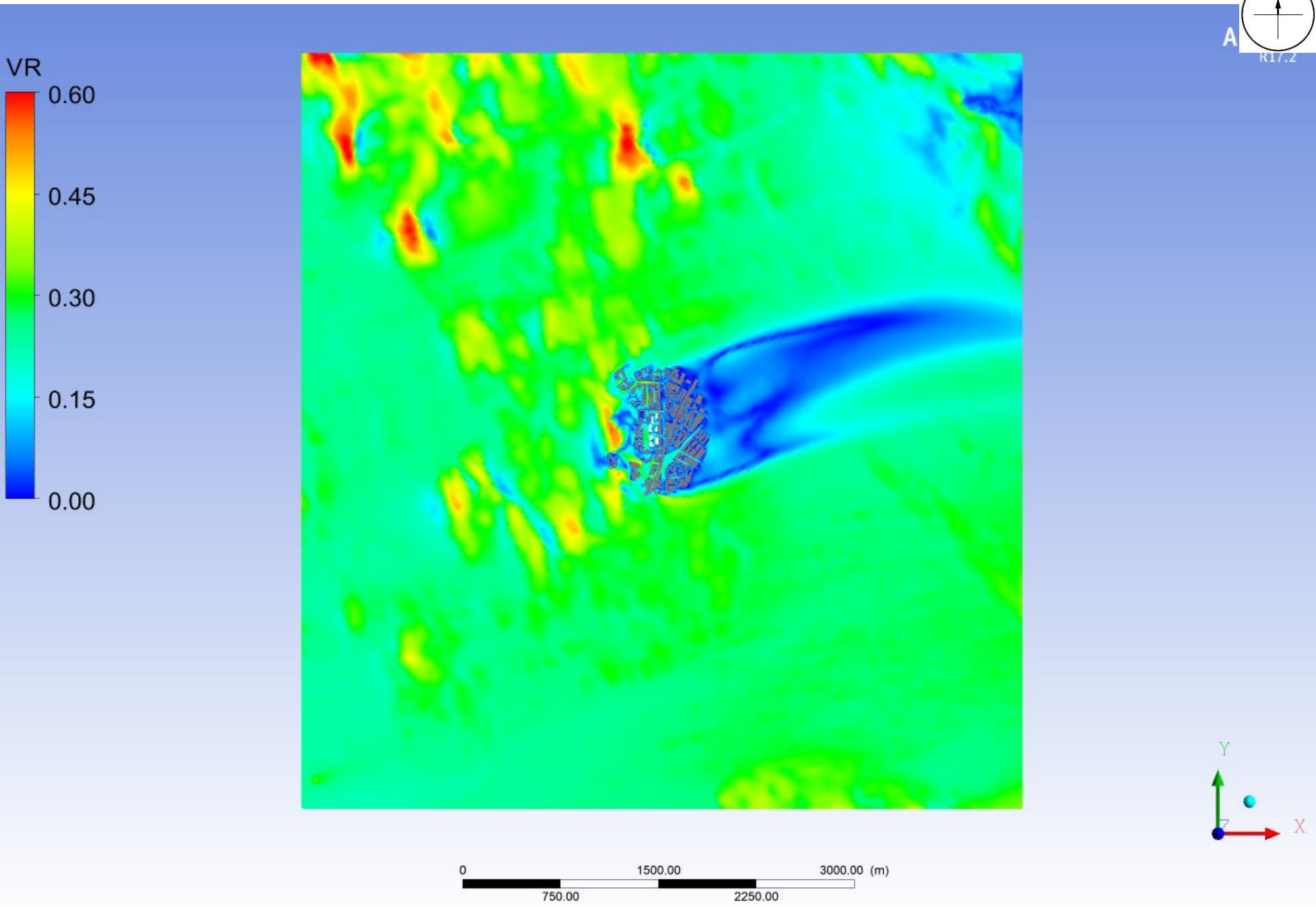
Proposed Scheme - Domain Contour plot at pedestrian level under S Wind



Proposed Scheme - Domain Contour plot at pedestrian level under SSW Wind



Proposed Scheme - Domain Contour plot at pedestrian level under SW Wind



Proposed Scheme - Domain Contour plot at pedestrian level under WSW Wind

Appendix 5

Detailed CFD Simulation Result for Selected Test Points

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
P01	0.03	0.05	0.04	0.03	0.04	0.05	0.04	0.03	0.15	0.19	0.17	0.06	0.10
P02	0.05	0.10	0.13	0.15	0.12	0.07	0.03	0.01	0.04	0.02	0.09	0.10	0.06
P03	0.04	0.09	0.14	0.13	0.10	0.06	0.04	0.02	0.06	0.05	0.11	0.10	0.07
P04	0.01	0.02	0.15	0.03	0.02	0.01	0.01	0.03	0.08	0.01	0.17	0.04	0.05
P05	0.01	0.04	0.14	0.12	0.09	0.07	0.03	0.02	0.04	0.02	0.09	0.09	0.06
P06	0.02	0.12	0.16	0.05	0.02	0.08	0.02	0.03	0.03	0.02	0.12	0.06	0.04
P07	0.01	0.04	0.04	0.01	0.01	0.06	0.02	0.03	0.00	0.03	0.14	0.02	0.03
P08	0.03	0.10	0.13	0.14	0.09	0.08	0.03	0.02	0.01	0.06	0.11	0.10	0.06
P09	0.03	0.16	0.19	0.19	0.13	0.10	0.04	0.00	0.01	0.03	0.14	0.13	0.07
P10	0.06	0.14	0.13	0.11	0.08	0.04	0.01	0.03	0.11	0.11	0.05	0.10	0.07
P11	0.04	0.04	0.05	0.04	0.04	0.01	0.02	0.01	0.03	0.07	0.06	0.04	0.04
P12	0.04	0.09	0.09	0.07	0.05	0.02	0.02	0.02	0.04	0.07	0.05	0.07	0.05
P13	0.06	0.14	0.12	0.11	0.08	0.04	0.01	0.03	0.06	0.08	0.06	0.10	0.06
P14	0.03	0.04	0.05	0.06	0.05	0.02	0.03	0.02	0.11	0.05	0.07	0.05	0.06
P15	0.07	0.09	0.07	0.12	0.06	0.06	0.05	0.04	0.09	0.07	0.06	0.08	0.07
P16	0.08	0.08	0.04	0.12	0.06	0.06	0.07	0.03	0.07	0.08	0.02	0.08	0.07
P17	0.08	0.12	0.04	0.15	0.09	0.08	0.08	0.12	0.10	0.11	0.16	0.10	0.11
P18	0.02	0.09	0.07	0.05	0.08	0.06	0.06	0.08	0.14	0.12	0.22	0.07	0.11
P19	0.04	0.09	0.04	0.03	0.04	0.04	0.06	0.07	0.06	0.07	0.23	0.05	0.08
P20	0.03	0.13	0.06	0.11	0.05	0.01	0.09	0.12	0.17	0.17	0.23	0.09	0.13
P21	0.11	0.22	0.16	0.20	0.15	0.07	0.05	0.11	0.24	0.26	0.22	0.18	0.18
P22	0.02	0.08	0.02	0.08	0.03	0.01	0.03	0.08	0.21	0.22	0.22	0.07	0.13
P23	0.01	0.04	0.05	0.07	0.03	0.03	0.04	0.07	0.23	0.25	0.16	0.08	0.13
P24	0.02	0.05	0.08	0.11	0.07	0.05	0.05	0.02	0.22	0.24	0.04	0.10	0.12
P25	0.03	0.05	0.03	0.09	0.07	0.07	0.01	0.09	0.20	0.22	0.08	0.08	0.12
P26	0.01	0.03	0.05	0.05	0.06	0.09	0.04	0.11	0.18	0.20	0.07	0.07	0.11
P27	0.02	0.06	0.03	0.04	0.04	0.02	0.02	0.01	0.06	0.05	0.02	0.04	0.04
P28	0.04	0.13	0.09	0.10	0.06	0.05	0.02	0.01	0.12	0.11	0.05	0.09	0.07
P29	0.05	0.14	0.10	0.13	0.07	0.07	0.03	0.01	0.18	0.16	0.13	0.11	0.11
P30	0.03	0.10	0.07	0.12	0.06	0.09	0.09	0.04	0.05	0.05	0.07	0.08	0.07
Average SVR	**0.04**	**0.09**	**0.09**	**0.09**	**0.06**	**0.05**	**0.04**	**0.04**	**0.10**	**0.11**	**0.11**	**0.08**	**0.08**
T01	0.10	0.20	0.15	0.18	0.10	0.03	0.05	0.20	0.13	0.26	0.19	0.15	0.15
T02	0.05	0.16	0.11	0.15	0.10	0.10	0.06	0.15	0.10	0.18	0.14	0.12	0.13
T03	0.04	0.05	0.06	0.05	0.03	0.16	0.10	0.30	0.22	0.14	0.15	0.07	0.15
T04	0.08	0.09	0.08	0.08	0.05	0.15	0.02	0.29	0.21	0.22	0.13	0.10	0.16
T05	0.03	0.11	0.02	0.02	0.05	0.07	0.02	0.05	0.02	0.03	0.05	0.04	0.04
T06	0.05	0.09	0.05	0.03	0.02	0.02	0.03	0.02	0.14	0.15	0.16	0.06	0.08
T07	0.07	0.21	0.10	0.22	0.14	0.08	0.05	0.01	0.20	0.23	0.16	0.16	0.15
T08	0.01	0.11	0.07	0.06	0.05	0.05	0.02	0.05	0.20	0.24	0.24	0.09	0.13
T09	0.02	0.15	0.14	0.14	0.05	0.06	0.02	0.04	0.19	0.21	0.29	0.12	0.14
T10	0.05	0.06	0.07	0.09	0.08	0.07	0.11	0.14	0.07	0.08	0.25	0.08	0.11
T11	0.02	0.07	0.07	0.08	0.10	0.05	0.06	0.01	0.03	0.04	0.08	0.07	0.06
T12	0.08	0.20	0.13	0.13	0.09	0.03	0.03	0.03	0.02	0.03	0.05	0.10	0.05
T13	0.02	0.10	0.09	0.05	0.02	0.02	0.02	0.05	0.02	0.03	0.09	0.05	0.04
T14	0.05	0.09	0.09	0.05	0.02	0.04	0.02	0.17	0.18	0.27	0.27	0.08	0.14
T15	0.09	0.24	0.20	0.19	0.08	0.07	0.10	0.23	0.29	0.35	0.34	0.18	0.22
T16	0.13	0.31	0.25	0.28	0.15	0.11	0.08	0.23	0.19	0.29	0.20	0.23	0.20
T17	0.01	0.24	0.21	0.25	0.14	0.11	0.14	0.19	0.14	0.13	0.15	0.18	0.15
T18	0.10	0.35	0.29	0.32	0.21	0.15	0.13	0.17	0.23	0.16	0.05	0.25	0.18
T19	0.01	0.08	0.18	0.07	0.12	0.12	0.09	0.12	0.18	0.19	0.04	0.11	0.12
T20	0.03	0.20	0.23	0.22	0.15	0.12	0.12	0.13	0.20	0.22	0.12	0.19	0.17
T21	0.01	0.13	0.15	0.12	0.04	0.07	0.04	0.04	0.23	0.25	0.18	0.12	0.14
T22	0.10	0.21	0.14	0.18	0.15	0.06	0.05	0.09	0.21	0.25	0.28	0.17	0.17
T23	0.01	0.02	0.03	0.11	0.08	0.06	0.05	0.10	0.14	0.16	0.26	0.08	0.13
T24	0.06	0.05	0.04	0.11	0.07	0.06	0.02	0.05	0.20	0.19	0.19	0.09	0.12
T25	0.06	0.12	0.11	0.11	0.12	0.15	0.03	0.22	0.16	0.11	0.08	0.12	0.13
T26	0.06	0.10	0.10	0.09	0.11	0.15	0.07	0.22	0.16	0.13	0.10	0.11	0.13
T27	0.01	0.07	0.06	0.07	0.07	0.03	0.05	0.03	0.06	0.21	0.23	0.07	0.10
T28	0.02	0.06	0.06	0.10	0.08	0.04	0.11	0.03	0.07	0.23	0.24	0.08	0.12
T29	0.02	0.08	0.08	0.12	0.08	0.03	0.11	0.02	0.03	0.12	0.12	0.08	0.08
T30	0.02	0.09	0.09	0.10	0.06	0.03	0.08	0.03	0.03	0.04	0.03	0.07	0.05
T31	0.01	0.08	0.09	0.08	0.09	0.05	0.06	0.02	0.03	0.10	0.09	0.07	0.07
T32	0.06	0.08	0.05	0.09	0.11	0.07	0.07	0.03	0.20	0.21	0.20	0.10	0.14
T33	0.02	0.05	0.02	0.05	0.02	0.05	0.08	0.03	0.19	0.15	0.21	0.06	0.11
T34	0.02	0.02	0.04	0.09	0.07	0.06	0.06	0.02	0.11	0.10	0.06	0.07	0.08
T35	0.04	0.03	0.05	0.10	0.05	0.02	0.03	0.04	0.06	0.08	0.06	0.06	0.06
T36	0.01	0.04	0.02	0.09	0.04	0.03	0.03	0.02	0.04	0.06	0.02	0.05	0.04
T37	0.04	0.01	0.02	0.13	0.05	0.07	0.08	0.05	0.04	0.09	0.02	0.07	0.07
T38	0.04	0.08	0.05	0.11	0.04	0.07	0.06	0.02	0.03	0.06	0.02	0.07	0.05
T39	0.03	0.07	0.05	0.03	0.03	0.09	0.10	0.03	0.08	0.04	0.03	0.05	0.05
T40	0.02	0.02	0.03	0.06	0.06	0.09	0.04	0.03	0.07	0.07	0.06	0.05	0.06
T41	0.01	0.05	0.04	0.05	0.02	0.05	0.04	0.04	0.11	0.03	0.06	0.04	0.05
T42	0.02	0.03	0.05	0.08	0.10	0.03	0.06	0.02	0.04	0.02	0.15	0.06	0.06
T43	0.03	0.03	0.04	0.08	0.10	0.02	0.10	0.04	0.03	0.02	0.04	0.06	0.05

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T44	0.03	0.06	0.09	0.11	0.13	0.02	0.08	0.02	0.03	0.04	0.04	0.08	0.06
T45	0.02	0.06	0.12	0.10	0.09	0.01	0.09	0.05	0.02	0.04	0.02	0.07	0.05
T46	0.01	0.03	0.05	0.04	0.05	0.05	0.13	0.06	0.10	0.01	0.11	0.04	0.07
T47	0.03	0.07	0.09	0.05	0.03	0.02	0.05	0.02	0.03	0.06	0.03	0.05	0.04
T48	0.07	0.18	0.13	0.10	0.08	0.08	0.08	0.06	0.02	0.03	0.02	0.10	0.05
T49	0.03	0.14	0.09	0.11	0.05	0.11	0.09	0.04	0.06	0.07	0.02	0.09	0.07
T50	0.09	0.20	0.09	0.12	0.07	0.04	0.03	0.02	0.22	0.23	0.14	0.12	0.13
T51	0.04	0.10	0.09	0.10	0.12	0.16	0.14	0.20	0.14	0.15	0.10	0.11	0.14
T52	0.03	0.02	0.04	0.08	0.04	0.08	0.06	0.02	0.01	0.07	0.02	0.05	0.05
T53	0.03	0.08	0.15	0.20	0.09	0.07	0.14	0.03	0.06	0.01	0.07	0.11	0.08
T54	0.02	0.04	0.03	0.08	0.08	0.08	0.09	0.03	0.06	0.04	0.06	0.06	0.06
T55	0.02	0.01	0.07	0.14	0.03	0.01	0.06	0.01	0.08	0.06	0.08	0.07	0.06
T56	0.02	0.21	0.20	0.26	0.05	0.11	0.12	0.07	0.08	0.07	0.04	0.16	0.10
T57	0.03	0.07	0.03	0.11	0.03	0.02	0.01	0.04	0.06	0.10	0.02	0.06	0.05
T58	0.05	0.13	0.13	0.17	0.09	0.06	0.03	0.10	0.03	0.07	0.05	0.11	0.07
T59	0.04	0.02	0.04	0.03	0.01	0.03	0.02	0.03	0.03	0.03	0.06	0.03	0.03
T60	0.03	0.09	0.09	0.14	0.05	0.08	0.14	0.11	0.07	0.02	0.07	0.09	0.08
T61	0.02	0.07	0.10	0.05	0.02	0.05	0.02	0.02	0.01	0.04	0.06	0.05	0.03
T62	0.05	0.03	0.04	0.07	0.05	0.06	0.06	0.04	0.03	0.02	0.03	0.05	0.04
T63	0.05	0.10	0.12	0.10	0.08	0.08	0.11	0.02	0.06	0.02	0.06	0.08	0.06
T64	0.03	0.03	0.02	0.04	0.02	0.08	0.12	0.08	0.04	0.04	0.09	0.04	0.06
T65	0.01	0.13	0.10	0.10	0.06	0.01	0.04	0.01	0.04	0.05	0.08	0.08	0.05
T66	0.02	0.07	0.03	0.08	0.08	0.05	0.02	0.11	0.03	0.09	0.09	0.06	0.07
T67	0.03	0.17	0.11	0.10	0.07	0.04	0.08	0.05	0.03	0.05	0.13	0.08	0.07
T68	0.06	0.06	0.04	0.09	0.03	0.07	0.05	0.07	0.12	0.21	0.13	0.08	0.11
T69	0.05	0.07	0.06	0.06	0.05	0.08	0.13	0.11	0.08	0.09	0.09	0.06	0.08
T70	0.08	0.20	0.15	0.18	0.11	0.13	0.19	0.11	0.07	0.23	0.12	0.15	0.14
T71	0.03	0.03	0.03	0.05	0.02	0.02	0.09	0.07	0.21	0.24	0.05	0.07	0.11
T72	0.02	0.16	0.05	0.12	0.08	0.04	0.09	0.04	0.02	0.03	0.06	0.08	0.05
T73	0.01	0.03	0.03	0.03	0.02	0.03	0.07	0.12	0.33	0.34	0.40	0.07	0.19
T74	0.10	0.11	0.06	0.14	0.09	0.09	0.15	0.15	0.31	0.31	0.35	0.14	0.22
T75	0.01	0.03	0.02	0.03	0.02	0.07	0.14	0.07	0.21	0.27	0.28	0.06	0.15
T76	0.11	0.19	0.08	0.12	0.10	0.04	0.05	0.02	0.23	0.16	0.16	0.12	0.12
T77	0.09	0.21	0.12	0.15	0.12	0.08	0.14	0.07	0.27	0.28	0.33	0.16	0.20
T78	0.11	0.05	0.12	0.15	0.07	0.10	0.05	0.03	0.17	0.11	0.02	0.12	0.09
T79	0.05	0.11	0.07	0.05	0.05	0.10	0.12	0.08	0.24	0.30	0.10	0.10	0.15
T80	0.06	0.12	0.08	0.06	0.03	0.11	0.09	0.07	0.21	0.28	0.32	0.10	0.16
T81	0.06	0.13	0.10	0.11	0.04	0.10	0.09	0.01	0.22	0.30	0.34	0.12	0.17
T82	0.03	0.13	0.07	0.10	0.05	0.07	0.12	0.09	0.28	0.35	0.35	0.12	0.20
T83	0.04	0.16	0.07	0.09	0.01	0.05	0.03	0.09	0.11	0.13	0.19	0.08	0.09
T84	0.01	0.12	0.05	0.05	0.05	0.06	0.12	0.13	0.15	0.19	0.22	0.08	0.13
T85	0.05	0.16	0.11	0.09	0.03	0.05	0.09	0.14	0.24	0.21	0.23	0.10	0.15
T86	0.07	0.18	0.03	0.10	0.07	0.05	0.19	0.12	0.31	0.33	0.38	0.12	0.21
T87	0.06	0.16	0.03	0.08	0.08	0.08	0.21	0.09	0.20	0.26	0.31	0.10	0.17
T88	0.02	0.01	0.01	0.03	0.01	0.04	0.05	0.11	0.16	0.15	0.04	0.04	0.08
T89	0.01	0.01	0.01	0.01	0.01	0.01	0.04	0.06	0.09	0.08	0.04	0.02	0.05
T90	0.01	0.02	0.02	0.02	0.02	0.02	0.07	0.11	0.15	0.15	0.04	0.04	0.08
T91	0.01	0.02	0.02	0.02	0.02	0.02	0.04	0.06	0.07	0.07	0.02	0.03	0.04
T92	0.01	0.04	0.02	0.02	0.03	0.05	0.05	0.02	0.00	0.02	0.10	0.02	0.03
T93	0.02	0.04	0.02	0.04	0.05	0.05	0.06	0.02	0.01	0.03	0.11	0.04	0.04
T94	0.02	0.04	0.03	0.06	0.07	0.06	0.07	0.02	0.03	0.02	0.12	0.05	0.05
T95	0.00	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01
T96	0.01	0.01	0.01	0.02	0.01	0.04	0.02	0.01	0.02	0.02	0.03	0.02	0.02
T97	0.02	0.03	0.02	0.05	0.03	0.03	0.03	0.00	0.02	0.03	0.02	0.03	0.02
T98	0.01	0.01	0.01	0.04	0.02	0.03	0.05	0.00	0.02	0.02	0.02	0.02	0.02
T99	0.02	0.02	0.02	0.03	0.02	0.04	0.06	0.00	0.03	0.02	0.02	0.02	0.03
T100	0.01	0.02	0.02	0.03	0.02	0.05	0.06	0.00	0.03	0.04	0.02	0.03	0.03
T101	0.01	0.02	0.02	0.03	0.02	0.05	0.07	0.00	0.03	0.07	0.02	0.03	0.04
T102	0.01	0.01	0.02	0.03	0.02	0.04	0.08	0.01	0.05	0.09	0.01	0.03	0.04
T103	0.02	0.00	0.01	0.01	0.02	0.03	0.03	0.03	0.01	0.01	0.01	0.01	0.02
T104	0.02	0.01	0.01	0.02	0.05	0.02	0.01	0.04	0.01	0.01	0.01	0.02	0.02
T105	0.02	0.01	0.02	0.04	0.03	0.07	0.05	0.08	0.19	0.14	0.12	0.05	0.10
T106	0.06	0.04	0.05	0.02	0.04	0.05	0.05	0.03	0.20	0.21	0.14	0.06	0.11
T107	0.05	0.05	0.04	0.02	0.03	0.04	0.02	0.04	0.09	0.17	0.11	0.05	0.07
T108	0.01	0.05	0.02	0.02	0.02	0.07	0.07	0.07	0.19	0.20	0.15	0.05	0.11
T109	0.01	0.08	0.04	0.02	0.03	0.03	0.06	0.06	0.11	0.10	0.12	0.04	0.07
T110	0.02	0.05	0.02	0.03	0.01	0.02	0.01	0.07	0.06	0.13	0.02	0.03	0.05
T111	0.01	0.09	0.05	0.05	0.01	0.02	0.02	0.07	0.07	0.11	0.02	0.05	0.05
T112	0.03	0.03	0.05	0.05	0.03	0.02	0.05	0.02	0.06	0.06	0.06	0.04	0.04
T113	0.01	0.06	0.11	0.11	0.04	0.01	0.03	0.01	0.02	0.03	0.04	0.06	0.03
T114	0.02	0.02	0.04	0.06	0.02	0.02	0.01	0.02	0.01	0.03	0.01	0.03	0.02
T115	0.02	0.04	0.08	0.09	0.04	0.01	0.06	0.03	0.03	0.06	0.03	0.06	0.04
T116	0.04	0.11	0.12	0.10	0.10	0.06	0.17	0.07	0.10	0.07	0.01	0.10	0.08
T117	0.04	0.09	0.11	0.04	0.03	0.07	0.09	0.10	0.02	0.02	0.02	0.05	0.04

Baseline Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T118	0.03	0.15	0.13	0.13	0.09	0.09	0.18	0.03	0.04	0.08	0.04	0.10	0.08
T119	0.04	0.16	0.14	0.06	0.07	0.07	0.13	0.15	0.08	0.03	0.02	0.08	0.07
T120	0.06	0.12	0.04	0.09	0.06	0.02	0.05	0.11	0.07	0.07	0.08	0.07	0.07
T121	0.05	0.13	0.15	0.13	0.02	0.14	0.09	0.16	0.06	0.23	0.17	0.11	0.13
T122	0.13	0.21	0.12	0.04	0.01	0.11	0.05	0.15	0.16	0.20	0.14	0.10	0.12
T123	0.08	0.21	0.12	0.12	0.06	0.12	0.01	0.21	0.16	0.24	0.17	0.13	0.15
T124	0.06	0.22	0.14	0.20	0.09	0.06	0.17	0.24	0.28	0.22	0.19	0.16	0.19
T125	0.04	0.05	0.05	0.06	0.02	0.01	0.02	0.02	0.03	0.13	0.07	0.05	0.05
T126	0.01	0.04	0.03	0.01	0.02	0.03	0.01	0.05	0.04	0.03	0.01	0.02	0.03
T127	0.04	0.11	0.09	0.13	0.11	0.04	0.03	0.03	0.06	0.09	0.04	0.10	0.07
T128	0.02	0.01	0.01	0.01	0.01	0.05	0.01	0.01	0.01	0.01	0.04	0.01	0.02
T129	0.02	0.05	0.03	0.08	0.03	0.04	0.03	0.08	0.08	0.04	0.10	0.05	0.06
T130	0.02	0.05	0.01	0.09	0.02	0.03	0.08	0.11	0.16	0.15	0.09	0.06	0.10
T131	0.03	0.03	0.02	0.02	0.02	0.09	0.04	0.08	0.12	0.15	0.04	0.04	0.08
T132	0.03	0.05	0.03	0.04	0.01	0.09	0.03	0.09	0.16	0.06	0.12	0.05	0.08
T133	0.11	0.27	0.17	0.20	0.09	0.17	0.22	0.20	0.31	0.20	0.16	0.19	0.20
T134	0.05	0.17	0.13	0.08	0.06	0.03	0.04	0.03	0.08	0.18	0.14	0.09	0.09
T135	0.07	0.21	0.11	0.18	0.13	0.08	0.09	0.04	0.27	0.22	0.17	0.16	0.16
T136	0.08	0.18	0.10	0.13	0.07	0.02	0.07	0.02	0.23	0.21	0.19	0.12	0.13
T137	0.14	0.24	0.07	0.19	0.14	0.08	0.03	0.06	0.23	0.23	0.18	0.16	0.16
T138	0.05	0.06	0.04	0.10	0.06	0.01	0.04	0.04	0.22	0.23	0.19	0.09	0.13
T139	0.01	0.05	0.09	0.08	0.08	0.06	0.01	0.01	0.05	0.10	0.06	0.07	0.06
Average LVR	**0.04**	**0.09**	**0.08**	**0.09**	**0.06**	**0.06**	**0.06**	**0.07**	**0.11**	**0.12**	**0.11**	**0.08**	**0.09**
S01	0.03	0.12	0.08	0.12	0.08	0.10	0.10	0.04	0.05	0.01	0.11	0.08	0.07
S02	0.05	0.17	0.15	0.13	0.04	0.09	0.09	0.05	0.06	0.07	0.18	0.10	0.09
S03	0.06	0.16	0.12	0.15	0.10	0.07	0.08	0.02	0.07	0.07	0.19	0.11	0.09
S04	0.05	0.11	0.11	0.08	0.05	0.03	0.04	0.05	0.06	0.05	0.13	0.07	0.06
S05	0.02	0.03	0.04	0.06	0.05	0.02	0.03	0.02	0.09	0.04	0.05	0.05	0.05
S06	0.10	0.20	0.16	0.17	0.13	0.06	0.01	0.07	0.21	0.26	0.02	0.16	0.13
S07	0.08	0.10	0.14	0.13	0.08	0.06	0.02	0.08	0.24	0.25	0.05	0.13	0.13

Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
P01	0.04	0.11	0.06	0.10	0.09	0.06	0.04	0.03	0.19	0.20	0.18	0.10	0.12
P02	0.02	0.07	0.05	0.09	0.07	0.05	0.04	0.01	0.04	0.02	0.01	0.06	0.04
P03	0.01	0.05	0.02	0.04	0.03	0.03	0.02	0.03	0.08	0.09	0.08	0.04	0.06
P04	0.05	0.15	0.08	0.15	0.12	0.09	0.07	0.03	0.10	0.10	0.14	0.11	0.10
P05	0.02	0.14	0.04	0.14	0.10	0.11	0.10	0.05	0.09	0.09	0.07	0.10	0.09
P06	0.05	0.15	0.09	0.06	0.04	0.00	0.04	0.06	0.12	0.10	0.04	0.07	0.06
P07	0.07	0.13	0.01	0.02	0.01	0.03	0.04	0.05	0.11	0.10	0.04	0.05	0.06
P08	0.04	0.08	0.09	0.09	0.08	0.05	0.04	0.01	0.05	0.04	0.04	0.07	0.05
P09	0.06	0.12	0.14	0.14	0.10	0.07	0.07	0.03	0.13	0.11	0.10	0.12	0.10
P10	0.06	0.14	0.12	0.04	0.09	0.02	0.01	0.01	0.02	0.02	0.07	0.07	0.03
P11	0.05	0.08	0.08	0.03	0.05	0.01	0.02	0.01	0.03	0.04	0.11	0.05	0.04
P12	0.00	0.11	0.05	0.03	0.05	0.02	0.01	0.03	0.08	0.10	0.06	0.05	0.05
P13	0.01	0.09	0.02	0.01	0.04	0.01	0.01	0.03	0.06	0.09	0.08	0.03	0.05
P14	0.01	0.10	0.05	0.07	0.06	0.01	0.07	0.05	0.17	0.15	0.18	0.07	0.10
P15	0.06	0.17	0.15	0.14	0.10	0.07	0.08	0.09	0.19	0.11	0.09	0.13	0.11
P16	0.07	0.24	0.19	0.18	0.11	0.07	0.06	0.05	0.10	0.06	0.04	0.15	0.08
P17	0.08	0.23	0.17	0.16	0.10	0.08	0.07	0.09	0.10	0.14	0.18	0.14	0.12
P18	0.02	0.03	0.05	0.06	0.04	0.02	0.02	0.10	0.05	0.08	0.21	0.05	0.08
P19	0.02	0.02	0.02	0.02	0.03	0.02	0.05	0.09	0.06	0.09	0.23	0.03	0.08
P20	0.01	0.03	0.02	0.00	0.01	0.03	0.07	0.09	0.04	0.09	0.26	0.02	0.08
P21	0.12	0.24	0.17	0.07	0.05	0.05	0.06	0.04	0.18	0.22	0.26	0.12	0.13
P22	0.11	0.22	0.17	0.21	0.09	0.08	0.05	0.06	0.13	0.19	0.26	0.16	0.14
P23	0.02	0.06	0.06	0.09	0.15	0.06	0.05	0.07	0.08	0.16	0.23	0.09	0.12
P24	0.02	0.05	0.01	0.05	0.11	0.04	0.03	0.08	0.14	0.20	0.13	0.07	0.11
P25	0.08	0.21	0.17	0.22	0.07	0.04	0.01	0.10	0.20	0.22	0.12	0.16	0.14
P26	0.08	0.11	0.08	0.15	0.12	0.08	0.07	0.12	0.17	0.16	0.07	0.12	0.12
P27	0.09	0.15	0.11	0.16	0.13	0.06	0.07	0.05	0.28	0.27	0.15	0.15	0.17
P28	0.05	0.08	0.08	0.10	0.07	0.05	0.02	0.01	0.02	0.02	0.01	0.07	0.04
P29	0.05	0.13	0.11	0.13	0.08	0.05	0.05	0.02	0.17	0.15	0.17	0.11	0.11
P30	0.07	0.17	0.03	0.17	0.13	0.08	0.05	0.05	0.03	0.06	0.14	0.11	0.08
Average SVR	**0.05**	**0.12**	**0.08**	**0.10**	**0.08**	**0.05**	**0.04**	**0.05**	**0.11**	**0.12**	**0.12**	**0.09**	**0.09**
T01	0.15	0.22	0.17	0.19	0.12	0.03	0.05	0.19	0.12	0.24	0.18	0.16	0.15
T02	0.09	0.16	0.11	0.15	0.11	0.09	0.03	0.14	0.12	0.16	0.14	0.13	0.12
T03	0.10	0.09	0.06	0.03	0.03	0.04	0.08	0.28	0.23	0.17	0.16	0.07	0.14
T04	0.13	0.10	0.08	0.06	0.02	0.02	0.07	0.28	0.20	0.24	0.14	0.09	0.14
T05	0.05	0.07	0.03	0.04	0.05	0.02	0.05	0.11	0.02	0.04	0.04	0.04	0.04
T06	0.03	0.08	0.07	0.08	0.05	0.08	0.06	0.03	0.12	0.13	0.16	0.08	0.09
T07	0.07	0.23	0.19	0.08	0.12	0.08	0.07	0.02	0.15	0.18	0.20	0.13	0.12
T08	0.08	0.14	0.11	0.16	0.08	0.07	0.06	0.10	0.12	0.18	0.28	0.13	0.14
T09	0.06	0.03	0.08	0.14	0.11	0.06	0.07	0.10	0.12	0.14	0.29	0.10	0.13
T10	0.04	0.16	0.13	0.11	0.10	0.01	0.04	0.16	0.12	0.09	0.26	0.10	0.11
T11	0.01	0.12	0.05	0.13	0.10	0.03	0.03	0.04	0.02	0.04	0.03	0.08	0.05
T12	0.07	0.15	0.06	0.01	0.04	0.05	0.04	0.01	0.05	0.04	0.07	0.05	0.04
T13	0.08	0.16	0.14	0.17	0.11	0.06	0.03	0.05	0.07	0.01	0.05	0.12	0.07
T14	0.12	0.11	0.09	0.08	0.01	0.03	0.04	0.18	0.26	0.30	0.30	0.11	0.17
T15	0.16	0.22	0.20	0.18	0.09	0.06	0.07	0.23	0.30	0.35	0.34	0.19	0.22
T16	0.20	0.31	0.26	0.29	0.17	0.09	0.08	0.22	0.18	0.27	0.22	0.24	0.20
T17	0.02	0.21	0.21	0.25	0.16	0.10	0.09	0.19	0.16	0.13	0.04	0.18	0.14
T18	0.14	0.32	0.28	0.24	0.17	0.07	0.12	0.17	0.23	0.14	0.13	0.21	0.16
T19	0.01	0.11	0.10	0.11	0.07	0.04	0.03	0.13	0.22	0.19	0.05	0.10	0.12
T20	0.10	0.20	0.17	0.17	0.13	0.10	0.07	0.15	0.16	0.18	0.14	0.16	0.14
T21	0.02	0.05	0.04	0.04	0.16	0.07	0.06	0.12	0.13	0.18	0.22	0.08	0.13
T22	0.11	0.22	0.12	0.10	0.04	0.03	0.06	0.05	0.14	0.19	0.28	0.11	0.12
T23	0.08	0.13	0.12	0.15	0.10	0.05	0.06	0.07	0.08	0.11	0.27	0.11	0.11
T24	0.04	0.13	0.11	0.11	0.05	0.06	0.03	0.02	0.14	0.15	0.19	0.10	0.10
T25	0.11	0.04	0.03	0.09	0.12	0.09	0.10	0.23	0.16	0.10	0.05	0.09	0.12
T26	0.10	0.04	0.04	0.09	0.11	0.09	0.12	0.24	0.16	0.09	0.09	0.08	0.12
T27	0.04	0.06	0.06	0.06	0.04	0.01	0.03	0.03	0.09	0.22	0.17	0.07	0.10
T28	0.07	0.10	0.05	0.09	0.08	0.04	0.09	0.03	0.10	0.23	0.18	0.09	0.12
T29	0.05	0.12	0.07	0.09	0.07	0.05	0.08	0.02	0.04	0.13	0.09	0.08	0.07
T30	0.05	0.12	0.08	0.06	0.05	0.05	0.06	0.03	0.03	0.07	0.06	0.07	0.05
T31	0.05	0.12	0.09	0.05	0.11	0.09	0.03	0.02	0.05	0.07	0.07	0.08	0.06
T32	0.04	0.10	0.07	0.17	0.15	0.14	0.05	0.04	0.25	0.22	0.19	0.14	0.17
T33	0.02	0.03	0.02	0.09	0.10	0.06	0.06	0.03	0.22	0.19	0.22	0.09	0.13
T34	0.02	0.06	0.03	0.09	0.05	0.08	0.02	0.03	0.12	0.14	0.11	0.07	0.09
T35	0.03	0.01	0.03	0.07	0.03	0.03	0.06	0.07	0.02	0.05	0.02	0.04	0.04
T36	0.04	0.03	0.04	0.07	0.03	0.02	0.05	0.03	0.06	0.06	0.04	0.05	0.05
T37	0.03	0.04	0.01	0.10	0.05	0.07	0.01	0.06	0.03	0.03	0.03	0.05	0.05
T38	0.01	0.08	0.03	0.11	0.05	0.04	0.03	0.02	0.05	0.04	0.03	0.06	0.05
T39	0.01	0.04	0.06	0.05	0.06	0.09	0.08	0.04	0.06	0.04	0.03	0.05	0.05
T40	0.01	0.02	0.05	0.08	0.06	0.09	0.07	0.04	0.06	0.02	0.04	0.06	0.06
T41	0.01	0.05	0.08	0.04	0.04	0.07	0.03	0.04	0.06	0.02	0.04	0.05	0.04
T42	0.02	0.04	0.07	0.09	0.10	0.09	0.08	0.02	0.04	0.04	0.14	0.07	0.07
T43	0.03	0.06	0.04	0.05	0.08	0.04	0.11	0.05	0.01	0.02	0.09	0.05	0.05

Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T44	0.02	0.06	0.07	0.11	0.11	0.05	0.04	0.01	0.02	0.05	0.04	0.07	0.05
T45	0.01	0.07	0.09	0.12	0.09	0.05	0.13	0.09	0.03	0.02	0.02	0.08	0.06
T46	0.02	0.07	0.03	0.04	0.04	0.03	0.09	0.09	0.02	0.03	0.16	0.04	0.06
T47	0.04	0.07	0.08	0.06	0.03	0.04	0.10	0.09	0.03	0.03	0.05	0.05	0.05
T48	0.08	0.18	0.12	0.08	0.05	0.07	0.18	0.03	0.03	0.04	0.03	0.08	0.06
T49	0.01	0.15	0.09	0.11	0.06	0.11	0.24	0.04	0.07	0.06	0.05	0.09	0.09
T50	0.10	0.20	0.09	0.11	0.07	0.03	0.04	0.04	0.18	0.19	0.13	0.11	0.11
T51	0.10	0.04	0.03	0.10	0.09	0.09	0.17	0.21	0.14	0.11	0.13	0.08	0.13
T52	0.00	0.07	0.05	0.08	0.07	0.06	0.01	0.02	0.03	0.01	0.08	0.06	0.04
T53	0.01	0.10	0.14	0.19	0.07	0.12	0.13	0.02	0.05	0.04	0.07	0.11	0.08
T54	0.02	0.05	0.05	0.03	0.10	0.07	0.07	0.01	0.03	0.02	0.07	0.05	0.05
T55	0.01	0.03	0.08	0.12	0.04	0.04	0.06	0.02	0.06	0.02	0.09	0.06	0.05
T56	0.01	0.21	0.22	0.24	0.03	0.11	0.10	0.08	0.04	0.05	0.02	0.14	0.08
T57	0.00	0.06	0.02	0.08	0.03	0.07	0.06	0.06	0.01	0.04	0.01	0.05	0.04
T58	0.03	0.14	0.15	0.15	0.07	0.03	0.04	0.08	0.04	0.05	0.07	0.10	0.07
T59	0.02	0.14	0.08	0.05	0.02	0.05	0.05	0.05	0.02	0.05	0.09	0.05	0.05
T60	0.04	0.08	0.12	0.11	0.06	0.05	0.00	0.10	0.02	0.09	0.07	0.08	0.06
T61	0.01	0.13	0.11	0.01	0.01	0.07	0.01	0.01	0.02	0.06	0.04	0.05	0.03
T62	0.02	0.03	0.06	0.08	0.06	0.04	0.04	0.01	0.01	0.02	0.04	0.05	0.03
T63	0.04	0.11	0.10	0.08	0.08	0.07	0.12	0.07	0.01	0.08	0.06	0.08	0.07
T64	0.01	0.02	0.03	0.03	0.04	0.08	0.13	0.10	0.08	0.07	0.04	0.04	0.07
T65	0.04	0.14	0.07	0.11	0.06	0.05	0.03	0.07	0.08	0.08	0.01	0.08	0.06
T66	0.03	0.09	0.03	0.10	0.09	0.04	0.07	0.11	0.04	0.05	0.06	0.07	0.07
T67	0.06	0.18	0.13	0.16	0.09	0.05	0.10	0.08	0.14	0.12	0.11	0.13	0.11
T68	0.03	0.04	0.02	0.08	0.02	0.08	0.02	0.06	0.20	0.21	0.09	0.07	0.11
T69	0.04	0.08	0.09	0.08	0.05	0.06	0.08	0.12	0.06	0.05	0.10	0.07	0.07
T70	0.09	0.27	0.13	0.17	0.12	0.13	0.17	0.13	0.08	0.14	0.17	0.15	0.13
T71	0.02	0.04	0.03	0.02	0.02	0.02	0.10	0.05	0.20	0.23	0.03	0.06	0.10
T72	0.03	0.16	0.11	0.12	0.07	0.02	0.10	0.03	0.14	0.13	0.11	0.10	0.10
T73	0.02	0.06	0.05	0.05	0.01	0.03	0.08	0.10	0.32	0.33	0.37	0.08	0.19
T74	0.11	0.16	0.12	0.12	0.09	0.10	0.16	0.12	0.30	0.31	0.33	0.15	0.21
T75	0.01	0.02	0.01	0.02	0.01	0.08	0.13	0.06	0.21	0.25	0.27	0.06	0.14
T76	0.12	0.16	0.05	0.10	0.10	0.03	0.04	0.02	0.26	0.19	0.18	0.11	0.13
T77	0.10	0.21	0.08	0.14	0.11	0.08	0.13	0.05	0.28	0.26	0.31	0.15	0.19
T78	0.11	0.09	0.11	0.15	0.07	0.09	0.06	0.03	0.02	0.03	0.06	0.10	0.06
T79	0.05	0.08	0.05	0.08	0.03	0.05	0.14	0.04	0.24	0.29	0.08	0.09	0.14
T80	0.05	0.08	0.06	0.09	0.03	0.08	0.18	0.11	0.18	0.28	0.23	0.09	0.16
T81	0.06	0.09	0.04	0.08	0.03	0.02	0.11	0.05	0.20	0.27	0.37	0.09	0.16
T82	0.04	0.09	0.06	0.08	0.04	0.04	0.05	0.06	0.29	0.35	0.36	0.10	0.18
T83	0.05	0.14	0.13	0.12	0.05	0.03	0.07	0.08	0.09	0.11	0.18	0.10	0.10
T84	0.03	0.09	0.11	0.10	0.04	0.05	0.17	0.10	0.15	0.18	0.22	0.09	0.13
T85	0.06	0.15	0.12	0.10	0.02	0.07	0.12	0.12	0.23	0.20	0.23	0.11	0.15
T86	0.10	0.13	0.07	0.09	0.07	0.08	0.15	0.13	0.31	0.31	0.40	0.12	0.21
T87	0.09	0.12	0.07	0.06	0.07	0.10	0.19	0.12	0.20	0.24	0.32	0.10	0.17
T88	0.02	0.04	0.01	0.01	0.01	0.03	0.05	0.10	0.14	0.11	0.03	0.03	0.07
T89	0.01	0.03	0.02	0.02	0.01	0.01	0.02	0.05	0.07	0.07	0.04	0.03	0.04
T90	0.02	0.05	0.03	0.03	0.03	0.01	0.06	0.11	0.14	0.03	0.02	0.04	0.06
T91	0.01	0.03	0.01	0.02	0.01	0.02	0.02	0.06	0.07	0.05	0.02	0.02	0.04
T92	0.01	0.03	0.05	0.04	0.01	0.03	0.04	0.01	0.01	0.02	0.08	0.03	0.03
T93	0.00	0.03	0.05	0.06	0.04	0.05	0.05	0.01	0.03	0.03	0.09	0.04	0.04
T94	0.01	0.04	0.06	0.08	0.07	0.08	0.07	0.01	0.02	0.02	0.11	0.06	0.05
T95	0.00	0.01	0.02	0.02	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01
T96	0.01	0.02	0.01	0.01	0.00	0.04	0.02	0.02	0.03	0.02	0.02	0.01	0.02
T97	0.01	0.03	0.03	0.05	0.04	0.03	0.04	0.02	0.02	0.02	0.03	0.04	0.03
T98	0.01	0.02	0.02	0.01	0.01	0.04	0.04	0.01	0.01	0.02	0.02	0.01	0.02
T99	0.01	0.05	0.02	0.01	0.01	0.03	0.06	0.02	0.02	0.02	0.03	0.02	0.02
T100	0.01	0.05	0.03	0.03	0.01	0.03	0.05	0.01	0.01	0.02	0.05	0.02	0.02
T101	0.01	0.04	0.03	0.05	0.01	0.03	0.07	0.01	0.01	0.02	0.05	0.03	0.03
T102	0.01	0.04	0.01	0.06	0.00	0.06	0.07	0.01	0.03	0.02	0.10	0.03	0.04
T103	0.00	0.01	0.01	0.02	0.03	0.02	0.04	0.05	0.03	0.02	0.00	0.02	0.02
T104	0.01	0.02	0.02	0.03	0.02	0.02	0.05	0.06	0.03	0.01	0.02	0.02	0.03
T105	0.05	0.01	0.04	0.03	0.03	0.01	0.04	0.09	0.20	0.15	0.13	0.05	0.10
T106	0.05	0.05	0.04	0.06	0.02	0.04	0.03	0.07	0.24	0.21	0.15	0.07	0.12
T107	0.02	0.06	0.05	0.06	0.02	0.04	0.00	0.05	0.09	0.10	0.12	0.05	0.07
T108	0.02	0.05	0.04	0.04	0.01	0.02	0.08	0.09	0.21	0.21	0.15	0.06	0.11
T109	0.03	0.09	0.06	0.07	0.02	0.03	0.04	0.05	0.12	0.10	0.12	0.06	0.08
T110	0.06	0.04	0.01	0.03	0.02	0.01	0.01	0.07	0.06	0.10	0.03	0.03	0.05
T111	0.04	0.01	0.02	0.07	0.01	0.01	0.02	0.08	0.06	0.09	0.03	0.04	0.05
T112	0.06	0.05	0.05	0.06	0.04	0.01	0.04	0.04	0.06	0.03	0.06	0.05	0.04
T113	0.07	0.05	0.09	0.12	0.02	0.01	0.01	0.02	0.05	0.02	0.04	0.07	0.04
T114	0.05	0.04	0.03	0.06	0.02	0.03	0.03	0.03	0.05	0.01	0.04	0.04	0.03
T115	0.05	0.04	0.06	0.10	0.01	0.02	0.01	0.03	0.03	0.02	0.01	0.05	0.03
T116	0.03	0.11	0.13	0.12	0.10	0.03	0.10	0.09	0.03	0.03	0.08	0.09	0.06
T117	0.03	0.12	0.12	0.04	0.05	0.07	0.17	0.11	0.01	0.04	0.03	0.06	0.06

Proposed Scheme(VR)													
Test Point	**NNE**	**NE**	**ENE**	**E**	**ESE**	**SE**	**SSE**	**S**	**SSW**	**SW**	**WSW**	**Annual**	**Summer**
T118	0.01	0.13	0.14	0.08	0.09	0.07	0.08	0.05	0.03	0.12	0.10	0.09	0.08
T119	0.02	0.16	0.14	0.04	0.06	0.07	0.12	0.15	0.03	0.03	0.06	0.07	0.06
T120	0.06	0.18	0.06	0.09	0.06	0.03	0.05	0.12	0.09	0.09	0.08	0.08	0.08
T121	0.05	0.11	0.12	0.06	0.04	0.11	0.11	0.15	0.03	0.19	0.18	0.08	0.11
T122	0.12	0.21	0.11	0.07	0.03	0.10	0.06	0.14	0.15	0.19	0.16	0.11	0.12
T123	0.06	0.20	0.13	0.11	0.05	0.10	0.05	0.21	0.16	0.20	0.16	0.12	0.14
T124	0.06	0.22	0.15	0.17	0.07	0.05	0.03	0.21	0.29	0.21	0.21	0.15	0.17
T125	0.04	0.08	0.07	0.03	0.10	0.06	0.06	0.03	0.06	0.10	0.04	0.06	0.06
T126	0.01	0.07	0.01	0.12	0.14	0.06	0.02	0.03	0.04	0.03	0.07	0.07	0.06
T127	0.06	0.11	0.13	0.10	0.07	0.07	0.04	0.05	0.02	0.05	0.02	0.08	0.05
T128	0.05	0.09	0.15	0.18	0.13	0.07	0.02	0.03	0.02	0.07	0.03	0.12	0.07
T129	0.01	0.15	0.12	0.13	0.07	0.04	0.02	0.07	0.08	0.05	0.13	0.09	0.07
T130	0.03	0.16	0.13	0.13	0.09	0.04	0.04	0.11	0.15	0.13	0.09	0.11	0.11
T131	0.02	0.06	0.03	0.04	0.03	0.03	0.08	0.08	0.12	0.16	0.07	0.05	0.08
T132	0.02	0.10	0.05	0.06	0.03	0.05	0.07	0.10	0.12	0.07	0.12	0.06	0.08
T133	0.11	0.28	0.17	0.20	0.11	0.17	0.32	0.19	0.32	0.19	0.16	0.19	0.21
T134	0.04	0.16	0.10	0.10	0.05	0.03	0.04	0.02	0.09	0.19	0.21	0.10	0.10
T135	0.05	0.21	0.12	0.17	0.10	0.07	0.06	0.11	0.30	0.22	0.18	0.15	0.17
T136	0.07	0.18	0.09	0.09	0.09	0.02	0.07	0.03	0.21	0.21	0.22	0.11	0.13
T137	0.13	0.22	0.10	0.18	0.10	0.03	0.02	0.11	0.24	0.21	0.20	0.15	0.15
T138	0.04	0.07	0.04	0.10	0.11	0.03	0.04	0.03	0.24	0.23	0.21	0.10	0.14
T139	0.03	0.07	0.08	0.07	0.08	0.01	0.05	0.02	0.02	0.04	0.02	0.06	0.04
Average LVR	**0.05**	**0.10**	**0.08**	**0.09**	**0.06**	**0.05**	**0.07**	**0.07**	**0.11**	**0.12**	**0.12**	**0.08**	**0.09**
S01	0.07	0.15	0.05	0.15	0.11	0.06	0.04	0.05	0.03	0.04	0.16	0.10	0.08
S02	0.06	0.12	0.12	0.13	0.12	0.08	0.04	0.07	0.10	0.15	0.12	0.12	0.11
S03	0.08	0.15	0.09	0.06	0.09	0.07	0.01	0.08	0.15	0.17	0.15	0.09	0.11
S04	0.03	0.04	0.04	0.05	0.02	0.03	0.07	0.07	0.20	0.23	0.12	0.06	0.11
S05	0.02	0.10	0.06	0.07	0.07	0.01	0.10	0.05	0.16	0.15	0.18	0.08	0.11
S06	0.11	0.23	0.15	0.16	0.12	0.08	0.01	0.10	0.06	0.06	0.18	0.14	0.10
S07	0.07	0.17	0.14	0.16	0.11	0.08	0.02	0.01	0.08	0.08	0.25	0.13	0.10

Appendix 6

Master Layout Plan of Future/Committed Development

1. No. 10 Maidstone Road

2. 41, 43 and 45 Pau Chung Street

佳明集團
GRAND MING GROUP
3706 9288
佳盛建築
WB 1404
Discovery

The Group acquired this parcel of land situated at No.1 Luen Fat Street, Fanling, the New Territories in January 2021, and intends to develop into a residential-cum-retail complex with a total gross floor area of approximately 36,000 square feet. Development plan had been approved by the Town Planning Board and the land exchange application to convert the use of land is under processing. Upon completion of the redevelopment of the site, the completed properties will be sold to generate revenue for the Group.

Pau Chung Street project

The site, located at No. 41, 43 and 45 Pau Chun Street in To Kwa Wan, Kowloon, was acquired by the Group in October 2021 and is being redeveloped into a 25-storey residential tower over two levels of shops with a gross floor area of approximately 31,000 square feet. Superstructure construction works are well underway and the development is scheduled to be completed in the first half of 2023. Upon completion of the redevelopment of the site, the completed properties will be sold to generate revenue for the Group.

Property Development–Mainland China

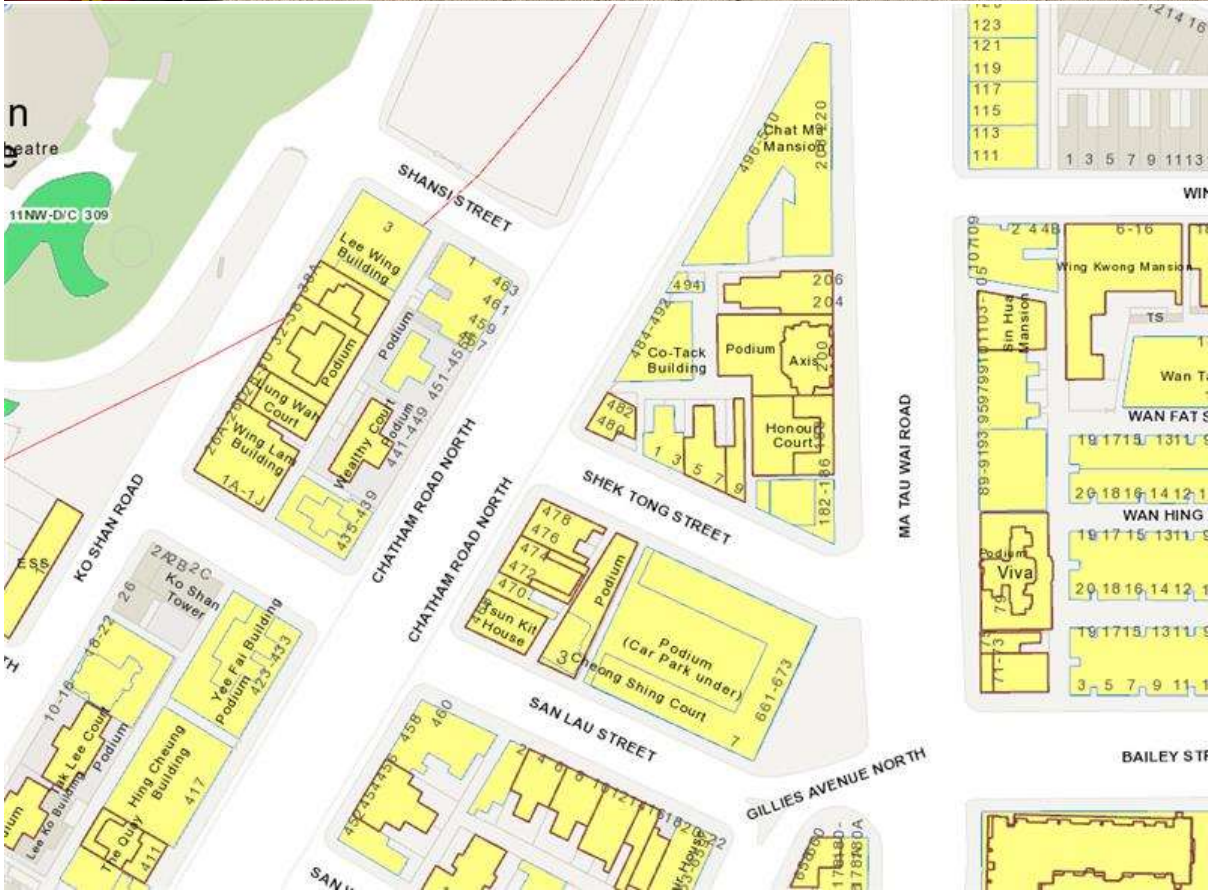
The Group acquired its first land parcel in Mainland China in July 2021 through government public auction. The land parcel is located at Guangxi-ASEAN Economic and Technological Development Zone, Wuming District, Nanning City, Guangxi Province. The site has an area of approximately 574,000 square feet, and is planned to be developed into a luxury residential project under the

Source: http://delaycontent.megahubhk.com/Fundamental/CompanyProfile.aspx?style=megahub&showStock=0&sid=01271&lang=en

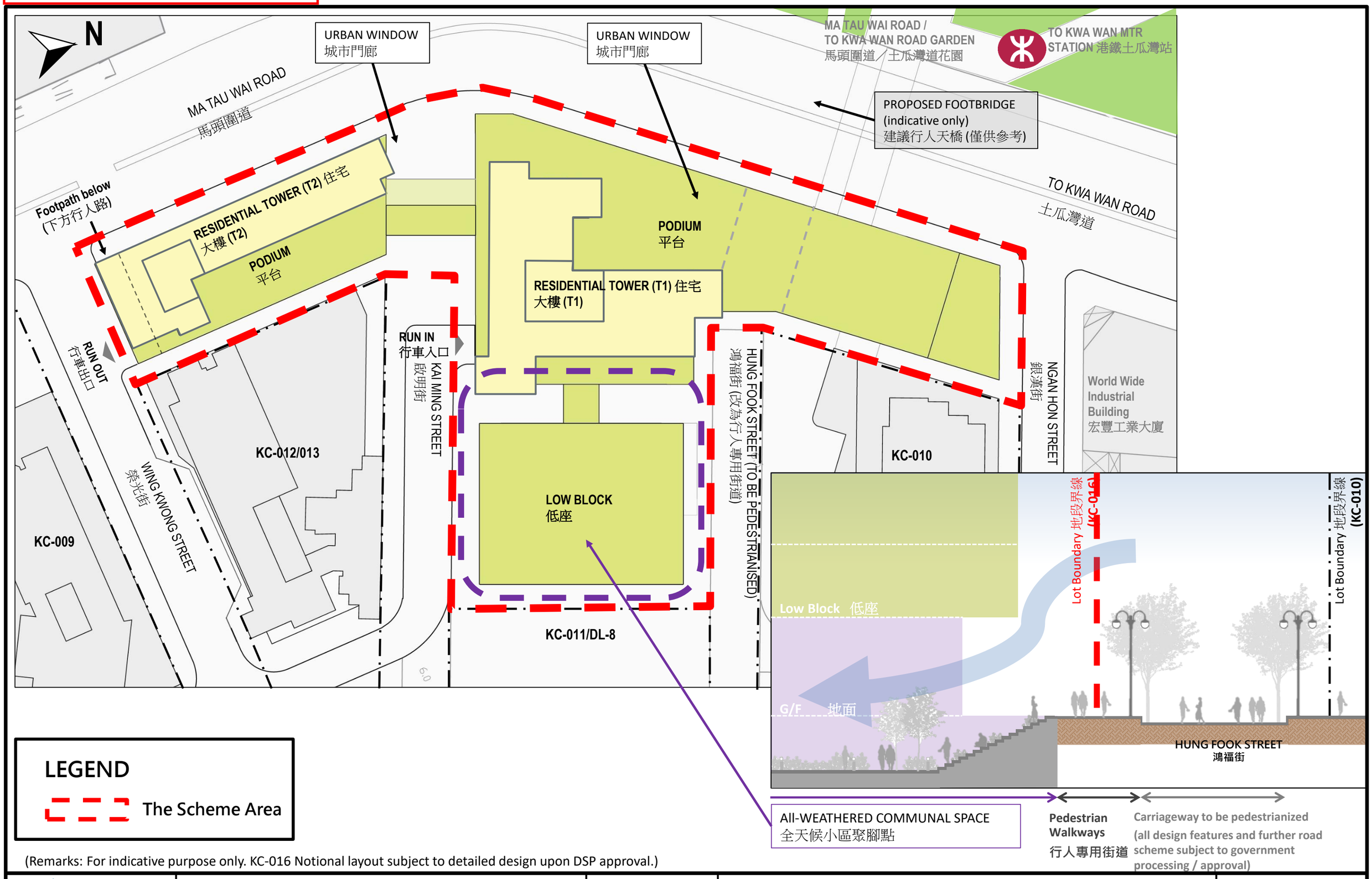
3. Public Housing Development. Ko Shan Road

*Image captured from Google Earth Street View

4.. Proposed Residential Redevelopment, 470-478 Chatham Road North



5. URA Project KC-016 (MLP provided by URA)



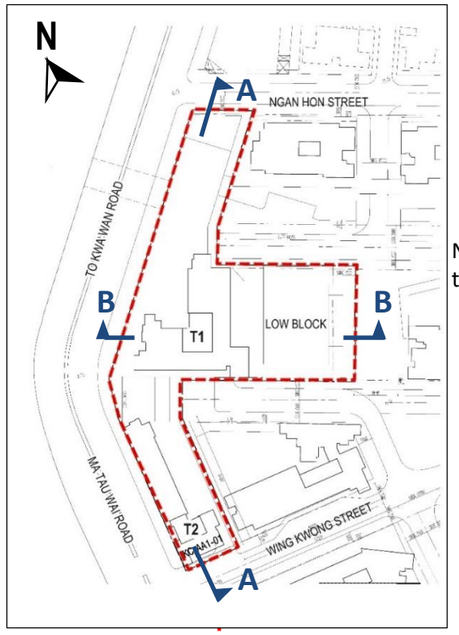
LEGEND

The Scheme Area

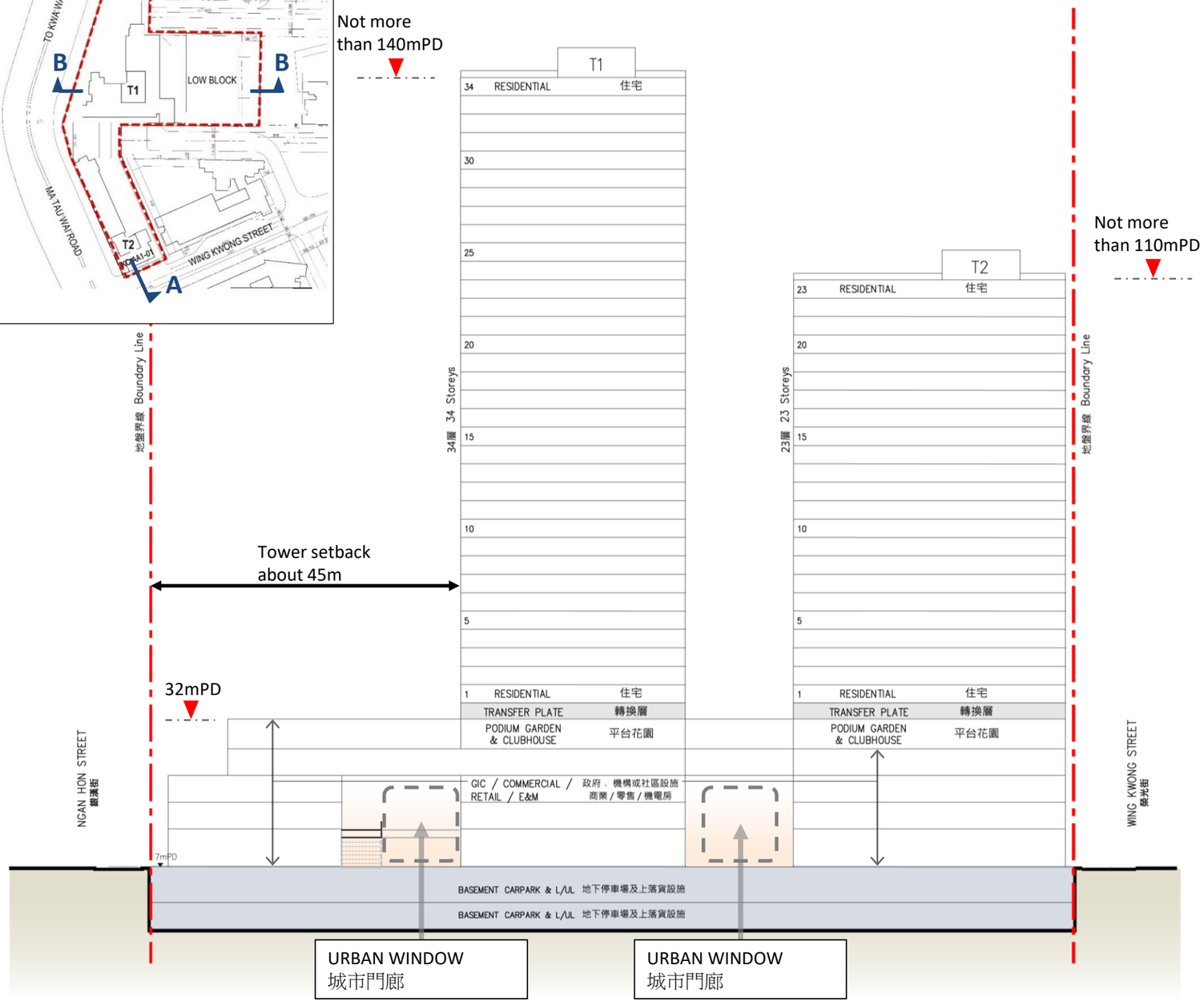
(Remarks: For indicative purpose only. KC-016 Notional layout subject to detailed design upon DSP approval.)

市區重建局 URBAN RENEWAL AUTHORITY	URA To Kwa Wan Road / Wing Kwong Street Development Scheme (KC-016)	Figure 1.2	**Notional Design – Block Plan**	Not drawn to scale Mar 2021

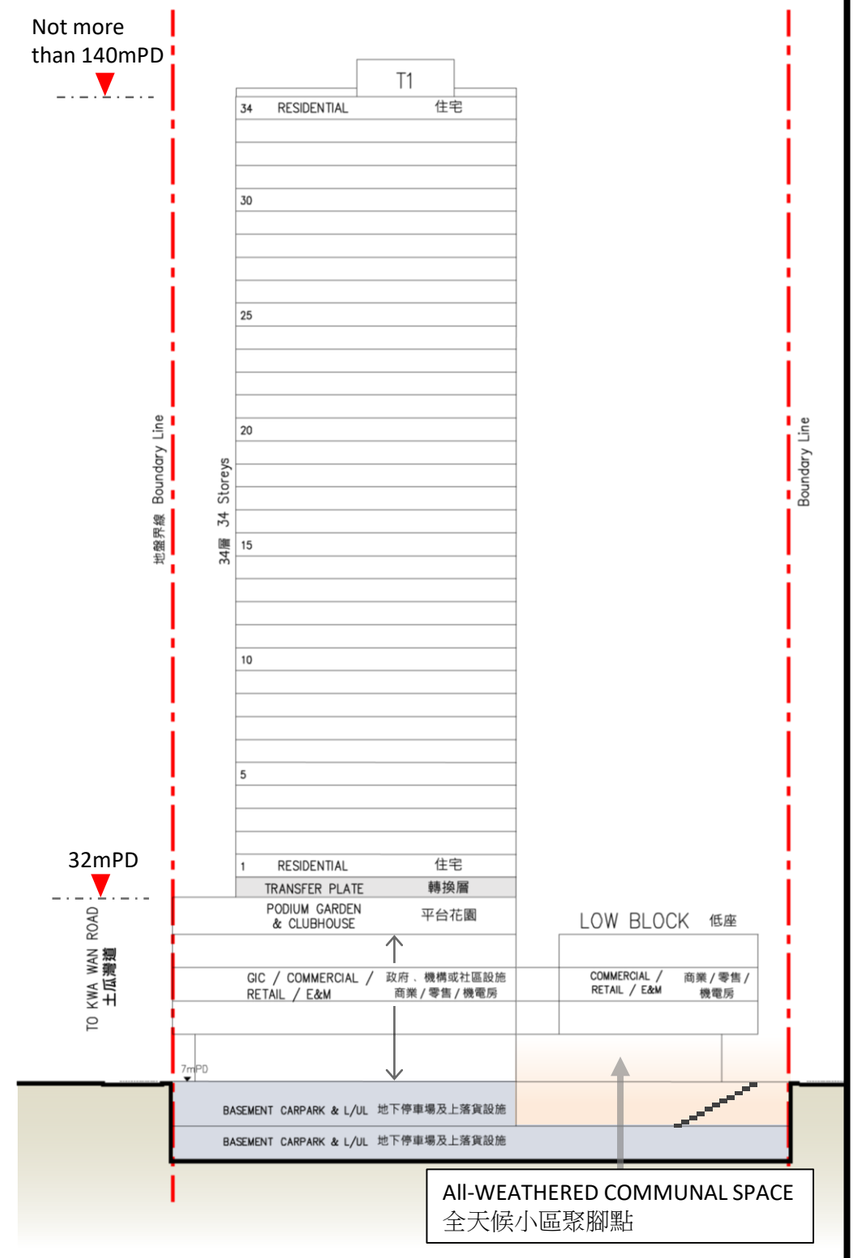
Key Plan



Section A



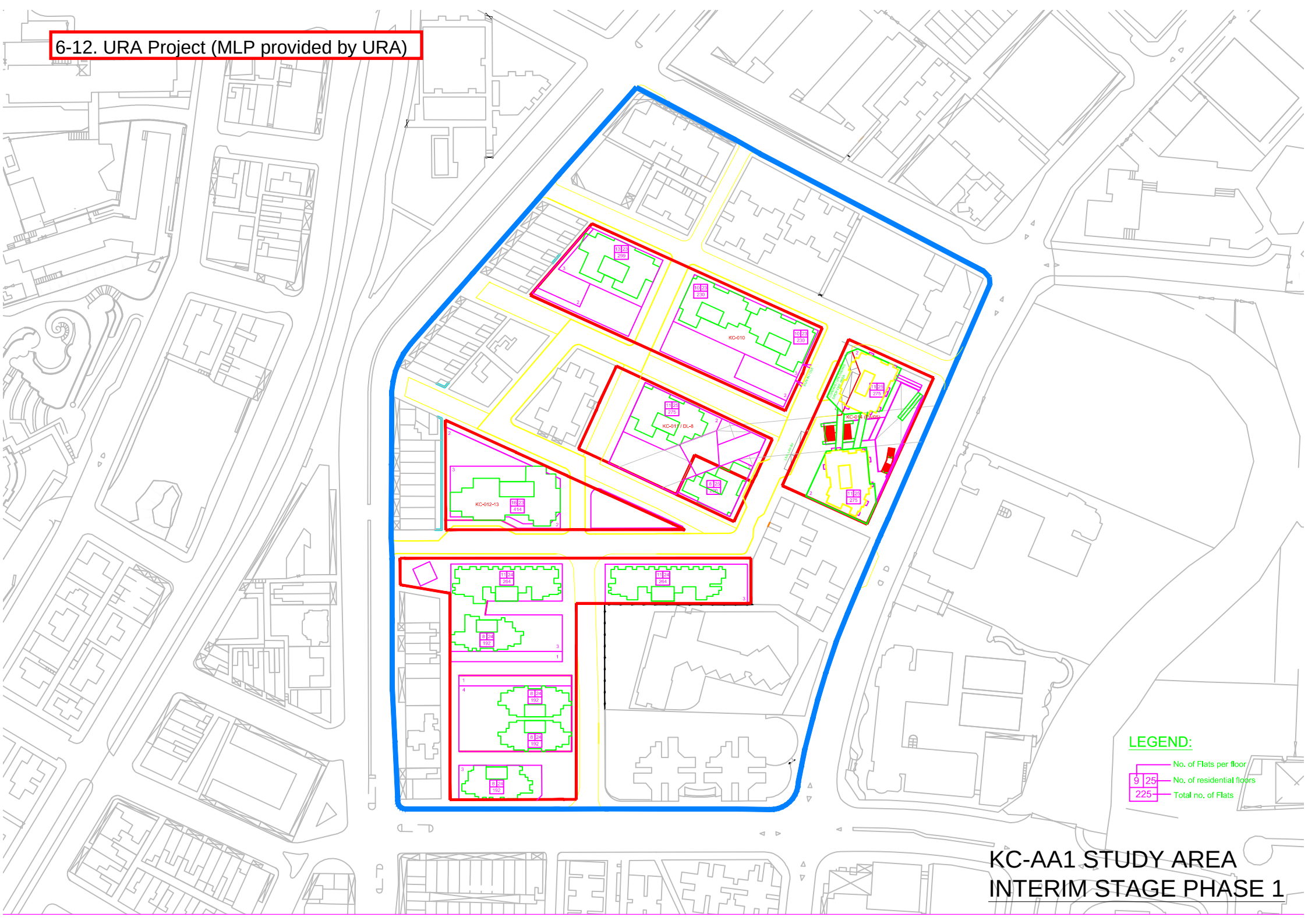
Section B



(Remarks: For indicative purpose only. KC-016 Notional layout subject to detailed design upon DSP approval.)

市區重建局 URBAN RENEWAL AUTHORITY	URA To Kwa Wan Road / Wing Kwong Street Development Scheme (KC-016)	Figure 1.3	**Notional Design – Schematic Section**	Not drawn to scale Mar 2021

6-12. URA Project (MLP provided by URA)



KC-AA1 STUDY AREA
INTERIM STAGE PHASE 1

VIA (RtoC_8)

(Feb 2023)

Visual Impact Assessment
for URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

February 2023

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1. Introduction

1.1. The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Viusal Impact Assessment (VIA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.2. A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.3. With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.4. The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.5. This VIA report is prepared in support of the submission of the revised draft DSP with its revised planning proposal involving the change of proposed types of housing, rezoning, and relaxation of building height restriction of the Scheme

area to the TPB for consideration. The VIA is prepared to assess the potential visual impact of the notional design of the Scheme in accordance with the TPB Guidelines No. 41 – Guidelines on submission of Visual Impact Assessment for Planning Applications to the TPB. Reference is also made to Chapter 11 of the Hong Kong Planning Standards and Guidelines (HKPSG) in preparing the VIA.

2. The Indicative Proposed Scheme and Baseline Scheme

2.1. The Scheme is located in Kowloon City District, which is broadly bounded by a row of buildings at Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north. It has a gross site area of about approximately 16,473m^2, subject to site survey. It is currently zoned "Residential (Group A)" ("R(A)"), whilst the pavements, Maidstone Road and Kiang Su Street are shown as 'Road' on the Draft Ma Tau Kok Outline Zoning Plan (OZP) No. S/K10/29. The building height restriction under the current OZP is 120mPD. Under the revised draft DSP, the Scheme area is proposed to be zoned "R(A)" with the proposed relaxation of maximum building height restriction from 120mPD to 140mPD. The proposed overall plot ratio (PR) is 9.0, of which 8.0 is for domestic uses and the remaining PR of 1.0 is for non-domestic uses. In addition, about 2,500m^2 non-domestic gross floor area (GFA) is also proposed for GIC facilities in the Scheme area which is to be exempted from GFA / PR calculation.

2.2. Under the current notional design (the Proposed Scheme), the Proposed Scheme comprises 5 residential towers within the Northern Site and 2 residential towers within the Southern Site. All residential towers are proposed above the two-storey clubhouse / commercial / retail / GIC podia with basement retail and car parks. A section of Maidstone Road and Kiang Su Street are included as part of the Scheme area for the creation of a vehicular-free environment, and a pedestrianised avenue / plaza is proposed within the Scheme. The pedestrianised avenue / plaza will connect Lok Shan Road to the north and Chi Kiang Street to the south, and it will enhance the accessibility of the Scheme from adjoining streets and its visual openness to pedestrians along the main pedestrian circular routes. A layout of the notional design is shown in **Figure 2.1**.

2.3. An OZP-compliant Scheme (i.e. 120mPD) (the Baseline Scheme) (see **Figure 2.2**) has also been included for comparison purposes. To comply with the current OZP, the area shown as 'Road' is not included in this Baseline Scheme and the PR of 7.5 for domestic and 1.5 for non-domestic uses are adopted. The Baseline Scheme has adopted a similar tower layout as the Proposed Scheme with 5 and 2 residential towers above the podia within the northern and southern parts of the site respectively. The building height restriction of 120mPD as stated on the current OZP has been adopted. **Table 2.1** below highlights the comparison of the proposed development parameters of the Baseline and Proposed Schemes. Both Schemes have fulfilled the Sustainable Building Design Guidelines (i.e. building separation, building setback, site coverage of greenery) and the Proposed Scheme is subject to detailed design and general building plan submissions at a later stage if it is approved for implementation.

Table 2.1 – Comparison of Development Parameters of Baseline Scheme and Proposed Scheme

	Baseline Scheme	**Proposed Scheme**
Zonings	R(A), Road	R(A), Road
Building Height Restriction	120mPD	140mPD
Proposed Towers Heights	Vary from 105-120mPD	Vary from 137-138mPD
Total PR	9	9
Domestic PR	7.5	8
Non-domestic PR	1.5	1

3. Visual Impact Analysis

3.1. Area for Assessment

Identification of Assessment Area

3.1.1. The assessment area for the VIA is defined by the visual envelope of the Scheme area. The visual envelope ("VE") has taken 3 times of the

proposed building height of the Scheme (i.e. 140mPD x 3 = 420m) as an assumption.

3.1.2. As indicated in **Figure 3.1**, the assessment area extends to Hop Yat Road to the north, encroaches part of On Wo Yuen and Mei King Mansion Phase 1 to the east, Shek Tong Street to the south, and Sheung Lok Street to the west. Apart from the coverage of the assessment area, a strategic vantage point from across the Victoria Harbour has also been identified, namely from Hong Kong Convention & Exhibition Centre (**Figure 3.2**).

Visual Context of the Assessment Area

3.1.3. The visual context is shaped by the combined composition of all the visual elements which come into sight of the viewers. Presently the assessment area is predominantly built-up areas dominated by the following visual elements:

- The Scheme area includes a cluster of 30 CBS sites, separated by a section of Maidstone Road and Kiang Su Street, where the southern section of Maidstone Road is a dead-end. The buildings are 5-6 storeys high and all residential in nature, and there are no retail shops within the Scheme area.

- The Scheme area and its vicinity comprise predominantly residential buildings, including private residential buildings of CBS along Kau Pui Lung Road, Maidstone Road and Ko Shan Road, and Lok Man Sun Chuen (59-81mPD) to the south / west of the Scheme. Several high-rise residential buildings are situated to the northwest of the Scheme, including Morning Joy Building (81mPD), City 151 (115mPD), 80 Maidstone Road (122mPD) and Celestial Heights (150mPD).

- To the east of the Scheme across Ma Tau Wai Road is a cluster of GIC and commercial uses, including BMW House (49mPD), Gainfall Centre (24mPD), To Kwa Wan Market and Government Offices (20-52mPD) and a number of educational facilities (26-32mPD).

- Extending further to the east and southeast of the Scheme across East Kowloon Corridor are mainly low to medium-rise residential buildings with lower floors used for commercial uses such as retail shops, and some high-density residential / commercial / industrial uses, such as City Hub (118mPD), iclub Ma Tau Wai Hotel (84mPD) and Wearbest Building (38-52mPD) in the To Kwa Wan area.

- Apart from the major visual elements discussed above, there are recreation grounds such as Ko Shan Theatre and Ko Shan Road Park located further south of the Scheme, as well as some scattered public open spaces located within the assessment area.

Visual Quality of Proposed Scheme

3.1.4. The proposed residential towers of the Scheme have adopted carefully considered designs on block sizes, disposition and layout to take into account the building separation to enhance permeability. Under the notional design, with a proposed building height of 140mPD and non-domestic PR of 1, slimmer residential blocks on top of smaller building footprints and lower podia can be achieved, which can enhance the building permeability and reduce the visual bulkiness of the podia. In order to promote visual openness, two wider visual corridors have been proposed along the existing Maidstone Road and Kiang Su Street. The massing of buildings has been carefully designed to minimise site coverage, and would therefore result in a slight increase in the building height from 120mPD to 140mPD, which is compatible with the building height restriction of the adjacent Lok Man Sun Chuen under the OZP. With the proposed massing layout and visual corridors, two ventilation

corridors in north-south (N-S) and east-west (E-W) directions would be created to enhance ventilation.

3.1.5. As the pedestrianised avenue / plaza will be provided within the Scheme, there will be a podia setback from the pedestrianised avenue / plaza to allow visual openness in the dense urban context particularly at the pedestrian level, bringing more visual and spatial comfort for future pedestrians walking along the pedestrianised avenue / plaza.

3.2. Identification of Viewpoints

3.2.1. Within the VE, the following five local viewpoints ("VPs") have been selected to assess the visual impact of the Scheme, covering the main pedestrian / vehicular view corridors from different directions and existing / future pedestrian nodes. Their locations are shown in **Figure 3.1**.

Local Viewpoints

(1) VP 1: Junction of Maidstone Road and Maidstone Lane
(2) VP 2: Kau Pui Lung Road
(3) VP 3: Lok Man Sun Chuen
(4) VP 4: Junction of Ko Shan Road and Kiang Hsi Street
(5) VP 5: Junction of Ma Tau Wai Road and Kiang Su Street

3.2.2. Other than the five selected local VPs, two medium- to long-range VPs are also considered but not selected, as negligible visual change is expected. For the long-range VP at Tin Kwong Road Recreation Ground, Celestial Heights of 150mPD is a major visual obstruction blocking most of the developments at Maidstone Road, including the proposed development. For the medium-range VP at Ko Shan Road Park, the adjacent Lok Oi Lau of Lok Man Sun Chuen will fully screen the proposed development.

3.2.3. Apart from the selected local VPs, a strategic vantage point is also identified and indicated in **Figure 3.2**.

Strategic Viewing Point

(6) VP 6: Hong Kong Convention & Exhibition Centre (Strategic Viewing Point 5)

3.3. Appraisal of Visual Impacts

3.3.1. For the visual appraisal of the local VPs, photomontages of three development scenarios have been prepared for the comparison of the changes before and after the proposed development at the Scheme area, namely:

i. **Existing Condition** – Existing development condition of the VPs is illustrated.

ii. **Baseline Scheme** – This scenario is an OZP-compliant Scheme which adopted a similar tower layout as the Proposed Scheme with 5 and 2 residential towers on top of the podia in the northern and southern parts of the site respectively. The building height restriction of 120mPD is adopted as permitted under the "R(A)" zone under the prevailing Ma Tau Kok OZP.

iii. **Proposed Scheme** – This scenario refers to the notional design of the Proposed Scheme, with minor relaxation of maximum building height restriction from 120mPD to 140mPD for the Scheme area. A building height of 140mPD is adopted as proposed in the revised draft DSP.

3.3.2. For the strategic viewing point, a photomontage of the Proposed Scheme is prepared. The appraisal of the visual impacts of each VP is summarised in **Table 3.1** below. The corresponding photomontages are shown in **Figures 3.3** to **3.8**.

Table 3.1 – Appraisal of Visual Impacts of Selected Viewpoints

Location of Viewpoints (VPs)	Distance and Direction between the VPs and the Scheme	Key Visually Sensitive Receivers (VSRs)	Visual Composition	Visual Obstruction and Visual Permeability	Effect on Visual Elements and Resources	Effect on VSRs	Resultant Overall Visual Impact
VP 1: Junction of Maidstone Road and Maidstone Lane	About 300m to the north of the Scheme	***Medium*** Mainly local residents living nearby and pedestrians passing by. A low level of pedestrian activity and shorter duration of activity are observed and anticipated.	As shown in **Figure 3.3**, the view from VP 1 is mainly low to medium-rise residential buildings along Maidstone Road in the foreground, and a partially shielded sky view as well as a high-rise residential building (80 Maidstone Road) in the background.	The proposed development will be located behind the existing buildings at Maidstone Road, only part of the tower blocks of both the Baseline Scheme and Proposed Scheme will be visible resulting in slight changes in the visual composition; of which the visual obstruction of the Proposed Scheme will slightly increase.	Part of the tower blocks will be visible from this VP, reducing the sky view and visual openness of the existing environment under both the Baseline Scheme and Proposed Scheme. If compared with the Baseline Scheme, there is no significant change in visual composition between the two Schemes.	Given the proposed development will slightly affect the visual composition of this VP, the effect of visual changes on VSRs from this VP is considered as low.	Slightly adverse

Location of Viewpoints (VPs)	Distance and Direction between the VPs and the Scheme	Key Visually Sensitive Receivers (VSRs)	Visual Composition	Visual Obstruction and Visual Permeability	Effect on Visual Elements and Resources	Effect on VSRs	Resultant Overall Visual Impact
VP 2: Kau Pui Lung Road	About 220m to the northwest of the Scheme	***Medium*** Mainly local residents living nearby and pedestrians passing by. A low level of pedestrian activity and shorter duration of activity are observed and anticipated.	As shown in **Figure 3.4**, the view from VP 2 is mainly low to medium-rise residential buildings along Kau Pui Lung Road as well as some high-rise residential buildings (Celestial Heights) in the foreground, and a partially shielded sky view in the background.	The proposed development will be located behind the existing buildings at Kau Pui Lung Road, and only a portion of the tower blocks of both the Baseline Scheme and Proposed Scheme will be revealed behind the buildings. Partial blockage of view by the Proposed Scheme will slightly reduce visual permeability.	A portion of the tower blocks will be visible from this VP, which will slightly reduce the sky view and visual openness compared to the existing condition. If compared with the Baseline Scheme, the scale of the Proposed Scheme will slightly increase and part of the skyline will be slightly obstructed.	Given the proposed development will slightly affect the visual composition of this VP, the effect of visual changes on VSRs from this VP is considered as low.	Slightly adverse
VP 3: Lok Man Sun Chuen	About 80m to the west of the Scheme	***Medium*** Mainly local residents (including students of the Kei To Primary	As shown in **Figure 3.5**, the view from VP 3 is framed by low to medium-rise residential buildings in the foreground, and a partially shielded sky	Both the Baseline Scheme and Proposed Scheme will become the dominant visual element in the foreground by	The key visual resources from this VP are the existing built-up areas. With the proposed development, the	Viewers from this VP are mainly local residents and pedestrians passing by with relatively short	Partly enhanced/partly adverse

Location of Viewpoints (VPs)	Distance and Direction between the VPs and the Scheme	Key Visually Sensitive Receivers (VSRs)	Visual Composition	Visual Obstruction and Visual Permeability	Effect on Visual Elements and Resources	Effect on VSRs	Resultant Overall Visual Impact
		School) living nearby and pedestrians passing by. Considering that this VP is close to the Scheme area, a low level of pedestrian activity and shorter duration of activity are observed and anticipated.	view as well as a high-rise residential building (City Hub) and iclub Ma Tau Wai Hotel in the background.	replacing the buildings of CBS with a modern development. Due to its close proximity, the proposed development will result in some blockage of existing views and affect the existing visual permeability. However, the degree of visual obstruction and loss of views will be reduced through a wider building gap, less bulky podia design and open space provided by the Proposed Scheme as compared to the Baseline Scheme.	tower blocks will be the dominant visual element, reducing the sky view and visual openness and creating moderate visual change to this VP. However, with the proposed massing layout and wider visual corridor along Kiang Su Street, the Proposed Scheme will have enhanced visual permeability at the pedestrian level along Kiang Su Street as compared with Baseline Scheme.	sight duration towards the Scheme area, the effect of visual changes on VSRs from this VP is considered as low.	

Location of Viewpoints (VPs)	**Distance and Direction between the VPs and the Scheme**	**Key Visually Sensitive Receivers (VSRs)**	**Visual Composition**	**Visual Obstruction and Visual Permeability**	**Effect on Visual Elements and Resources**	**Effect on VSRs**	**Resultant Overall Visual Impact**
VP 4: Junction of Ko Shan Road and Kiang Hsi Street	About 250m to the south of the Scheme	***Medium*** Mainly local residents living nearby and pedestrians passing by. A low level of pedestrian activity and shorter duration of activity are observed and anticipated.	As shown in **Figure 3.6**, the view from VP4 is framed by a low-rise and some high-rise residential buildings (Lok Man Sun Chuen) as well as the Church of the Good Shepherd along Ko Shan Road in the foreground, and a partially shielded sky view as well as a mix of low to high-rise residential buildings in the background.	The proposed development will be located behind the existing buildings at Ko Shan Road as a backdrop, only part of the tower blocks and podia of both the Baseline Scheme and Proposed Scheme will be visible, resulting in minor blockage of the sky view and slightly affecting the existing visual permeability. The Proposed Scheme will provide less bulky podia design to enhance visual permeability as compared to the Baseline Scheme.	Part of the tower blocks and podia will be visible from this VP, slightly reducing the sky view and visual openness of the existing environment under both the Baseline Scheme and Proposed Scheme. With the proposed massing layout and wider visual corridor along Maidstone Road, the Proposed Scheme will have enhanced visual permeability at the pedestrian level as compared with Baseline Scheme.	Given the proposed development will slightly affect the visual composition of this VP, the effect of visual changes on VSRs from this VP is considered as low.	Partly enhanced/partly adverse

Location of Viewpoints (VPs)	**Distance and Direction between the VPs and the Scheme**	**Key Visually Sensitive Receivers (VSRs)**	**Visual Composition**	**Visual Obstruction and Visual Permeability**	**Effect on Visual Elements and Resources**	**Effect on VSRs**	**Resultant Overall Visual Impact**
VP 5: Junction of Ma Tau Wai Road and Kiang Su Street	About 100m to the east of the Scheme	***High*** Mainly local residents living nearby, business operators / workers from Gainfall Centre, and pedestrians passing by. This VP is close to the Scheme area and active pedestrian activities are anticipated with the operation of To Kwa Wan MTR Station.	As shown in **Figure 3.7**, the view from VP 5 is mainly low to medium-rise residential buildings in the foreground, and a partially shielded sky view in the background.	The proposed development will be located behind the existing buildings at Ma Tau Wai Road / Kiang Su Street as a backdrop, and only part of the tower blocks and podia of both the Baseline Scheme and Proposed Scheme will be visible, resulting in visual obstruction. The Proposed Scheme will affect the existing visual permeability along Kiang Su Street, but provide a wider building gap as compared with Baseline Scheme.	Part of the tower blocks and podia will be visible from this VP, reducing the sky view and visual openness of the existing environment under both the Baseline Scheme and Proposed Scheme. If compared with Baseline Scheme, the Proposed Scheme will affect the visual permeability along Kiang Su Street, however, the overall massing will create less adverse impacts on visual elements.	Given the Proposed Scheme will block the view corridor along Kiang Su Street and induce noticeable blockage of the sky view, the perception of the VSRs from this VP will be affected. The effect on VSRs from this VP is considered as moderate.	Moderately adverse

Location of Viewpoints (VPs)	**Distance and Direction between the VPs and the Scheme**	**Key Visually Sensitive Receivers (VSRs)**	**Visual Composition**	**Visual Obstruction and Visual Permeability**	**Effect on Visual Elements and Resources**	**Effect on VSRs**	**Resultant Overall Visual Impact**
VP 6: Hong Kong Convention & Exhibition Centre	About 4km to the southwest of the Scheme, on the opposite side of the Victoria Harbour	***Low*** Users in the Hong Kong Convention & Exhibition Centre, and along the Wan Chai waterfront promenade. Although active pedestrian activities are anticipated, this VP is far from the Scheme area and only a very limited and unnoticeable part of the proposed development will be visible.	As shown in **Figure 3.8**, the proposed development is outside of the photo extracted from the Strategic Viewing Points Webpage of the Planning Department. According to the skyline analysis by the 3D GIS software system, only a very limited part of the proposed development will be visible when viewing from the VP on the opposite side of the Victoria Harbour. In view of the substantial mass of development that surrounds the Scheme, the change in visual context is considered to be negligible.	Both the mountain ridgeline and the limit of the 20% building-free zone will not be interrupted by the Scheme. Given the Scheme is situated in the inland area, which is at least 2.2km away from the Victoria Harbour, no adverse impact on visual permeability from the VP is anticipated.	The main visual elements and attention of VSRs towards the Kowloon Peninsula will mainly focus on the Victoria Harbour in the foreground as well as the mountain backdrop and sky view in the background. In view of the non-protrusion of the proposed development towards the building-free zone and the ridgeline and the far distance of the Scheme away from the VP, the effect on visual elements is negligible.	The VP is considered far away from the Scheme and only a very limited part of the proposed development will be visible from this VP. The effect on VSRs is considered as low.	Negligible

4. Evaluation of Overall Visual Impact

4.1. This VIA evaluates the degree of visual impacts on VSRs from major public VPs due to the proposed development at the Scheme area.

4.2. By viewing from the five selected local VPs, the proposed development with 140mPD in the Scheme generally blends in with the surrounding built environment. It generally respects the stepped building height profile from the inland area towards the waterfront, i.e. with the residential developments across Kau Pui Lung Road and the Scheme of 140mPD, and gradually down to about 100mPD to 120mPD towards To Kwa Wan in the east.

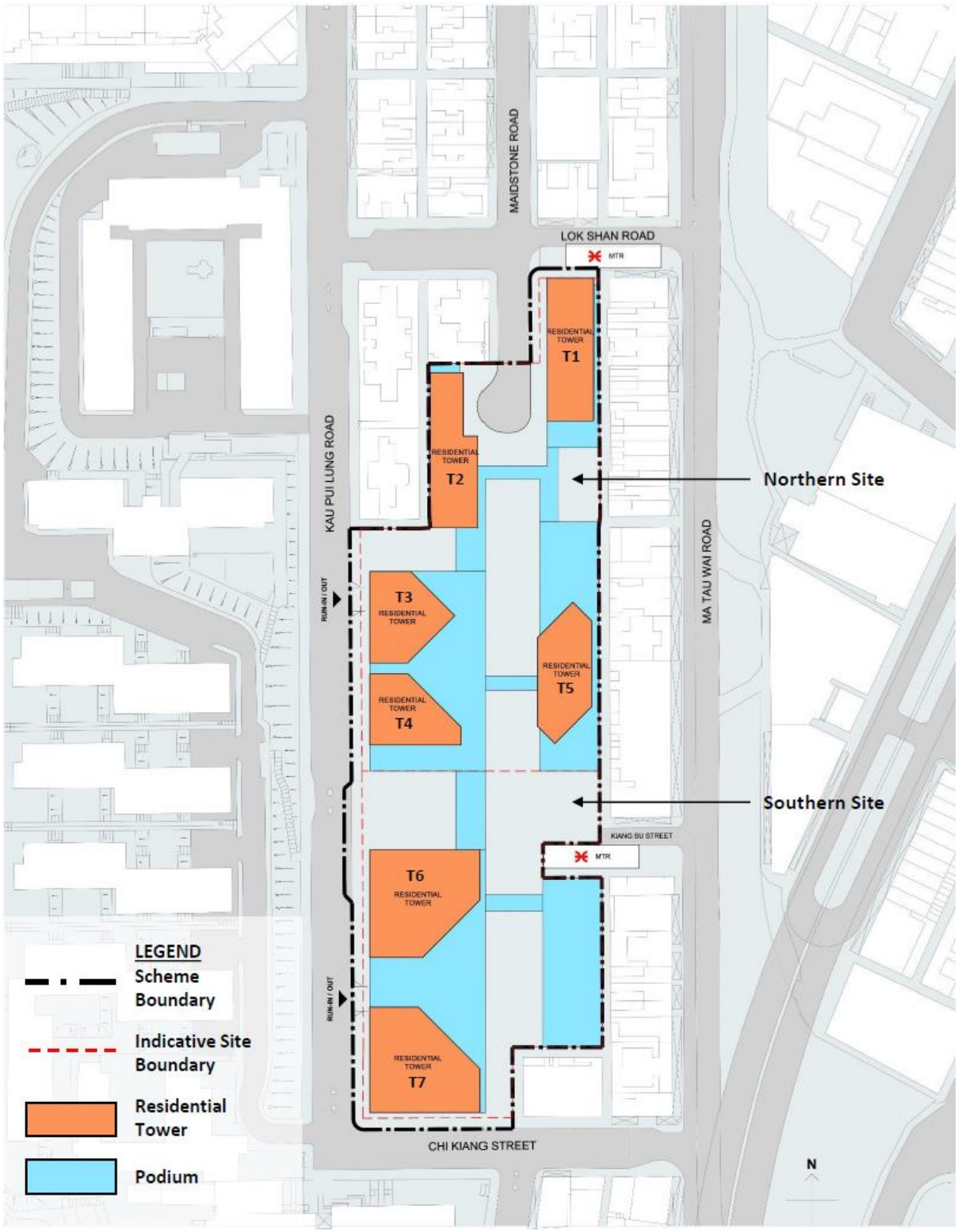
4.3. As compared with the maximum building height restriction capped at 120mPD under the Draft Ma Tau Kok OZP No. S/K10/29, the proposed increase of building height to 140mPD will facilitate greater design flexibility of the building blocks to enhance permeability and reduce the visual bulkiness of the podia. Given the Proposed Scheme and Baseline Scheme are visually similar, but only the Proposed Scheme can fulfil the objectives of the PAs to increase housing supply whilst providing more SH units in the Scheme area, the minor visual difference between the Proposed Scheme and Baseline Scheme is considered acceptable.

4.4. In addition, a section of Maidstone Road and Kiang Su Street have been included as part of the Scheme area for the creation of a vehicular-free environment, as a pedestrianised avenue / plaza is proposed within the Scheme. With the proposed massing layout and two proposed visual corridors in N-S and E-W directions, visual openness will be enhanced in the dense urban context, particularly at the pedestrian level, and more visual and spatial comfort will be brought to future pedestrians walking along the pedestrianised avenue / plaza.

4.5. In conclusion, the VIA demonstrates that the proposed development in the Scheme with 140mPD is considered visually compatible with the surrounding environment, and will not create any significant adverse impacts or blockage of

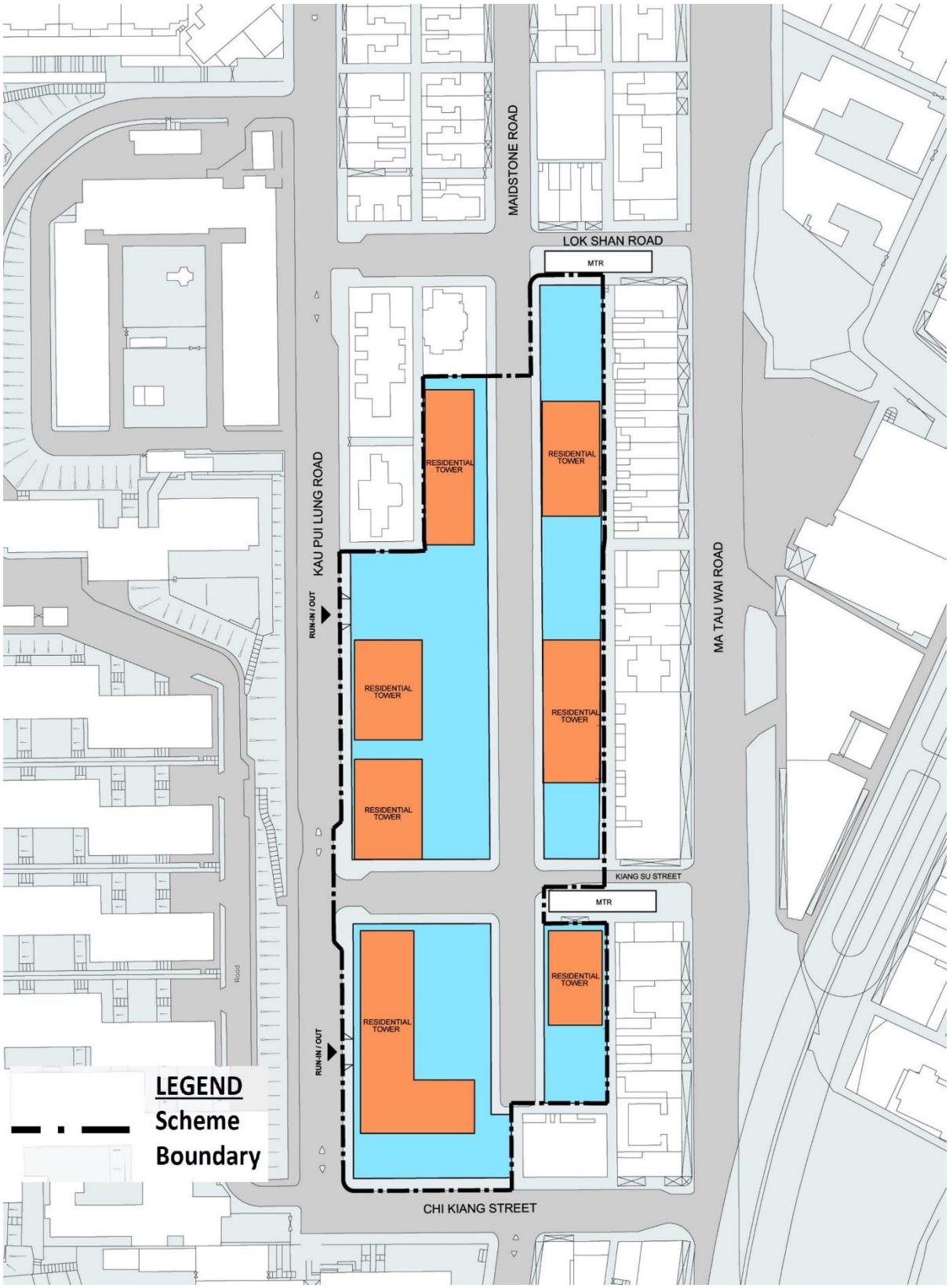
views from both the strategic VP as recommended in the HKPSG and the key local VPs.

URBAN RENEWAL AUTHORITY
February 2023



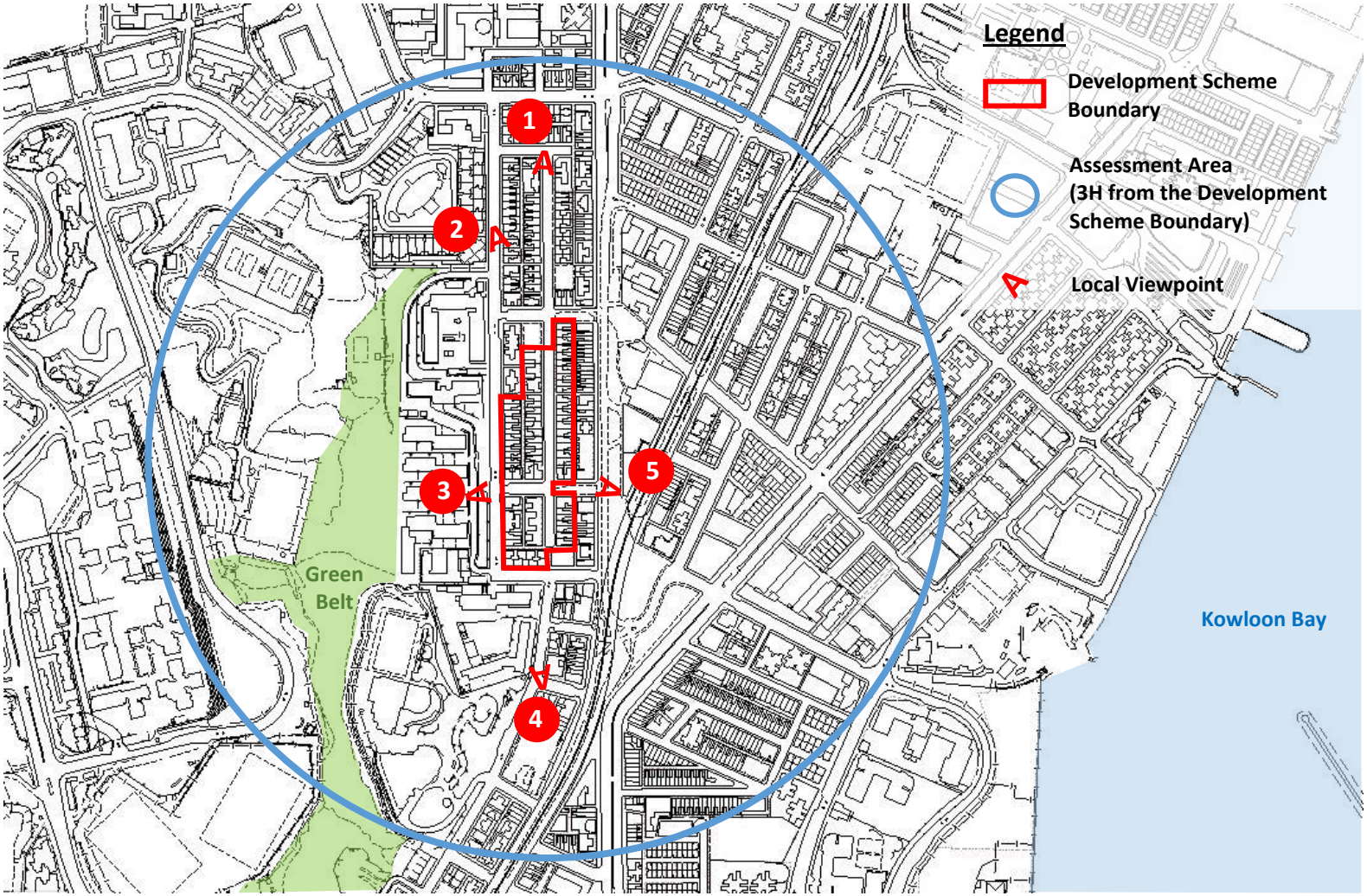
(Notional layout subject to detailed design upon DSP approval.)

市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Block Plan (Proposed Scheme - 140mPD)	**Figure 2.1**	Scale 1:1500 (A4)



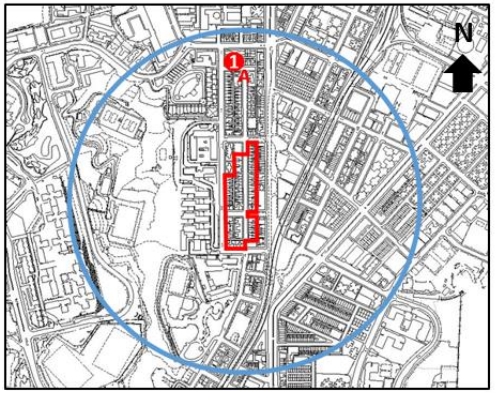
(Notional layout subject to detailed design upon DSP approval.)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Block Plan (Baseline Scheme - 120mPD)	**Figure 2.2**	Scale 1:1500 (A4)



市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Site Plan (5 Local Viewpoints)	**Figure 3.1**	Not to Scale

市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Site Plan (Strategic Viewing Point 5) – Hong Kong Convention & Exhibition Centre	**Figure 3.2**



Existing Condition

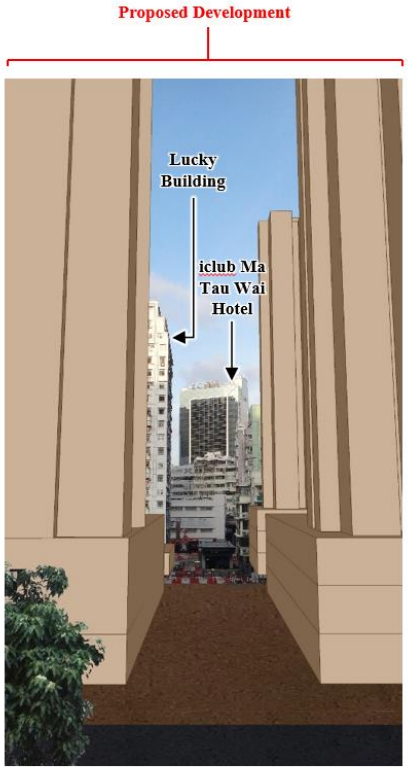
Baseline Scheme (120mPD)

Proposed Scheme (140mPD)

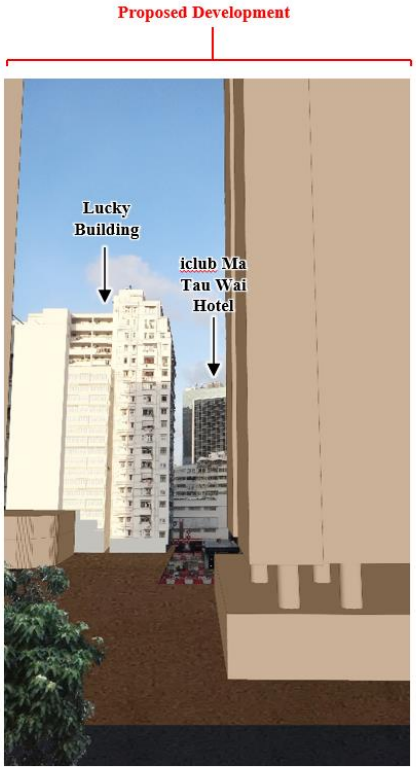
市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	VP 1 – Junction of Maidstone Road and Maidstone Lane	**Figure 3.3**

Existing Condition | **Baseline Scheme (120mPD)** | **Proposed Scheme (140mPD)**

Existing Condition

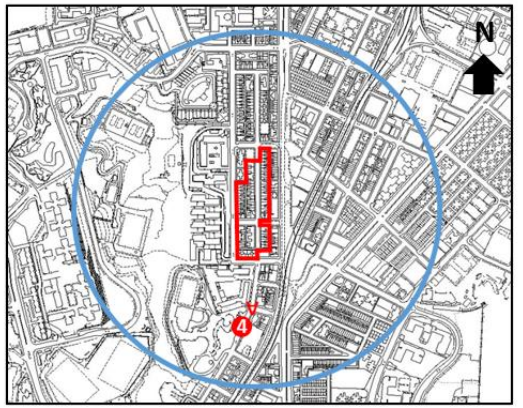


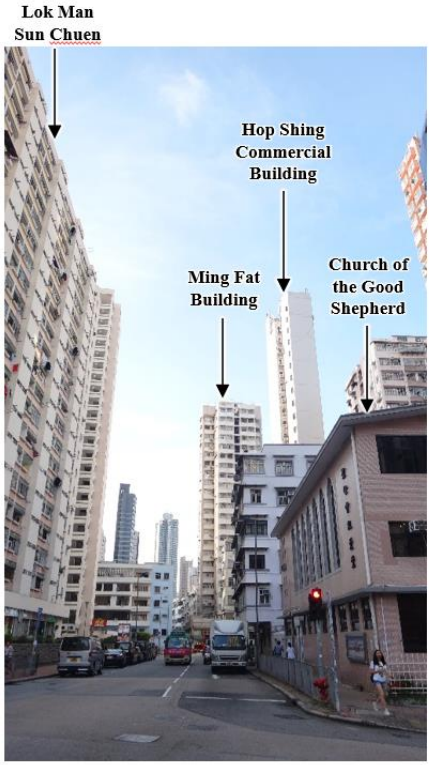
Baseline Scheme (120mPD)



Proposed Scheme (140mPD)

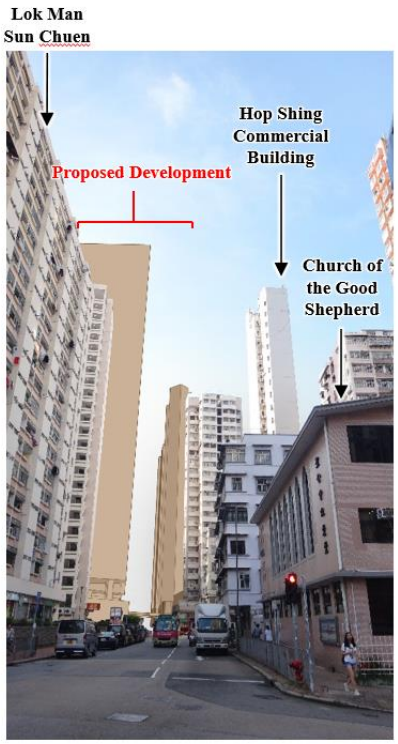
市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	VP 3 – Lok Man Sun Chuen	**Figure 3.5**



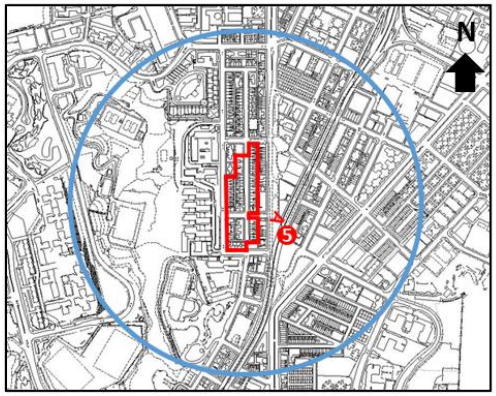


Existing Condition

Baseline Scheme (120mPD)



Proposed Scheme (140mPD)

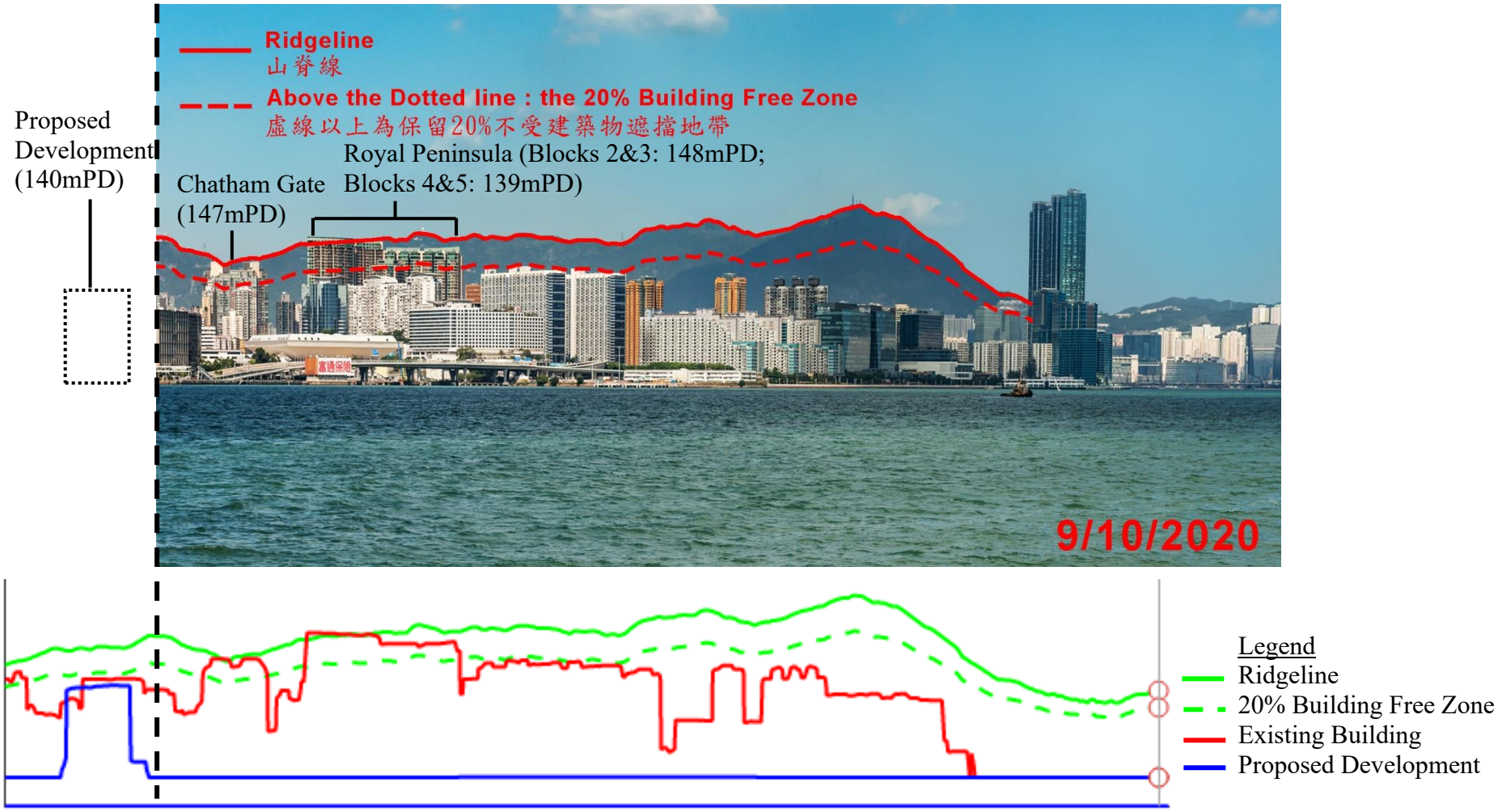


Existing Condition

Baseline Scheme (120mPD)

Proposed Scheme (140mPD)

市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	VP 5 – Junction of Ma Tau Wai Road and Kiang Su Street	**Figure 3.7**



(Up) Photo extracted from Strategic Viewing Points Webpage of Planning Department for the Town Planning Board Guidelines for Submission of Visual Impact Assessment to the Town Planning Board (TPB PG-No. 41) https://www.pland.gov.hk/pland_en/info_serv/via/web/vp_eng.html
(Below) Skyline analysis by 3D GIS software system

市區重建局 URBAN RENEWAL AUTHORITY	URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	VP 6 – Strategic Viewing Point 5, Hong Kong Convention & Exhibition Centre, (Proposed Scheme with 140mPD)	**Figure 3.8**

TIA (RtoC_8)

(Feb 2023)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Traffic Impact Assessment

(January 2023)

CTA Consultants Limited
志達顧問有限公司

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1. INTRODUCTION

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Traffic Impact Assessment (TIA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 CTA Consultants Limited (CTA) has been commissioned by URA as the traffic consultant to prepare the TIA and to provide technical justifications in supporting the application from a traffic engineering point of view.

1.1.3 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

1.1.4 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1.1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development

and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

1.3 Proposed Development

1.3.1 To address the above changes in the draft DSP, it is considered necessary to revise the TIA to support the re-submission to TPB for consideration.

1.4 Objectives

1.4.1 The site will be redeveloped for high-density residential development with the provision of commercial use, Government, Institution or Community (GIC) facilities, open space for public use, and underground public vehicle park.

1.4.2 Main objectives of this study are listed below:

- To assess the existing and proposed traffic arrangements & provision of internal transport facilities at the subject site;
- To assess the existing traffic condition in the vicinity of the proposed development;
- To estimate traffic trips related to the proposed development;
- To carry out forecasts about traffic demand of the adjacent road network in the design year 2036;
- To appraise any possible traffic impact induced by the proposed development on the adjacent road network;
- To recommend traffic improvement measures to alleviate any foreseeable traffic problem to the surrounding road network, if any.

1.5 Structure of the Report

1.5.1 Following this introductory chapter, there are FIVE further chapters:

- **Chapter 2 – THE PROPOSED DEVELOPMENT**, which presents the site

location and operation information of the proposed development;

- **Chapter 3 – EXISTING TRAFFIC CONDITION**, which describes the existing local road network and vehicular traffic conditions in the vicinity of the subject site;
- **Chapter 4 – FUTURE TRAFFIC CONDITION & TRAFFIC IMPACT ASSESSMENT**, which estimates future vehicular traffic on the surrounding road network, and presents findings of the traffic impact assessment for the design year 2036;
- **Chapter 5 – PEDESTRIAN ASSESSMENT**, which describes the existing pedestrian network in the vicinity of the subject site and estimates the future condition for design year 2036; and

- **Chapter 6 – SUMMARY AND CONCLUSION**, which summarizes the study findings and presents the conclusion regarding the proposed development.

1.6 Major Changes from Previous TIA (February 2022)

1.6.1 A TIA for the same site was submitted to Transport Department (TD) in February 2022. The major changes in this TIA from the previous TIA (February 2022) are listed below:

- Development parameters were updated.
- Target completion year was changed from 2030 to 2033.
- New surveys were carried on September 2022.
- Assessment on critical road links was added.
- Growth rate was reviewed based on new 2019-based TPEDM
- New adjacent developments were considered.

2. THE PROPOSED DEVELOPMENT

2.1 Site Location

2.1.1 The application site is located in To Kwa Wan, Kowloon as shown in **Figure 1.1**.

2.2 Development Proposal

2.2.1 At present, there are existing CBS residential buildings within the proposed development Site.

2.2.2 The proposed development will comprise of 2 sites, i.e. "Northern Site" and "Southern Site" **(Figure 2.1)**. Development Parameters of the proposed development are listed in **Table 2.1**.

Table 2.1 Development Parameters of the Proposed Development

	Northern Site	Southern Site	Whole Project
Net Site Area*	Around 8,587 m^2	Around 6,888 m^2	15,475 m^2
Proposed Domestic GFA	Around 68,700 m^2 (PR 8)	Around 55,100 m^2 (PR 8)	Around 123,800 m^2 (PR 8)
Proposed Non-Domestic GFA	Around 8,587 m^2 (PR 1)	Around 6,888 m^2 (PR 1)	Around 15,475 m^2 (PR 1)
	GIC: 500 m^2	GIC: 2,000 m^2	GIC: 2,500 m^2
Total GFA	Around 77,287 m^2 (PR 9)	Around 61,988m^2 (PR 9)	Around 139,275 m^2 (PR 9)
Total Number of Residential Flats	About 1,374 units	About 950 units	About 2,324 units
No. of Blocks	5	2	7

**Subject to site survey, Net Site Area includes all private lots, the existing sections of Maidstone Road and Kiang Su Street, and Government lanes, but excludes public pavement at the periphery where affected buildings overhang within the Project. The site boundaries between Northern Site and Southern Site is indicative and subject to change.*

2.2.3 It is anticipated that the proposed development will be completed in year 2033. Therefore, design year 2036 (i.e. 3 years after the planned commencement year of the proposed development) is adopted for the TIA.

2.3 Road Closure

2.3.1 Under the proposed scheme, sections of Kiang Su Street and Maidstone Road will be permanently closed and become part of the Site. The existing traffic flow along these roads are relatively low and mainly serve for the pick-up / drop-off of existing residential buildings and on-street parking. As a public vehicle car park will be re-provided within the Site, the closure of these roads would not give significant impact to the traffic network.

2.3.2 The section of Kiang Su Street between Maidstone Road and Ma Tau Wai Road would be converted from 2-way to 1-way due to the entrance/exit of the SCL: To Kwa Wan MTR Station. As Maidstone Road and the remaining section of Kiang Su Street would be closed due to this project, it is proposed to convert the remaining section of Kiang Su Street as a footpath.

2.3.3 Besides, due to the closure of Kiang Su Street, vehicles from Kau Pui Lung Road cannot access Ma Tau Wai Road northbound via Kiang Su Street. To maintain the traffic circulation, it is proposed to convert the section of Chi Kiang Street between Ko Shan Road and Ma Tau Wai Road from westbound to eastbound. Hence, vehicles from Kau Pui Lung Road can access Ma Tau Wai Road northbound via this section of Chi Kiang Street. For details, please refer to **Section 4.8**.

2.4 Provision of Internal Transport Facilities

2.4.1 **Table 2.2** summarizes the internal transport facilities provisions for the proposed development required as stipulated in the latest Hong Kong Planning Standards and Guidelines (HKPSG) requirements.

Table 2.2 Required Internal Transport Facilities Provision under the Latest HKPSG Requirements

Proposed Development				Parking Requirement					Loading/Unloading Requirement
				Private Car Parking Space				Motorcycle Parking Space	Loading / Unloading Bay for Goods Vehicles
Northern Site	Private Housing	GFA	No. of Flat	GPS: 1 space per 4-7 flats			GPS x R1 x R2 x R3	1 space per 100-150 flats	Provision of minimum 1 L/UL bay for goods vehicles within the site for every 800 flats or part thereof, subject to a minimum of 1 bay for each housing block or as determined by the Authority
				R1	*R2*	*R3*			
		40 <FS≤ 70	1,374	1.2	0.75	0.9	159 to 279		
		Nos. of Block		5 visitor spaces per block					
		5		25				10 to 14	HGV: 5
	Retail	GFA		1 space per 150-300 m^2 GFA				5 to 10% of total provision of retail car parking spaces	1 bay for every 800 to 1,200 m^2
		8,587 m^2		29 to 58				2 to 6	8 (LGV:5, HGV:3) to 11 (LGV:7, HGV:4)
	GIC	500 m^2		1[(4)]				N/A[(4)]	N/A[(4)]
	Sub Total			**214[(2)] to 363[(3)]**				**12 to 20**	**13 (LGV:5, HGV:8) to 16 (LGV:7, HGV:9)**
Southern Site	Private Housing	GFA	No. of Flat	GPS: 1 space per 4-7 flats			GPS x R1 x R2 x R3	1 space per 100-150 flats	Provision of minimum 1 L/UL bay for goods vehicles within the site for every 800 flats or part thereof, subject to a minimum of 1 bay for each housing block or as determined by the Authority
				R1	R2	R3			
		40 <FS≤ 70	950	1.2	0.75	0.9	110 to 193		
		Nos. of Block		5 visitor spaces per block					
		2		10				7 to 10	HGV: 2
	Retail	GFA		1 space per 150-300 m^2 GFA				5 to 10% of total provision of retail car parking spaces	1 bay for every 800 to 1,200 m^2
		6,888 m^2		23 to 46				2 to 5	6 (LGV:4, HGV:2) to 9 (LGV:6, HGV:3)
	GIC	2,000 m^2		2[(5)]				N/A[(5)]	N/A[(5)]
	Sub Total			**145[(1)] to 251[(1)]**				**9 to 15**	**8 (LGV:4, HGV:4) to 11 (LGV:6, HGV:5)**

(1) Including 2 accessible car parking spaces for total 51-150 number of parking spaces

(2) Including 3 accessible car parking spaces for total 151-250 number of parking spaces

(3) Including 4 accessible car parking spaces for total 251-350 number of parking spaces

(4) No Standard requirement under HKPSG, 1 car parking space is proposed to be provided for ancillary use

(5) No Standard requirement under HKPSG, 2 car parking spaces are proposed to be provided for ancillary use

Proposed Internal Transport Facilities Provision

2.4.2 The upper limit of the internal transport facilities provision is proposed in the proposed development. The proposed internal transport facilities provision is summarized as **Table 2.3** below:

Table 2.3 Proposed Provisions of Internal Transport Facilities

Site	Type		Proposed Number of Spaces	
Northern Site	Private Housing	Private Cars (Ancillary)	279	304[4]
		Private Cars (Visitor)	25	
		Motorcycles	14	
		L/UL for HGV	5	
	Retail	Private Cars	58[2]	
		Motorcycles	6	
		L/UL for LGV	7	
		L/UL for HGV	4	
	GIC	Private Cars	1	
Southern Site	Private Housing	Private Cars (Ancillary)	193	203[3]
		Private Cars (Visitor)	10	
		Motorcycles	10	
		L/UL for HGV	2	
	Retail	Private Cars	46[1]	
		Motorcycles	5	
		L/UL for LGV	6	
		L/UL for HGV	3	
	GIC	Private Cars	2	

Notes: (1) Including 1 accessible car parking space for total 1-50 number of parking spaces

(2) Including 2 accessible car parking spaces for total 51-150 number of parking spaces

(3) Including 3 accessible car parking spaces for total 151-250 number of parking spaces

(4) Including 4 accessible car parking spaces for total 251-350 number of parking spaces

2.4.3 The basement floor and ground floor layout plans of the proposed development are shown in **Figures 2.1** and **2.4** respectively.

2.4.4 One hundred (100) on-street parking spaces along the eastern kerbside of Kau Pui Lung Road, Maidstone Road and Kiang Su Street will be re-provided within the Site due to the road closure. A public vehicle car park with a total of 164 nos. of private car parking spaces will be re-provided at Northern Site to address the local demand.

2.5 Provision Access Arrangement

2.5.1 The vehicular accesses of the Northern Site and Southern Site will be located at Kau Pui Lung Road respectively. The locations of vehicular access are shown in **Figure 2.2**.

2.5.2 To facilitate the pick-up/drop-off activities for the Site, a cul-de-sac to serve cars and LGVs is proposed to be provided at the remaining section of Maidstone Road at the north of the Site. It will be managed and maintained by the project proponent or its agent and it will be opened for 24 hours without vehicular gate to the public. The preliminary design of the cul-de-sac will cater for short time car/taxi pick-up/drop-off, loading/unloading and U-turning of vehicles of those who mistakenly turn into this section of Maidstone Road.

3. EXISTING TRAFFIC CONDITION

3.1 Existing Road Network

3.1.1 The existing road network in the vicinity of the subject site is shown in **Figure 3.1**.

3.1.2 The proposed accesses of the Application Site are located at Kau Pui Lung Road which is a local distributor. The egress traffic can be via Lok Shan Road to Ma Tau Wai Road southbound or Tin Kwong Road to other places.

3.1.3 Tin Kwong Road is a district distributor which connects Ma Tau Wai Road, Sheung Shing Street and Argyle Street. Tin Kwong Road leads traffic to Ho Man Tin and Mong Kok areas.

3.1.4 Ma Tau Wai Road is a primary distributor which connects Ma Tau Chung Road and Chatham Road North to allow access to Hong Kong or Kowloon East areas.

3.2 Critical Junctions

3.2.1 24 junctions are identified to be critical for the Traffic Impact Assessment due to the proposed development. Relevant details are listed in **Table 3.1** and shown in **Figure 3.1**. Existing junction layouts are tabulated in **Figures 3.2** to **3.25** respectively.

3.2.2 In order to study the existing traffic condition of the above junctions, traffic survey in the form of manual-classified count was conducted for the 24 junctions during the weekday AM and PM peak periods on a typical weekday in September 2022. The survey provides most up-to-date details of the traffic condition within the study area under normal operation. Based on the observed traffic flows, it revealed that weekday AM and PM peak hour occurred from 07:45AM to 08:45AM, 05:45PM to 06:45PM respectively. The observed traffic flows are presented in **Figure 3.26**.

3.2.3 Existing operational performance of the critical junctions and road links are listed in **Tables 3.2** and **3.3** below.

Table 3.1 Identified Critical Junctions

Ref.	Junction	Type	Figure No.
A	Tin Kwong Road / Sheung Shing Street	Signalized	3.2
B	Tin Kwong Road / Kau Pui Lung Road	Signalized	3.3
C	Ma Tau Wai Road / Tin Kwong Road / Ma Hang Chung Road	Signalized	3.4
D	Kau Pui Lung Road / Lok Shan Road	Priority	3.5
E	Ma Tau Wai Road / Lok Shan Road	Signalized	3.6
F	Chi Kiang Street / Ko Shan Road	Priority	3.7
G	Ma Tau Wai Road / Chi Kiang Street	Signalized	3.8
H	Argyle Street / Waterloo Road / Princess Margaret Road	Signalized	3.9
I	Argyle Street / Tin Kwong Road	Signalized	3.10
J	Fat Kwong Street / Sheung Shing Street	Signalized	3.11
K	Sheung Shing Street / Shek Ku Street / Sheung Shing Lane	Signalized	3.12
L	Sheung Shing Street / Sheung Lok Street	Priority	3.13
M	Tin Kwong Road / Farm Road	Signalized	3.14
N	Ma Tau Chung Road/ Sung Wong Toi Road / Fu Ning Street	Signalized	3.15
O	Ma Tau Chung Road / Ma Tau Kok Road	Signalized	3.16
P	Ma Tau Wai Road / Farm Road / Tam Kung Road	Signalized	3.17
Q	Sung Wong Toi Road / To Kwa Wan Road / Shing Kai Road	Signalized	3.18
R	Mok Cheong Street / To Kwa Wan Road	Signalized	3.19
S	Ma Tau Kok Road / To Kwa Wan Road	Signalized	3.20
T	San Shan Road / To Kwa Wan Road	Signalized	3.21
U	To Kwa Wan Road / Sheung Heung Road / Kwei Chow Street	Signalized	3.22
V	Chatham Road North / San Lau Street	Signalized	3.23
W	Fat Kwong Street / Shun Tung Street / Yan Fung Street	Signalized	3.24
X	Hung Hom Road / Fat Kwong Street Flyover / Tai Wan Road East	Signalized	3.25

Table 3.2 Operational Performance of Critical Junctions in Year 2022

Ref.	Junction	Method of Control	Year 2022 DFC/RC (1)	
			Weekday AM Peak	Weekday PM Peak
A	Tin Kwong Road / Sheung Shing Street	Signalized	+65%	>+100%
B	Tin Kwong Road / Kau Pui Lung Road	Signalized	>+100%	>+100%
C	Tin Kwong Road / Ma Tau Wai Road	Signalized	+28%	+25%
D	Kau Pui Lung Road / Lok Shan Road	Priority	0.11	0.11
E	Ma Tau Wai Road / Lok Shan Road	Signalized	>+100%	>+100%
F	Chi Kiang Street / Ko Shan Road	Priority	0.31	0.23
G	Ma Tau Wai Road / Chi Kiang Street	Signalized	+72%	+97%
H	Argyle Street / Waterloo Road / Princess Margaret Road	Signalized	>+100%	>+100%
I	Argyle Street / Tin Kwong Road	Signalized	+66%	+71%
J	Fat Kwong Street / Sheung Shing Street	Signalized	+93%	>+100%
K	Sheung Shing Street / Shek Ku Street / Sheung Shing Lane	Signalized	+83%	+60%
L	Sheung Shing Street / Sheung Lok Street	Priority	0.33	0.25
M	Tin Kwong Road / Farm Road	Signalized	+84%	>+100%
N	Ma Tau Chung Road / Sung Wong Toi Road / Fu Ning Street	Signalized	+62%	+56%
O	Ma Tau Chung Road / Ma Tau Kok Road	Signalized	+82%	>+100%
P	Ma Tau Wai Road / Farm Road / Tam Kung Road	Signalized	>+100%	>+100%
Q	Sung Wong Toi Road / To Kwa Wan Road / Shing Kai Road	Signalized	+98%	>+100%
R	Mok Cheong Street / To Kwa Wan Road	Signalized	>+100%	>+100%
S	Ma Tau Kok Road / To Kwa Wan Road	Signalized	>+100%	>+100%
T	San Shan Road / To Kwa Wan Road	Signalized	+40%	+54%
U	To Kwa Wan Road / Sheung Heung Road / Kwei Chow Street	Signalized	>+100%	>+100%
V	Chatham Road North / San Lau Street	Signalized	+93%	>+100%
W	Fat Kwong Street / Shun Tung Street / Yan Fung Street	Signalized	+65%	>+100%
X	Hung Hom Road / Fat Kwong Street Flyover / Tai Wan Road East	Signalized	+18%	+27%

Notes: (1) RC = Reserve Capacity for Signal Junction;
DFC = Design Ratio of Flow to Capacity for Priority Junction/Roundabout

Table 3.3 V/C Ratio of Critical Road Link in Year 2022

Index	Direction	Cap. (veh/hr) (C)	Observed Case			
			Flow (veh/hr) (V)		V/C	
			AM Peak	PM Peak	AM Peak	PM Peak
L1	Two-way	1700	920	710	0.54	0.42
L2	NB	4200	995	1040	0.24	0.25
L2	SB	4200	1300	905	0.31	0.22
L3	Two-way	1700	1140	705	0.67	0.41
L4	Two-way	1700	345	280	0.2	0.16
L5	NB	4200	675	770	0.16	0.18
L5	SB	4200	1465	1160	0.35	0.28
L6	Two-way	1700	160	135	0.09	0.08
L7	NB	4200	610	675	0.15	0.16
L7	SB	4200	1225	1040	0.29	0.25
L8	NB	4200	1020	1060	0.24	0.25
L8	SB	4200	1015	1025	0.24	0.24
L9	NB	4200	1450	1490	0.35	0.35
L9	SB	4200	1940	1745	0.46	0.42

Notes: (1) Index please refer to Figure 3.1

3.2.4 The assessment results in **Tables 3.2 and 3.3** indicate that all critical junctions and road link are at present operating with positive capacities during the peak hours.

3.3 Public Transport Services in the Vicinity

3.3.1 Numerous road-based public transport services, for instance, franchised buses and GMB are also provided in vicinity of the proposed development. Details of the current services of franchised buses and GMB routes within the catchment area of 500 meters are listed in **Table 3.4**.

Table 3.4 Public Transport Services in the Vicinity of the Proposed Development

Service	Route	Origin - Destination	Frequency (min)
Franchised Bus	2E	Kowloon City Ferry Pier – Pak Tin Estate	15-25
	3B	Tsz Wan Shan (Central) – Hung Hom (Hung Luen Road)	15-25
	5	Fu Shan – Star Ferry Pier	8-20
	5A[1]	Kowloon City (Shing Tak Street) – Star Ferry Pier	12-30
	5C	Tsz Wan Shan (Central) – Star Ferry Pier	6-12
	5D	Telford Gardens – Hung Hom	15-35
	5P[1]	Tsz Wan Shan (Central) – Star Ferry Pier	15
	6C	Kowloon City Ferry Pier – Mei Foo	9-12
	6F	Kowloon City Ferry – Lai Kok Estate	20-30

Service	Route	Origin - Destination	Frequency (min)
	6X[1]	Mei Foo – Kowloon City Ferry Pier	30
	11	Diamond Hill Station – Kowloon Station	10-20
	11K	Chuk Yuen Estate – Hung Hom Station	15-20
	11X	Sau Mau Ping (Upper) – Hung Hom Station	10-20
	12A	Whampoa Garden – Cheung Sha Wan (Sham Mong Road)	8-20
	14	Lei Yue Mun Estate – China Ferry Pier Terminal	12-25
	15	Ping Tin – Hung Hom (Hung Luen Road)	12-20
	15X[1]	Lam Tin (Kwong Tin Estate) – Hung Hom Station	20
	17	Kwun Tong (Yue Man Square) – Oi Man	5-20
	21	Choi Wan – Hung Hom Station	15-25
	26	Shun Tin – Tsim Sha Tsui East	7-20
	28	Lok Wah – Star Ferry Pier	8-15
	41	Tsing Yi (Cheung Ching Estate) – Kowloon City Ferry Pier	25-35
	45	Kowloon City Ferry Pier – Lai Yiu Estate	20-30
	75X	Fu Shin Estate – Kowloon City Ferry Pier	8-15
	85	Fo Tan (Shan Mei Street) – Kowloon City Ferry Pier	13-25
	85B	Chun Shek – Kowloon City Ferry Pier	20-30
	85S[1]	Yiu On – Hung Hom (Hung Luen Road)	15
	85X	Man On Shan Town Centre – Hung Hom (Hung Luen Road)	10-20
	93K	Po Lam – Mong Kok East Station	15-25
	101	Kwun Tong (Yue Man Square) – Kennedy Town	3-14
	106	Wong Tai Sin – Siu Sai Wan Island Resort	4-12
	106A[1]	Wong Tai Sin – Tai Koo Kornhill Plaza	10
	106P[1]	Wong Tai Sin – Siu Sai Wan Island Resort	20
	107	Kowloon Bay – Wah Kwai	7-20
	108	Kai Yip – Braemar Hill	10-25
	111	Ping Shek – Macau Ferry Pier	3-14
	111P[1]	Choi Fook – Macau Ferry Pier	10-23
	115	Kowloon City Ferry Pier – Macau Ferry Pier	6-20
	116	Tsz Wan Shan (Central) – Quarry Bay (Yau Man Street)	4-12
	297	Hang Hau (North) – Hung Hom (Hung Luen Road)	12-25
	297P[1]	Hang Hau (North) – Hung Hom (Hung Luen Road)	15
	608	Grand Promenade – Kowloon City (Shing Tak Street)	15-30
	796X	Tseung Kwan O Industrial Estate – Tsim Sha Tsui (East)	12-20
	A22	Airport – Lam Tin Station	15-20
	E23	Airport – Tsz Wan Shan (North)	15-20
	E23A	Airport – Tsz Wan Shan (North)	15-20
	N23[2]	Tung Chung Station – Tsz Wan Shan (North)	30-60
	N121[2]	Macau Ferry Pier – Ngau Tau Kok	15
GMB	2	Whampoa Garden – Festival Walk	10-15
	2A	Whampoa Garden – Festival Walk	10-15
	8	Tsim Sha Tsui (Hankow Road) – Ho Man Tin Estate	4-10
	8M	Ho Man Tin Station – Ho Man Tin Estate	8-10
	8P[1]	Tsim Sha Tsui East – Ho Man Tin Estate	20-30
	13	Kowloon Tong (Broadcast Drive) – Hung Hom (Hung Luen Road)	15-20
	26	To Kwa Wan (Chi Kiang Street) – Kowloon Station	8-12
	27M	Lok Man Sun Chuen – Mok Kok Station	7-15
	28M	Wyler Gardens – Mong Kok Station	7-15
	28MS	Wyler Gardens – Ho Man Tin Station	10-15
	105	Tseung Kwan O (Hong Sing Garden) – To Kwa Wan (Ko Shan Theatre)	5-9
	105S[2]	Tseung Kwan O (Hong Sing Garden) – To Kwa Wan (Ko Shan Theatre)	15

Note: [1] Morning or Evening Peak Service only; [2] Night Service Only

3.3.2 Two MTR entrances/exits of To Kwa Wan Station are located at Lok Shan Road and Kiang Su Street respectively adjacent to the development. Passageways are proposed to be constructed at B/F which connects between the MTR Station and the proposed development directly.

3.3.3 In view of the comprehensive coverage of the public transport services and the availability of different choices on transport modes, the Application Site is considered to have very good accessibility via the public transport.

4. FUTURE TRAFFIC CONDITION & TRAFFIC IMPACT ASSESSMENT

4.1 Design Year

4.1.1 It is anticipated that the proposed development would be completed in 2033. In order to assess the possible traffic impacts to the local road network due to the proposed development, year 2036 (i.e. 3 years after completion) has been adopted as the design year for this study.

4.2 Traffic Forecast

4.2.1 To estimate the reference traffic flow in year 2036 (without the proposed development) in the local road network, an appropriate growth factor has to be identified for the area in the first instance. The following approaches have been adopted to derive the growth factor for the Area of Influence.

Historical Trend

4.2.2 Numerous traffic-count stations are located in the vicinity of the proposed development. The traffic counts reported in the Annual Traffic Census (ATC), which is published by Transport Department, over a period of five years, i.e. 2014 to 2019 are summarized in **Table 4.1**.

Table 4.1 Historical Traffic Data from Annual Traffic Census (ATC)

ATC Stn	Road Name	Annual Average Daily Traffic (AADT)						Avg. Annual Growth Rate
		2014	2015	2016	2017	2018	2019	
3014	Ma Tau Wai Road and To Kwa Wan Road	26,640	23,980	24,170	23,660	23,940	23,670	-2.34%
3818	Ma Tau Wai Road	38,200*	38,970*	34,190	34,990	34,530 *	34,050*	-2.27%
4077	San Lau Street	6,500*	6,410*	6,440*	6,930	7,010*	6,860*	1.08%
4212	Chatham Road North and Ma Tau Wai Road	34,900	35,130	32,660	32,560	32,260	30,920	-2.39%
4213	East Kowloon Corridor <Flyover>	77,910	74,070	74,250	74,220	78,030	73,310	-1.21%
Total		**184,150**	**178,560**	**171,710**	**172,360**	**175,770**	**168,810**	**-1.72%**

*Note: *AADT estimated by Growth factor*
***Due to the COVID-19 in 2020, the traffic flow will not be reliable and hence the Growth Rate will only take into account from 2014 to 2019*

Planning Data

4.2.3 Reference has also been made to the latest 2019-Based Territorial Population Employment Data Matrices (TPEDM) planning data published by the Planning Department. The average annual growth rates in terms of population and employment are tabulated in **Table 4.2**.

Table 4.2 2019-based TPEDM Population and Employment Planning Data

Kowloon City District				
Data	**Year**			**Average Annual Growth Rate**
	2019	**2026**	**2031**	
Population	429,300	451,100	420,050	-0.18%
Employment	212,000	237,900	227,850	+0.60%
Total	**641,300**	**689,000**	**647,900**	**+0.09%**

Adopted Growth Rate

4.2.4 A.A.D.T. of ATC indicates that the traffic flow of the local road network has an average annual growth rate of -1.72% from year 2014 to year 2019.

4.2.5 Whilst, the planning data indicates that the population and employment of the study area are expected to grow with an average annual growth rate of +0.09% from 2019 to 2031.

4.2.6 As a conservative approach, annual growth rate **+1.0%** p.a. is adopted. It is deemed sufficient to allow for any unexpected future growth as a result of some changes in land use or development in the study area. The year 2036 reference traffic flows (without the proposed development) are presented in **Figure 4.1**.

4.3 Traffic Generations of Planned Adjacent Developments

4.3.1 To fully reflect the growth traffic, trip generation of the future planned adjacent developments have been taken into consideration. The planned development is detailed in **Table 4.3**.

Table 4.3 Major Planned/ Committed Developments in the Vicinity

URA Project No. / Planning Application No. / Site Location	Proposed Use	Development Parameters
URA Project KC-008(A) (1) (3)	Residential & Commercial	No. of Flats = 217 (<40 m^2) = 93 (40 m^2<Flat Size≤70 m^2) Commercial GFA = 2,454 m^2
URA Project KC-009(2) (3)	Residential & Commercial	No. of Flats = 1,152 Average Flat Size = 48.2 m^2 Commercial GFA = 11,105 m^2
URA Project KC-010(2) (3)	Residential & Commercial	No. of Flats = 750 Average Flat Size = 45.6 m^2 Commercial GFA = 6,843 m^2
URA Project KC-011(2)(3)	Residential & Commercial	No. of Flats = 400 Average Flat Size = 45.8 m^2 Commercial GFA = 3,660 m^2
URA Project KC-012 & KC-013(2)	Residential & Commercial	No. of Flats = 414 Average Flat Size = 44.9 m^2 Commercial GFA = 3,721 m^2
URA Project KC-014(2)	Residential & Commercial	No. of Flats = 550 Average Flat Size = 39.0 m^2 Commercial GFA = 4,286 m^2
URA Project KC-016(2)	Residential & Commercial	No. of Flats = 900 Average Flat Size = 46 m^2 Commercial GFA = 8,322 m^2
URA Project KC-018(1)	Residential & Commercial & GIC	No. of Flats = 1276 Average Flat Size = 53.5 m^2 Commercial GFA = 10,496m^2
URA Project KC-019(1)	Residential & Commercial & GIC	No. of Flats = 950 Average Flat Size = 53.5 m^2 Commercial GFA = 7,816m^2
URA Project DL-8(2)	Residential & Commercial	No. of Flats = 72 Average Flat Size = 52.6 m^2 Non-Domestic GFA = 758 m^2
13 Hok Yuen Street(1)	Office & Retail	Office GFA= 47,007.307 m^2 Retail GFA= 269.993 m^2
A/K10/259(1)	Residential & Commercial	No. of Flats = 48 (Portion 1) + 777 (Portion 2) Average Flat Size = 274 m^2 (Portion 1), 64.35 m^2 (Portion 2) Commercial GFA = 3,150 m^2 (Portion 1), 6,111 m^2 (Portion 2)
A/K10/265(1)	Residential & Commercial	No. of Flats = 746 Average Flat Size = 84 m^2 Commercial GFA = 7,598.5 m^2
A/K10/266(1)	Residential & Commercial	No. of Flats = 208 Average Flat Size = 37.4 m^2 Commercial GFA = 971.25 m^2
A/K10/267(1)	Residential & Commercial	No. of Flats = 201 Average Flat Size = 32 m^2 Non-Domestic GFA = 1,268.127 m^2
A/K10/269(1)	Residential & Commercial	No. of Flats = 110 Average Flat Size = 36.8 m^2 Commercial GFA = 808.95 m^2
Ma Tau Wai Estate Re-development	Public Housing	About 4,000 flats (About net increase 2,000 flats)

(1) According to its TIA or Planning Gist

(2) According to the information of TIA of KC-014

(3) Already considered in BDTM

4.3.2 The trip generations and attractions of the adjacent developments are summarized in **Table 4.4**.

Table 4.4 Traffic Generations and Attractions of Adjacent Development

URA Project No. / Site Location	Trip Generation (pcu/hr)			
	AM Peak		PM Peak	
	Generation	Attraction	Generation	Attraction
KC-012 & KC-013(2)	39	28	24	30
KC-014(2)	49	34	29	36
KC-016(2)	84	58	52	63
KC-018(1)	84	120	88	72
KC-019(1)	63	89	65	54
DL-8(2)	9	7	5	6
13 Hok Yuen Street(1)	81	116	75	56
A/K10/259(1)	88	60	53	65
A/K10/265(1)	143	91	87	109
A/K10/266(1)	18	12	10	12
A/K10/267(1)	18	12	10	13
A/K10/269	10	7	6	7
Ma Tau Wai Estate Re-development	86	65	47	60

(1) According to its TIA

(2) According to the information of TIA of KC-014

4.4 Reference Traffic Flow in Year 2036

4.4.1 It is noted that Central Kowloon Route is under construction right now, the traffic condition in this area will be very different from now. Therefore, it is not suitable to use existing traffic flow to derive future traffic flow.

4.4.2 Thus, the year 2036 reference traffic flow is estimated by applying the adopted growth rate to the year 2026 Base District Traffic Models (BDTM) traffic model flow.

4.4.3 The 2036 reference traffic flows are presented in **Figure 4.1**.

2036 Reference Flows (without proposed development) = **2026 BDTM Traffic Model Flows** x **Adopted Growth Factor i.e. +1.0% p.a. for 10 years** + **Traffic Trips of Adjacent Development**

4.5 Traffic Trips of the Proposed Development

4.5.1 In order to estimate the traffic generation and attraction of the proposed development, reference has been made to the trip generation rates as stipulated in Volume 1 Chapter 3 Appendix D Table 1 of the latest T.P.D.M. published by Transport Department. The adopted trip rates are summarized in below **Table 4.5**.

Table 4.5 Adopted Traffic Trips Rate of Proposed Development

Use	Units	Trip Rate			
		Weekday AM Peak		Weekday PM Peak	
		Gen.	Att.	Gen.	Att.
Retail	pcu/hr/100 sqm GFA	0.2296	0.2434	0.3100	0.3563
Private Housing (Average Flat Size 60m^2)	pcu/hr/flat	0.0718	0.0425	0.0286	0.0370
Public Vehicle Carpark(1)	pcu/hr /parking space	0.0771	0.0907	0.0493	0.0811

(1) Based on survey on Hung Hom Station Carpark

4.5.2 Based on the adopted trip rate listed in the above **Table 4.5** and the development parameters in **Table 2.1**, the trip generated and attracted by the proposed development are estimated and summarized in **Table 4.6**.

Table 4.6 Estimated Traffic Trips of the Proposed Development

Site	Use	Weekday AM Peak (pcu/hr)		Weekday PM Peak (pcu/hr)	
		Gen.	Att.	Gen.	Att.
Northern Site	Residential	99	58	39	51
	Non-Domestic	20	21	27	31
	Public Vehicle Carpark (Net Increase 64 Nos.)	5	6	3	5
	Sub Total	***124***	***86***	***71***	***90***
Southern Site	Residential	68	40	27	35
	Non-Domestic	16	17	21	25
	Sub Total	***84***	***57***	***48***	***60***
Total		**208**	**143**	**119**	**150**

4.5.3 There are about 100 nos. of on-street private parking spaces would be affected due to this proposed development. A PVP with total 164 nos. of private car parking spaces will be re-provided within the Scheme area to address the local demand. Based on the observation, there are illegally parking along Maidstone lane at present, these illegal parking would be absorbed by these additional number of spaces in the proposed PVP. Therefore, it is believed that the proposed PVP will mainly serve for the local parking demand and would not significantly attract additional trips.

4.6 Traffic Forecast for Design Year 2036

4.6.1 The traffic trips of the proposed development are then superimposed onto the year 2036 reference traffic flow (without the proposed development) as shown in **Figure 4.1** to derive the year 2036 design traffic flow (with the proposed development).

Year 2036 Design Flow (with the Proposed Development) = **Year 2036 Reference Flow (without the Proposed Development)** + **Traffic Trips of the Proposed Development**

4.6.2 The traffic flow during AM and PM peak periods in the design year 2036 (with the proposed development) are shown in **Figure 4.2**.

4.7 Operational Assessment

4.7.1 To assess traffic impacts due to the proposed development, operational assessment of the critical junctions and road links identified in Chapter 3 are carried out for both reference (without the proposed development) and design (with the proposed development) scenarios in year 2036. The results are summarized in **Tables 4.7** and **4.8**.

Table 4.7 Operational Performance of Critical Junctions in Year 2036

Ref.	Junction	Method of Control	Year 2036 DFC/RC (1)			
			Reference Scenario (Without the Proposed Development)		Design Scenario (With the Proposed Development)	
			Weekday AM Peak	Weekday PM Peak	Weekday AM Peak	Weekday PM Peak
A	Tin Kwong Road / Sheung Shing Street	Signalized	+44%	+88%	+42%	+86%
B	Tin Kwong Road / Kau Pui Lung Road	Signalized	**+6%**	**+8%**	**+4%**	**+6%**
C	Ma Tau Wai Road / Tin Kwong Road / Ma Hang Chung Road	Signalized	**-7%**	**+5%**	**-7%**	**+5%**
D	Kau Pui Lung Road / Lok Shan Road	Priority	0.28	0.25	0.44	0.35
E	Ma Tau Wai Road / Lok Shan Road	Signalized	+94%	+90%	+82%	+83%
F	Chi Kiang Street / Ko Shan Rd	Priority	0.42	0.52	0.42	0.52
G	Ma Tau Wai Road / Chi Kiang Street	Signalized	+28%	+57%	+25%	+57%
H	Argyle Street / Waterloo Road / Princess Margaret Road	Signalized	+93%	>+100%	+90%	>+100%
I	Argyle Street / Tin Kwong Rd	Signalized	+30%	+27%	+27%	+25%
J	Fat Kwong Street / Sheung Shing Street	Signalized	+44%	>+100%	+42%	>+100%

K	Sheung Shing Street / Shek Ku Street / Sheung Shing Lane	Signalized	+38%	+80%	+37%	+77%
L	Sheung Shing Street / Sheung Lok Street	Priority	0.61	0.28	0.61	0.28
M	Tin Kwong Road / Farm Road	Signalized	+64%	>+100%	+64%	>+100%
N	Ma Tau Chung Road/ Sung Wong Toi Road / Fu Ning Street	Signalized	+17%	+18%	+17%	+18%
O	Ma Tau Chung Road / Ma Tau Kok Road	Signalized	+51%	+71%	+51%	+71%
P	Ma Tau Wai Road / Farm Road / Tam Kung Road	Signalized	>+100%	>+100%	>+100%	>+100%
Q	Sung Wong Toi Road / To Kwa Wan Road / Shing Kai Rd	Signalized	+37%	+43%	+36%	+42%
R	Mok Cheong Street / To Kwa Wan Road	Signalized	>+100%	>+100%	>+100%	>+100%
S	Ma Tau Kok Road / To Kwa Wan Road (2)	Signalized	+100%	>+100%	+100%	>+100%
T	San Shan Road / To Kwa Wan Road (2)	Signalized	+18%	+27%	+18%	+26%
U	To Kwa Wan Road / Sheung Heung Road / Kwei Chow St	Signalized	>+100%	>+100%	>+100%	>+100%
V	Chatham Road North / San Lau Street	Signalized	>+100%	>+100%	>+100%	>+100%
W	Fat Kwong Street / Shun Tung Street / Yan Fung Street	Signalized	+57%	+65%	+50%	+61%
X	Hung Hom Road / Fat Kwong Street Flyover / Tai Wan Road East	Signalized	+16%	+27%	+16%	+27%

Notes: (1) RC = Reserve Capacity for Signal Junction;
DFC = Design Ratio of Flow to Capacity for Priority Junction/Roundabout
(2) Junction improvement layout by URA KC 018 and 019. Please refer to Figure 4.7 and 4.8

Table 4.8 V/C Ratio of Critical Road Link in Year 2036

Index	Direction	Cap. (veh/hr) (C)	Reference Case				Design Case			
			Flow (veh/hr) (V)		V/C		Flow (veh/hr) (V)		V/C	
			AM Peak	PM Peak	AM Peak	PM Peak	AM Peak	PM Peak	AM Peak	PM Peak
L1	Two-way	1700	1125	835	0.66	0.49	1125	835	0.66	0.49
L2	NB	4200	1175	1225	0.28	0.29	1175	1225	0.28	0.29
L2	SB	4200	1690	1425	0.40	0.34	1690	1425	0.40	0.34
L3	Two-way	1700	1325	920	0.78	0.54	1340	930	0.79	0.55
L4	Two-way	1700	585	540	0.34	0.32	710	615	0.42	0.36
L5	NB	4200	705	695	0.17	0.17	705	695	0.17	0.17
L5	SB	4200	1765	1500	0.42	0.36	1805	1525	0.43	0.36
L6	Two-way	1700	215	160	0.13	0.09	245	195	0.14	0.11
L7	NB	4200	805	785	0.19	0.19	850	830	0.20	0.20
L7	SB	4200	1085	980	0.26	0.23	1130	1005	0.27	0.24
L8	NB	4200	585	535	0.14	0.13	610	545	0.15	0.13
L8	SB	4200	705	555	0.17	0.13	705	555	0.17	0.13
L9	NB	4200	2165	2080	0.52	0.50	2170	2095	0.52	0.5
L9	SB	4200	2520	2000	0.60	0.48	2540	2010	0.60	0.48

Notes: (1) Index please refer to Figure 3.1

4.7.2 The assessment result in **Tables 4.7 and 4.8** reveals that all junctions and road links would operate with ample capacities in both reference and design scenarios in year 2036, except Junctions B and C.

4.7.3 The proposed improvement scheme will be discussed in the upcoming **Section 4.8**.

4.8 Proposed Improvement Scheme

4.8.1 Improvement scheme of Junction B (Tin Kwong Road / Kau Pui Lung Road) – By revising the MOC, the RC of the junction could be improved. The proposed layout is presented in **Figure 4.4**.

4.8.2 Improvement scheme of Junction C (Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road) – By amending the road marking at Ma Hang Chung Road to improve the junction performance. The proposed layout is presented in **Figure 4.5**.

4.8.3 Improvement scheme of Junction F (Chi Kiang Street / Ko Shan Road) - As section of Kiang Su Street will be closed and became part of the Site, vehicles from Kau Pui Lung Road can no longer access to Ma Tau Wai Road Northbound via Kiang Su Street. In order to maintain the traffic circulation, it is proposed to convert the section of Chi Kiang Street between Ko Shan Road and Ma Tau Wai Road from westbound to eastbound. Hence, vehicles from Kau Pui Lung Road can access Ma Tau Wai Road northbound via this section of Chi Kiang Street. The proposed layout is presented in **Figure 4.6**.

4.8.4 Upon the commencement of the proposed reverting road scheme, vehicles would make use of Anhui Street / San Lau Street / Pak Kung Street to left turn from Ma Tau Wai Road northbound to Ko Shan Road and Chi Kiang Street for its original destination. All junctions will perform with sufficient junction reserved capacity under the proposed road reversing scheme. Should the DSP be approved, further liaison with Transport Department (TD) could be explored at road scheme preparation / detailed design stage to explore any alternative proposal (e.g. converting the section to a two-way carriageway), e.g. to maintain the existing left turn movement from Ma Tau Wai Road to minimise the traffic diversion/ impact as far as possible and subject to local traffic condition at the implementation stage.

4.8.5 Due to the above improvement schemes, the traffic flows pattern will be revised and are shown in **Figure 4.3**. The details of improvement schemes and operational performance of the Junctions with improvement in Year 2036 are summarized in **Table 4.9**.

Table 4.9 Operational Performance of Junctions with Improvement in Year 2036

Ref.	Improvement Details	Method of Control	Year 2036 DFC/RC (1)			
			Design Scenario (Without the Proposed Improvement)		Design Scenario (With the Proposed Improvement)	
			Weekday AM Peak	Weekday PM Peak	Weekday AM Peak	Weekday PM Peak
B	Revising the MOC	Signalized	**+4%**	**+6%**	+85%	+53%
C	i. Road Marking Amendment at Ma Hang Chung Road	Signalized	**-7%**	**+5%**	+16%	+35%
F	Change Chi Kiang Street from westbound to eastbound traffic	Priority	0.78	0.70	0.55	0.61

Notes: (1) RC = Reserve Capacity for Signal Junction;
DFC = Design Ratio of Flow to Capacity for Priority Junction/Roundabout

4.8.6 It is revealed that the above Junctions will operate with positive capacity in 2036 after the proposed improvement works. It is therefore acceptable from the perspective of traffic engineering.

5. PEDESTRIAN ASSESSMENT

5.1 Existing Pedestrian Condition

5.1.1 In order to acquire the existing pedestrian condition around the proposed development, a pedestrian headcount survey was conducted at concerned footpath sections during the survey mention in the **Section 3.2.2** above. The layout of the critical sections of footpath is shown in **Figure 5.1**.

5.1.2 The concept of Minimum Width of Footways and Level-of-service (LOS) in accordance with T.P.D.M. Volume 2 Chapter 3.4.11 and Volume 6 Chapter 10 have been applied for assessing the concerned walkways. The Minimum Width of Footways refers to the desirable minimum effective widths of footways according to pedestrian volume and type of land use. LOS directly relates to the pedestrian comfort and ease with which pedestrians queued and proceed at the walkway.

5.1.3 Besides, to determine the V/C ratio at crossing points, the following empirical formula is used for checking whether the light signal crossing facilities provided are adequate for the pedestrian volumes wishing to cross :.

PC = K x GTP x W
PC = Pedestrian crossing capacity in pedestrians per hour
GTP = Green time proportion i.e. (Pedestrian green + flashing green time)/Cycle time
W = Lateral width of pedestrian crossing
K = A constant equivalent to saturation flow for pedestrians, may be taken as 1900 ped/metre/hours

5.1.4 The 2022 peak hour pedestrian flows at the concerned footpaths are shown in **Figure 5.2** and summarized in **Tables 5.1** and **5.2**. As most of the pedestrian will use the mechanized trips for their journey, and there are public transport stops and 2 MTR entrances/exits are located adjacent the Site and there will be underground passageways directly connected to the 2 MTR entrances/exits at B/F. Thus the studied sections are considered reasonable and acceptable to capture the anticipated increase in pedestrian flow generated by the proposed development.

Table 5.1 LOS Assessment of the Critical Sections of Footpath in Observed Year 2022

Critical Sections	Effective Width (m)	Observed Scenario (Year 2022)					
		AM Peak			PM Peak		
		Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS	Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS
A	3.19	1190	6.22	A	1120	5.85	A
B	2.66	990	6.20	A	720	4.51	A
E	2.17	1760	13.52	A	1655	12.71	A
F	1.84	1010	9.15	A	905	8.20	A
G	1.51	520	5.74	A	500	5.52	A
H	3.52	325	1.54	A	605	2.86	A
I	2.24	1295	9.64	A	580	4.32	A
J	1.50	705	7.83	A	690	7.67	A
K	1.51	240	2.65	A	155	1.71	A
L	1.74	380	3.64	A	145	1.39	A
M	2.17	265	2.04	A	110	0.84	A
N	2.60	545	3.49	A	590	3.78	A
P	1.91	880	7.68	A	940	8.20	A
Q	3.56	705	3.30	A	500	2.34	A
R	2.22	600	4.50	A	565	4.24	A

Table 5.2 Capacity Assessment of the Critical Sections of Crossing in Observed Year 2022

Critical Sections	Crossing Width (m)	Observed Scenario (Year 2019)							
		AM Peak				PM Peak			
		Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio	Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio
C	6.00	0.72	1815	8233	0.22	0.69	1425	7917	0.18
D	4.34	0.18	760	1451	0.52	0.20	845	1680	0.50
O	4.60	0.33	850	2913	0.29	0.25	630	2185	0.29
S	4.60	0.42	850	3642	0.23	0.53	630	4613	0.14

5.1.5 The pedestrian assessment results have revealed the section of footpath and crossing have LOS A and V/C Ratio below 1.0 at the observed situation.

5.2 Pedestrian Traffic Forecast

5.2.1 To assess the future conflict due to the proposed development, based on the survey flow and the adopted growth rate of +1.0%, future reference pedestrian flows (without the proposed development) and at the critical sections are estimated and summarized in **Figure 5.3**. The LOS and V/C ratio are also assessed and summarized in **Tables 5.3** and **5.4** below:

Table 5.3 LOS Assessment of the Critical Sections of Footpath in Reference Year 2036

Critical Sections	Effective Width (m)	Reference Scenario (Year 2036)					
		AM Peak			PM Peak		
		Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS	Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS
A	3.19	1,370	7.16	A	1,290	6.74	A
B	2.66	1,140	7.14	A	830	5.20	A
E	2.17	2,020	15.51	A	1,900	14.59	A
F	1.84	1,160	10.51	A	1,040	9.42	A
G	1.51	600	6.62	A	575	6.35	A
H	3.52	370	1.75	A	695	3.29	A
I	2.24	1,490	11.09	A	665	4.95	A
J	1.50	810	9.00	A	795	8.83	A
K	1.51	275	3.04	A	180	1.99	A
L	1.74	435	4.17	A	170	1.63	A
M	2.17	300	2.30	A	130	1.00	A
N	2.60	625	4.01	A	680	4.36	A
P	1.91	1,015	8.86	A	1,080	9.42	A
Q	3.56	810	3.79	A	575	2.69	A
R	2.22	690	5.18	A	650	4.88	A

Table 5.4 Capacity Assessment of the Critical Sections of Crossing in Reference Year 2036

Critical Sections	Crossing Width (m)	Reference Scenario (Year 2036)							
		AM Peak				PM Peak			
		Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio	Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio
C	6.00	0.72	2085	8233	0.25	0.69	1640	7917	0.21
D	4.34	0.18	875	1451	0.60	0.20	975	1680	0.58
O	4.60	0.33	975	2913	0.33	0.25	725	2185	0.33
S	4.60	0.42	975	3642	0.27	0.53	725	4613	0.16

5.2.2 To estimate the pedestrian trips related to the proposed development, survey on similar existing developments has been carried out and summarized in the **Table 5.5**.

Table 5.5 Pedestrian Trip Rates of Surveyed Developments

Use	Type	Units	Weekday AM Peak		Weekday PM Peak	
			Gen.	Att.	Gen.	Att.
Heya Delight, Cheung Sha Wan (Flat Size 40 to 70 sqm)	Private Housing	(ped/hr/flat)	0.6231	0.1385	0.1462	0.3077
	Retail	(ped/hr/GFA)	0.0631	0.0179	0.0419	0.0405

5.2.3 Based on the trip rate surveyed and the development parameters in **Table 2.1**, the future pedestrian trips related to the proposed development are estimated and summarized in the **Table 5.6**.

Table 5.6 Pedestrian Trips of Proposed Developments

Sites	Type	Units	Weekday AM Peak		Weekday PM Peak	
			Gen.	Att.	Gen.	Att.
Northern Site	Residential	(ped/hr)	855	190	200	425
	Retail	(ped/hr)	540	155	360	350
	GIC*	(ped/hr)	50	50	50	50
	Sub-total	***(ped/hr)***	***1,445***	***395***	***610***	***825***
Southern Site	Residential	(ped/hr)	590	130	140	290
	Retail	(ped/hr)	435	125	290	280
	GIC*	(ped/hr)	50	50	50	50
	Sub-total	***(ped/hr)***	***1,075***	***305***	***480***	***620***
Total		**(ped/hr)**	**2,520**	**700**	**1,090**	**1,445**

*Nominal Trips

5.2.4 Moreover, a survey has been conducted to estimate the modal split of the proposed development and summarized in **Table 5.7** below:

Table 5.7 Surveyed Modal Split

Transport Mode	Modal Split (%)	Modal Split (Excluded Walk) (%)
Rail	21%	29%
Franchised Bus	22%	30%
PLB	9%	13%
Private Vehicle	18%	26%
Special Purpose Bus	1%	1%
Taxi	1%	1%
Ferry	0%	0%
Walk	28%	-
Total	**100%**	**100%**

5.2.5 From the survey, about 70% of pedestrian will be using mechanised trips for their journey. It is noted that there are public transport stops along Ma Tau Wai Road near the Site. Moreover, 2 MTR entrances/exits are located adjacent to the Site, and there will be also underground passageways directly connected to the 2 MTR entrances/exits at B/F. Thus the impact by pedestrian will mainly on the footpath nearby and will not be high.

5.2.6 Based on the **Tables 5.6** and **5.7**, the estimated trips are superimposed to the network, the future pedestrian design flow could be estimated summarized in **Figure 5.4**. The assessment of the design scenario is summarized in **Tables 5.8** and **5.9**.

Table 5.8 LOS Assessment of the Critical Sections of Footpath in Design Year 2036

Critical Sections	Effective Width (m)	Design Scenario (Year 2036)					
		AM Peak			PM Peak		
		Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS	Two-way Pedestrian Flow (ped/hr)	Two-way Pedestrian Flow Rate (ped/min/m)	LOS
A	3.19	1,530	7.99	A	1,415	7.39	A
B	2.66	1,300	8.15	A	955	5.98	A
E	2.17	2,205	16.94	B	2,045	15.71	A
F	1.84	1,230	11.14	A	1,095	9.92	A
G	1.51	760	8.39	A	700	7.73	A
H	3.52	535	2.53	A	820	3.88	A
I	2.24	1,490	11.09	A	665	4.95	A
J	1.50	950	10.56	A	895	9.94	A
K(1)	3.66	385	1.75	A	270	1.23	A
L(1)	3.76	545	2.42	A	260	1.15	A
M	2.17	505	3.88	A	295	2.27	A
N	2.60	1,015	6.51	A	990	6.35	A
P	1.91	1,155	10.08	A	1,190	10.38	A
Q	3.56	880	4.12	A	630	2.95	A
R	2.22	955	7.17	A	925	6.94	A

Notes: (1) Set back in future

Table 5.9 Capacity Assessment of the Critical Sections of Crossing in Design Year 2036

Critical Sections	Crossing Width (m)	Design Scenario (Year 2036)							
		AM Peak				PM Peak			
		Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio	Green Time Proportion	Two-way Pedestrian Flow (ped/hr)	Capacity (ped/hr	V/C Ratio
C	6.00	0.72	2245	8233	0.27	0.69	1765	7917	0.22
D	4.34	0.18	1010	1451	0.70	0.20	1115	1680	0.66
O	4.60	0.33	1505	2913	0.52	0.25	1145	2185	0.52
S	4.60	0.42	1505	3642	0.41	0.53	1145	4613	0.25

5.2.7 It is revealed from the assessment results in **Tables 5.8** and **5.9** that the concerned sections of footpaths and crossing would all operate with have LOS A and the V/C ratio below 1.0 in peak periods, having adequate capacity to cater for the design year 2036 pedestrian flows.

6. SUMMARY AND CONCLUSION

6.1 Summary

6.1.1 The application site is currently mainly occupied by a number of existing CBS residential buildings. Under the current planning, the existing structure will be demolished for redevelopment. To support the proposed redevelopment, a traffic impact assessment is required to review and appraise any possible traffic impact induced by the proposed development on the adjacent road network.

6.1.2 CTA Consultants Limited (CTA) has been commissioned by URA as the traffic consultant to prepare the Traffic Impact Assessment (TIA) and to provide technical justifications in supporting the application from a traffic engineering point of view.

6.1.3 It is anticipated that the proposed development would be completed in 2033. In order to assess the possible traffic impacts to the local road network due to the proposed development, year 2036 (i.e. 3 years after completion) has been adopted as the design year for this study.

6.1.4 Year 2036 traffic forecasts have been derived from the 2026 Base District Traffic Models (BDTM) traffic model flows and traffic generation by population growth. Besides, future traffic growth in Kowloon City District has also been considered based on the Territory Population and Employment Data Matrices (TPEDM) by Planning Department and Annual Traffic Census (ATC) by Transport Department. A conservative growth rate of 1.0% p.a. was adopted.

6.1.5 Junctions operational performance analysis has been carried out in both reference and design scenarios in year 2036. Most of the junctions would operate with ample capacities in both reference and design scenarios in year 2036, except Junctions B and C.

6.1.6 Junctions B and C will operate with positive capacity in 2036 after the proposed improvement works. It is therefore acceptable from the perspective of traffic engineering.

6.1.7 Pedestrian assessment in term of LOS on footpaths and V/C ratio on crossing points has been carried out. It is found out that all concerns footpaths and crossing points would be operated with ample LOS or capacity in both reference and design scenarios in year 2036.

6.1.8 Based on the above assessments, the application is supported from the traffic points of view.

6.2 Conclusion

6.2.1 In conclusion, this Traffic Impact Assessment (TIA) study demonstrated that the related traffic trips related to the proposed development can be absorbed by the nearby road network and no significant traffic impact will be induced.

6.2.2 Therefore, the proposed residential development in To Kwa Wan is reckoned feasible from traffic engineering point of view.

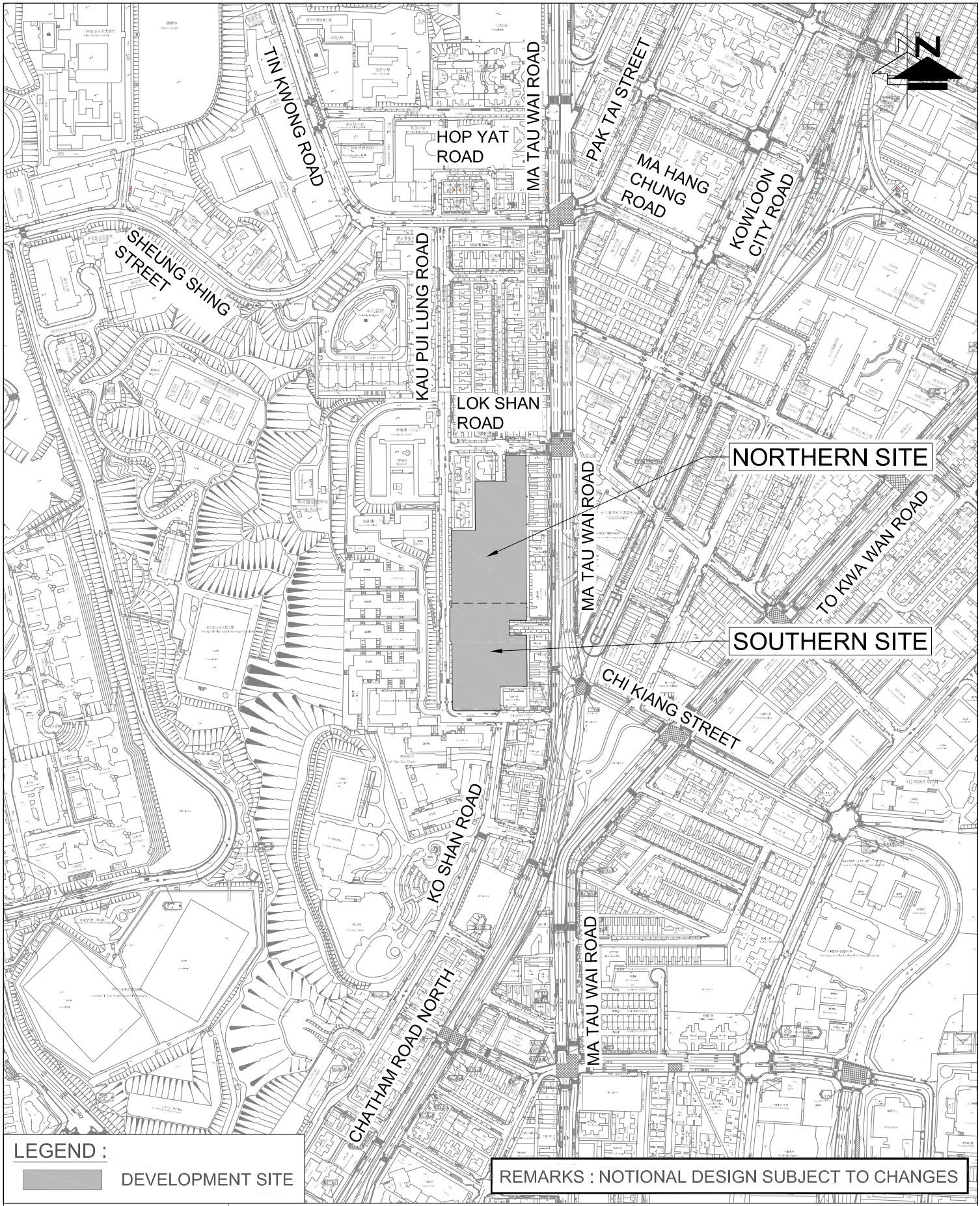

FIGURE NO.: 1.1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: SITE LOCATION PLAN
SCALE: 1 : 5000 @ A4	DATE: 28 OCT 2022

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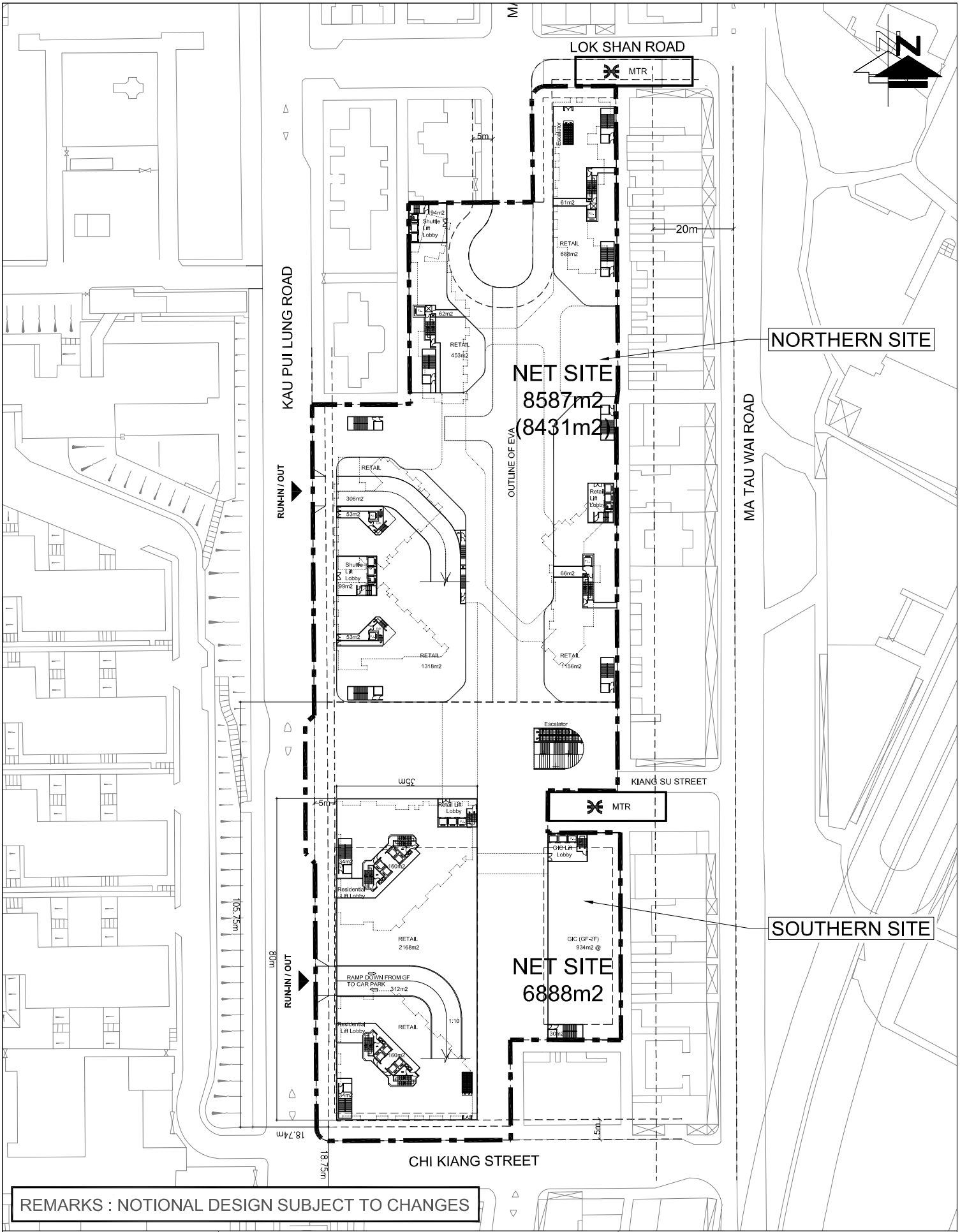

REMARKS : NOTIONAL DESIGN SUBJECT TO CHANGES

FIGURE NO.: 2.1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: INDICATIVE G/F PLAN
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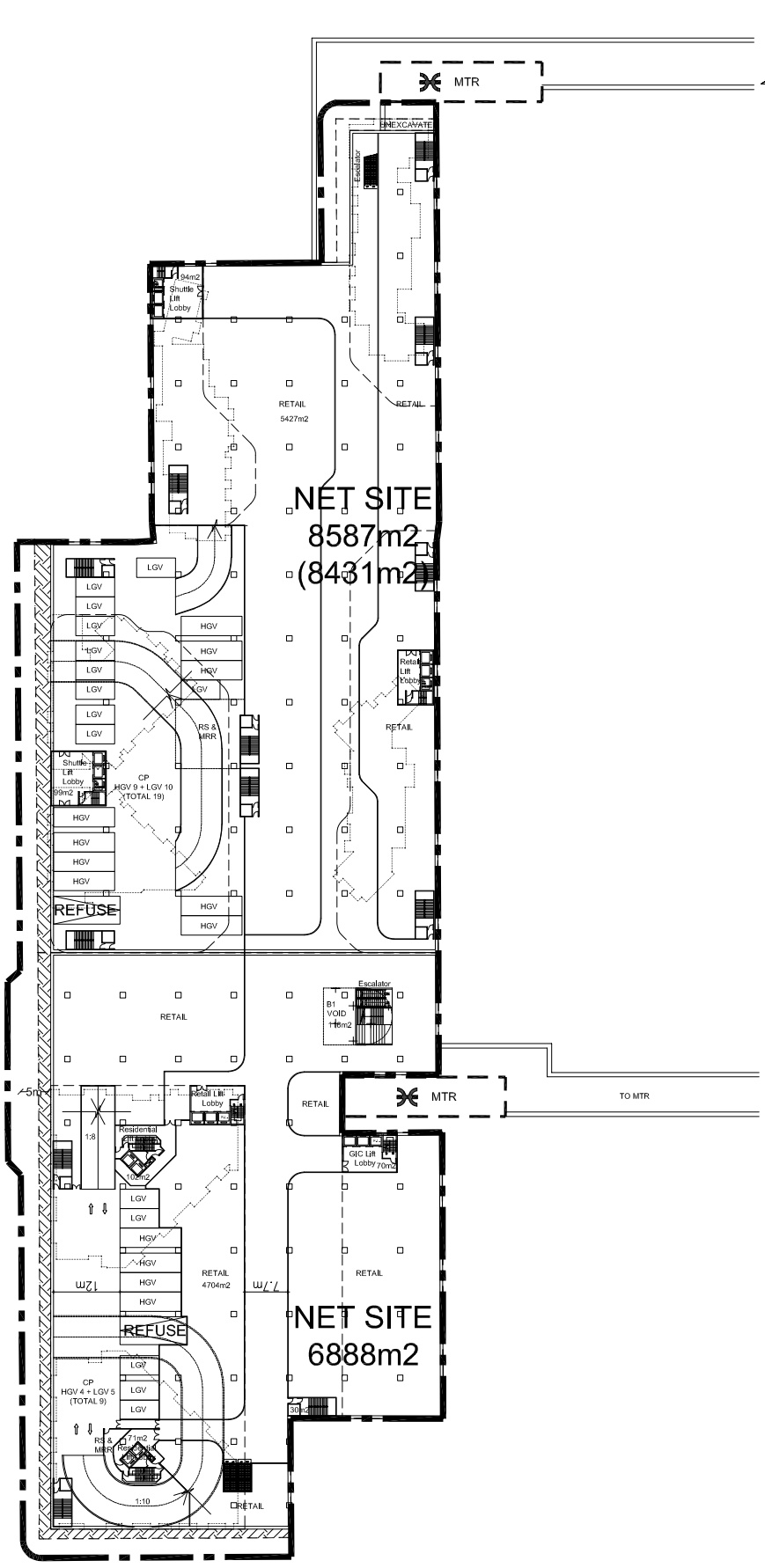

CHI KIANG STREET

REMARKS : NOTIONAL DESIGN SUBJECT TO CHANGES

FIGURE NO.: 2.2	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	CTA Consultants Limited 志達顧問有限公司
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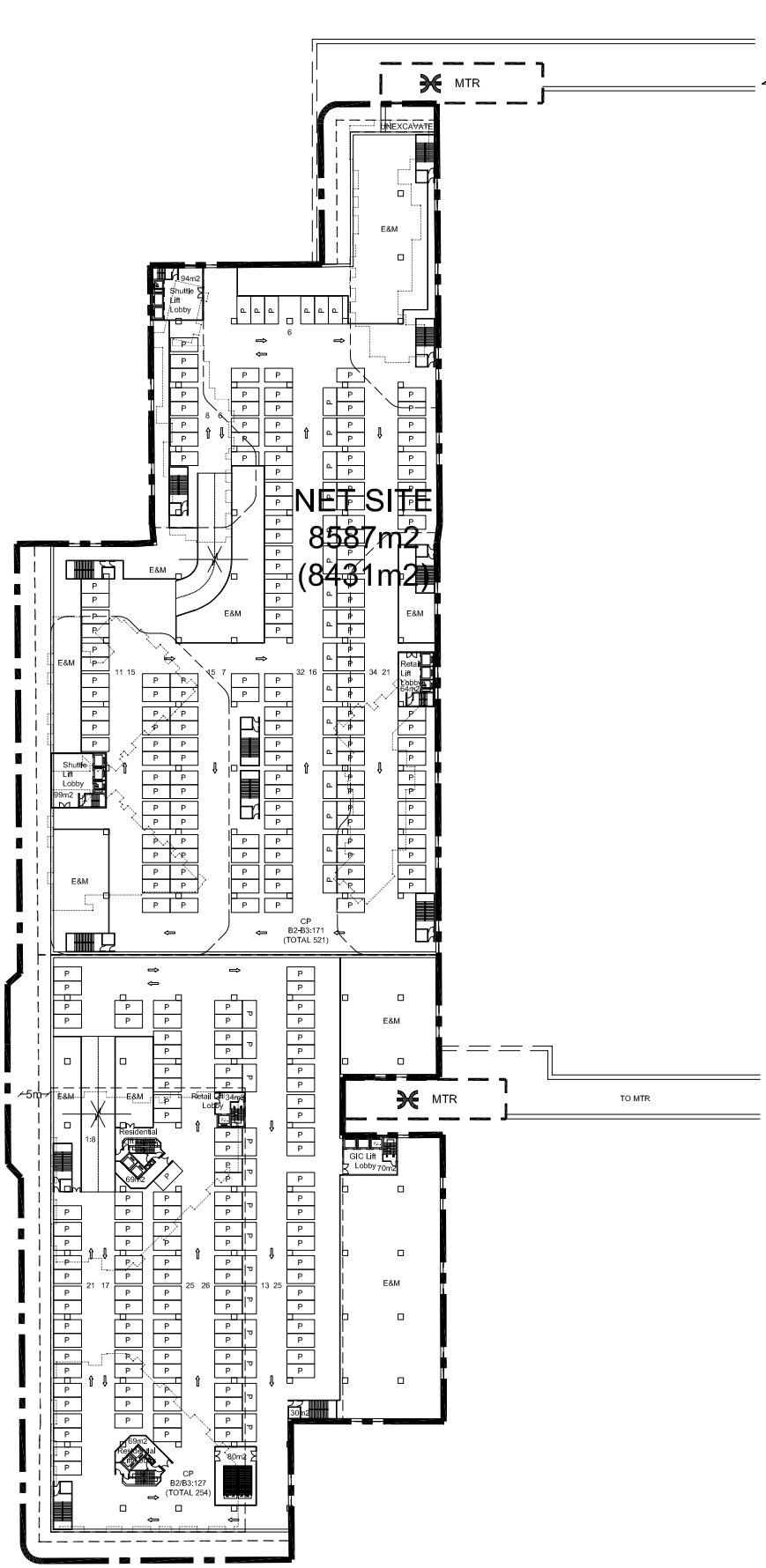

REMARKS : NOTIONAL DESIGN SUBJECT TO CHANGES

FIGURE NO.: 2.3	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
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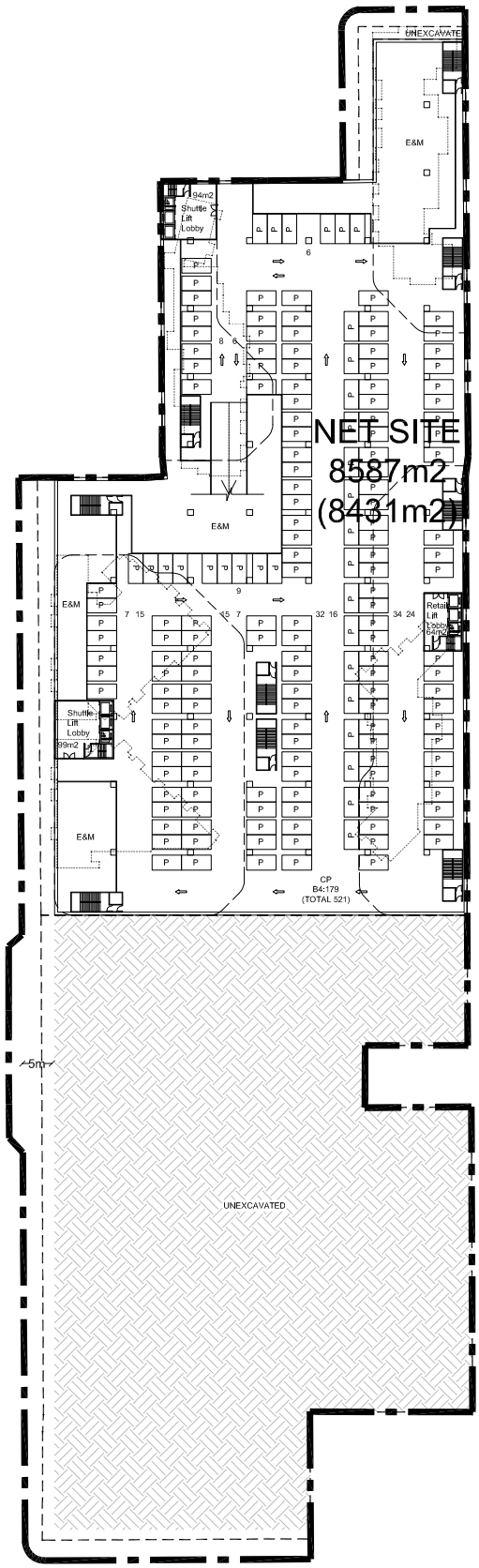

REMARKS : NOTIONAL DESIGN SUBJECT TO CHANGES

FIGURE NO.: 2.4	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	CTA Consultants Limited 志達顧問有限公司
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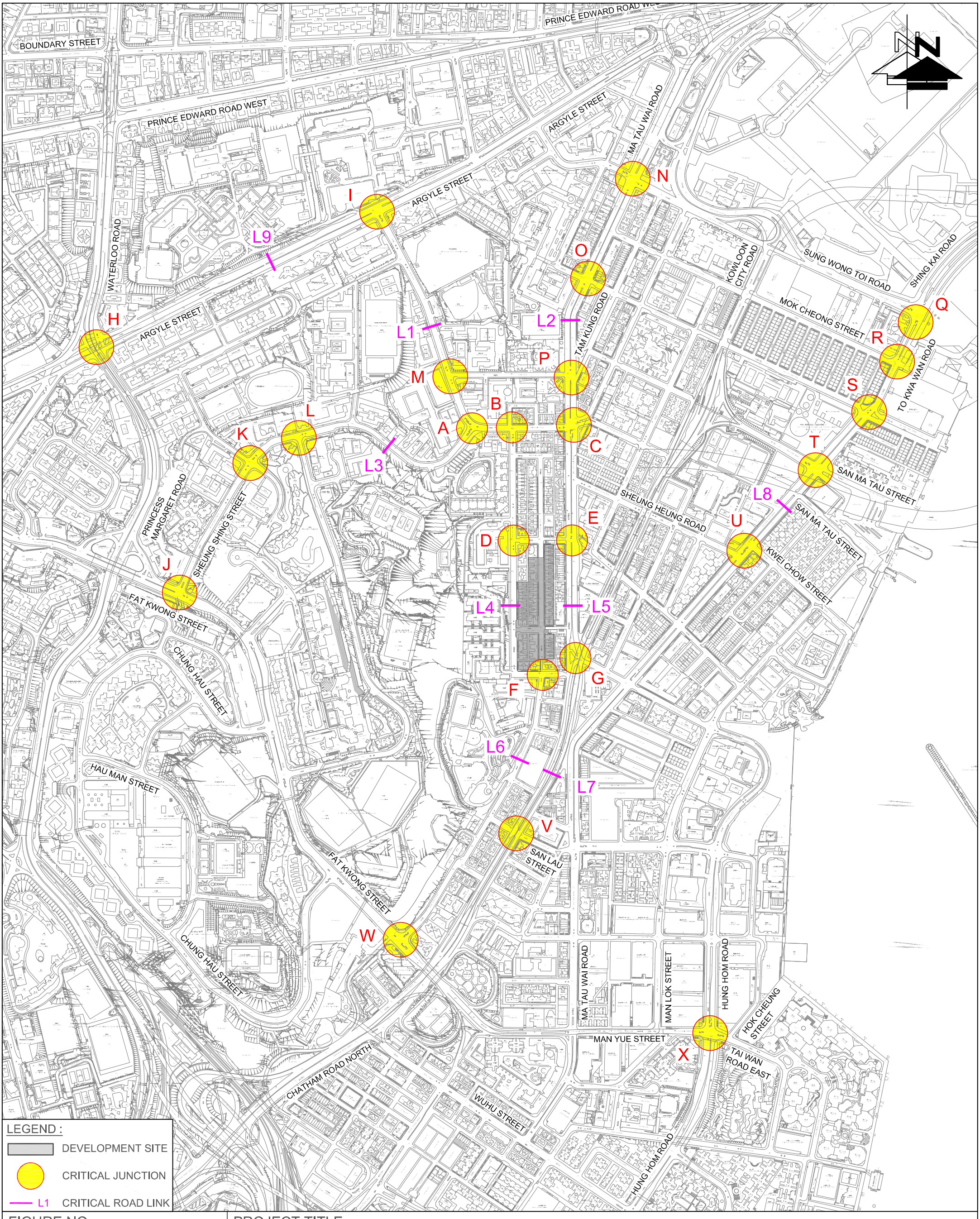

FIGURE NO.: 3.1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: KEY JUNCTIONS
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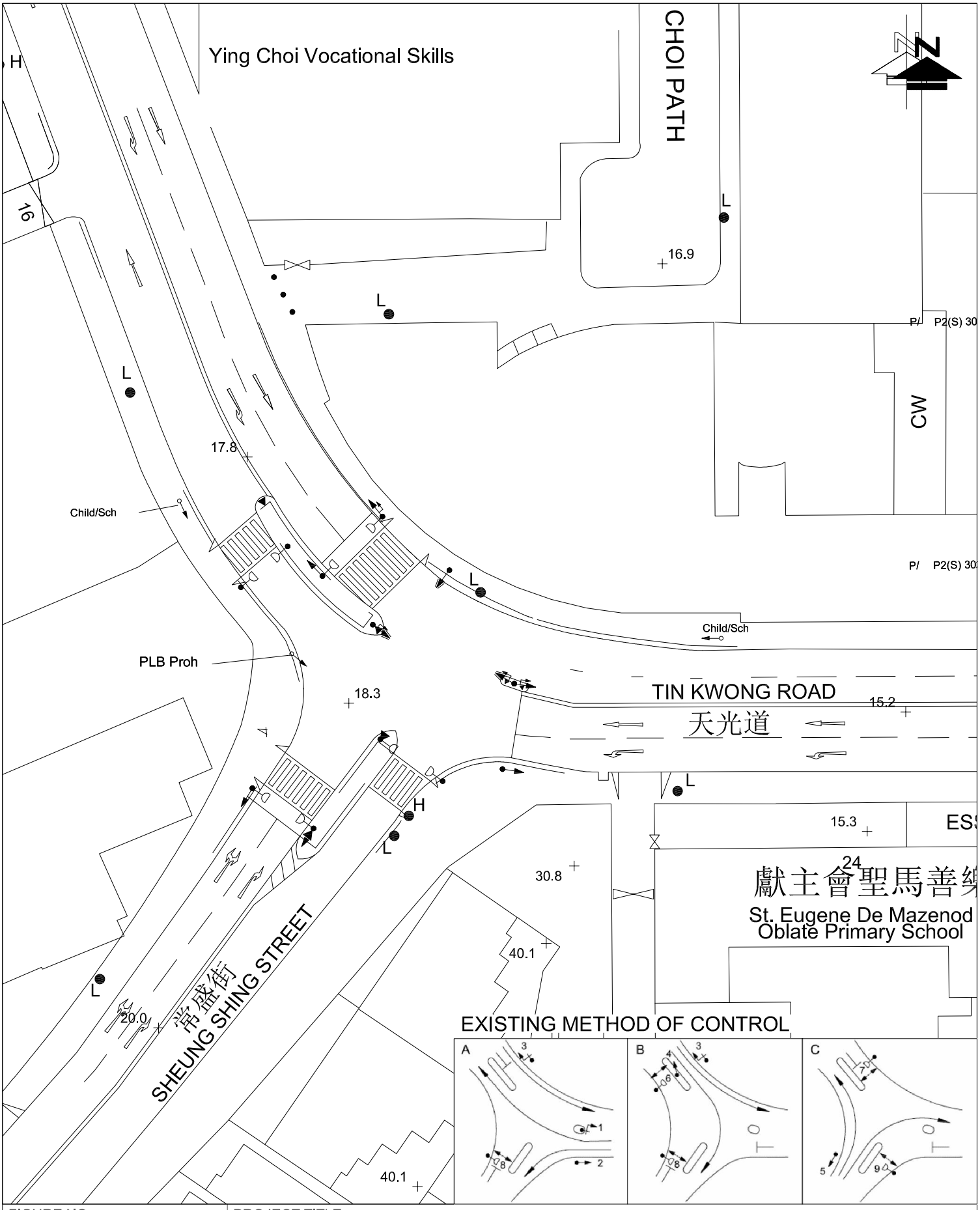

FIGURE NO.: 3.2	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF TIN KWONG ROAD / SHEUNG SHING STREET (A)
SCALE: 1 : 500 @ A4	DATE: 18 AUG 2022

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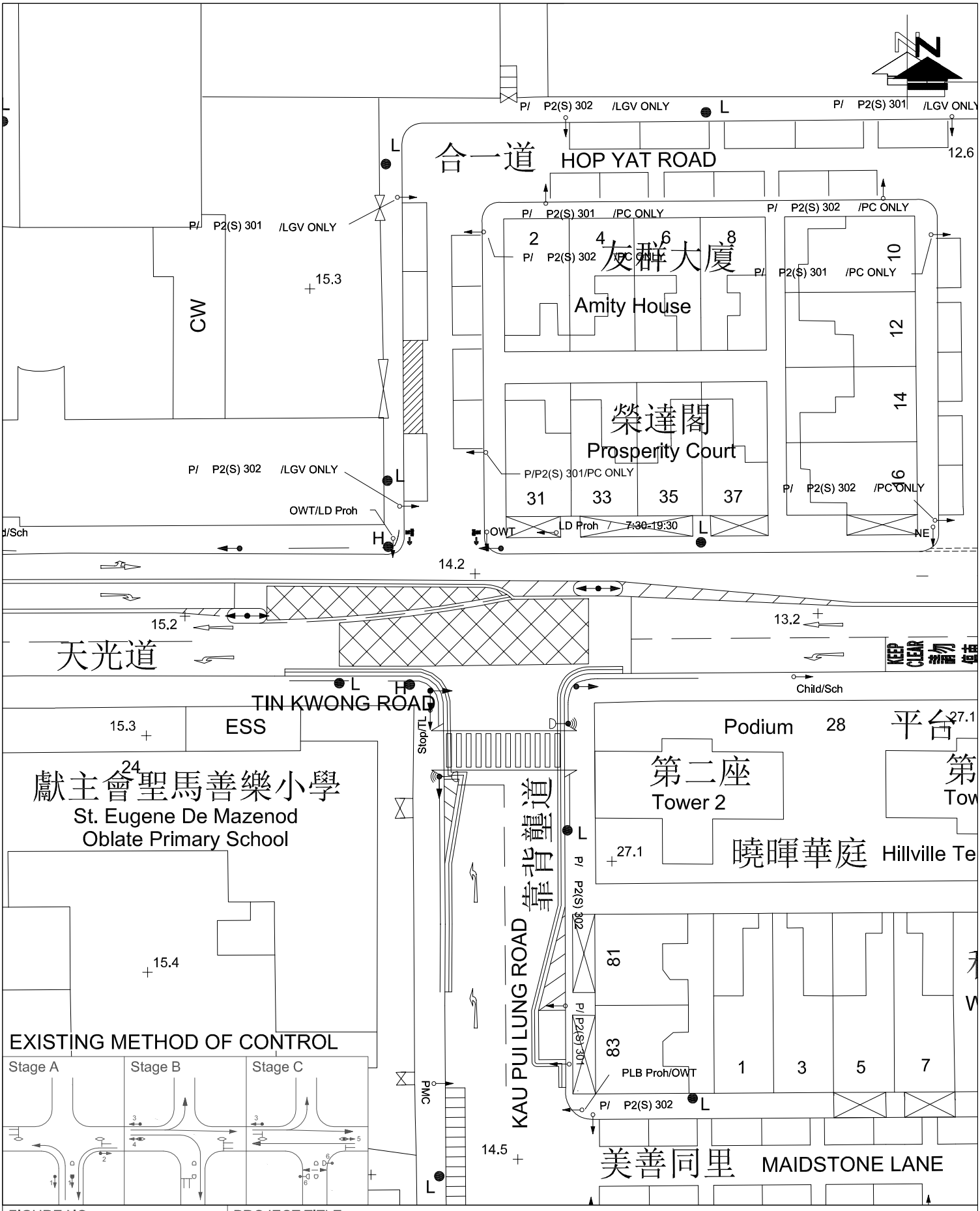

FIGURE NO.: 3.3	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF TIN KWONG ROAD / KAU PUI LUNG ROAD / HOP YAT ROAD (B)
SCALE: 1 : 500 @ A4	DATE: 18 AUG 2022

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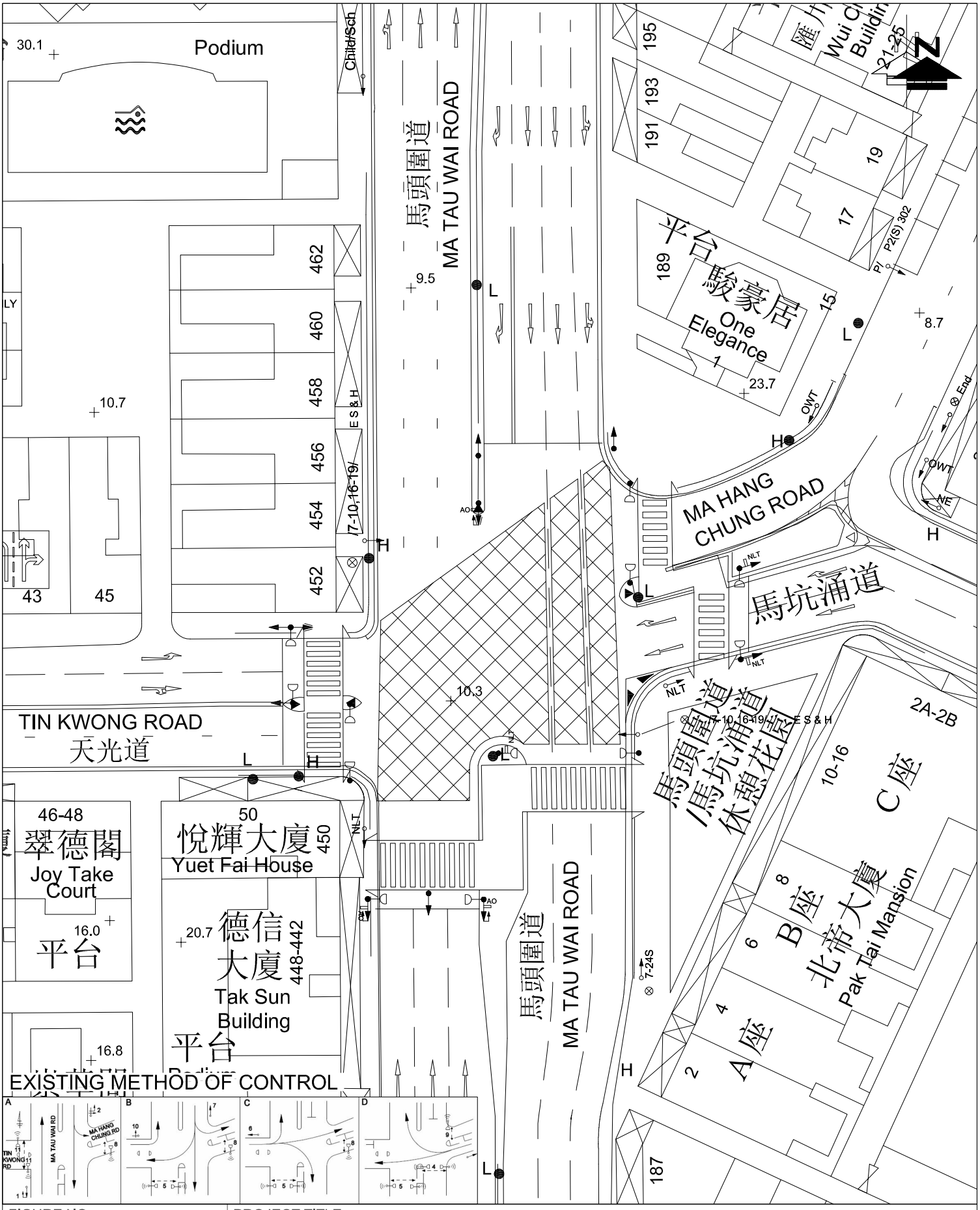

FIGURE NO.: 3.4	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU WAI ROAD / TIN KWONG ROAD / MA HANG CHUNG ROAD (C)
SCALE: 1 : 500 @ A4	DATE: 18 AUG 2022

CTA Consultants Limited
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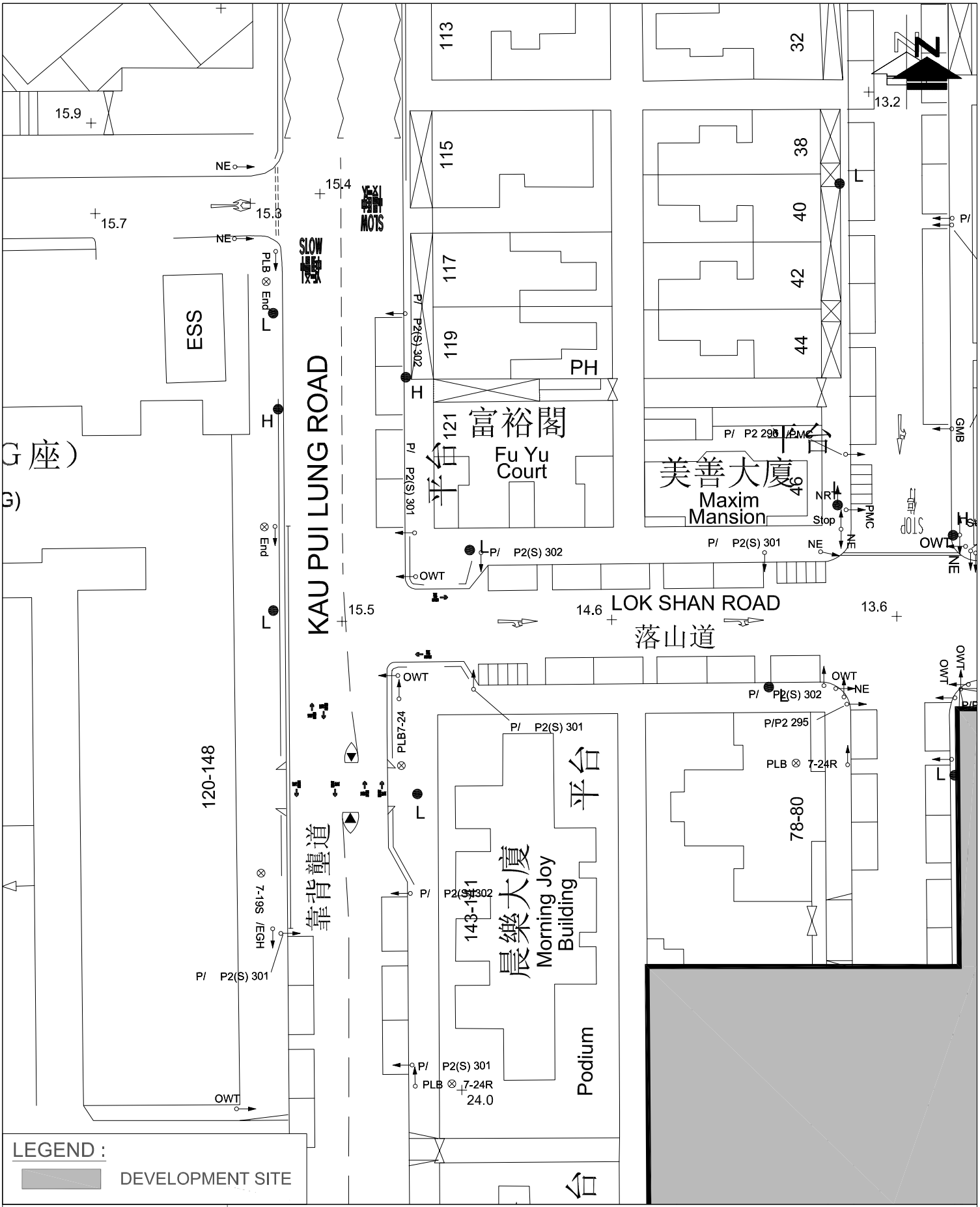

FIGURE NO.: 3.5	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF KAU PUI LUNG ROAD / LOK SHAN ROAD (D)
SCALE: 1 : 500 @ A4	DATE: 18 AUG 2022

CTA Consultants Limited
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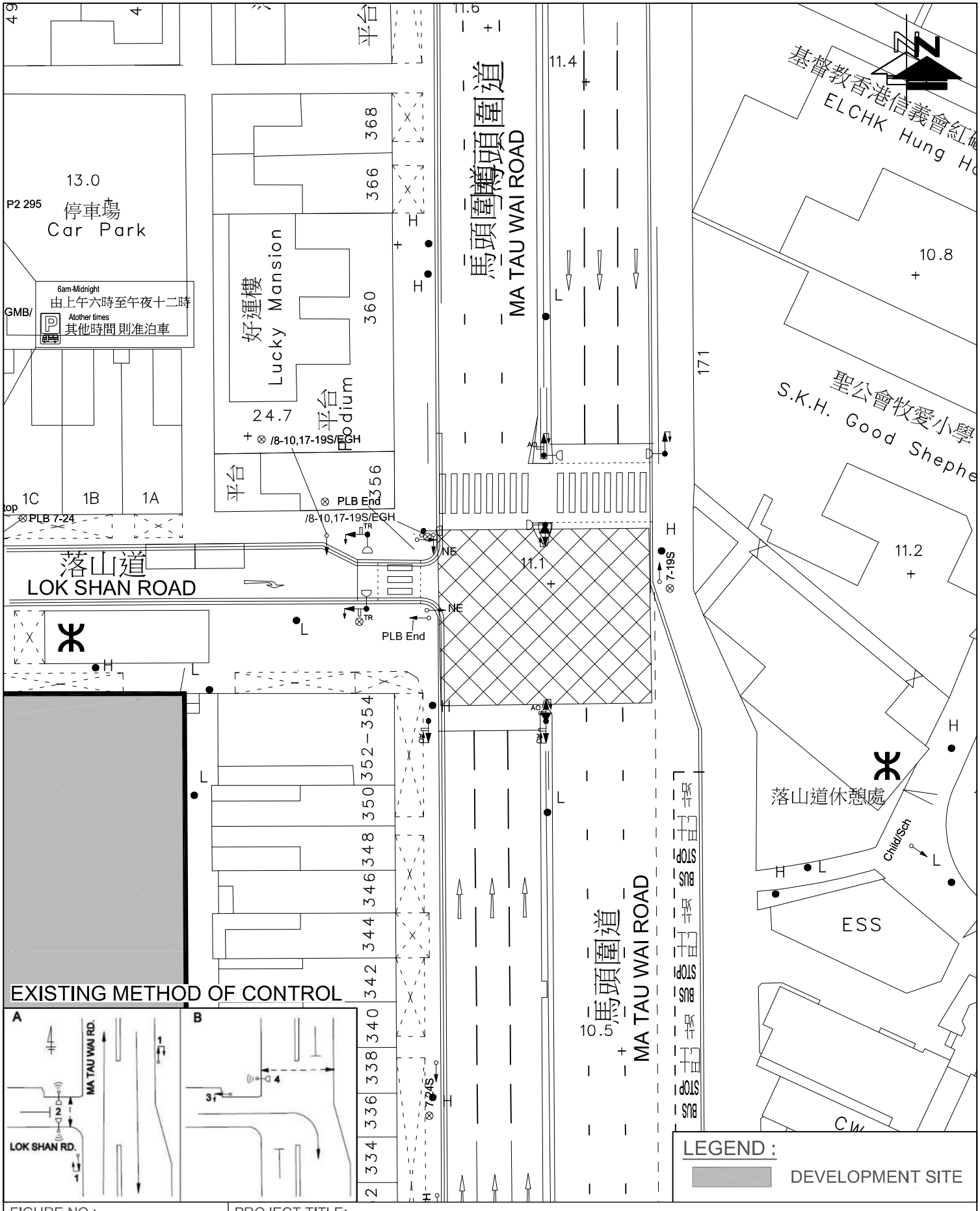

FIGURE NO.: 3.6	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU WAI ROAD / LOK SHAN ROAD (E)
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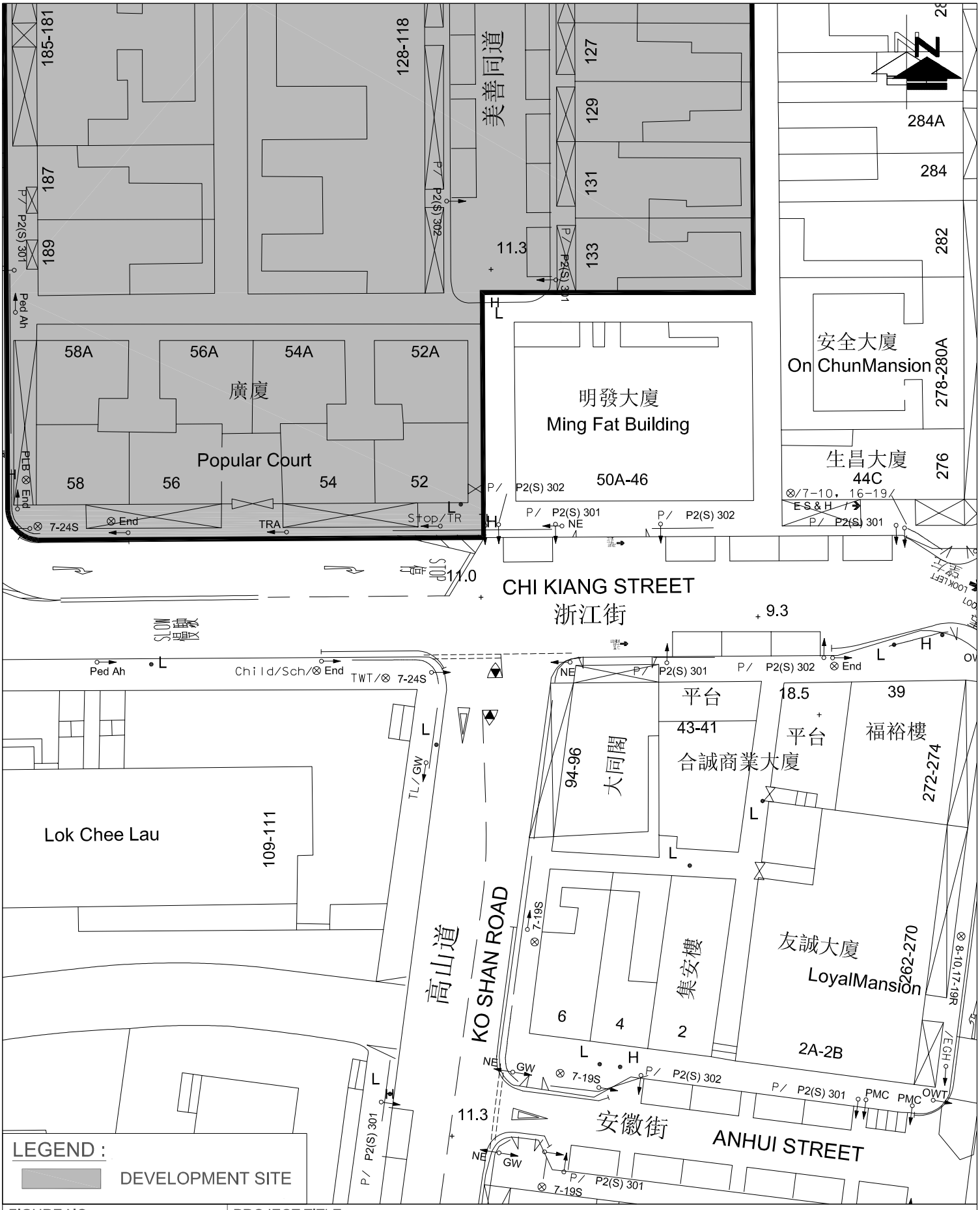

FIGURE NO.: 3.7	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF CHI KIANG STREET / KO SHAN ROAD (F)
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CTA Consultants Limited
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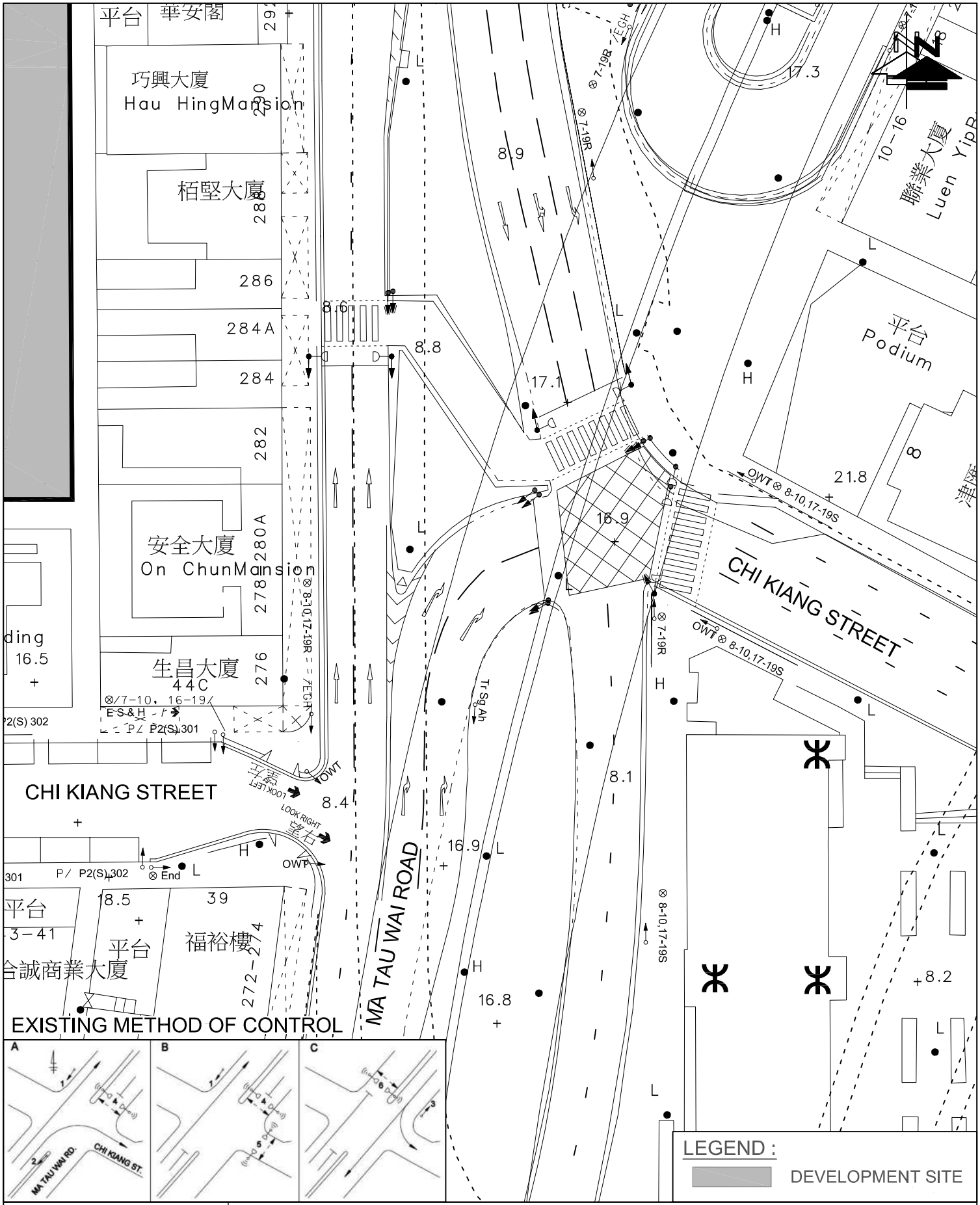

FIGURE NO.: 3.8	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU WAI ROAD / CHI KIANG STREET (G)
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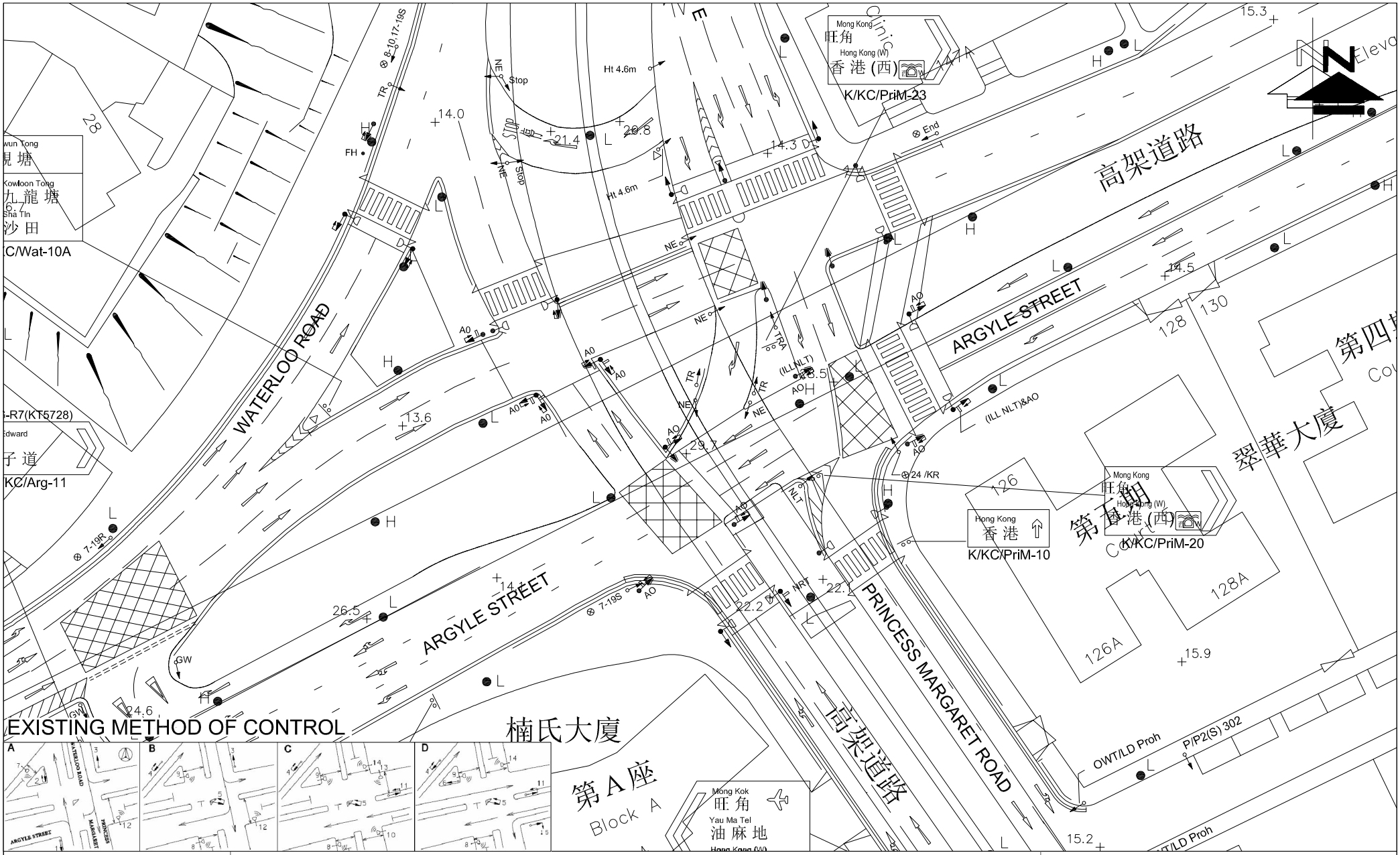

FIGURE NO.: 3.9	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF ARGYLE STREET / WATERLOO ROAD PRINCESS MARGARET ROAD (H)	CTA Consultants Limited 志達顧問有限公司
SCALE: 1 : 600@A4 / DATE: 18 AUG 2022		

EXISTING METHOD OF CONTROL

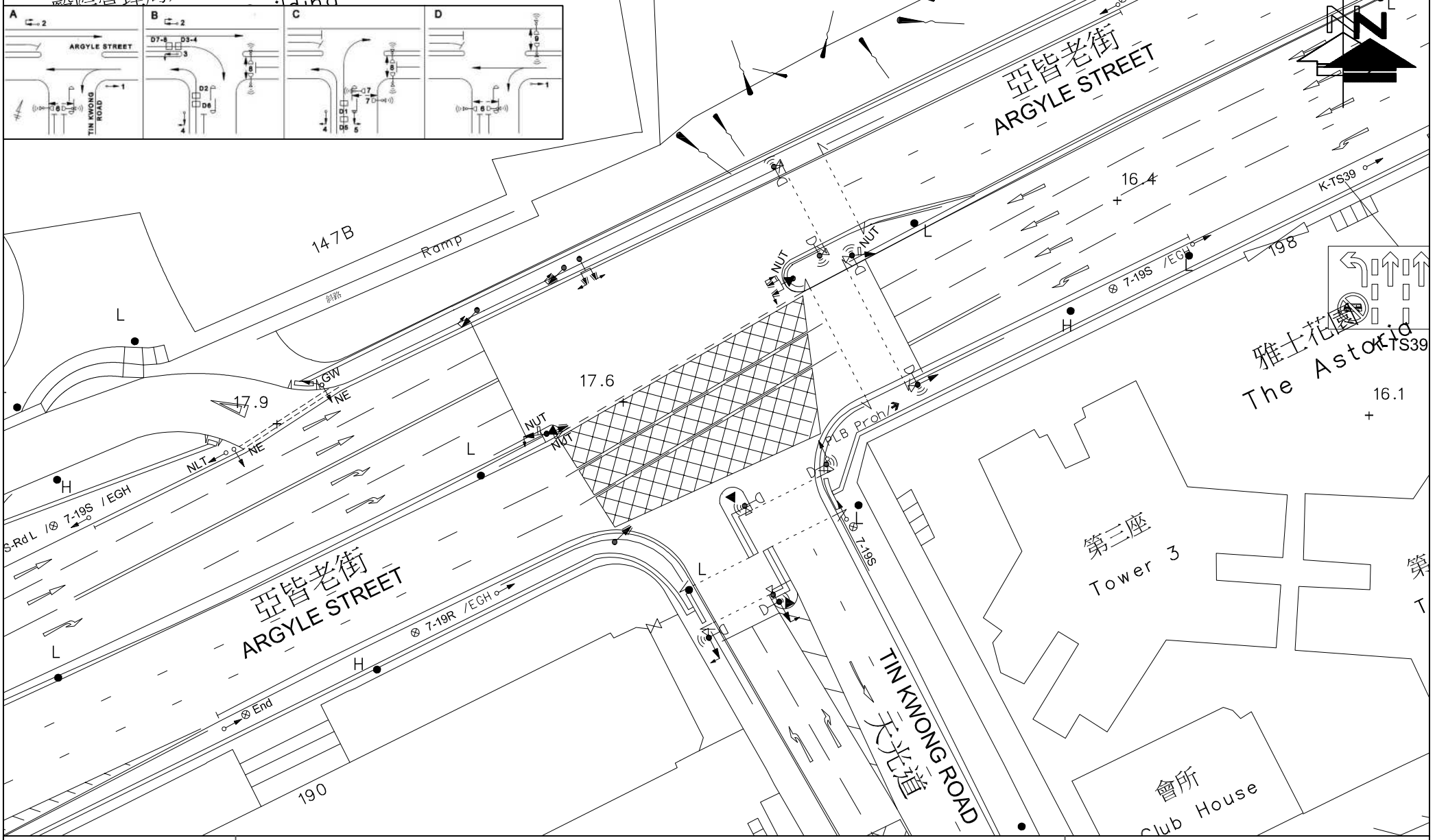

FIGURE NO.: 3.10		PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK		DRAWING TITLE: EXISTING JUNCTION LAYOUT OF ARGYLE STREET / TIN KWONG ROAD (I)	CTA Consultants Limited 志達顧問有限公司
SCALE: 1 : 500@A4	DATE: 22 AUG 2022		

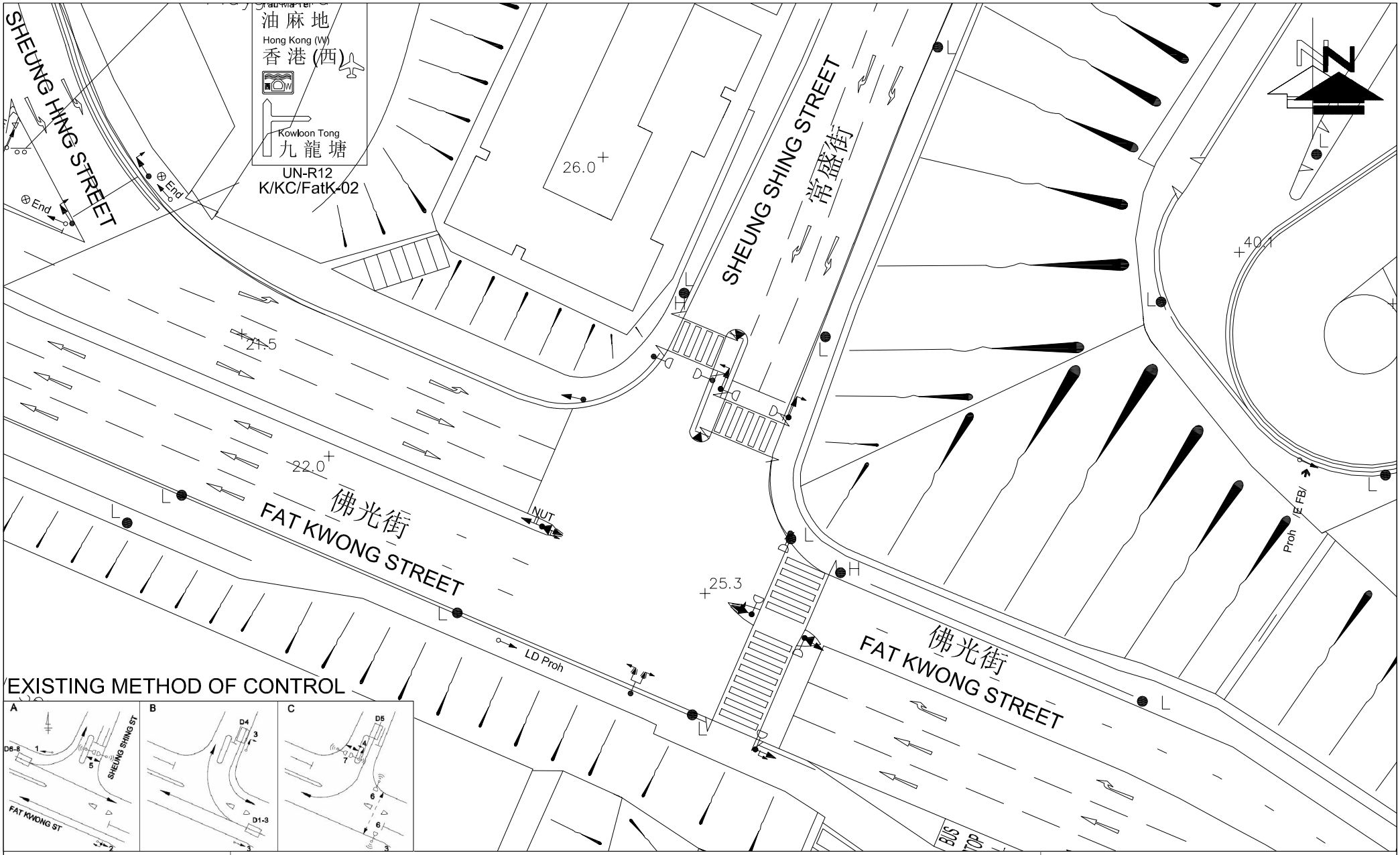

FIGURE NO.: 3.11	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF FAT KWONG STREET / SHEUNG SHING STREET (J)	CTA Consultants Limited 志達顧問有限公司
SCALE: 1 : 500@A4	DATE: 18 AUG 2022	

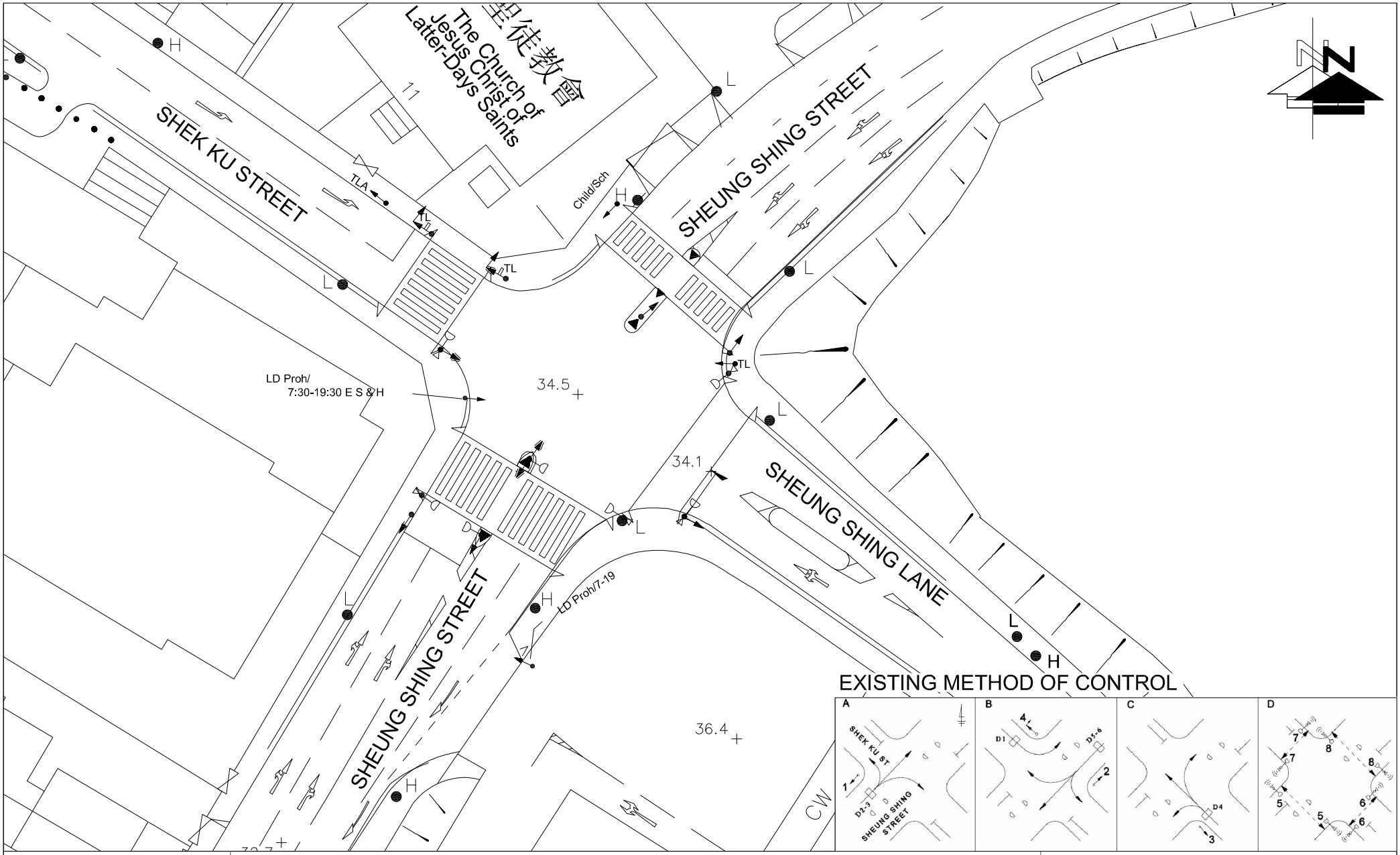

FIGURE NO.: 3.12	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF SHEUNG SHING STREET / SHEK KU STREET / SHEUNG SHING LANE (K)	CTA Consultants Limited 志達顧問有限公司
SCALE: 1 : 500@A4	DATE: 18 AUG 2022	

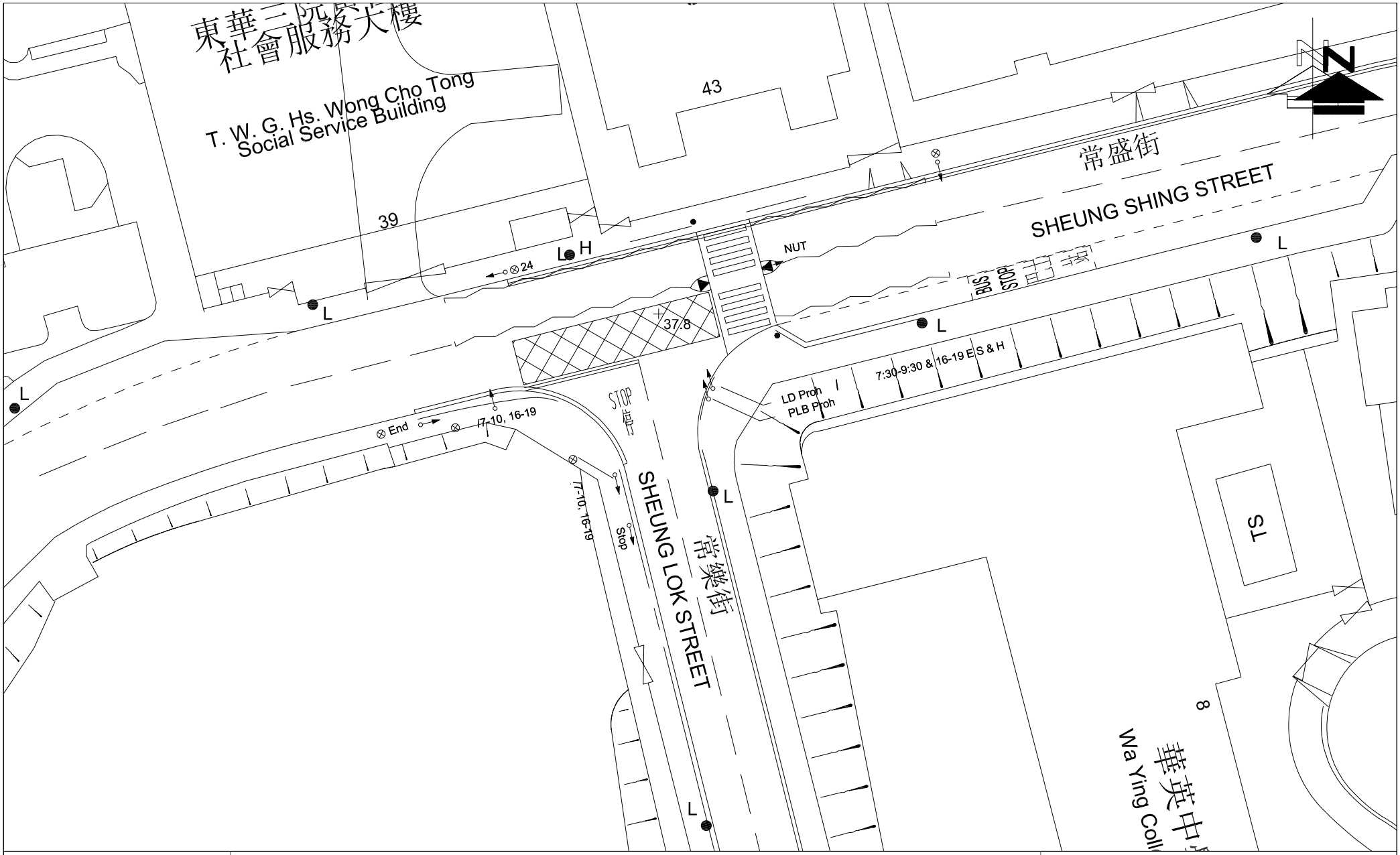

FIGURE NO.: 3.13		PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	CTA Consultants Limited 志達顧問有限公司
PROJECT NO.: 22101HK		DRAWING TITLE: EXISTING JUNCTION LAYOUT OF SHEUNG SHING STREET / SHEUNG LOK STREET (L)	
SCALE: 1 : 500@A4	DATE: 18 AUG 2022		

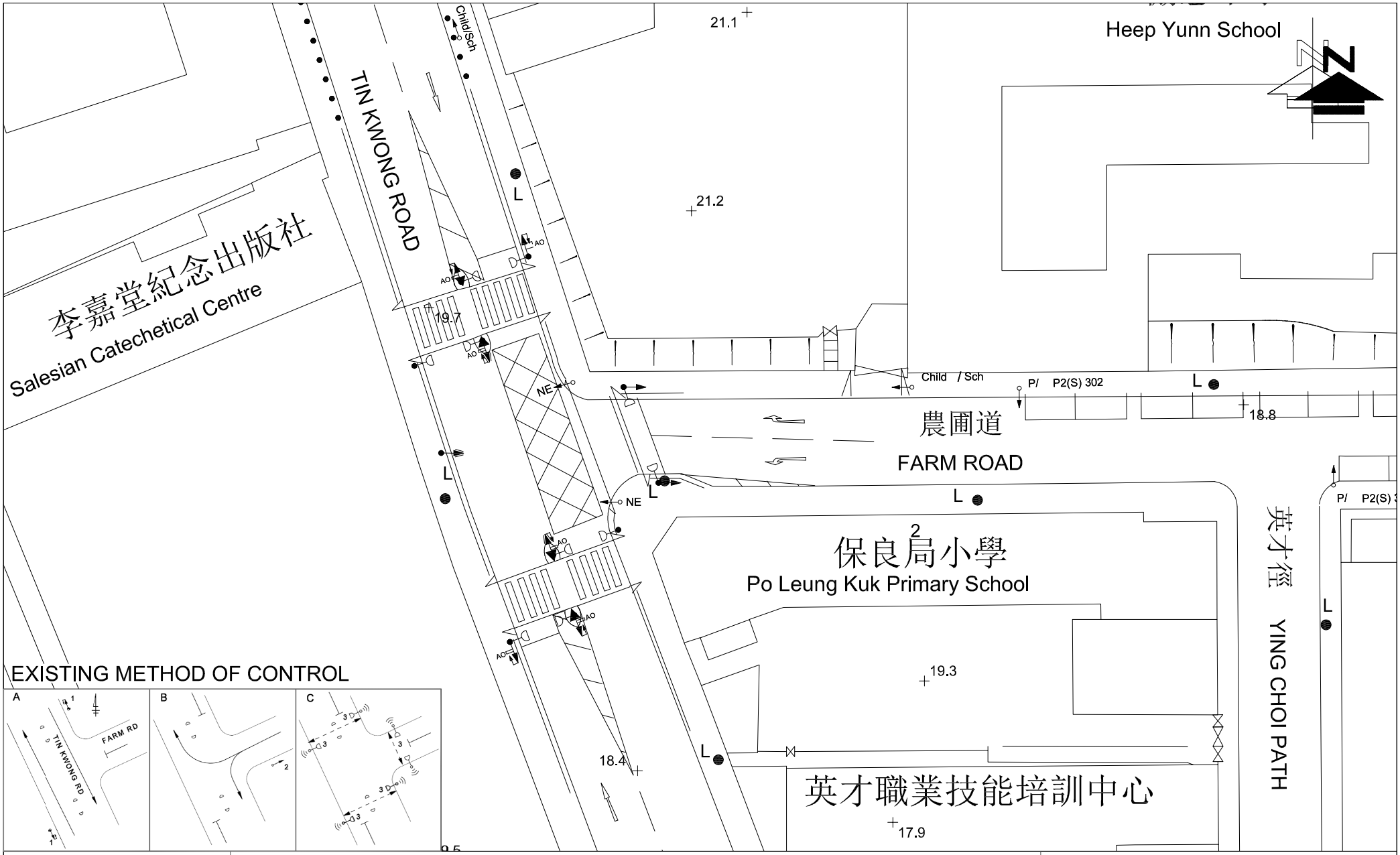

FIGURE NO.: 3.14	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)		
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF TIN KWONG ROAD / FARM ROAD (M)		
SCALE: 1 : 500 @A4	DATE: 18 AUG 2022		

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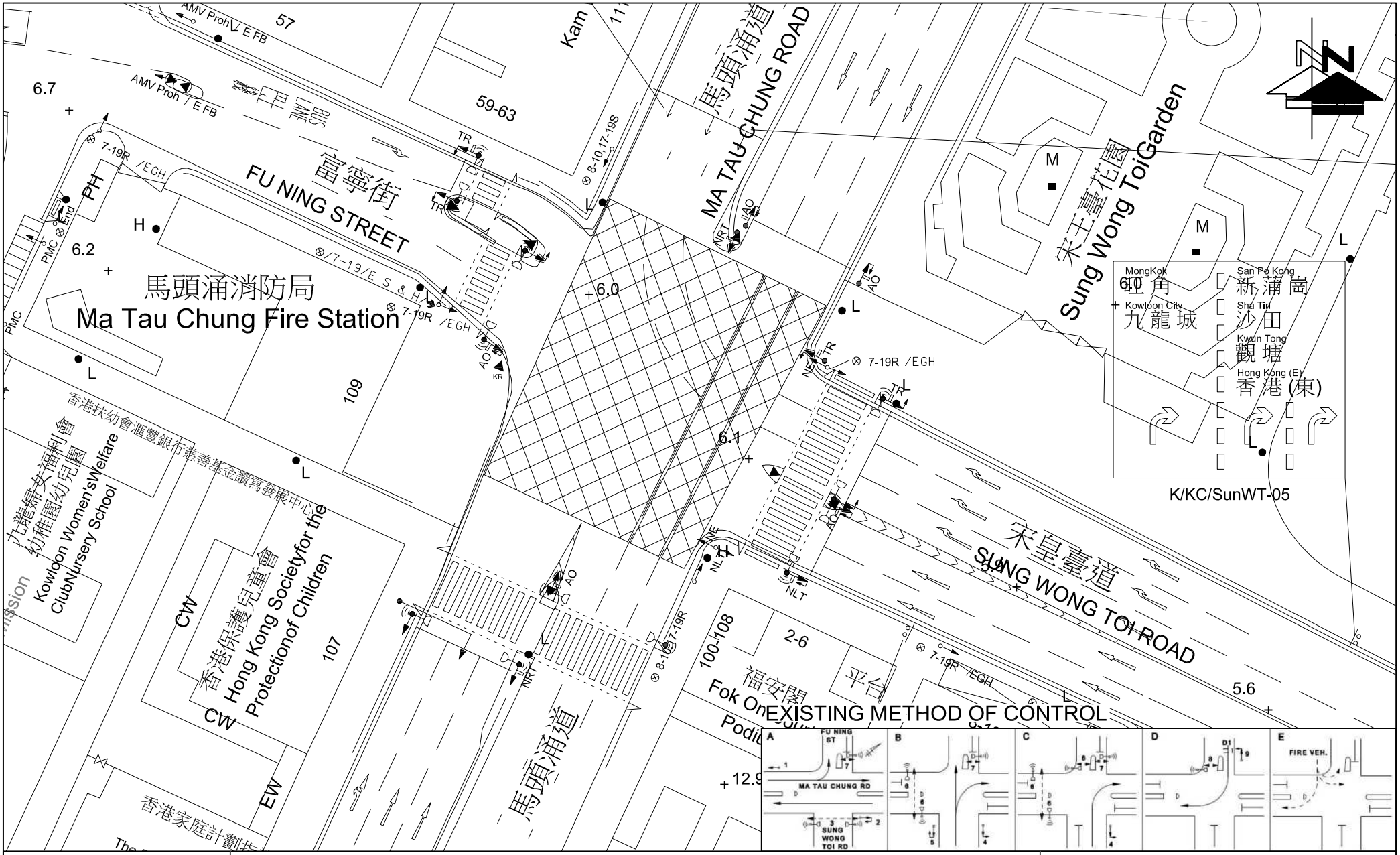

FIGURE NO.: 3.15	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU CHUNG ROAD / SUNG WONG TOI ROAD / FU NING STREET (N)
SCALE: 1 : 500@A4	DATE: 22 AUG 2022

CTA Consultants Limited
志達顧問有限公司

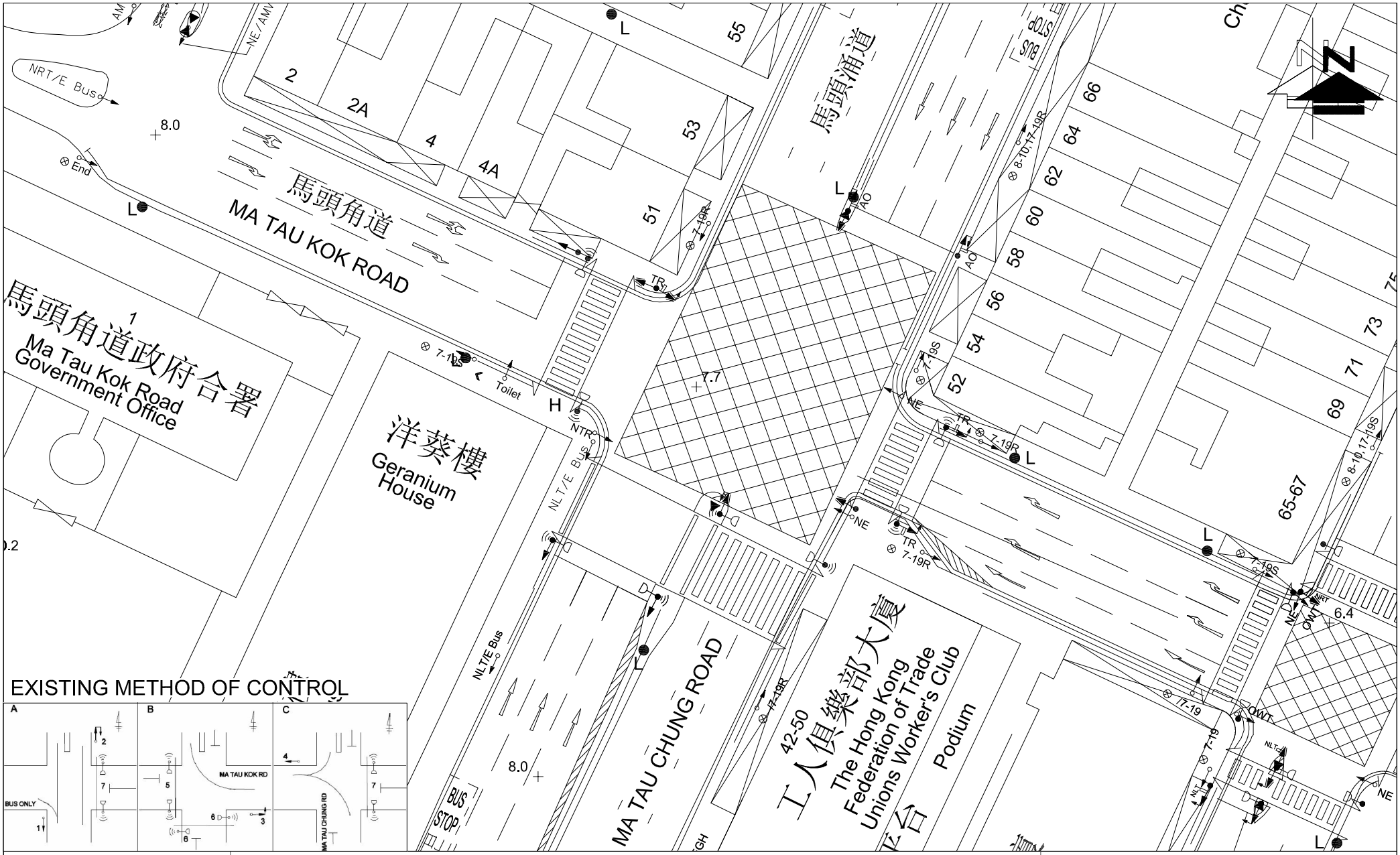

FIGURE NO.: 3.16	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU CHUNG ROAD / MA TAU KOK ROAD (O)
SCALE: 1 : 500@A4	DATE: 18 AUG 2022

CTA Consultants Limited
志達顧問有限公司

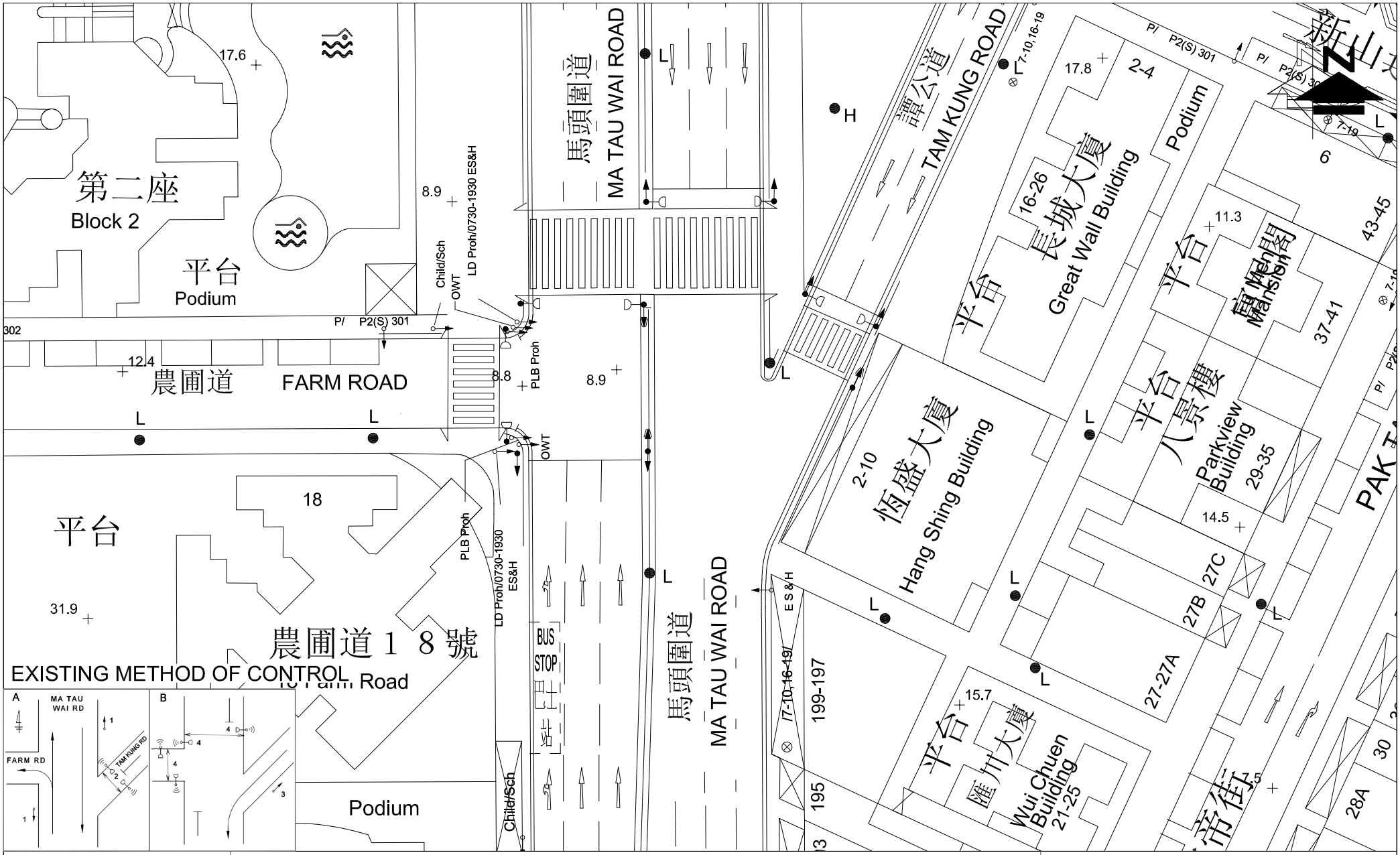

FIGURE NO.: 3.17		PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK		DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU WAI ROAD / FARM ROAD / TAM KUNG ROAD (P)	
SCALE: 1 : 500 @A4	DATE: 24 AUG 2022		

CTA Consultants Limited
志達顧問有限公司

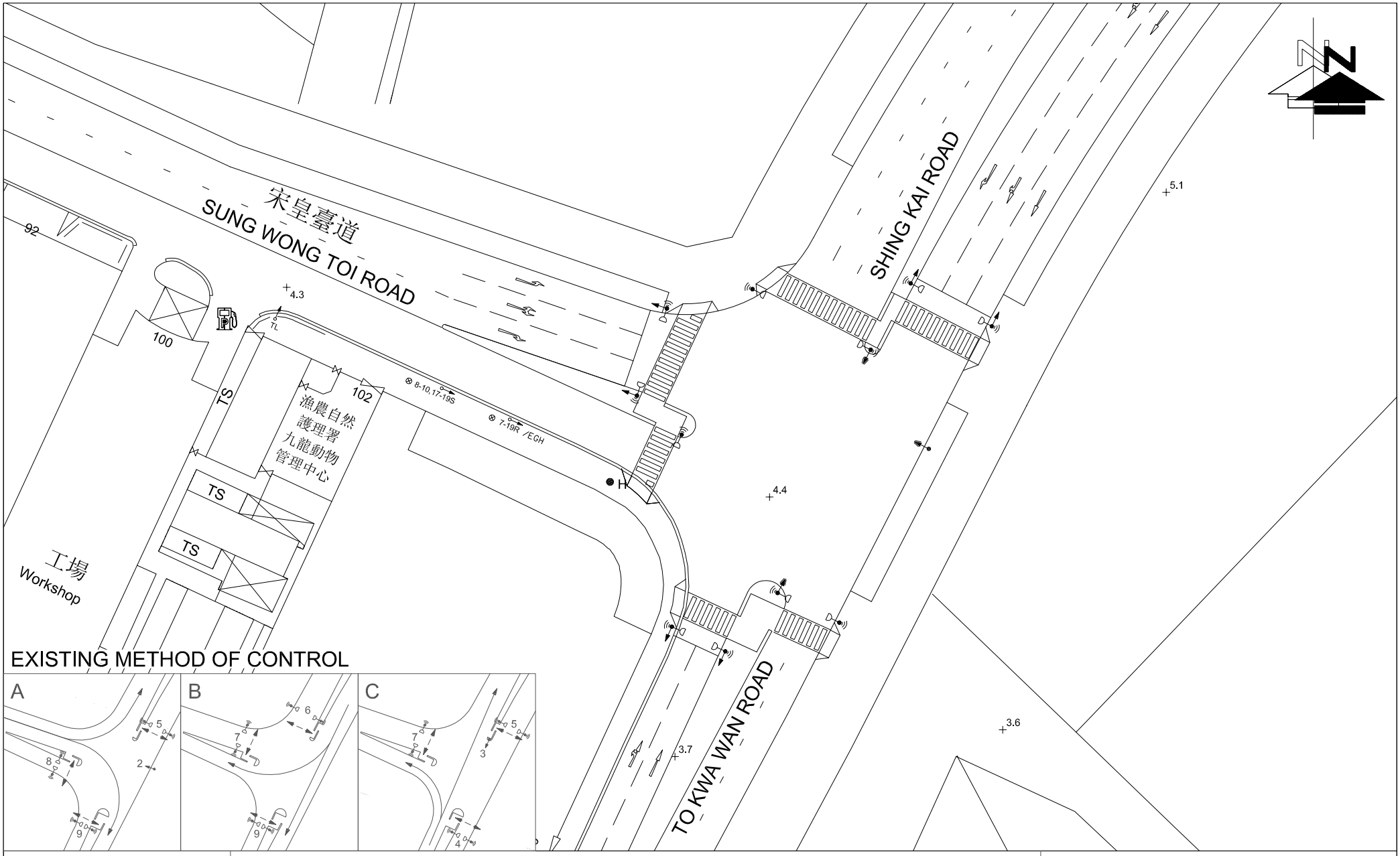

FIGURE NO.: 3.18		PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	CTA Consultants Limited 志達顧問有限公司
PROJECT NO.: 22101HK		DRAWING TITLE: EXISTING JUNCTION LAYOUT OF SUNG WONG TOI ROAD / TO KWA WAN ROAD / SHING KAI ROAD (Q)	
SCALE: 1 : 700@A4	DATE: 18 AUG 2022		

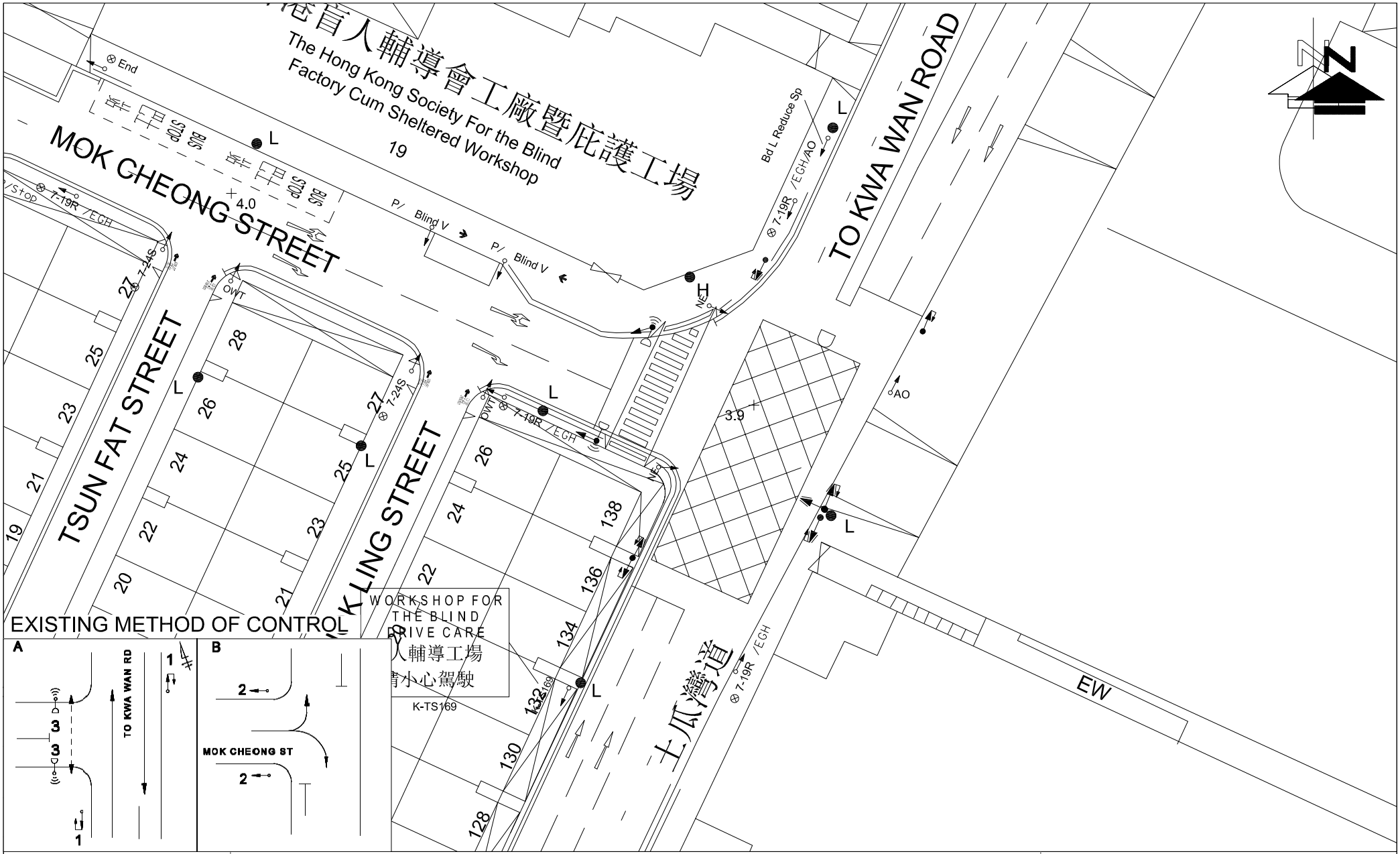

FIGURE NO.: 3.19	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MOK CHEONG STREET / TO KWA WAN ROAD (R)
SCALE: 1 : 500@A4	DATE: 18 AUG 2022

CTA Consultants Limited
志達顧問有限公司

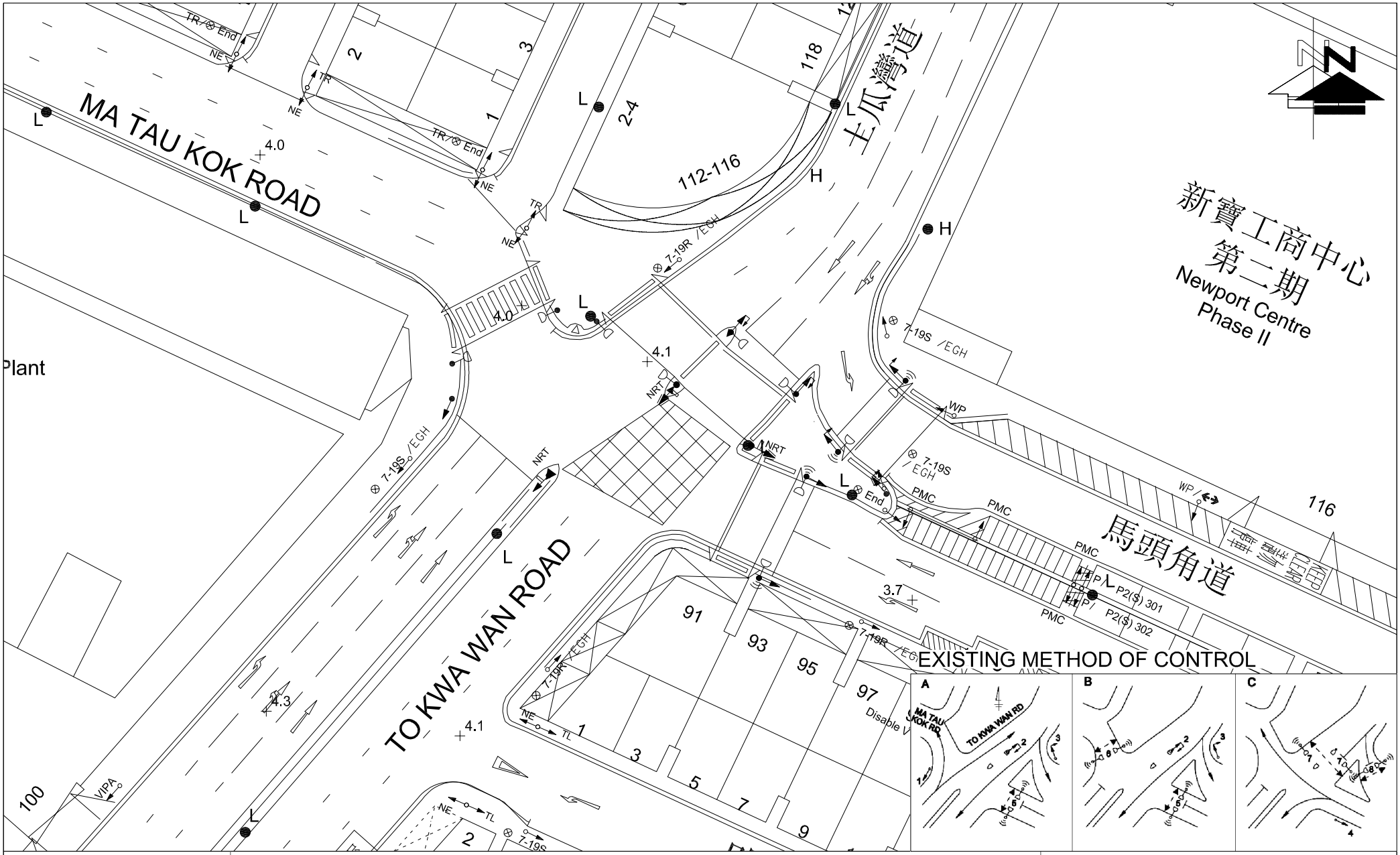

FIGURE NO.: 3.20	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF MA TAU KOK ROAD / TO KWA WAN ROAD (S)
SCALE: 1 : 500@A4	DATE: 18 AUG 2022

CTA Consultants Limited
志達顧問有限公司

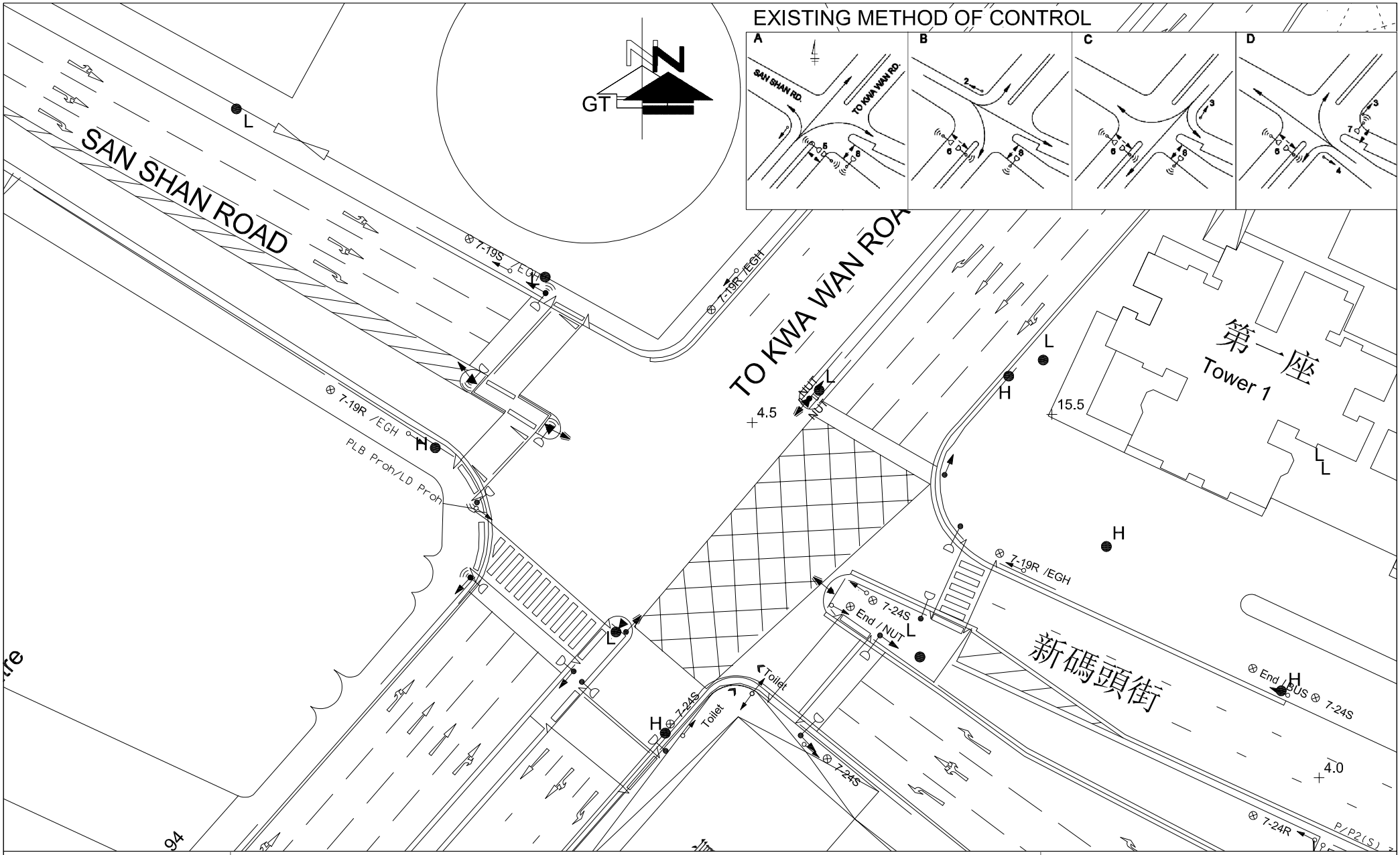

FIGURE NO.: 3.21		PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	CTA Consultants Limited 志達顧問有限公司
PROJECT NO.: 22101HK		DRAWING TITLE: EXISTING JUNCTION LAYOUT OF SAN SHAN ROAD / TO KWA WAN ROAD (T)	
SCALE: 1 : 500@A4	DATE: 18 AUG 2022		

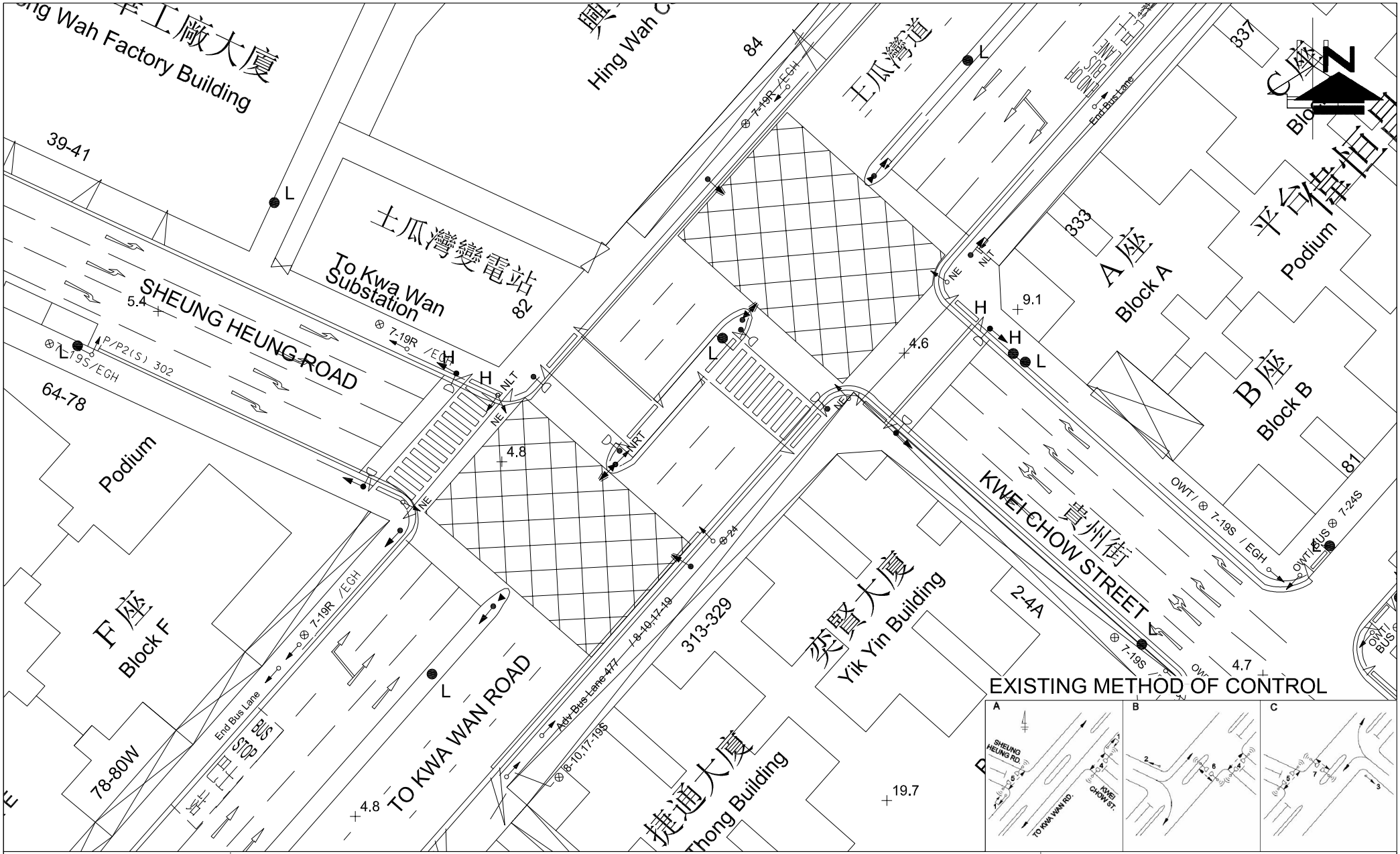

FIGURE NO.: 3.22	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF TO KWA WAN ROAD / SHEUNG HEUNG ROAD / KWEI CHOW STREET (U)	
SCALE: 1 : 500@A4	DATE: 18 AUG 2022	

CTA Consultants Limited
志達顧問有限公司

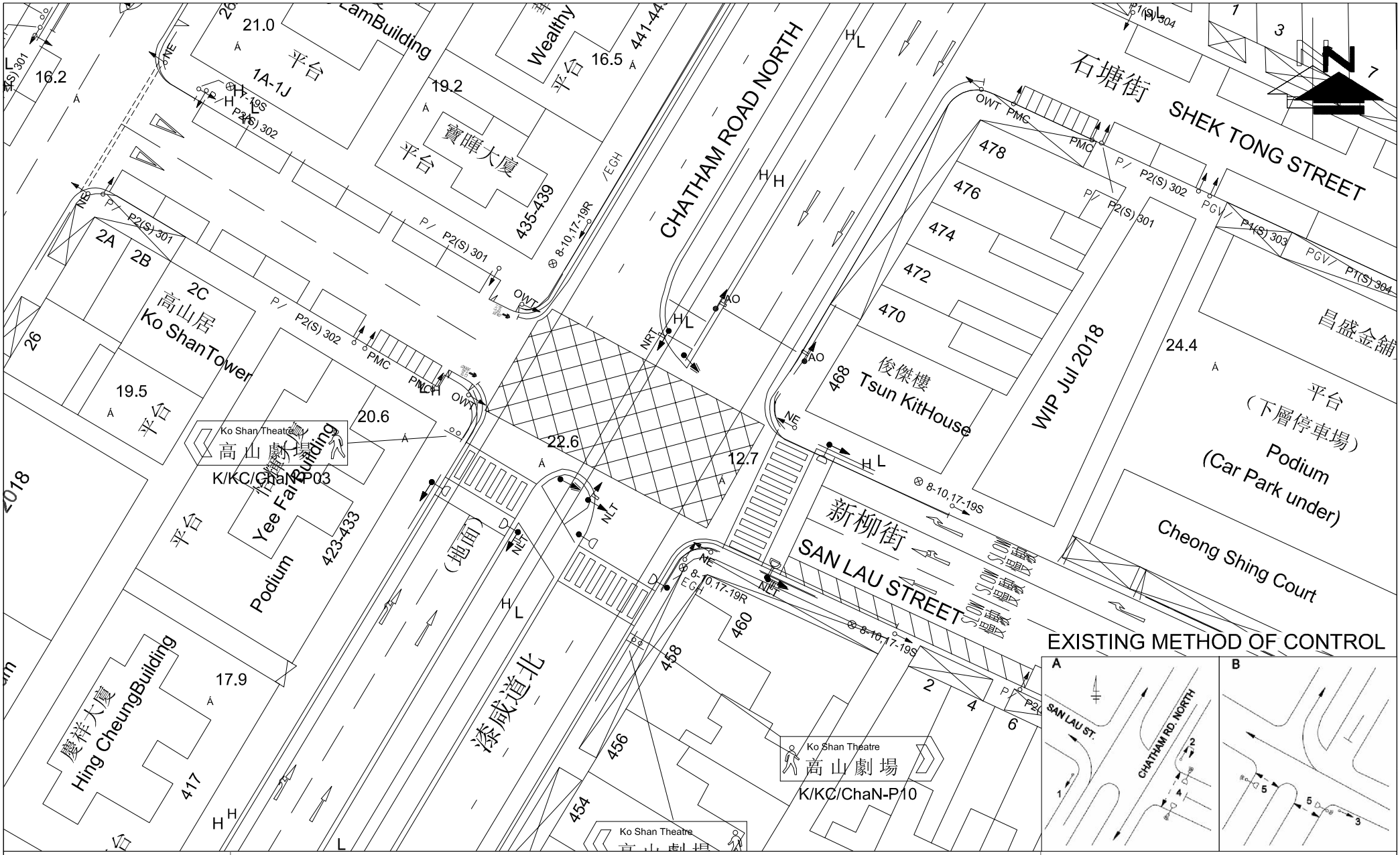

FIGURE NO.: 3.23	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF CHATHAM ROAD NORTH / SAN LAU STREET (V)
SCALE: 1 : 500@A4	DATE: 18 AUG 2022

CTA Consultants Limited
志達顧問有限公司

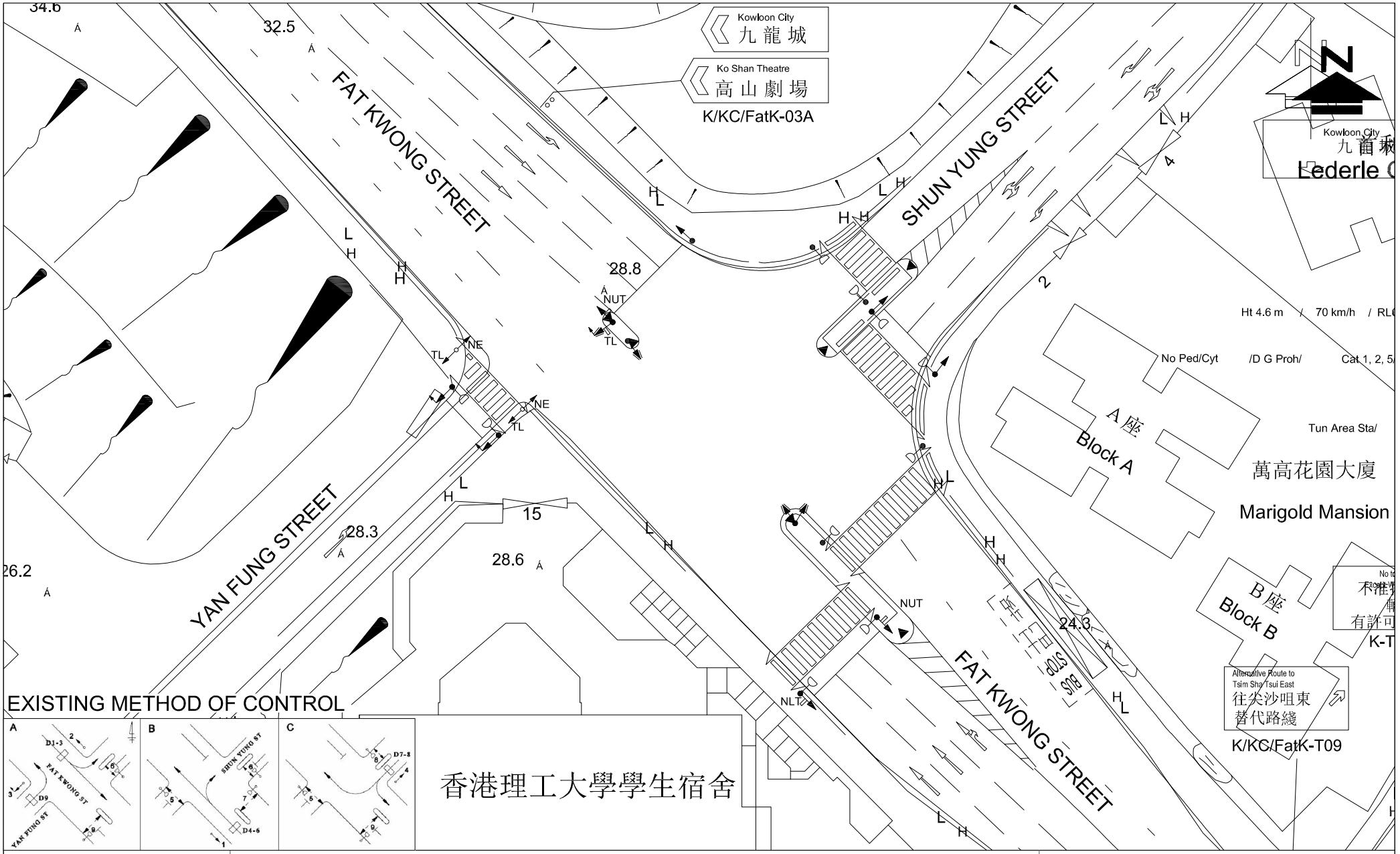

FIGURE NO.: 3.24	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF FAT KWONG STREET / SHUN TUNG STREET / YAN FUNG STREET (W)
SCALE: 1 : 500@A4	DATE: 18 AUG 2022

CTA Consultants Limited
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EXISTING METHOD OF CONTROL

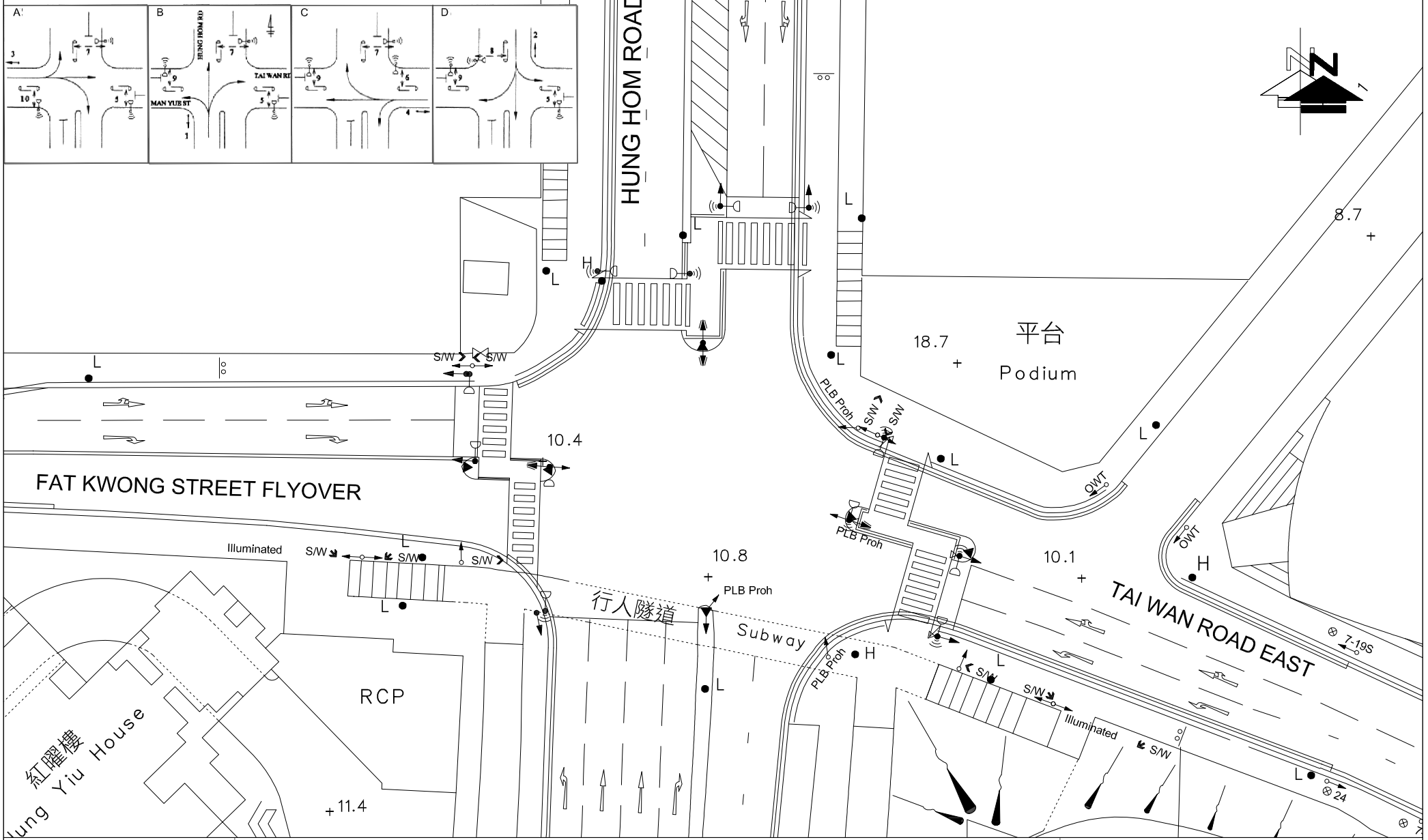
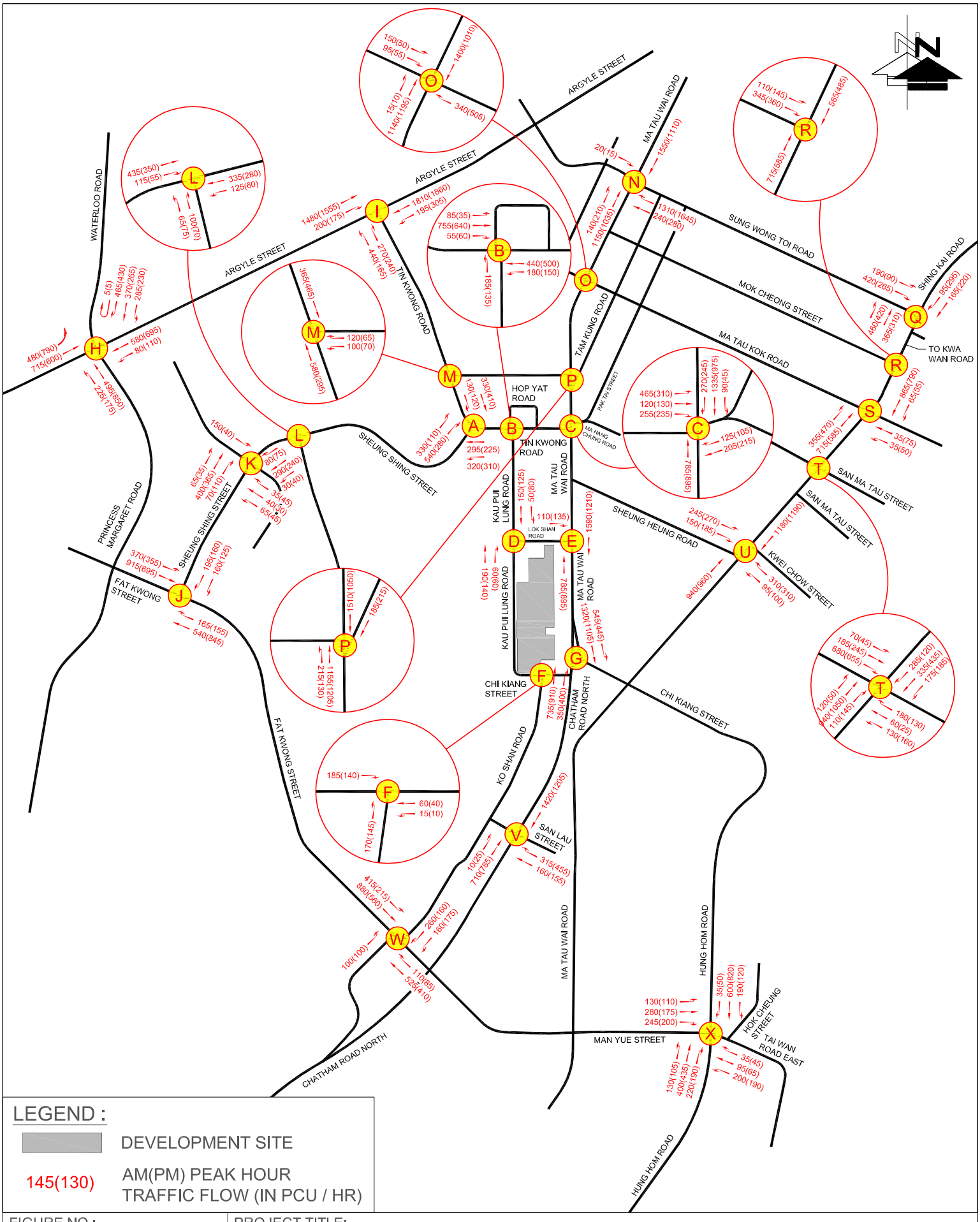


FIGURE NO.: 3.25	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: EXISTING JUNCTION LAYOUT OF HUNG HOM ROAD / FAT KWONG STREET FLYOVER / TAI WAN ROAD EAST (X)
SCALE: 1 : 500 @A4	DATE: 24 AUG 2022

CTA Consultants Limited
志達顧問有限公司

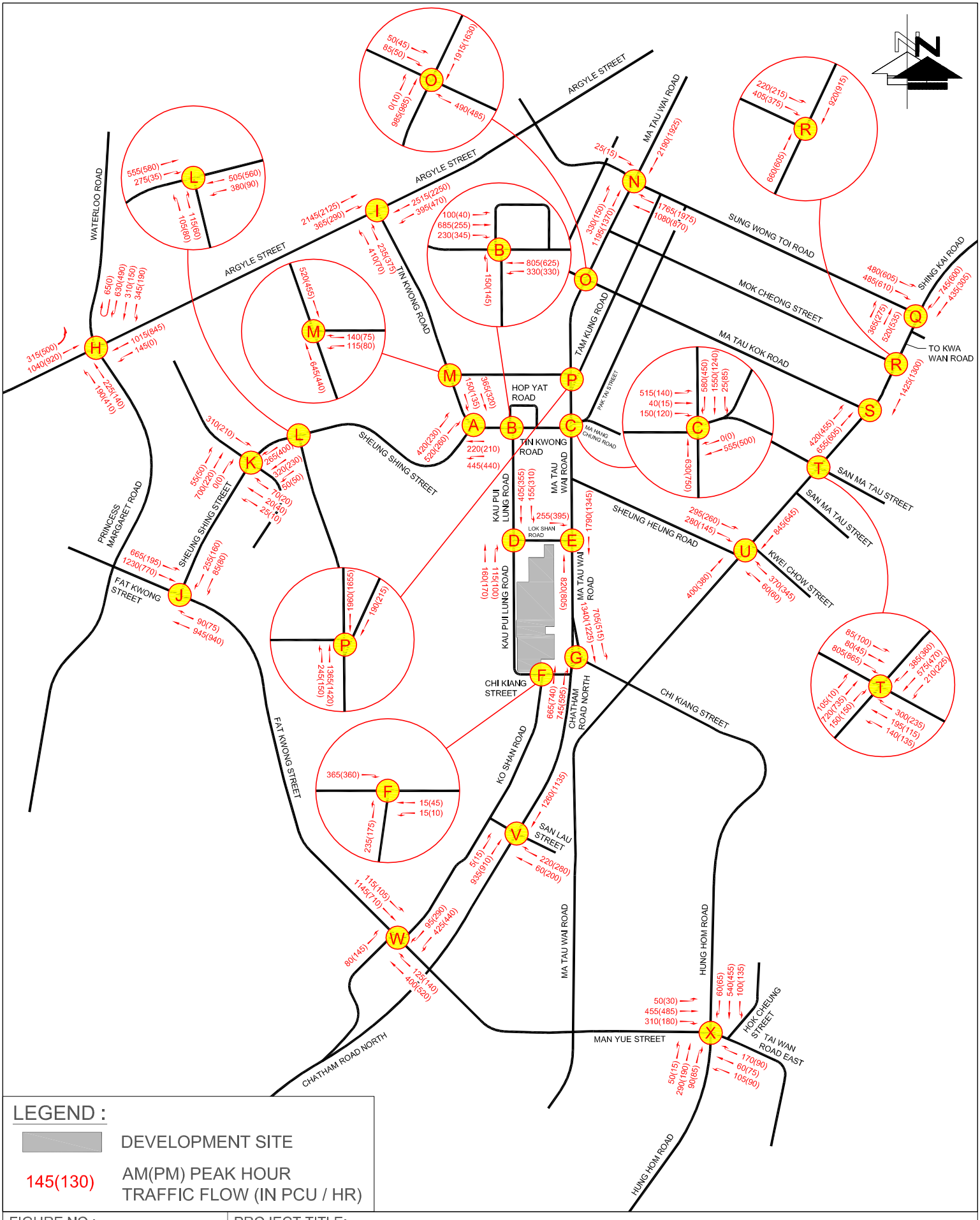


LEGEND :

DEVELOPMENT SITE

145(130) AM(PM) PEAK HOUR TRAFFIC FLOW (IN PCU / HR)

FIGURE NO.: 3.26	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2022 OBSERVED TRAFFIC FLOWS
SCALE: N. T. S. @A3 / DATE: 17 JAN 2023	CTA Consultants Limited 志達顧問有限公司



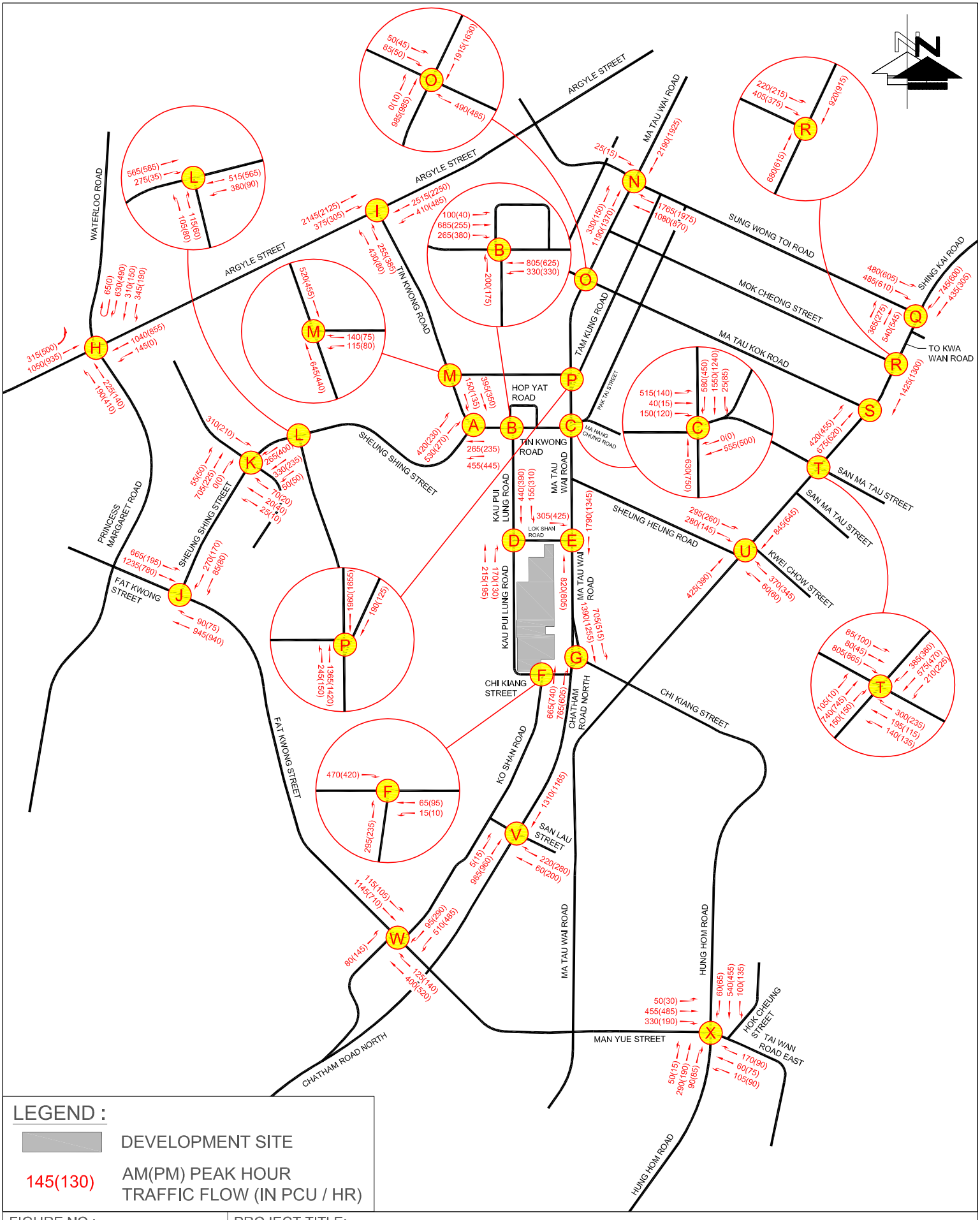
LEGEND :

DEVELOPMENT SITE

145(130) AM(PM) PEAK HOUR TRAFFIC FLOW (IN PCU / HR)

FIGURE NO.: 4.1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2036 REFERENCE TRAFFIC FLOWS
SCALE: N. T. S. @A3	DATE: 17 JAN 2023

CTA Consultants Limited 志達顧問有限公司

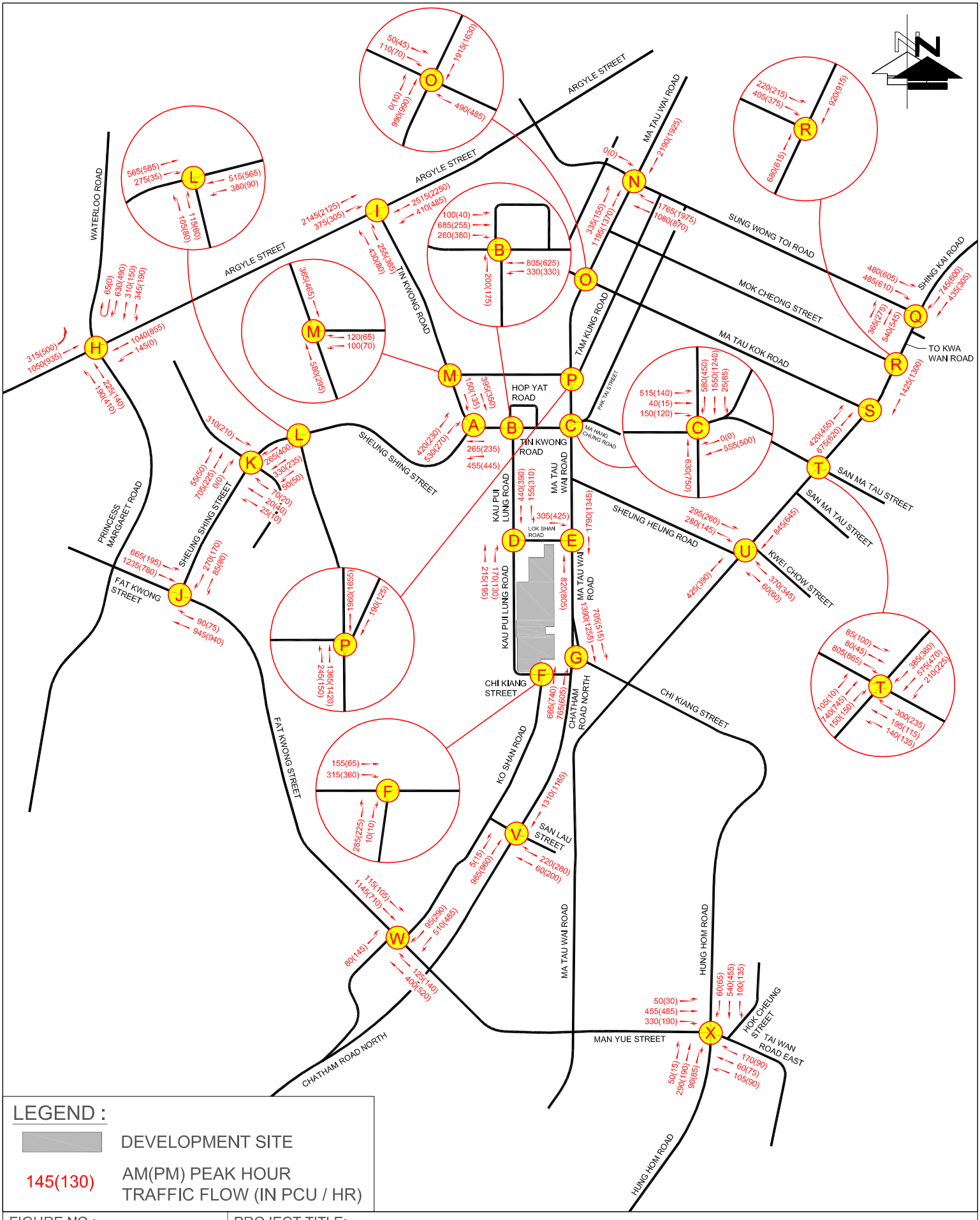


LEGEND :

DEVELOPMENT SITE

145(130) AM(PM) PEAK HOUR TRAFFIC FLOW (IN PCU / HR)

FIGURE NO.: 4.2	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2036 DESIGN TRAFFIC FLOWS
SCALE: N. T. S. @A3 / DATE: 18 JAN 2023	CTA Consultants Limited 志達顧問有限公司



LEGEND :

DEVELOPMENT SITE

145(130) AM(PM) PEAK HOUR TRAFFIC FLOW (IN PCU / HR)

FIGURE NO.: 4.3	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2036 DESIGN TRAFFIC FLOWS (WITH IMPROVEMENT)
SCALE: N. T. S. @A3 / DATE: 18 JAN 2023	CTA Consultants Limited 志達顧問有限公司

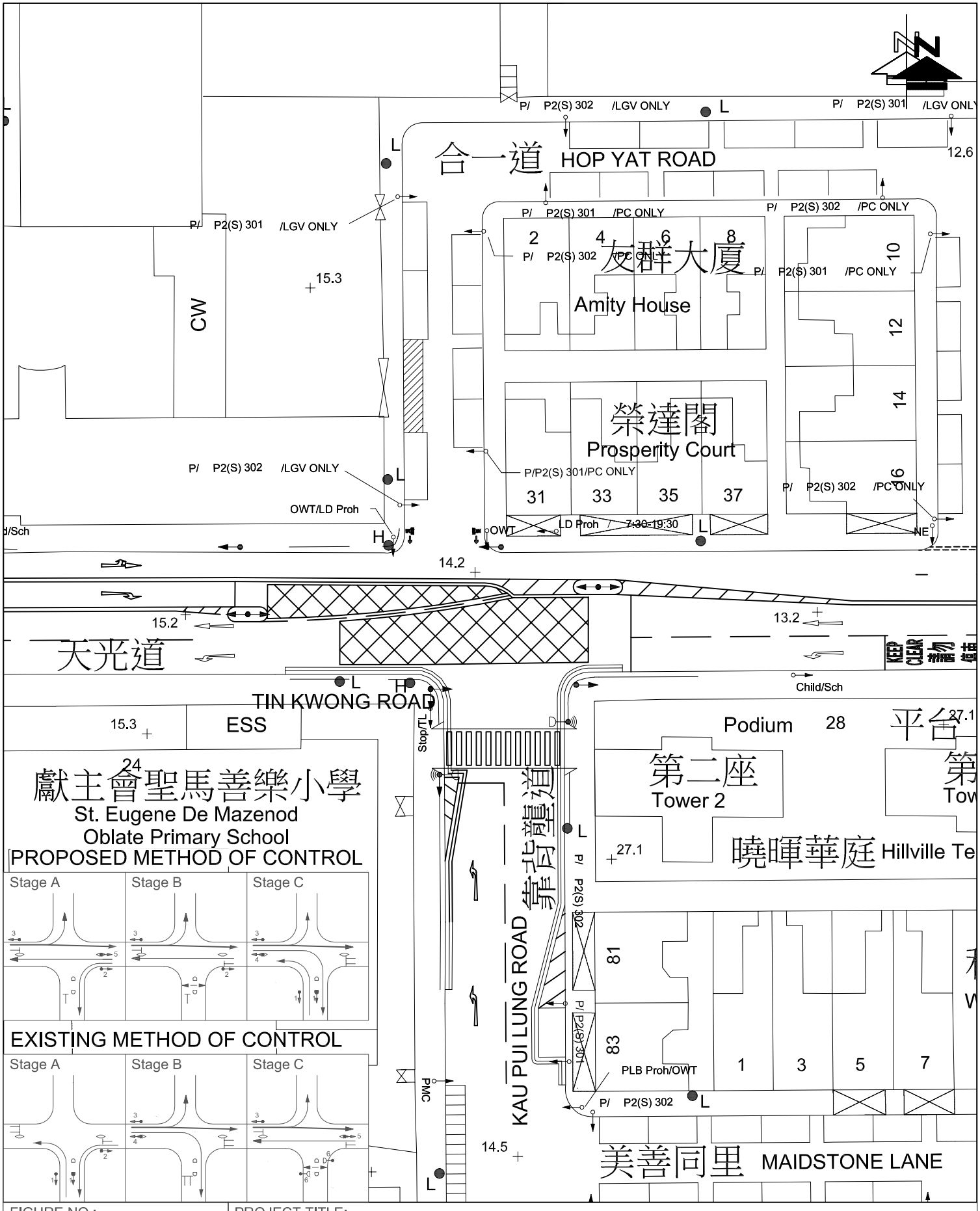


FIGURE NO.: 4.4	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF TIN KWONG ROAD / KAU PUI LUNG ROAD / HOP YAT ROAD (B)
SCALE: 1 : 500 @A4 / DATE: 18 OCT 2022	CTA Consultants Limited 志達顧問有限公司

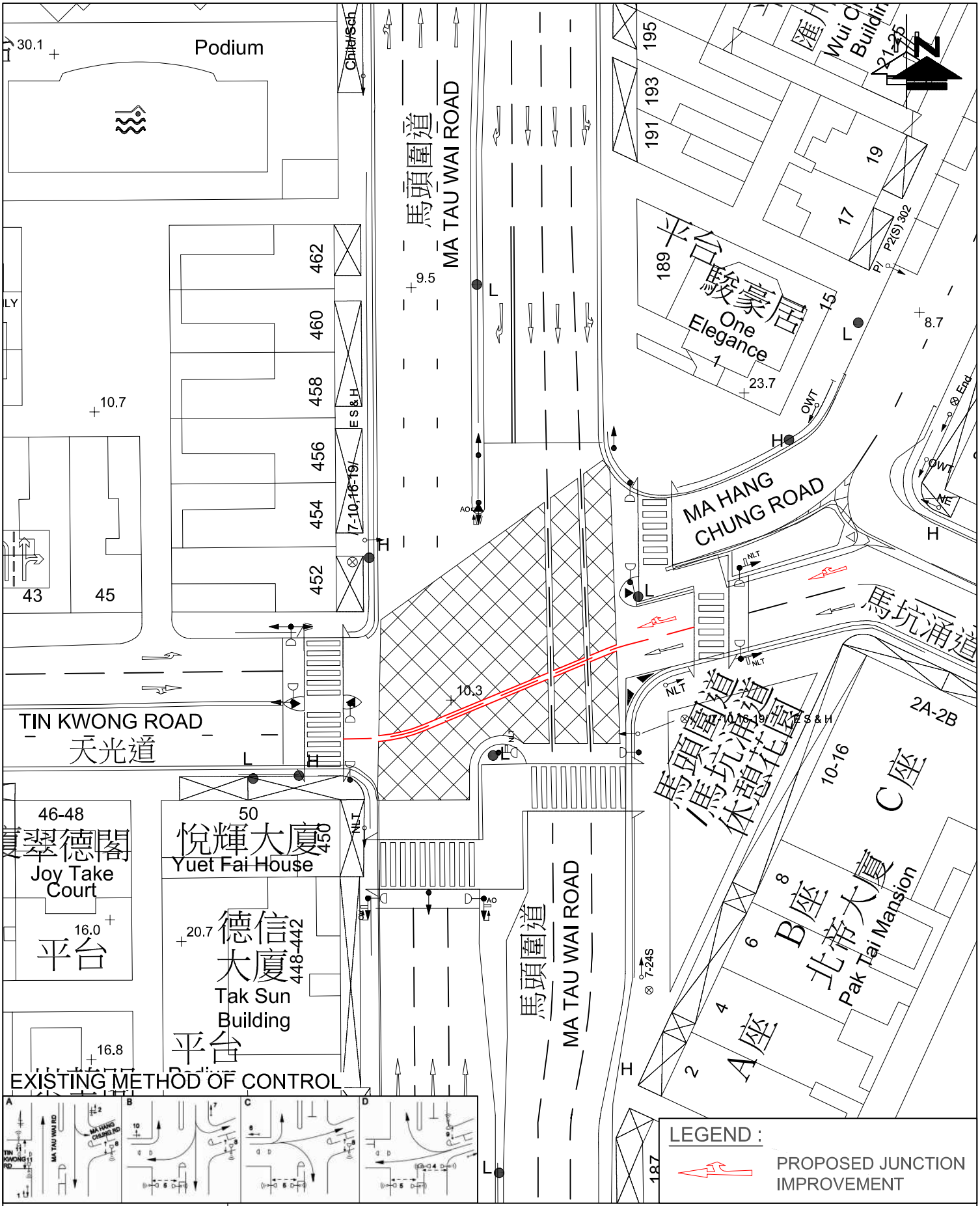


FIGURE NO.: 4.5	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF MA TAU WAI ROAD / TIN KWONG ROAD / MA HANG CHUNG ROAD (C)
SCALE: 1 : 500 @A4	DATE: 18 OCT 2022

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FIGURE NO.: 4.6	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF CHI KIANG STREET / KO SHAN ROAD (F)
SCALE: 1 : 500 @A4	DATE: 18 OCT 2022

CTA Consultants Limited
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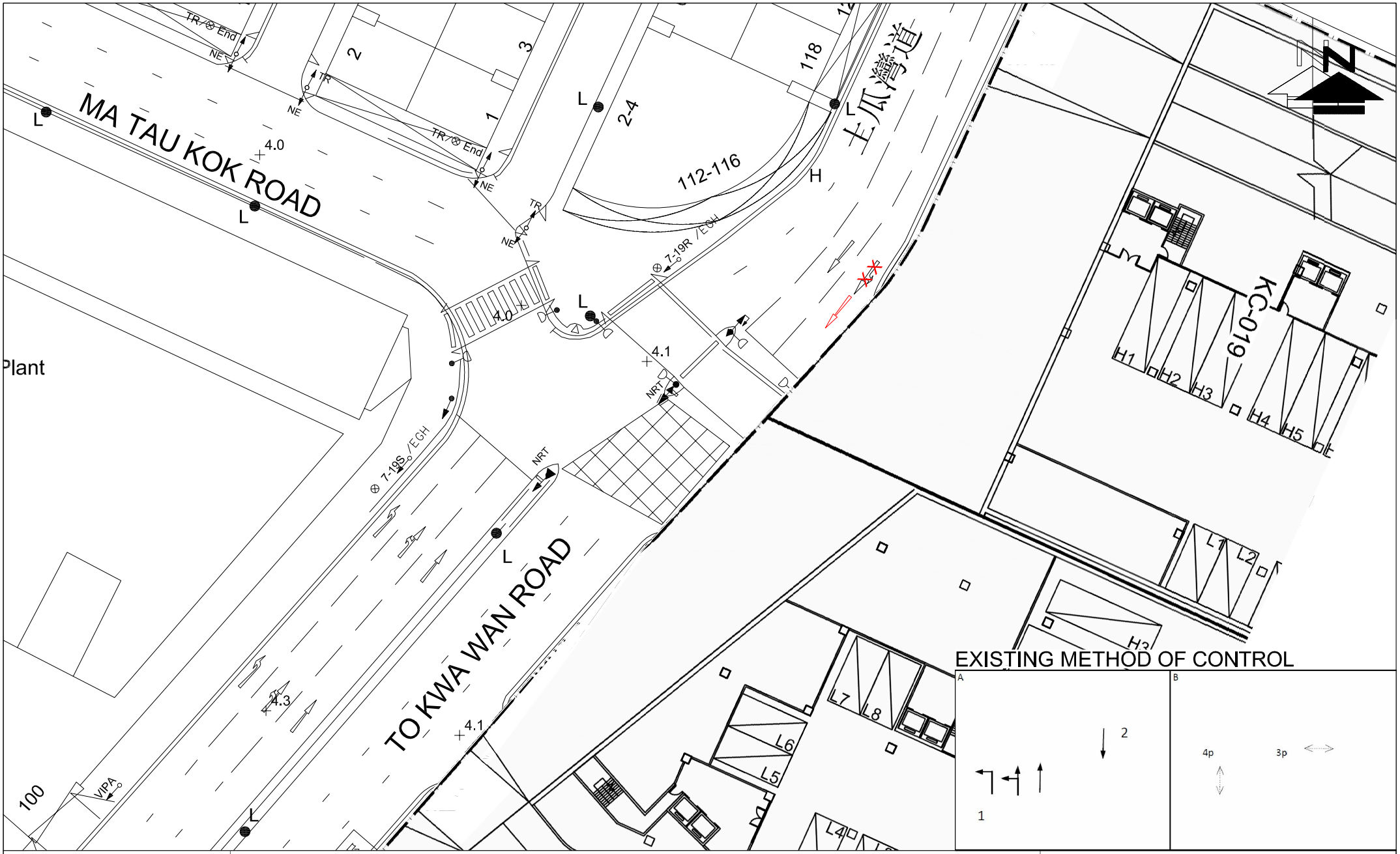


FIGURE NO.: 4.7	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF MA TAU KOK ROAD / TO KWA WAN ROAD (S) (BY URA KC-018 AND KC-019)
SCALE: 1 : 500@A4	DATE: 18 JAN 2023

CTA Consultants Limited
志達顧問有限公司

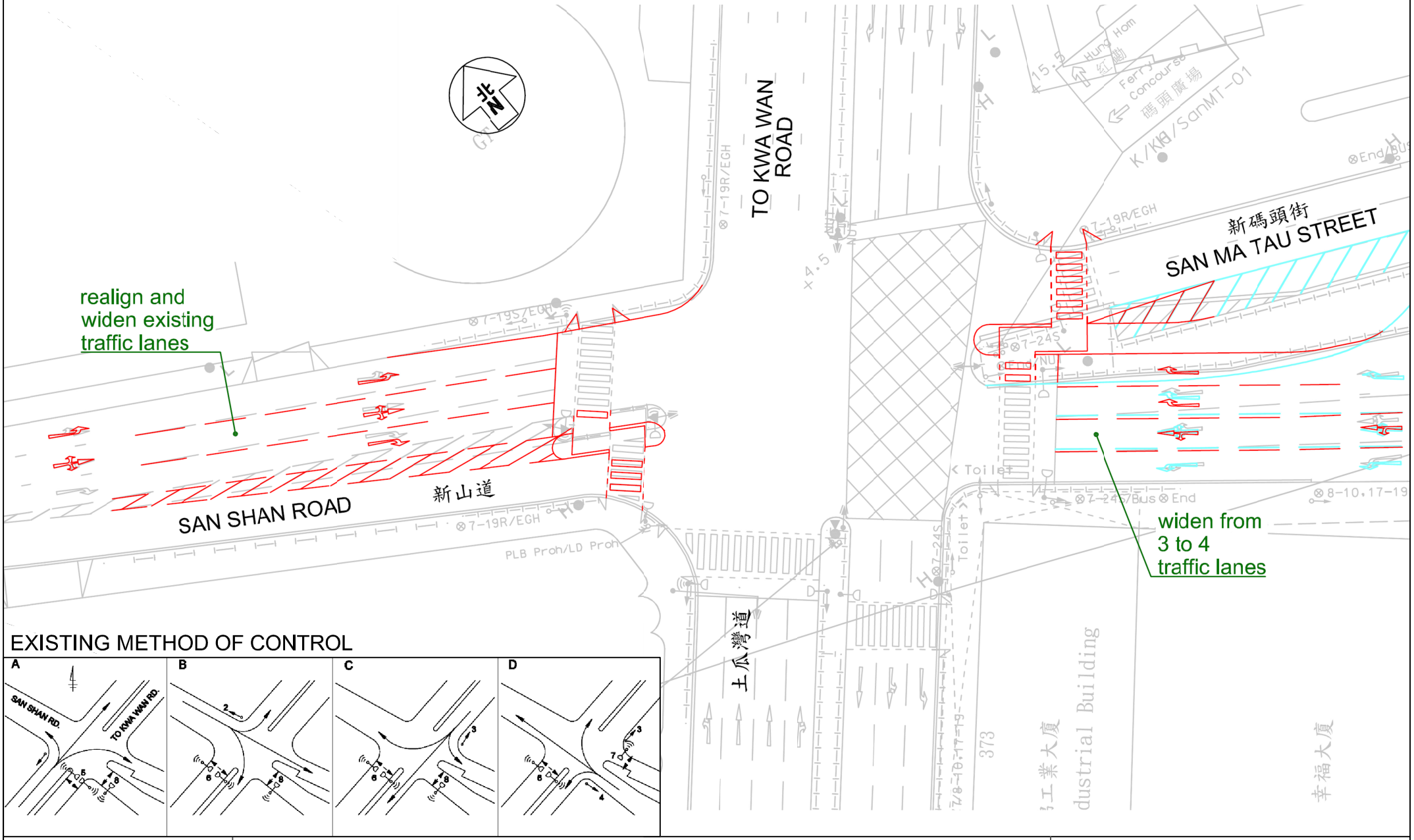


FIGURE NO.: 4.8	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)	
PROJECT NO.: 22101HK	DRAWING TITLE: PROPOSED IMPROVEMENT JUNCTION LAYOUT OF SAN SHAN ROAD / TO KWA WAN ROAD (T) (BY URA KC-018 AND KC-019)	CTA Consultants Limited 志達顧問有限公司
SCALE: 1 : 500@A4 / DATE: 18 JAN 2023		

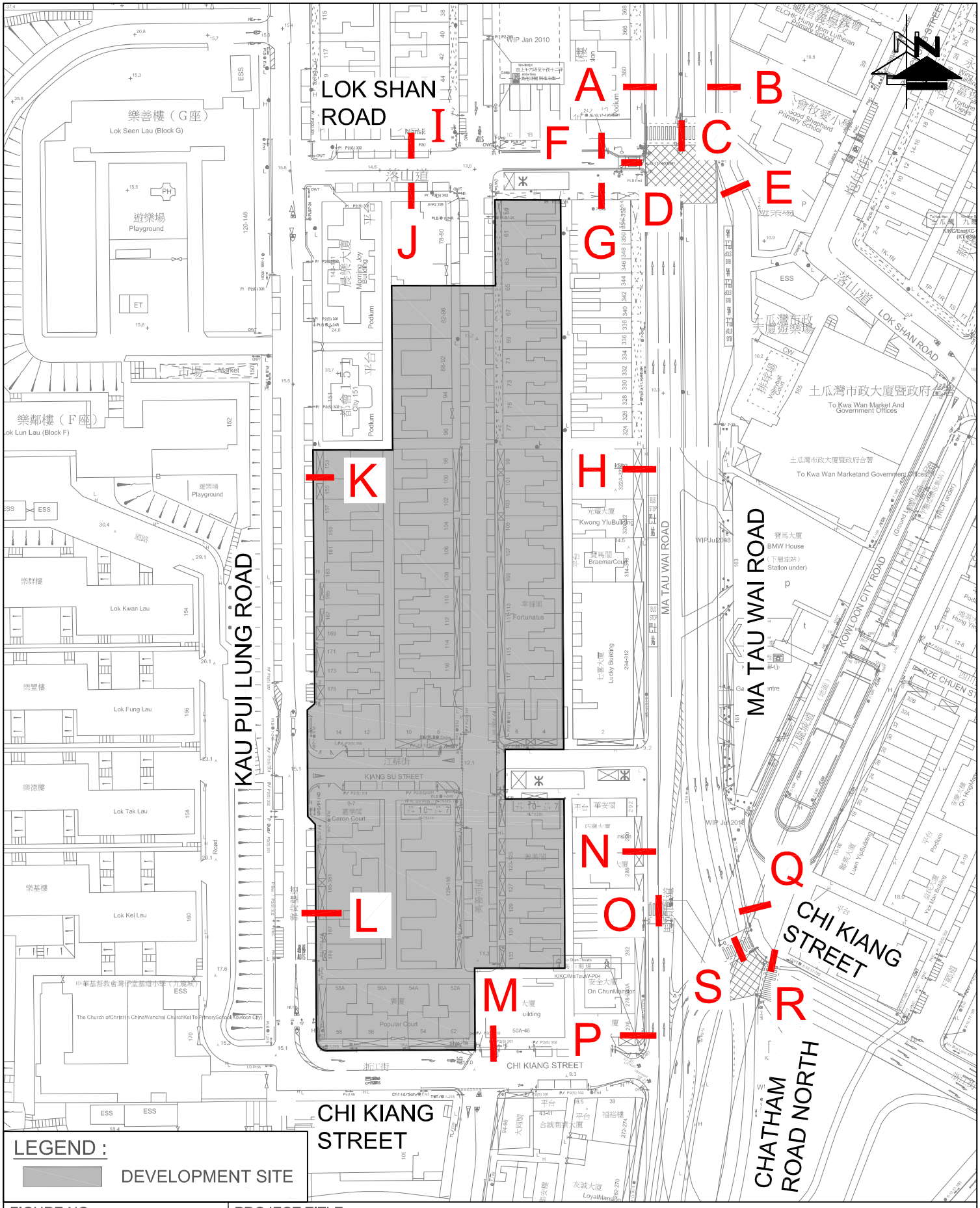


FIGURE NO.: 5.1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: PEDESTRIAN INDEX PLAN
SCALE: 1 : 1500 @A4	DATE: 18 OCT 2022

CTA Consultants Limited
志達顧問有限公司

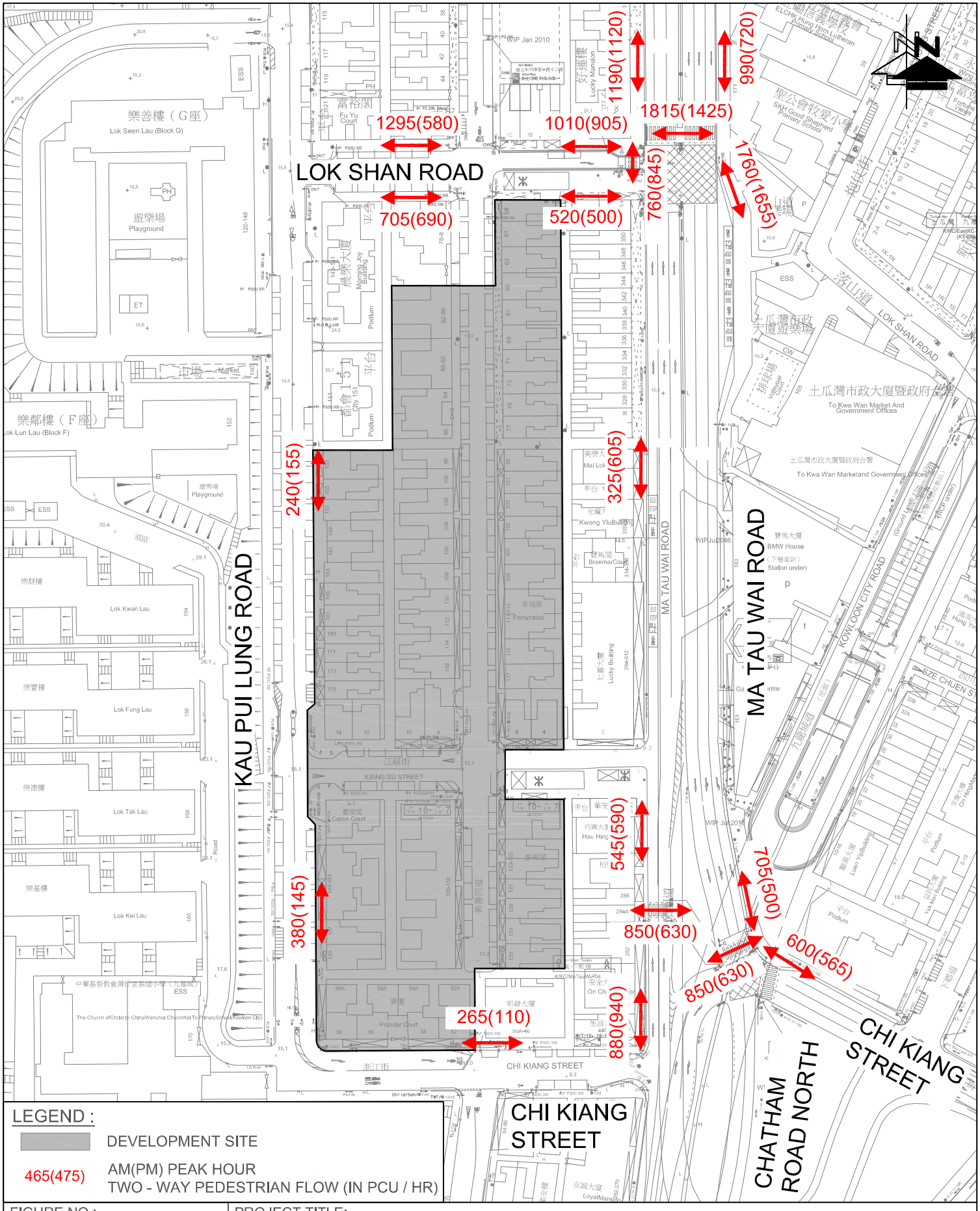


FIGURE NO.: 5.2	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2022 OBSERVED PEDESTRIAN FLOWS
SCALE: 1 : 1500 @A4	DATE: 18 OCT 2022

CTA Consultants Limited
志達顧問有限公司

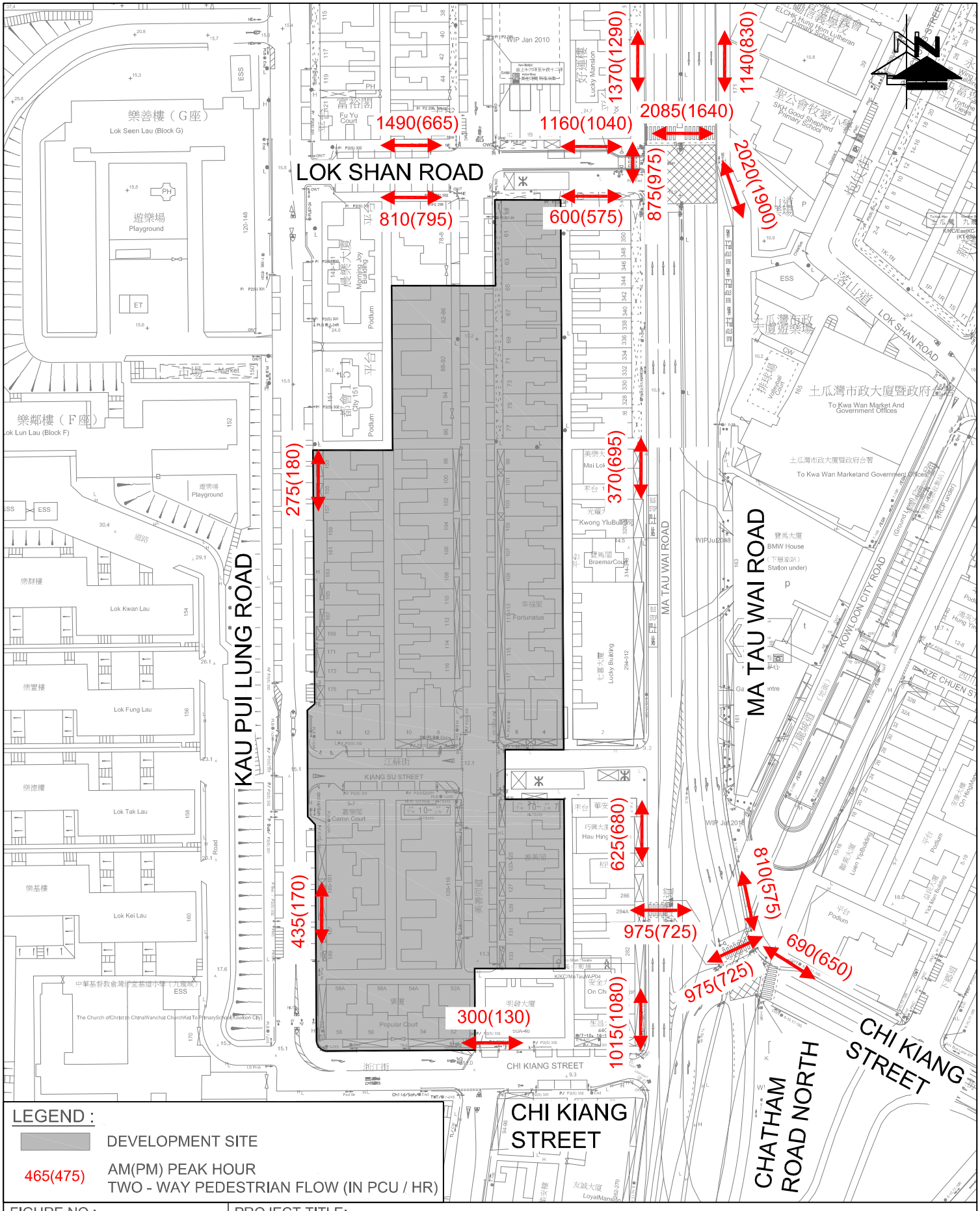


FIGURE NO.: 5.3	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2036 REFERENCE PEDESTRIAN FLOWS
SCALE: 1 : 1500 @A4	DATE: 18 OCT 2022

CTA Consultants Limited
志達顧問有限公司

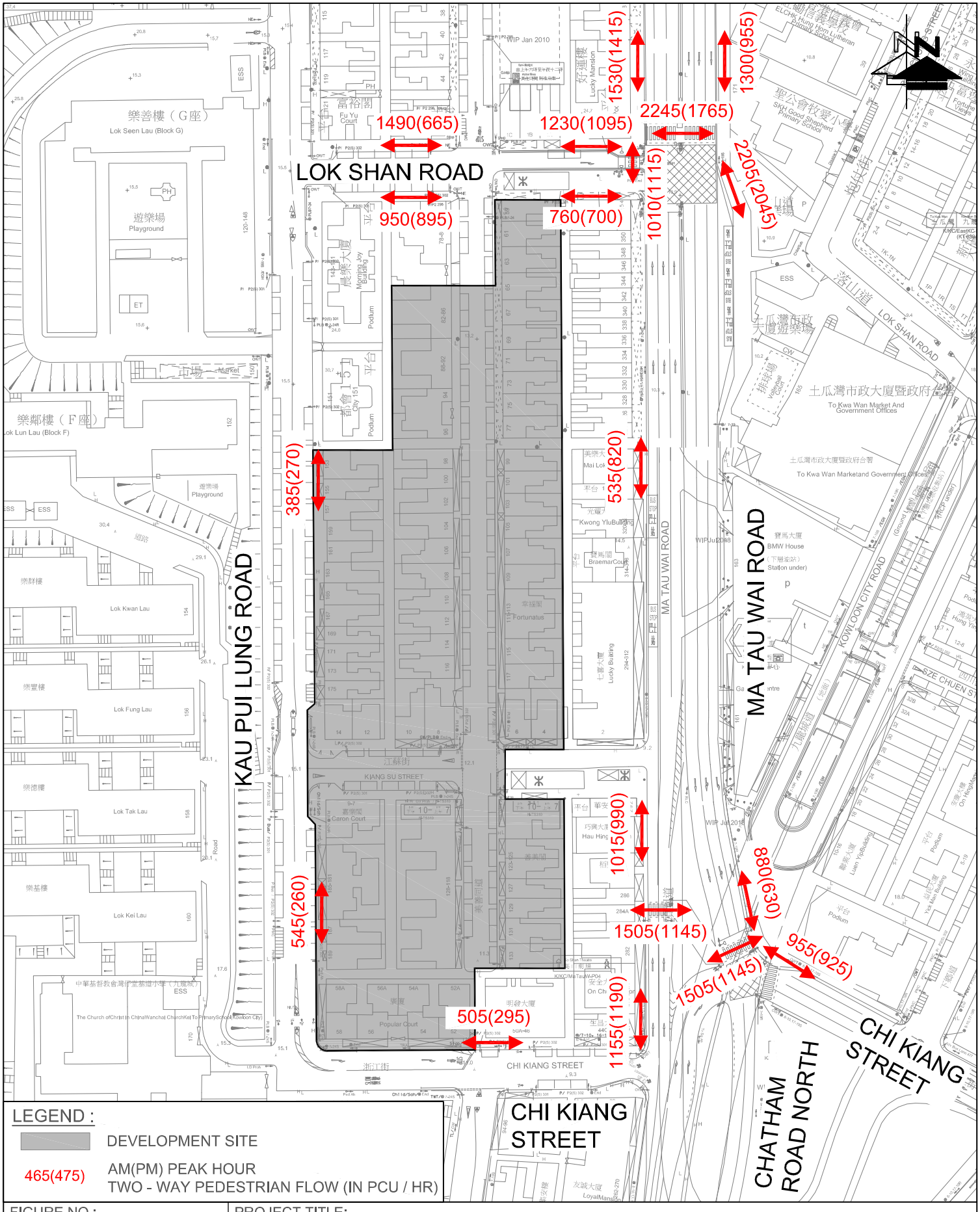
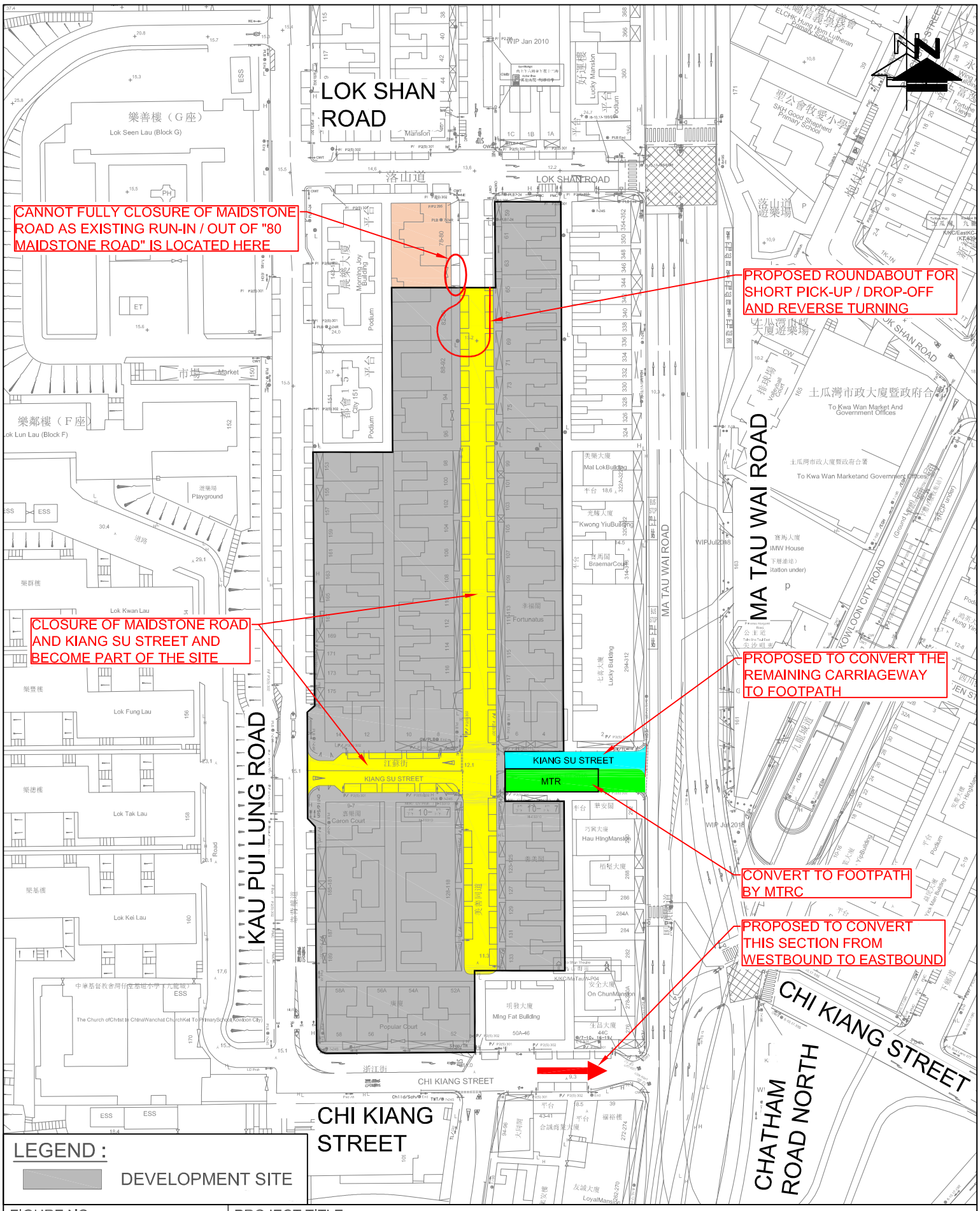


FIGURE NO.: 5.4	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: 2036 DESIGN PEDESTRIAN FLOWS
SCALE: 1 : 1500 @A4	DATE: 18 OCT 2022

CTA Consultants Limited
志達顧問有限公司



LEGEND :

DEVELOPMENT SITE

FIGURE NO.: RC 1	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: INDICATIVE ROAD CLOSURE PLAN
SCALE: 1 : 1500 @ A4	DATE: 17 JAN 2023

CTA Consultants Limited
志達顧問有限公司

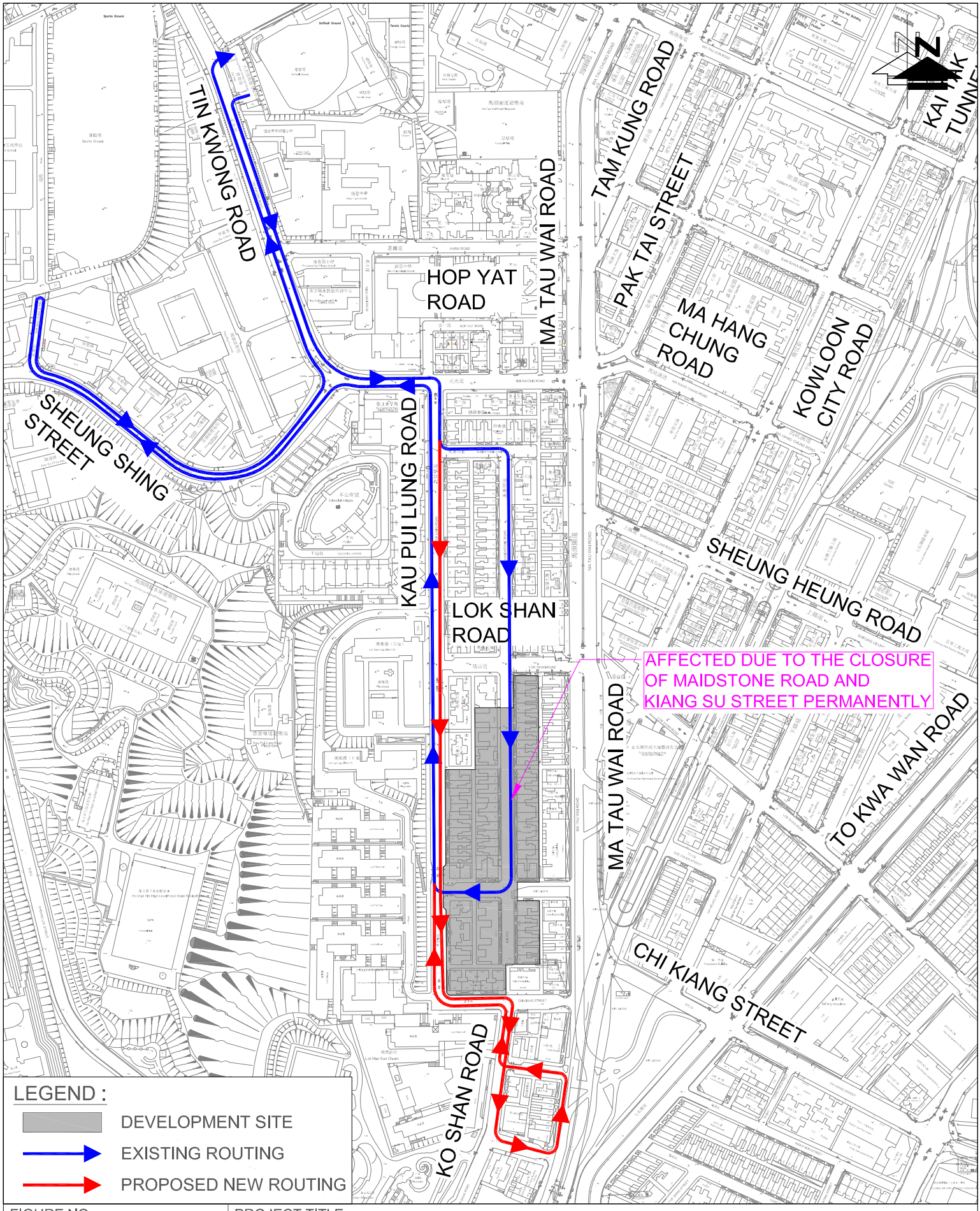


FIGURE NO.: RC 2	PROJECT TITLE: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-02:KC)
PROJECT NO.: 22101HK	DRAWING TITLE: AFFECTED LEARNER DRIVERS' ROUTING
SCALE: 1 : 4000 @ A4	DATE: 17 JAN 2023

CTA Consultants Limited
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Appendix I

Junction Calculation Sheets

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

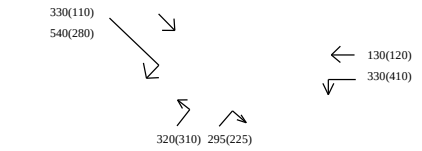
Junction: **(A) Tin Kwong Road / Sheung Shing Street**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	SE	↘	2,3	A,B	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	330	0.166		410	0.207	
	SE	↘	3	B	3.5	0	10	0	100%	100%	1	2105	2105	1830	1830	1830	1830	130	0.071	0.071	120	0.066	0.066
Sheung Shing Street	NE	↗↘	4	C	3.2	10	18	1	0% / 20%	9% / 41%	1	1935	4010	1700	1725	3585	3610	413	0.243	0.243	186	0.108	0.108
	NE	↗	4	C	3.2	0	15	0	100%	100%	1	2075	0	1885	1885	0	0	457	0.243		204	0.108	
Tin Kwong Road	W	↙	1	A	3.4	10	0	1	100%	100%	1	1955	1955	1700	1700	1700	1700	295	0.174	0.174	225	0.132	0.148
	W	←	1	A	3.4	0	0	0	0%	0%	1	2095	2095	2095	2095	2095	2095	320	0.153		310	0.148	
Pedestrian crossing		↓	5p	B		Min. Crossing Time = 10GM + 5FGM = 15s																	
		↓	6p	C		Min. Crossing Time = 6GM + 6FGM = 12s																	
		↔	7p	C		Min. Crossing Time = 11GM + 5FGM = 16s																	
		↔	8p	A,B		Min. Crossing Time = 6GM + 6FGM = 12s																	

Notes:

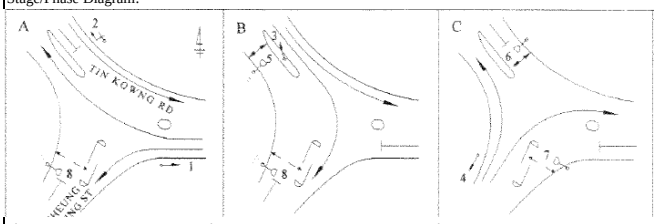
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.487
L (sec)	14
C (sec)	130
y pract.	0.803
R.C. (%)	65%

P.M. Check Phase	
εy	0.322
L (sec)	14
C (sec)	118
y pract.	0.793
R.C. (%)	147%

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

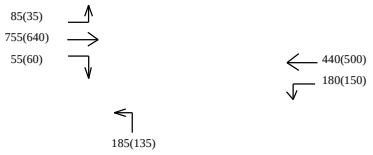
Junction: **(B) Tin Kwong Road / Kau Pui Lung Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	E		1	A,B,C	2.8	8	0	1	10%	5%	0.8	1516	1516	1485	1500	1485	1500	840	0.566		675	0.450	
	E		2	B	2.8	0	12.5	0	100%	100%	1	2035	2035	1815	1815	1815	1815	55	0.030	0.030	60	0.033	0.033
Kau Pui Lung Road	N		3	C	4.6	25	0	1	100%	100%	0.7	1453	1453	1370	1370	1370	1370	185	0.135		135	0.099	
Tin Kwong Road	W		5	A	3.0	0	0	0	0%	0%	1	2055	2055	2055	2055	2055	2055	440	0.214	0.214	500	0.243	0.243
	W		4	C	3.0	5	0	1	100%	100%	1	1915	1915	1475	1475	1475	1475	180	0.122	0.135	150	0.102	0.102
Pedestrian crossing			6p	A		Min. Crossing Time = 8GM + 8FGM = 16s																	

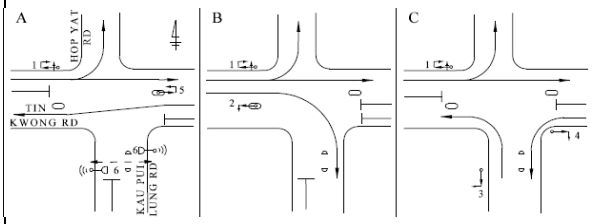
Notes:

Traffic Flow (pcu / hr)



A.M. Check Phase		P.M. Check Phase	
εy	0.379	εy	0.378
L (sec)	16	L (sec)	16
C (sec)	130	C (sec)	118
y pract.	0.789	y pract.	0.778
R.C. (%)	**108%**	R.C. (%)	**106%**

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

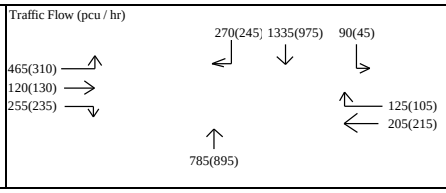
Junction: **(C) Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road**
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	E		2	B,C	2.9	10	0	1	100%	100%	1	1905	1905	1655	1655	1655	1655	465	0.281		310	0.187	
	E		2	C	2.9	0	15	0	68%	64%	1	2045	2045	1915	1920	1915	1920	375	0.196	0.196	365	0.190	0.190
Ma Tau Wai Road	N		5	A	3.4	0	0	1	0%	0%	1	1955	6105	1955	1955	6105	6105	251	0.129	0.129	287	0.147	0.147
	N		5	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	269	0.129		307	0.147	
	N		5	A	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	264	0.129		301	0.147	
Ma Hang Chung Road	W		6	D	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	125	0.065		105	0.054	
	W		6	D	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	205	0.103	0.103	215	0.108	0.108
Ma Tau Wai Road	S		3	A,B	3.0	8	0	1	20%	14%	1	1915	6025	1840	1860	5950	5970	441	0.239		318	0.171	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	492	0.240		351	0.171	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	492	0.240		351	0.171	
	S		3	B	3.0	0	15	0	100%	100%	1	2055	2055	1870	1870	1870	1870	270	0.144	0.144	245	0.131	0.131

Pedestrian crossing		
	7p	Min. Crossing Time = 14GM + 13FGM = 27s
	8p	Min. Crossing Time = 6GM + 12FGM = 18s
	9p	Min. Crossing Time = 5M + 9FGM = 14s
	10p	Min. Crossing Time = 13GM + 10FGM = 23s
	11p	Min. Crossing Time = 19GM + 7FGM = 26s

Notes:

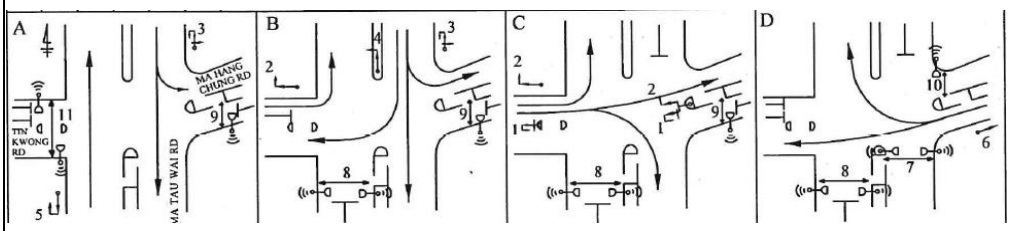
Traffic Flow (pcu / hr)



A.M. Check Phase	
cy	0.572
L (sec)	24
C (sec)	130
y pract.	0.734
R.C. (%)	**28%**

P.M. Check Phase	
cy	0.576
L (sec)	24
C (sec)	120
y pract.	0.720
R.C. (%)	**25%**

Stage/Phase Diagram:



I/G=12s I/G=6s I/G=5s I/G=5s

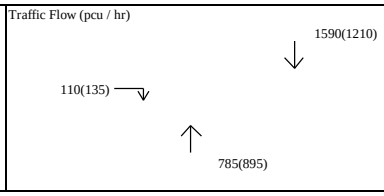
TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(E) Ma Tau Wai Road / Lok Shan Road**
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Lok Shan Road	E	↘	3	B	3.5	0	15	1	100%	100%	1	1965	1965	1785	1785	1785	1785	110	0.062	0.062	135	0.076	0.076
Ma Tau Wai Road	N	↑	1	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	250	0.127		285	0.145	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	268	0.127		305	0.145	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	268	0.127		305	0.145	
											#N/A												
Ma Tau Wai Road	S	↓	2	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	506	0.257	0.257	385	0.196	0.196
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	542	0.257		412	0.196	
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	542	0.257		412	0.196	
Pedestrian crossing		↔	4p	B		Min. Crossing Time = 9GM + 10FGM = 19s																	
		↕	5p	A		Min. Crossing Time = 6GM + 4FGM = 9s																	

Notes:

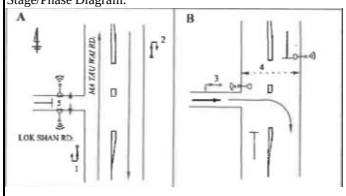
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.319
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	**163%**

P.M. Check Phase	
εy	0.272
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	**207%**

Stage/Phase Diagram:



I/G=6s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(G) Ma Tau Wai Road / Chi Kiang Street**
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Wai Road	N	↑	1	A,B	3.5	0	0	1	0%	0%	1	1825	3930	1825	1825	3930	3930	341	0.187		423	0.232	
	N	↑	1	A,B	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	394	0.187		487	0.232	
	N	↱	2	A	5.4	0	20	0	100%	100%	1	2295	4590	2135	2135	4220	4220	177	0.083	0.083	202	0.095	0.095
	N	↱	2	A	5.4	0	15	0	100%	100%	1	2295	0	2085	2085	0	0	173	0.083		198	0.095	
Ma Tau Wai Road	S	↳	3	C	3.3	18	0	1	100%	100%	1	1945	6115	1790	1790	5960	5960	545	0.304	0.304	445	0.249	0.249
	S	↓↳	3	C	3.3	20	0	0	0%	0%	1	2085	0	2085	2085	0	0	660	0.317		553	0.265	
	S	↓	3	C	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	660	0.317		553	0.265	

Pedestrian crossing			
	4p	A,B	Min. Crossing Time = 6GM + 11FGM = 17s
	5p	B	Min. Crossing Time = 5GM + 13FGM = 18s
	6p	C	Min. Crossing Time = 5GM + 8FGM = 13s

Notes:

Traffic Flow (pcu / hr)

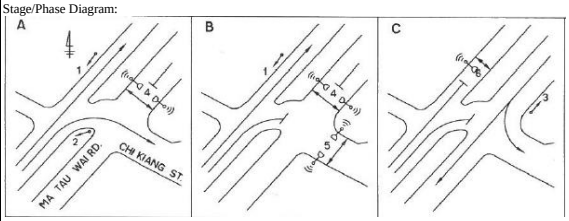
1320(1105) 545(445)

735(910) 350(400)

A.M. Check Phase	
εy	0.387
L (sec)	34
C (sec)	130
y pract.	0.665
R.C. (%)	**72%**

P.M. Check Phase	
εy	0.343
L (sec)	30
C (sec)	120
y pract.	0.675
R.C. (%)	**97%**

Stage/Phase Diagram:



I/G=6s I/G=9+18s I/G=3s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(H) Argyle Street / Waterloo Road / Princess Margaret Road**
Description: **2022 Observed Flow**

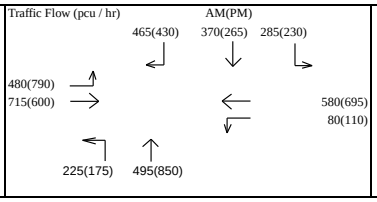
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	4250	2125	0	4250	4250	240	0.113		395	0.186	
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	240	0.113		395	0.186	
Argyle Street	E	→	6	D	3.7	0	0	0	0%	0%	1	2125	4280	2125	0	4280	4280	355	0.167		298	0.140	
Argyle Street	E	→	6	D	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	360	0.167		302	0.140	
Princess Margaret Road	N	↰↑	1	A	3.4	15	0	1	67%	36%	1	1955	4050	1830	1885	3925	3980	336	0.184		486	0.258	
Princess Margaret Road	N	↑	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	384	0.183		539	0.257	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	1	0%	0%	1	1965	4070	1965	1965	4070	4070	239	0.122		410	0.209	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	256	0.122		440	0.209	
Argyle Street	W	←	11	C,D	3.5	0	0	0	0%	0%	1	2105	4180	2105	0	4180	4180	292	0.139	0.139	350	0.166	0.166
Argyle Street	W	←	11	C,D	3.2	0	0	0	0%	0%	1	2075	0	2075	0	0	0	288	0.139		345	0.166	
Argyle Street	W	↰	15	D	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	80	0.044		110	0.061	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	1	0%	0%	1	1965	6175	1965	0	6175	6175	333	0.169		358	0.182	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	356	0.169		384	0.182	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	356	0.169		384	0.182	
Waterloo Road	S	↳	3	A,B	3.4	15	0	0	100%	100%	1	2095	2095	1905	1905	1905	1905	285	0.150		230	0.121	
Waterloo Road	S	↓	3	A,B	3.5	0	0	0	0%	0%	1	2105	2105	2105	2105	2105	2105	370	0.176	0.176	265	0.126	0.126
Waterloo Road	S	↰↓	3	A,B	3.5	0	25	0	100%	100%	1	2105	4210	1985	1985	3945	3945	234	0.118		216	0.109	
Waterloo Road	S	↰	3	A,B	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	231	0.118		214	0.109	

Pedestrian Crossing

7	A	Min. Green Time = 05 Gm + 11 Fm = 16s
8	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
9	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
10	C	Min. Green Time = 05 Gm + 07 Fm = 12s
12	A,B	Min. Green Time = 05 Gm + 09 Fm = 14s
13	C	Min. Green Time = 05 Gm + 07 Fm = 12s
14	C,D	Min. Green Time = 13 Gm + 12 Fm = 25s

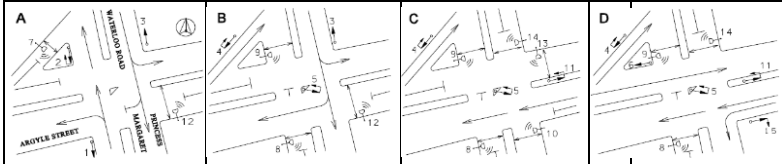
Notes:

Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase		P.M. Check Phase	
εy	0.315	εy	0.292
L (sec)	12	L (sec)	12
C (sec)	130	C (sec)	120
y pract.	0.817	y pract.	0.810
R.C. (%)	160%	R.C. (%)	177%

Stage / Phase Diagrams



I/G=6s I/G=8s

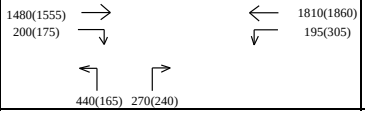
TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(I) Argyle Street / Tin Kwong Road**
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	→	2	A,B	3.0	0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	714	0.373		750	0.392	
Argyle Street	E	→	2	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	766	0.373		805	0.392	
Argyle Street	E	↘	3	B	3.1	0	25	0	100%	100%	1	2065	4120	1950	1950	3860	3860	101	0.052	0.052	88	0.045	0.045
Argyle Street	E	↘	3	B	3.0	0	20	0	100%	100%	1	2055	0	1910	1910	0	0	99	0.052		87	0.045	
Tin Kwong Road	N	↰	4	B,C	3.0	15	0	1	100%	100%	1	1915	1915	1740	1740	1740	1740	440	0.253		165	0.095	
Tin Kwong Road	N	↱	5	C	2.9	0	20	0	100%	100%	1	2045	2045	1900	1900	1900	1900	270	0.142	0.142	240	0.126	0.126
Argyle Street	W	←	1	A,D	3.2	0	0	0	0%	0%	1	2075	6185	2075	2075	6185	6185	607	0.293	0.293	624	0.301	0.301
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	601	0.293		618	0.301	
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	601	0.293		618	0.301	
Argyle Street	N	↙	1	A,D	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	195	0.111		305	0.173	
Pedestrian Crossing			6	A,D	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			7	C	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			8	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			9	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		

Notes:

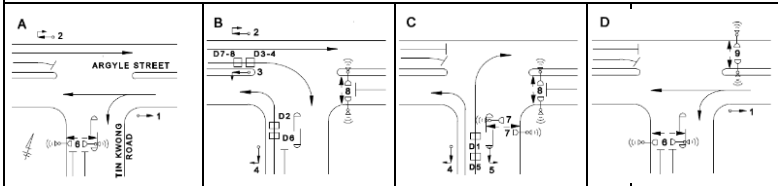
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.487
L (sec)	13
C (sec)	130
y pract.	0.810
R.C. (%)	66%

P.M. Check Phase	
εy	0.472
L (sec)	13
C (sec)	130
y pract.	0.810
R.C. (%)	71%

Stage / Phase Diagrams



I/G = 6s | I/G = 5s | I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(J) Fat Kwong Street / Sheung Shing Street**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E	↑	1	A	3.7	15	0	1	100%	100%	1	1985	1985	1805	1805	1805	1805	370	0.205		355	0.197	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	4190	2095	2095	4190	4190	458	0.218		348	0.166	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	458	0.218	0.218	348	0.166	0.197
Fat Kwong Street	W	↰	3	B	3.9	0	20	0	100%	100%	1	2145	2145	1995	1995	1995	1995	165	0.083		155	0.078	0.078
Fat Kwong Street	W	←	2,3	A,B	3.6	0	0	0	0%	0%	1	2114.4	4083.9	2114.4	2114.4	4083.9	4083.9	280	0.132		437	0.207	
Fat Kwong Street	W	←	2,3	A,B	3.5	0	0	1	0%	0%	1	1969.5	0	1969.5	1969.5	0	0	260	0.132		408	0.207	
Sheung Shing Street	S	↳	3	B	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	160	0.091	0.091	125	0.071	
Sheung Shing Street	S	↲	4	C	2.8	0	20	0	100%	100%	1	2035	2035	1895	1895	1895	1895	195	0.103	0.103	160	0.084	0.084
Pedestrian Crossing			5	A	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			6	C	Min. Green Time = 07 Gm + 10 Fm = 17s																		
			7	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

195(160) 160(125)

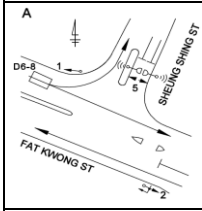
370(355) ↑ ↰ 165(155)

915(695) → ← 540(845)

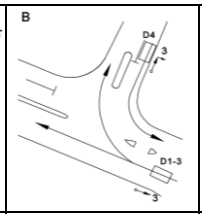
A.M. Check Phase	
εy	0.412
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	93%

P.M. Check Phase	
εy	0.359
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	122%

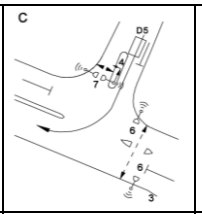
Stage / Phase Diagrams



I/G = 7s



I/G = 5s



I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

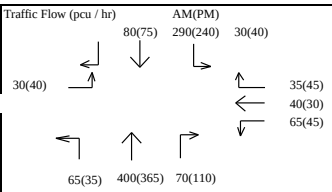
Junction: **(K) Sheung Shing Street / Shek Ku Street / Sheung Shing Lane**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Shek Ku Street	E		4	B	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	150	0.083		40	0.022	
Sheung Shing Street	N		1	A	3.2	15	0	1	16%	23%	1	1935	4030	1905	1890	3940	3925	193	0.102	0.102	171	0.091	0.091
Sheung Shing Street	N		1	A	3.4	0	20	0	39%	41%	1	2095	0	2035	2035	0	0	207	0.102		184	0.090	
Sheung Shing Lane	W		3	C	4.2	15	20	1	6% / 25'	8% / 38'	1	2035	2035	1910	1910	1910	1910	140	0.073	0.073	120	0.063	0.063
Sheung Shing Street	S		2	B	3.7	15	0	1	25%	14%	1	1985	4080	1935	1960	3990	3990	260	0.134	0.134	250	0.128	0.128
Sheung Shing Street	S		2	B	3.4	0	20	0	25%	42%	1	2095	0	2055	2030	0	0	275	0.134		260	0.128	
Pedestrian Crossing			5	D	Min. Green Time = 09 Gm + 09 Fm = 18s																		
			6	D	Min. Green Time = 07 Gm + 13 Fm = 20s																		
			7	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			8	D	Min. Green Time = 08 Gm + 07 Fm = 15s																		

Notes:

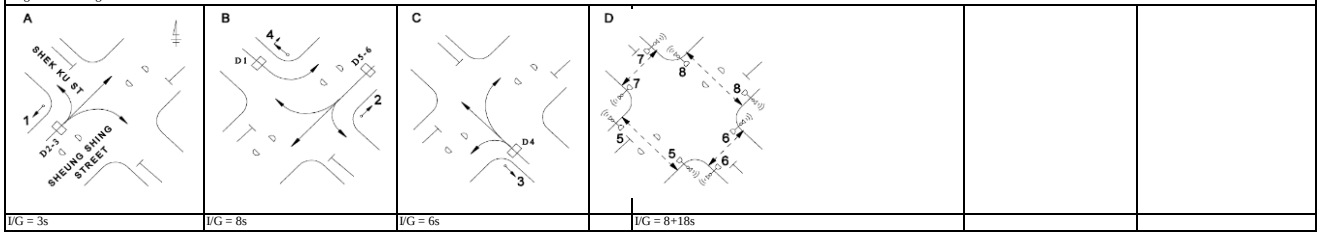
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.309
L (sec)	40
C (sec)	108
y pract.	0.567
R.C. (%)	83%

P.M. Check Phase	
εy	0.281
L (sec)	40
C (sec)	80
y pract.	0.450
R.C. (%)	60%

Stage / Phase Diagrams



A	B	C	D
I/G = 3s	I/G = 8s	I/G = 6s	I/G = 8+18s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(M) Tin Kwong Road / Farm Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	S	↓	1	A	3.0	0	0	1	0%	0%	1	1915	1915	1915	1915	1915	1915	580	0.303	0.303	295	0.154	0.154
Tin Kwong Road	N	↑	2	A	4.0	0	0	1	0%	0%	1	2015	2015	2015	2015	2015	2015	365	0.181		465	0.231	
Farm Road	W	↓	3	B	3.0	15	0	0	100%	100%	0.8	1644	1644	1495	1495	1495	1495	120	0.080	0.080	65	0.043	0.046
	W	↑	3	B	3.0	0	20	0	100%	100%	0.8	1644	1644	1530	1530	1530	1530	100	0.065		70	0.046	
Pedestrian Crossing			4p	C		Min. Crossing Time = 5GM + 11FGM = 16s																	
			5p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	
			6p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	

Notes:

Traffic Flow (pcu / hr) AM(PM)

580(295)

100(70)

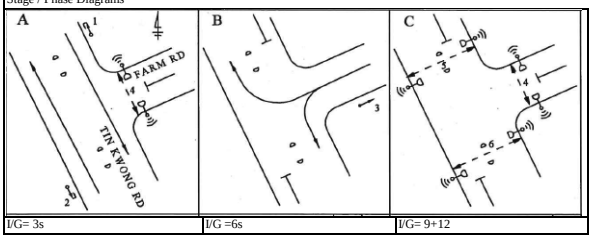
120(65)

365(465)

A.M. Check Phase	
εy	0.383
L (sec)	28
C (sec)	130
y pract.	0.706
R.C. (%)	84%

P.M. Check Phase	
εy	0.200
L (sec)	28
C (sec)	118
y pract.	0.686
R.C. (%)	244%

Stage / Phase Diagrams



I/G= 3s | I/G =6s | I/G= 9+12

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(N) Ma Tau Chung Road / Sung Wong Toi Road / Fu Ning Street**

Description: **2022 Observed Flow**

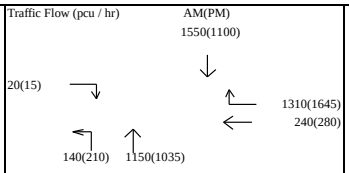
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Fu Ning Street	E		9	D	3.4	0	20	1	100%	100%	1	1955	1955	1820	1820	1820	1820	20	0.011	0.011	15	0.008	0.008
Ma Tau Chung Road	N		1	A	3.4	15	0	1	35%	55%	1	1955	6155	1890	0	6090	6055	400	0.212		381	0.205	
Ma Tau Chung Road	N		1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	446	0.212		433	0.206	
Ma Tau Chung Road	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	444	0.212		431	0.206	
Sung Wong Toi Road	W		5	B	2.8	0	0	1	0%	0%	1	1895	4010	1895	0	4010	4010	113	0.060		132	0.070	
Sung Wong Toi Road	W		5	B	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	127	0.060		148	0.070	
Sung Wong Toi Road	W		4	B,C	3.0	0	30	0	100%	100%	1	2055	6255	1955	1955	5890	5890	435	0.222	0.222	546	0.279	0.279
Sung Wong Toi Road	W		4	B,C	3.4	0	25	0	100%	100%	1	2095	0	1975	1975	0	0	439	0.222		552	0.279	
Sung Wong Toi Road	W		4	B,C	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	436	0.222		547	0.279	
Ma Tau Chung Road	S		2	A	3.5	0	0	1	0%	0%	1	1965	6195	1965	0	6195	6195	492	0.250	0.250	349	0.178	0.206
Ma Tau Chung Road	S		2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	529	0.250		376	0.178	
Ma Tau Chung Road	S		2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	529	0.250		376	0.178	

Pedestrian Crossing

3p	A,D,E	Min. Green Time = 10 Gm + 11 Fm = 21s
6p	B,C	Min. Green Time = 16 Gm + 9 Fm = 25s
7p	A,B,C	Min. Green Time = 12 Gm + 6 Fm = 18s
8p	C,D	Min. Green Time = 20 Gm + 8 Fm = 28s
10p	A,D,E	Min. Green Time = 8 Gm + 16 Fm = 24s

Notes:

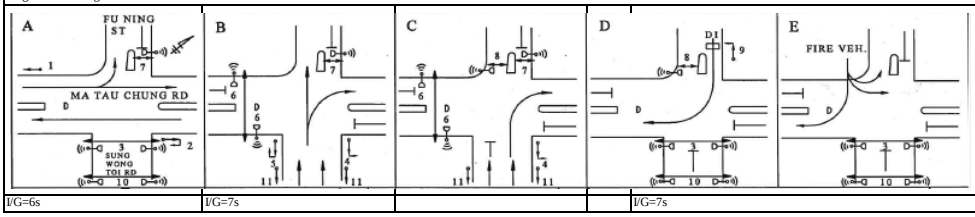
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.484
L (sec)	17
C (sec)	130
y pract.	0.782
R.C. (%)	62%

P.M. Check Phase	
εy	0.493
L (sec)	17
C (sec)	118
y pract.	0.770
R.C. (%)	56%

Stage / Phase Diagrams



I/G=6s | I/G=7s | | I/G=7s |

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(O) Ma Tau Chung Road / Ma Tau Kok Road**

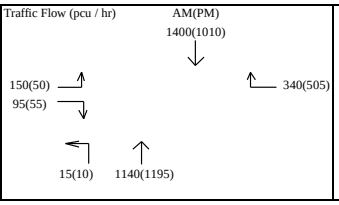
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Ma Tau Kok Road	E		4	C	3.3	15	25	1	100% / 0%	100% / 0%	1	1945	4040	1770	1770	3720	3720	150	0.085	0.085	50	0.028	0.028
Ma Tau Kok Road	E		4	C	3.4	0	20	0	100%	100%	1	2095	0	1950	1950	0	0	95	0.049		55	0.028	
Ma Tau Chung Road*	N		1	A	3.5	15	0	1	7%	4%	0.5	982.5	5162.5	975	980	5155	5160	219	0.224		229	0.233	
Ma Tau Chung Road	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	469	0.224		489	0.234	
Ma Tau Chung Road	N		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	467	0.224		487	0.234	
Ma Tau Kok Road	W		3	B	4.5	0	25	0	100%	100%	1	2205	0	2080	2080	0	0	177	0.085	0.085	263	0.126	0.126
Ma Tau Kok Road	W		3	B	4.5	0	20	1	100%	100%	1	2065	4270	1920	1920	4000	4000	163	0.085		242	0.126	
Ma Tau Chung Road	S		2	A	3.6	0	0	1	0%	0%	0.5	987.5	5207.5	987.5	987.5	5207.5	5207.5	265	0.269	0.269	192	0.194	0.234
Ma Tau Chung Road	S		2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	563	0.269		406	0.194	
Ma Tau Chung Road	S		2	A	3.7	0	0	0	0%	0%	1	2125	0	2125	2125	0	0	571	0.269		412	0.194	
Pedestrian Crossing			5p	B		Min. Green Time = 14 Gm + 11 Fm = 25s																	
			6p	B		Min. Green Time = 20 Gm + 12 Fm = 32s																	
			7p	C,A		Min. Green Time = 7 Gm + 9 Fm = 16s																	

Notes:

*Only franchsied buses are allowed to left turn

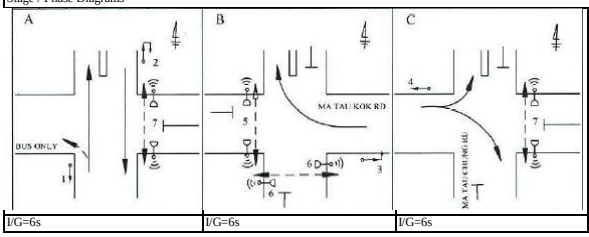
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.439
L (sec)	15
C (sec)	130
y pract.	0.796
R.C. (%)	82%

P.M. Check Phase	
εy	0.388
L (sec)	15
C (sec)	118
y pract.	0.786
R.C. (%)	102%

Stage / Phase Diagrams



I/G=6s I/G=6s I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(P) Ma Tau Wai Road / Farm Road / Tam Kung Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Wai Road	N	↰↑	2	A	3.6	15	0	0	49%	30%	1	2115	6375	2015	0	6275	6315	440	0.218		434	0.211	
Ma Tau Wai Road	N	↑	2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	457	0.218		443	0.211	
Ma Tau Wai Road	N	↑	2	A	4.1	0	0	0	0%	0%	1	2165	0	2165	0	0	0	473	0.218		458	0.211	
Tam Kung Road	S	↓	3	B	3.5	0	0	1	0%	0%	0.5	982.5	3087.5	982.5	0	3087.5	3087.5	59	0.060	0.060	68	0.070	0.070
Tam Kung Road	S	↓	3	B	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	126	0.060		147	0.070	
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	1	0%	0%	1	1975	6215	1975	0	6215	6215	480	0.243	0.243	334	0.169	0.211
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	514	0.243		357	0.169	
Ma Tau Wai Road	S	↓	1	A	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	516	0.243		359	0.169	
Pedestrian Crossing			4p	B,C	Min. Green Time = 12 Gm + 8 Fm = 20s																		
			5p	C	Min. Green Time = 15 Gm + 11 Fm = 26s																		
			6p	A,B	Min. Green Time = 8 Gm + 6 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

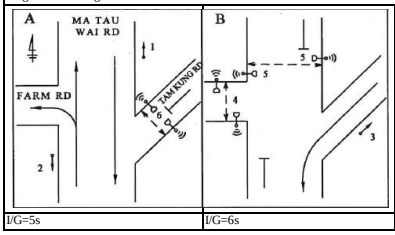
1510(1050) ↓ 185(215) ↙

215(130) ↰ 1155(1205) ↑

A.M. Check Phase	
εy	0.303
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	177%

P.M. Check Phase	
εy	0.281
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	196%

Stage / Phase Diagrams



I/G=5s I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(Q) Shing kai Road/ Sung Wong Toi Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Sung Wong Toi Road	E		2	A	3.7	20.0	0	1	100%	100%	1	1985	6235	1845	1845	5885	5885	190	0.103		90	0.049	
Sung Wong Toi Road	E		2	A	3.7	23.0	31	0	0% / 100%	0% / 100%	1	2125	0	2025	2025	0	0	211	0.104	0.104	133	0.066	0.066
Sung Wong Toi Road	E		2	A	3.7	0.0	28	0	100%	100%	1	2125	0	2015	2015	0	0	209	0.104		132	0.066	
Shing kai Road	N		3	C	3.3	16.0	0	1	100%	100%	1	1945	4030	1780	1780	3865	3865	460	0.258	0.258	420	0.236	0.236
Shing kai Road	N		3	C	3.3	0.0	0	0	0%	0%	1	2085	0	2085	2085	0	0	365	0.175		310	0.149	
Shing kai Road	S		1	B	3.8	0.0	0	1	0%	0%	1	1995	6265	1995	1995	6190	6150	84	0.042	0.042	167	0.084	0.084
Shing kai Road	S		1	B	3.8	0.0	50	0	9%	70%	1	2135	0	2130	2090	0	0	89	0.042		175	0.084	
Shing kai Road	S		1	B	3.8	0.0	45	0	100%	100%	1	2135	0	2065	2065	0	0	87	0.042		173	0.084	
Pedestrian crossing			4p	C		Min. Crossing Time = 35Gm + 7FGm =42s																	
			5p	A,C		Min. Crossing Time = 72Gm + 10FGm =82s																	
			6p	B		Min. Crossing Time = 7Gm + 12FGm =15s																	
			7p	B,C		Min. Crossing Time = 55Gm + 18FGm =73s																	
			8p	A		Min. Crossing Time = 17Gm + 7FGm =24s																	
			9p	A,B		Min. Crossing Time = 50Gm + 6FGm =56s																	

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

95(295) 165(220)

190(90)

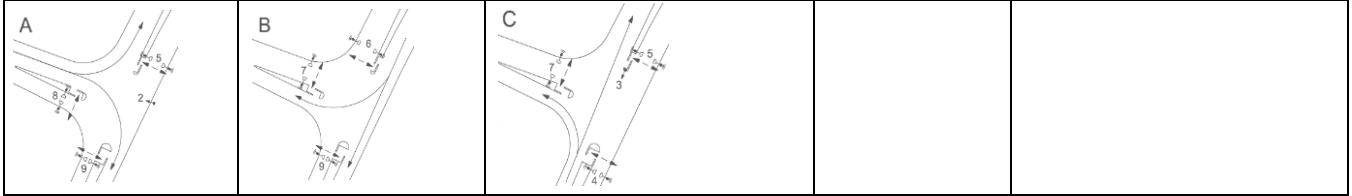
420(265)

460(420) 365(310)

AM Peak Check Phase	
εy	0.404
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	98%

PM Peak Check Phase	
εy	0.385
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	108%

Stage / Phase Diagrams



I/G = 5 I/G = 5 I/G = 5

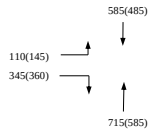
TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(R) Mok Cheong Street / To Kwa Wan Road**
Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Mok Cheong Street	E		2	B	3.5	27.5	18	1	48% / 52%	57% / 43%	1	1965	4070	1835	1840	3665	3670	228	0.124	0.124	253	0.138	0.138
Mok Cheong Street	E		2	B	3.5	0.0	10	0	100%	100%	1	2105	0	1830	1830	0	0	227	0.124		252	0.138	
To Kwa Wan Road	N		1	A	3.5	0.0	0	1	0%	0%	1	1965	4120	1965	1965	4120	4120	341	0.174		279	0.142	0.142
To Kwa Wan Road	N		1	A	4.0	0.0	0	0	0%	0%	1	2155	0	2155	2155	0	0	374	0.174		306	0.142	
To Kwa Wan Road	S		1	A	3.0	0.0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	282	0.147	0.174	234	0.122	
To Kwa Wan Road	S		1	A	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	303	0.147		251	0.122	
Pedestrian crossing		<---->	3p	A		Min. Crossing Time = 29Gm + 11FGm =40s																	

Notes:

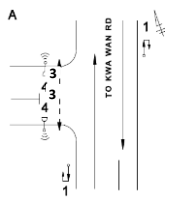
Traffic Flow (pcu / hr) AM(PM) Peak

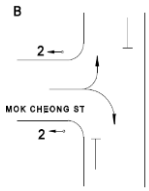


AM Peak Check Phase	
cy	0.298
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	174%

PM Peak Check Phase	
cy	0.280
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	186%

Stage / Phase Diagrams





I/G = 6 I/G = 6

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(S) Ma Tau Kok Road / To Kwa Wan Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	100%	100%	1	1965	6175	1785	1785	5980	5930	319	0.179		318	0.178	
To Kwa Wan Road	N		1	A	3.5	20.0	0	0	10%	42%	1	2105	0	2090	2040	0	0	374	0.179		363	0.178	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	377	0.179		374	0.178	
Ma Tau Kok Road	W		4	C	5.0	0.0	0	0	0%	0%	1	2255	2255	2255	2255	2255	2255	35	0.016	0.036	75	0.033	0.052
Ma Tau Kok Road	W		4	C	4.8	16.0	0	1	100%	100%	0.5	1047.5	1047.5	960	960	960	960	35	0.036		50	0.052	
To Kwa Wan Road	S		2,3	A,B	3.5	25.0	0	1	15%	14%	1	1965	4070	1950	1950	4055	4055	447	0.229	0.229	406	0.208	0.208
To Kwa Wan Road	S		2,3	A,B	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	483	0.229		439	0.208	
Pedestrian crossing			5p	A,B	Min. Crossing Time = 5Gm + 8FGm =11s																		
			6p	B	Min. Crossing Time = 5Gm + 8FGm =11s																		
			7p	C	Min. Crossing Time = 8Gm + 8FGm =16s																		
			8p	C	Min. Crossing Time = 5Gm + 8FGm =11s																		

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

865(790) 65(55)

35(75)

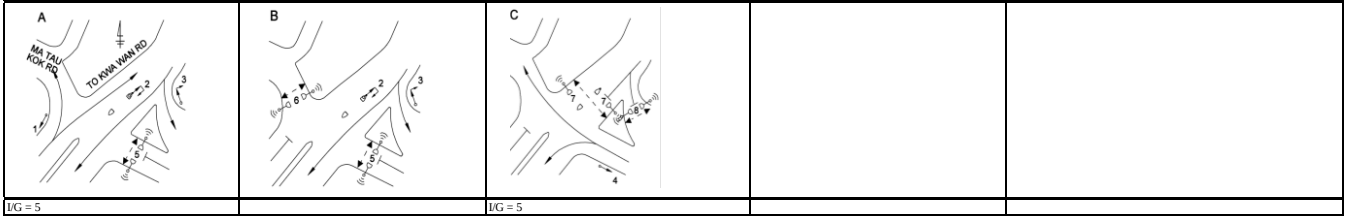
35(50)

355(470) 715(585)

AM Peak Check Phase	
εy	0.266
L (sec)	8
C (sec)	108
y pract.	0.833
R.C. (%)	213%

PM Peak Check Phase	
εy	0.261
L (sec)	8
C (sec)	90
y pract.	0.820
R.C. (%)	215%

Stage / Phase Diagrams



I/G = 5

I/G = 5

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

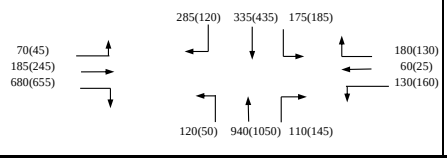
Junction: **(T) San Shan Road / To Kwa Wan Road**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
San Shan Road	E		2	B	3.0	17.5	0	1	27%	16%	1	1915	6005	1870	1890	5765	5785	255	0.136		290	0.153	
San Shan Road	E		2	B	3.0	0.0	32	0	100%	100%	1	2055	0	1965	1965	0	0	343	0.174	0.175	330	0.168	0.168
San Shan Road	E		2	B	2.8	0.0	27	0	100%	100%	1	2035	0	1930	1930	0	0	337	0.175		325	0.168	
To Kwa Wan Road	N		3	C	3.5	15.0	0	1	44%	17%	1	1965	8280	1880	1880	8075	8075	273	0.145		290	0.154	
To Kwa Wan Road	N		3	C	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	305	0.145		325	0.154	
To Kwa Wan Road	N		3	C	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	305	0.145		325	0.154	
To Kwa Wan Road	N		3	C	3.5	0.0	25	0	38%	47%	1	2105	0	1985	1985	0	0	288	0.145	0.145	306	0.154	0.154
San Ma Tau Street	W		4	D	3.5	0.0	31	0	100%	100%	1	2105	0	2010	2010	0	0	134	0.067		115	0.057	
San Ma Tau Street	W		4	D	3.5	16.0	33	0	22% / 34%	65% / 13%	1	2105	0	2030	1975	0	0	135	0.067	0.067	113	0.057	0.057
San Ma Tau Street	W		4	D	3.2	10.0	0	1	100%	100%	0.9	1741.5	5951.5	1515	1515	5555	5500	101	0.067		87	0.057	
To Kwa Wan Road	S		1	A	3.2	25.0	0	1	100%	97%	1	1935	6045	1825	1830	5935	5940	175	0.096		191	0.104	
To Kwa Wan Road	S		1	A	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	168	0.082		215	0.104	
To Kwa Wan Road	S		1	A	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	168	0.082		215	0.104	
To Kwa Wan Road	S		1	A	2.8	0.0	30	0	100%	100%	1	2035	2035	1940	1940	1940	1940	285	0.147	0.147	120	0.062	0.104
Pedestrian crossing			5p	A	Min. Crossing Time = 8Gm + 8FGm =16s																		
			6p	B,C,D	Min. Crossing Time = 8Gm + 10FGm =18s																		
			7p	D	Min. Crossing Time = 5Gm + 7FGm =12s																		
			8p	A,B,C	Min. Crossing Time = 5Gm + 10FGm =15s																		

Notes:

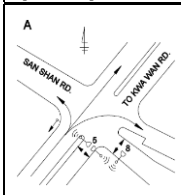
Traffic Flow (pcu / hr) AM(PM) Peak



AM Peak Check Phase	
εy	0.533
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	40%

PM Peak Check Phase	
εy	0.484
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	54%

Stage / Phase Diagrams



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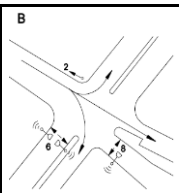

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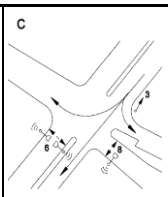

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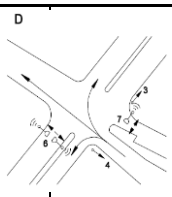


I/G =6

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(U) To Kwa Wan Road / Sheung Heung Road / Kwei Chow Street**

Description: **2022 Observed Flow**

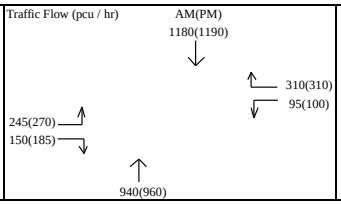
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Sheung Heung Road	E		2	B	3.1	15	0	1	100%	100%	1	1925	3990	1750	0	3670	3670	117	0.067	0.067	129	0.074	0.074
Sheung Heung Road	E		2	B	3.1	20	0	0	100%	100%	1	2065	0	1920	0	0	0	128	0.067		141	0.074	
Sheung Heung Road	E		2	B	3.2	0	25	0	100%	100%	1	2075	4160	1960	0	3900	3900	75	0.038		93	0.047	
Sheung Heung Road	E		2	B	3.3	0	20	0	100%	100%	1	2085	0	1940	0	0	0	75	0.038		92	0.047	
To Kwa Wan Road	N		1	A	3.5	0	0	1	0%	0%	0.5	982.5	5142.5	982.5	0	5142.5	5142.5	180	0.183		183	0.187	
To Kwa Wan Road	N		1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	387	0.183		395	0.187	
To Kwa Wan Road	N		1	A	2.9	0	0	0	0%	0%	1	2045	0	2045	0	0	0	374	0.183	0.228	382	0.187	
Kwei Chow Street	W		3	C	3.0	0	20	0	100%	100%	1	2055	0	1940	0	0	0	103	0.053	0.053	105	0.054	0.054
Kwei Chow Street	W		3	C	3.0	0	25	0	100%	100%	1	2055	0	1940	0	0	0	103	0.053		105	0.054	
Kwei Chow Street	W		3	C	3.0	20	30	0	1% / 99%	4% / 96%	1	2055	0	1955	0	0	0	104	0.053		105	0.054	
Kwei Chow Street	W		3	C	3.4	15	0	1	100%	100%	1	1955	6065	1775	0	7610	7610	94	0.053		96	0.054	
To Kwa Wan Road	S		1	A	3.0	0	0	1	0%	0%	0.5	957.5	5177.5	957.5	0	5177.5	5177.5	218	0.228		220	0.230	0.230
To Kwa Wan Road	S		1	A	3.8	0	0	0	0%	0%	1	2135	0	2135	0	0	0	487	0.228		491	0.230	
To Kwa Wan Road	S		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	0	0	0	475	0.228		479	0.230	

Pedestrian Crossing

4	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s
5	C,A	Min. Green Time = 05 Gm + 10 Fm = 15s
6	B	Min. Green Time = 05 Gm + 10 Fm = 15s
7	C	Min. Green Time = 05 Gm + 08 Fm = 13s

Notes:

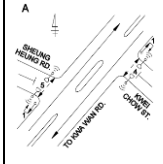
Traffic Flow (pcu / hr) AM(PM)

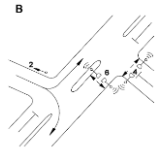


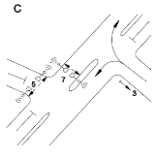
A.M. Check Phase	
εy	0.348
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	111%

P.M. Check Phase	
εy	0.357
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	105%

Stage / Phase Diagrams







I/G= 7s | I/G= 8s | I/G= 8s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(V) Chatham Road North / San Lau Street**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Chatham Road North	N		1	A	4.0	15	0	1	3%	6%	1	2015	4170	2010	2000	4165	4155	347	0.173		390	0.195	
Chatham Road North	N		1	A	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	373	0.173		420	0.195	
San Lau Street	W		3	B	2.7	0	20	0	100%	100%	1	2025	0	1885	0	0	0	153	0.081	0.081	222	0.118	0.118
San Lau Street	W		3	B	3.5	0	25	0	100%	100%	1	2105	0	1985	0	0	0	162	0.081		233	0.118	
San Lau Street	W		3	B	4.2	0	0	1	0%	0%	1	2035	6165	2035	0	5905	5905	160	0.079		155	0.076	
Chatham Road North	S		2	A	4.7	0	0	1	0%	0%	1	2085	4260	2085	0	4260	4260	695	0.333	0.333	590	0.283	0.283
Chatham Road North	S		2	A	4.2	0	0	0	0%	0%	1	2175	0	2175	0	0	0	725	0.333		615	0.283	
Pedestrian Crossing			4	A	Min. Green Time = 12 Gm + 10 Fm = 22s																		
			5	B	Min. Green Time = 06 Gm + 08 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

1420(1205)

315(455)

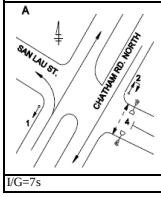
160(155)

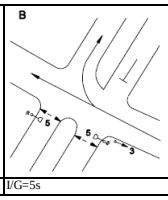
10(25) 710(785)

A.M. Check Phase	
εy	0.415
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	93%

P.M. Check Phase	
εy	0.400
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	104%

Stage / Phase Diagrams





I/G=7s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

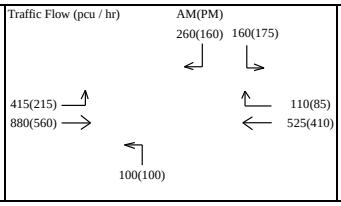
Junction: **(W) Fat Kwong Street / Shun Yung Street / Yan Fung Street**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E		2	A	3.1	15	0	1	100%	100%	1	1925	1925	1750	1750	1750	1750	415	0.237		215	0.123	0.135
Fat Kwong Street	E		2	A	3.2	0	0	0	0%	0%	1	2075	4160	2075	2075	4160	4160	439	0.212		279	0.135	
Fat Kwong Street	E		2	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	441	0.212	0.237	281	0.135	
Yan Fung Street	N		3	A	4.2	15	0	1	100%	100%	1	2035	2035	1850	1850	1850	1850	100	0.054		100	0.054	
Fat Kwong Street	W		1	B	3.1	0	20	0	52%	51%	1	2065	0	1990	1990	0	0	212	0.107	0.107	165	0.083	0.083
Fat Kwong Street	W		1	B	3.0	0	0	0	0%	0%	1	2055	0	2055	0	0	0	219	0.107		171	0.083	
Fat Kwong Street	W		1	B	2.9	0	0	1	0%	0%	1	1905	6025	1905	1905	5950	5950	203	0.107		159	0.083	
Shun Yung Street	S		4	C	3.2	15	0	1	100%	100%	1	1935	4000	1760	1760	3680	3680	160	0.091		160	0.091	
Shun Yung Street	S		4	C	3.1	20	20	0	0% / 100%	8% / 92%	1	2065	0	1920	1920	0	0	260	0.135	0.135	175	0.091	0.091
Pedestrian Crossing			5	B,C	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			6	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			7	B	Min. Green Time = 06 Gm + 11 Fm = 17s																		
			8	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			9	C,A	Min. Green Time = 05 Gm + 08 Fm = 13s																		

Notes:

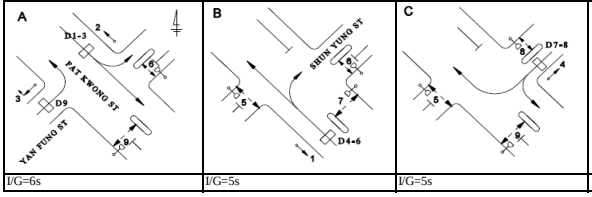
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.479
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	65%

P.M. Check Phase	
εy	0.309
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	156%

Stage / Phase Diagrams



I/G=6s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

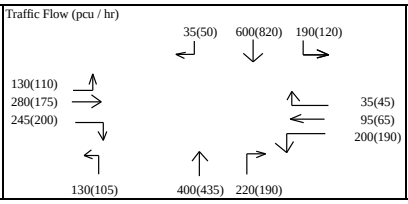
Junction: **(X) Hung Hom Road/ Fat Kwong Street Flyover/ Tai Wan Road East**

Description: **2022 Observed Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Fat Kwong Street Flyover	E		3	A	3.5	10	0	1	32%	39%	1	1965	1965	1875	1855	1875	1855	410	0.219	0.219	285	0.154	0.154
	E		3	A	3.3	0	19	0	100%	100%	1	2085	2085	1930	1930	1930	1930	275	0.142		210	0.109	
Hung Hom Road	N		1	B	3.4	8	0	1	100%	100%	1	1955	1955	1630	1630	1630	1630	130	0.080		105	0.064	
	N		1	B	3.4	0	0	0	0%	0%	1	1955	4050	1955	1955	4050	4050	229	0.117		196	0.100	
	N		1	B	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	246	0.117	0.117	210	0.100	
	N		1	B	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	220	0.114		190	0.098	0.100
Tai Wan Road East	W		4	C	4.0	0	12.5	0	27%	41%	1	2155	2155	2090	2055	2090	2055	130	0.062	0.114	110	0.054	0.108
	W		4	C	3.5	13	0	1	100%	100%	1	1965	1965	1755	1755	1755	1755	200	0.114		190	0.108	
Hung Hom Road	S		2	D	3.5	15	0	1	49%	25%	1	1965	4070	1875	1915	3965	4000	390	0.208	0.208	474	0.248	0.248
	S		2	D	3.5	0	15	0	8%	10%	1	2105	0	2090	2085	0	0	435	0.208		516	0.247	
Pedestrian crossing			5P	A,B,D	Min. Crossing Time = 6GM + 7FGM = 13s															*			*
			6P	C	Min. Crossing Time = 5GM + 6FGM = 11s																		
			7P	A,B,C	Min. Crossing Time = 5GM + 7FGM = 12s																		
			8P	D	Min. Crossing Time = 5GM + 9FGM = 14s																		
			9P	B,C,D	Min. Crossing Time = 5GM + 7FGM = 12s																		
			10P	A	Min. Crossing Time = 5GM + 9FGM = 14s																		

Notes:

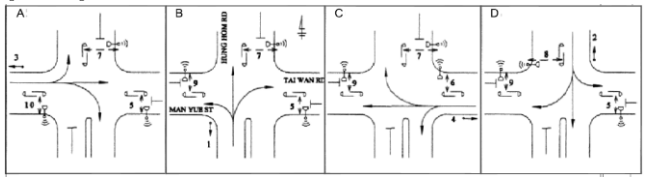
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.658
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	18%

P.M. Check Phase	
εy	0.610
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	27%

Stage/ Phase Diagram:



I/G= 5s I/G=7s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

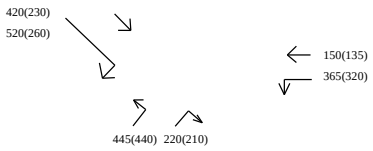
Junction: **(A) Tin Kwong Road / Sheung Shing Street**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	SE	↘	2,3	A,B	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	365	0.184		320	0.161	
	SE	↘	3	B	3.5	0	10	0	100%	100%	1	2105	2105	1830	1830	1830	1830	150	0.082	0.082	135	0.074	0.074
Sheung Shing Street	NE	↗↘	4	C	3.2	10	18	1	)5% / 5	00% / 0	1	1935	4010	1690	1685	3575	3570	444	0.263	0.263	231	0.137	0.137
	NE	↗	4	C	3.2	0	15	0	100%	100%	1	2075	0	1885	1885	0	0	496	0.263		259	0.137	
Tin Kwong Road	W	↙	1	A	3.4	10	0	1	100%	100%	1	1955	1955	1700	1700	1700	1700	220	0.129	0.212	210	0.124	0.210
	W	←	1	A	3.4	0	0	0	0%	0%	1	2095	2095	2095	2095	2095	2095	445	0.212		440	0.210	
Pedestrian crossing		↕	5p	B		Min. Crossing Time = 10GM + 5FGM = 15s																	
		↕	6p	C		Min. Crossing Time = 6GM + 6FGM = 12s																	
		⇕	7p	C		Min. Crossing Time = 11GM + 5FGM = 16s																	
		⇕	8p	A,B		Min. Crossing Time = 6GM + 6FGM = 12s																	

Notes:

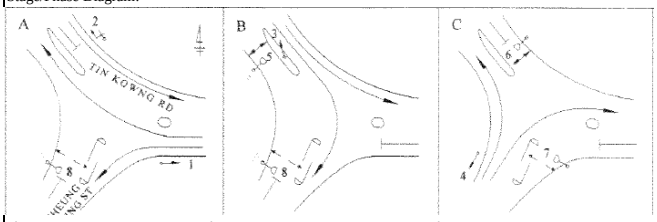
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.557
L (sec)	14
C (sec)	130
y pract.	0.803
R.C. (%)	44%

P.M. Check Phase	
εy	0.421
L (sec)	14
C (sec)	118
y pract.	0.793
R.C. (%)	88%

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

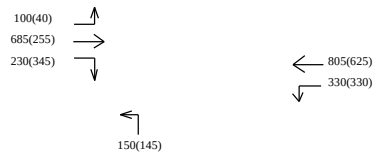
Junction: **(B) Tin Kwong Road / Kau Pui Lung Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	E		1	A,B,C	2.8	8	0	1	13%	14%	0.8	1516	1516	1480	1475	1480	1475	785	0.530		295	0.200	
	E		2	B	2.8	0	12.5	0	100%	100%	1	2035	2035	1815	1815	1815	1815	230	0.127	0.127	345	0.190	0.190
Kau Pui Lung Road	N		3	C	4.6	25	0	1	100%	100%	0.7	1453	1453	1370	1370	1370	1370	150	0.109		145	0.106	
Tin Kwong Road	W		5	A	3.0	0	0	0	0%	0%	1	2055	2055	2055	2055	2055	2055	805	0.392	0.392	625	0.304	0.304
	W		4	C	3.0	5	0	1	100%	100%	1	1915	1915	1475	1475	1475	1475	330	0.224	0.224	330	0.224	0.224
Pedestrian crossing			6p	A		Min. Crossing Time = 8GM + 8FGM = 16s																	

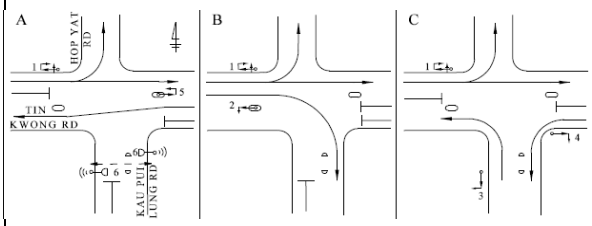
Notes:

Traffic Flow (pcu / hr)



A.M. Check Phase		P.M. Check Phase	
εy	0.742	εy	0.718
L (sec)	16	L (sec)	16
C (sec)	130	C (sec)	118
y pract.	0.789	y pract.	0.778
R.C. (%)	**6%**	R.C. (%)	**8%**

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

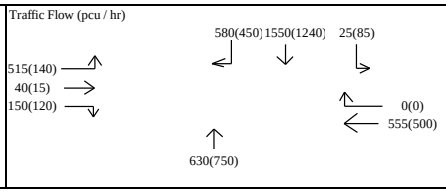
Junction: **(C) Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road**
Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	E		2	B,C	2.9	10	0	1	100%	100%	1	1905	1905	1655	1655	1655	1655	515	0.311		140	0.085	
	E		2	C	2.9	0	15	0	79%	89%	1	2045	2045	1895	1880	1895	1880	190	0.100	0.100	135	0.072	0.072
Ma Tau Wai Road	N		5	A	3.4	0	0	1	0%	0%	1	1955	6105	1955	1955	6105	6105	202	0.103	0.103	240	0.123	0.123
	N		5	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	216	0.103		257	0.123	
	N		5	A	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	212	0.103		252	0.123	
Ma Hang Chung Road	W		6	D	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	0	0.000		0	0.000	
	W		6	D	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	555	0.280	0.280	500	0.252	0.252
Ma Tau Wai Road	S		3	A,B	3.0	8	0	1	5%	21%	1	1915	6025	1895	1840	6005	5950	497	0.262		410	0.223	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		3	B	3.0	0	15	0	100%	100%	1	2055	2055	1870	1870	1870	1870	580	0.310	0.310	450	0.241	0.241

Pedestrian crossing		
	7p	Min. Crossing Time = 14GM + 13FGM = 27s
	8p	Min. Crossing Time = 6GM + 12FGM = 18s
	9p	Min. Crossing Time = 5M + 9FGM = 14s
	10p	Min. Crossing Time = 13GM + 10FGM = 23s
	11p	Min. Crossing Time = 19GM + 7FGM = 26s

Notes:

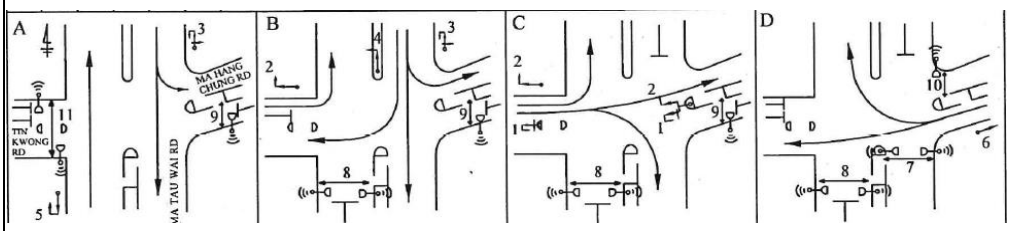
Traffic Flow (pcu / hr)



A.M. Check Phase	
cy	0.793
L (sec)	24
C (sec)	130
y pract.	0.734
R.C. (%)	**-7%**

P.M. Check Phase	
cy	0.687
L (sec)	24
C (sec)	120
y pract.	0.720
R.C. (%)	**5%**

Stage/Phase Diagram:



I/G=12s I/G=6s I/G=5s I/G=5s

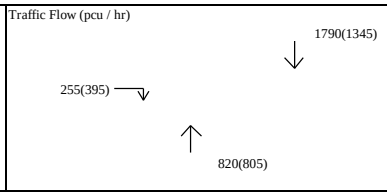
TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(E) Ma Tau Wai Road / Lok Shan Road**
Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Lok Shan Road	E	→	3	B	3.5	0	15	1	100%	100%	1	1965	1965	1785	1785	1785	1785	255	0.143	0.143	395	0.221	0.221
Ma Tau Wai Road	N	↑	1	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	261	0.133		256	0.130	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	280	0.133		274	0.130	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	280	0.133		274	0.130	
											#N/A												
Ma Tau Wai Road	S	↓	2	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	570	0.290	0.290	428	0.218	0.218
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	610	0.290		458	0.218	
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	610	0.290		458	0.218	
Pedestrian crossing		↕	4p	B		Min. Crossing Time = 9GM + 10FGM = 19s																	
			5p	A		Min. Crossing Time = 6GM + 4FGM = 9s																	

Notes:

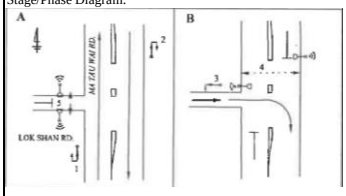
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.433
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	**94%**

P.M. Check Phase	
εy	0.439
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	**90%**

Stage/Phase Diagram:



I/G=6s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(G) Ma Tau Wai Road / Chi Kiang Street**
Description: **2036 Reference Flow**

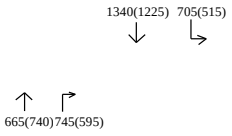
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Ma Tau Wai Road	N	↑	1	A,B	3.5	0	0	1	0%	0%	1	1825	3930	1825	1825	3930	3930	309	0.169		344	0.188	
	N	↑	1	A,B	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	356	0.169		396	0.188	
	N	↱	2	A	5.4	0	20	0	100%	100%	1	2295	4590	2135	2135	4220	4220	377	0.177	0.177	301	0.141	0.141
	N	↱	2	A	5.4	0	15	0	100%	100%	1	2295	0	2085	2085	0	0	368	0.177		294	0.141	
Ma Tau Wai Road	S	↳	3	C	3.3	18	0	1	100%	100%	1	1945	6115	1790	1790	5960	5960	616	0.344	0.344	515	0.288	0.288
	S	↓↳	3	C	3.3	20	0	0	0%	0%	1	2085	0	2085	2085	0	0	711	0.341		613	0.294	
	S	↓	3	C	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	718	0.344		613	0.294	

Pedestrian crossing	↔	4p	A,B
	↕	5p	B
	↔	6p	C

Min. Crossing Time = 6GM + 11FGM = 17s
Min. Crossing Time = 5GM + 13FGM = 18s
Min. Crossing Time = 5GM + 8FGM = 13s

Notes:

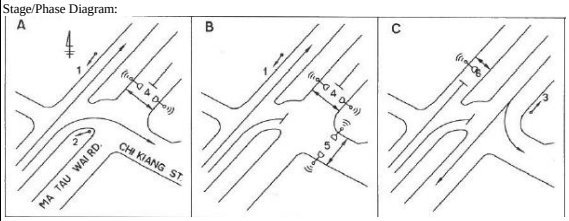
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.521
L (sec)	34
C (sec)	130
y pract.	0.665
R.C. (%)	**28%**

P.M. Check Phase	
εy	0.429
L (sec)	30
C (sec)	120
y pract.	0.675
R.C. (%)	**57%**

Stage/Phase Diagram:



I/G=6s I/G=9+18s I/G=3s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(H) Argyle Street / Waterloo Road / Princess Margaret Road**
Description: **2036 Reference Flow**

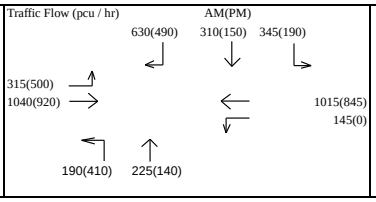
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	4250	2125	0	4250	4250	158	0.074		250	0.118	
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	158	0.074		250	0.118	
Argyle Street	E	→	6	D	3.7	0	0	0	0%	0%	1	2125	4280	2125	0	4280	4280	516	0.243		457	0.215	
Argyle Street	E	→	6	D	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	524	0.243		463	0.215	
Princess Margaret Road	N	↰↑	1	A	3.4	15	0	1	100%	100%	1	1955	4050	1780	1775	3875	3870	190	0.107		410	0.231	
Princess Margaret Road	N	↑	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	225	0.107		140	0.067	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	1	0%	0%	1	1965	4070	1965	1965	4070	4070	109	0.055		68	0.034	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	116	0.055		72	0.034	
Argyle Street	W	←	11	C,D	3.5	0	0	0	0%	0%	1	2105	4180	2105	0	4180	4180	511	0.243	0.243	426	0.202	0.202
Argyle Street	W	←	11	C,D	3.2	0	0	0	0%	0%	1	2075	0	2075	0	0	0	504	0.243		419	0.202	
Argyle Street	W	↰	15	D	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	145	0.080		0	0.000	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	1	0%	0%	1	1965	6175	1965	0	6175	6175	523	0.266		425	0.216	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	561	0.266		455	0.216	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	561	0.266		455	0.216	
Waterloo Road	S	↳	3	A,B	3.4	15	0	0	100%	100%	1	2095	2095	1905	1905	1905	1905	345	0.181		190	0.100	
Waterloo Road	S	↓	3	A,B	3.5	0	0	0	0%	0%	1	2105	2105	2105	2105	2105	2105	310	0.147	0.181	150	0.071	0.124
Waterloo Road	S	↲	3	A,B	3.5	0	25	0	100%	100%	1	2105	4210	1985	1985	3945	3945	317	0.160		247	0.124	
Waterloo Road	S	↲	3	A,B	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	313	0.160		243	0.124	

Pedestrian Crossing

7	A	Min. Green Time = 05 Gm + 11 Fm = 16s
8	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
9	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
10	C	Min. Green Time = 05 Gm + 07 Fm = 12s
12	A,B	Min. Green Time = 05 Gm + 09 Fm = 14s
13	C	Min. Green Time = 05 Gm + 07 Fm = 12s
14	C,D	Min. Green Time = 13 Gm + 12 Fm = 25s

Notes:

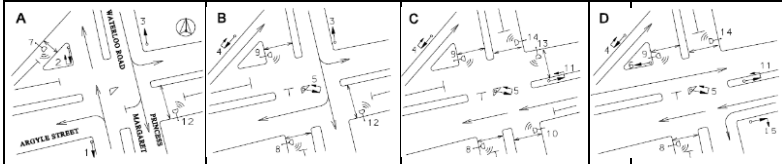
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.424
L (sec)	12
C (sec)	130
y pract.	0.817
R.C. (%)	93%

P.M. Check Phase	
εy	0.326
L (sec)	12
C (sec)	120
y pract.	0.810
R.C. (%)	148%

Stage / Phase Diagrams



I/G=6s I/G=8s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

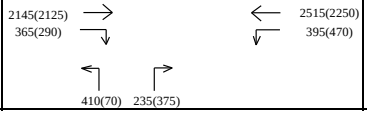
Junction: **(I) Argyle Street / Tin Kwong Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	→	2	A,B	3.0	0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	1035	0.540		1025	0.535	
Argyle Street	E	→	2	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	1110	0.540		1100	0.535	
Argyle Street	E	↘	3	B	3.1	0	25	0	100%	100%	1	2065	4120	1950	1950	3860	3860	184	0.095	0.095	147	0.075	0.075
Argyle Street	E	↘	3	B	3.0	0	20	0	100%	100%	1	2055	0	1910	1910	0	0	181	0.095		143	0.075	
Tin Kwong Road	N	↰	4	B,C	3.0	15	0	1	100%	100%	1	1915	1915	1740	1740	1740	1740	410	0.236		70	0.040	
Tin Kwong Road	N	↱	5	C	2.9	0	20	0	100%	100%	1	2045	2045	1900	1900	1900	1900	235	0.124	0.124	375	0.197	0.197
Argyle Street	W	←	1	A,D	3.2	0	0	0	0%	0%	1	2075	6185	2075	2075	6185	6185	844	0.407	0.407	755	0.364	0.364
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	836	0.407		748	0.364	
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	836	0.407		748	0.364	
Argyle Street	N	↙	1	A,D	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	395	0.224		470	0.267	
Pedestrian Crossing			6	A,D	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			7	C	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			8	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			9	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		

Notes:

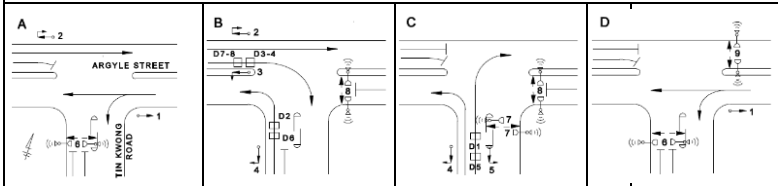
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.625
L (sec)	13
C (sec)	130
y pract.	0.810
R.C. (%)	30%

P.M. Check Phase	
εy	0.636
L (sec)	13
C (sec)	130
y pract.	0.810
R.C. (%)	27%

Stage / Phase Diagrams



I/G = 6s I/G = 5s I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(J) Fat Kwong Street / Sheung Shing Street**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E	↑	1	A	3.7	15	0	1	100%	100%	1	1985	1985	1805	1805	1805	1805	665	0.368		195	0.108	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	4190	2095	2095	4190	4190	615	0.294		385	0.184	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	615	0.294	0.368	385	0.184	0.184
Fat Kwong Street	W	↰	3	B	3.9	0	20	0	100%	100%	1	2145	2145	1995	1995	1995	1995	90	0.045		75	0.038	0.045
Fat Kwong Street	W	←	2,3	A,B	3.6	0	0	0	0%	0%	1	2114.4	4083.9	2114.4	2114.4	4083.9	4083.9	489	0.231		487	0.230	
Fat Kwong Street	W	←	2,3	A,B	3.5	0	0	1	0%	0%	1	1969.5	0	1969.5	1969.5	0	0	456	0.231		453	0.230	
Sheung Shing Street	S	↳	3	B	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	85	0.048	0.048	80	0.045	
Sheung Shing Street	S	↲	4	C	2.8	0	20	0	100%	100%	1	2035	2035	1895	1895	1895	1895	255	0.135	0.135	160	0.084	0.084
Pedestrian Crossing			5	A	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			6	C	Min. Green Time = 07 Gm + 10 Fm = 17s																		
			7	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

255(160) 85(80)

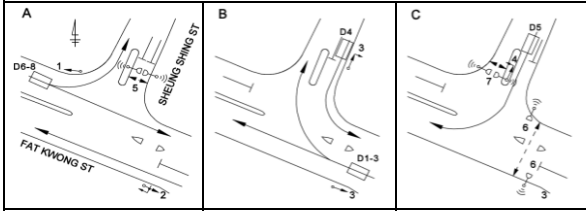
665(195) ↑ ↰ 90(75)

1230(770) → ← 945(940)

A.M. Check Phase	
εy	0.551
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	44%

P.M. Check Phase	
εy	0.314
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	153%

Stage / Phase Diagrams



I/G = 7s I/G = 5s I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

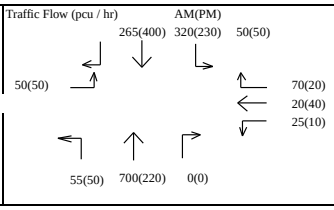
Junction: **(K) Sheung Shing Street / Shek Ku Street / Sheung Shing Lane**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Shek Ku Street	E		4	B	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	310	0.171		210	0.116	
Sheung Shing Street	N		1	A	3.2	15	0	1	16%	18%	1	1935	4030	1905	1900	3880	3850	312	0.164	0.164	280	0.147	0.147
Sheung Shing Street	N		1	A	3.4	0	20	0	82%	100%	1	2095	0	1975	1950	0	0	323	0.164		400	0.205	
Sheung Shing Lane	W		3	C	4.2	15	20	1	2% / 61	4% / 29	1	2035	2035	1905	1965	1905	1965	115	0.060	0.060	70	0.036	0.036
Sheung Shing Street	S		2	B	3.7	15	0	1	15%	39%	1	1985	4080	1955	1910	4050	4005	364	0.186	0.186	129	0.067	0.067
Sheung Shing Street	S		2	B	3.4	0	20	0	0%	0%	1	2095	0	2095	2095	0	0	391	0.186		141	0.067	
Pedestrian Crossing			5	D	Min. Green Time = 09 Gm + 09 Fm = 18s																		
			6	D	Min. Green Time = 07 Gm + 13 Fm = 20s																		
			7	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			8	D	Min. Green Time = 08 Gm + 07 Fm = 15s																		

Notes:

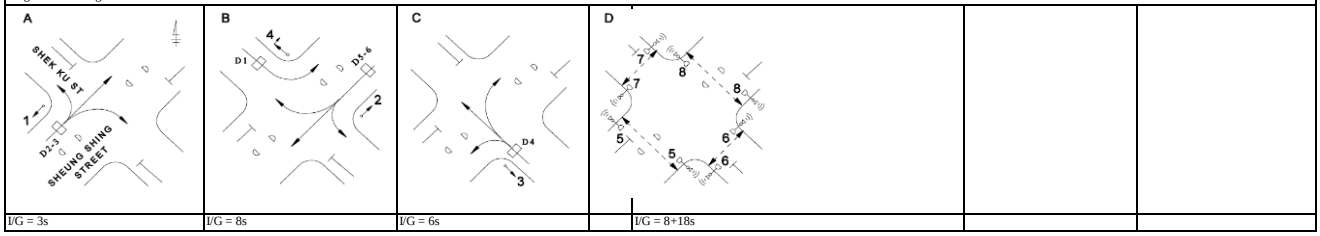
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.411
L (sec)	40
C (sec)	108
y pract.	0.567
R.C. (%)	38%

P.M. Check Phase	
εy	0.250
L (sec)	40
C (sec)	80
y pract.	0.450
R.C. (%)	80%

Stage / Phase Diagrams



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(M) Tin Kwong Road / Farm Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	S	↓	1	A	3.0	0	0	1	0%	0%	1	1915	1915	1915	1915	1915	1915	645	0.337	0.337	440	0.230	0.230
Tin Kwong Road	N	↑	2	A	4.0	0	0	1	0%	0%	1	2015	2015	2015	2015	2015	2015	520	0.258		455	0.226	
Farm Road	W	↓	3	B	3.0	15	0	0	100%	100%	0.8	1644	1644	1495	1495	1495	1495	140	0.094	0.094	75	0.050	0.052
	W	↑	3	B	3.0	0	20	0	100%	100%	0.8	1644	1644	1530	1530	1530	1530	115	0.075		80	0.052	
Pedestrian Crossing			4p	C		Min. Crossing Time = 5GM + 11FGM = 16s																	
			5p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	
			6p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	

Notes:

Traffic Flow (pcu / hr) AM(PM)

645(440) ↓

115(80) ↑

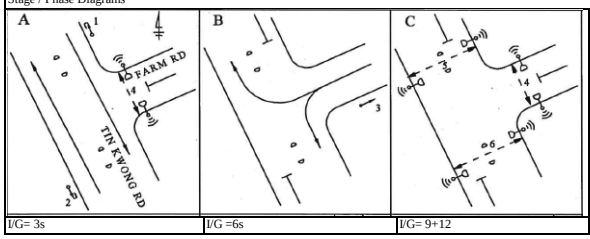
140(75) ↓

520(455) ↑

A.M. Check Phase	
εy	0.430
L (sec)	28
C (sec)	130
y pract.	0.706
R.C. (%)	64%

P.M. Check Phase	
εy	0.282
L (sec)	28
C (sec)	118
y pract.	0.686
R.C. (%)	143%

Stage / Phase Diagrams



I/G= 3s | I/G =6s | I/G= 9+12

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(N) Ma Tau Chung Road / Sung Wong Toi Road / Fu Ning Street**

Description: **2036 Reference Flow**

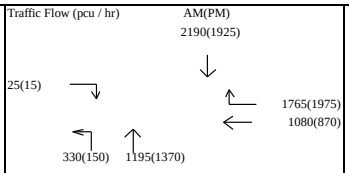
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fu Ning Street	E		9	D	3.4	0	20	1	100%	100%	1	1955	1955	1820	1820	1820	1820	25	0.014	0.014	15	0.008	0.008
Ma Tau Chung Road	N		1	A	3.4	15	0	1	71%	32%	1	1955	6155	1825	0	6025	6095	462	0.253		473	0.249	
Ma Tau Chung Road	N		1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	533	0.253		525	0.249	
Ma Tau Chung Road	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	530	0.253		522	0.249	
Sung Wong Toi Road	W		5	B	2.8	0	0	1	0%	0%	1	1895	4010	1895	0	4010	4010	510	0.269		411	0.217	
Sung Wong Toi Road	W		5	B	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	570	0.269		459	0.217	
Sung Wong Toi Road	W		4	B,C	3.0	0	30	0	100%	100%	1	2055	6255	1955	1955	5890	5890	586	0.300	0.300	656	0.335	0.335
Sung Wong Toi Road	W		4	B,C	3.4	0	25	0	100%	100%	1	2095	0	1975	1975	0	0	592	0.300		662	0.335	
Sung Wong Toi Road	W		4	B,C	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	587	0.300		657	0.335	
Ma Tau Chung Road	S		2	A	3.5	0	0	1	0%	0%	1	1965	6195	1965	0	6195	6195	695	0.354	0.354	611	0.311	0.311
Ma Tau Chung Road	S		2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	748	0.354		657	0.311	
Ma Tau Chung Road	S		2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	748	0.354		657	0.311	

Pedestrian Crossing

3p	A,D,E	Min. Green Time = 10 Gm + 11 Fm = 21s
6p	B,C	Min. Green Time = 16 Gm + 9 Fm = 25s
7p	A,B,C	Min. Green Time = 12 Gm + 6 Fm = 18s
8p	C,D	Min. Green Time = 20 Gm + 8 Fm = 28s
10p	A,D,E	Min. Green Time = 8 Gm + 16 Fm = 24s

Notes:

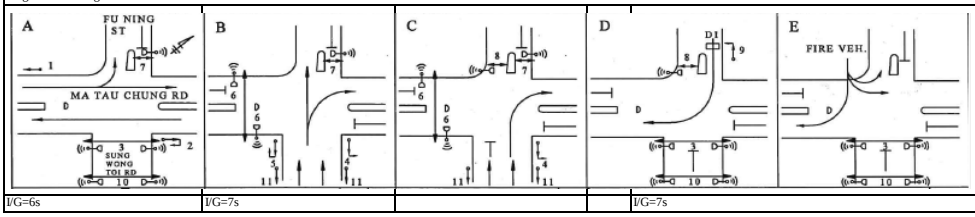
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.667
L (sec)	17
C (sec)	130
y pract.	0.782
R.C. (%)	17%

P.M. Check Phase	
εy	0.654
L (sec)	17
C (sec)	118
y pract.	0.770
R.C. (%)	18%

Stage / Phase Diagrams



I/G=6s | I/G=7s | | I/G=7s |

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(O) Ma Tau Chung Road / Ma Tau Kok Road**

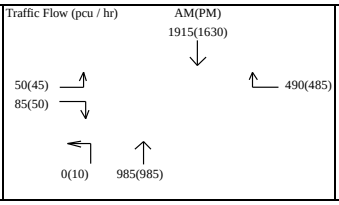
Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Kok Road	E		4	C	3.3	15	25	1	78% / 22%	100% / 0%	1	1945	4040	1785	1770	3735	3720	64	0.036	0.036	45	0.026	0.026
Ma Tau Kok Road	E		4	C	3.4	0	20	0	100%	100%	1	2095	0	1950	1950	0	0	71	0.036		50	0.026	
Ma Tau Chung Road*	N		1	A	3.5	15	0	1	0%	5%	0.5	982.5	5162.5	985	975	5165	5155	187	0.190		189	0.193	
Ma Tau Chung Road	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	400	0.191		404	0.193	
Ma Tau Chung Road	N		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	398	0.191		402	0.193	
Ma Tau Kok Road	W		3	B	4.5	0	25	0	100%	100%	1	2205	0	2080	2080	0	0	255	0.123	0.123	252	0.121	0.121
Ma Tau Kok Road	W		3	B	4.5	0	20	1	100%	100%	1	2065	4270	1920	1920	4000	4000	235	0.123		233	0.121	
Ma Tau Chung Road	S		2	A	3.6	0	0	1	0%	0%	0.5	987.5	5207.5	987.5	987.5	5207.5	5207.5	363	0.368	0.368	309	0.313	0.313
Ma Tau Chung Road	S		2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	770	0.368		656	0.313	
Ma Tau Chung Road	S		2	A	3.7	0	0	0	0%	0%	1	2125	0	2125	2125	0	0	781	0.368		665	0.313	
Pedestrian Crossing			5p	B		Min. Green Time = 14 Gm + 11 Fm = 25s																	
			6p	B		Min. Green Time = 20 Gm + 12 Fm = 32s																	
			7p	C,A		Min. Green Time = 7 Gm + 9 Fm = 16s																	

Notes:

*Only franchsied buses are allowed to left turn

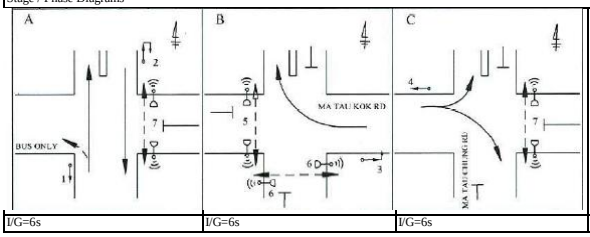
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.526
L (sec)	15
C (sec)	130
y pract.	0.796
R.C. (%)	51%

P.M. Check Phase	
εy	0.460
L (sec)	15
C (sec)	118
y pract.	0.786
R.C. (%)	71%

Stage / Phase Diagrams



I/G=6s | I/G=6s | I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(P) Ma Tau Wai Road / Farm Road / Tam Kung Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Wai Road	N	↰↑	2	A	3.6	15	0	0	47%	29%	1	2115	6375	2020	0	6280	6315	518	0.256		511	0.249	
Ma Tau Wai Road	N	↑	2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	537	0.256		521	0.249	
Ma Tau Wai Road	N	↑	2	A	4.1	0	0	0	0%	0%	1	2165	0	2165	0	0	0	555	0.256		538	0.249	
Tam Kung Road	S	↓	3	B	3.5	0	0	1	0%	0%	0.5	982.5	3087.5	982.5	0	3087.5	3087.5	60	0.062	0.062	40	0.040	0.040
Tam Kung Road	S	↓	3	B	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	130	0.062		85	0.040	
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	1	0%	0%	1	1975	6215	1975	0	6215	6215	623	0.315	0.315	526	0.266	0.266
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	667	0.315		563	0.266	
Ma Tau Wai Road	S	↓	1	A	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	670	0.315		566	0.266	
Pedestrian Crossing			4p	B,C	Min. Green Time = 12 Gm + 8 Fm = 20s																		
			5p	C	Min. Green Time = 15 Gm + 11 Fm = 26s																		
			6p	A,B	Min. Green Time = 8 Gm + 6 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

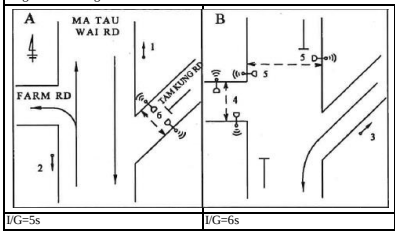
1960(1655) ↓ 190(125) ↙

↰ 245(150) ↑ 1365(1420)

A.M. Check Phase	
εy	0.377
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	122%

P.M. Check Phase	
εy	0.307
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	171%

Stage / Phase Diagrams



I/G=5s I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(Q) Shing kai Road/ Sung Wong Toi Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Sung Wong Toi Road	E		2	A	3.7	20.0	0	1	100%	100%	1	1985	6235	1845	1845	5870	5870	303	0.164		382	0.207	
Sung Wong Toi Road	E		2	A	3.7	23.0	31	0	53% / 47%	54% / 46%	1	2125	0	2010	2010	0	0	330	0.164	0.164	416	0.207	0.207
Sung Wong Toi Road	E		2	A	3.7	0.0	28	0	100%	100%	1	2125	0	2015	2015	0	0	331	0.164		417	0.207	
Shing kai Road	N		3	C	3.3	16.0	0	1	89%	73%	1	1945	4030	1795	1820	3880	3905	409	0.228	0.228	378	0.207	0.207
Shing kai Road	N		3	C	3.3	0.0	0	0	0%	0%	1	2085	0	2085	2085	0	0	476	0.228		432	0.207	
Shing kai Road	S		1	B	3.8	0.0	0	1	0%	0%	1	1995	6265	1995	1995	6140	6135	383	0.192	0.192	294	0.148	0.148
Shing kai Road	S		1	B	3.8	0.0	50	0	87%	97%	1	2135	0	2080	2075	0	0	400	0.192		306	0.148	
Shing kai Road	S		1	B	3.8	0.0	45	0	100%	100%	1	2135	0	2065	2065	0	0	397	0.192		305	0.148	
Pedestrian crossing		<---->	4p	C																			
			5p	A,C																			
			6p	B																			
			7p	B,C																			
			8p	A																			
			9p	A,B																			

Min. Crossing Time = 35Gm + 7FGm =42s

Min. Crossing Time = 72Gm + 10FGm =82s

Min. Crossing Time = 7Gm + 12FGm =15s

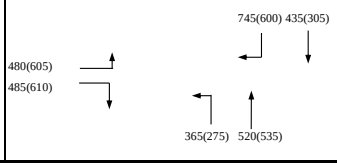
Min. Crossing Time = 55Gm + 18FGm =73s

Min. Crossing Time = 17Gm + 7FGm =24s

Min. Crossing Time = 50Gm + 6FGm =56s

Notes:

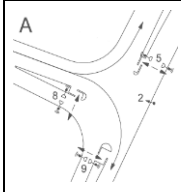
Traffic Flow (pcu / hr) AM(PM) Peak

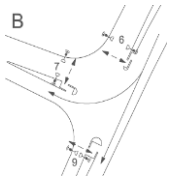


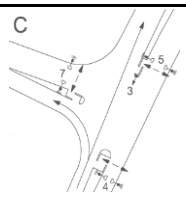
AM Peak Check Phase	
εy	0.585
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	37%

PM Peak Check Phase	
εy	0.562
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	43%

Stage / Phase Diagrams







I/G = 5 I/G = 5 I/G = 5

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(R) Mok Cheong Street / To Kwa Wan Road**
Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Mok Cheong Street	E		2	B	3.5	27.5	18	1	70% / 30%	72% / 28%	1	1965	4070	1850	1850	3680	3680	314	0.170	0.170	297	0.160	0.160
Mok Cheong Street	E		2	B	3.5	0.0	10	0	100%	100%	1	2105	0	1830	1830	0	0	311	0.170		293	0.160	
To Kwa Wan Road	N		1	A	3.5	0.0	0	1	0%	0%	1	1965	4120	1965	1965	4120	4120	315	0.160		289	0.147	0.230
To Kwa Wan Road	N		1	A	4.0	0.0	0	0	0%	0%	1	2155	0	2155	2155	0	0	345	0.160		316	0.147	
To Kwa Wan Road	S		1	A	3.0	0.0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	444	0.232	0.232	441	0.230	
To Kwa Wan Road	S		1	A	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	476	0.232		474	0.230	
Pedestrian crossing		<--->	3p	A		Min. Crossing Time = 29Gm + 11FGm =40s																	

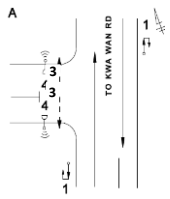
Notes:

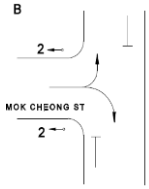
Traffic Flow (pcu / hr) AM(PM) Peak

AM Peak Check Phase	
cy	0.402
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	103%

PM Peak Check Phase	
cy	0.391
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	105%

Stage / Phase Diagrams





I/G = 6 I/G = 6

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(S) Ma Tau Kok Road / To Kwa Wan Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	100%	100%	1	1965	6175	1785	1785	5955	5940	322	0.181		319	0.179	
To Kwa Wan Road	N		1	A	3.5	20.0	0	0	26%	37%	1	2105	0	2065	2050	0	0	373	0.180		366	0.178	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	380	0.181		376	0.179	
Ma Tau Kok Road	W		4	C	5.0	0.0	0	0	0%	0%	1	2255	2255	2255	2255	2255	2255	#NUM!	#NUM!	#NUM!	#NUM!	#NUM!	#NUM!
Ma Tau Kok Road	W		4	C	4.8	16.0	0	1	100%	100%	0.5	1047.5	1047.5	960	960	960	960	#NUM!	#NUM!		#NUM!	#NUM!	
To Kwa Wan Road	S		2,3	A,B	3.5	25.0	0	1	10%	10%	1	1965	4070	1955	1955	4060	4060	722	0.369	0.370	657	0.336	0.336
To Kwa Wan Road	S		2,3	A,B	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	778	0.370		708	0.336	
Pedestrian crossing			5p	A,B		Min. Crossing Time = 5Gm + 8FGm =11s																	
			6p	B		Min. Crossing Time = 5Gm + 8FGm =11s																	
			7p	C		Min. Crossing Time = 8Gm + 8FGm =16s																	
			8p	C		Min. Crossing Time = 5Gm + 8FGm =11s																	

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

1425(1300) 75(65)

#NUM!

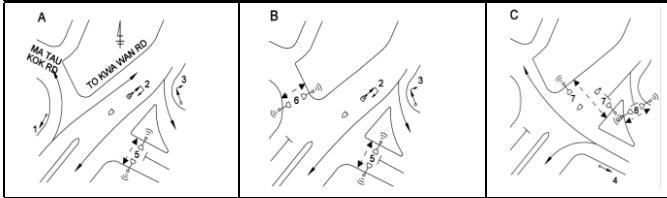
#NUM!

420(455) 655(605)

AM Peak Check Phase	
εy	#NUM!
L (sec)	8
C (sec)	108
y pract.	0.833
R.C. (%)	#NUM!

PM Peak Check Phase	
εy	#NUM!
L (sec)	8
C (sec)	90
y pract.	0.820
R.C. (%)	#NUM!

Stage / Phase Diagrams



I/G = 5 I/G = 5

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(S) Ma Tau Kok Road / To Kwa Wan Road**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	100%	100%	1	1965	6175	1785	1785	5955	5940	322	0.181		319	0.179	
To Kwa Wan Road	N		1	A	3.5	20.0	0	0	26%	37%	1	2105	0	2065	2050	0	0	373	0.180		366	0.178	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	380	0.181		376	0.179	
To Kwa Wan Road	S		2	A	3.5	25.0	0	1	10%	10%	1	1965	4070	1955	1955	4060	4060	722	0.369	0.370	657	0.336	0.336
To Kwa Wan Road	S		2	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	778	0.370		708	0.336	
Pedestrian crossing			3p	B		Min. Crossing Time = 8Gm + 8FGm =16s																	
			4p	B		Min. Crossing Time = 5Gm + 8FGm =13s																	

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

1425(1300)

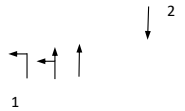
420(455) 655(605)

AM Peak Check Phase	
εy	0.370
L (sec)	21
C (sec)	130
y pract.	0.755
R.C. (%)	104%

PM Peak Check Phase	
εy	0.336
L (sec)	21
C (sec)	130
y pract.	0.755
R.C. (%)	124%

Stage / Phase Diagrams

A



B

I/G = 3

I/G = 3+16

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(T) San Shan Road / To Kwa Wan Road**

Description: **2036 Reference Flow**

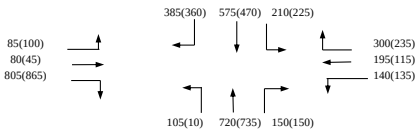
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
San Shan Road	E		2	B	3.5	10.0	0	1	100%	100%	0.9	1768.5	5978.5	1540	1540	5535	5525	85	0.055		100	0.065	
San Shan Road	E		2	B	3.5	16.0	27	0	0% / 82%	0% / 90%	1	2105	0	2015	2005	0	0	446	0.221	0.222	458	0.228	0.228
San Shan Road	E		2	B	3.5	0.0	24	0	100%	100%	1	2105	0	1980	1980	0	0	439	0.222		452	0.228	
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	46%	5%	1	1965	8280	1880	1880	8075	8075	228	0.121		209	0.111	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	254	0.121		233	0.111	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	254	0.121		233	0.111	
To Kwa Wan Road	N		1	A	3.5	0.0	25	0	63%	68%	1	2105	0	1985	1985	0	0	239	0.120	0.121	220	0.111	0.111
San Ma Tau Street	W		4	D	3.4	0.0	24	0	100%	100%	1	2095	4050	1970	1970	3790	3790	156	0.079		122	0.062	
San Ma Tau Street	W		4	D	3.4	0.0	20	1	100%	100%	1	1955	0	1820	1820	0	0	144	0.079	0.093	113	0.062	0.067
San Ma Tau Street	W		4	D	3.4	16.0	0	0	0%	17%	1	2095	0	2095	2060	0	0	195	0.093		138	0.067	
San Ma Tau Street	W		4	D	3.0	10.0	0	1	100%	100%	1	1915	4010	1665	1665	3760	3725	140	0.084		112	0.067	
To Kwa Wan Road	S		3	C	3.2	25.0	0	1	87%	100%	1	1935	6045	1840	1825	5950	5935	243	0.132		225	0.123	
To Kwa Wan Road	S		3	C	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	271	0.132		235	0.114	
To Kwa Wan Road	S		3	C	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	271	0.132		235	0.114	
To Kwa Wan Road	S		3	C	3.0	0.0	30	0	100%	100%	1	2055	2055	1955	1955	1955	1955	385	0.197	0.197	360	0.184	0.184

Pedestrian crossing

5p	A	Min. Crossing Time = 5Gm + 9FGm =14s
6p	B,C,D	Min. Crossing Time = 8Gm + 15FGm =23s
7p	D	Min. Crossing Time = 5Gm + 7FGm =12s
8p	A,B,C	Min. Crossing Time = 5Gm + 11FGm =16s
9p	A,C,D	Min. Crossing Time = 5Gm + 9FGm =14s
10p	B,C,D	Min. Crossing Time = 5Gm + 6FGm =11s

Notes:

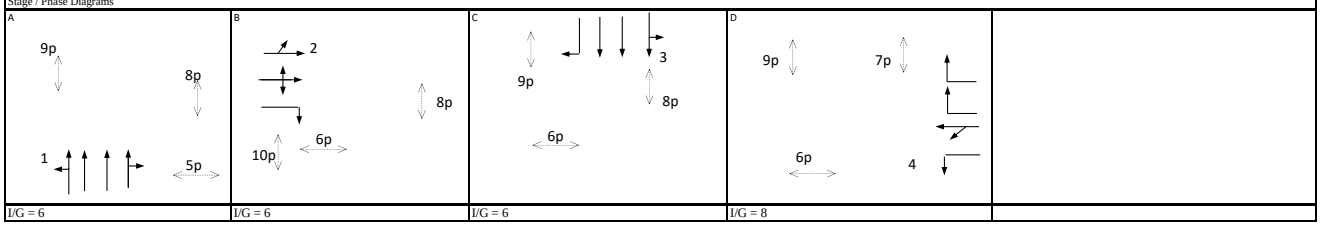
Traffic Flow (pcu / hr) AM(PM) Peak



AM Peak Check Phase	
εy	0.633
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	18%

PM Peak Check Phase	
εy	0.591
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	27%

Stage / Phase Diagrams



A	B	C	D
I/G = 6	I/G = 6	I/G = 6	I/G = 8

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

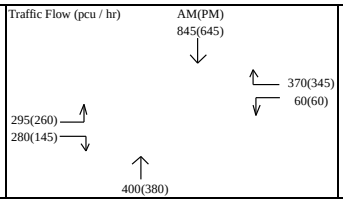
Junction: **(U) To Kwa Wan Road / Sheung Heung Road / Kwei Chow Street**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Sheung Heung Road	E		2	B	3.1	15	0	1	100%	100%	1	1925	3990	1750	0	3670	3670	141	0.080	0.080	124	0.071	0.071
Sheung Heung Road	E		2	B	3.1	20	0	0	100%	100%	1	2065	0	1920	0	0	0	154	0.080		136	0.071	
Sheung Heung Road	E		2	B	3.2	0	25	0	100%	100%	1	2075	4160	1960	0	3900	3900	141	0.072		73	0.037	
Sheung Heung Road	E		2	B	3.3	0	20	0	100%	100%	1	2085	0	1940	0	0	0	139	0.072		72	0.037	
To Kwa Wan Road	N		1	A	3.5	0	0	1	0%	0%	0.5	982.5	5142.5	982.5	0	5142.5	5142.5	76	0.078		73	0.074	
To Kwa Wan Road	N		1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	165	0.078		156	0.074	
To Kwa Wan Road	N		1	A	2.9	0	0	0	0%	0%	1	2045	0	2045	0	0	0	159	0.078	0.163	151	0.074	
Kwei Chow Street	W		3	C	3.0	0	20	0	100%	100%	1	2055	0	1940	0	0	0	123	0.063	0.063	115	0.059	0.059
Kwei Chow Street	W		3	C	3.0	0	25	0	100%	100%	1	2055	0	1940	0	0	0	123	0.063		115	0.059	
Kwei Chow Street	W		3	C	3.0	20	30	0	0% / 100%	0% / 100%	1	2055	0	1955	0	0	0	124	0.063		116	0.059	
Kwei Chow Street	W		3	C	3.4	15	0	1	100%	100%	1	1955	6065	1775	0	7610	7610	60	0.034		60	0.034	
To Kwa Wan Road	S		1	A	3.0	0	0	1	0%	0%	0.5	957.5	5177.5	957.5	0	5177.5	5177.5	156	0.163		119	0.125	0.125
To Kwa Wan Road	S		1	A	3.8	0	0	0	0%	0%	1	2135	0	2135	0	0	0	348	0.163		266	0.125	
To Kwa Wan Road	S		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	0	0	0	340	0.163		260	0.125	
Pedestrian Crossing			4	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			5	C,A	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			6	B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			7	C	Min. Green Time = 08 Fm = 13s																		

Notes:

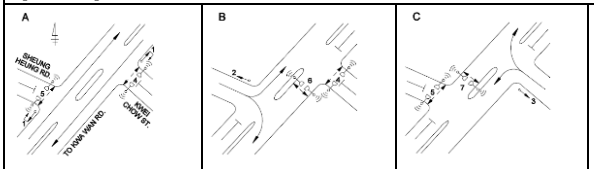
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.307
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	139%

P.M. Check Phase	
εy	0.255
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	188%

Stage / Phase Diagrams



I/G= 7s | I/G= 8s | I/G= 8s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(V) Chatham Road North / San Lau Street**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Chatham Road North	N		1	A	4.0	15	0	1	1%	3%	1	2015	4170	2015	2010	4170	4165	454	0.225		446	0.222	
Chatham Road North	N		1	A	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	486	0.226		479	0.222	
San Lau Street	W		3	B	2.7	0	20	0	100%	100%	1	2025	0	1885	0	0	0	107	0.057	0.057	153	0.081	0.081
San Lau Street	W		3	B	3.5	0	25	0	100%	78%	1	2105	0	1985	0	0	0	113	0.057		163	0.081	
San Lau Street	W		3	B	4.2	0	0	1	0%	0%	1	2035	6165	2035	0	5905	5930	60	0.029		165	0.081	
Chatham Road North	S		2	A	4.7	0	0	1	0%	0%	1	2085	4260	2085	0	4260	4260	617	0.296	0.296	556	0.266	0.266
Chatham Road North	S		2	A	4.2	0	0	0	0%	0%	1	2175	0	2175	0	0	0	643	0.296		579	0.266	
Pedestrian Crossing			4	A	Min. Green Time = 12 Gm + 10 Fm = 22s																		
			5	B	Min. Green Time = 06 Gm + 08 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

1260(1135)

220(280)

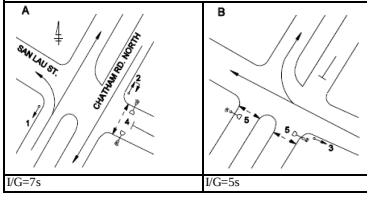
60(200)

5(15) 935(910)

A.M. Check Phase	
εy	0.353
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	127%

P.M. Check Phase	
εy	0.347
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	135%

Stage / Phase Diagrams



I/G=7s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

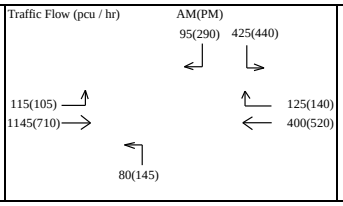
Junction: **(W) Fat Kwong Street / Shun Yung Street / Yan Fung Street**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E		2	A	3.1	15	0	1	100%	100%	1	1925	1925	1750	1750	1750	1750	115	0.066		105	0.060	0.171
Fat Kwong Street	E		2	A	3.2	0	0	0	0%	0%	1	2075	4160	2075	2075	4160	4160	571	0.275		354	0.171	
Fat Kwong Street	E		2	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	574	0.275	0.275	356	0.171	
Yan Fung Street	N		3	A	4.2	15	0	1	100%	100%	1	2035	2035	1850	1850	1850	1850	80	0.043		145	0.078	
Fat Kwong Street	W		1	B	3.1	0	20	0	72%	64%	1	2065	0	1960	1970	0	0	174	0.089	0.089	219	0.111	0.111
Fat Kwong Street	W		1	B	3.0	0	0	0	0%	0%	1	2055	0	2055	0	0	0	182	0.089		229	0.111	
Fat Kwong Street	W		1	B	2.9	0	0	1	0%	0%	1	1905	6025	1905	1905	5920	5930	169	0.089		212	0.111	
Shun Yung Street	S		4	C	3.2	15	0	1	100%	100%	1	1935	4000	1760	1760	3680	3680	249	0.141		349	0.198	
Shun Yung Street	S		4	C	3.1	20	20	0	65% / 35%	24% / 76%	1	2065	0	1920	1920	0	0	271	0.141	0.141	381	0.198	0.198
Pedestrian Crossing			5	B,C	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			6	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			7	B	Min. Green Time = 06 Gm + 11 Fm = 17s																		
			8	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			9	C,A	Min. Green Time = 05 Gm + 08 Fm = 13s																		

Notes:

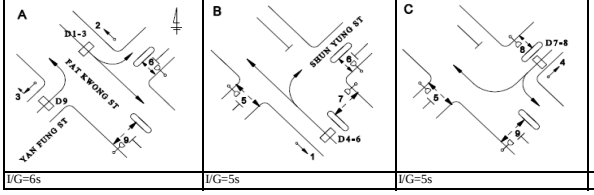
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.505
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	57%

P.M. Check Phase	
εy	0.480
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	65%

Stage / Phase Diagrams



I/G=6s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

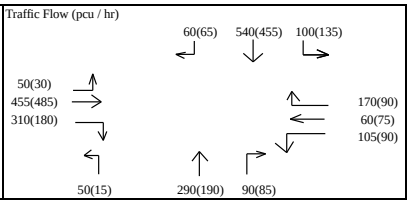
Junction: **(X) Hung Hom Road/ Fat Kwong Street Flyover/ Tai Wan Road East**

Description: **2036 Reference Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Fat Kwong Street Flyover	E		3	A	3.5	10	0	1	10%	6%	1	1965	1965	1935	1950	1935	1950	505	0.261	0.261	515	0.264	0.264
	E		3	A	3.3	0	19	0	100%	100%	1	2085	2085	1930	1930	1930	1930	275	0.142		210	0.109	
Hung Hom Road	N		1	B	3.4	8	0	1	100%	100%	1	1955	1955	1630	1630	1630	1630	50	0.031		15	0.009	
	N		1	B	3.4	0	0	0	0%	0%	1	1955	4050	1955	1955	4050	4050	229	0.117		196	0.100	
	N		1	B	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	246	0.117	0.117	210	0.100	
	N		1	B	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	90	0.047		85	0.044	0.100
Tai Wan Road East	W		4	C	4.0	0	12.5	0	74%	55%	1	2155	2155	1980	2025	1980	2025	230	0.116	0.116	165	0.081	0.081
	W		4	C	3.5	13	0	1	100%	100%	1	1965	1965	1755	1755	1755	1755	105	0.060		90	0.051	
Hung Hom Road	S		2	D	3.5	15	0	1	30%	43%	1	1965	4070	1910	1885	3980	3950	336	0.176	0.176	312	0.166	0.166
	S		2	D	3.5	0	15	0	16%	19%	1	2105	0	2070	2065	0	0	364	0.176		343	0.166	
Pedestrian crossing			5P	A,B,D	Min. Crossing Time = 6GM + 7FGM = 13s															*			*
			6P	C	Min. Crossing Time = 5GM + 6FGM = 11s																		
			7P	A,B,C	Min. Crossing Time = 5GM + 7FGM = 12s																		
			8P	D	Min. Crossing Time = 5GM + 9FGM = 14s																		
			9P	B,C,D	Min. Crossing Time = 5GM + 7FGM = 12s																		
			10P	A	Min. Crossing Time = 5GM + 9FGM = 14s																		

Notes:

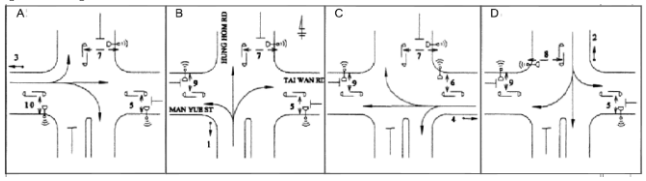
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.670
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	16%

P.M. Check Phase	
εy	0.611
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	27%

Stage/ Phase Diagram:



I/G= 5s I/G=7s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

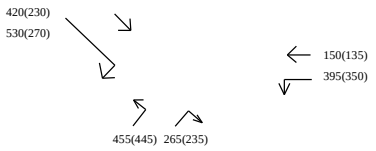
Junction: **(A) Tin Kwong Road / Sheung Shing Street**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	SE	↘	2,3	A,B	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	395	0.199		350	0.176	
	SE	↘	3	B	3.5	0	10	0	100%	100%	1	2105	2105	1830	1830	1830	1830	150	0.082	0.082	135	0.074	0.074
Sheung Shing Street	NE	↖↘	4	C	3.2	10	18	1	94% / 6%	97% / 3%	1	1935	4010	1690	1685	3575	3570	449	0.266	0.266	236	0.140	0.140
	NE	↗	4	C	3.2	0	15	0	100%	100%	1	2075	0	1885	1885	0	0	501	0.266		264	0.140	
Tin Kwong Road	W	↙	1	A	3.4	10	0	1	100%	100%	1	1955	1955	1700	1700	1700	1700	265	0.156	0.217	235	0.138	0.212
	W	←	1	A	3.4	0	0	0	0%	0%	1	2095	2095	2095	2095	2095	2095	455	0.217		445	0.212	
Pedestrian crossing			5p	B		Min. Crossing Time = 10GM + 5FGM = 15s																	
			6p	C		Min. Crossing Time = 6GM + 6FGM = 12s																	
			7p	C		Min. Crossing Time = 11GM + 5FGM = 16s																	
			8p	A,B		Min. Crossing Time = 6GM + 6FGM = 12s																	

Notes:

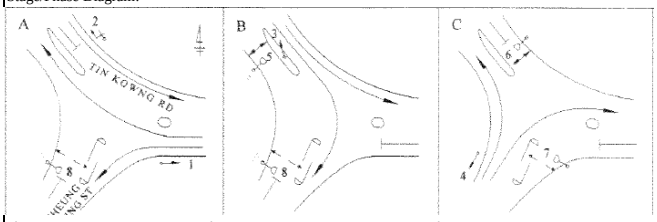
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.565
L (sec)	14
C (sec)	130
y pract.	0.803
R.C. (%)	42%

P.M. Check Phase	
εy	0.426
L (sec)	14
C (sec)	118
y pract.	0.793
R.C. (%)	86%

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

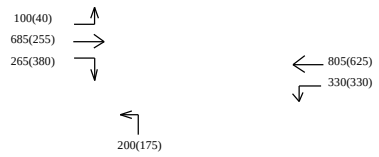
Junction: **(B) Tin Kwong Road / Kau Pui Lung Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	E		1	A,B,C	2.8	8	0	1	13%	14%	0.8	1516	1516	1480	1475	1480	1475	785	0.530		295	0.200	
	E		2	B	2.8	0	12.5	0	100%	100%	1	2035	2035	1815	1815	1815	1815	265	0.146	0.146	380	0.209	0.209
Kau Pui Lung Road	N		3	C	4.6	25	0	1	100%	100%	0.7	1453	1453	1370	1370	1370	1370	200	0.146		175	0.128	
Tin Kwong Road	W		5	A	3.0	0	0	0	0%	0%	1	2055	2055	2055	2055	2055	2055	805	0.392	0.392	625	0.304	0.304
	W		4	C	3.0	5	0	1	100%	100%	1	1915	1915	1475	1475	1475	1475	330	0.224	0.224	330	0.224	0.224
Pedestrian crossing			6p	A		Min. Crossing Time = 8GM + 8FGM = 16s																	

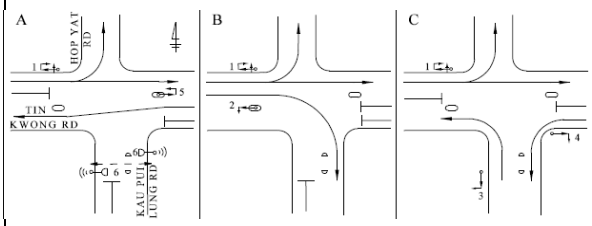
Notes:

Traffic Flow (pcu / hr)



A.M. Check Phase		P.M. Check Phase	
εy	0.761	εy	0.737
L (sec)	16	L (sec)	16
C (sec)	130	C (sec)	118
y pract.	0.789	y pract.	0.778
R.C. (%)	**4%**	R.C. (%)	**6%**

Stage/Phase Diagram:



TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

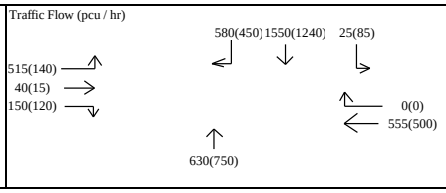
Junction: **(C) Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road**
Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	E		2	B,C	2.9	10	0	1	100%	100%	1	1905	1905	1655	1655	1655	1655	515	0.311		140	0.085	
	E		2	C	2.9	0	15	0	79%	89%	1	2045	2045	1895	1880	1895	1880	190	0.100	0.100	135	0.072	0.072
Ma Tau Wai Road	N		5	A	3.4	0	0	1	0%	0%	1	1955	6105	1955	1955	6105	6105	202	0.103	0.103	240	0.123	0.123
	N		5	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	216	0.103		257	0.123	
	N		5	A	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	212	0.103		252	0.123	
Ma Hang Chung Road	W		6	D	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	0	0.000		0	0.000	
	W		6	D	3.7	0	0	1	0%	0%	1	1985	1985	1985	1985	1985	1985	555	0.280	0.280	500	0.252	0.252
Ma Tau Wai Road	S		3	A,B	3.0	8	0	1	5%	21%	1	1915	6025	1895	1840	6005	5950	497	0.262		410	0.223	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		3	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		3	B	3.0	0	15	0	100%	100%	1	2055	2055	1870	1870	1870	1870	580	0.310	0.310	450	0.241	0.241

Pedestrian crossing		
	7p	Min. Crossing Time = 14GM + 13FGM = 27s
	8p	Min. Crossing Time = 6GM + 12FGM = 18s
	9p	Min. Crossing Time = 5M + 9FGM = 14s
	10p	Min. Crossing Time = 13GM + 10FGM = 23s
	11p	Min. Crossing Time = 19GM + 7FGM = 26s

Notes:

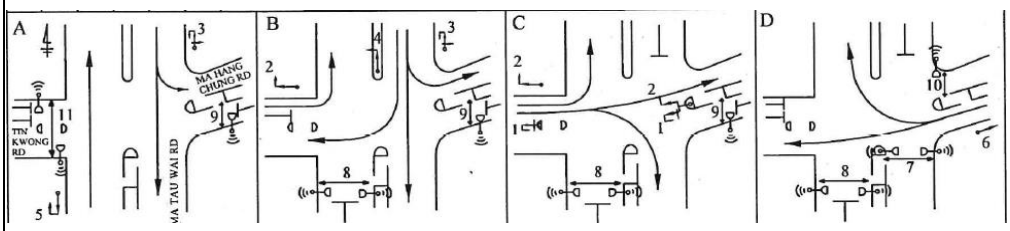
Traffic Flow (pcu / hr)



A.M. Check Phase	
Σy	0.793
L (sec)	24
C (sec)	130
y pract.	0.734
R.C. (%)	**-7%**

P.M. Check Phase	
Σy	0.687
L (sec)	24
C (sec)	120
y pract.	0.720
R.C. (%)	**5%**

Stage/Phase Diagram:



I/G=12s I/G=6s I/G=5s I/G=5s

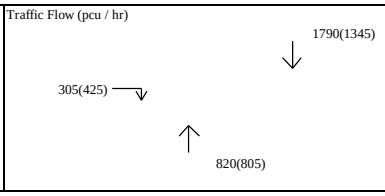
TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(E) Ma Tau Wai Road / Lok Shan Road**
Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Lok Shan Road	E	↘	3	B	3.5	0	15	1	100%	100%	1	1965	1965	1785	1785	1785	1785	305	0.171	0.171	425	0.238	0.238
Ma Tau Wai Road	N	↑	1	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	261	0.133		256	0.130	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	280	0.133		274	0.130	
	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	280	0.133		274	0.130	
											#N/A												
Ma Tau Wai Road	S	↓	2	A	3.5	0	0	1	0%	0%	1	1965	6175	1965	1965	6175	6175	570	0.290	0.290	428	0.218	0.218
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	610	0.290		458	0.218	
	S	↓	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	610	0.290		458	0.218	
Pedestrian crossing		↔	4p	B		Min. Crossing Time = 9GM + 10FGM = 19s																	
		↕	5p	A		Min. Crossing Time = 6GM + 4FGM = 9s																	

Notes:

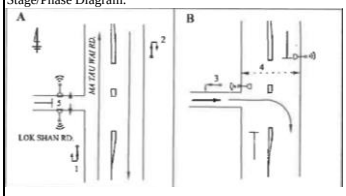
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.461
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	**82%**

P.M. Check Phase	
εy	0.456
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	**83%**

Stage/Phase Diagram:



I/G=6s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(G) Ma Tau Wai Road / Chi Kiang Street**
Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Wai Road	N	↑	1	A,B	3.5	0	0	1	0%	0%	1	1825	3930	1825	1825	3930	3930	309	0.169		344	0.188	
	N	↑	1	A,B	3.5	0	0	0	0%	0%	1	2105	0	2105	2105	0	0	356	0.169		396	0.188	
	N	↱	2	A	5.4	0	20	0	100%	100%	1	2295	4590	2135	2135	4220	4220	387	0.181	0.181	306	0.143	0.143
	N	↱	2	A	5.4	0	15	0	100%	100%	1	2295	0	2085	2085	0	0	378	0.181		299	0.143	
Ma Tau Wai Road	S	↳	3	C	3.3	18	0	1	100%	100%	1	1945	6115	1790	1790	5960	5960	631	0.352	0.352	515	0.288	0.288
	S	↓↳	3	C	3.3	20	0	0	0%	0%	1	2085	0	2085	2085	0	0	729	0.350		628	0.301	
	S	↓	3	C	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	735	0.352		628	0.301	

Pedestrian crossing	4p	A,B	Min. Crossing Time = 6GM + 11FGM = 17s
	5p	B	Min. Crossing Time = 5GM + 13FGM = 18s
	6p	C	Min. Crossing Time = 5GM + 8FGM = 13s

Notes:

Traffic Flow (pcu / hr)

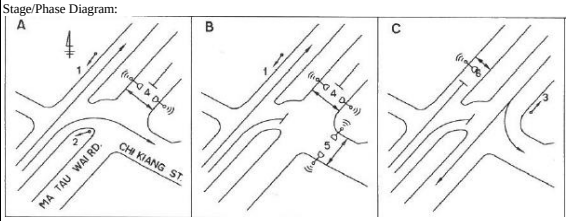
1390(1255) 705(515)

665(740) 765(605)

A.M. Check Phase	
εy	0.534
L (sec)	34
C (sec)	130
y pract.	0.665
R.C. (%)	**25%**

P.M. Check Phase	
εy	0.431
L (sec)	30
C (sec)	120
y pract.	0.675
R.C. (%)	**57%**

Stage/Phase Diagram:



I/G=6s I/G=9+18s I/G=3s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(H) Argyle Street / Waterloo Road / Princess Margaret Road**

Description: **2036 Design Flow**

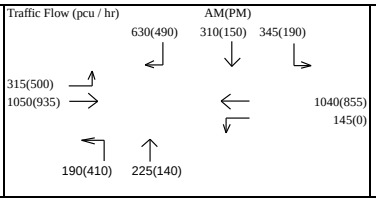
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	4250	2125	0	4250	4250	158	0.074		250	0.118	
Argyle Street	E	↗	4	B,C,D	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	158	0.074		250	0.118	
Argyle Street	E	→	6	D	3.7	0	0	0	0%	0%	1	2125	4280	2125	0	4280	4280	521	0.245		464	0.218	
Argyle Street	E	→	6	D	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	529	0.245		471	0.218	
Princess Margaret Road	N	↰↑	1	A	3.4	15	0	1	100%	100%	1	1955	4050	1780	1775	3875	3870	190	0.107		410	0.231	
Princess Margaret Road	N	↑	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	225	0.107		140	0.067	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	1	0%	0%	1	1965	4070	1965	1965	4070	4070	109	0.055		68	0.034	
Princess Margaret Road (Middle)	N	↑	2	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	116	0.055		72	0.034	
Argyle Street	W	←	11	C,D	3.5	0	0	0	0%	0%	1	2105	4180	2105	0	4180	4180	524	0.249	0.249	431	0.205	0.205
Argyle Street	W	←	11	C,D	3.2	0	0	0	0%	0%	1	2075	0	2075	0	0	0	516	0.249		424	0.205	
Argyle Street	W	↰	15	D	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	145	0.080		0	0.000	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	1	0%	0%	1	1965	6175	1965	0	6175	6175	531	0.270		428	0.218	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	569	0.270		458	0.218	
Argyle Street (Middle)	W	←	5	B,C,D	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	569	0.270		458	0.218	
Waterloo Road	S	↳	3	A,B	3.4	15	0	0	100%	100%	1	2095	2095	1905	1905	1905	1905	345	0.181		190	0.100	
Waterloo Road	S	↓	3	A,B	3.5	0	0	0	0%	0%	1	2105	2105	2105	2105	2105	2105	310	0.147	0.181	150	0.071	0.124
Waterloo Road	S	↰↓	3	A,B	3.5	0	25	0	100%	100%	1	2105	4210	1985	1985	3945	3945	317	0.160		247	0.124	
Waterloo Road	S	↰	3	A,B	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	313	0.160		243	0.124	

Pedestrian Crossing

7	A	Min. Green Time = 05 Gm + 11 Fm = 16s
8	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
9	B,C,D	Min. Green Time = 05 Gm + 07 Fm = 12s
10	C	Min. Green Time = 05 Gm + 07 Fm = 12s
12	A,B	Min. Green Time = 05 Gm + 09 Fm = 14s
13	C	Min. Green Time = 05 Gm + 07 Fm = 12s
14	C,D	Min. Green Time = 13 Gm + 12 Fm = 25s

Notes:

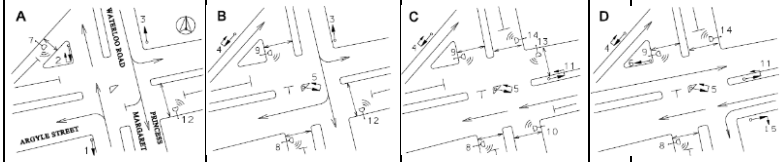
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.430
L (sec)	12
C (sec)	130
y pract.	0.817
R.C. (%)	90%

P.M. Check Phase	
εy	0.329
L (sec)	12
C (sec)	120
y pract.	0.810
R.C. (%)	146%

Stage / Phase Diagrams



I/G=6s I/G=8s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

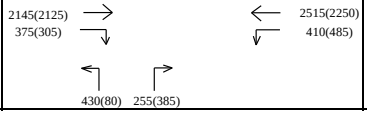
Junction: **(I) Argyle Street / Tin Kwong Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Argyle Street	E	→	2	A,B	3.0	0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	1035	0.540		1025	0.535	
Argyle Street	E	→	2	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	1110	0.540		1100	0.535	
Argyle Street	E	↘	3	B	3.1	0	25	0	100%	100%	1	2065	4120	1950	1950	3860	3860	189	0.097	0.097	154	0.079	0.079
Argyle Street	E	↘	3	B	3.0	0	20	0	100%	100%	1	2055	0	1910	1910	0	0	186	0.097		151	0.079	
Tin Kwong Road	N	↰	4	B,C	3.0	15	0	1	100%	100%	1	1915	1915	1740	1740	1740	1740	430	0.247		80	0.046	
Tin Kwong Road	N	↱	5	C	2.9	0	20	0	100%	100%	1	2045	2045	1900	1900	1900	1900	255	0.134	0.134	385	0.203	0.203
Argyle Street	W	←	1	A,D	3.2	0	0	0	0%	0%	1	2075	6185	2075	2075	6185	6185	844	0.407	0.407	755	0.364	0.364
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	836	0.407		748	0.364	
Argyle Street	W	←	1	A,D	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	836	0.407		748	0.364	
Argyle Street	N	↙	1	A,D	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	410	0.233		485	0.276	
Pedestrian Crossing			6	A,D	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			7	C	Min. Green Time = 05 Gm + 06 Fm = 11s																		
			8	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			9	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		

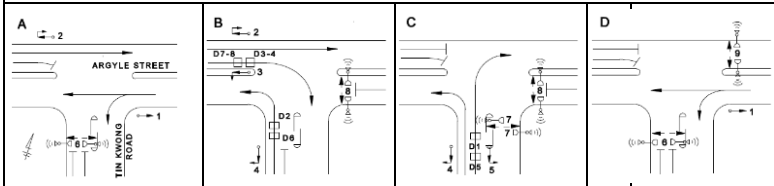
Notes:

Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase		P.M. Check Phase	
εy	0.638	εy	0.645
L (sec)	13	L (sec)	13
C (sec)	130	C (sec)	130
y pract.	0.810	y pract.	0.810
R.C. (%)	27%	R.C. (%)	25%

Stage / Phase Diagrams



I/G = 6s I/G = 5s I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(J) Fat Kwong Street / Sheung Shing Street**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E	↑	1	A	3.7	15	0	1	100%	100%	1	1985	1985	1805	1805	1805	1805	665	0.368		195	0.108	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	4190	2095	2095	4190	4190	618	0.295		390	0.186	
Fat Kwong Street	E	→	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	618	0.295	0.368	390	0.186	0.186
Fat Kwong Street	W	↰	3	B	3.9	0	20	0	100%	100%	1	2145	2145	1995	1995	1995	1995	90	0.045		75	0.038	0.045
Fat Kwong Street	W	←	2,3	A,B	3.6	0	0	0	0%	0%	1	2114.4	4083.9	2114.4	2114.4	4083.9	4083.9	489	0.231		487	0.230	
Fat Kwong Street	W	←	2,3	A,B	3.5	0	0	1	0%	0%	1	1969.5	0	1969.5	1969.5	0	0	456	0.231		453	0.230	
Sheung Shing Street	S	↳	3	B	3.2	15	0	1	100%	100%	1	1935	1935	1760	1760	1760	1760	85	0.048	0.048	80	0.045	
Sheung Shing Street	S	↲	4	C	2.8	0	20	0	100%	100%	1	2035	2035	1895	1895	1895	1895	270	0.142	0.142	170	0.090	0.090
Pedestrian Crossing			5	A	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			6	C	Min. Green Time = 07 Gm + 10 Fm = 17s																		
			7	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

270(170) 85(80)

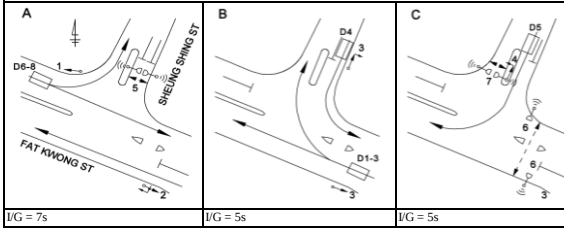
665(195) ↑ ↰ 90(75)

1235(780) → ← 945(940)

A.M. Check Phase	
εy	0.559
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	42%

P.M. Check Phase	
εy	0.321
L (sec)	14
C (sec)	120
y pract.	0.795
R.C. (%)	147%

Stage / Phase Diagrams



I/G = 7s | I/G = 5s | I/G = 5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

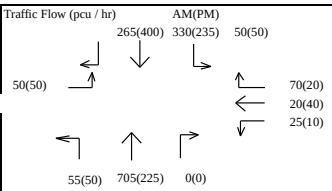
Junction: **(K) Sheung Shing Street / Shek Ku Street / Sheung Shing Lane**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Shek Ku Street	E		4	B	3.8	15	0	1	100%	100%	1	1995	1995	1815	1815	1815	1815	310	0.171		210	0.116	
Sheung Shing Street	N		1	A	3.2	15	0	1	16%	18%	1	1935	4030	1905	1900	3880	3850	317	0.166	0.166	285	0.150	0.150
Sheung Shing Street	N		1	A	3.4	0	20	0	81%	100%	1	2095	0	1975	1950	0	0	328	0.166		400	0.205	
Sheung Shing Lane	W		3	C	4.2	15	20	1	2% / 61	4% / 29	1	2035	2035	1905	1965	1905	1965	115	0.060	0.060	70	0.036	0.036
Sheung Shing Street	S		2	B	3.7	15	0	1	15%	38%	1	1985	4080	1955	1910	4050	4005	367	0.188	0.188	131	0.069	0.069
Sheung Shing Street	S		2	B	3.4	0	20	0	0%	0%	1	2095	0	2095	2095	0	0	393	0.188		144	0.069	
Pedestrian Crossing			5	D	Min. Green Time = 09 Gm + 09 Fm = 18s																		
			6	D	Min. Green Time = 07 Gm + 13 Fm = 20s																		
			7	D	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			8	D	Min. Green Time = 08 Gm + 07 Fm = 15s																		

Notes:

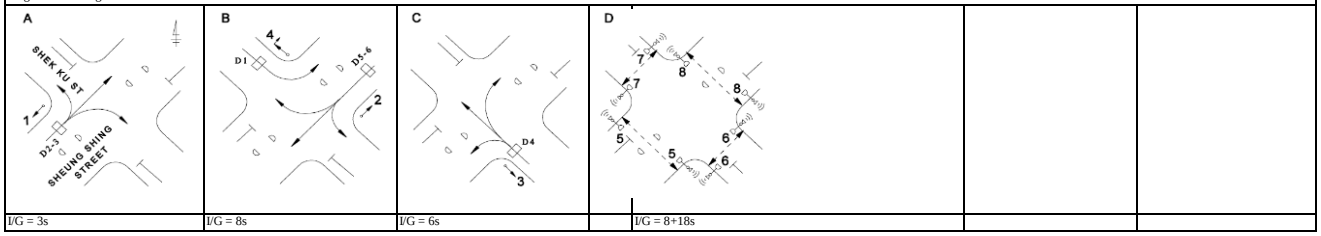
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.414
L (sec)	40
C (sec)	108
y pract.	0.567
R.C. (%)	37%

P.M. Check Phase	
εy	0.254
L (sec)	40
C (sec)	80
y pract.	0.450
R.C. (%)	77%

Stage / Phase Diagrams



A	B	C	D
I/G = 3s	I/G = 8s	I/G = 6s	I/G = 8+18s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(M) Tin Kwong Road / Farm Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Tin Kwong Road	S	↓	1	A	3.0	0	0	1	0%	0%	1	1915	1915	1915	1915	1915	1915	645	0.337	0.337	440	0.230	0.230
Tin Kwong Road	N	↑	2	A	4.0	0	0	1	0%	0%	1	2015	2015	2015	2015	2015	2015	520	0.258		455	0.226	
Farm Road	W	↓	3	B	3.0	15	0	0	100%	100%	0.8	1644	1644	1495	1495	1495	1495	140	0.094	0.094	75	0.050	0.052
	W	↑	3	B	3.0	0	20	0	100%	100%	0.8	1644	1644	1530	1530	1530	1530	115	0.075		80	0.052	
Pedestrian Crossing			4p	C		Min. Crossing Time = 5GM + 11FGM = 16s																	
			5p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	
			6p	C		Min. Crossing Time = 5GM + 7FGM = 12s																	

Notes:

Traffic Flow (pcu / hr) AM(PM)

645(440) ↓

115(80) ↑

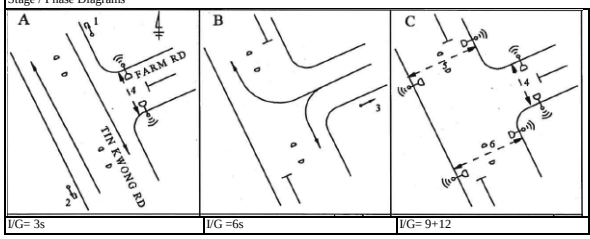
140(75) ↓

520(455) ↑

A.M. Check Phase	
εy	0.430
L (sec)	28
C (sec)	130
y pract.	0.706
R.C. (%)	64%

P.M. Check Phase	
εy	0.282
L (sec)	28
C (sec)	118
y pract.	0.686
R.C. (%)	143%

Stage / Phase Diagrams



I/G= 3s | I/G =6s | I/G= 9+12

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(N) Ma Tau Chung Road / Sung Wong Toi Road / Fu Ning Street**

Description: **2036 Design Flow**

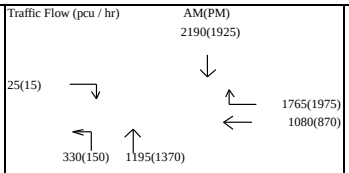
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fu Ning Street	E	↘	9	D	3.4	0	20	1	100%	100%	1	1955	1955	1820	1820	1820	1820	25	0.014	0.014	15	0.008	0.008
Ma Tau Chung Road	N	↰↑	1	A	3.4	15	0	1	71%	32%	1	1955	6155	1825	0	6025	6095	462	0.253		473	0.249	
Ma Tau Chung Road	N	↑	1	A	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	533	0.253		525	0.249	
Ma Tau Chung Road	N	↑	1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	530	0.253		522	0.249	
Sung Wong Toi Road	W	←	5	B	2.8	0	0	1	0%	0%	1	1895	4010	1895	0	4010	4010	510	0.269		411	0.217	
Sung Wong Toi Road	W	←	5	B	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	570	0.269		459	0.217	
Sung Wong Toi Road	W	↰	4	B,C	3.0	0	30	0	100%	100%	1	2055	6255	1955	1955	5890	5890	586	0.300	0.300	656	0.335	0.335
Sung Wong Toi Road	W	↰	4	B,C	3.4	0	25	0	100%	100%	1	2095	0	1975	1975	0	0	592	0.300		662	0.335	
Sung Wong Toi Road	W	↰	4	B,C	3.5	0	20	0	100%	100%	1	2105	0	1960	1960	0	0	587	0.300		657	0.335	
Ma Tau Chung Road	S	↓	2	A	3.5	0	0	1	0%	0%	1	1965	6195	1965	0	6195	6195	695	0.354	0.354	611	0.311	0.311
Ma Tau Chung Road	S	↓	2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	748	0.354		657	0.311	
Ma Tau Chung Road	S	↓	2	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	748	0.354		657	0.311	

Pedestrian Crossing

3p	A,D,E	Min. Green Time = 10 Gm + 11 Fm = 21s
6p	B,C	Min. Green Time = 16 Gm + 9 Fm = 25s
7p	A,B,C	Min. Green Time = 12 Gm + 6 Fm = 18s
8p	C,D	Min. Green Time = 20 Gm + 8 Fm = 28s
10p	A,D,E	Min. Green Time = 8 Gm + 16 Fm = 24s

Notes:

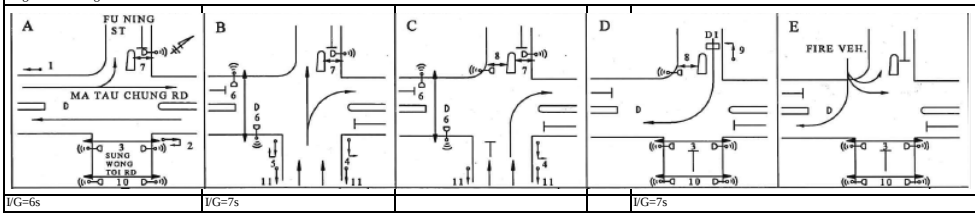
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.667
L (sec)	17
C (sec)	130
y pract.	0.782
R.C. (%)	17%

P.M. Check Phase	
εy	0.654
L (sec)	17
C (sec)	118
y pract.	0.770
R.C. (%)	18%

Stage / Phase Diagrams



I/G=6s | I/G=7s | | I/G=7s |

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(O) Ma Tau Chung Road / Ma Tau Kok Road**

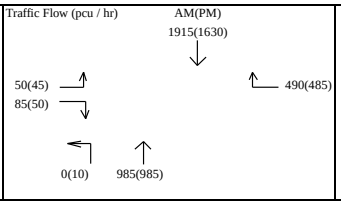
Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Kok Road	E		4	C	3.3	15	25	1	78% / 22%	100% / 0%	1	1945	4040	1785	1770	3735	3720	64	0.036	0.036	45	0.026	0.026
Ma Tau Kok Road	E		4	C	3.4	0	20	0	100%	100%	1	2095	0	1950	1950	0	0	71	0.036		50	0.026	
Ma Tau Chung Road*	N		1	A	3.5	15	0	1	0%	5%	0.5	982.5	5162.5	985	975	5165	5155	187	0.190		189	0.193	
Ma Tau Chung Road	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	400	0.191		404	0.193	
Ma Tau Chung Road	N		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	398	0.191		402	0.193	
Ma Tau Kok Road	W		3	B	4.5	0	25	0	100%	100%	1	2205	0	2080	2080	0	0	255	0.123	0.123	252	0.121	0.121
Ma Tau Kok Road	W		3	B	4.5	0	20	1	100%	100%	1	2065	4270	1920	1920	4000	4000	235	0.123		233	0.121	
Ma Tau Chung Road	S		2	A	3.6	0	0	1	0%	0%	0.5	987.5	5207.5	987.5	987.5	5207.5	5207.5	363	0.368	0.368	309	0.313	0.313
Ma Tau Chung Road	S		2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	770	0.368		656	0.313	
Ma Tau Chung Road	S		2	A	3.7	0	0	0	0%	0%	1	2125	0	2125	2125	0	0	781	0.368		665	0.313	
Pedestrian Crossing			5p	B		Min. Green Time = 14 Gm + 11 Fm = 25s																	
			6p	B		Min. Green Time = 20 Gm + 12 Fm = 32s																	
			7p	C,A		Min. Green Time = 7 Gm + 9 Fm = 16s																	

Notes:

*Only franchsied buses are allowed to left turn

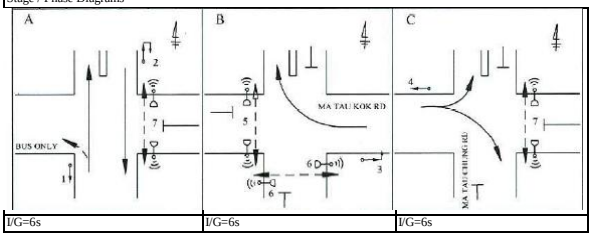
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.526
L (sec)	15
C (sec)	130
y pract.	0.796
R.C. (%)	51%

P.M. Check Phase	
εy	0.460
L (sec)	15
C (sec)	118
y pract.	0.786
R.C. (%)	71%

Stage / Phase Diagrams



I/G=6s I/G=6s I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(P) Ma Tau Wai Road / Farm Road / Tam Kung Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Ma Tau Wai Road	N	↰↑	2	A	3.6	15	0	0	47%	29%	1	2115	6375	2020	0	6280	6315	518	0.256		511	0.249	
Ma Tau Wai Road	N	↑	2	A	3.4	0	0	0	0%	0%	1	2095	0	2095	0	0	0	537	0.256		521	0.249	
Ma Tau Wai Road	N	↑	2	A	4.1	0	0	0	0%	0%	1	2165	0	2165	0	0	0	555	0.256		538	0.249	
Tam Kung Road	S	↓	3	B	3.5	0	0	1	0%	0%	0.5	982.5	3087.5	982.5	0	3087.5	3087.5	60	0.062	0.062	40	0.040	0.040
Tam Kung Road	S	↓	3	B	3.5	0	0	0	0%	0%	1	2105	0	2105	0	0	0	130	0.062		85	0.040	
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	1	0%	0%	1	1975	6215	1975	0	6215	6215	623	0.315	0.315	526	0.266	0.266
Ma Tau Wai Road	S	↓	1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	667	0.315		563	0.266	
Ma Tau Wai Road	S	↓	1	A	3.7	0	0	0	0%	0%	1	2125	0	2125	0	0	0	670	0.315		566	0.266	
Pedestrian Crossing			4p	B,C	Min. Green Time = 12 Gm + 8 Fm = 20s																		
			5p	C	Min. Green Time = 15 Gm + 11 Fm = 26s																		
			6p	A,B	Min. Green Time = 8 Gm + 6 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

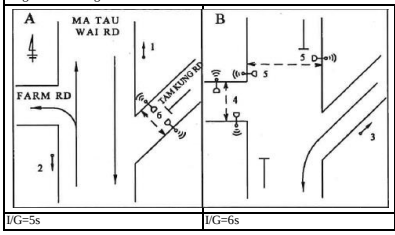
1960(1655) ↓ 190(125) ↙

↰ 245(150) ↑ 1365(1420)

A.M. Check Phase	
εy	0.377
L (sec)	9
C (sec)	130
y pract.	0.838
R.C. (%)	122%

P.M. Check Phase	
εy	0.307
L (sec)	9
C (sec)	120
y pract.	0.833
R.C. (%)	171%

Stage / Phase Diagrams



I/G=5s I/G=6s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(Q) Shing kai Road/ Sung Wong Toi Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Sung Wong Toi Road	E		2	A	3.7	20.0	0	1	100%	100%	1	1985	6235	1845	1845	5870	5870	303	0.164		382	0.207	
Sung Wong Toi Road	E		2	A	3.7	23.0	31	0	53% / 47%	54% / 46%	1	2125	0	2010	2010	0	0	330	0.164	0.164	416	0.207	0.207
Sung Wong Toi Road	E		2	A	3.7	0.0	28	0	100%	100%	1	2125	0	2015	2015	0	0	331	0.164		417	0.207	
Shing kai Road	N		3	C	3.3	16.0	0	1	87%	72%	1	1945	4030	1800	1820	3885	3905	419	0.233	0.233	382	0.210	0.210
Shing kai Road	N		3	C	3.3	0.0	0	0	0%	0%	1	2085	0	2085	2085	0	0	486	0.233		438	0.210	
Shing kai Road	S		1	B	3.8	0.0	0	1	0%	0%	1	1995	6265	1995	1995	6140	6135	383	0.192	0.192	294	0.148	0.148
Shing kai Road	S		1	B	3.8	0.0	50	0	87%	97%	1	2135	0	2080	2075	0	0	400	0.192		306	0.148	
Shing kai Road	S		1	B	3.8	0.0	45	0	100%	100%	1	2135	0	2065	2065	0	0	397	0.192		305	0.148	
Pedestrian crossing		<---->	4p	C																			
			5p	A,C																			
			6p	B																			
			7p	B,C																			
			8p	A																			
			9p	A,B																			

Min. Crossing Time = 35Gm + 7FGm =42s

Min. Crossing Time = 72Gm + 10FGm =82s

Min. Crossing Time = 7Gm + 12FGm =15s

Min. Crossing Time = 55Gm + 18FGm =73s

Min. Crossing Time = 17Gm + 7FGm =24s

Min. Crossing Time = 50Gm + 6FGm =56s

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

745(600) 435(305)

480(605)

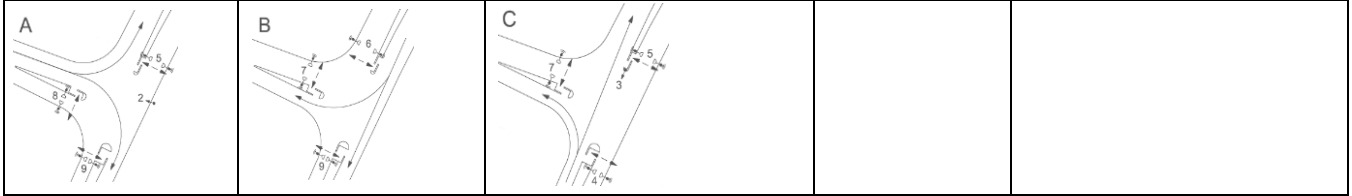
485(610)

365(275) 540(545)

AM Peak Check Phase	
εy	0.590
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	36%

PM Peak Check Phase	
εy	0.565
L (sec)	12
C (sec)	110
y pract.	0.802
R.C. (%)	42%

Stage / Phase Diagrams



I/G = 5 I/G = 5 I/G = 5

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(R) Mok Cheong Street / To Kwa Wan Road**
Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
Mok Cheong Street	E		2	B	3.5	27.5	18	1	70% / 30%	72% / 28%	1	1965	4070	1850	1850	3680	3680	314	0.170	0.170	297	0.160	0.160
Mok Cheong Street	E		2	B	3.5	0.0	10	0	100%	100%	1	2105	0	1830	1830	0	0	311	0.170		293	0.160	
To Kwa Wan Road	N		1	A	3.5	0.0	0	1	0%	0%	1	1965	4120	1965	1965	4120	4120	324	0.165		293	0.149	0.230
To Kwa Wan Road	N		1	A	4.0	0.0	0	0	0%	0%	1	2155	0	2155	2155	0	0	356	0.165		322	0.149	
To Kwa Wan Road	S		1	A	3.0	0.0	0	1	0%	0%	1	1915	3970	1915	1915	3970	3970	444	0.232	0.232	441	0.230	
To Kwa Wan Road	S		1	A	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	476	0.232		474	0.230	
Pedestrian crossing		<---->	3p	A		Min. Crossing Time = 29Gm + 11FGm =40s																	

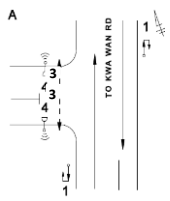
Notes:

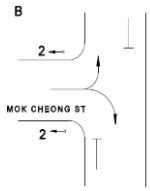
Traffic Flow (pcu / hr) AM(PM) Peak

AM Peak Check Phase	
cy	0.402
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	103%

PM Peak Check Phase	
cy	0.391
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	105%

Stage / Phase Diagrams





I/G = 6 I/G = 6

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(S) Ma Tau Kok Road / To Kwa Wan Road**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	100%	100%	1	1965	6175	1785	1785	5955	5940	328	0.184		323	0.181	
To Kwa Wan Road	N		1	A	3.5	20.0	0	0	24%	36%	1	2105	0	2065	2050	0	0	380	0.184		371	0.181	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	387	0.184		381	0.181	
To Kwa Wan Road	S		2	A	3.5	25.0	0	1	10%	10%	1	1965	4070	1955	1955	4060	4060	722	0.369	0.370	657	0.336	0.336
To Kwa Wan Road	S		2	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	778	0.370		708	0.336	
Pedestrian crossing			3p	B		Min. Crossing Time = 8Gm + 8FGm =16s																	
			4p	B		Min. Crossing Time = 5Gm + 8FGm =13s																	

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

1425(1300)

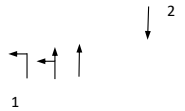
420(455) 675(620)

AM Peak Check Phase	
εy	0.370
L (sec)	21
C (sec)	130
y pract.	0.755
R.C. (%)	104%

PM Peak Check Phase	
εy	0.336
L (sec)	21
C (sec)	130
y pract.	0.755
R.C. (%)	124%

Stage / Phase Diagrams

A



B

I/G = 3

I/G = 3+16

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(T) San Shan Road / To Kwa Wan Road**

Description: **2036 Design Flow**

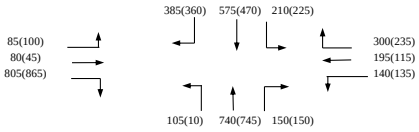
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	AM Peak Flow (pcu/hr)	AM Peak y Value	AM Peak Critical y	PM Peak Flow (pcu/hr)	PM Peak y Value	PM Peak Critical y
San Shan Road	E		2	B	3.5	10.0	0	1	100%	100%	0.9	1768.5	5978.5	1540	1540	5535	5525	85	0.055		100	0.065	
San Shan Road	E		2	B	3.5	16.0	27	0	0% / 82%	0% / 90%	1	2105	0	2015	2005	0	0	446	0.221	0.222	458	0.228	0.228
San Shan Road	E		2	B	3.5	0.0	24	0	100%	100%	1	2105	0	1980	1980	0	0	439	0.222		452	0.228	
To Kwa Wan Road	N		1	A	3.5	15.0	0	1	45%	5%	1	1965	8280	1880	1880	8075	8075	232	0.123		210	0.112	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	259	0.123		236	0.112	
To Kwa Wan Road	N		1	A	3.5	0.0	0	0	0%	0%	1	2105	0	2105	2105	0	0	259	0.123		236	0.112	
To Kwa Wan Road	N		1	A	3.5	0.0	25	0	61%	67%	1	2105	0	1985	1985	0	0	245	0.123	0.123	223	0.112	0.112
San Ma Tau Street	W		4	D	3.4	0.0	24	0	100%	100%	1	2095	4050	1970	1970	3790	3790	156	0.079		122	0.062	
San Ma Tau Street	W		4	D	3.4	0.0	20	1	100%	100%	1	1955	0	1820	1820	0	0	144	0.079	0.093	113	0.062	0.067
San Ma Tau Street	W		4	D	3.4	16.0	0	0	0%	17%	1	2095	0	2095	2060	0	0	195	0.093		138	0.067	
San Ma Tau Street	W		4	D	3.0	10.0	0	1	100%	100%	1	1915	4010	1665	1665	3760	3725	140	0.084		112	0.067	
To Kwa Wan Road	S		3	C	3.2	25.0	0	1	87%	100%	1	1935	6045	1840	1825	5950	5935	243	0.132		225	0.123	
To Kwa Wan Road	S		3	C	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	271	0.132		235	0.114	
To Kwa Wan Road	S		3	C	3.0	0.0	0	0	0%	0%	1	2055	0	2055	2055	0	0	271	0.132		235	0.114	
To Kwa Wan Road	S		3	C	3.0	0.0	30	0	100%	100%	1	2055	2055	1955	1955	1955	1955	385	0.197	0.197	360	0.184	0.184

Pedestrian crossing

5p	A	Min. Crossing Time = 5Gm + 9FGm =14s
6p	B,C,D	Min. Crossing Time = 8Gm + 15FGm =23s
7p	D	Min. Crossing Time = 5Gm + 7FGm =12s
8p	A,B,C	Min. Crossing Time = 5Gm + 11FGm =16s
9p	A,C,D	Min. Crossing Time = 5Gm + 9FGm =14s
10p	B,C,D	Min. Crossing Time = 5Gm + 6FGm =11s

Notes:

Traffic Flow (pcu / hr) AM(PM) Peak

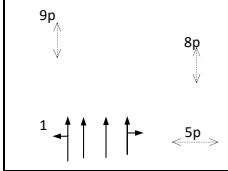


AM Peak Check Phase	
εy	0.635
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	18%

PM Peak Check Phase	
εy	0.592
L (sec)	22
C (sec)	130
y pract.	0.748
R.C. (%)	26%

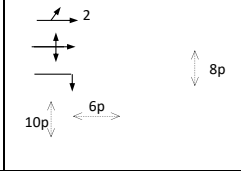
Stage / Phase Diagrams

A



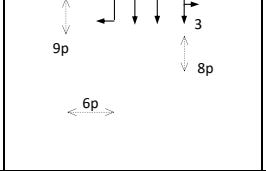
I/G = 6

B



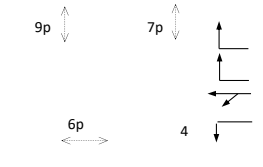
I/G = 6

C



I/G = 6

D



I/G = 8

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

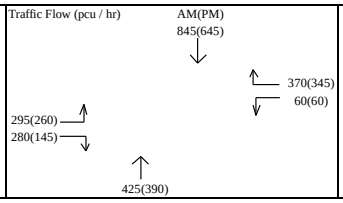
Junction: **(U) To Kwa Wan Road / Sheung Heung Road / Kwei Chow Street**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Sheung Heung Road	E		2	B	3.1	15	0	1	100%	100%	1	1925	3990	1750	0	3670	3670	141	0.080	0.080	124	0.071	0.071
Sheung Heung Road	E		2	B	3.1	20	0	0	100%	100%	1	2065	0	1920	0	0	0	154	0.080		136	0.071	
Sheung Heung Road	E		2	B	3.2	0	25	0	100%	100%	1	2075	4160	1960	0	3900	3900	141	0.072		73	0.037	
Sheung Heung Road	E		2	B	3.3	0	20	0	100%	100%	1	2085	0	1940	0	0	0	139	0.072		72	0.037	
To Kwa Wan Road	N		1	A	3.5	0	0	1	0%	0%	0.5	982.5	5142.5	982.5	0	5142.5	5142.5	81	0.083		75	0.076	
To Kwa Wan Road	N		1	A	3.6	0	0	0	0%	0%	1	2115	0	2115	0	0	0	175	0.083		160	0.076	
To Kwa Wan Road	N		1	A	2.9	0	0	0	0%	0%	1	2045	0	2045	0	0	0	169	0.083	0.163	155	0.076	
Kwei Chow Street	W		3	C	3.0	0	20	0	100%	100%	1	2055	0	1940	0	0	0	123	0.063	0.063	115	0.059	0.059
Kwei Chow Street	W		3	C	3.0	0	25	0	100%	100%	1	2055	0	1940	0	0	0	123	0.063		115	0.059	
Kwei Chow Street	W		3	C	3.0	20	30	0	0% / 100%	0% / 100%	1	2055	0	1955	0	0	0	124	0.063		116	0.059	
Kwei Chow Street	W		3	C	3.4	15	0	1	100%	100%	1	1955	6065	1775	0	7610	7610	60	0.034		60	0.034	
To Kwa Wan Road	S		1	A	3.0	0	0	1	0%	0%	0.5	957.5	5177.5	957.5	0	5177.5	5177.5	156	0.163		119	0.125	0.125
To Kwa Wan Road	S		1	A	3.8	0	0	0	0%	0%	1	2135	0	2135	0	0	0	348	0.163		266	0.125	
To Kwa Wan Road	S		1	A	3.3	0	0	0	0%	0%	1	2085	0	2085	0	0	0	340	0.163		260	0.125	
Pedestrian Crossing			4	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			5	C,A	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			6	B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			7	C	Min. Green Time = 05 Gm + 08 Fm = 13s																		

Notes:

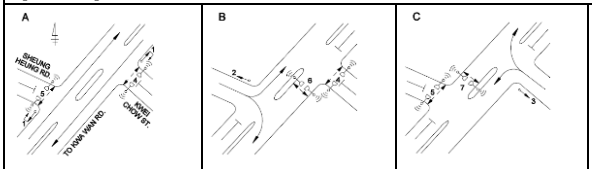
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.307
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	139%

P.M. Check Phase	
εy	0.255
L (sec)	20
C (sec)	108
y pract.	0.733
R.C. (%)	188%

Stage / Phase Diagrams



I/G= 7s | I/G= 8s | I/G= 8s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(V) Chatham Road North / San Lau Street**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Chatham Road North	N		1	A	4.0	15	0	1	1%	3%	1	2015	4170	2015	2010	4170	4165	478	0.237		470	0.234	
Chatham Road North	N		1	A	4.0	0	0	0	0%	0%	1	2155	0	2155	0	0	0	512	0.238		505	0.234	
San Lau Street	W		3	B	2.7	0	20	0	100%	100%	1	2025	0	1885	0	0	0	107	0.057	0.057	153	0.081	0.081
San Lau Street	W		3	B	3.5	0	25	0	100%	78%	1	2105	0	1985	0	0	0	113	0.057		163	0.081	
San Lau Street	W		3	B	4.2	0	0	1	0%	0%	1	2035	6165	2035	0	5905	5930	60	0.029		165	0.081	
Chatham Road North	S		2	A	4.7	0	0	1	0%	0%	1	2085	4260	2085	0	4260	4260	641	0.308	0.308	570	0.273	0.273
Chatham Road North	S		2	A	4.2	0	0	0	0%	0%	1	2175	0	2175	0	0	0	669	0.308		595	0.273	
Pedestrian Crossing			4	A	Min. Green Time = 12 Gm + 10 Fm = 22s																		
			5	B	Min. Green Time = 06 Gm + 08 Fm = 14s																		

Notes:

Traffic Flow (pcu / hr) AM(PM)

1310(1165)

220(280)

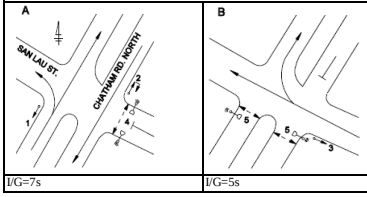
60(200)

5(15) 985(960)

A.M. Check Phase	
εy	0.364
L (sec)	10
C (sec)	90
y pract.	0.800
R.C. (%)	120%

P.M. Check Phase	
εy	0.354
L (sec)	10
C (sec)	108
y pract.	0.817
R.C. (%)	130%

Stage / Phase Diagrams



I/G=7s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

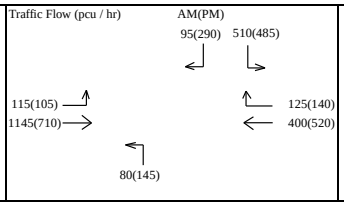
Junction: **(W) Fat Kwong Street / Shun Yung Street / Yan Fung Street**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m) Left	Radius (m) Right	Nearside 0/1	Pro. Turning (%) A.M.	Pro. Turning (%) P.M.	Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr) A.M.	Revised Saturation Flow (pcu/hr) P.M.	Total Revised Saturation Flow (pcu/hr) A.M.	Total Revised Saturation Flow (pcu/hr) P.M.	A.M. Peak Flow (pcu/hr)	A.M. Peak y Value	A.M. Peak Critical y	P.M. Peak Flow (pcu/hr)	P.M. Peak y Value	P.M. Peak Critical y
Fat Kwong Street	E		2	A	3.1	15	0	1	100%	100%	1	1925	1925	1750	1750	1750	1750	115	0.066		105	0.060	0.171
Fat Kwong Street	E		2	A	3.2	0	0	0	0%	0%	1	2075	4160	2075	2075	4160	4160	571	0.275		354	0.171	
Fat Kwong Street	E		2	A	3.3	0	0	0	0%	0%	1	2085	0	2085	2085	0	0	574	0.275	0.275	356	0.171	
Yan Fung Street	N		3	A	4.2	15	0	1	100%	100%	1	2035	2035	1850	1850	1850	1850	80	0.043		145	0.078	
Fat Kwong Street	W		1	B	3.1	0	20	0	72%	64%	1	2065	0	1960	1970	0	0	174	0.089	0.089	219	0.111	0.111
Fat Kwong Street	W		1	B	3.0	0	0	0	0%	0%	1	2055	0	2055	0	0	0	182	0.089		229	0.111	
Fat Kwong Street	W		1	B	2.9	0	0	1	0%	0%	1	1905	6025	1905	1905	5920	5930	169	0.089		212	0.111	
Shun Yung Street	S		4	C	3.2	15	0	1	100%	100%	1	1935	4000	1760	1760	3680	3680	289	0.164		371	0.211	
Shun Yung Street	S		4	C	3.1	20	20	0	70% / 30%	28% / 72%	1	2065	0	1920	1920	0	0	316	0.164	0.164	404	0.211	0.211
Pedestrian Crossing			5	B,C	Min. Green Time = 05 Gm + 07 Fm = 12s																		
			6	A,B	Min. Green Time = 05 Gm + 10 Fm = 15s																		
			7	B	Min. Green Time = 06 Gm + 11 Fm = 17s																		
			8	C	Min. Green Time = 05 Gm + 05 Fm = 10s																		
			9	C,A	Min. Green Time = 05 Gm + 08 Fm = 13s																		

Notes:

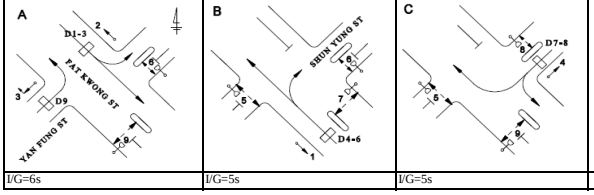
Traffic Flow (pcu / hr) AM(PM)



A.M. Check Phase	
εy	0.528
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	50%

P.M. Check Phase	
εy	0.493
L (sec)	13
C (sec)	108
y pract.	0.792
R.C. (%)	61%

Stage / Phase Diagrams



I/G=6s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

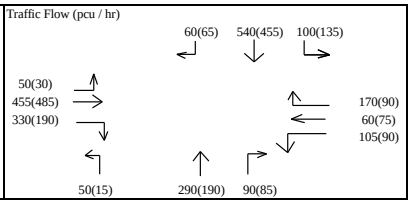
Junction: **(X) Hung Hom Road/ Fat Kwong Street Flyover/ Tai Wan Road East**

Description: **2036 Design Flow**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Fat Kwong Street Flyover	E		3	A	3.5	10	0	1	10%	6%	1	1965	1965	1935	1950	1935	1950	505	0.261	0.261	515	0.264	0.264
	E		3	A	3.3	0	19	0	100%	100%	1	2085	2085	1930	1930	1930	1930	275	0.142		210	0.109	
Hung Hom Road	N		1	B	3.4	8	0	1	100%	100%	1	1955	1955	1630	1630	1630	1630	50	0.031		15	0.009	
	N		1	B	3.4	0	0	0	0%	0%	1	1955	4050	1955	1955	4050	4050	229	0.117		196	0.100	
	N		1	B	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	246	0.117	0.117	210	0.100	
	N		1	B	3.7	0	15	0	100%	100%	1	2125	2125	1930	1930	1930	1930	90	0.047		85	0.044	0.100
Tai Wan Road East	W		4	C	4.0	0	12.5	0	74%	55%	1	2155	2155	1980	2025	1980	2025	230	0.116	0.116	165	0.081	0.081
	W		4	C	3.5	13	0	1	100%	100%	1	1965	1965	1755	1755	1755	1755	105	0.060		90	0.051	
Hung Hom Road	S		2	D	3.5	15	0	1	30%	43%	1	1965	4070	1910	1885	3980	3950	336	0.176	0.176	312	0.166	0.166
	S		2	D	3.5	0	15	0	16%	19%	1	2105	0	2070	2065	0	0	364	0.176		343	0.166	
Pedestrian crossing			5P	A,B,D	Min. Crossing Time = 6GM + 7FGM = 13s															*			*
			6P	C	Min. Crossing Time = 5GM + 6FGM = 11s																		
			7P	A,B,C	Min. Crossing Time = 5GM + 7FGM = 12s																		
			8P	D	Min. Crossing Time = 5GM + 9FGM = 14s																		
			9P	B,C,D	Min. Crossing Time = 5GM + 7FGM = 12s																		
			10P	A	Min. Crossing Time = 5GM + 9FGM = 14s																		

Notes:

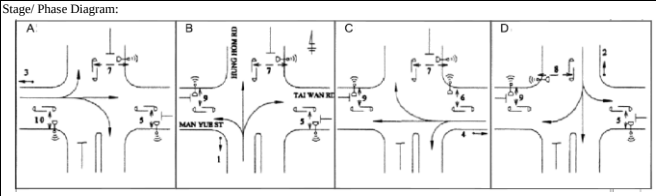
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.670
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	16%

P.M. Check Phase	
εy	0.611
L (sec)	18
C (sec)	130
y pract.	0.775
R.C. (%)	27%

Stage/ Phase Diagram:



I/G= 5s I/G=7s I/G=5s I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

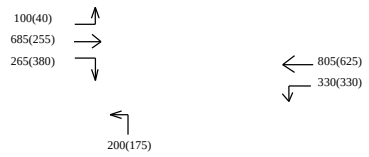
Junction: **(B) Tin Kwong Road / Kau Pui Lung Road**

Description: **2036 Design Flow (with Improvement)**

Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	E		1	A,B,C	2.8	8	0	1	13%	14%	0.8	1516	1516	1480	1475	1480	1475	785	0.530		295	0.200	
	E		2	B	2.8	0	12.5	0	100%	100%	1	2035	2035	1815	1815	1815	1815	265	0.146	0.146	380	0.209	0.209
Kau Pui Lung Road	N		3	C	4.6	25	0	1	100%	100%	0.7	1453	1453	1370	1370	1370	1370	200	0.146		175	0.128	
Tin Kwong Road	W		5	A,C	3.0	0	0	0	0%	0%	1	2055	2055	2055	2055	2055	2055	805	0.392		625	0.304	
	W		4	C	3.0	5	0	1	100%	100%	1	1915	1915	1475	1475	1475	1475	330	0.224	0.224	330	0.224	0.224
Pedestrian crossing			6p	A		Min. Crossing Time = 8GM + 8FGM = 16s																	

Notes:

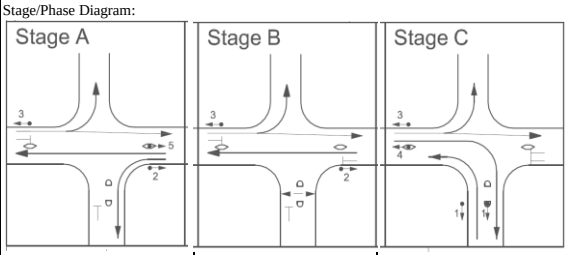
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.370
L (sec)	31
C (sec)	130
y pract.	0.685
R.C. (%)	**85%**

P.M. Check Phase	
εy	0.433
L (sec)	31
C (sec)	118
y pract.	0.664
R.C. (%)	**53%**

Stage/Phase Diagram:



I/G=7s | I/G=7s+16s | I/G=5s

TRAFFIC SIGNALS CALCULATION Job No: 22101HK **CTA Consultants Ltd.**

Junction: **(C) Tin Kwong Road / Ma Tau Wai Road / Ma Hang Chung Road**

Description: **2036 Design Flow (with Improvement)**

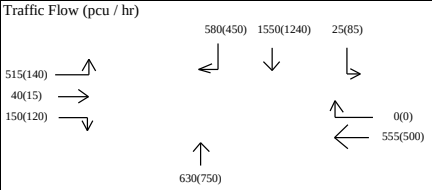
Approach	Direction	Movement notation	Phase	Stage	Width (m)	Radius (m)		Nearside 0/1	Pro. Turning (%)		Site Factor	Saturation Flow (pcu/hr)	Total Saturation Flow (pcu/hr)	Revised Saturation Flow (pcu/hr)		Total Revised Saturation Flow (pcu/hr)		A.M. Peak			P.M. Peak		
						Left	Right		A.M.	P.M.				A.M.	P.M.	A.M.	P.M.	Flow (pcu/hr)	y Value	Critical y	Flow (pcu/hr)	y Value	Critical y
Tin Kwong Road	E		6,10	B,C	2.9	10	0	1	100%	100%	1	1905	1905	1655	1655	1655	1655	515	0.311		140	0.085	
	E		6	C	2.9	0	15	0	79%	89%	1	2045	2045	1895	1880	1895	1880	190	0.100	0.100	135	0.072	0.072
Ma Tau Wai Road	N		1	A	3.4	0	0	1	0%	0%	1	1955	6105	1955	1955	6105	6105	202	0.103	0.103	240	0.123	0.123
	N		1	A	3.4	0	0	0	0%	0%	1	2095	0	2095	2095	0	0	216	0.103		257	0.123	
	N		1	A	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	212	0.103		252	0.123	
Ma Hang Chung Road	W		3	D	3.7	0	15	0	0%	0%	1	2125	0	2125	2125	0	0	287	0.135	0.135	259	0.122	0.122
	W		3	D	3.7	0	0	1	0%	0%	1	1985	4110	1985	1985	4110	4110	268	0.135		241	0.122	
Ma Tau Wai Road	S		2,7	A,B	3.0	8	0	1	5%	21%	1	1915	6025	1895	1840	6005	5950	497	0.262		410	0.223	
	S		2,7	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		2,7	A,B	3.0	0	0	0	0%	0%	1	2055	0	2055	2055	0	0	539	0.262		458	0.223	
	S		7	B	3.0	0	15	0	100%	100%	1	2055	2055	1870	1870	1870	1870	580	0.310	0.310	450	0.241	0.241

Pedestrian crossing

4p	Min. Crossing Time = 6GM + 11FGM = 17s
5p	Min. Crossing Time = 5GM + 8FGM = 14s
8p	Min. Crossing Time = 75M + 7FGM = 12s
9p	Min. Crossing Time = 5GM + 8FGM = 13s
11p	Min. Crossing Time = 7GM + 11FGM = 18s

Notes:

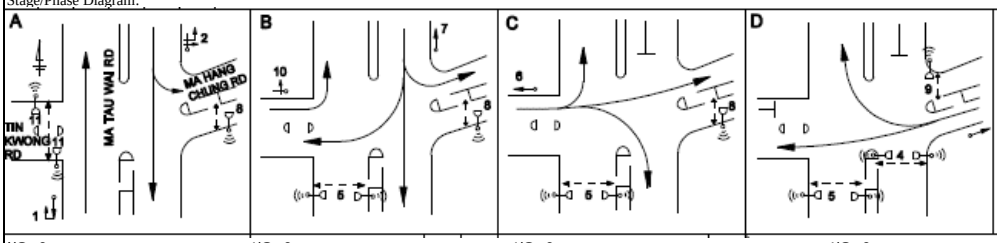
Traffic Flow (pcu / hr)



A.M. Check Phase	
εy	0.649
L (sec)	20
C (sec)	120
y pract.	0.750
R.C. (%)	**16%**

P.M. Check Phase	
εy	0.557
L (sec)	20
C (sec)	120
y pract.	0.750
R.C. (%)	**35%**

Stage/Phase Diagram:



I/G=6s I/G=6s I/G=6s I/G=6s

Junctions 8

PICADY 8 - Priority Intersection Module

Version: 8.0.5.523 [19102,19/06/2015]
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Filename: 22101HK_Pri Jn.arc8
Path: \\PROJSRV\Project\CTA Consultants Limited\CTA - Project\22101HK (wkk) - URA (CBS-2 KC) Kau Pui Lung Rd Chi Kiang St Dev Scheme\Cal\TIA\2022-10-13
Report generation date: 17/10/2022 16:54:53

» (Default Analysis Set) - 2022 Existing, AM
» (Default Analysis Set) - 2022 Existing, PM
» (Default Analysis Set) - 2036 Reference, AM
» (Default Analysis Set) - 2036 Reference, PM
» (Default Analysis Set) - 2036 Design, AM
» (Default Analysis Set) - 2036 Design, PM

Summary of junction performance

	AM				PM			
	Queue (PCU)	Delay (s)	RFC	LOS	Queue (PCU)	Delay (s)	RFC	LOS
	A1 - 2022 Existing							
Junction D - Stream B-AC	0.00	0.00	0.00	A	0.00	0.00	0.00	A
Junction D - Stream C-A	-	-	-	-	-	-	-	-
Junction D - Stream C-B	0.12	7.08	0.11	A	0.12	7.09	0.11	A
Junction D - Stream A-B	-	-	-	-	-	-	-	-
Junction D - Stream A-C	-	-	-	-	-	-	-	-
Junction F - Stream B-AC	0.31	6.66	0.24	A	0.26	6.35	0.20	A
Junction F - Stream C-A	-	-	-	-	-	-	-	-
Junction F - Stream C-B	0.45	8.69	0.31	A	0.30	7.82	0.23	A
Junction F - Stream A-B	-	-	-	-	-	-	-	-
Junction F - Stream A-C	-	-	-	-	-	-	-	-
Junction L - Stream B-AC	0.49	10.66	0.33	B	0.34	8.34	0.25	A
Junction L - Stream C-A	-	-	-	-	-	-	-	-
Junction L - Stream C-B	0.29	9.02	0.22	A	0.11	7.46	0.10	A
Junction L - Stream A-B	-	-	-	-	-	-	-	-
Junction L - Stream A-C	-	-	-	-	-	-	-	-
	A1 - 2036 Design							
Junction D - Stream B-AC	0.00	0.00	0.00	A	0.00	0.00	0.00	A
Junction D - Stream C-A	-	-	-	-	-	-	-	-
Junction D - Stream C-B	0.51	10.90	0.34	B	0.37	10.22	0.27	B
Junction D - Stream A-B	-	-	-	-	-	-	-	-
Junction D - Stream A-C	-	-	-	-	-	-	-	-
Junction F - Stream B-AC	0.69	8.57	0.41	A	0.48	7.52	0.32	A
Junction F - Stream C-A	-	-	-	-	-	-	-	-
Junction F - Stream C-B	3.56	27.80	0.78	D	2.34	20.24	0.70	C
Junction F - Stream A-B	-	-	-	-	-	-	-	-
Junction F - Stream A-C	-	-	-	-	-	-	-	-
Junction L - Stream B-AC	1.33	21.90	0.57	C	0.39	10.16	0.28	B

Junction L - Stream C-A	-	-	-	-	-	-	-	-
Junction L - Stream C-B	1.75	23.17	0.64	C	0.08	8.15	0.07	A
Junction L - Stream A-B	-	-	-	-	-	-	-	-
Junction L - Stream A-C	-	-	-	-	-	-	-	-
	A1 - 2036 Reference							
Junction D - Stream B-AC	0.00	0.00	0.00	A	0.00	0.00	0.00	A
Junction D - Stream C-A	-	-	-	-	-	-	-	-
Junction D - Stream C-B	0.29	9.20	0.23	A	0.26	9.27	0.20	A
Junction D - Stream A-B	-	-	-	-	-	-	-	-
Junction D - Stream A-C	-	-	-	-	-	-	-	-
Junction F - Stream B-AC	0.49	7.53	0.33	A	0.33	6.71	0.25	A
Junction F - Stream C-A	-	-	-	-	-	-	-	-
Junction F - Stream C-B	1.53	15.22	0.61	C	1.49	14.99	0.60	B
Junction F - Stream A-B	-	-	-	-	-	-	-	-
Junction F - Stream A-C	-	-	-	-	-	-	-	-
Junction L - Stream B-AC	1.29	21.36	0.57	C	0.39	10.11	0.28	B
Junction L - Stream C-A	-	-	-	-	-	-	-	-
Junction L - Stream C-B	1.73	22.88	0.64	C	0.08	8.13	0.07	A
Junction L - Stream A-B	-	-	-	-	-	-	-	-
Junction L - Stream A-C	-	-	-	-	-	-	-	-

Values shown are the maximum values over all time segments. Delay is the maximum value of average delay per arriving vehicle.

"D1 - 2022 Existing, AM " model duration: 8:30 - 10:00
"D2 - 2022 Existing, PM" model duration: 17:30 - 19:00
"D3 - 2036 Reference, AM" model duration: 8:30 - 10:00
"D4 - 2036 Reference, PM" model duration: 17:30 - 19:00
"D5 - 2036 Design, AM" model duration: 8:30 - 10:00
"D6 - 2036 Design, PM" model duration: 17:30 - 19:00

Run using Junctions 8.0.5.523 at 17/10/2022 16:54:44

File summary

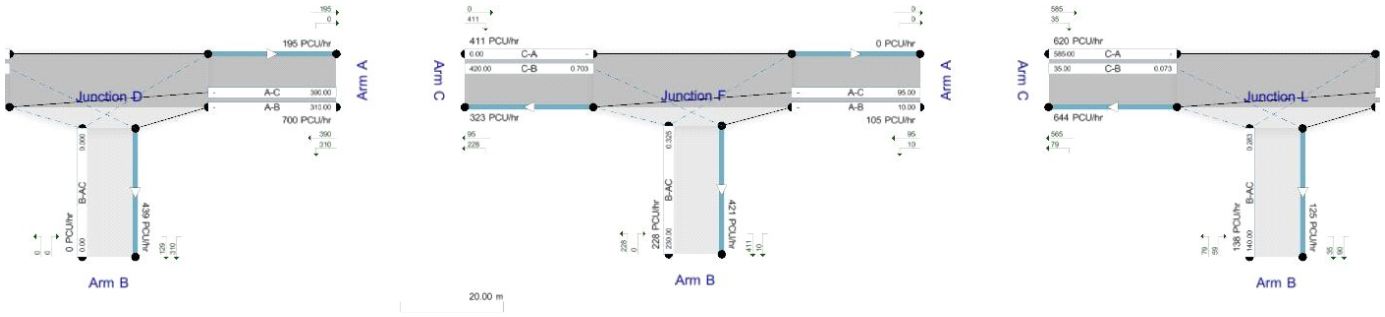
Title	Jcn C
Location	
Site Number	
Date	3/6/2019
Version	
Status	(new file)
Identifier	
Client	
Jobnumber	
Enumerator	user
Description	

Analysis Options

Vehicle Length (m)	Do Queue Variations	Calculate Residual Capacity	Residual Capacity Criteria Type	RFC Threshold	Average Delay Threshold (s)	Queue Threshold (PCU)
5.75			N/A	0.85	36.00	20.00

Units

Distance Units	Speed Units	Traffic Units Input	Traffic Units Results	Flow Units	Average Delay Units	Total Delay Units	Rate Of Delay Units
m	kph	PCU	PCU	perHour	s	-Min	perMin



Showing modelled flow through junction (PCU/hr).
Streams (upstreams) show Total Demand (PCU/hr); Streams (downstreams) show RFC ()
Time Segment: (08:30-08:45)
Showing Analysis Set "A1 "; Demand Set "D1 - 2022 Existing, AM "

The junction diagram reflects the last run of ARCADY.

(Default Analysis Set) - 2022 Existing, AM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2022 Existing, AM	2022 Existing	AM		FLAT	08:30	10:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	7.08	A
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	7.72	A
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	9.99	A

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	200.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	250.00	100.000
F	A	FLAT	✓	75.00	100.000
F	B	FLAT	✓	170.00	100.000
F	C	FLAT	✓	185.00	100.000
L	A	FLAT	✓	460.00	100.000
L	B	FLAT	✓	165.00	100.000
L	C	FLAT	✓	550.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	50.000	150.000
	B	0.000	0.000	0.000
	C	190.000	60.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.25	0.75
	B	0.33	0.33	0.33
	C	0.76	0.24	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	15.000	60.000
	B	0.000	0.000	170.000
	C	0.000	185.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.20	0.80
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	125.000	335.000
	B	100.000	0.000	65.000
	C	435.000	115.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.27	0.73
	B	0.61	0.00	0.39
	C	0.79	0.21	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.11	7.08	0.12	A
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.24	6.66	0.31	A
F	C-A	-	-	-	-
F	C-B	0.31	8.69	0.45	A
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.33	10.66	0.49	B
L	C-A	-	-	-	-
L	C-B	0.22	9.02	0.29	A
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (08:30-08:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.32	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	59.53	0.00	568.39	0.106	0.12	7.069	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	168.75	0.00	710.51	0.239	0.31	6.630	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	183.24	0.00	599.12	0.309	0.44	8.621	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	163.08	0.00	503.01	0.328	0.48	10.533	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	113.86	0.00	514.16	0.224	0.28	8.969	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

Main results: (08:45-09:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.23	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	568.39	0.106	0.12	7.080	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	169.99	0.00	710.51	0.239	0.31	6.659	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	184.99	0.00	599.12	0.309	0.44	8.692	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	164.98	0.00	502.69	0.328	0.48	10.658	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	114.99	0.00	514.16	0.224	0.29	9.018	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

Main results: (09:00-09:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.23	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	568.39	0.106	0.12	7.080	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	170.00	0.00	710.51	0.239	0.31	6.659	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	185.00	0.00	599.12	0.309	0.44	8.692	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	164.99	0.00	502.69	0.328	0.49	10.660	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	115.00	0.00	514.16	0.224	0.29	9.018	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

Main results: (09:15-09:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.23	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	568.39	0.106	0.12	7.080	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	170.00	0.00	710.51	0.239	0.31	6.659	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	185.00	0.00	599.12	0.309	0.45	8.692	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	165.00	0.00	502.69	0.328	0.49	10.660	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	115.00	0.00	514.16	0.224	0.29	9.018	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

Main results: (09:30-09:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.23	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	568.39	0.106	0.12	7.080	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	170.00	0.00	710.51	0.239	0.31	6.659	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	185.00	0.00	599.12	0.309	0.45	8.692	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	165.00	0.00	502.69	0.328	0.49	10.660	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	115.00	0.00	514.16	0.224	0.29	9.018	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

Main results: (09:45-10:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	629.23	0.000	0.00	0.000	A
D	C-A	190.00	190.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	568.39	0.106	0.12	7.080	A
D	A-B	50.00	50.00	0.00	-	-	-	-	-
D	A-C	150.00	150.00	0.00	-	-	-	-	-
F	B-AC	170.00	170.00	0.00	710.51	0.239	0.31	6.659	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	185.00	185.00	0.00	599.12	0.309	0.45	8.692	A
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	60.00	60.00	0.00	-	-	-	-	-
L	B-AC	165.00	165.00	0.00	502.69	0.328	0.49	10.660	B
L	C-A	435.00	435.00	0.00	-	-	-	-	-
L	C-B	115.00	115.00	0.00	514.16	0.224	0.29	9.018	A
L	A-B	125.00	125.00	0.00	-	-	-	-	-
L	A-C	335.00	335.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2022 Existing, PM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2022 Existing, PM	2022 Existing	PM		FLAT	17:30	19:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	7.09	A
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	7.07	A
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	8.10	A

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	205.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	200.00	100.000
F	A	FLAT	✓	50.00	100.000
F	B	FLAT	✓	145.00	100.000
F	C	FLAT	✓	140.00	100.000
L	A	FLAT	✓	340.00	100.000
L	B	FLAT	✓	145.00	100.000
L	C	FLAT	✓	405.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	80.000	125.000
	B	0.000	0.000	0.000
	C	140.000	60.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.39	0.61
	B	0.33	0.33	0.33
	C	0.70	0.30	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	10.000	40.000
	B	0.000	0.000	145.000
	C	0.000	140.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.20	0.80
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	60.000	280.000
	B	70.000	0.000	75.000
	C	350.000	55.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.18	0.82
	B	0.48	0.00	0.52
	C	0.86	0.14	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.11	7.09	0.12	A
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.20	6.35	0.26	A
F	C-A	-	-	-	-
F	C-B	0.23	7.82	0.30	A
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.25	8.34	0.34	A
L	C-A	-	-	-	-
L	C-B	0.10	7.46	0.11	A
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (17:30-17:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.68	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	59.53	0.00	567.53	0.106	0.12	7.081	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	143.99	0.00	711.83	0.204	0.25	6.328	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	138.80	0.00	600.39	0.233	0.30	7.779	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	143.67	0.00	576.51	0.252	0.33	8.293	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	54.55	0.00	537.32	0.102	0.11	7.451	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

Main results: (17:45-18:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.59	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	567.53	0.106	0.12	7.092	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	145.00	0.00	711.83	0.204	0.25	6.350	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	139.99	0.00	600.39	0.233	0.30	7.819	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	144.99	0.00	576.40	0.252	0.33	8.344	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	55.00	0.00	537.32	0.102	0.11	7.463	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

Main results: (18:00-18:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.59	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	567.53	0.106	0.12	7.092	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	145.00	0.00	711.83	0.204	0.26	6.350	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	140.00	0.00	600.39	0.233	0.30	7.819	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	145.00	0.00	576.40	0.252	0.33	8.344	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	55.00	0.00	537.32	0.102	0.11	7.463	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

Main results: (18:15-18:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.59	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	567.53	0.106	0.12	7.092	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	145.00	0.00	711.83	0.204	0.26	6.350	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	140.00	0.00	600.39	0.233	0.30	7.819	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	145.00	0.00	576.40	0.252	0.34	8.344	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	55.00	0.00	537.32	0.102	0.11	7.463	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

Main results: (18:30-18:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.59	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	567.53	0.106	0.12	7.092	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	145.00	0.00	711.83	0.204	0.26	6.350	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	140.00	0.00	600.39	0.233	0.30	7.819	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	145.00	0.00	576.40	0.252	0.34	8.344	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	55.00	0.00	537.32	0.102	0.11	7.463	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

Main results: (18:45-19:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	636.59	0.000	0.00	0.000	A
D	C-A	140.00	140.00	0.00	-	-	-	-	-
D	C-B	60.00	60.00	0.00	567.53	0.106	0.12	7.092	A
D	A-B	80.00	80.00	0.00	-	-	-	-	-
D	A-C	125.00	125.00	0.00	-	-	-	-	-
F	B-AC	145.00	145.00	0.00	711.83	0.204	0.26	6.350	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	140.00	140.00	0.00	600.39	0.233	0.30	7.819	A
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	40.00	40.00	0.00	-	-	-	-	-
L	B-AC	145.00	145.00	0.00	576.40	0.252	0.34	8.344	A
L	C-A	350.00	350.00	0.00	-	-	-	-	-
L	C-B	55.00	55.00	0.00	537.32	0.102	0.11	7.463	A
L	A-B	60.00	60.00	0.00	-	-	-	-	-
L	A-C	280.00	280.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2036 Reference, AM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Reference, AM	2036 Reference	AM		FLAT	08:30	10:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	9.20	A
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	12.21	B
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	22.21	C

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	560.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	275.00	100.000
F	A	FLAT	✓	30.00	100.000
F	B	FLAT	✓	235.00	100.000
F	C	FLAT	✓	365.00	100.000
L	A	FLAT	✓	885.00	100.000
L	B	FLAT	✓	220.00	100.000
L	C	FLAT	✓	830.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	155.000	405.000
	B	0.000	0.000	0.000
	C	160.000	115.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.28	0.72
	B	0.33	0.33	0.33
	C	0.58	0.42	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	15.000	15.000
	B	0.000	0.000	235.000
	C	0.000	365.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.50	0.50
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	380.000	505.000
	B	115.000	0.000	105.000
	C	555.000	275.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.43	0.57
	B	0.52	0.00	0.48
	C	0.67	0.33	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.23	9.20	0.29	A
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.33	7.53	0.49	A
F	C-A	-	-	-	-
F	C-B	0.61	15.22	1.53	C
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.57	21.36	1.29	C
L	C-A	-	-	-	-
L	C-B	0.64	22.88	1.73	C
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (08:30-08:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.62	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	113.84	0.00	506.25	0.227	0.29	9.148	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	233.06	0.00	713.21	0.330	0.49	7.468	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	359.07	0.00	601.40	0.607	1.48	14.528	B
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	215.10	0.00	390.62	0.563	1.23	20.002	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	268.44	0.00	432.16	0.636	1.64	21.233	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

Main results: (08:45-09:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.37	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	114.99	0.00	506.25	0.227	0.29	9.200	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	234.99	0.00	713.21	0.330	0.49	7.527	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	364.88	0.00	601.40	0.607	1.51	15.200	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.83	0.00	388.54	0.566	1.27	21.288	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	274.79	0.00	432.16	0.636	1.69	22.794	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

Main results: (09:00-09:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.37	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	115.00	0.00	506.25	0.227	0.29	9.200	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	235.00	0.00	713.21	0.330	0.49	7.527	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	364.96	0.00	601.40	0.607	1.52	15.212	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.95	0.00	388.47	0.566	1.28	21.334	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	274.93	0.00	432.16	0.636	1.71	22.848	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

Main results: (09:15-09:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.37	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	115.00	0.00	506.25	0.227	0.29	9.200	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	235.00	0.00	713.21	0.330	0.49	7.527	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	364.98	0.00	601.40	0.607	1.53	15.218	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.97	0.00	388.45	0.566	1.29	21.349	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	274.96	0.00	432.16	0.636	1.72	22.869	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

Main results: (09:30-09:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.37	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	115.00	0.00	506.25	0.227	0.29	9.200	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	235.00	0.00	713.21	0.330	0.49	7.527	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	364.99	0.00	601.40	0.607	1.53	15.221	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.98	0.00	388.44	0.566	1.29	21.355	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	274.98	0.00	432.16	0.636	1.73	22.877	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

Main results: (09:45-10:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.37	0.000	0.00	0.000	A
D	C-A	160.00	160.00	0.00	-	-	-	-	-
D	C-B	115.00	115.00	0.00	506.25	0.227	0.29	9.200	A
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	405.00	405.00	0.00	-	-	-	-	-
F	B-AC	235.00	235.00	0.00	713.21	0.330	0.49	7.527	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	365.00	364.99	0.00	601.40	0.607	1.53	15.221	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	15.00	15.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.99	0.00	388.43	0.566	1.29	21.360	C
L	C-A	555.00	555.00	0.00	-	-	-	-	-
L	C-B	275.00	274.98	0.00	432.16	0.636	1.73	22.883	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	505.00	505.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2036 Reference, PM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Reference, PM	2036 Reference	PM		FLAT	17:30	19:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	9.27	A
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	12.28	B
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	9.72	A

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	665.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	270.00	100.000
F	A	FLAT	✓	55.00	100.000
F	B	FLAT	✓	175.00	100.000
F	C	FLAT	✓	360.00	100.000
L	A	FLAT	✓	650.00	100.000
L	B	FLAT	✓	140.00	100.000
L	C	FLAT	✓	615.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	310.000	355.000
	B	0.000	0.000	0.000
	C	170.000	100.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.47	0.53
	B	0.33	0.33	0.33
	C	0.63	0.37	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	10.000	45.000
	B	0.000	0.000	175.000
	C	0.000	360.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.18	0.82
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	90.000	560.000
	B	60.000	0.000	80.000
	C	580.000	35.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.14	0.86
	B	0.43	0.00	0.57
	C	0.94	0.06	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.20	9.27	0.26	A
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.25	6.71	0.33	A
F	C-A	-	-	-	-
F	C-B	0.60	14.99	1.49	B
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.28	10.11	0.39	B
L	C-A	-	-	-	-
L	C-B	0.07	8.13	0.08	A
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (17:30-17:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.34	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	98.98	0.00	488.12	0.205	0.25	9.227	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	173.71	0.00	711.53	0.246	0.32	6.677	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	354.24	0.00	600.13	0.600	1.44	14.329	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	138.45	0.00	496.06	0.282	0.39	10.025	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	34.69	0.00	477.50	0.073	0.08	8.124	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

Main results: (17:45-18:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.12	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	99.99	0.00	488.12	0.205	0.26	9.274	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	174.99	0.00	711.53	0.246	0.32	6.708	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	359.89	0.00	600.13	0.600	1.47	14.964	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	139.99	0.00	495.99	0.282	0.39	10.112	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	477.50	0.073	0.08	8.135	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

Main results: (18:00-18:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.12	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	100.00	0.00	488.12	0.205	0.26	9.274	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	175.00	0.00	711.53	0.246	0.33	6.708	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	359.96	0.00	600.13	0.600	1.48	14.979	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	495.99	0.282	0.39	10.112	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	477.50	0.073	0.08	8.135	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

Main results: (18:15-18:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.12	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	100.00	0.00	488.12	0.205	0.26	9.274	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	175.00	0.00	711.53	0.246	0.33	6.708	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	359.98	0.00	600.13	0.600	1.48	14.982	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	495.99	0.282	0.39	10.112	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	477.50	0.073	0.08	8.135	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

Main results: (18:30-18:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.12	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	100.00	0.00	488.12	0.205	0.26	9.274	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	175.00	0.00	711.53	0.246	0.33	6.708	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	359.99	0.00	600.13	0.600	1.49	14.984	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	495.99	0.282	0.39	10.112	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	477.50	0.073	0.08	8.135	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

Main results: (18:45-19:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	554.12	0.000	0.00	0.000	A
D	C-A	170.00	170.00	0.00	-	-	-	-	-
D	C-B	100.00	100.00	0.00	488.12	0.205	0.26	9.274	A
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	355.00	355.00	0.00	-	-	-	-	-
F	B-AC	175.00	175.00	0.00	711.53	0.246	0.33	6.708	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	360.00	359.99	0.00	600.13	0.600	1.49	14.987	B
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	45.00	45.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	495.99	0.282	0.39	10.112	B
L	C-A	580.00	580.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	477.50	0.073	0.08	8.135	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	560.00	560.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2036 Design, AM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Design, AM	2036 Design	AM		FLAT	08:30	10:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	10.90	B
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	20.46	C
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	22.60	C

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	595.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	385.00	100.000
F	A	FLAT	✓	80.00	100.000
F	B	FLAT	✓	290.00	100.000
F	C	FLAT	✓	470.00	100.000
L	A	FLAT	✓	895.00	100.000
L	B	FLAT	✓	220.00	100.000
L	C	FLAT	✓	840.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	155.000	440.000
	B	0.000	0.000	0.000
	C	215.000	170.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.26	0.74
	B	0.33	0.33	0.33
	C	0.56	0.44	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	15.000	65.000
	B	0.000	0.000	290.000
	C	0.000	470.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.19	0.81
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	380.000	515.000
	B	115.000	0.000	105.000
	C	565.000	275.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.42	0.58
	B	0.52	0.00	0.48
	C	0.67	0.33	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.34	10.90	0.51	B
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.41	8.57	0.69	A
F	C-A	-	-	-	-
F	C-B	0.78	27.80	3.56	D
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.57	21.90	1.33	C
L	C-A	-	-	-	-
L	C-B	0.64	23.17	1.75	C
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (08:30-08:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.51	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	167.98	0.00	500.21	0.340	0.51	10.773	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	287.28	0.00	710.21	0.408	0.68	8.459	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	457.10	0.00	598.87	0.785	3.22	23.635	C
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	214.99	0.00	386.53	0.569	1.25	20.448	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	268.37	0.00	430.23	0.639	1.66	21.460	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

Main results: (08:45-09:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.06	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	169.98	0.00	500.21	0.340	0.51	10.899	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	289.98	0.00	710.21	0.408	0.68	8.565	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	469.24	0.00	598.87	0.785	3.41	27.376	D
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.82	0.00	384.41	0.572	1.30	21.816	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	274.78	0.00	430.23	0.639	1.71	23.073	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

Main results: (09:00-09:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.05	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	169.99	0.00	500.21	0.340	0.51	10.901	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	289.99	0.00	710.21	0.408	0.69	8.566	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	469.71	0.00	598.87	0.785	3.49	27.624	D
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.94	0.00	384.34	0.572	1.31	21.866	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	274.92	0.00	430.23	0.639	1.73	23.129	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

Main results: (09:15-09:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.05	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	170.00	0.00	500.21	0.340	0.51	10.901	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	290.00	0.00	710.21	0.408	0.69	8.566	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	469.85	0.00	598.87	0.785	3.52	27.719	D
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.97	0.00	384.32	0.572	1.32	21.888	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	274.96	0.00	430.23	0.639	1.74	23.150	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

Main results: (09:30-09:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.05	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	170.00	0.00	500.21	0.340	0.51	10.901	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	290.00	0.00	710.21	0.408	0.69	8.566	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	469.91	0.00	598.87	0.785	3.55	27.771	D
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.98	0.00	384.30	0.572	1.32	21.893	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	274.98	0.00	430.23	0.639	1.75	23.159	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

Main results: (09:45-10:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	529.05	0.000	0.00	0.000	A
D	C-A	215.00	215.00	0.00	-	-	-	-	-
D	C-B	170.00	170.00	0.00	500.21	0.340	0.51	10.901	B
D	A-B	155.00	155.00	0.00	-	-	-	-	-
D	A-C	440.00	440.00	0.00	-	-	-	-	-
F	B-AC	290.00	290.00	0.00	710.21	0.408	0.69	8.566	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	470.00	469.94	0.00	598.87	0.785	3.56	27.801	D
F	A-B	15.00	15.00	0.00	-	-	-	-	-
F	A-C	65.00	65.00	0.00	-	-	-	-	-
L	B-AC	220.00	219.99	0.00	384.30	0.572	1.33	21.896	C
L	C-A	565.00	565.00	0.00	-	-	-	-	-
L	C-B	275.00	274.98	0.00	430.23	0.639	1.75	23.166	C
L	A-B	380.00	380.00	0.00	-	-	-	-	-
L	A-C	515.00	515.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2036 Design, PM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Design, PM	2036 Design	PM		FLAT	17:30	19:00	90	15		

Junction Network

Junctions

Junction	Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
D	D	Kau Pui Lung Rd / Lok Shan Rd	T-Junction	Two-way	A,B,C	10.22	B
F	F	Chi Kiang St / Ko Shan Rd	T-Junction	One-way from A to C	A,B,C	15.74	C
L	L	Sheung Shing Street / Sheung Lot Street	T-Junction	Two-way	A,B,C	9.76	A

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Junction	Arm	Arm	Name	Description	Arm Type
D	**A**	A	Kau Pui Lung Road		Major
D	**B**	B	Lok Shan Rd		Minor
D	**C**	C	Kau Pui Lung Rd		Major
F	**A**	A	Chi Kiang St W		Major
F	**B**	B	Ko Shan Rd		Minor
F	**C**	C	Chi Kiang St		Major
L	**A**	A	Sheung Shing Street WB		Major
L	**B**	B	Sheung Lok Street		Minor
L	**C**	C	Sheung Shing Street EB		Major

Major Arm Geometry

Junction	Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
D	**C**	12.00		0.00		2.20	50.00		
F	**C**	12.00		0.00		2.20	50.00		
L	**C**	10.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Junction	Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
D	B	One lane	5.00										50	50
F	B	One lane	3.90										50	50
L	B	One lane	5.00										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
D	B-A	622.329	0.084	0.212	0.133	0.302
D	B-C	786.649	0.089	0.225	-	-
D	C-B	602.919	0.173	0.173	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.022	0.056	0.036	0.081
F	B-C	714.470	0.024	0.060	-	-
F	C-B	602.919	0.051	0.051	-	-

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
L	B-A	622.329	0.094	0.237	0.149	0.338
L	B-C	786.649	0.100	0.252	-	-
L	C-B	602.919	0.193	0.193	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Junction	Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
D	A	FLAT	✓	700.00	100.000
D	B	FLAT	✓	0.00	100.000
D	C	FLAT	✓	325.00	100.000
F	A	FLAT	✓	105.00	100.000
F	B	FLAT	✓	230.00	100.000
F	C	FLAT	✓	420.00	100.000
L	A	FLAT	✓	655.00	100.000
L	B	FLAT	✓	140.00	100.000
L	C	FLAT	✓	620.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.000	310.000	390.000
	B	0.000	0.000	0.000
	C	195.000	130.000	0.000

Turning Proportions (PCU) - Junction D (for whole period)

		To		
		A	B	C
From	A	0.00	0.44	0.56
	B	0.33	0.33	0.33
	C	0.60	0.40	0.00

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	10.000	95.000
	B	0.000	0.000	230.000
	C	0.000	420.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.00	0.10	0.90
	B	0.00	0.00	1.00
	C	0.00	1.00	0.00

Turning Counts / Proportions (PCU/hr) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.000	90.000	565.000
	B	60.000	0.000	80.000
	C	585.000	35.000	0.000

Turning Proportions (PCU) - Junction L (for whole period)

		To		
		A	B	C
From	A	0.00	0.14	0.86
	B	0.43	0.00	0.57
	C	0.94	0.06	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction D (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction D (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Average PCU Per Vehicle - Junction L (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction L (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Junction	Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
D	B-AC	0.00	0.00	0.00	A
D	C-A	-	-	-	-
D	C-B	0.27	10.22	0.37	B
D	A-B	-	-	-	-
D	A-C	-	-	-	-
F	B-AC	0.32	7.52	0.48	A
F	C-A	-	-	-	-
F	C-B	0.70	20.24	2.34	C
F	A-B	-	-	-	-
F	A-C	-	-	-	-
L	B-AC	0.28	10.16	0.39	B
L	C-A	-	-	-	-
L	C-B	0.07	8.15	0.08	A
L	A-B	-	-	-	-
L	A-C	-	-	-	-

Main Results for each time segment

Main results: (17:30-17:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.70	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	128.55	0.00	482.08	0.270	0.36	10.142	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	228.10	0.00	708.53	0.325	0.47	7.466	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	411.18	0.00	597.60	0.703	2.21	18.535	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	138.44	0.00	494.24	0.283	0.39	10.079	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	34.69	0.00	476.54	0.073	0.08	8.141	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Main results: (17:45-18:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.39	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	129.99	0.00	482.08	0.270	0.37	10.224	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	229.99	0.00	708.53	0.325	0.48	7.522	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	419.70	0.00	597.60	0.703	2.28	20.145	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	139.99	0.00	494.16	0.283	0.39	10.164	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	476.54	0.073	0.08	8.153	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Main results: (18:00-18:15)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.38	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	130.00	0.00	482.08	0.270	0.37	10.224	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	230.00	0.00	708.53	0.325	0.48	7.522	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	419.89	0.00	597.60	0.703	2.31	20.204	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	494.16	0.283	0.39	10.164	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	476.54	0.073	0.08	8.153	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Main results: (18:15-18:30)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.38	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	130.00	0.00	482.08	0.270	0.37	10.224	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	230.00	0.00	708.53	0.325	0.48	7.522	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	419.94	0.00	597.60	0.703	2.32	20.226	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	494.16	0.283	0.39	10.164	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	476.54	0.073	0.08	8.153	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Main results: (18:30-18:45)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.38	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	130.00	0.00	482.08	0.270	0.37	10.224	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	230.00	0.00	708.53	0.325	0.48	7.522	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	419.97	0.00	597.60	0.703	2.33	20.236	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	494.16	0.283	0.39	10.164	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	476.54	0.073	0.08	8.153	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Main results: (18:45-19:00)

Junction	Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
D	B-AC	0.00	0.00	0.00	537.38	0.000	0.00	0.000	A
D	C-A	195.00	195.00	0.00	-	-	-	-	-
D	C-B	130.00	130.00	0.00	482.08	0.270	0.37	10.224	B
D	A-B	310.00	310.00	0.00	-	-	-	-	-
D	A-C	390.00	390.00	0.00	-	-	-	-	-
F	B-AC	230.00	230.00	0.00	708.53	0.325	0.48	7.522	A
F	C-A	0.00	0.00	0.00	-	-	-	-	-
F	C-B	420.00	419.98	0.00	597.60	0.703	2.34	20.245	C
F	A-B	10.00	10.00	0.00	-	-	-	-	-
F	A-C	95.00	95.00	0.00	-	-	-	-	-
L	B-AC	140.00	140.00	0.00	494.16	0.283	0.39	10.164	B
L	C-A	585.00	585.00	0.00	-	-	-	-	-
L	C-B	35.00	35.00	0.00	476.54	0.073	0.08	8.153	A
L	A-B	90.00	90.00	0.00	-	-	-	-	-
L	A-C	565.00	565.00	0.00	-	-	-	-	-

Junctions 8

PICADY 8 - Priority Intersection Module

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Filename: 22101HK_Jn F Imp.arc8
Path: \\PROJSRV\Project\CTA Consultants Limited\CTA - Project\22101HK (wkk) - URA (CBS-2 KC) Kau Pui Lung Rd Chi Kiang St Dev Scheme\Cal\TIA\2022-10-13
Report generation date: 17/10/2022 16:51:31

» (Default Analysis Set) - 2036 Design Imp, AM
» (Default Analysis Set) - 2036 Design Imp, PM

Summary of junction performance

	AM				PM			
	Queue (PCU)	Delay (s)	RFC	LOS	Queue (PCU)	Delay (s)	RFC	LOS
	A1 - 2036 Design Imp							
Stream B-AC	0.70	8.76	0.41	A	0.49	7.70	0.33	A
Stream C-A	-	-	-	-	-	-	-	-
Stream C-B	1.09	12.50	0.52	B	1.42	14.52	0.59	B
Stream A-B	-	-	-	-	-	-	-	-
Stream A-C	-	-	-	-	-	-	-	-

Values shown are the maximum values over all time segments. Delay is the maximum value of average delay per arriving vehicle.

"D5 - 2036 Design Imp, AM " model duration: 8:30 - 10:00
"D6 - 2036 Design Imp, PM" model duration: 17:30 - 19:00

Run using Junctions 8.0.5.523 at 17/10/2022 16:51:29

File summary

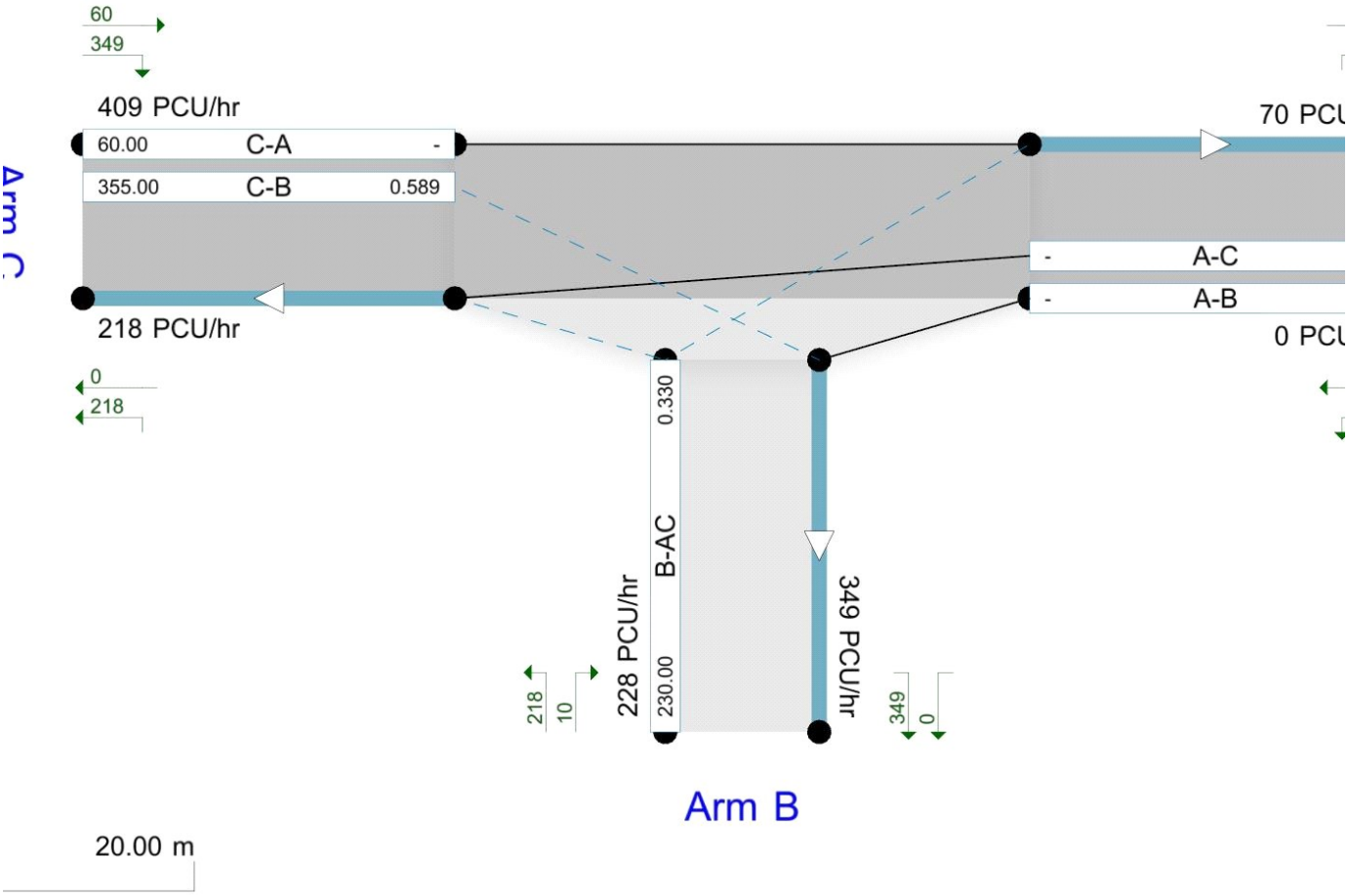
Title	Jcn C
Location	
Site Number	
Date	3/6/2019
Version	
Status	(new file)
Identifier	
Client	
Jobnumber	
Enumerator	user
Description	

Analysis Options

Vehicle Length (m)	Do Queue Variations	Calculate Residual Capacity	Residual Capacity Criteria Type	RFC Threshold	Average Delay Threshold (s)	Queue Threshold (PCU)
5.75			N/A	0.85	36.00	20.00

Units

Distance Units	Speed Units	Traffic Units Input	Traffic Units Results	Flow Units	Average Delay Units	Total Delay Units	Rate Of Delay Units
m	kph	PCU	PCU	perHour	s	-Min	perMin



Showing modelled flow through junction (PCU/hr).
Streams (upstreams) show Total Demand (PCU/hr); Streams (downstreams) show RFC ()
Time Segment: (08:30-08:45)
Showing Analysis Set "A1 "; Demand Set "D5 - 2036 Design Imp, AM "

The junction diagram reflects the last run of ARCADY.

(Default Analysis Set) - 2036 Design Imp, AM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Design Imp, AM	2036 Design Imp	AM		FLAT	08:30	10:00	90	15		

Junction Network

Junctions

Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
F	Chi Kiang St / Ko Shan Rd	T-Junction	Two-way	A,B,C	10.71	B

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Arm	Arm	Name	Description	Arm Type
A	A	Chi Kiang St W		Major
B	B	Ko Shan Rd		Minor
C	C	Chi Kiang St		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
C	12.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
B	One lane	3.90										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.076	0.192	0.121	0.275
F	B-C	714.470	0.081	0.205	-	-
F	C-B	602.919	0.173	0.173	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
A	FLAT	✓	0.00	100.000
B	FLAT	✓	290.00	100.000
C	FLAT	✓	470.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	0.000	0.000
	B	10.000	0.000	280.000
	C	155.000	315.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.33	0.33	0.33
	B	0.03	0.00	0.97
	C	0.33	0.67	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
B-AC	0.41	8.76	0.70	A
C-A	-	-	-	-
C-B	0.52	12.50	1.09	B
A-B	-	-	-	-
A-C	-	-	-	-

Main Results for each time segment

Main results: (08:30-08:45)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	287.22	0.00	701.09	0.414	0.69	8.642	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	310.75	0.00	602.92	0.522	1.06	12.153	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (08:45-09:00)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	289.98	0.00	701.00	0.414	0.70	8.757	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	314.94	0.00	602.92	0.522	1.08	12.493	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (09:00-09:15)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	289.99	0.00	701.00	0.414	0.70	8.758	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	314.98	0.00	602.92	0.522	1.08	12.497	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (09:15-09:30)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	290.00	0.00	701.00	0.414	0.70	8.758	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	314.99	0.00	602.92	0.522	1.09	12.500	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (09:30-09:45)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	290.00	0.00	701.00	0.414	0.70	8.758	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	314.99	0.00	602.92	0.522	1.09	12.500	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (09:45-10:00)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	290.00	290.00	0.00	701.00	0.414	0.70	8.758	A
C-A	155.00	155.00	0.00	-	-	-	-	-
C-B	315.00	315.00	0.00	602.92	0.522	1.09	12.502	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

(Default Analysis Set) - 2036 Design Imp, PM

Data Errors and Warnings

No errors or warnings

Analysis Set Details

Name	Roundabout Capacity Model	Description	Locked	Network Flow Scaling Factor (%)	Reason For Scaling Factors
(Default Analysis Set)	N/A			100.000	

Demand Set Details

Name	Scenario Name	Time Period Name	Description	Traffic Profile Type	Model Start Time (HH:mm)	Model Finish Time (HH:mm)	Model Time Period Length (min)	Time Segment Length (min)	Single Time Segment Only	Locked
2036 Design Imp, PM	2036 Design Imp	PM		FLAT	17:30	19:00	90	15		

Junction Network

Junctions

Junction	Name	Junction Type	Major Road Direction	Arm Order	Junction Delay (s)	Junction LOS
F	Chi Kiang St / Ko Shan Rd	T-Junction	Two-way	A,B,C	11.84	B

Junction Network Options

Driving Side	Lighting
Left	Normal/unknown

Arms

Arms

Arm	Arm	Name	Description	Arm Type
A	A	Chi Kiang St W		Major
B	B	Ko Shan Rd		Minor
C	C	Chi Kiang St		Major

Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Width of kerbed central reserve (m)	Has right turn bay	Width For Right Turn (m)	Visibility For Right Turn (m)	Blocks?	Blocking Queue (PCU)
C	12.00		0.00		2.20	50.00		

Geometries for Arm C are measured opposite Arm B. Geometries for Arm A (if relevant) are measured opposite Arm D.

Minor Arm Geometry

Arm	Minor Arm Type	Lane Width (m)	Lane Width (Left) (m)	Lane Width (Right) (m)	Width at give-way (m)	Width at 5m (m)	Width at 10m (m)	Width at 15m (m)	Width at 20m (m)	Estimate Flare Length	Flare Length (PCU)	Visibility To Left (m)	Visibility To Right (m)
B	One lane	3.90										50	50

Slope / Intercept / Capacity

Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for C-A	Slope for C-B
F	B-A	565.227	0.076	0.192	0.121	0.275
F	B-C	714.470	0.081	0.205	-	-
F	C-B	602.919	0.173	0.173	-	-

The slopes and intercepts shown above do NOT include any corrections or adjustments.

Streams may be combined, in which case capacity will be adjusted.

Values are shown for the first time segment only; they may differ for subsequent time segments.

Traffic Flows

Demand Set Data Options

Default Vehicle Mix	Vehicle Mix Varies Over Time	Vehicle Mix Varies Over Turn	Vehicle Mix Varies Over Entry	Vehicle Mix Source	PCU Factor for a HV (PCU)	Default Turning Proportions	Estimate from entry/exit counts	Turning Proportions Vary Over Time	Turning Proportions Vary Over Turn	Turning Proportions Vary Over Entry
		✓	✓	HV Percentages	2.00				✓	✓

Entry Flows

General Flows Data

Arm	Profile Type	Use Turning Counts	Average Demand Flow (PCU/hr)	Flow Scaling Factor (%)
A	FLAT	✓	0.00	100.000
B	FLAT	✓	230.00	100.000
C	FLAT	✓	415.00	100.000

Turning Proportions

Turning Counts / Proportions (PCU/hr) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.000	0.000	0.000
	B	10.000	0.000	220.000
	C	60.000	355.000	0.000

Turning Proportions (PCU) - Junction F (for whole period)

		To		
		A	B	C
From	A	0.33	0.33	0.33
	B	0.04	0.00	0.96
	C	0.14	0.86	0.00

Vehicle Mix

Average PCU Per Vehicle - Junction F (for whole period)

		To		
		A	B	C
From	A	1.000	1.000	1.000
	B	1.000	1.000	1.000
	C	1.000	1.000	1.000

Heavy Vehicle Percentages - Junction F (for whole period)

		To		
		A	B	C
From	A	0.0	0.0	0.0
	B	0.0	0.0	0.0
	C	0.0	0.0	0.0

Results

Results Summary for whole modelled period

Stream	Max RFC	Max Delay (s)	Max Queue (PCU)	Max LOS
B-AC	0.33	7.70	0.49	A
C-A	-	-	-	-
C-B	0.59	14.52	1.42	B
A-B	-	-	-	-
A-C	-	-	-	-

Main Results for each time segment

Main results: (17:30-17:45)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	228.06	0.00	697.73	0.330	0.49	7.634	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	349.48	0.00	602.92	0.589	1.38	13.924	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (17:45-18:00)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	229.99	0.00	697.58	0.330	0.49	7.698	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	354.90	0.00	602.92	0.589	1.40	14.497	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (18:00-18:15)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	230.00	0.00	697.58	0.330	0.49	7.698	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	354.96	0.00	602.92	0.589	1.41	14.508	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (18:15-18:30)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	230.00	0.00	697.58	0.330	0.49	7.698	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	354.98	0.00	602.92	0.589	1.42	14.514	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (18:30-18:45)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	230.00	0.00	697.58	0.330	0.49	7.699	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	354.99	0.00	602.92	0.589	1.42	14.514	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

Main results: (18:45-19:00)

Stream	Total Demand (PCU/hr)	Entry Flow (PCU/hr)	Pedestrian Demand (Ped/hr)	Capacity (PCU/hr)	RFC	End Queue (PCU)	Delay (s)	LOS
B-AC	230.00	230.00	0.00	697.58	0.330	0.49	7.699	A
C-A	60.00	60.00	0.00	-	-	-	-	-
C-B	355.00	354.99	0.00	602.92	0.589	1.42	14.517	B
A-B	0.00	0.00	0.00	-	-	-	-	-
A-C	0.00	0.00	0.00	-	-	-	-	-

WSIA Comparison Table (Enhanced Scheme)

(Nov 2022)

KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME (CBS-2:KC)

COMPARISON TABLES OF
WATER SUPPLY IMPACT ASSESSMENT

1. Introduction

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Water Supply Impact Assessment (WSIA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

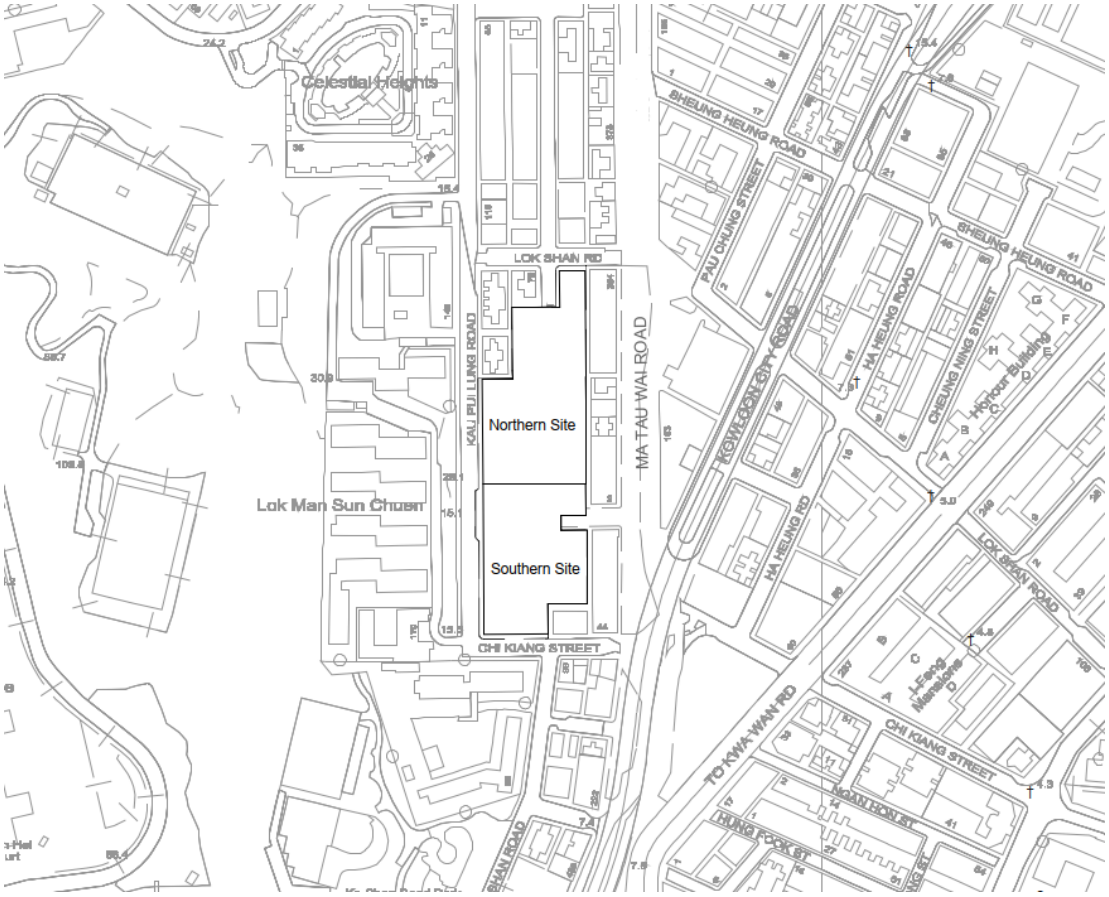
1.1.3 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

Figure 1: Site Location



1.3 Proposed Development

1.3.1 The site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objective

1.4.1 To address the above changes in the draft DSP, it is considered necessary to update the WSIA to support the re-submission to TPB for consideration.

1.5 Comparison

1.5.1 A WSIA report (ref. no.: R6940_v1.2 dated August 2020) based on the "Original Design 2020" was submitted to the TPB in September 2020 in the responses-to-comments stage and then approved by the Water Supplies Department in October 2020.

1.5.2 Below tables show the difference of the estimated daily freshwater and saltwater demand between “Original Design 2020” and “Revised Design 2022”.

	Original Design 2020			Revised Design 2022		
	URA Site	PH Site	Total	Northern Site	Southern Site	Total
No of Residential	4340	2688	7028	3847	2660	6507
Community Facilities (G/IC) (in ha)	0.05	0.18	0.23	0.05	0.2	0.25
Daily Fresh water Demand (m3/day)	1453.91	712.36	**2166.27**	1288.82	704.94	**1993.76**
Daily Salt water Demand (m3/day)	303.80	188.17	**491.97**	269.31	186.21	**455.52**

1.6 Conclusion

1.6.1 Given the total daily freshwater and saltwater demand of the Project from the latest design is less than that from the approval WSIA. It is concluded that previously approved WSIA (R6940_v1.2 dated August 2020) is still valid and represented a worst-case scenario study, further update of report is not required.

QRA Comparison Table (Enhanced Scheme)

(Nov 2022)

KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME (CBS-2:KC)

COMPARISON TABLES OF QUANTITATIVE RISK ASSESSMENT

1. Introduction

1.1 Background

1.1.1 The Urban Renewal Authority (URA) commenced the Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) (CBS-2:KC) on 22 May 2020, as a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). A Quantitative Risk Assessment (QRA) is required to be prepared to support the submission of the draft Development Scheme Plan (DSP) of the Scheme to the Town Planning Board (TPB) for consideration.

1.1.2 A draft DSP together with planning proposal and technical assessments were submitted to the TPB at commencement of the Scheme in May 2020. During public consultation, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government Bureaux / Departments, has addressed the related comments and concerns. In this connection, the URA has taken the opportunity to review the draft DSP to respond to the new policy directives of entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Scheme to achieve wider planning gains to the community.

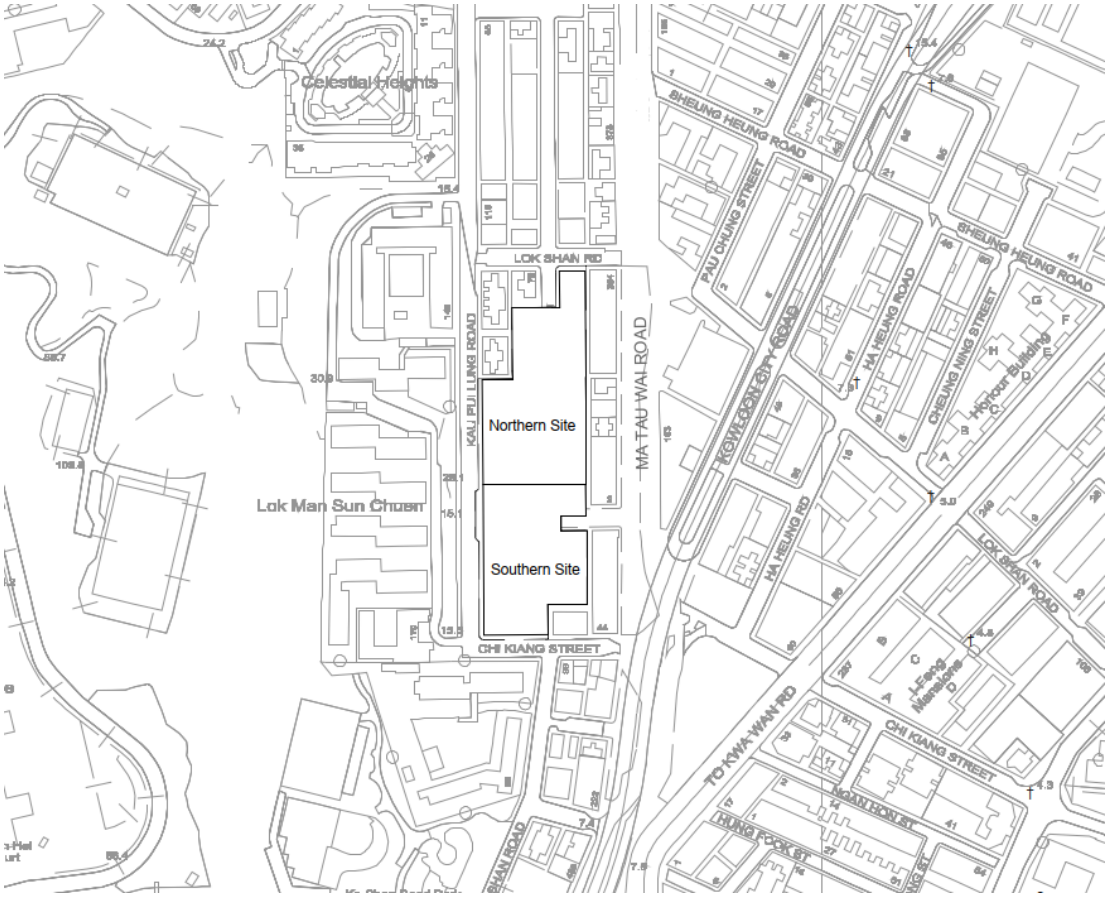
1.1.3 With the above consideration and changes, a revised Draft DSP, with revised notional design of providing private housing units and about 950 SH units (the "Revised Design 2022") are prepared and its necessary TAs are updated for TPB consideration.

1.2 The Site

1.2.1 The site is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.2.2 The Scheme area remains unchanged as commenced in May 2020 and will be considered as one site to be developed by the URA or its joint venture partner(s) (**Figure 1**). Under the current notional design, the Scheme area will be divided into two sites, i.e. the Northern Site and the Southern Site, for private housing development and provision of SH units respectively. The site boundary between the Northern Site and the Southern Site is indicative and the location of the SH units are subject to change.

Figure 1: Site Location



1.3 Proposed Development

1.3.1 The site covers a Scheme Area of approximately 16,500m^2. Under the revised draft DSP, the existing structure will be demolished for redevelopment. The site will be redeveloped for high-density residential development with the provision of Government, Institution or Community (GIC) facilities, commercial use, and underground public vehicle park.

1.3.2 The population intake year for the proposed development is planned to be in year 2033.

1.4 Objective

1.4.1 To address the above changes in the draft DSP, it is considered necessary to update the QRA to support the re-submission to TPB for consideration.

1.5 Comparison

1.5.1 A QRA report (R7533_v1.0 dated July 2020) based on the "Original Design 2020" was submitted to the TPB in July 2020 in the responses-to-comments stage and then approved by the Electrical and Mechanical Services Department in October 2020.

1.5.2 Below tables show the difference of the population data between "Original Design 2020)" and "Revised Design 2022".

1.5.3 Person-per-Flat (PPF) of 2.3 is assumed for the area, which has made reference to HKPSG. Nevertheless, to conduct as a sensitivity test scenario, a PPF 2.6 (= PPF of 2.3 +13%) is adopted in the assessment for population calculation of residential units and for scenario testing purpose.

Table 1: Population data for the "Original Design 2020" (extracted from Table 2, ID PD01 and PD02 of the approved QRA report (R7533_v1.0 dated July 2020))

	Population	Remark
URA Site		
Residential	4608	1541 units. Assume average household size of 2.6 plus 15% contingency
Clubhouse	300	129 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
Retail	700	348 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
Community Facilities	60	17 workers estimated in SIA for the Scheme. Assume worker to visitor ratio in 1:2. Rounded up to nearest 50.
PH Site		
Residential	2841	950 units. Assume average household size of 2.6 plus 15% contingency
Clubhouse	-	-
Retail	70	34 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 10.
Community Facilities	180	59 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 10.
Total	**8759**	

Table 2: Population data for the "Revised Design 2022"

	Population	Remark
Northern Site		
Residential	3573	1374 units. Assume average household size of 2.6
Clubhouse	300	129 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
Retail	700	348 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
Community Facilities	60	17 workers estimated in SIA for the Scheme. Assume worker to visitor ratio in 1:2. Rounded up to nearest 50.
Southern Site		
Residential	2470	950 units. Assume average household size of 2.6
Clubhouse	200	99 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
Retail	540	267 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 10.
Community Facilities	200	66 workers estimated in SIA for the Scheme. Assume worker to visitor ratio in 1:2. Rounded up to nearest 10.
Total	**8043**	

Table 3: Population comparison of Two Designs

Use	Population			
	Original Design 2020		Revised Design 2022	
	URA Site	PH Site	Northern Site	Southern Site
Residential	4608	2841	3573	2470
Clubhouse	300	-	300	200
Retail	700	70	700	540
Community Facilities	60	180	60	200
Total	**8759**		**8043**	

1.6 Conclusion

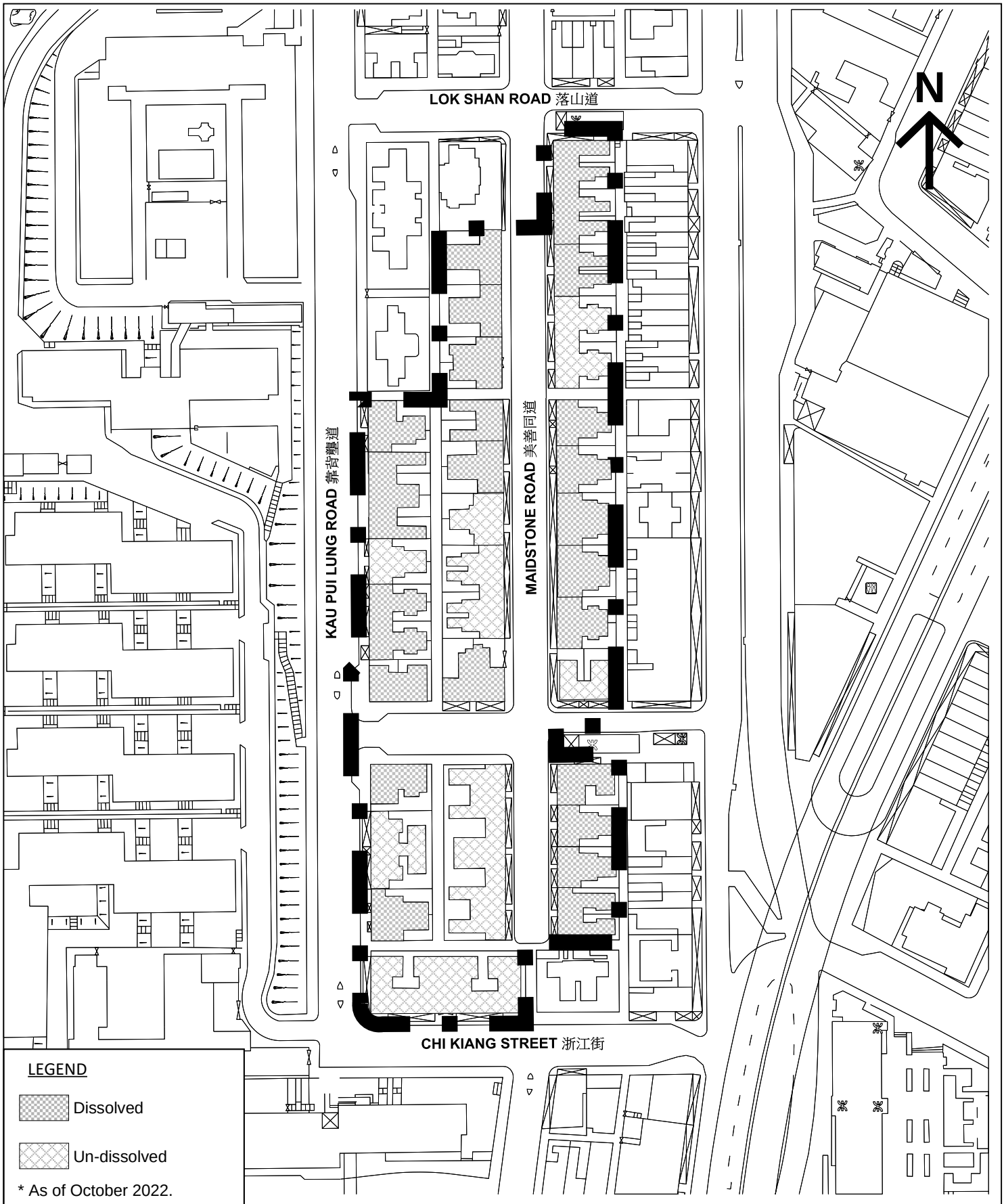
1.6.1 Given the total population of the Project from the latest design (8043) is less than that from the approval QRA (8759). It is concluded that previously approved QRA (R7533_v1.0 dated July 2020) is still valid and represented a worst-case scenario study, further update of report is not required.

Updated Information of the Submission in May 2020

(RtoC_8) (Feb 2023)

Plan 7 (RtoC_8)

(Feb 2023)



THE SCHEME

EXTRACT PLAN PREPARED ON 18.01.23
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

DISSOLVED AND UN-DISSOLVED CBS PATTERN

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 7

Table 3.1 (RtoC_8)

(Feb 2023)

Table 3.1 Ownership Status of the CBSs within the Scheme

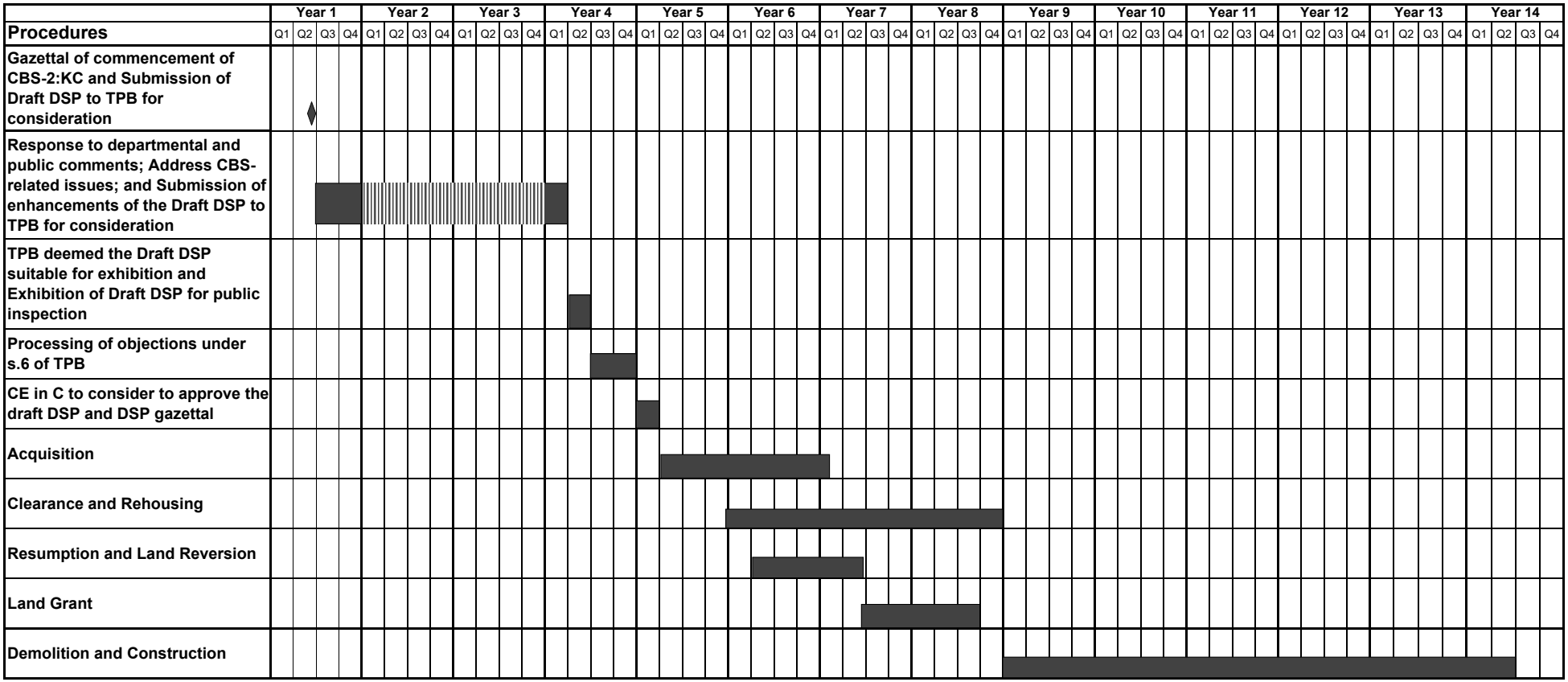
		No. of Units*	No. of CBSs	Percentage (about)
Dissolved CBS		**302**	**20**	**71%**
- Status of Outstanding Land Premium and Alienation Restriction	*Settled and Removed*	*29*	*-*	*10%*
	Not Yet Settled and Not yet Removed	*273*	*-*	*90%*
Undissolved CBS		**160**	**8**	**29%**
	Total	**462**	**28**	**100%**

** As of October 2022.*

Implementation Programme (RtoC_8)

(Feb 2023)

CBS-2:KC URA Kau Pui Lung Road / Chi Kiang Street Development Scheme
Tentative Implementation Programme



Urban Renewal Authority
Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Consolidated Report

(Enclosure B – Parts 2 - 4)

Part 2 – Original Scheme

Kau Pui Lung Road / Chi Kiang Street (CBS-2:KC)

DEVELOPMENT SCHEME

Prepared under Section 25 (3)
of the Urban Renewal Authority Ordinance

PLANNING REPORT

May 2020

市區重建局
URBAN RENEWAL AUTHORITY

EXECUTIVE SUMMARY

1. In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive, the URA is invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. According to the directive under the PAs, some of the land within the Scheme is to be earmarked for public housing development upon approval.

2. The Scheme covers an area of about 16,473m^2, subject to site survey, and involves a cluster of 30 CBS sites in the western part of To Kwa Wan near Lok Man Sun Chuen, a public rental housing estate. Whilst meeting the objectives as listed in the PAs, the Scheme also seeks to improve the overall environment through redevelopment in accordance with the Urban Renewal Strategy (URS) including rationalization of the land uses and road networks through restructuring and replanning.

3. Under the proposed DSP, the Scheme is proposed to be zoned "Residential (Group A)" ("R(A)"), which is intended primarily for high-density residential developments with the provision of Government, institute or community (GIC) facilities, open space for public use and the lowest three floors for commercial use. The Scheme will be separately developed by the URA and the agent appointed by Transport and Housing Bureau, for the private and public housing portion respectively, under the same planning strategy. The northern part will be developed by the URA (regarded as URA site), whilst the southern part will be earmarked for public housing development (regarded as PH site).

4. For better planning and to increase housing supply, portion of Maidstone Road and Kiang Su Street are included for plot ratio (PR) calculation. Subject to detailed design and prevailing Schedule 1 of the Building (Planning) Regulations, the proposed total Gross Floor Area (GFA) of the Scheme is about 134,495m^2. A maximum domestic GFA of about 77,063m^2 and 45,200m^2 in URA site and PH site respectively are proposed. The latter has a domestic PR higher than the traditional 7.5 restriction in Kowloon as agreed with Development Bureau with policy support obtained, which aligns with the intention to increase housing

supply as stated in the PAs. The flat supply of the Scheme will be about five times of the existing flat number, according to the approved General Building Plan (GBP) as of January 2020, increasing from about 460 to about 2,500 units.

5. To enhance connectivity, both at-grade and underground integrated pedestrian networks are proposed. Portion of Maidstone Road and Kiang Su Street has been included as part of the area of the Scheme for the creation of a car-free environment, as a pedestrianised avenue / plaza is being provided within the Scheme. An underground shopping street will be provided with connections to the two future entrances of the MTR Shatin-to-Central Link (SCL) To Kwa Wan Station at Lok Shan Road and Kiang Su Street. The connectivity to the south of the Scheme is further improved by turning the existing back lane into part of the pedestrianised avenue.

6. Adopting the people-oriented urban design concept, the Scheme will also enhance the walkability and the user experience and create vibrancy through place-making. In order to provide openness, two visual corridors are created along the existing Maidstone Road and Kiang Su Street respectively. The massing of buildings will be carefully designed to minimise site coverage thus resulting in a slight increase in the building height from 120mPD to 140mPD, which is compatible to the building height restriction of Lok Man Sun Chuen opposite under the Outline Zoning Plan (OZP). With the massing optimised and visual corridors provided, it helps to create two ventilation corridors in north-south and east-west directions to enhance comfort for these pedestrian friendly environment and event spaces. The pedestrianised avenue / plaza will be provided within the Scheme, with uncovered and covered area with hard and soft landscaping, commercial / retail components, event space and sitting area for public enjoyment. Cohesive landscaping, tree planting and vertical greening will be explored to improve the pedestrian friendly environment and create a sense of place.

7. Provision of about 140 public car parking spaces at the basement level of URA site not only compensates the existing on-street parking spaces at Maidstone Road, Kiang Su Street and Kau Pui Lung Road, but also providing more public parking facilities. The removal of on-street parking provides opportunities for optimising the surrounding pedestrian environment and further improves walkability.

8. Not less than 2,150m^2 GFA will be reserved to provide appropriate GIC facilities to meet the community needs. The provision of not less than

400m^2 of open space, for public use at reasonable hours, provides more amenity for the community.

行政摘要

1. 行政長官於 2018 及 2019 年《施政報告》中，宣佈邀請市建局物色一至兩個適合作高密度發展的公務員建屋合作社 (合作社) 地段作為重建試點，並研究按照市建局沿用的推展項目方式，重建該些合作社地段。靠背壟道／浙江街發展計劃(該計劃)旨在落實《施政報告》的目標，透過充分利用合作社地段的發展潛力，以增加房屋供應。應《施政報告》的要求，該計劃若獲得批准，會預留部分土地興建公營房屋。

2. 該計劃地盤佔地約 16,473 平方米 (須視乎地盤測量而定)，包含位於土瓜灣西部的 30 個合作社地段，鄰近公共屋邨樂民新村。為達到《施政報告》中建議的合作社地段重建計劃及《市區重建策略》的目標，該計劃希望藉著重建機會以改善該區整體環境，包括透過重整及重新規劃以理順土地用途及道路網絡。

3. 發展計劃草圖建議把該計劃的土地劃為「住宅 (甲類)」地帶，主要作高密度住宅發展，並提供政府、機構或社區設施、供公眾使用的休憩空間，以及建築物的最低三層作商業／零售用途。該計劃由市建局和運輸及房屋局所指定的代理按相同的規劃策略分別發展私人及公營房屋的部分。北面部分將會由市建局發展 (下稱為市建局地盤)，而南面部分將會興建公營房屋 (下稱為公營房屋地盤)。

4. 為了更完善的規劃和增加房屋供應，部分美善同道及江蘇街會納入地積比率的計算，根據現時《建築物 (規劃) 規例》附表 1 內的規定及視乎詳細設計，該計劃擬議的總樓面面積約為 134,495 平方米。市建局地盤及公營房屋地盤擬議的最高住宅樓面面積分別約為 77,063 平方米和 45,200 平方米，而後者住用部分的地積比率超過九龍區傳統的 7.5 倍限制，並已取得發展局的同意及相關政策支持，符合《施政報告》中增加房屋供應的意向。該計劃的住宅單位供應將約是現時數量 (根據於 2020 年 1 月查閱的核准一般建築圖則) 的 5 倍，由現時約 460 個住宅單位增至約 2,500 個。

5. 建議建立地面及地下行人網絡，以優化整個行人環境的連接性。為創造無車環境，該計劃包括了美善同道及江蘇街的一部分，用作興建步行街／廣場。該計劃亦將提供一條地下購物街，並於地下貫通港鐵沙田至中環綫 (沙中綫) 日後啟用的土瓜灣站位於落山

道和江蘇街的兩個出入口。透過整合現時後巷成為步行街的一部分，可進一步強化該計劃以南的連繫。

6. 按照以人為本的城市設計概念，該計劃將改善行人暢達性和步行體驗，並透過地方營造為社區注入活力。為了提供開揚景致，將分別沿美善同道和江蘇街設兩條景觀廊，並悉心設計建築物體積以降低上蓋面積。就此，建築高度由主水平基準以上 120 米略為提升至 140 米，然而建議的建築高度在規劃大綱圖中仍與對面樂民新村的建築高度限制相容。藉由建築物體積的優化及所提供的景觀廊，有助創造兩條分別為南北向和東西向的通風廊道，提供舒適的行人環境和活動空間。該計劃將提供一個包括有蓋及無遮蓋空間的步行街／廣場，並設有園景裝置及種植花木、商業／零售用途、活動空間及休憩處予公眾享用。研究透過園境設計、樹木種植和垂直綠化等設計，改善行人環境及地方營造。

7. 市建局地盤將會於地庫提供約 140 個公眾泊車位，這不但補償現有美善同道、江蘇街和靠背壟道的路旁泊車位，亦同時提供更多公眾停車設施。移除路旁泊車位亦可提供機會優化周邊步行環境，進一步改善行人暢達性。

8. 該計劃將預留不少於 2,150 平方米的總樓面面積作政府、機構或社區設施，以滿足社區需要。此外，亦會提供不少於 400 平方米的休憩空間，於合理時間供公眾使用，為社區提供更多美化空間。

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4. Planning and Land Use Proposals
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6. Implementation of the Development Scheme

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Plan 2: Site Plan
Plan 3: Existing Zoning of Development Scheme
Plan 4: Building Age
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Part 1 - Planning Report

(May 2020)

1. INTRODUCTION

1.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive, the Urban Renewal Authority (URA) is invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) is one of the pilot CBS redevelopment projects.

1.2 The Scheme involves a cluster of 30 CBS sites developed under 28 CBSs (i.e. 3 of the CBS sites are developed under 1 CBS): Nos. 59-77, 99-117, 123-133 Maidstone Road (odd nos.), Nos. 82-128 Maidstone Road (even nos.), Nos. 153-175, 181-189 Kau Pui Lung Road (odd nos.), Nos. 1-3, 7-9 Kiang Su Street (odd nos.), Nos. 4-14 Kiang Su Street (even nos.), Nos. 52-58, 52A-58A Chi Kiang Street (even nos.), a portion of Maidstone Road and Kiang Su Street, government lanes, and portion of the surrounding public pavement, forming a comparatively completed land parcel for high density residential development. **Plan 1** shows the location of the Scheme.

1.3 The Scheme, as one of the pilot CBS redevelopment projects, was approved by the Financial Secretary to be commenced in 2020/21. It is proposed to be processed as a Development Scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). The URA's Board approved the submission of the Scheme under section 25(5) of the URAO to the Town Planning Board (TPB) and the draft Development Scheme Plan (DSP), No. S/K10/URA2/A, was prepared for such purpose.

1.4 Pursuant to section 23(1) of the URAO, the URA notified the public in the Government Gazette about the commencement of the Scheme on 22 May 2020. The draft DSP is hereby submitted under section 25(5) of the URAO to the TPB for consideration.

1.5 This planning report (Part 1 of the whole report) was prepared to provide the TPB with the necessary background information and the planning proposal to facilitate its consideration of the draft DSP (Part 2 of the report), submitted under section 25 of the URAO. Supplementary information, including the preliminary design of the proposed development, key technical assessments, a Social Impact Assessment (Stage 1), and the implementation approach, are enclosed in Part 3 for reference.

2. THE DEVELOPMENT SCHEME AREA

2.1 The Scheme covers about 16,473m^2, subject to site survey, which includes about 998m^2 pavement where the affected buildings overhang (**Plan 2**). The peripheral pavement area will be excluded from the plot ratio (PR) calculation. The net site area for PR calculation is about 15,475m^2 subject to site survey upon DSP approval.

2.2 The Scheme is currently zoned "Residential (Group A)" ("R(A)"), and the pavement, Maidstone Road and Kiang Su Street are shown as 'Road' on the draft Ma Tau Kok Outline Zoning Plan (OZP) No. S/K10/25. An extract of the OZP is shown in **Plan 3**.

2.3 According to the characteristics suitable for CBS redevelopment as set out in paragraphs 53 and 54 of the PA in 2018, the Scheme has been selected as one of the pilot CBS redevelopment projects with the multiple factors duly considered including but not limited to the following: cluster of CBS sites in high-density development areas (i.e. R(A) zone under the OZP) in the urban districts, numbers of CBS involved, proximity to existing public rental housing and other ancillary facilities, building age and its existing development density.

2.4 The Scheme boundary has been delineated based on the factors mentioned above. Besides, dead-end road is also included in the Scheme, forming a comparatively completed land parcel for more efficient use of land. For the building age and building height within the Scheme, please refer to **Plans 4** and **5**, respectively.

3. BACKGROUND AND EXISTING CONDITIONS

Historical Background of the Scheme

3.1 Historical map records indicate that the Scheme was probably located near the then coastline before 1890s. There were village settlements and agricultural activities in the Hung Hom and To Kwa Wan area in the 1870s. Several rounds of reclamation had been undertaken in Ma Tau Kok Bay, To Kwa Wan Bay and Hung Hom since the 1890s till 1960s to increase land at the coastline for expansion of population.

3.2 The CBS scheme is a form of civil servants' housing benefit managed by the Civil Service Bureau. It was launched in 1952 to allow the Government to grant land at a concessionary premium to enable eligible civil servants to build residential buildings through forming co-operative societies. The co-operative societies which are responsible for the building management and maintenance were set up under the Co-operative Societies Ordinance (Cap. 33). No CBS sites have been developed since the mid-1980s. A number of buildings under CBS scheme were developed in the 1960s in To Kwa Wan, especially along Maidstone Road and Kau Pui Lung Road.

Existing Uses, Building and Living Conditions

3.3 The Scheme consists of buildings of 5 to 6 storeys high and they were built between 1959 and 1970 (i.e. all aged 50 or above). The buildings are all residential in nature and there is no retail shop within the Scheme. Based on the approved General Building Plan (GBP), the only two non-domestic uses are the covered children play area on the ground floor at Nos. 7-9 Kiang Su Street (odd nos.) and the car port on the ground floor at Nos. 118-128 Maidstone Road (even nos.).

3.4 According to the approved GBP, none of the buildings is served by lift or barrier-free access and the livability is poor. According to the URA's Building Condition Survey (BCS) conducted in May 2020, most of the buildings within the Scheme are in "Acceptable" conditions.

3.5 Based on Buildings Department's records and land search records in Land Registry as of January 2020, some buildings within the Scheme have outstanding building orders. Five buildings have completed the Operation Building Bright (OBB) Scheme (Category 1) (i.e. Nos. 99-105, 123-125 Maidstone Road (odd nos.) and Nos. 157-163, 165-167, 169-175 Kau Pui Lung Road (odd nos.)); one has completed rehabilitation works under the Building Rehabilitation Loan Scheme (BRLS) (i.e. Nos. 59-65 Maidstone Road (odd nos.)); and another five buildings have completed the Common Area Repair Works Subsidy (CAS) under the Integrated Building Rehabilitation Assistance Scheme (IBRAS) to carry out common area repair works (i.e. Nos. 118-128 Maidstone Road (even nos.), Nos. 157-163, 165-167, 169-175 Kau Pui Lung Road (odd nos.) and Nos. 8-10 Kiang Su Street (even nos.)). It is understood that the

building rehabilitation works comprise mainly repairing defects (e.g. major cracks, spalling) in common or public areas of the buildings. Repair works to the interior of private units are not included. Based on past URA's experience in rehabilitation works, even buildings that have undergone repair works need to undertake comprehensive building rehabilitation every 5 to 6 years in order to avoid deterioration.

Surrounding Land Uses

3.6 The street block located to the north of the Scheme is predominantly residential buildings, including private residential and some buildings of CBS, with scattered retail shops on the ground floor. For the information of the adjacent buildings, please refer to **Plan 6**.

3.7 A row of residential buildings along Ma Tau Wai Road are located to the immediate east of the Scheme with a back lane in between (**Plan 2**). Various types of shop and services are provided on the ground floor of the buildings, especially there are furniture stores concentrated on both sides of Ma Tau Wai Road and Chatham Road North. Some Government, institution or community (GIC) and educational facilities, including To Kwa Wan Market and Government Offices, Po Leung Kuk Madam Chan Wai Chow Memorial School, Po Leung Kuk Lam Man Chan English School, ELCHK Hung Hom Lutheran Primary School and SKH Good Shepherd Primary School are concentrated on the opposite side of Ma Tau Wai Road.

3.8 Three residential buildings are located to the northwest of the Scheme. One of them is 80 Maidstone Road, a newly built residential building, while City 151 at No. 151 Kau Pui Lung Road is a young residential building. The other one is Morning Joy Building at Nos. 141-143 Kau Pui Lung Road (odd nos.) with a Care and Attention Homes for the Elderly, Kau Pui Lung Elderly Home, located on the first two floors. A high-rise private housing development, Celestial Heights, is located to the further northwest of the Scheme.

3.9 To the west across Kau Pui Lung Road and to the south across Chi Kiang Street of the Scheme is Lok Man Sun Chuen, a public rental housing estate developed by Hong Kong Housing Society (HKHS). Some GIC and educational facilities, CCC Wanchai Church Kei To Primary School (Kowloon City), SA Lok Man Nursery School, BGCAHK Lok Man Children and Family Integrated Activity Centre, and HKSKH Lok Man Alice Kwok Integrated Service centre, are located in Lok Man Sun Chuen. Ko Shan Theatre and Ko Shan Road Park are located to the further south of the Scheme.

Planned Development in the Vicinity

3.10 The Scheme is located nearby the MTR Shatin-to-Central Link (SCL) To Kwa Wan Station, which is anticipated to be in operation in 2021. Two of the entrances / exits of the MTR SCL To Kwa Wan Station are located

at Lok Shan Road and Kiang Su Street respectively, which are directly adjoining the Scheme.

Existing Pedestrian Network

3.11 The pedestrian flow within the Scheme is mainly in east-west direction towards and from Ma Tau Wai Road, the major road where most of the public transport services located. This east-west pedestrian flow is served by Lok Shan Road, Kiang Su Street, Chi Kiang Street and two public pedestrian lanes intercepted by carriageway of Kau Pui Lung Road and Maidstone Road. With the forthcoming operation of the MTR SCL To Kwa Wan Station, it is anticipated to be more east-west pedestrian flow between the Station and west of Scheme predominant residential in nature.

3.12 At present, pedestrian flow in north-south direction is mainly found on Ma Tau Wai Road with ground floor shop and services outside the Scheme. The portion of Maidstone Road within the Scheme is not welcoming as a dead-end road without ground floor commercial. It serves mainly the residents of the buildings of CBS alongside and thus the pedestrian flow is low.

Demographic Background

3.13 Based on the 2016 By-Census, the average household size of those within the Scheme taken reference from Large Street Block Groups 24117 and 24123L, which are mainly comprised buildings of CBS, is estimated to be around 2.6. More information can be referred to **Appendix 9** Social Impact Assessment (Stage 1) Report. The existing population of the Scheme is estimated to be around 1,200 persons in around 460 households. Detailed demographic information of the Scheme will be discussed in the Social Impact Assessment (Stage 2) Report.

Ownership Pattern

3.14 Under the alienation restriction of the CBS scheme, owners of flats of a building of CBS are not permitted to assign, mortgage, underlet, part with possession of, or otherwise dispose of their properties, or enter into any agreement for such purposes. A CBS flat owner can apply to remove the alienation restriction and pay the outstanding land premium at any time after the legal title has been transferred to him / her. Based on the ownership records in the Land Registry as of January 2020, about 68% of the CBSs (19 out of 28) within the Scheme were dissolved. Only 10% of the dissolved units (29 out of 292) were settled the outstanding land premium and removed the alienation restriction. There is no sign of active acquisition nor existence of major stakeholder within the Scheme. **Table 3.1** shows the ownership status of the CBSs within the Scheme.

Table 3.1 Ownership Status of the CBSs within the Scheme

		No. of Units*	No. of CBSs	Percentage (about)
Dissolved CBS		**292**	**19**	**68%**
- Status of Outstanding Land Premium and Alienation Restriction	*Settled and Removed*	*29*	*-*	*10%*
	Not Yet Settled and Removed	*263*	*-*	*90%*
Undissolved CBS		**170**	**9**	**32%**
	Total	**462**	**28**	**100%**

** According to the approved GBP as of January 2020.*

4 PLANNING & LAND USE PROPOSALS

Objectives of the Scheme

4.1 The intention of the Scheme is to fulfil the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. According to the directive under the PAs, some of the land within the Scheme is to be earmarked for public housing development upon approval. Whilst meeting the objectives as listed in the PAs, the Scheme also seeks to improve the overall environment through redevelopment in accordance with the 2011 Urban Renewal Strategy (URS).

4.2 The Scheme proposes to restructure the existing dead ended Maidstone Road and Kiang Su Street within the Scheme and includes the land into redevelopment. The enlarged area allows for better planning and to increase flat supply, enhancement of connectivity and walkability.

4.3 This approach fulfils the following main objectives of URA as promulgated by the URS, i.e.:-

- Restructuring and replanning of concerned urban areas;
- Designing more effective and environmentally-friendly local transport and road networks within the concerned urban areas;
- Rationalising land uses within the concerned urban areas; and
- Enhancing the townscape with attractive landscape and urban design.

Development Intensity

4.4 The Scheme will be separately developed by the URA and the agent appointed by Transport and Housing Bureau (THB), for the private and public housing portion respectively, under the same planning strategy. The northern part will be developed by the URA (regarded as URA site), whilst the southern part will be earmarked for public housing development (regarded as PH site).

4.5 Under the proposed DSP, the Scheme is proposed to be zoned “R(A)”, which is intended primarily for high-density residential developments with the provision of GIC facilities, open space for public use and the lowest three floors for commercial use. It is subject to maximum domestic and non-domestic Gross Floor Area (GFA) limitations. Subject to detailed design and prevailing Schedule 1 of the Building (Planning) Regulations, the proposed total GFA of the Scheme is about 134,495m^2.

4.6 A maximum domestic GFA of about 77,063m^2 and 45,200m^2 in URA site and PH site respectively are proposed. The latter has a domestic PR higher than the traditional 7.5 restriction in Kowloon as agreed with Development Bureau with policy support obtained, which aligns with the intention to increase housing supply as stated in the PAs. The technical feasibility of a higher equivalent domestic PR is examined in various technical assessments as stated in the later paragraphs.

4.7 The flat supply of the Scheme will be about five times of the existing flat number, according to the approved GBP as of January 2020, increasing from about 460 to about 2,500 units. Based on the initial flat occupancy assumptions in the Hong Kong Planning Standard and Guidelines (HKPSG) and the possible mix of the different housing types in the proposed development, the average future household size is taken 2.6 and the estimated population to be accommodated in the Scheme is about 6,500.

4.8 GIC facilities provision are not less than 500m^2 GFA at URA site, about 1,650m^2 GFA at PH site and not less than 2,150m^2 GFA in total. To optimise massing and help to create the north-south and east-west ventilation corridors, a 20m height relaxation, i.e. from 120mPD to 140mPD, is proposed.

4.9 For URA site, residential towers are proposed on top of podia. Retail will be provided on the ground floor and the basement floor, on which will be connected with the MTR SCL To Kwa Wan Station directly. The proposed non-domestic GFA is about 9,632m^2. Public car park and ancillary car park facilities will be provided in the basement. For PH site, the proposed non-domestic GFA is about 2,600m^2. The proposed uses and development intensity are conformed to such as permitted in a traditional R(A) zoning.

Conceptual Layout

4.10 Based on the proposed development parameters for the Scheme, **Appendix 1** shows the indicative block plan and section plan of the Scheme. The indicative block plan reflects only the general disposition of the towers and the design concept of the Scheme while the landscape proposal and open provision will be ascertained in the detailed design stage. The proposed development parameters are set out in **Table 4.1** which is subject to adjustments in the detailed design stage.

Table 4.1 Proposed Development Parameters of the Scheme

Parameters	**Details**		
	URA site	**PH site**	**Total**
Scheme Area*	10,673m^2	5,800m^2	16,473m^2
Net Site Area*$	10,275m^2	5,200m^2	15,475m^2
Proposed Domestic GFA (PR)^	Around 77,063m^2 (7.50)	Around 45,200m^2 (8.69)	Around 122,263m^2 (7.90)
Proposed Non-domestic GFA (PR)^#	Around 9,632m^2 (0.93)	Around 2,600m^2 (0.50)	Around 12,232m^2 (0.79)
Total GFA (PR)	Around 86,695m^2 (8.43)	Around 47,800m^2 (9.19)	Around 134,495m^2 (8.69)
No. of Flats@	About 1,541 flats	About 950 flats	About 2,491 flats

Parameters	Details		
	URA site	**PH site**	**Total**
Average Flat Size@	About 50.0m^2	About 47.6m^2	About 49.1m^2
Proposed Maximum Building Height	Not more than 140mPD	Not more than 140mPD	Not more than 140mPD
Ancillary Private Car Parking Spaces	194	80	274
Reprovision of Public Car Parking Spaces	140	--	140
Loading / Unloading Bays	17 (8 LGV and 9 M/HGV bays)	3 (3 M/HGV bays)	20 (8 LGV and 12 M/HGV bays)

Notes:

* Subject to site survey

$ Net Site Area includes all private lots, the government lanes, the portion of Maidstone Road and Kiang Su Street within the Scheme.

^ The exact GFA and PR are subject to TPB approval, detailed design and prevailing Schedule 1 of the Building (Planning) Regulations.

@ Indicative only, subject to detailed design at project implementation stage.

GIC facilities provision are not less than 500m^2 in URA site, about 1,650m^2 in PH site and not less than 2,150m^2 in total.

Internal Parking Provision and Vehicular Access

4.11 A high sided car parking ratio is adopted with the total provision of 274 ancillary parking spaces for private cars. Twenty (20) Loading / Unloading (L/UL) bays in total will be provided to serve the future residential cum retail podium development of the Scheme. Provision of about 140 public car parking spaces at the basement level of URA site not only compensates the existing on-street parking spaces at Maidstone Road, Kiang Su Street and Kau Pui Lung Road, but also providing more public parking facilities.

4.12 For both URA site and PH site, vehicular ingress / egress will be provided at Kau Pui Lung Road while a roundabout will be provided in the Scheme at Maidstone Road (shown in **Appendix 1**). As the portion of Maidstone Road between Lok Shan Road and the Scheme will be maintained for the development at 80 Maidstone Road, the proposed roundabout will provide manoeuvring space to exit for the vehicles accidentally driving in that portion of Maidstone Road.

Vehicular Circulation

4.13 In order to improve the traffic and walking environment, it is proposed to permanently close the portion of Maidstone Road and Kiang Su Street within the Scheme to achieve the following goals:

- Remove dead-end condition for safer traffic and pedestrian environment;
- More integrated design of the proposed development to group all

traffic servicing area, such that more area can be opened-up for pedestrian flow;
- More flexible building design and layout; and
- More space for enhancement of pedestrian passageways.

4.14 In association with the road closure within the Scheme, it is proposed to adopt the vehicular arrangement similar to the temporary one in practice for the construction of the MTR SCL To Kwa Wan Station. Kau Pui Lung Road could be reached via Chi Kiang Street from the south or via Tin Kwong Road from the north. The egress traffic could choose to travel via Lok Shan Road to Ma Tau Wai Road southbound or Tin Kwong Road to other places.

Provision of a Pedestrianised Avenue / Plaza

4.15 Portion of Maidstone Road and Kiang Su Street has been included as part of the Scheme for the creation of a car-free environment, as a pedestrianised avenue / plaza is being provided within the Scheme. The pedestrianised avenue / plaza will connect Lok Shan Road at the north and Chi Kiang Street at the south. It will also link to the two future entrances of the MTR SCL To Kwa Wan Station at Lok Shan Road and Kiang Su Street. The pedestrianised avenue / plaza will be opened for public use at reasonable hours to benefit the local community.

4.16 The pedestrianised avenue / plaza will include uncovered and covered area with hard and soft landscape, commercial / retail components, event space and sitting area for public enjoyment. Cohesive landscaping, tree planting and vertical greening will be explored to improve the pedestrian friendly environment and create a sense of place. The pedestrianised avenue / plaza will form part of the development and will be maintained and managed by the URA or its assignee for place making.

Enhancement of connectivity in the Scheme

4.17 To enhance connectivity, both at-grade and underground integrated pedestrian networks are proposed. An underground shopping street will be provided with connections to the two future entrances of the MTR SCL To Kwa Wan Station at Lok Shan Road and Kiang Su Street. The possible elevated linkages at the clubhouse level (i.e. first floor) not only serve the residents but also providing rain cover for the pedestrianised avenue / plaza on the ground level.

4.18 The connectivity to the south of the Scheme is further improved by turning the existing back lane into part of the pedestrianised avenue. The pedestrian environment towards Chi Kiang Street is improved while the visual corridor is also widened to attract pedestrian flow.

4.19 Subject to the design of the MTR SCL To Kwa Wan Station, the Scheme and the district-based URA redevelopment projects in To Kwa Wan can

be connected through the built pedestrian tunnel network in station and facilitate the progress of urban renewal.

Promoting walkability and place-making

4.20 In order to provide openness, two visual corridors are created along the existing Maidstone Road and Kiang Su Street respectively. The massing of buildings will be carefully designed to minimise site coverage thus resulting in a slight increase in the building height from 120mPD to 140mPD, which is compatible to the building height restriction of Lok Man Sun Chuen opposite under the OZP. That will allow a considerable width for comfortable pedestrian movement together with possible on-street activities. The accessibility of the pedestrianised avenue / plaza is also in a high level with the setback of podia to allow direct linkage and sightline to the entrances of the MTR SCL To Kwa Wan Station, podia with retail and GIC facilities, proposed open space and other event spaces.

4.21 With the massing optimised and visual corridors provided mentioned above, it helps to create two ventilation corridors in north-south (N-S) and east-west (E-W) directions to enhance comfort for these pedestrian friendly environment and event spaces. Air Ventilation Assessment (AVA) in **Appendix 4** demonstrates that the air breezeway is enlarged to improve the air ventilation, especially on the pedestrian level. The N-S corridor will improve the ventilation in the pedestrianised avenue / plaza in summer as the prevailing wind is in SSW and SW directions. Neighbourhood area including the pedestrian walkway of Kau Pui Lung Road and open area in Lok Man Sun Chuen will be benefited from the E-W corridor in the annual prevailing wind in E direction.

4.22 Visual Appraisal (VA) is also carried out in **Appendix 8** to demonstrate that the proposed building height of 140mPD is compatible with the surrounding developments as viewed from main street angles in the vicinity and also without jeopardising the urban design principles of maintaining a stepping height profile towards the waterfront and without obstructing the ridgeline. The gap between the proposed building towers are much larger under the scenario of 140mPD, which results in a wider and better visual corridor in a medium distance. The two corridors in N-S and E-W directions will also serve for visual corridors at the pedestrian level, which will invite people to the car-free and environmental-friendly pedestrianised avenue / plaza.

4.23 If the maximum building height of 120mPD is kept for the proposed development as of the current OZP, a bulkier building form and one extra building tower, comparing with the scenario of 140mPD, would be required. The layout of 3 towers on each side of the N-S corridor is proposed to keep the maximum extent of the major N-S corridor. However, the E-W corridor is unavoidably interrupted under the Sustainable Building Design (SBD) Guidelines including the requirements on building façade length and building separation. Due to

the limited site area and the existence of adjoining buildings in PH site, an extra tower is not feasible in typical public housing layout, which will result in bulkier building blocks and affect the N-S corridor in the scenario of 120mPD. The planning gain of the Scheme will be diminished as it will jeopardise the opportunity to create a wider ventilation and visual corridor and a larger area for place-making initiatives.

4.24 The removal of on-street parking, through the provision of public car parking spaces at the basement level of URA site as mentioned in paragraph 4.11, provides opportunities for optimising the surrounding pedestrian environment and further improves walkability. Since commercial and retail uses are permitted as of right at the lowest 3 floors, flexibility has been built-in for the provision of shops frontage along Kau Pui Lung Road to enhance street vibrancy.

4.25 The design will aim to meet the design guidelines stipulated in the SBD Guidelines by providing the requisite building separation, building permeability and greenery in the Scheme to enhance the environmental sustainability.

Provision of GIC Facilities and Open Space

4.26 Not less than 500m^2 GFA in URA site and about 1,650m^2 GFA in PH site respectively will be reserved to provide appropriate GIC facilities to meet the community needs. For the GIC facility in URA site, it may be used by Government department(s), or the URA may consider to invite non-governmental organizations (NGOs) or by itself to run and operate the appropriate GIC facilities. The provision of not less than 400m^2 of open space for public use at reasonable hours, provides more amenity for the community.

4.27 The local open space fulfilling the minimum requirement of 1m^2 per person in accordance with the HKPSG will be provided and is subject to the detailed design.

Technical Assessments

Traffic Impact

4.28 A TIA (see **Appendix 2**) has been conducted to assess the traffic impact of the Scheme, the proposed closure of the portion of Maidstone Road and Kiang Su Street within the Scheme, the proposed provision of the public vehicle park and the internal transport facilities of the proposed development. The TIA demonstrated that the Scheme together with the proposed public vehicle park will improve the local traffic network and the pedestrian walking environment. The proposed parking provision and layout of the public vehicle park and the internal transport facilities are acceptable from traffic engineering point of view.

4.29 The URA will liaise with relevant government departments for the statutory requirements concerning the permanent closure of the southern portion of Maidstone Road and western portion of Kiang Su Street and the details of the traffic arrangement in the vicinity during the detailed design stage of the Scheme.

Environmental Aspect

4.30 An Environmental Assessment (EA) (see **Appendix 3**) was conducted to study any potential environmental impact / benefit associated with the implementation of the Scheme. The study concluded that the impact on air quality, noise and waste management will be improved after redevelopment. The URA will ensure that satisfactory environmental standards are being met at the detailed design stage and during implementation.

Air Ventilation

4.31 An Air Ventilation Assessment (AVA) (see **Appendix 4**) demonstrates that the scenario of 140mPD will provide a wider ventilation corridor and create a better walking environment at-grade comparing to the OZP-compliance scenario of 120mPD. The slimmer residential towers and the reduction of number of building blocks increase building separation and thus enhance wind penetration across the Scheme. The proposed Scheme could slightly enhance the wind flow in the nearby area.

Drainage Impact

4.32 A Drainage Impact Assessment (DIA) was conducted (see **Appendix 5**). The DIA report concluded that the paved areas of existing and proposed development are comparable and thus the surface runoff conditions will be likely to be similar. Drainage pipe rearrangement for those existing pipes passing through the Scheme and pipe upgrading are proposed subject to detailed design in the latter stage. No adverse impact to the existing drainage systems is expected.

Sewerage Impact

4.33 A Sewerage Impact Assessment (SIA) was conducted (see **Appendix 6**). The SIA report concluded that the capacity of the existing sewerage system is sufficient for the increase in population along with the proposed development in the Scheme and no upgrading of the sewerage system is needed. Sewerage pipe rearrangement for those existing pipes passing through the Scheme is proposed subject to detailed design in the latter stage. No adverse impact to the existing sewerage systems is expected.

Water Supply Impact

4.34 A Water Supply Impact Assessment (WSIA) was conducted (see

Appendix 7). The WSIA report concluded that the volumes of the new demands for both freshwater and saltwater from the development are not particularly large and can be provided from the existing supply facilities. No adverse impact to the existing systems is expected.

Visual Impact

4.35 A Visual Appraisal (VA) was conducted (see **Appendix 8**) to study the potential visual impact with the implementation of the Scheme. The Scheme falls at the edge of the view-fan for protection of the ridgeline viewing from the Wanchai vantage point. The visual appraisal from the Wanchai vantage point showed that both ridgeline and the 20% building free zone are not interrupted by the Scheme. Visual appraisal is also carried out in the local context by selecting several vantage points from the nearby view corridors to assess any visual impact of the proposed development. The several views showed that the proposed development with 140mPD in the Scheme can generally blend in with the surrounding high-rise developments and do not create any significant blockage of views in the area. Moreover, the views demonstrate that the proposed development with 140mPD have a wider building separation comparing to the OZP-compliance layout with 120mPD.

Social Impact

4.36 In accordance with the URS, a non-obtrusive Social Impact Assessment (Stage 1) has been conducted and the report is included as **Appendix 9**. The report highlights characteristics of the local population which will need to be prepared for and borne in mind during the implementation of the Scheme. The Stage 2 Social Impact Assessment Report is under preparation based on factual data and opinions collected from the freezing survey and social impact assessment interviews, which has been conducted on the commencement of the Scheme. The Stage 2 Social Impact Assessment Report will be submitted to TPB separately. The Social Impact Assessment reports are to assess the likely effect of the implementation of the Scheme and to propose mitigation measures to minimise any social impact.

Landscape Impact

4.37 As there is no existing tree in the Scheme, no adverse impact on landscape is anticipated. It is expected to have improvements considering the proposed pedestrianised avenue / plaza and open space for public use. The landscape proposal is subject to the detailed design in later stage.

5 PLANNING AND DESIGN MERITS

5.1 The Scheme will provide the following planning and environmental benefits:-

- full utilisation of development potential in high density development area in the urban district to increase flat supply about five times more than the existing flat number;
- some of the land within the Scheme earmarked for public housing development according to the directive under the PAs;
- more efficient use of land by including dead-end road in the Scheme, forming a comparatively completed land parcel;
- provision of both at-grade and underground integrated pedestrian networks to enhance connectivity in the Scheme;
- creation of a car-free environment as a pedestrianised avenue / plaza provided within the Scheme;
- provision of openness by creating two visual corridors along the existing Maidstone Road and Kiang Su Street respectively and the massing of buildings carefully designed thus resulting in a slight increase in the building height from 120mPD to 140mPD;
- with the massing optimised and visual corridors provided, two ventilations corridors created to enhance comfort for these pedestrian friendly environment and event spaces;
- provision of 140 public parking spaces at the basement level of URA site not only compensates the existing on-street parking spaces, but also providing more public parking facilities;
- removal of on-street parking provides opportunities to optimise the surrounding pedestrian environment and further improve walkability; and
- provision of GIC facilities and open space for public use for community.

6 IMPLEMENTATION OF THE DEVELOPMENT SCHEME

6.1 The URA does not own or lease any land within the boundaries of the Scheme and will acquire all the private lots within the Development Scheme boundary. The URA intends to acquire the property within the Scheme boundary by purchase under the current acquisition policy. The URA will offer an owner-occupier of domestic property the market value (valued on vacant possession basis) of his / her property plus an ex-gratia allowance, namely Home Purchase Allowance (HPA), for purchase of the property. The CBS members have to settle the outstanding land premium to the Government to release the alienation restriction before they can assign legal titles of their flats to the URA. The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.

6.2 The URA may also offer “Flat-for-Flat” (FFF) (subject to any changes in the relevant legislations) in a URA new development in-situ or in the same district or at available site(s) (as the URA may select for the purpose provided that necessary approval / authorization has been obtained at the time of FFF offer), as an additional choice to cash compensation to owner-occupiers of domestic units. The amount of cash compensation and ex-gratia payment offered to an owner-occupier will not be changed by his / her choice of using that amount, or part of it, to join the FFF arrangement or otherwise.

6.3 According to paragraph 54 of the PA in 2018, the dedicated housing approach can help address the accommodation issue arising from the redevelopment of CBS sites. For the affected eligible owner-occupiers of ex-CBS member, an additional rehousing option will be provided to purchase dedicated subsidized units in urban area developed and managed by the HKHS. Details of this additional option will be provided by the Government in due course. However, for those owner-occupiers who have chosen this option, cannot join the FFF arrangement as mentioned in paragraph 6.2.

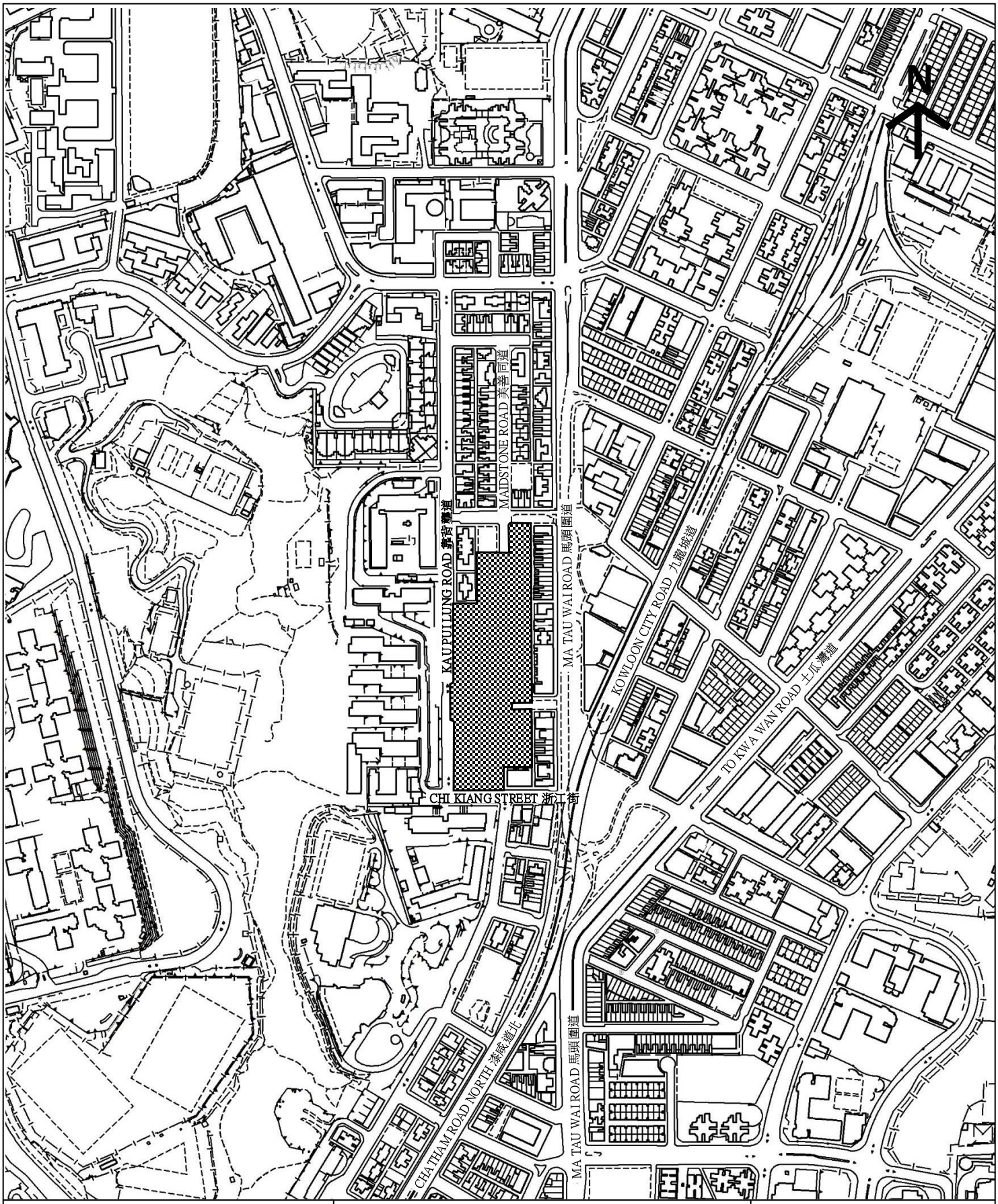
6.4 The URA may implement the URA site of the Scheme in association with one or more parties or implementing the Scheme by itself alone, while the PH site will be implemented by the agent appointed by THB.

6.5 Supplementary documents detailing the implementation programme for the Scheme and the URA’s rehousing, compensation, acquisition and resumption principles are attached in **Appendices 10, 11** and **12** respectively.

6.6 Any information contained in this document relating to compensation and re-housing benefits are with reference to the URA's prevailing policy on compensation and re-housing benefit ("Compensation Package") offered by the URA to owners / tenants at the time of issuance of this document. The Compensation Package may be subject to change from time to time upon any review carried out by the URA. The Compensation Package to be offered by the URA to owners / tenants affected by the URA's project shall be that Compensation Package prevailing at the time of offer. Nothing contained in this document shall constitute any representation or warranty on the part of the URA or give rise to any expectation that the Compensation Package contained in this document will not be changed at the time of implementation of the project.

URBAN RENEWAL AUTHORITY

May 2020



THE SCHEME

EXTRACT PLAN PREPARED ON 15.07.19
BASED ON SURVEY SHEET No.11-NE-16A,
11-NE-16C, 11-NW-20B, 11-NW-20D

LOCATION PLAN

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

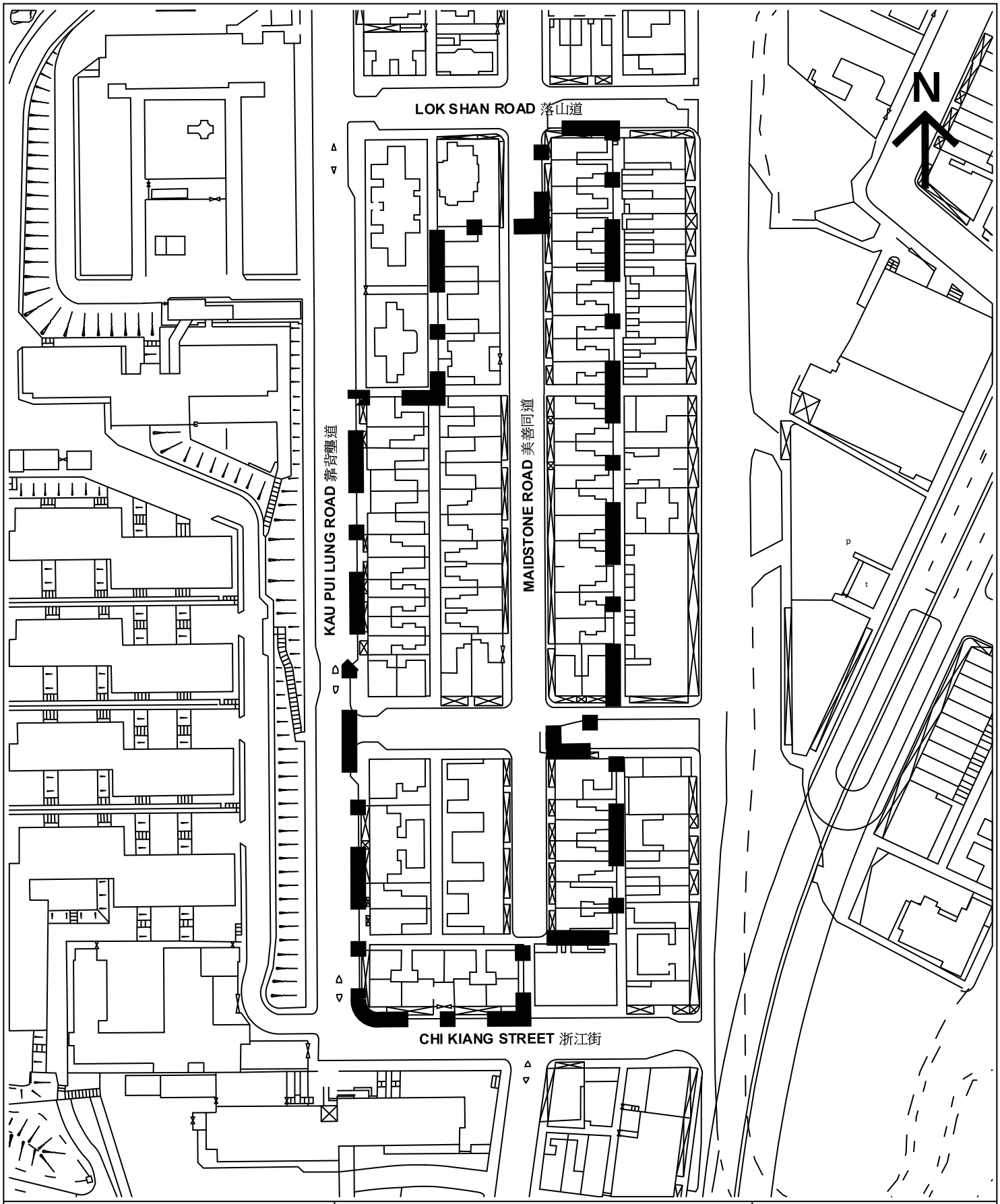
SCALE 1 : 5000

METRES 100 0 100 200 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN
1



THE SCHEME

EXTRACT PLAN PREPARED ON 15.07.19
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

SITE PLAN

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

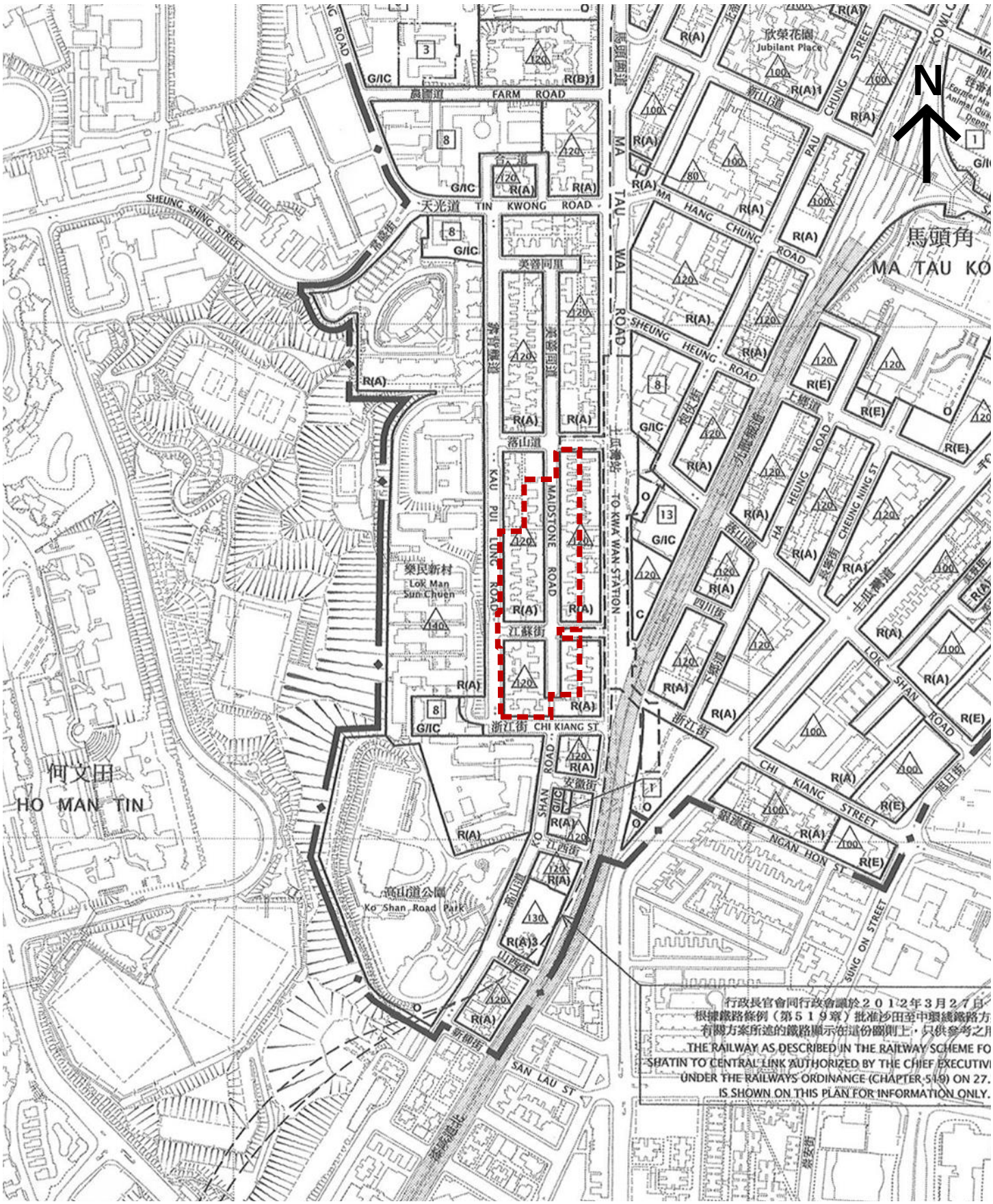
SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 2



THE SCHEME

EXTRACT PLAN BASED ON
DRAFT MA TAU KOK OUTLINE ZONING
PLAN No.S/K10/25

EXISTING ZONING OF DEVELOPMENT SCHEME

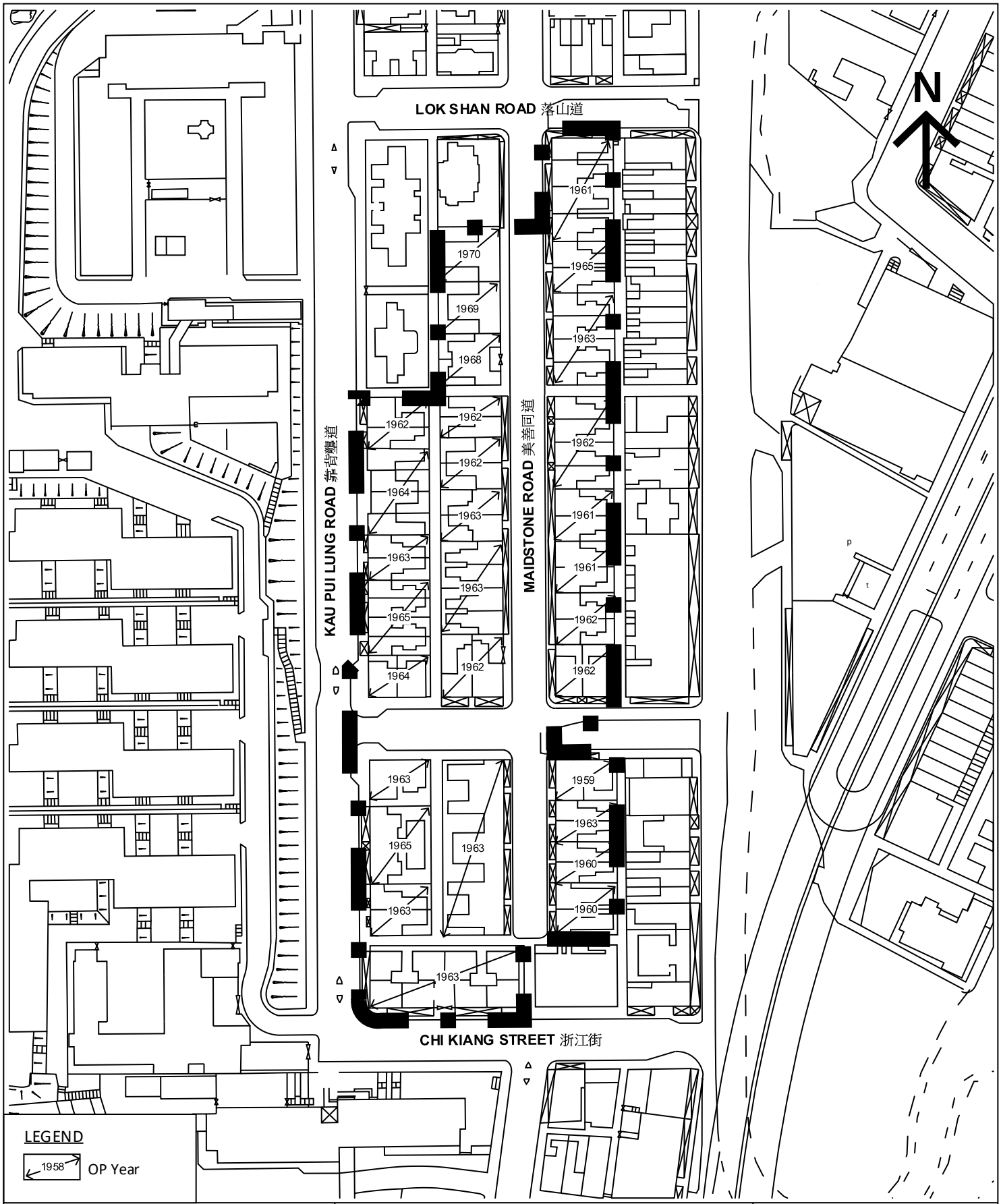
DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET
SCALE 1 : 5000

METRES 100 0 100 200 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 3



THE SCHEME

EXTRACT PLAN PREPARED ON 15.07.19
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

BUILDING AGE

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

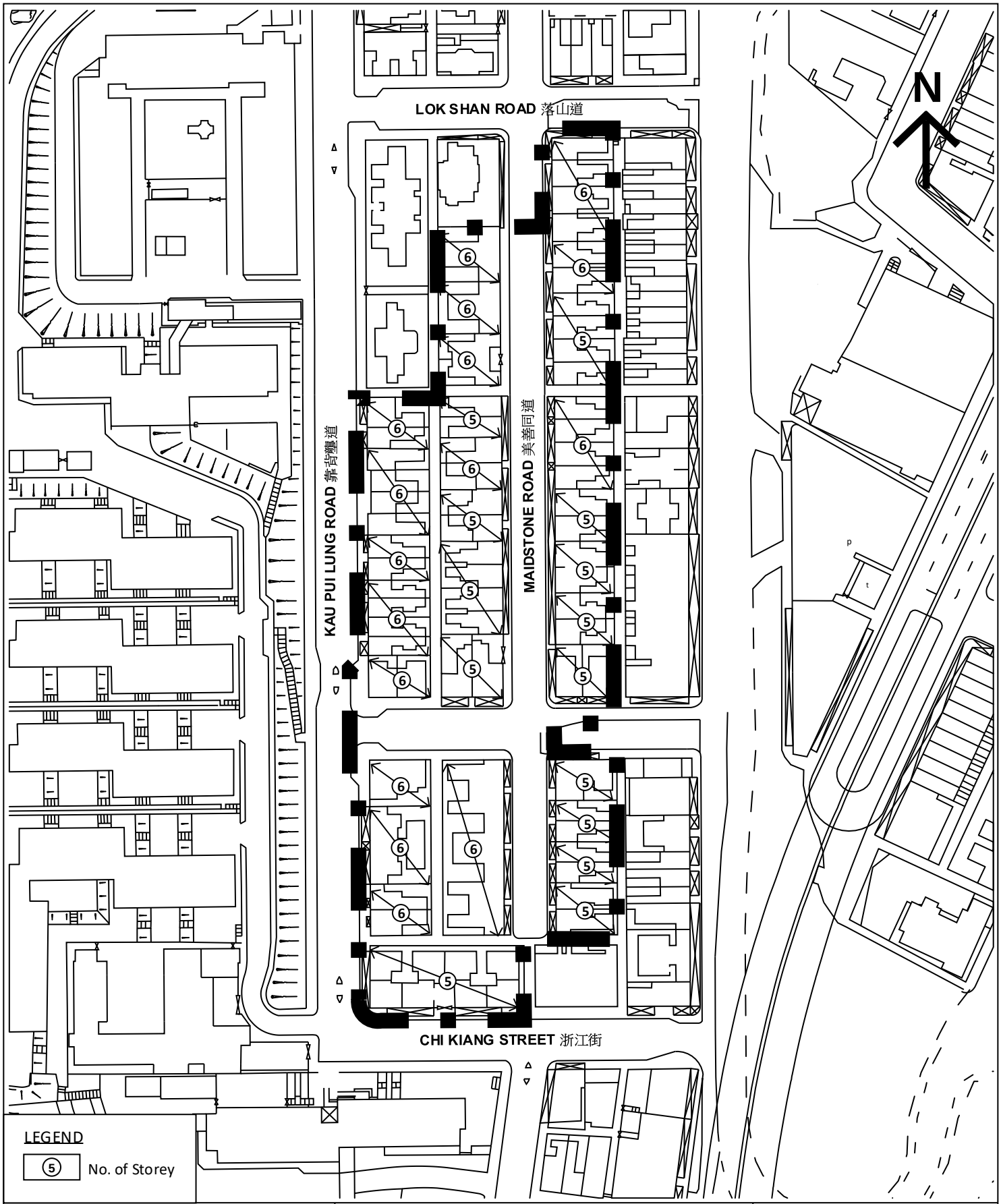
SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 4



THE SCHEME

EXTRACT PLAN PREPARED ON 15.07.19
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

BUILDING HEIGHT

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

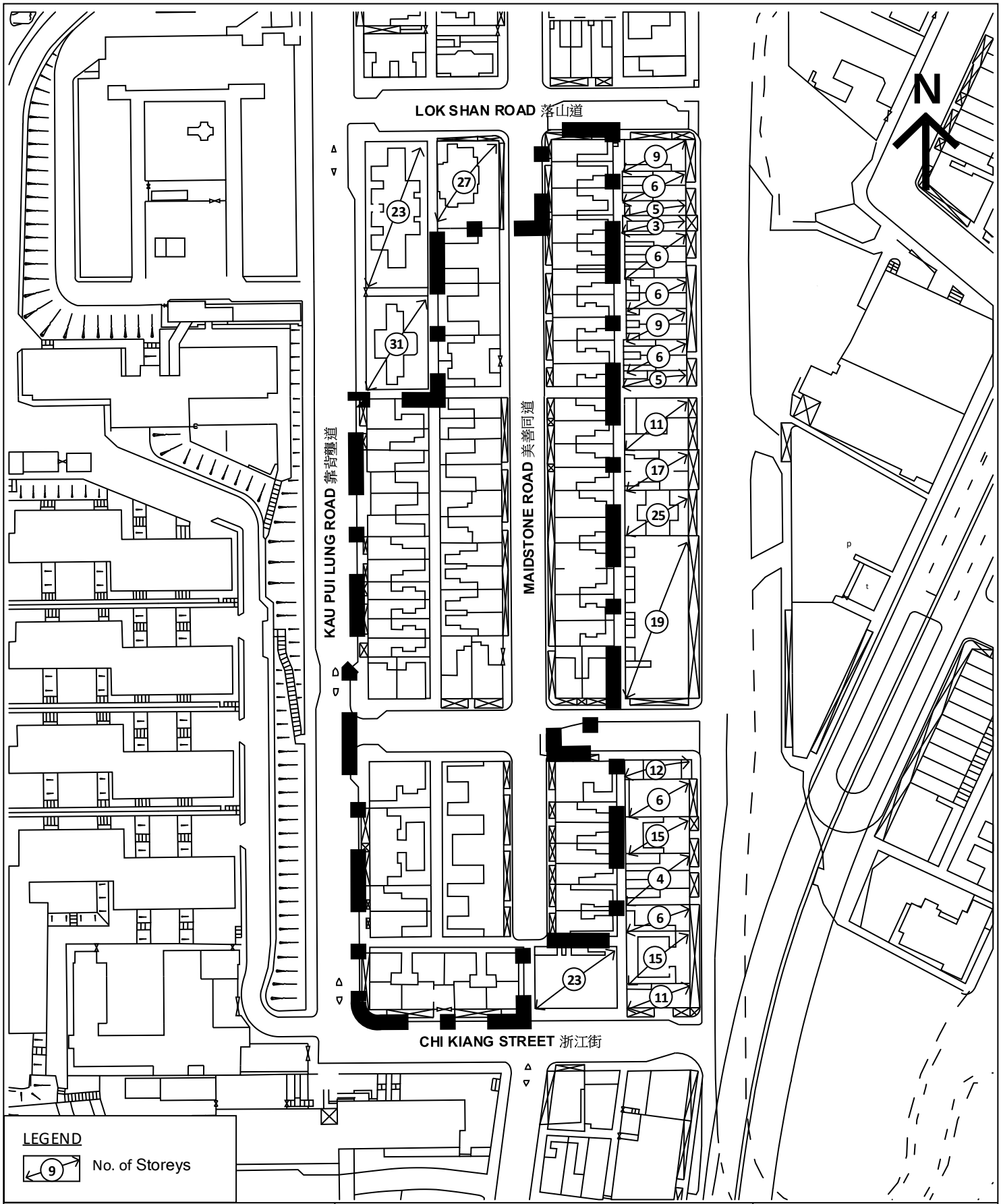
SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 5



THE SCHEME

EXTRACT PLAN PREPARED ON 15.07.19
BASED ON SURVEY SHEET No. 11-NW-20B, 11-NW-20D

INFORMATION ON BUILDINGS IMMEDIATELY ADJACENT TO THE SCHEME

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

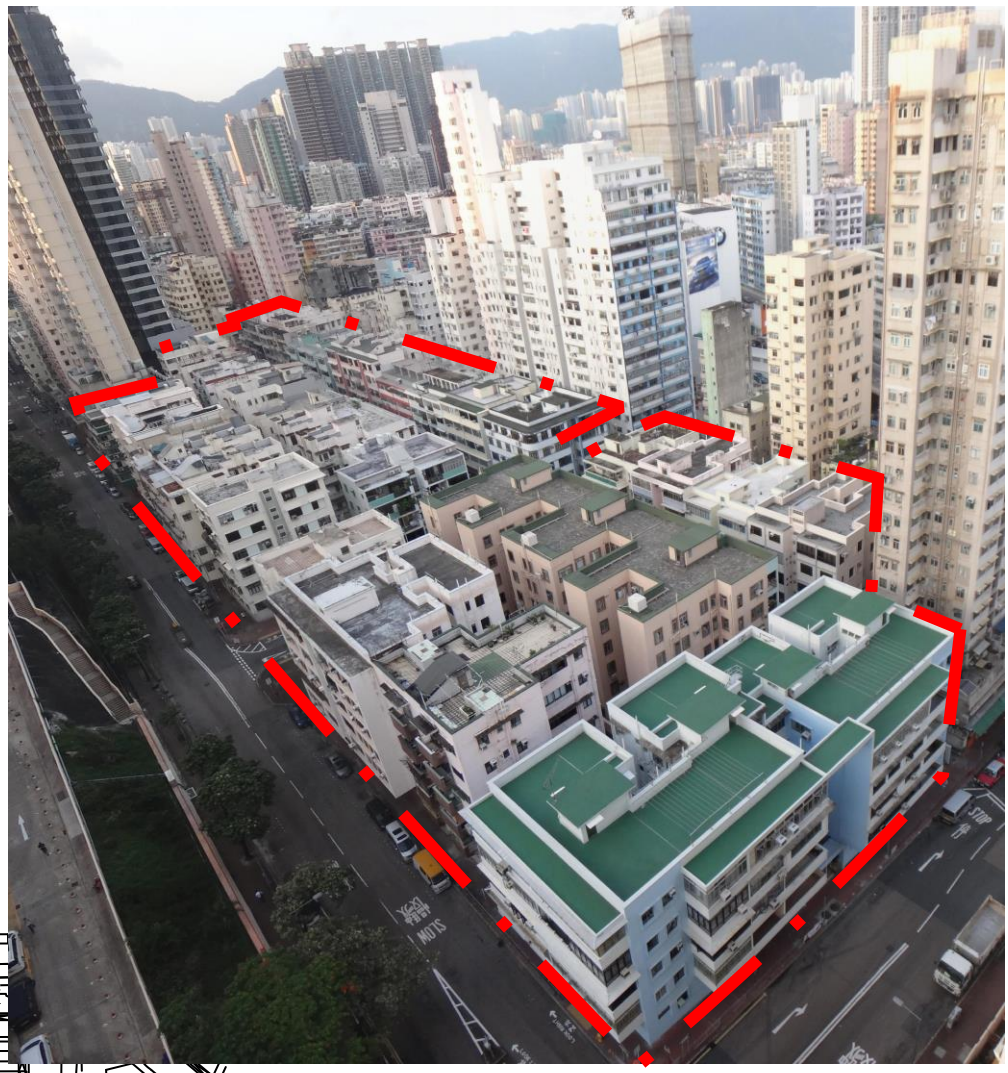
SCALE 1 : 1500

METRES 15 0 15 30 45 60 75 METRES

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN 6



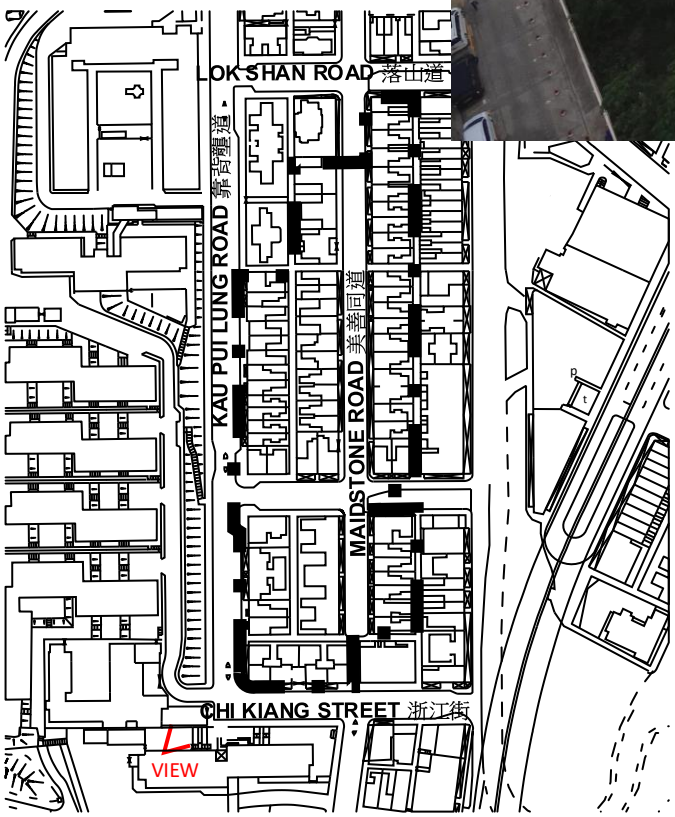


PHOTO TAKEN IN
JULY 2019

SITE PHOTOS

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN
8

VIEW A

VIEW B

PHOTOS TAKEN IN
MAY 2020

SITE PHOTOS

DEVELOPMENT SCHEME
AT KAU PUI LUNG ROAD / CHI KIANG STREET

市區重建局
URBAN RENEWAL AUTHORITY

CBS-2:KC

PLAN
9

Part 3 – Supplementary Information

Appendix 9:

Stage 1 Social Impact Assessment

市區重建局
URBAN RENEWAL AUTHORITY

Kau Pui Lung Road / Chi Kiang Street

Development Scheme (CBS-2:KC)

Stage 1 Social Impact Assessment

May 2020

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1. INTRODUCTION

1.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive, the Urban Renewal Authority (URA) is invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. According to the directive under the PAs, some of the land within the Scheme is to be earmarked for public housing development upon approval.

1.2 In the new Urban Renewal Strategy (URS) issued by the Government in February 2011, the URA will carry out Social Impact Assessment (SIA) studies in the form of "*a Stage 1 social impact assessment ….. before the publication of any proposed redevelopment project in the Government Gazette"*; and *"a Stage 2 social impact assessment …. after the proposed project has been published in the Government Gazette*".

1.3 The URS also states "*Early social impact assessments will be initiated and conducted by the DURF (District Urban Renewal Forum) before redevelopment is recommended as the preferred option. The URA will update these assessments by DURF before implementing any specific redevelopment project.*". As the early SIA conducted by Kowloon City DURF ("KC DURF") does not cover the area of the Scheme, there is no early SIA conducted by DURF which the URA could update for this Development Scheme.

1.4 According to the URS, the main elements of the Stage 1 SIA conducted by the URA before publication of a proposed project should include:-

- the population characteristics of the proposed project area;
- the socio-economic characteristics of the area;
- the housing conditions in the area;
- the characteristics of local business activities, including small shops and street stalls;
- the degree of overcrowding in the area;
- the availability of amenities, community and welfare facilities in the area;
- the historical background of the area;
- the cultural and local characteristics of the area;
- an initial assessment of the potential social impact of the proposed project; and

- an initial assessment of the mitigation measures required.

1.5 The Stage 2 SIA to be conducted after publication of the project will use factual information collected in the Freezing Survey at project commencement. The URS stipulates the URA should submit both Stage 1 and Stage 2 SIA reports to the Town Planning Board (TPB) when it submits a development scheme under section 25 of the Urban Renewal Authority Ordinance (URAO). It also stipulates the URA should release the reports for public information.

2. THE PROJECT BACKGROUND

2.1 The Scheme is located in Kowloon City (KC) District, which is broadly bounded by a row of buildings at Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north (**Figure 2.1**). It covers a gross site area of about 16,473 sq.m, subject to site survey, involving a cluster of 30 CBS sites developed under 28 CBSs (i.e. 3 of the CBS sites are developed under 1 CBS): Nos. 59-77, 99-117, 123-133 Maidstone Road (odd nos.), Nos. 82-128 Maidstone Road (even nos.), Nos. 153-175, 181-189 Kau Pui Lung Road (odd nos.), Nos. 1-3, 7-9 Kiang Su Street (odd nos.), Nos. 4-14 Kiang Su Street (even nos.), Nos. 52-58, 52A-58A Chi Kiang Street (even nos.), a portion of Maidstone Road and Kiang Su Street, government lanes, and portion of the surrounding public pavement, forming a comparatively completed land parcel for high density residential development. Subject to detailed design, the net site area used to calculate the development potential of the Scheme is about 15,475 sq.m (subject to site survey).

2.2 According to the characteristics suitable for CBS redevelopment as set out in paragraphs 53 and 54 of the PA in 2018, the Scheme has been selected as one of the pilot CBS redevelopment projects with the multiple factors duly considered including but not limited to the following: cluster of CBS sites in high-density development areas (i.e. R(A) zone under the Outline Zoning Plan (OZP)) in the urban districts, numbers of CBS involved, proximity to existing public rental housing and other ancillary facilities, building age and its existing development density.

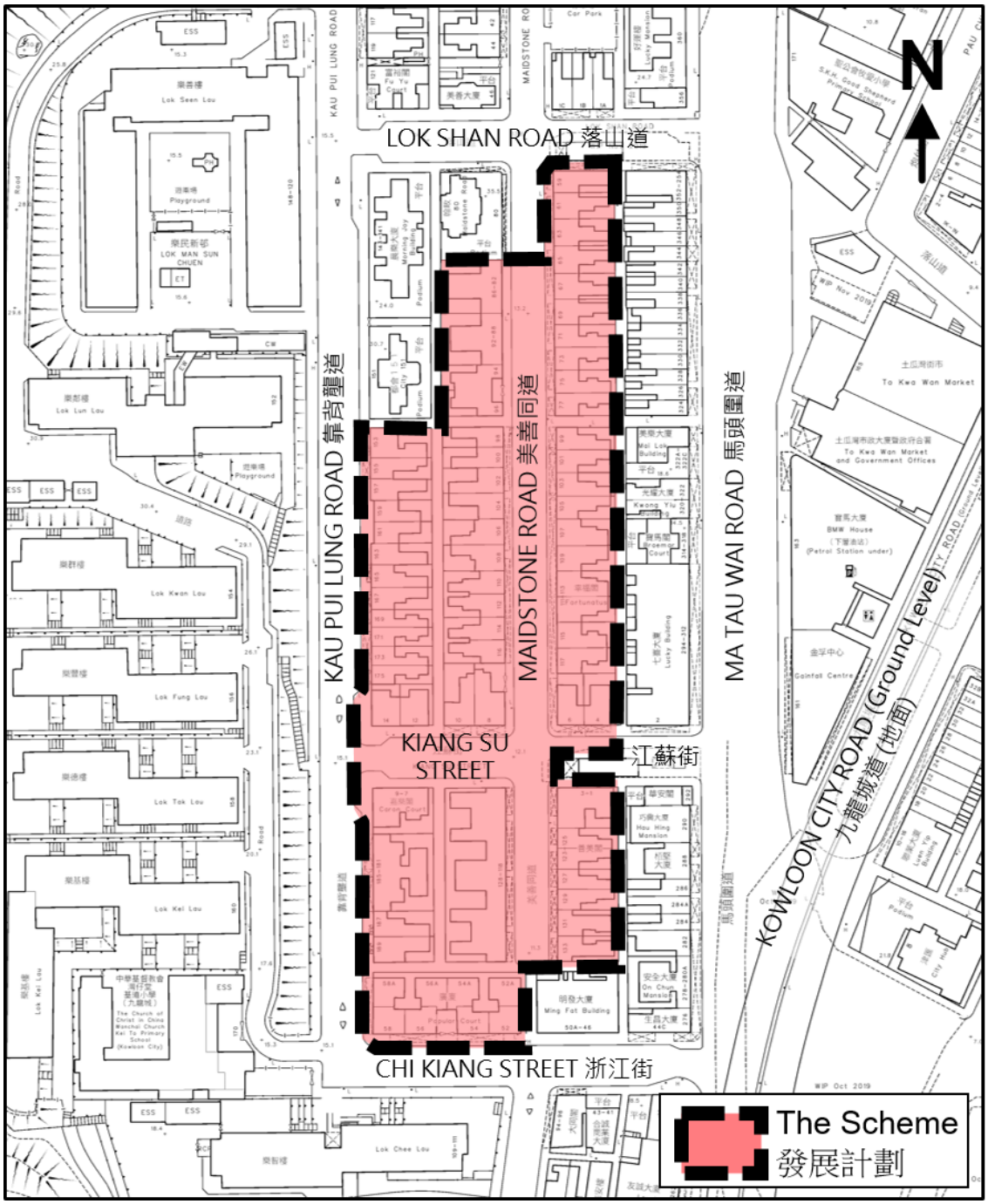

Figure 2.1 Location Plan

Planning Objectives

2.3 The 2011 URS promulgates a comprehensive and holistic approach to carry out urban renewal objectives and listed out its objectives under paragraph 5. As one of the key guiding directions, the following objectives were also considered in the overall planning and design of the Scheme apart from paragraph 1.1:-

- Restructuring and replanning of concerned urban areas;
- Designing more effective and environmentally-friendly local transport and road

networks within the concerned urban areas;
- Rationalising land uses within the concerned urban areas; and
- Enhancing the townscape with attractive landscape and urban design.

2.4 Whilst meeting the objectives as listed in the PAs as mentioned in paragraph 1.1, the Scheme also seeks to improve the overall environment through redevelopment in accordance with the URS with the following planning objectives duly considered to be implemented:-

i. The Scheme will be separately developed by the URA and the agent appointed by Transport and Housing Bureau, for the private and public housing portion respectively, under the same planning strategy. The northern part will be developed by the URA (regarded as URA site), whilst the southern part will be earmarked for public housing development (regarded as PH site).

ii. For better planning and to increase housing supply, portion of Maidstone Road and Kiang Su Street are included for plot ratio (PR) calculation and the proposed total Gross Floor Area (GFA) of the Scheme is about 134,495 sq.m. A maximum domestic GFA of about 77,063 sq.m and 45,200 sq.m in URA site and PH site respectively are proposed. The latter has a domestic PR higher than the traditional 7.5 restriction in Kowloon as agreed with Development Bureau with policy support obtained, which aligns with the intention to increase housing supply as stated in the PAs. The flat supply of the Scheme will be about five times of the existing flat number, according to the approved General Building Plan (GBP) as of January 2020, increasing from about 460 to about 2,500 units.

iii. To enhance connectivity, both at-grade and underground integrated pedestrian networks are proposed. Portion of Maidstone Road and Kiang Su Street has been included as part of the area of the Scheme for the creation of a car-free environment, as a pedestrianised avenue / plaza is being provided within the Scheme. An underground shopping street will be provided with connections to the two future entrances of the MTR Shatin-to-Central Link (SCL) To Kwa Wan Station at Lok Shan Road and Kiang Su Street. The connectivity to the south of the Scheme is further improved by turning the existing back lane into part of the pedestrianised avenue.

iv. Adopting the people-oriented urban design concept, the Scheme will also enhance the walkability and the user experience and create vibrancy through place-making:-

a) In order to provide openness, two visual corridors are created along the existing Maidstone Road and Kiang Su Street respectively. The massing of buildings will be carefully designed to minimise site coverage thus resulting in a slight increase in the building height from 120mPD to 140mPD, which is compatible to the building height restriction of Lok Man Sun Chuen opposite under the OZP. With the massing optimised and visual corridors provided, it helps to create two ventilation corridors in north-south and east-west directions to enhance comfort for these pedestrian friendly environment and event spaces;

b) The pedestrianised avenue / plaza will be provided within the Scheme, with uncovered and covered area with hard and soft landscaping, commercial / retail components, event space and sitting area for public enjoyment. Cohesive landscaping, tree planting and vertical greening will be explored to improve the pedestrian friendly environment and create a sense of place; and

c) Provision of about 140 public car parking spaces at the basement level of URA site not only compensates the existing on-street parking spaces at Maidstone Road, Kiang Su Street and Kau Pui Lung Road, but also providing more public parking facilities. The removal of on-street parking provides opportunities for optimising the surrounding pedestrian environment and further improves walkability.

v. Not less than 2,150 sq.m GFA will be reserved to provide appropriate Government, institution or community (GIC) facilities to meet the community needs. The provision of not less than 400 sq.m of open space, for public use at reasonable hours, provides more amenity for the community.

URA Projects in the Vicinity

2.5 The Scheme is located close to a number of ongoing URA projects nearby (**Figure 2.2**). To the east of the Scheme are the URA's Chi Kiang Street / Ha Heung Road Development Project (TKW/1/001) and Kowloon City Road / Sheung Heung Road Development Project (KC-007) which commenced on 29 February 2008 and 25 November 2011 respectively. TKW/1/001 was issued an occupation permit on 27 May 2017 while KC-007 is currently under construction and is expected to be completed in 2020/21.

2.6 To the southeast of the Scheme is a cluster of URA commenced redevelopment projects (KC-009 to KC-014 and DL-8:KC) launched under district-based approach that allow

the URA to undertake broader scale restructuring and replanning to improve the built environment and create opportunities for designing a pedestrian friendly neighbourhood.

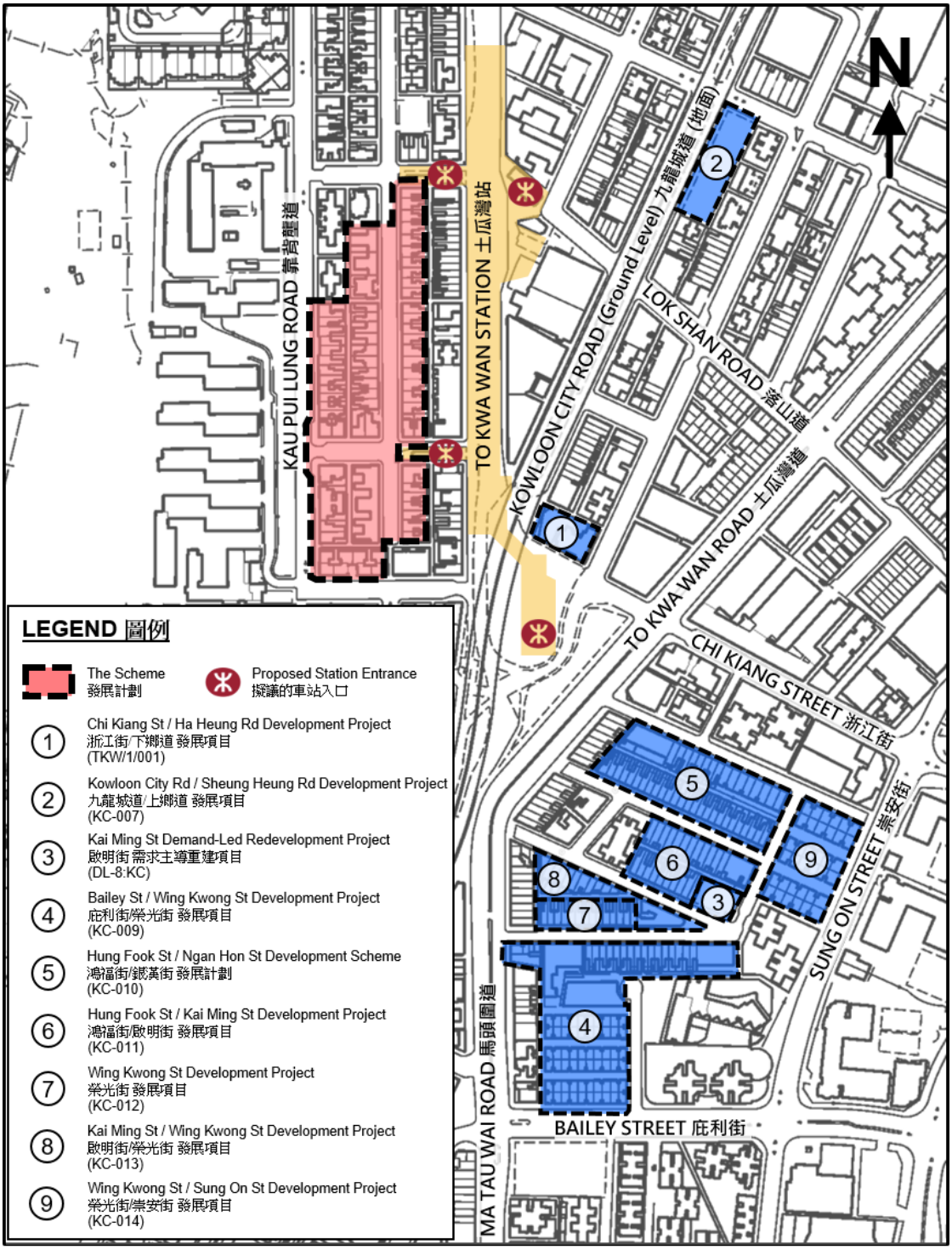

Figure 2.2 URA Projects in the Vicinity

3. HISTORICAL BACKGROUND AND LOCAL CHARACTERISTICS

3.1 The origin of the name “To Kwa Wan” has two different narratives. One was named after the bay with plentiful crops of sweet potatoes (“To Kwa”). Another suggests that the Hoi Sham Island (in the middle of the sea) just opposite to To Kwa Wan was shaped like a “To Kwa”.

3.2 Before 1864, To Kwa Wan was a bay lined by beaches and mud-flats and the only significant stream from the hinterland running towards the bay was Ma Hang Chung, which flowed closely along the existing Ma Hang Chung Road. Ma Tau Kok (means pier’s headland) was the northern headland of the bay, which was probably named after the long pier of Kowloon Walled City nearby.

3.3 On the north-facing coast of the headland, there was a small settlement with 8 to 11 cottages bearing the same name as the headland. The quarries at Ma Tau Kok and To Kwa Wan had started to operate since mid-18th century and one of the quarries was located at the slope of a knoll named San Shan (means new quarry). San Shan Road was believed to commemorate the quarry and the settlements of stone-cutters nearby.

3.4 To the south of Ma Tau Kok, there was a string of villages along the coast of To Kwa Wan Bay sharing the name of To Kwa Wan Village. This agricultural and stone-cutters village was believed to be the largest village in the Hung Hom and To Kwa Wan area with over 400 people living there in 1873.

Land Reclamation

3.5 Historical map records indicate that the Scheme was probably located near the then coastline before 1890s. Several rounds of reclamation had been undertaken in Ma Tau Kok Bay, To Kwa Wan Bay and Hung Hom since the 1890s till 1960s to increase land at the coastline for expansion of population.

Civil Servants’ Co-operative Building Society Scheme

3.6 The CBS scheme is a form of civil servants’ housing benefit managed by the Civil Service Bureau. It was launched in 1952 to allow the Government to grant land at a concessionary premium to enable eligible civil servants to build residential buildings through forming co-operative societies. The co-operative societies which are responsible for the building management and maintenance were set up under the Co-operative Societies Ordinance (Cap. 33). No CBS sites have been developed since the mid-1980s. A number of buildings under CBS scheme were developed in the

1960s in To Kwa Wan, especially along Maidstone Road and Kau Pui Lung Road.

3.7 Under the alienation restriction, owners of flats of a building of CBS are not permitted to assign, mortgage, underlet, part with possession of, or otherwise dispose of their properties, or enter into any agreement for such purposes. A CBS flat owner can apply to remove the alienation restriction and pay the outstanding land premium at any time after the legal title has been transferred to him / her. Based on the ownership records in the Land Registry as of January 2020, about 68% of the CBSs (19 out of 28) within the Scheme were dissolved. Only 10% of the dissolved units (29 out of 292) were settled the outstanding land premium and removed the alienation restriction. There is no sign of active acquisition nor existence of major stakeholder within the Scheme. **Table 3.1** shows the ownership status of the CBSs within the Scheme.

Table 3.1 Ownership Status of the CBSs within the Scheme

		No. of Units*	No. of CBSs	Percentage (about)
Dissolved CBS		**292**	**19**	**68%**
- Status of Outstanding Land Premium and Alienation Restriction	*Settled and Removed*	*29*	*-*	*10%*
	Not Yet Settled and Removed	*263*	*-*	*90%*
Undissolved CBS		**170**	**9**	**32%**
Total		**462**	**28**	**100%**

** According to the approved GBP as of January 2020.*

Hoi Sham Island and Tin Hau Temple

3.8 Hoi Sham Island was originally a small island but was subsequently linked with the mainland by reclamation. In 1964, the Lung Mo Temple at the island was relocated into the Tin Hau Temple at No. 49 Ha Heung Road. Hoi Sham Island was developed as Hoi Sham Park with the landmark of Fishtail Rock. The Tin Hau Temple has been graded the Grade III status by the Antiquities Advisory Board.

Pak Tai Temple

3.9 The temple was originally located on a hillock, at the junction of the present Tsing Chau Street and Ma Tau Wai Road. According to the inscription on the incense burner, the temple was built in 1876. However, because of urbanization, the temple was

demolished and a new temple was built at the present location in the 1930s. The temple had undergone major renovation in 2005.

Ko Shan Theatre

3.10 The Ko Shan Theatre is a popular venue for Cantonese opera performances first opened in March 1983 and was designed as a 3,000 seat semi-open-air theatre. However, it suffered from inclement weather and noise problems, and was re-opened with an indoor 1031-seat theatre in October 1996. Ko Shan Theatre underwent extension works in 2008/09 with a new wing with a 600-seat theatre, activity and dance rooms. The new wing was opened in October 2014.

Ma Tau Kok Animal Quarantine Depot (alias Cattle Depot)

3.11 The Animal Quarantine Depot, built in 1908, is located at Ma Tau Kok Road. It was relocated from Hung Hom due to the construction of the then Kowloon-Canton Railway. These red-brick structures are the only century-old western-style buildings for such purpose left in Hong Kong. The depot is no longer in service and has been converted by Government into an artist village, named Cattle Depot Artist Village. Currently, it has been accorded Grade II status by the Antiquities Advisory Board.

Ma Tau Kok Gas Plant

3.12 The Ma Tau Kok Gas Plant was built in the 1930s and provided gas supply to people for more than eighty years. The eastern plant has been redeveloped as a residential development called Grand Waterfront, while the western plant is still in operation. With its significant cylindrical gasholders and unique industrial infrastructure, it is now an icon of the remarkable industrialization history of Hong Kong.

Others

3.13 There are also other places with historical background and local character near the Scheme (see **Figure 3.1**).

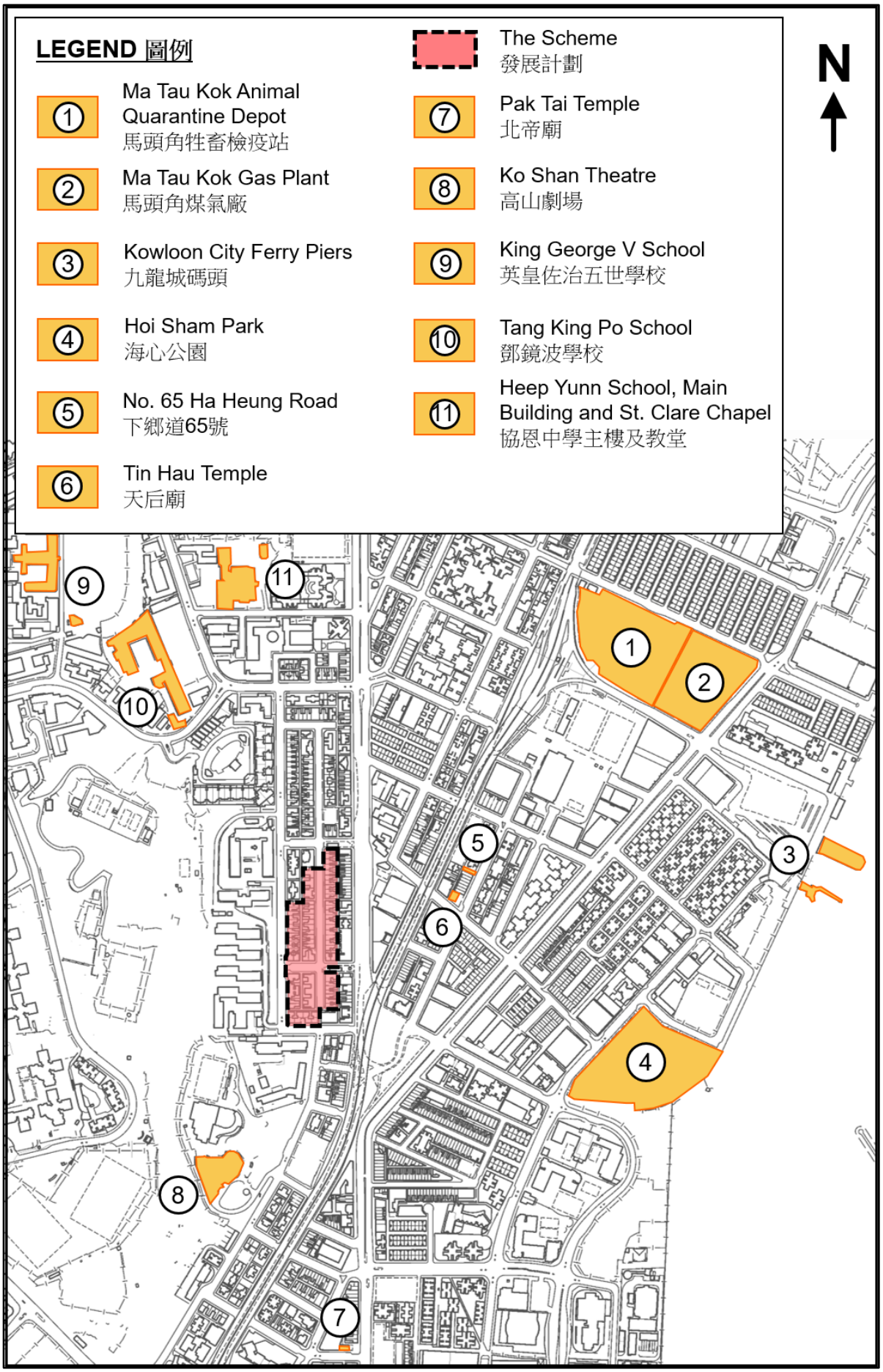

Figure 3.1 Places with Historical Background and Local Character in To Kwa Wan

4. POPULATION & SOCIO-ECONOMIC CHARACTERISTICS

4.1 To assess the population and socio-economic characteristics of the Scheme, the 2016 Population By-Census results have been used. For the accommodation assessment, it is based on the approved GBP and on-site non-obtrusive observation. Given the background of the (general and non-obtrusive nature) sources of the data available to carry out this Stage 1 SIA, the assessments derived should only be considered as indicative and for reference use only and subject to the Freezing Survey.

4.2 The Census and Statistics Department's (C&SD) website provides the 2016 Population By-Census results. Depending on the types of census data, the 'lowest' disaggregated data available may be down to Tertiary Planning Unit (TPU), Large Street Block Groups (LSBG) level or Small Street Block Groups (SSBG) levels and Constituency Area.

4.3 The Scheme falls within the Ma Tau Kok Constituency (G03) and Lok Man Constituency (G04) of the KC District and within TPU 241 (**Figure 4.1**).

4.4 The Scheme lies within TPU SSBGs 24117, 24121, 24123, 24124 and 24125, and falls within LSBGs 24117, 24118L and 24123L (**Figure 4.2**). The LSBGs 24117 and 24118L cover residential buildings including private buildings not under CBS scheme. Some of them are relatively younger residential buildings such as City 151 (No. 151 at Kau Pui Lung Road), 80 Maidstone Road (Nos. 78-80 at Maidstone Road (even nos.)), Delight Court (No. 418 at Ma Tau Wai Road) and a residential building (No. 356 at Ma Tau Wai Road), which were built in 2003, 2019 and 2002 respectively. The socio-economic characteristics of those residing in private buildings not under CBS scheme can be assumed to be different to those residing within the Scheme, which are all old buildings of CBS.

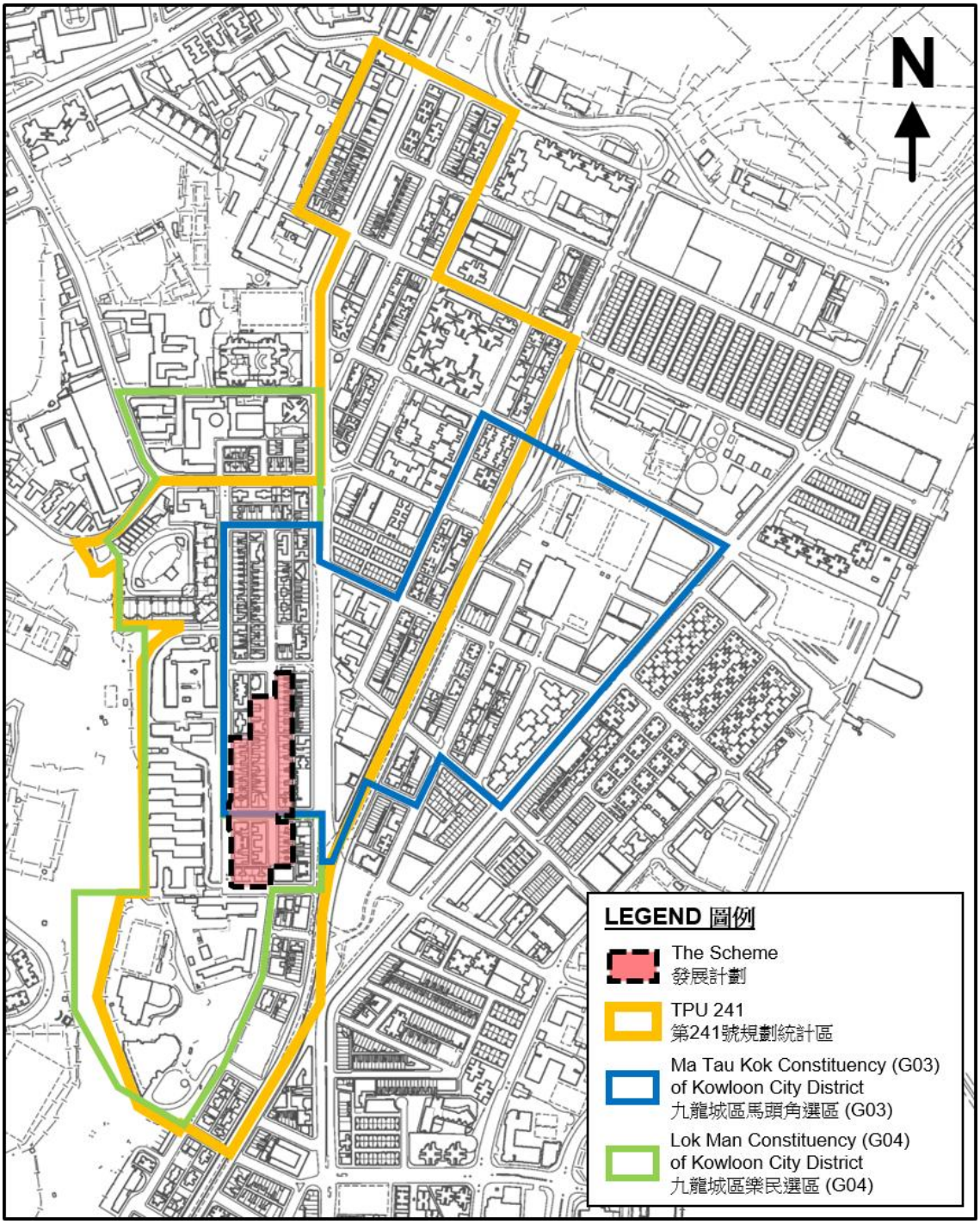

Figure 4.1 Boundary of Ma Tau Kok Constituency (G03) and Lok Man Constituency (G04) and Tertiary Planning Unit (TPU) 241

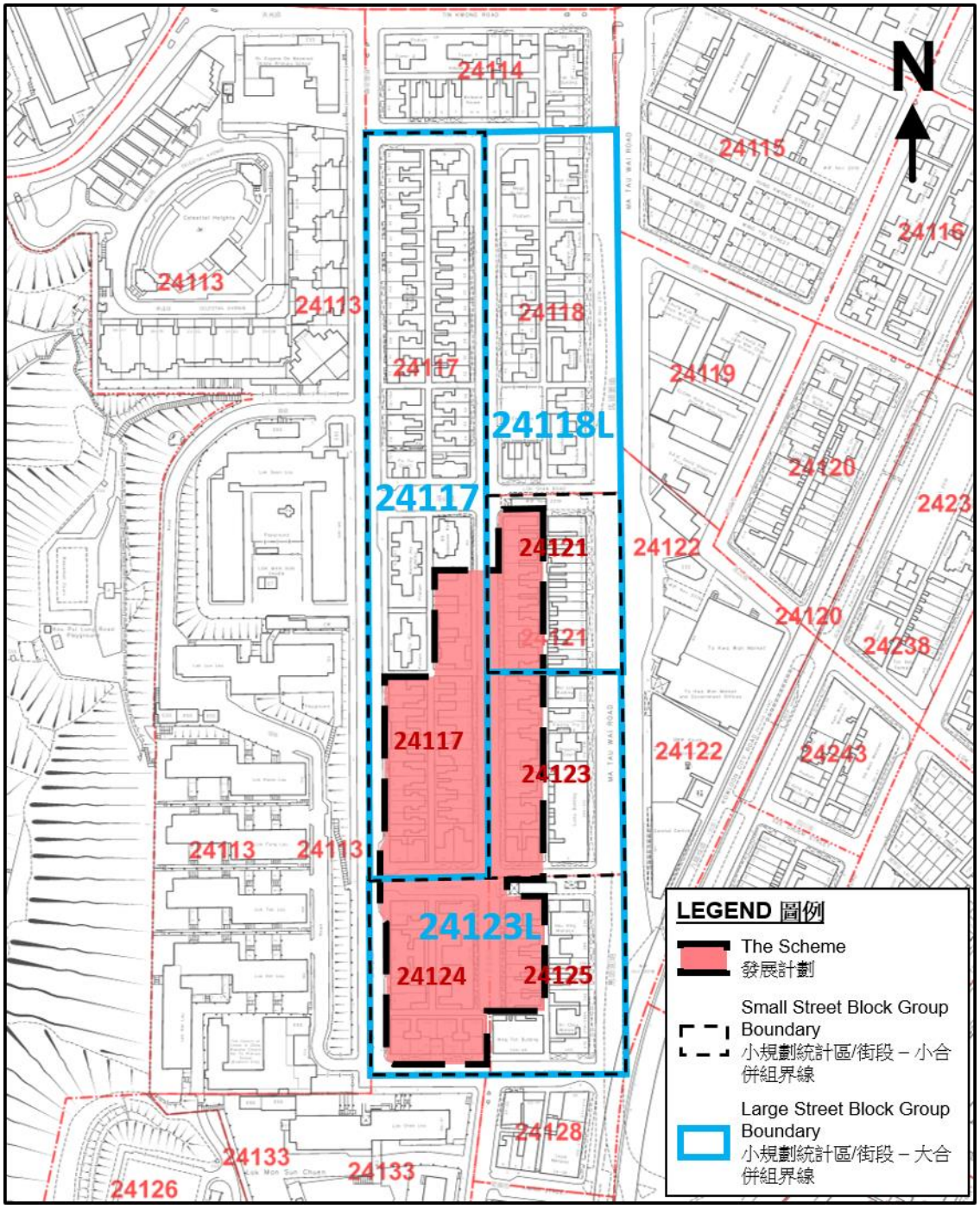

Figure 4.2 Street Block Boundaries of the Scheme (SSBGs 24117, 24121, 24123, 24124 and 24125 and LSBGs 24117, 24118L and 24123L)

Overview of Housing & Population Characteristics of Kowloon City District

4.5 As revealed in the 2016 By-census results, the overall KC District has a population of about 418,732. In terms of monthly household income, the KC District has a median monthly household income of $25,550, which is similar to the average of the whole Territory (i.e. $25,000).

4.6 According to the 2016 By-Census, the majority of the living quarters in KC District are in private housing blocks including buildings of CBS (about 73%); only about 26% of living quarters are in public rental housings (PRH) / subsidized home ownership housings. The remaining living quarters (about 1%) are in other types of housing. Being mainly built in the 1950s and 1960s, quite a number of private residential blocks in KC District appear to lack proper maintenance and management. Apart from private housing, there is also a PRH in close proximity of the Scheme, namely Lok Man Sun Chuen, which was developed by Hong Kong Housing Society (HKHS). The housing estate was built in the 1970s and also situated within the Lok Man Constituency (G04).

Household Composition

4.7 In accordance with the approved GBP, the total number of residential units within the Scheme is 462. Based on the 2016 By-Census data, the degree of sharing of living quarters (or the "average number of domestic households per unit of quarters") of the KC District is about 1.0. In light of the alienation restriction and ownership status of the CBSs within the Scheme as stated in paragraph 3.7, most of the households are expected to be owner-occupiers in the preparation of this report (i.e. no sharing). Hence the total number of households is estimated to be 462 households. The actual number of domestic units may differ from that under the approved GBP due to the existence of sub-divided units, if any. The household composition will be verified in the Freezing Survey upon commencement.

4.8 The Census LSBGs proportion of the 2016 By-Census gives data of singleton (23%), doubletons (33%) and 3-person or above households (44%) in the Scheme. The proportion of singleton households and doubleton households are both higher than the territorial ratio. On the other hand, the proportion of 3-person or above households is lower than the territorial ratio (see **Table 4.1**).

Table 4.1 Distribution of Singletons, Doubletons, and 3-person or above Households

	Singletons	**Doubletons**	**3-person or above households**
LSBGs 24117, 24118L and 24123L	23%	33%	44%
Territorial	18%	27%	55%

4.9 Based on the 2016 By-Census data, the average household size of those within the Scheme taken reference from LSBGs 24117 and 24123L, which are mainly comprised buildings of CBS, is estimated to be around 2.6. It is slightly lower than the average household sizes of the KC District (2.8) and the territory (2.8). This average household size could be a result of the presence of larger flat size and no sub-division of living quarters for CBS sites. The actual number will be ascertained as far as practicable at Stage 2 SIA.

Population

4.10 Assuming 462 households and an average household size of 2.6 as stated in paragraph 4.9, the number of residents living within the Scheme is estimated to be around 1,200 persons. The number of households, living quarters and population affected will all be verified at the Stage 2 SIA as far as practicable.

4.11 **Table 4.2** below compares the distribution of the percentage of working population and elderly residents over 65 among the LSBGs 24117, 24118L and 24123L, Ma Tau Kok Constituency (G03), Lok Man Constituency (G04), KC District and the whole territory. Attention would be paid to elderly residents and their needs.

Table 4.2 Distribution of the Percentage of Working Population and Elderly Residents

	Percentage of working population	**Percentage of elderly residents**
LSBGs 24117, 24118L and 24123L	49%	20%
Ma Tau Kok Constituency (G03)	47%	24%
Lok Man Constituency (G04)	51%	19%
KC District	52%	15%
Territorial	51%	16%

4.12 As stated in paragraph 3.7, only 29 dissolved units were settled the outstanding land premium and removed the alienation restriction and thus it is assumed that there is very limited number of tenants in the Scheme.

4.13 Since the land grant restrictions for CBS sites are very different from other private land lots, the socio-economic characteristics derived from the LSBGs and the Constituency

areas in the latest available Census result may not totally reflect the true characteristics of those residing within this Scheme as the figures may be diluted by the inclusion of other private buildings in the LSBGs and the Constituency areas and given it a pilot CBS redevelopment project without sufficient comparables as reference.

4.14 The Stage 2 SIA to be conducted upon project commencement will give clearer and accurate information concerning the existing population and socio-economic characteristics within the Scheme.

5. HOUSING & ENVIRONMENTAL CONDITIONS

Building Age, Building and Living Condition

5.1 The Scheme consists of buildings of 5 to 6 storeys high and they were built between 1959 and 1970 (i.e. all aged 50 or above). According to the approved GBP, none of the buildings is served by lift or barrier-free access and the livability is poor. According to the URA's Building Condition Survey (BCS) conducted in May 2020, most of the buildings within the Scheme are in "Acceptable" conditions.

5.2 Based on the ownership records in the Land Registry as of January 2020, there are 9 properties owned by their respective co-operative societies (i.e. undissolved CBSs), including the buildings at Nos. 71-77 Maidstone Road (odd nos.), Nos. 98-100, 106-116, 118-128 Maidstone Road (even nos.), Nos. 165-167, 181-185 Kau Pui Lung Road (odd nos.), Nos. 4-6 Kiang Su Street (even nos.) and Nos. 52-58, 52A-58A Chi Kiang Street (even nos.). Other buildings within the Scheme are under multiple ownerships. Based on the search in Land Registry's "Index of Owners' Corporations" (as of 17 April 2020) and Home Affairs Department - Building Management's "Database of Private Buildings in Hong Kong" (as of 17 April 2020), all the dissolved CBSs have Owners' Corporations (OCs). For the undissolved CBSs, they do not have OC for building management.

5.3 Based on Buildings Department's records and land search records in Land Registry as of January 2020, some buildings within the Scheme have outstanding building orders. Five buildings have completed the Operation Building Bright (OBB) Scheme (Category 1) (i.e. Nos. 99-105, 123-125 Maidstone Road (odd nos.) and Nos. 157-163, 165-167, 169-175 Kau Pui Lung Road (odd nos.)); one has completed rehabilitation works under the Building Rehabilitation Loan Scheme (BRLS) (i.e. Nos. 59-65 Maidstone Road (odd nos.)); and another five buildings have completed the Common Area Repair Works Subsidy (CAS) under the Integrated Building Rehabilitation Assistance Scheme (IBRAS) to carry out common area repair works (i.e. Nos. 118-128 Maidstone Road (even nos.), Nos. 157-163, 165-167, 169-175 Kau Pui Lung Road (odd nos.) and Nos. 8-10 Kiang Su Street (even nos.)). It is understood that the building rehabilitation works comprise mainly repairing defects (e.g. major cracks, spalling) in common or public areas of the buildings. Repair works to the interior of private units are not included. Based on past URA's experience in rehabilitation works, even buildings that have undergone repair works need to undertake comprehensive building rehabilitation every 5 to 6 years in order to avoid deterioration.

Existing Uses

5.4 Based on non-obtrusive site observation conducted in May 2020, the buildings are all residential in nature and there is no retail shop within the Scheme. According to the approved GBP, the ground floors of the buildings at Nos. 7-9 Kiang Su Street (odd nos.) and Nos. 118-128 Maidstone Road (even nos.) are non-domestic uses and they are used as covered children play area and car port respectively. The detailed uses of the units will be verified in the Freezing Survey and reported in the Stage 2 SIA as far as practicable.

Planned Development in the Vicinity

5.5 The Scheme is located nearby the MTR SCL To Kwa Wan Station, which is anticipated to be in operation in 2021. Two of the entrances / exits of the MTR SCL To Kwa Wan Station are located at Lok Shan Road and Kiang Su Street respectively, which are directly adjoining the Scheme.

Existing Pedestrian Network

5.6 The pedestrian flow within the Scheme is mainly in east-west direction towards and from Ma Tau Wai Road, the major road where most of the public transport services located. This east-west pedestrian flow is served by Lok Shan Road, Kiang Su Street, Chi Kiang Street and two public pedestrian lanes intercepted by carriageway of Kau Pui Lung Road and Maidstone Road. With the forthcoming operation of the MTR SCL To Kwa Wan Station, it is anticipated to be more east-west pedestrian flow between the Station and west of Scheme predominant residential in nature.

5.7 At present, pedestrian flow in north-south direction is mainly found on Ma Tau Wai Road with ground floor shop and services outside the Scheme. The portion of Maidstone Road within the Scheme is not welcoming as a dead-end road without ground floor commercial. It serves mainly the residents of the buildings of CBS alongside and thus the pedestrian flow is low.

Environmental Condition

5.8 The Scheme is predominately surrounded by residential buildings and GIC facilities, including schools and To Kwa Wan Market and Government Offices. Commercial uses which are mostly retail and services businesses are found on the ground floor of the surrounded buildings. During site observation in May 2020, no obvious environmental hygiene problem is observed.

6. CULTURAL & LOCAL CHARACTERISTICS, AND CHARACTERISTICS OF LOCAL BUSINESS ACTIVITIES

6.1 The area is dominated by residential buildings including buildings of CBS to the west of Ma Tau Wai Road, along Kau Pui Lung Road, Maidstone Road and Ko Shan Road. To the west across Kau Pui Lung Road and to the south across Chi Kiang Street of the Scheme is predominantly PRH, Lok Man Sun Chuen. Three residential buildings are located to the northwest of the Scheme, of which two of them are newer and more modern private residential buildings, City 151 (No. 151 at Kau Pui Lung Road) and 80 Maidstone Road (Nos. 78-80 at Maidstone Road (even nos.)).

6.2 There is a mix of ground floor commercial uses and GIC facilities in the vicinity and some industrial buildings are located in further east. Various types of shop and services are provided on the ground floor of the buildings, especially there are furniture stores concentrated on both sides of Ma Tau Wai Road and Chatham Road North. Apart from shops, the major GIC facilities within 500m radius of the Scheme include To Kwa Wan Market and Government Offices, and a number of educational facilities, including primary schools and secondary schools.

6.3 As stated in paragraph 5.4, the CBS sites within the Scheme are all residential in nature. No shop was identified during site visits in May 2020. Detailed uses of the units within the Scheme will be verified in the Freezing Survey upon commencement of the Scheme and reported in the Stage 2 SIA.

7. RECREATIONAL, AMENITY & COMMUNITY AND WELFARE FACILITIES

7.1 **Figure 7.1** shows the location of various GIC facilities and public open spaces within the 500m radius of the Scheme. There are a number of public open spaces near the Scheme, the closest being Ko Shan Road Park located to the southwest, and Kau Pui Lung Road Playground in the northwest of the Scheme.

7.2 The major GIC facilities within the 500m radius of the Scheme include To Kwa Wan Market and Government Offices. There are also a number of educational facilities, including primary schools and secondary schools within the 500m radius of the Scheme.

7.3 For existing social welfare facilities and services (refer to **Table 7.1**), family and child welfare services, social security services, services for the elderly, rehabilitation and medical social services, services for offenders, and services for young people are found in close proximity to the Scheme.

7.4 Given the large variety of social services, educational, recreational and amenity facilities in the area and the additional not less than 2,150 sq.m GFA of GIC facility be provided in the future development, the demand of the increased population after redevelopment can be met.

7.5 As far as the existing residents within the Scheme are concerned, some of them may need to look for their required GIC facilities in other location(s) after their relocation. The Stage 2 SIA will look at this issue in detail.

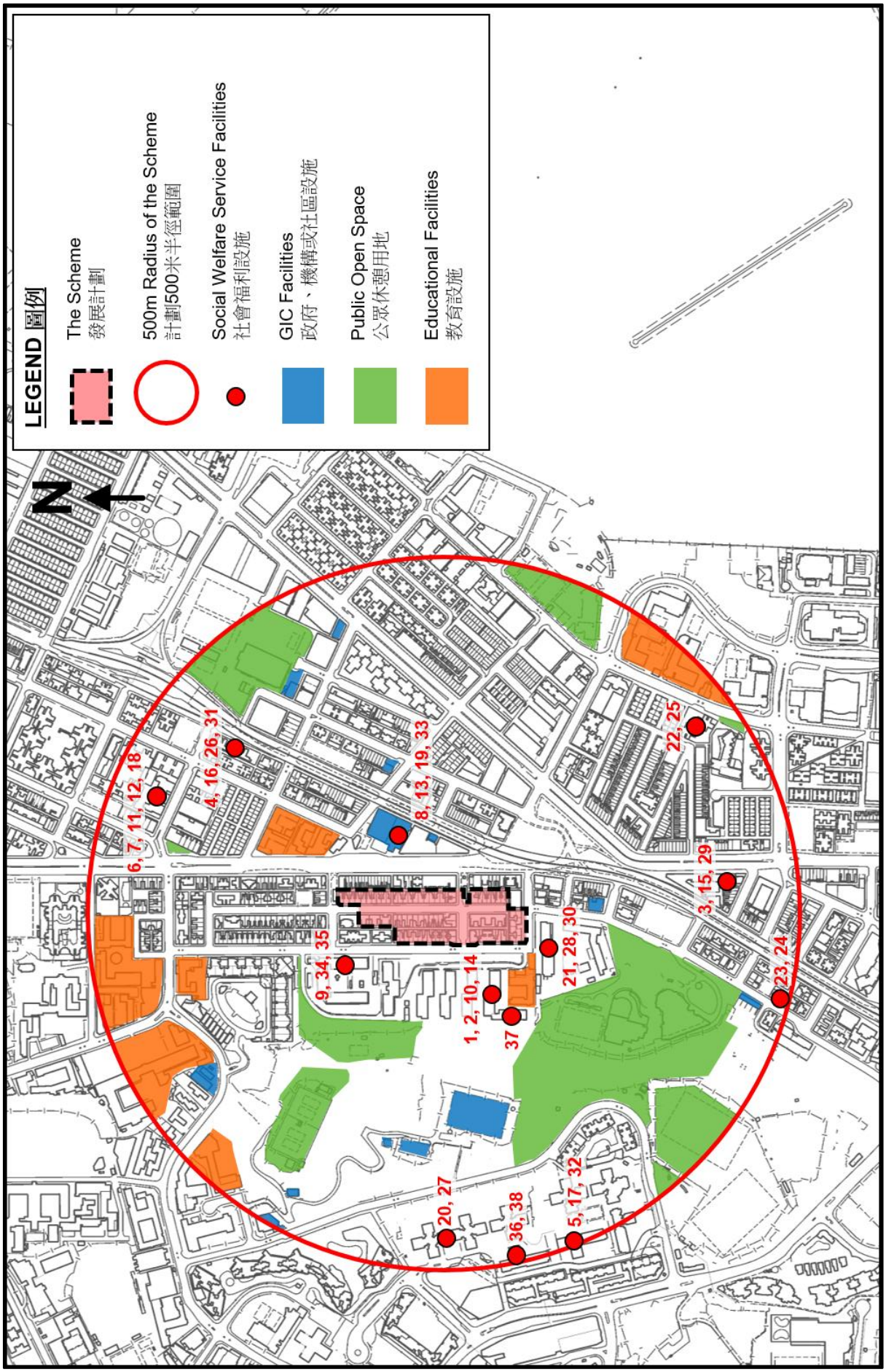

Figure 7.1 GIC and Amenity Facilities Within 500m Radius of the Scheme

Table 7.1 Social Welfare Facilities within 500m Radius of the Scheme

Service Unit		Operator	Address
A. Family and Child Welfare			
Agency-based Enhancement of Professional Staff Support Services in Residential Care Homes			
1.	TWGHs Agency-based Enhancement of Professional Staff Support Services in Residential Care Homes (HQs contact)	Tung Wah Group of Hospitals	G/F, Block B, (Lok Kei Lau), 160 Kau Pui Lung Road, Lok Man Sun Chuen, Tokwawan, Kowloon
Emergency/ Short-term Care in Small Group Home			
2.	TWGHs Emergency/ Short-term Care in Small Group Home	Tung Wah Group of Hospitals	G/F, Block B, (Lok Kei Lau), 160 Kau Pui Lung Road, Lok Man Sun Chuen, Tokwawan, Kowloon
Extended Hours Child Care Service			
3.	Po Leung Kuk Chan Lai Wai Lin Nursery (OCCS)/ Chan Lai Wai Lin Kindergarten-cum-Nursery (IP in KCCC)	Po Leung Kuk	G/F, 1/F and 2/F, Honour Court, 188-194 Ma Tau Wai Road, Kowloon City, Kowloon
4.	SSY Ho Oi Day Nursery (OCCS)	Sik Sik Yuen	Shop 1A, 1B, 2A & 2B, G/F, Harmony Garden, No. 55-61 Kowloon City Road, Kowloon City, Kowloon
5.	YMMSS Homantin Yang Memorial Methodist Pre-school	Yang Memorial Methodist Social Service	G/F, Ching Man House, Ho Man Tin Estate, Ho Man Tin, Kowloon
Family Aide			
6.	Kai Tak Integrated Family Service Centre	Social Welfare Department	Unit 3, 2/F, Chung Hwa Plaza, 5B-5F Ma Hang Chung Road, To Kwa Wan, Kowloon
7.	Ma Tau Wai Integrated Family Service Centre	Social Welfare Department	Unit 3, 2/F, Chung Hwa Plaza, 5B-5F Ma Hang Chung Road, To Kwa Wan, Kowloon

Service Unit		Operator	Address
8.	To Kwa Wan Integrated Family Service Centre	Social Welfare Department	Unit 903, 9/F, Tokwawan Government Offices, 165 Ma Tau Wai Road, Kowloon
Family Life Education			
9.	BGCAHK Kowloon City Family Life Education Unit	Boys' and Girls' Clubs Association of Hong Kong	G/F, Block G, Lok Man Sun Chuen, To Kwa Wan, Kowloon
Foster Care			
10.	TWGHs Foster Care Service	Tung Wah Group of Hospitals	G/F, Block B, (Lok Kei Lau), 160 Kau Pui Lung Road, Lok Man Sun Chuen, Tokwawan, Kowloon
Integrated Family Service Centre			
11.	Kai Tak Integrated Family Service Centre	Social Welfare Department	Unit 3, 2/F, Chung Hwa Plaza, 5B-5F Ma Hang Chung Road, To Kwa Wan, Kowloon
12.	Ma Tau Wai Integrated Family Service Centre	Social Welfare Department	Unit 3, 2/F, Chung Hwa Plaza, 5B-5F Ma Hang Chung Road, To Kwa Wan, Kowloon
13.	To Kwa Wan Integrated Family Service Centre	Social Welfare Department	Unit 903, 9/F, Tokwawan Government Offices, 165 Ma Tau Wai Road, Kowloon
Neighbourhood Support Child Care Project			
14.	TWGHs Nanny Buddy - Neighbourhood Support Child Care Project (Kowloon City)	Tung Wah Group of Hospitals	G/F, Block B, (Lok Kei Lau), 160 Kau Pui Lung Road, Lok Man Sun Chuen, Tokwawan, Kowloon
Occasional Child Care Service			
15.	Po Leung Kuk Chan Lai Wai Lin Nursery (OCCS)/ Chan Lai Wai Lin Kindergarten-cum-Nursery (IP in KCCC)	Po Leung Kuk	G/F, 1/F and 2/F, Honour Court, 188-194 Ma Tau Wai Road, Kowloon City, Kowloon

Service Unit		Operator	Address
16.	SSY Ho Oi Day Nursery (OCCS)	Sik Sik Yuen	Shop 1A, 1B, 2A & 2B, G/F, Harmony Garden, No. 55-61 Kowloon City Road, Kowloon City, Kowloon
17.	YMMSS Homantin Yang Memorial Methodist Pre-school	Yang Memorial Methodist Social Service	G/F, Ching Man House, Ho Man Tin Estate, Ho Man Tin, Kowloon
B. Social Security			
Social Security Services			
18.	Kowloon City Social Security Field Unit	Social Welfare Department	Unit 2, 2/F, Chung Hwa Plaza, 5B-5F Ma Hang Chung Road, To Kwa Wan, Kowloon
19.	To Kwa Wan Social Security Field Unit	Social Welfare Department	7/F, To Kwa Wan Government Offices, 165 Ma Tau Wai Road, Kowloon City, Kowloon
C. Services for the Elderly			
Contract Home			
20.	PLK Merry Court for the Senior	Po Leung Kuk	G/F & 1/F, Choi Man House & Yee Man House, Ho Man Tin Estate, Kowloon
District Elderly Community Centre			
21.	Hong Kong Sheng Kung Hui Lok Man Alice Kwok Integrated Service Centre	Hong Kong Sheng Kung Hui Welfare Council Limited	G/F, Block H, Lok Man Sun Chuen, 111 Ko Shan Road, To Kwa Wan, Kowloon
Integrated Home Care Services (Agency and District-based)			
22.	Hong Kong Sheng Kung Hui Hok Yuen Integrated Home Care Services Team	Hong Kong Sheng Kung Hui Welfare Council Limited	Unit 8, G/F, Wing Fai Mansion, 52 Wing Kwong Street, Hung Hom, Kowloon
23.	Hong Kong Sheng Kung Hui Lok Man Alice Kwok Integrated Service Centre - Integrated Home Care Services Team	Hong Kong Sheng Kung Hui Welfare Council Limited	Shop No. 2 & 4-5, G/F, Tak Lee Court, 10 Ko Shan Road, To Kwa Wan, Kowloon

Service Unit		Operator	Address
24.	Hong Kong Sheng Kung Hui Lok Man Integrated Home Care Services Team	Hong Kong Sheng Kung Hui Welfare Council Limited	Shop No. 2 & 4-5, G/F, Tak Lee Court, 10 Ko Shan Road, To Kwa Wan, Kowloon
Neighbourhood Elderly Centre			
25.	CSBS Tan Siu Lin Neighbourhood Elderly Centre	Chung Sing Benevolent Society	Shop 9-13 & 27, G/F, Wing Fai Mansion, 52 Wing Kwong Street, Hung Hom, Kowloon
26.	HKFWS Kowloon City Centre for Active Ageing	Hong Kong Family Welfare Society	1/F, Block 2, Harmony Garden, 55-61 Kowloon City Road, To Kwa Wan, Kowloon
Respite Service			
27.	PLK Merry Court for the Senior	Po Leung Kuk	G/F & 1/F, Choi Man House & Yee Man House, Ho Man Tin Estate, Kowloon
Support Team for the Elderly Based at District Elderly Community Centres			
28.	Hong Kong Sheng Kung Hui Lok Man Alice Kwok Integrated Service Centre	Hong Kong Sheng Kung Hui Welfare Council Limited	G/F, Block H, Lok Man Sun Chuen, 111 Ko Shan Road, To Kwa Wan, Kowloon
D. Rehabilitation and Medical Social Services			
Integrated Programme in Kindergarten-cum-Child Care Centre			
29.	Po Leung Kuk Chan Lai Wai Lin Nursery (OCCS)/ Chan Lai Wai Lin Kindergarten-cum-Nursery (IP in KCCC)	Po Leung Kuk	G/F, 1/F and 2/F, Honour Court, 188-194 Ma Tau Wai Road, Kowloon City, Kowloon
30.	SA Lok Man Nursery School	Salvation Army	1/F, Block H, Lok Chi House, Lok Man Sun Chuen, 111 Ko Shan Road, To Kwa Wan, Kowloon
31.	SSY Ho Oi Day Nursery (OCCS)	Sik Sik Yuen	Shop 1A, 1B, 2A & 2B, G/F, Harmony Garden, No. 55-61 Kowloon City Road, Kowloon City, Kowloon

Service Unit		Operator	Address
32.	YMMSS Homantin Yang Memorial Methodist Pre-school	Yang Memorial Methodist Social Service	G/F, Ching Man House, Ho Man Tin Estate, Ho Man Tin, Kowloon
E. Services for Offenders			
Probation and Community Service Orders Office			
33.	Kowloon City Probation and Community Service Orders Office (Sub-office)	Social Welfare Department	11/F, To Kwa Wan Government Offices, 165 Ma Tau Wai Road, Kowloon City, Kowloon
F. Services for Young People			
After School Care Programme			
34.	BGCAHK Lok Man Children and Family Integrated Activity Centre	Boys' and Girls' Clubs Association of Hong Kong	G/F, Block G, Lok Man Sun Chuen, To Kwa Wan, Kowloon
Children Centres with Reading/ Study Rooms			
35.	BGCAHK Lok Man Children and Family Integrated Activity Centre	Boys' and Girls' Clubs Association of Hong Kong	G/F, Block G, Lok Man Sun Chuen, To Kwa Wan, Kowloon
Integrated Children and Youth Services Centres with Services for Young Night Drifters			
36.	YMMSS Homantin Integrated Centre for Youth Development	Yang Memorial Methodist Social Service	G/F, Tim Man House, Ho Man Tin Estate, Ho Man Tin, Kowloon
School Social Work Service			
37.	BBHK School Social Work Division	Boys' Brigade, Hong Kong	G/F, Block A, Lok Man Sun Chuen, To Kwa Wan, Kowloon
38.	YMMSS School Social Work	Yang Memorial Methodist Social Service	G/F, Tim Man House, Ho Man Tin Estate, Ho Man Tin, Kowloon

Source: Social Welfare Department's website: Local District Service Profile: Welfare Service Units Managed or Funded by Social Welfare Department (Kowloon City), as of 17 April 2020.

8. INITIAL ASSESSMENT OF POTENTIAL SOCIAL IMPACT, AND MITIGATION MEASURES

Potential Social Impact

8.1 As stated in paragraph 4.10, the Scheme is estimated to affect 462 households, with around 1,200 residents. No shop was identified in the Scheme. The exact situation and number of affected residents will be verified at Stage 2 SIA.

8.2 The proposed redevelopment offers an opportunity to replan and restructure land uses, and improve the walkability and connectivity within the Scheme and benefit the wider area. The living environment of the affected households can also be improved by moving to the rehousing units with better modern days facilities, particular for the elderly as the buildings of CBS do not have lift or barrier-free access. As the development potential of the cluster of CBS sites will be fully utilised to increase housing supply and some of the land will be earmarked for public housing, it creates a social gain to the whole society and citizens longing for more housing supply.

8.3 The Scheme, if implemented, will inevitably affect the occupants within the Scheme. Generally, the most vulnerable resident groups in the Scheme are the elderly, the disabled, single parent families, low-income households, and those who rely heavily on their social network (including receiving support / care from their friends / relatives who live nearby). Upon implementation of the Scheme, the existing residents will be displaced to areas where they have to rebuild their social networks.

8.4 During the Freezing and SIA surveys, needy cases such as households with single elderly, elderly couples or family members with disability (if any) worried about the impact of redevelopment on employment, living expenses and social network etc. will be identified. It is expected that the Social Service Team (SST) commissioned by the Urban Renewal Fund (URF) will provide assistance to those in need. This SST is independent of the URA and will directly report to the Board of the URF.

Mitigation Measures and Prevailing Compensation & Rehousing Policies

8.5 Upon implementation, compensation based on the prevailing URA Policy would be offered to the affected owners. For affected tenanted households, rehousing or ex-gratia allowance would be offered. To avoid gatherings under COVID-19 pandemic, project briefing videos instead of the public briefing in past practice will be provided to the affected persons by URA. The videos explain the Scheme and include information on planning procedures, the URA's acquisition and rehousing policies (if the Scheme is

approved), and assistance in the dissolution of CBS. The videos can be accessed by scanning the QR code or through the web link printed on the notices or letters issued by the URA. An in-house URA engagement team will visit the affected persons accordingly as to care for those who are unclear about compensation and require any other assistance.

8.6 If affected persons are not clear about the URA compensation and rehousing policies or future arrangement, the SST will endeavour to clarify their doubts with full support from the URA.

8.7 In handling problems related to different kinds of livelihood problems, the SST, apart from offering counselling, will mobilise different community resources to liaise closely with Government departments and work with the URA to resolve the problems of affected persons and reduce their anxiety. The SST will also provide orientation assistance for those in needs after moving home such as familiarisation with new neighbourhood, accommodation and local facilities.

8.8 For the vulnerable groups (including the elderly, disabled and single parent families), arrangements for assistance such as child care / foster services, domestic help services, etc. offered by the Social Welfare Department, and other social service agencies would be made. For the low-income households, arrangement could be made with the Hong Kong Housing Authority or the HKHS on PRH allocation if they are eligible. In addition, if practicable, those vulnerable groups would be re-housed on compassionate ground.

Prevailing Measures

8.9 The Scheme is a project announced under the URAO and thus the prevailing URA acquisition, compensation and rehousing policies shall apply. The URA will offer an owner-occupier of domestic property the market value (valued on vacant possession basis) of his / her property plus an ex-gratia allowance, namely Home Purchase Allowance (HPA), for purchase of the property. The CBS members have to settle the outstanding land premium to the Government to release the alienation restriction before they can assign legal titles of their flats to the URA. The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.

8.10 The URA may also offer “Flat-for-Flat” (FFF) (subject to any changes in the relevant legislations) in a URA new development in-situ or in the same district or at available site(s) (as the URA may select for the purpose provided that necessary approval / authorization has been obtained at the time of FFF offer), as an additional choice to cash compensation to owner-occupiers of domestic units. The amount of cash compensation and ex-gratia payment offered to an owner-occupier will not be changed by his / her choice of using that amount, or part of it, to join the FFF arrangement or otherwise.

8.11 According to paragraph 54 of the PA in 2018, the dedicated housing approach can help address the accommodation issue arising from the redevelopment of CBS sites. For the affected eligible owner-occupiers of ex-CBS member, an additional rehousing option will be provided to purchase dedicated subsidized units in urban area developed and managed by the HKHS. Details of this additional option will be provided by the Government in due course. However, for those owner-occupiers who have chosen this option, cannot join the FFF arrangement as mentioned in paragraph 8.10.

8.12 The acquisition, compensation and rehousing policies are subject to prevailing policies at the time of issuing acquisition policies. The policies are published on the URA’s website and will be communicated to affected persons when acquisition of property interests for this Scheme commences. Prevailing policies relating to property acquisition, rehousing and ex-gratia allowances will be reviewed by the URA from time to time.

8.13 The Stage 2 SIA to be conducted after the Freezing Survey will further assess the impact of the Scheme in detail on affected persons and propose mitigation measures. It may also be able to highlight the psychological stress and worry for some of the affected within the Scheme. Special measures may have to be adopted under exceptional circumstances.

9. CONCLUSION

9.1 The local community and the surrounding neighbourhoods are likely to experience gains and losses due to the proposed redevelopment. Affected persons within the Scheme will be affected in different ways and to various degrees depending on their particular circumstances. Those who desire for a residence of better modern days facilities, particular for the elderly as the buildings of CBS do not have lift or barrier-free access, within the Scheme may welcome the opportunity to improve their living environment through cash compensation or rehousing if eligible; whilst others may prefer to remain undisturbed and maintain the status quo. The various degrees of concerns and social impacts to the affected persons within the Scheme will be assessed in the Stage 2 SIA in detail.

9.2 This Stage 1 SIA study provides a general profile of the Scheme. The assumptions in this report will be verified by the Stage 2 SIA to be carried out after the Freezing Survey. The needs of the affected persons will be assessed and appropriate arrangements to minimise major adverse social impact, if any, from the Scheme will be proposed in the Stage 2 SIA.

9.3 Whilst meeting the objectives as listed in the PAs, the Scheme also seeks to improve the overall environment through redevelopment in accordance with the URS with the following planning objectives duly considered to be implemented:-

i. The northern part of the Scheme will be developed by the URA (regarded as URA site), whilst the southern part will be earmarked for public housing development (regarded as PH site).

ii. For better planning and to increase housing supply, portion of Maidstone Road and Kiang Su Street are included for PR calculation. The flat supply of the Scheme will be about five times of the existing flat number, according to the approved GBP, increasing from about 460 to about 2,500 units.

iii. To enhance connectivity, both at-grade and underground integrated pedestrian networks are proposed. Portion of Maidstone Road and Kiang Su Street has been included as part of the Scheme for the creation of a car-free environment, as a pedestrianised avenue / plaza is being provided within the Scheme. An underground shopping street will be provided with connections to the MTR SCL To Kwa Wan Station. The connectivity to the south of the Scheme is further improved by turning the existing back lane into part of the pedestrianised avenue.

iv. Adopting the people-oriented urban design concept, the Scheme will also enhance the walkability and the user experience and create vibrancy through place-making. In order to provide openness, two visual corridors are created along the existing Maidstone Road and Kiang Su Street respectively. The massing of buildings will be carefully designed to minimise site coverage. With the massing optimised and visual corridors provided, it helps to create two ventilation corridors in north-south and east-west directions. Cohesive landscaping, tree planting and vertical greening will be explored to improve the pedestrian friendly environment and create a sense of place.

v. Provision of about 140 public car parking spaces at the basement level of URA site not only compensates the existing on-street parking spaces, but also providing more public parking facilities. The removal of on-street parking provides opportunities for optimising the surrounding pedestrian environment and further improves walkability.

vi. To provide appropriate GIC facilities to meet the community needs. The provision of open space, for public use at reasonable hours, provides more amenity for the community.

9.4 Proactive response to the PAs whilst with these objectives as well as the overall urban renewal works in this area, it is anticipated that the local urban environment and residents will be benefited from a more coordinated restructuring resulting in a more walkable neighbourhood with quality street environment.

URBAN RENEWAL AUTHORITY
May 2020

Appendix 11:

Acquisition and Resumption of Affected Properties

Appendix 11

Principles Adopted by the Urban Renewal Authority in Property Acquisition (only applicable to Properties in the Buildings developed under the Civil Servants' Co-operative Building Society Scheme)

This leaflet briefly outlines the principles adopted by the Urban Renewal Authority ("URA") in the acquisition of properties in the buildings developed under the Civil Servants' Co-operative Building Society ("CBS") Scheme which are situated within the two pilot projects commenced by URA in May 2020.

Notes to Owners of CBS Properties and Members/Ex-members of CBS

1. Registered owners of CBS properties are eligible for URA's acquisition offers. If the CBS properties are still subject to alienation restriction under the lease, acquisition by URA can only be completed after the owners have settled with the Government the premium required to remove the alienation restriction. Upon the owners' request, URA would make arrangements with the Government so that the premium for removal of alienation restriction could be deducted from the amounts payable to the owners for acquisition of their properties.

2. As for the members of the yet to be dissolved CBSs and the ex-members of dissolved CBSs who have not taken up the legal titles of their properties, while URA's acquisition offers may also be issued to them for reference, their acceptance of the offers would only be valid after they have become the registered owners of their properties and have registered their legal titles in the Land Registry.

Domestic Properties

3. URA will offer an owner-occupier of domestic property the market value (assessed on vacant possession basis) of his/her property plus an ex-gratia allowance, namely Home Purchase Allowance ("HPA"), for purchase of the property. The amount of HPA payable to individual owner is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat is based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality. The notional replacement flat is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.

4. "Owner-occupier" here means an owner who occupies his/her property as his/her sole residence. If an owner does not reside in his/her property as his/her sole residence, the occupancy status of his/her property will be treated as "Vacant" and will be offered Supplementary Allowance ("SA") instead of HPA. SA is a percentage of HPA. The criteria for determining whether an owner occupies his/her property as his/her "sole residence" will be determined by URA according to URA's prevailing policy.

5. An owner-occupier will be offered HPA for no more than three properties in a redevelopment project. (Please see Appendix I for examples of calculation of HPA and Appendix II for HPAs payable in different scenarios.)

6. Property used as sole residence by an owner's "immediate family members" will be treated as being occupied by the owner himself/herself as sole residence for the purpose of ascertainment of his/her eligibility to HPA. "Immediate family members" of an owner means parents, children, dependent brothers and sisters, grandparents, grandchildren, stepparents, spouse's parents and spouse's stepparents.

7. An owner who leaves his/her property vacant will be offered the market value (assessed on vacant possession basis) of his/her property plus SA.

8. An owner who lets his/her property out will be offered the market value (assessed on vacant possession basis) of his/her property plus SA.

9. An owner of tenanted or vacant properties will be offered SA for no more than two properties in a redevelopment project. (Please see Appendix I for examples of calculation of SA and Appendix II for different SAs payable in different scenarios.)

10. If a property is owned by joint owners (whether as joint tenants or tenants in common) or a company, each joint owner / shareholder of that company will be subject to the same principles applicable to individual owners. The HPA and SA will be calculated pro rata to the shares of each joint owner and the shareholdings of each shareholder in the company.

11. In addition to HPA or SA, URA will offer an incidental cost allowance ("ICA") to owners of domestic properties to assist payment of removal expenses and expenditure relating to the purchase of a domestic replacement flat. The actual amount of ICA shall be determined and announced by URA as and when an offer to purchase is made for each individual project.

12. If the amount of necessary and reasonable expenses actually incurred by the owner of a domestic property in purchasing a domestic replacement flat (i.e. removal cost, stamp duty, agency fee and legal cost) exceeds the amount of ICA offered by URA, the owner may be reimbursed with the difference ("the Expense"). The owner can only submit one single reimbursement claim for each domestic property sold to URA, and must fulfill the following eligibility criteria:

    (i) The owner must have accepted the initial acquisition offer of URA within the validity period of the offer;
    (ii) The reimbursement claim must be made within 12 months from the date of execution of assignment of the property sold to URA, and the reimbursable amount must be the actual expenses already paid by the owner within 12 months after the property is sold to URA;
    (iii) The domestic replacement flat must be located in Hong Kong and must be purchased after the date of issuance of initial acquisition offer by URA; and
    (iv) The owner should be the sole registered owner or one of the registered owners of the domestic replacement flat.

13. In general, the principles in assessing the reimbursable amount of the Expense as described in Paragraph 12 above are:

    (i) The reimbursable amount for stamp duty should be calculated at the lower rates (Scale 2) of ad valorem stamp duty payable for a domestic replacement flat;
    (ii) The reimbursable amount for real estate agency fee will be subject to a ceiling with reference to the general market practice;
    (iii) The reimbursable amount of the aforesaid two items will be subject to a ceiling to be calculated on the basis of 110% of the sum of (a) the market value of the property and (b) the HPA/SA stipulated in the initial acquisition offer of URA;
    (iv) URA will only reimburse the Expense which is reasonable, absolutely necessary and actually paid by the owner in relation to his/her purchase of a domestic replacement flat and his/her removal from the property sold to URA;
    (v) The owner should provide sufficient documentary evidence for the Expenses submitted in the reimbursement claim; and
    (vi) URA will consider each reimbursement claim on its own merits, and URA has the sole discretion in determining the amount of the Expenses reimbursable in each case.

14. If a property has been sub-divided into several flats with undivided shares ("sub-divided flat") and an owner of a sub-divided flat elects not to receive the HPA, subject to eligibility criteria and other requirements, the owner will be offered re-housing.

15. For URA redevelopment projects which are commenced after the promulgation of the new Urban Renewal Strategy on 24 February 2011:

    (i) Subject to the conditions and provisions contained in the "Urban Renewal Authority Flat-for-Flat Pamphlet" ("the Pamphlet"), domestic owner-occupiers of properties in the redevelopment projects, who will be offered HPA, can opt to participate in URA's "Flat-for-Flat" Scheme ("the Scheme"). URA will provide the details under the Scheme to eligible domestic owner-occupiers after the project was approved for implementation .

    (ii) Elderly owners of tenanted domestic properties in the redevelopment project will be offered an Elderly Domestic Owner-Landlords Compassionate Allowance ("Allowance"), in addition to the market values of their properties and SA as described in Paragraph 8 above, by URA subject to the elderly owners concerned meeting the eligibility criteria set by URA. Eligible elderly owners can apply for the Allowance after they have accepted the initial acquisition offers from URA both unconditionally and within the validity period of the offers. Please refer to the pamphlet of "Elderly Domestic Owner-Landlords Compassionate Allowance" for details of the eligibility criteria and the arrangement.

Non-domestic Properties (Car-parking Spaces)

16. An owner of a car-parking space will receive the market value of the car-parking space (assessed on vacant possession basis) plus an allowance equivalent to 10% of the

market value (assessed on vacant possession basis) of the car-parking space. If the owner concerned is also the occupier of the car-parking space, he/she will receive an additional allowance equivalent to the Rateable Value of the car-parking space.

Domestic Properties being used for Non-domestic Purposes

17. If a property with an occupation permit for domestic use is used for non-domestic purpose, an owner-occupier will be offered market value (assessed on vacant possession basis) of his/her property plus either (i) the allowance for Non-domestic Properties (i.e.35% of its market value (valued on vacant possession basis) or 4 times its Rateable Value, whichever is higher) or (ii) SA, whichever is higher. An owner of tenanted property will be offered market value (assessed on vacant possession basis) of his/her property plus either (i) the allowance for Non-domestic Properties (i.e. 10% of its market value (valued on vacant possession basis) or one time its Rateable Value, whichever is higher) or (ii) SA less 3 times the Rateable Value of the property, whichever is higher.

Separate Roof Top Interest (Not ancillary to any Domestic/Non-Domestic Property)

18. To be eligible for URA's acquisition offer, owner of the rooftop property must have legal title.

19. An owner of tenanted or vacant rooftop property will be offered the market value of the property assessed on an open roof basis (disregarding any illegal structure or any rent passing) plus an allowance at 10% of the said market value.

20. An owner-occupier of a rooftop property will be offered the market value of the property on an open roof basis (disregarding any illegal structure). If the owner-occupier meets the normal Hong Kong Housing Authority and Hong Kong Housing Society eligibility criteria, he may elect for re-housing. If the owner-occupier does not meet the re-housing criteria or does not elect for re-housing, URA will offer him/her an allowance at 10% of the said market value.

Buildings in Single Ownership

21. URA's acquisition offer to the owner of a building in single ownership is either (i) the existing use value of the building plus the applicable ex-gratia allowances for non-domestic units (if any) in the building and the applicable HPA/SA and ICA for domestic units (if any) in the building, assuming that the building is in multiple ownership, or (ii) the redevelopment value of the building (assuming redevelopment of the building on its own) plus an ex-gratia allowance of 5% of the redevelopment value, whichever is higher.

Vacant Sites

22. URA's acquisition offer to the owner of a vacant site is the redevelopment value of the vacant site (assuming redevelopment of the site on its own) plus an ex-gratia allowance of 5% of the redevelopment value.

Other General Rules

23. Calculation of the market value of a property is based on the saleable area of the property. The definition of saleable area shall follow the Code of Measuring Practice issued in March 1999 and the Supplement to the Code of Measuring Practice issued in July 2014 by the Hong Kong Institute of Surveyors. Subject always to the owner having good title to the property or any part thereof, area calculations may be based on the boundary of the property as delineated on the assignment plan and the area as measured from the latest relevant building plans approved by the Buildings Department (if any).

24. For the purpose of calculating the unit rate of the notional replacement flat, URA will appoint seven professional surveyor firms to provide the assessment.

25. URA will provide an allowance to the owners, who have employed a professionally qualified surveyor to assess the market value of his/her property interest (which shall not include any ex-gratia allowance, such as HPA and SA etc.), as a subsidy for the owner's payment of the surveyor's fees for the relevant services. Please refer to the pamphlet of "Allowance for Surveyor's Fees" for details of the arrangement.

26. If an owner only purchased his/her property in the project after the date of the Freezing Survey, URA will not pay to such owner any of the above-mentioned HPA/SA, Elderly Domestic Owner-Landlords Compassionate Allowance, Allowance for Non-Domestic Use, Ex-gratia Business Allowance, Allowance for Separate Roof Interest, Allowance for Single-owned Building on its Redevelopment Value Basis or Allowance for Vacant Site on its Redevelopment Value Basis, whichever is applicable.

27. URA will consider acquiring property from a holder of valid adverse possessory order granted by the Court in favour of him/her. Depending on the circumstances of individual cases, URA may impose appropriate additional requirements to safeguard the interest of URA when acquiring properties with adverse possessory title.

28. URA will not purchase a structure which is not erected in compliance with the Buildings Ordinance or the terms of the Government lease and no value, compensation or allowance will be paid by URA in respect of such structure.

29. If an owner is found to have given false or misleading information to URA, URA reserves the right to revise its offers and/or take legal action against such owner and/or report the matter to relevant enforcement authorities.

30. URA's acquisition offer is made by reference to the occupancy status of an owner's property on the date of Freezing Survey of the project and in accordance with the URA's prevailing principles and practice for property acquisition. One of such prevailing principles is that an owner whose property was owner-occupied on the date of Freezing Survey but is let out at the time URA's acquisition offer is made will only be offered the allowances for the acquisition of his/her property on a tenanted basis.

31. Particularly, URA would draw the attention to owners whose properties were being tenanted out on the date of Freezing Survey that URA will not consider offering a higher offer to them to acquire their properties in the following situations: -

    (i) the properties are subsequently left vacant; or
    (ii) the owners have entered into new tenancies, whether with the existing tenants or new tenants; or
    (iii) the owners are now occupying their properties for their own self-use. URA will not offer HPA to owners in this situation. Such owners will be offered SA.

32. URA would remind owners that it is an offence for a landlord to unlawfully deprive a tenant of occupation of property or to make an unwarranted demand with menaces with a view to gaining for himself/herself or others or to defraud against URA. URA will report to the enforcement authorities on all cases of suspected criminal offences.

This leaflet is issued for the purpose of general reference only. The information contained herein is with reference to the principles and practice of the Urban Renewal Authority prevailing at the date of issue of this leaflet. It shall not constitute any representation on the part of the Urban Renewal Authority or give rise to any expectation whatsoever and shall not be relied on as such. Each case will be considered on its own merits having regard to all factors and circumstances. The terms of acquisition to be offered are subject to the principles and practice of the Urban Renewal Authority prevailing at the time the offer of acquisition is made and are subject to review from time to time as the Urban Renewal Authority shall at its absolute discretion consider appropriate. The Urban Renewal Authority's right to add to, amend or delete the whole or any part of this leaflet is hereby reserved.

For enquiries, please call URA External Relations Department:
Hotline: 2588 2333
Fax: 2827 0176
Address: 26/F, COSCO Tower, 183 Queen’s Road Central, Hong Kong

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May 2020

Appendix I

Examples (Domestic Properties)

(Figures are based on assumption and for reference only)

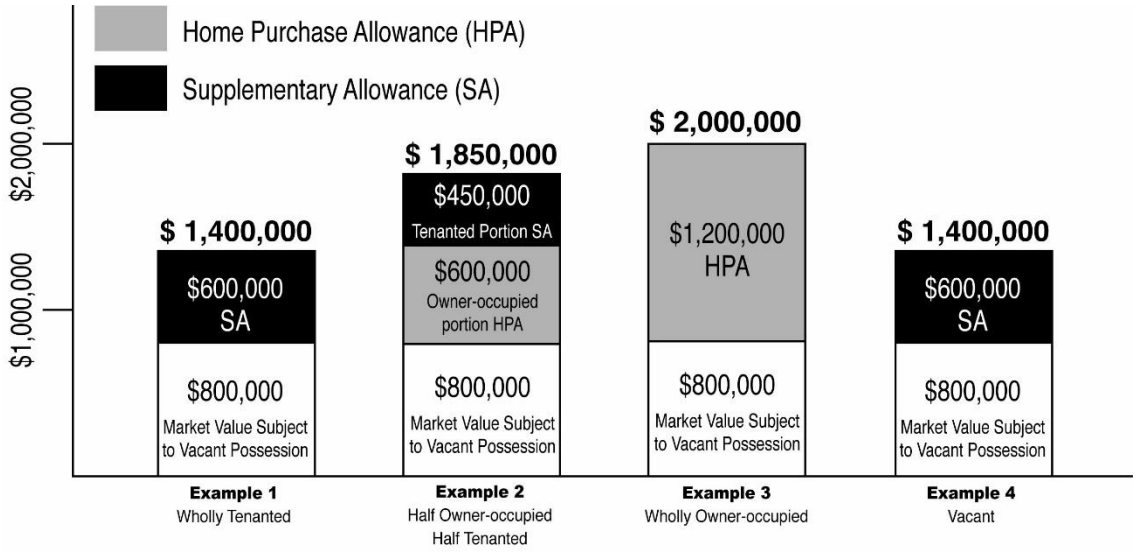
Assuming the market value of a domestic flat on vacant possession (VP) basis is HK$800,000 and the value of a notional replacement flat is HK$2,000,000. The assumed HPA will then be HK$1,200,000 accordingly.

Example One
An owner of the above domestic flat who lets out the entire flat
This owner will get the market value of HK$800,000 and SA of HK$600,000 (HK$1,200,000 x 50%). In total, this owner will receive HK$1,400,000.

Example Two
An owner of the above domestic flat who occupies half of the flat and leases out the other half
This owner will get the market value of HK$800,000 and HPA of HK$600,000 for the owner-occupied portion and SA of HK$450,000 (HK$600,000 x 75%) for the tenanted portion. In total, this owner will receive HK$1,850,000.

Example Three
An owner of the above domestic flat who occupies the entire flat for his/her own use
This owner will get the market value of HK$800,000, plus HPA which is HK$1,200,000. In total, this owner will receive HK$2,000,000.

Example Four
An owner of the above domestic flat who leaves the entire flat vacant
The owner will get the market value of HK$800,000, plus SA of HK$600,000 (HK$1,200,000 x 50%). In total, this owner will receive HK$1,400,000.



Appendix II : Domestic Properties - Diagramatic Illustration of HPA, SA & EUV

One Flat

Occupation Status	HPA	SA	Market Value
1 Owner-occupied	100%		EUV(VP)
2 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
3 Wholly Tenanted		50%	EUV(VP)
4 Vacant		50%	EUV(VP)

Two Flats

Occupation Status	HPA	SA	Market Value
5 Owner-occupied	100%		EUV(VP)
Owner-occupied	100%		EUV(VP)
6 Owner-occupied	100%		EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
7 Owner-occupied	100%		EUV(VP)
Wholly Tenanted		50%	EUV(VP)
8 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
9 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Wholly Tenanted		50%	EUV(VP)
10 Wholly Tenanted		50%	EUV(VP)
Wholly Tenanted		25%	EUV(VP)
11 Vacant		50%	EUV(VP)
Vacant		25%	EUV(VP)

Three Flats

Occupation Status	HPA	SA	Market Value
12 Owner-occupied	100%		EUV(VP)
Owner-occupied	100%		EUV(VP)
Owner-occupied	100%		EUV(VP)
13 Owner-occupied	100%		EUV(VP)
Owner-occupied	100%		EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
14 Owner-occupied	100%		EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
15 Owner-occupied	100%		EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Wholly Tenanted		50%	EUV(VP)
16 Owner-occupied	100%		EUV(VP)
Owner-occupied	100%		EUV(VP)
Wholly Tenanted		50%	EUV(VP)
17 Owner-occupied	100%		EUV(VP)
Wholly Tenanted		50%	EUV(VP)
Wholly Tenanted		25%	EUV(VP)

Appendix II

Occupation Status	HPA	SA	Market Value
18 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
19 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Wholly Tenanted		50%	EUV(VP)
20 Partially Owner-occupied & Partially Tenanted	Owner-occupied portion : 100%	Tenanted portion : 75%	EUV(VP)
Wholly Tenanted		50%	EUV(VP)
Wholly Tenanted		25%	EUV(VP)
21 Wholly Tenanted		50%	EUV(VP)
Wholly Tenanted		25%	EUV(VP)
Wholly Tenanted			EUV(VP)
22 Vacant		50%	EUV(VP)
Vacant		25%	EUV(VP)
Vacant			EUV(VP)

Abbreviations:

HPA Home Purchase Allowance
SA Supplementary Allowance
EUV Existing Use Value
VP Vacant Possession

Appendix 12:

Rehousing and Ex-Gratia Payment Package for Domestic and Non-Domestic Tenants

Appendix 12

Principles Adopted by the Urban Renewal Authority for Tenant Re-housing and Ex-gratia Allowance for Projects announced under the Urban Renewal Authority Ordinance (Not applicable to Tenants of Industrial Premises)

This leaflet briefly outlines the current principles and policies adopted by the Urban Renewal Authority ("URA") for providing re-housing and ex-gratia allowance to affected tenants of projects announced by the URA under the Urban Renewal Authority Ordinance ("URAO") (other than tenants of industrial premises).

(A) Re-housing for Domestic Tenants

(I) Public Rental Housing ("PRH")

Re-housing Arrangement

1. Eligible domestic tenants living in acquired properties of the URA will be re-housed in units provided by the Hong Kong Housing Authority ("HKHA") or the Hong Kong Housing Society ("HKHS"). In addition, they may opt for other subsidized housing schemes provided by the HKHA and the HKHS, if available.

Re-housing Eligibility

2. Domestic tenants must have been genuinely living in the project area before and since the first day of Freezing Survey of the project ("the date of Freezing Survey") conducted by the URA and have no alternative accommodation.

3. Domestic tenants must fulfill the prevailing eligibility criteria for PRH of the HKHA and the HKHS.

Re-housing Eligibility of Illegal Rooftop Structure Occupiers

4. Since there is no difference between the illegal rooftop structures within the URA's redevelopment project areas and the illegal rooftop structures in other domestic buildings, the re-housing eligibility of illegal rooftop structure occupiers for PRH of the HKHA is the same as the eligibility criteria adopted by the HKHA in re-housing the illegal rooftop structure occupiers in domestic buildings affected by the enforcement actions taken by the Buildings Department. Therefore, in addition to the general eligibility criteria for PRH of the HKHA, occupiers of illegal rooftop

structures have to satisfy that they have been genuinely living in the structures within the project area two years before the date of Freezing Survey and that the structures were built on or before 1 June 1982 in order to be eligible for PRH of the HKHA.

5. Occupiers of the illegal rooftop structures who can only fulfill the requirement of having been genuinely living in the relevant illegal rooftop structures before and since the date of Freezing Survey will be eligible for re-housing in the PRH of the HKHS subject to meeting the eligibility criteria for PRH of the HKHS.

(II) URA Re-housing Block

Re-housing Arrangement

1. Domestic tenants living in URA acquired properties, who due to various reasons are not provided PRH re-housing as described in Part (A)(I) above, may be re-housed in units of Re-housing Block provided by the URA subject to fulfillment of the following eligibility criteria of the URA.

Re-housing Eligibility

2. Tenants must have been genuinely living in the project area before and since the date of Freezing Survey and have no alternative accommodation.

3. All members of tenants must be legally residing in Hong Kong without any conditions of stay (excluding a time limit of stay).

4. All members of tenants, whether personally or through a company, must not own nor have any interest in any domestic property in Hong Kong.

5. Both total monthly income and total net assets of all members of tenants must not exceed the prevailing Subsidy Income Limits and Net Assets Limits under the Policy on Safeguarding Rational Allocation of Public Housing Resources of the HKHA (the special condition that the net assets limits for a 1-person to 3-persons household with all members aged over 55 is treated the same as that of a 4-persons household does not apply in this criterion).

6. Tenants, who are eligible for registration on the Application for PRH of the HKHA, must make the application accordingly.

7. Allocation of re-housing unit is governed by the prevailing policy of the URA on household composition.

(III) Ex-gratia Removal Allowance

1. Domestic tenants who accepted rehousing arrangement will be offered an ex-gratia removal allowance. These allowances are in line with the HKHA's rates. Tenants will be informed of the allowance receivable individually according to their household size and the prevailing rates.

(IV) Compassionate Re-housing

1. Domestic tenants who do not fulfill the above rehousing eligibility criteria may be re-housed on compassionate grounds if they have genuine hardship arising from factors such as ill health, disability or special family circumstances.

(B) Ex-gratia Allowances

(I) Domestic Tenants

1. According to Landlord and Tenant (Consolidation) Ordinance, domestic tenants are required to move out from the properties and are not entitled to any compensation or forms of payments if their tenancies are terminated and are not renewed. However, for tenants of the URA acquired properties who decline re-housing as described in Part (A) above or who are not provided re-housing due to various reasons and agreed to move out from the properties, the URA will still offer to them an appropriate amount of ex-gratia allowances as described below.

Tenants who commenced occupying the properties before the date of Freezing Survey

2. Subject to the exceptions described in Paragraph 4 below, the URA will offer an ex-gratia allowance to tenants who had commenced occupying the properties under valid tenancies before the date of Freezing Survey. Based on the rateable value of the properties concerned, the ex-gratia allowance is calculated according to the method as listed in **Table 1** below:

Table 1

Rateable Value ("RV")	Ex-gratia Allowance
1st HK$10,000	9 times RV
2nd HK$10,000	8 times RV
3rd HK$10,000	7 times RV
4th HK$10,000	6 times RV
5th HK$10,000	5 times RV
6th HK$10,000	4 times RV
7th HK$10,000	3 times RV
8th HK$10,000	2 times RV
9th HK$10,000 and above	1 times RV

3. Subject to the exceptions described in Paragraph 4 below, the total amount of ex-gratia allowance is subject to a minimum amount of HK$180,000 (1) for an one-person household and a minimum amount of HK$200,000 (1) for a two-person or larger household. The minimum amount is subject to annual review.

4. The ex-gratia allowance described in Paragraph 2 above and the minimum amount described in Paragraph 3 above do not apply to tenants who,
   (i) have alternative accommodation; or
   (ii) are not genuinely residing in their properties within the project.

   Tenants who fall under any of these circumstances will be offered an ex-gratia allowance equal to 3 times the prevailing ex-gratia allowance offered by the Lands Department on resumption by the Government ("Government EGA"). However, if the tenants are not legal Hong Kong residents holding valid Hong Kong Identity Card ("HKIC"), they will only be offered 2 times the Government EGA.

Tenants who commenced occupying the properties on or after the date of Freezing Survey

5. Subject to the exceptions described in Paragraph 6 below, the URA will only offer an ex-gratia allowance equal to 2 times Government EGA to tenants who had commenced occupying the properties under valid tenancies on or after the date of Freezing Survey.

6. The ex-gratia allowance described in Paragraph 5 above does not apply to tenants who,

   (i) have alternative accommodation; or
   (ii) are not genuinely residing in their properties within the project; or

Note: (1) Effective from 1 April 2020

(iii) have received from the URA within two years prior to the date of Freezing Survey or at any time after the date of Freezing Survey any of the following allowances or arrangement: -
   (a) allowances for owners of domestic properties but excluding the incidental cost allowance; or
   (b) Ex-gratia allowances for domestic tenant being higher than Government EGA; or
   (c) Relocation Assistance; or
   (d) re-housing; or

(iv) are not legal Hong Kong residents holding valid HKIC.

Tenants who fall under any of these circumstances will only be offered an ex-gratia allowance equal to 1 times Government EGA.

Principal Tenants

7. Subject to the exceptions described in Paragraph 8 below, for principal tenants who had commenced occupying their properties and whose tenancies commenced before the date of Freezing Survey, the URA will offer to them an ex-gratia allowance equal to the ex-gratia allowance described in Paragraph 2 above subject to a minimum amount described in Paragraph 3 above, plus an additional ex-gratia allowance equal to 24 months' profit rent (i.e. rent received from the sub-tenants after deduction of the rent payable by them to their landlords).

8. The ex-gratia allowance and minimum amount described in Paragraph 7 above does not apply to principal tenants who,

   (i) have alternative accommodation; or
   (ii) are not genuinely residing in their properties within the project.

   Principal tenants who fall under any of these circumstances will be offered an ex-gratia allowance equal to 3 times Government EGA plus 24 months' profit rent. However, if the principal tenants are not legal Hong Kong residents holding valid HKIC, they will only be offered 2 times the Government EGA plus 24 months' profit rent.

9. Principal tenants occupying the properties and whose tenancies commenced on or after the date of Freezing Survey will be offered an ex-gratia allowance according to Paragraphs 5 or 6 above, whichever is applicable.

10. For those principal tenants who do not occupy their properties and whose tenancies commenced before the date of Freezing Survey, they will be offered a minimum amount of HK$20,000 [(1)] (amount is subject to annual review), or 24 months' profit rent, whichever is the higher. No ex-gratia

Note: (1) Effective from 1 April 2020

allowance will be offered to principal tenants whose tenancies commenced on or after the date of Freezing Survey.

11. Principal tenants will be offered rental reduction from the URA. Where any sub-tenant surrenders his leased portion to the URA before the principal tenant delivers vacant possession, the rent payable by principal tenant will be reduced accordingly.

(II) Non-domestic Tenants (Other than Tenants of Industrial Premises)

Ex-gratia Allowance

1. According to the Landlord and Tenant (Consolidation) Ordinance, non-domestic tenants are required to move out from their properties and are not entitled to any compensation or other payments if their tenancies are terminated and are not renewed. However, the URA will still offer an ex-gratia allowance equals to 3 times the RV of the affected properties to non-domestic tenants (other than tenants of industrial premises) who agreed to move out from their properties.

2. In addition to the ex-gratia allowance described in Paragraph 1 above, additional payment of ex-gratia business allowance ("EGBA") is payable to any tenant-operator of non-domestic property (other than tenants of industrial premises) who had commenced occupying their properties for business use before the date of Freezing Survey and have accepted the ex-gratia allowance offer from the URA both unconditionally and within the validity period of the offer and agreed to move out from their properties. The amount is directly proportional to the number of years of continuous operation by the tenant-operator as business owner in the property. In calculating the number of years of continuous operation, the expiry date of continuous operation is 2 years from the date which the URA issues initial acquisition offers to property owners. The amount of EGBA is payable at a rate of 0.1 times the RV for each year, subject to a maximum of 30 years. For an incomplete year, the amount of EGBA is calculated on a pro-rata basis to the nearest month. The amount of EGBA is subject to a maximum amount of $700,000 and a minimum amount as described in **Table 2** below.

Table 2

Years of Continuous Operation	Minimum EGBA
10 years or less	HK$110,000 (1) (amount is subject to annual review)
More than 10 years (maximum of 30 years)	Additional HK$10,000 for each completed year

3. In the application for EGBA, the Tenant-operator is required to substantiate the period of continuous operation in the property as business owner. "Tenant-operator" here means a tenant who occupies his property, which is a legal premises, for his own business.

4. A tenant-operator may choose to claim for business loss as an alternative to the above two allowances (if applicable).

(C) Payment Arrangement

1. All applicable allowance mentioned above, half will be paid upon the execution of surrender agreement and the remaining half will be paid after the delivery of vacant possession.

(D) Other General Rules

1. Trespassers occupying properties (domestic or non-domestic) in the project, who move in on or after the date of Freezing Survey, will be required to move out without any allowance or re-housing.

2. In cases where the property is occupied for domestic and non-domestic uses simultaneously, the URA will determine whether the tenancy is domestic or non-domestic in accordance with the provisions of the Landlord and Tenant (Consolidation) Ordinance.

3. If tenants (domestic or non-domestic) refuse to accept ex-gratia allowance or re-housing offer or execute surrender documents, the URA will recover vacant possession of their properties in accordance with the laws.

4. Domestic tenants whose tenancy commenced before the date of Freezing Survey and who was requested by their landlord to move out from the affected properties due to the expiry or termination of their tenancies before the URA acquired the affected properties successfully and who are unable to receive the ex-gratia allowances according to Part (B)(I) (the "affected domestic tenants") can apply for the URA's "Domestic Tenants

Note: (1) Effective from 1 April 2020

Compassionate Assistance Programme" ("DTCAP"). The affected domestic tenants should submit application to the URA with tenancy agreement, rent receipts, termination notice served by the landlord to the affected domestic tenants and residential proof etc., at least 1 month before moving out from the affected properties, to facilitate the URA to conduct initial assessment on their eligibility of receiving Special Ex-gratia Allowance or Special Re-housing. The Special Ex-gratia Allowance is equal to the ex-gratia allowance described in Paragraph 2 and Paragraph 3 of Part (B)(I) above.

5. To become eligible for DTCAP, the affected domestic tenants should fulfill the following eligibility criteria:

(i) they have been genuinely residing with valid tenancy in the affected properties before and since the date of Freezing Survey and have been genuinely residing in the affected properties for at least 6 months before moving out from the affected properties; and
(ii) they do not have alternative accommodation elsewhere; and
(iii) they are required to leave the affected properties not because of their breach of tenancy on their part; and
(iv) after the expiry of their tenancies, they have not refused to renew their tenancies due to unreasonable grounds and circumstances; and
(v) they have not received any compensation or other payment from their landlords for vacating the affected properties; and
(vi) they are legal Hong Kong residents holding valid HKIC; and
(vii) their landlords have not served the termination notice to them before the date of Freezing Survey; and
(viii) they have registered on the Application for PRH of the HKHA; and
(ix) if Special Re-housing is to be offered, they have to fulfill the eligibility criteria of PRH laid down by the HKHA and/or HKHS or of URA re-housing.

Tenants who moved in on or after the date of Freezing Survey are not eligible for DTCAP.

6. If the affected domestic tenants are eligible for DTCAP, the URA will pay Special Ex-gratia Removal Allowance in advance. The amount is equal to the ex-gratia removal allowance as described in Part (A)(III) above. The pre-paid amount will be deducted from the future payment of Special Ex-gratia Allowance.

After completion of the acquisition or government resumption of the affected properties, the URA will assess the eligibility of the affected domestic tenants in receiving the Special Ex-gratia Allowance or Special Re-housing.

7. Domestic tenants, who undergo the same situation as mentioned in Paragraph 4 above and are not eligible for DTCAP, can apply for the URA's Relocation Assistance. The affected domestic tenants must fulfill the eligibility criteria mentioned in items (i) to (vi) of Paragraph 5 above, and should submit application and provide sufficient evidence to the URA at least 1 month before moving out from the affected properties for URA's verification and assessment.

8. The URA will pay Relocation Assistance to the affected domestic tenants after they have moved out from the affected properties. Affected domestic tenants who have received Relocation Assistance are not eligible to apply for DTCAP described in Paragraph 4 above in the same project.

9. Domestic tenants who opt for receiving any ex-gratia allowance of a total amount more than 1 times the Government EGA (but excluding the 24 months' profit rent) or Relocation Assistance as described in Paragraph 7 above have to agree to give up their rights to public housing assistance for the next 2 years. Such tenants are only allowed to submit fresh applications for PRH and other public housing assistance after the expiry of the 2-years period.

10. Non-domestic tenant-operator (except tenants of industrial premises) whose tenancy commenced before the date of Freezing Survey and who was requested by their landlord to move out from the affected properties due to the expiry or termination of their tenancies before the URA acquired the affected properties successfully and moving out from the affected non-domestic properties after the date of Freezing Survey and who are unable to receive the ex-gratia allowances according to Part (B)(II) (the "affected non-domestic tenants") can apply for the URA's Special EGBA. The amount is equal to EGBA as described in Paragraph 2 of Part (B)(II) above. The affected non-domestic tenants should provide sufficient evidence of business operation, including tenancy agreements, rental receipts, termination notice served by their landlord and other relevant documents, at least 1 month before moving out from the affected non-domestic properties, to facilitate the URA to conduct initial assessment on their eligibility of receiving Special EGBA.

11. To become eligible for Special EGBA, the affected non-domestic tenants should fulfill the following criteria:

    (i) they are operating in a legal premises; and
    (ii) they have commenced operating business in the affected properties with valid tenancy before and since the date of Freezing Survey and have been in operation for at least 6 months before moving out from the affected properties; and
    (iii) they are required to leave the affected properties not because of his/her breach of tenancy terms; and

(iv) the tenancy is terminated or not renewed by the landlord and they have not terminated the tenancy early at their own will; and
(v) they have received no compensation or other payment from their landlord for vacating the affected properties; and
(vi) after the expiry of the tenancy, they have not refused to renew their tenancy due to unreasonable grounds and circumstances.

After completion of the acquisition or government resumption of the affected properties, the URA will assess the eligibility of the affected non-domestic tenants in receiving the Special EGBA.

12. The URA has drawn to the attention of landlords whose properties had been tenanted out on the date of Freezing Survey that the URA will not consider making a higher offer to them to acquire their properties in the following situations: -

(i) properties being left vacant; or
(ii) landlords entering into new tenancies, whether with the existing tenants or new tenants; or
(iii) landlords occupying their properties for their own use.

13. The URA would remind landlords / tenants that it is an offence for landlords to unlawfully deprive a tenant of occupation of property or to make an unwarranted demand with menaces with a view to gain for himself or others or to defraud against the URA. The URA will report to the enforcement authorities on all cases of suspected criminal offences.

14. The information contained in this leaflet applies to projects announced by the URA under the URAO only (i.e. not applicable to tenants of industrial premises). The URA reserves the right to adopt different policies and procedures for its other projects.

15. The principles for rehousing and ex-gratia allowance contained in this leaflet applies to the following types of tenants only:

(i) tenants who are, on 13 June 2017, still in occupation of the relevant property in redevelopment projects which have been published for implementation under the URAO and acquisition has already commenced before 13 June 2017; and
(ii) tenants of property in redevelopment projects which have been published for implementation under the URAO before 13 June 2017 but acquisition has not yet commenced; and
(iii) tenants of property in redevelopment projects to be published for implementation under the URAO after 13 June 2017.

This leaflet is issued for the purpose of general reference only. The information contained herein is with reference to the principles and practice of the Urban Renewal Authority prevailing at the date of issue of this leaflet. It shall not constitute any representation on the part of the Urban Renewal Authority or give rise to any expectation whatsoever and shall not be relied on as such. Each case will be considered on its own merits having regard to all factors and circumstances. The terms of re-housing and/or ex-gratia allowance to be offered are subject to the principles and practice of the Urban Renewal Authority prevailing at the time the offer of re-housing and/or ex-gratia allowance is made and are subject to review from time to time as the Urban Renewal Authority shall at its absolute discretion consider appropriate. The Urban Renewal Authority's right to add to, amend or delete the whole or any part of this leaflet is hereby reserved.

For enquiries, please call URA External Relations Department:
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April 2020

Technical Assessments (Original Scheme 2020)

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KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME (CBS-2:KC)

QUANTITATIVE RISK ASSESSMENT

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1.0 Introduction

1.1 Background

In response to the Policy Address 2018 and 2019, the Urban Renewal Authority (URA) has identified a clusters of Civil Servants' Co-operative Building Society (CBS) Scheme site in the western part of To Kwa Wan near Lok Man Sun Chuen (LMSC) for high density development. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (hereinafter refer as "the Scheme") aims to increase housing supply by full utilisation of the development potential of the site.

The Scheme covers an area of about 16,473m^2, involving a cluster of 30 CBS sites on Kau Poi Lung Road, Chi Kiang Street, Maidstone Road and Kiang Su Street. The Scheme is currently zoned "Residential (Group A)". The northern part will be developed by the URA (regarded as URA site), whilst the southern part will be earmarked for public housing development (regarded as PH site). The location of the Scheme is shown in **Figure 1**.

The Scheme falls within 150m of the two Liquefied Petroleum Gas (LPG) Compounds of Lok Man Sun Chuen. One of the LPG Compounds is located near LMSC Block I in the south of the Scheme, while the other LPG Compound is surrounded by LMSC Block G in the north-west of the Scheme. Both LPG Compounds have capacity of 3.5 tonnes and are classified as Notifiable Gas Installations (NGIs) under the Gas Safety Ordinance (Cap. 51). A Quantitative Risk Assessment is hence prepared to address the potential risk impact posed by the LPG Compounds on the population in the vicinity including the future population after the redevelopment of the Scheme.

1.2 Scope of Work

The scope of this study includes the two LPG Compounds near Block I and Block G of LMSC. The objectives are to evaluate the risk levels associated with the two LPG Compounds to the public, and to determine whether any additional risk mitigation measures are required in the design of the Scheme.

The scope of the study is limited by the following criteria:

1. The risks associated with the transport of LPG by road tankers have been restricted to the consideration of their final approach to the LPG storage installation within the LPG Compound;
2. The risk assessment has been limited to those events which have the potential for off-site fatalities.

1.3 Hong Kong Planning Standards and Guidelines (HKPSG)

1.3.1 Hong Kong Risk Guidelines

Chapter 12.4 of the HKPSG [1] stipulates the risk guidelines to determine the acceptability of Potentially Hazardous Installation (PHI) in terms of individual and societal risks. These risk guidelines are also adopted to ascertain whether or not the risk levels posed by the NGI are acceptable.

The individual and societal risk criteria for the risk assessment are described below:

i. Individual Risk: a measure of the frequency at which an individual at a specified distance from the hazardous installations is expected to sustain a specified level of harm from the realization of hazardous incident(s). The maximum level of off-site individual risk causing fatality of a person located 24 hours a day outside the facility of concern should not exceed 1×10^{-5} / year, i.e. 1 in 100,000 per year.

ii. Societal Risk: a measure of the relationship between the frequency of an incident and the number of fatalities that will result. It is typically expressed graphically by an F-N curve showing the cumulative frequency (F) of incidents causing N or more fatalities. The societal risk criteria are presented graphically as in **Figure 2**. There are three regions as described below:

- **Acceptable** where the risk is so low that no action is necessary;
- **Unacceptable** where the risk is so high that they should be reduced regardless of the cost or else the hazardous activity should not be proceeded; and
- **ALARP** where the risk associated with the hazardous activities should be reduced to a level of "As Low As Reasonably Practicable", in which the mitigation measures should be prioritized on the basis of practicality and implementation cost versus the risk reduction achieved.

1.4 Methodology

1.4.1 Overall QRA Approach

Two QRA studies were conducted in 1996 for the two LPG Compounds in LMSC (namely "1996 Block I QRA" and "1996 Block G QRA") [2][3]. A recent QRA study was also conducted in 2017 for the LPG Compound near LMSC Block I as part of Hong Kong Housing Authority's feasibility study on a proposed Subsidised Sale Flats Development at Ko Shan Road (namely "2017 SSF QRA")[4]. Reference has been made to these three approved QRA reports.

The general approach to the QRA is represented in **Figure 3**. It follows the HKRG stipulated in Section 4 of Chapter 12 of the HKPSG [1] and the QRA Methodology for LPG Installations in Hong Kong [5] and the previous approved QRA reports for these two LPG installations [2][3][4].

The major phases in QRA include:

i. **Hazard Identification**: Identify hazard scenarios associated with the operation of the LPG Compound, and then determine a set of relevant scenarios to be included in a QRA.

ii. **Frequency Assessment**: Assess the likelihood of occurrence of the identified hazard scenarios.

iii. **Consequence Assessment**: Assess the consequences and impact to the surrounding population.

iv. **Risk Summation and Assessment**: Evaluate the risk level, in terms of individual risk and societal risk. The risks will be compared with the criteria

outlined in HKRG to determine their acceptability.

v. **Identification of Mitigation Measures**: Identify and assess practicable and cost-effective risk mitigation measures if necessary. The risks of mitigated cases will then be reassessed to determine the level of risk reduction.

1.4.2 Case to be Considered

The Scheme is targeted to be completed in 2030/31. By assuming the Scheme will be fully occupied in 5 years after its completion, i.e. 2036, this study will therefore consider following cases for each LPG Compound:

- ***Case 1 – Base Case in Year 2036:*** evaluating the risk level in year 2036 without the implementation of the Scheme;
- ***Case 2 – Operation Case in Year 2036***: evaluating the risk level in year 2036 with the operation of the Scheme at full capacity.

2.0 Description of LPG Installations

The two LPG Compounds at Lok Man Sun Chuen, operated by ExxonMobil Hong Kong Limited (Esso), are located near Block I and Block G of Lok Man Sun Chuen, as indicated in **Figure 1**. The LPG Compounds supply LPG as the fuel source in Lok Man Sun Chuen. As confirmed by Esso, there is no modification to the operation of the two LPG Compounds since the 1996 Block I QRA and 1996 Block G QRA studies. With reference to the previous reports [2][3][4], the operation of storage and delivery of LPG at the two LPG Compounds are summarised in the following sections. Detailed information are included in **Annex A**.

2.1 LPG Compound near Lok Man Sun Chuen Block I

2.1.1 Existing LPG Storage Installation

The LPG Compound is at an elevation of approximately 17.3mPD in the south west of LMSC Block I. As per 1996 Block I QRA [2], the LPG Compound comprises an underground vessel in the east of the site and three explosion proof vaporisers in an enclosed room at the west sides of the side. The underground vessel is of 8.1 kilolitre capacity (equivalent to 3.5 tonnes LPG inventory, taking into account the ullage requirement of not filling more than 80% of the vessel volume) and is stress relieved and 100% radiographed.

2.1.2 LPG Delivery and Transfer

LPG is delivered to the LPG Compound by road tankers with a maximum capacity of the road tanker of about 9 tonnes [4]. Road tankers are assumed to be operated in accordance with the Code of Practice for Hong Kong LPG Industry – Module 3 Handling and Transport of LPG in Bulk by Road [2].

According to 2017 SSF QRA [4], LPG is delivered 4 times per week at maximum, thus 208 annual LPG deliveries are adopted in the study. LPG is dispensed from the tanker into the storage vessel through a flexible hose.

2.2 LPG Compound at Lok Man Sun Chuen Block G

2.2.1 Existing LPG Storage Installation

The LPG Compound is surrounded by LMSC Block G is at an elevation of approximately 15.4mPD. There is a car park to the south of the LPG Compound and a playground to the north of the LPG Compound. As per 1996 Block G QRA [3], the LPG Compound comprises an aboveground mounded vessel in the middle of the site and three explosion proof vaporisers in an enclosed room at the west sides of the side. The mounded vessel is of 8.2 kilolitre capacity (equivalent to 3.5 tonnes LPG inventory, taking into account the ullage requirement of not filling more than 80% of the vessel volume). With implementation of the mitigation measure recommended in the 1996 Block G QRA [3], the vessel is stress relieved and 100% radiographed.

2.2.2 LPG Delivery and Transfer

LPG is delivered to the LPG Compound by road tankers. Similar to the LPG Compound near LMSC Block I, the maximum capacity of the road tanker of assumed at 9 tonnes.

As confirmed by Esso, there is no change to the operation in the LPG Compound near LMSC Block G, an annual LPG deliveries of 220 times are adopted in this study in

accordance with 1996 Block G QRA [3]. LPG is dispensed from the tanker into the storage vessel through a loading arm.

Table 1 Summary of LPG Compounds near Lok Man Sun Chuen Block I and Block G

Parameter	LPG Compound near LMSC Block I	LPG Compound near LMSC Block G
Number of vessels	1	1
Mounded or Underground	Underground	Mounded
Design capacity of vessel	8.1 kilolitre	8.2 kilolitre
Maximum capacity of vessel	3.5 tonnes	3.5 tonnes
Maximum capacity of LPG road tanker	9 tonne	9 tonne
LPG delivery frequency	208 per year	220 per year
Duration of unloading operation	10-20 min	<25 min
Residence time of LPG road tanker	25 min	25 min
Number of vaporizers	3	3

3.0 Project Data

3.1 The Scheme

The Scheme covers an area of about 16,473m^2 on Kau Poi Lung Road, Chi Kiang Street, Maidstone Road and Kiang Su Street and is currently zoned "Residential (Group A)". The preliminary layout of the Scheme is shown in **Annex B**.

The Scheme will provide a total of about 2500 units. The northern part of the Scheme will be developed by the URA (regarded as URA site), providing 1541 units in 5 residential towers on a podium with club house, retail and community facilities. The southern part of the Scheme will be earmarked for public housing development (regarded as PH site), providing 950 flats in 2 residential towers on a podium with retail and community facilities.

The development of the Scheme is targeted to be completed in Year 2031 for population intake and is assumed to be fully occupied in 5 years after its operation.

3.2 Study Area

The LPG Compounds are located in southern corner and northern side of LMSC. The LPG Compound near LMSC Block I is 130m in the south of the Scheme, whilst the LPG Compound near LMSC Block G is over 70m away in the northwest of the Scheme.

The study area for each LPG Compound is taken as 200 metres radius from centre of each LPG Compound, as shown in **Figure 1**.

3.3 Population Data

3.3.1 Population in the Vicinity

The population lie within the 200m study areas of the LPG Compounds may be impacted by hazardous events arising from the accidental LPG release from the LPG Compounds. Population closest to the hazardous installations are most at risk. As the QRA is aimed to assess the off-site risk to life, staff present at the LPG Compounds are regarded as voluntary takers of risk and are not considered in this study.

The future population within the study areas is estimated based on information collected from desktop studies and reference to the 2017 SSF QRA[4]. The following information and assumptions are adopted in the estimation:

- 2016 Population By-Census [8] for residential population in LMSC and surrounding street blocks;
- Conservative assumption of zero growth for residential population in Town Planning Unit (TPU) 241 instead of negative growth observed in 2016 Population By-Census [8] and the Projections of Population Distribution 2018 – 2026; and
- Maximum accommodation capacity of school as per Education Bureau's database [10].

The population groups considered in the vicinity of the two LPG Compounds are illustrated in **Figure 4** and **Figure 5**. The detailed population data is summarised in **Table 2**.

3.3.2 Transient Population

Transient population includes traffic population as well as pedestrians along the road sections. Traffic population can be calculated using the equation below:

$$\text{Traffic Population (ppl)} = \frac{\frac{\text{No. of ppl}}{\text{vehicle}} \times \frac{\text{No. of vehicle}}{\text{hr}}}{\text{Traffic Speed } (^{\text{km}}/_{\text{hr}})} \times \text{Road Section Length (km)}$$

The transient population adopted for this study is summarised in **Table 2** with the detailed calculations provided in **Annex C**.

Table 2 Population Data within Study Area in Year 2036

ID	Population Name	Population Category	Population in Year 2036		Temporal Population Change				Indoor Ratio	Ground Level (+mPD)	Building Height (m)	Remarks
			Base Case	Operation Case	WDD	WDN	WED	WEN				
01	Lok Man Sun Chuen Block I	Residential	1050	1050	25%	100%	70%	100%	95%	14	47	2016 Population By-Census
02	Lok Man Sun Chuen Block H	Residential	1342	1342	25%	100%	70%	100%	95%	14	55	2016 Population By-Census
03	Lok Man Sun Chuen Block A&B	Residential	1257	1257	25%	100%	70%	100%	95%	20	42	2016 Population By-Census
04	Lok Man Sun Chuen Block C&D	Residential	1276	1276	25%	100%	70%	100%	95%	23	44	2016 Population By-Census
05	Lok Man Sun Chuen Block E&F	Residential	1839	1839	25%	100%	70%	100%	95%	29	38	2016 Population By-Census
06	Lok Man Sun Chuen Block G	Residential	2296	2296	25%	100%	70%	100%	95%	15	43	2016 Population By-Census
07	Celestial Heights	Residential	3631	3631	25%	100%	70%	100%	95%	30	108	2016 Population By-Census
08	Residential Buildings (LSBG24117)	Residential	467	467	25%	100%	70%	100%	95%	13	18	258 units. Approximated from 1243 people within LSBG24117 as per 2016 Population By-Census
09	Morning Joy Building, City 151 (LSBG24117)	Residential	429	429	25%	100%	70%	100%	95%	15	66	237 units. Approximated from 1243 people within LSBG24117 as per 2016 Population By-Census
10	Residential Buildings (LSBG24117)	Residential	348	0	25%	100%	70%	100%	95%	13	18	192 units. Approximated from 1243 people within LSBG24117 as per 2016 Population By-Census
11	80 Maidstone Road	Residential	258	258	25%	100%	70%	100%	95%	12	63	92 units. Assume average household size of 2.8
12	Future Hotel	Hotel	200	200	25%	100%	50%	100%	95%	12	87	78 guest rooms. Conservative assumption.
13	Mega Building, Delight Court, Mainshine Court, Goldtone Court (LSBG24118)	Residential	610	610	25%	100%	70%	100%	95%	12	54	183 units. Approximated from 1966 people within LSBG24118 as per 2016 Population By-Census
14	Residential Buildings (LSBG24118)	Residential	1170	1170	25%	100%	70%	100%	95%	12	18	351 units. Approximated from 1966 people within LSBG24118 as per 2016 Population By-Census
15	Residential Buildings (LSBG24118)	Residential	187	0	25%	100%	70%	100%	95%	12	18	56 units. Approximated from 1966 people within LSBG24118 as per 2016 Population By-Census
16	Open carpark	car park	10	10	100%	10%	50%	10%	0%	12	1	Conservative assumption
17	Residential Buildings (LSBG24123)	Residential	580	0	25%	100%	70%	100%	95%	11	18	214 units. Approximated from 2124 people within LSBG24123 as per 2016 Population By-Census
18	Residential Buildings (LSBG24123)	Residential	1545	1545	25%	100%	70%	100%	95%	9	35	570 units. Approximated from 2124 people within LSBG24123 as per 2016 Population By-Census
19	Tai Tung Court, Chap On Building, 90-92 Ko Shan Road (LSBG24128)	Residential	91	91	25%	100%	70%	100%	95%	11	22	36 units. Approximated from 1264 people within LSBG24128 as per 2016 Population By-Census
20	Fook Yue Mansion, Loyal Mansion (LSBG24128)	Residential	427	427	25%	100%	70%	100%	95%	8	46	170 units. Approximated from 1264 people within LSBG24128 as per 2016 Population By-Census
21	Kar Shun Building (LSBG24128)	Residential	111	111	25%	100%	70%	100%	95%	8	74	44 units. Approximated from 1264 people within LSBG24128 as per 2016 Population By-Census

ID	Population Name	Population Category	Population in Year 2036		Temporal Population Change				Indoor Ratio	Ground Level (+mPD)	Building Height (m)	Remarks
			Base Case	Operation Case	WDD	WDN	WED	WEN				
22	On Hang Building & Other Residential Buildings (LSBG24128)	Residential	246	246	25%	100%	70%	100%	95%	9	21	98 units. Approximated from 1264 people within LSBG24128 as per 2016 Population By-Census
23	Faerie Court (LSBG24128)	Residential	392	392	25%	100%	70%	100%	95%	12	78	156 units. Approximated from 1264 people within LSBG24128 as per 2016 Population By-Census
24	Hop Shing Commercial Building	Commercial	500	500	100%	10%	20%	0%	95%	11	73	Estimated from floor area
25	Church of Good Shepherd	Kindergarten & Church	326	326	100%	0%	100%	0%	95%	11	10	Church cum Kindergarten. Derived from maximum capacity of classroom. Assume 20 teachers and staffs.
26	Future SSF Development	Residential	1540	1540	25%	100%	70%	100%	95%	12	80	Adopted from QRA for SSF Development at Ko Shan Road, TO Kwa Wan
27	LGBG24132	Residential	1178	1178	25%	100%	70%	100%	95%	15	60	2016 Population By-Census
28	LSGB24303	Residential	1101	1101	25%	100%	70%	100%	95%	17	18	2016 Population By-Census
29	LSBG24301	Residential	1828	1828	25%	100%	70%	100%	95%	9	25	2016 Population By-Census
30	LSBG24401	Residential	2473	2473	25%	100%	70%	100%	95%	7	24	2016 Population By-Census
31	Ko Shan Road Park	Recreational	100	100	40%	10%	100%	10%	0%	9	3	Conservative assumption
32	Ko Shan Theatre	Theatre	1100	1100	20%	10%	100%	10%	95%	20	15	Conservative assumption
33	Ko Shan Theatre (New Wing)	Theatre	1000	1000	20%	10%	100%	10%	95%	30	15	Conservative assumption
34	C.C.C. Wanchai Church Kei To Primary School	School	880	880	100%	0%	10%	0%	90%	17	19	Derived from maximum capacity of classroom. Assume 70 teachers and staffs.
35	S.K.H. Good Shepherd Primary School	School	635	635	100%	0%	10%	0%	90%	11	19	Derived from maximum capacity of classroom. Assume 50 teachers and staffs.
36	E.L.C.H.K. Hung Hom Lutheran Primary School	School	590	590	100%	0%	10%	0%	90%	11	15	Derived from maximum capacity of classroom. Assume 50 teachers and staffs.
37	Kau Piu Lung Road Playground	Recreational	40	40	40%	10%	100%	10%	0%	46	1	Conservative assumption
PD01	URA Site:											
	Residential Buildings	Residential	0	4608	25%	100%	70%	100%	95%	25	115	1491 units. Assume average household size of 2.6 as per the Planning Report of the Scheme plus 15% contingency
	Club House	Club House	0	300	50%	20%	100%	20%	95%	20	5	129 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.
	Community Facilities	Community	0	60	100%	100%	100%	100%	95%	14	6	17 workers estimated in SIA for the Scheme. Assume worker to visitor ratio in 1:2. Rounded up to nearest 50.
	Retail	Retail	0	700	50%	25%	100%	25%	95%	14	6	348 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 50.

ID	Population Name	Population Category	Population in Year 2036		Temporal Population Change				Indoor Ratio	Ground Level (+mPD)	Building Height (m)	Remarks
			Base Case	Operation Case	WDD	WDN	WED	WEN				
PD02	PH Site											
	Residential Buildings	Residential	0	2841	25%	100%	70%	100%	95%	27	113	950 units. Assume average household size of 2.6 as per the Planning Report of the Scheme plus 15% contingency
	Community Facilities	Community	0	180	100%	100%	100%	100%	95%	22	5	59 workers estimated in SIA for the Scheme. Assume worker to visitor ratio in 1:2. Rounded up to nearest 10.
	Retail	Retail	0	70	50%	25%	100%	25%	95%	14	8	34 workers estimated in SIA for the Scheme. Assume worker to customer ratio in 1:1. Rounded up to nearest 10.
R01	Kau Pui Lung Road	Road	107	107	100%	58%	100%	58%	0%	15	1	Refer **Annex C**
R02	Lok Shan Road	Road	22	22	100%	58%	100%	58%	0%	13	1	Refer **Annex C**
R03A	Ma Tau Wai Road (NB)	Road	70	70	100%	58%	100%	58%	0%	8	1	Refer **Annex C**
R03B	Ma Tau Wai Road (NB)	Road	69	69	100%	58%	100%	58%	0%	8	1	Refer **Annex C**
R04A	Ma Tau Wai Road (SB)	Road	125	125	100%	58%	100%	58%	0%	8	1	Refer **Annex C**
R04B	Ma Tau Wai Road (SB)	Road	67	67	100%	58%	100%	58%	0%	8	1	Refer **Annex C**
R05	Ko Shan Road	Road	45	45	100%	58%	100%	58%	0%	11	1	Refer **Annex C**
R06	Anhui Street	Road	6	6	100%	58%	100%	58%	0%	9	1	Refer **Annex C**
R07	Kiang Hsi Street	Road	6	6	100%	58%	100%	58%	0%	9	1	Refer **Annex C**
R08	Shan Si Street	Road	6	6	100%	58%	100%	58%	0%	9	1	Refer **Annex C**
R09	To Kwa Wan Road	Road	88	88	100%	58%	100%	58%	0%	7	1	Refer **Annex C**
R10	East Kowloon Corridor	Road	102	102	100%	58%	100%	58%	0%	18	1	Refer **Annex C**

3.3.3 Temporal Change in Population

To reflect the temporal changes in population within a week, the corresponding population proportion of the time periods are assumed based on observation from site survey and with reference to the 2017 SSF QRA [4] and the approved Environmental Impact Assessment (EIA) report [11].

Day time is defined as 07:00 to 19:00 and night time from 19:00 to 07:00 next day. The temporal changes of different population category are provided in **Table 3**. The detailed temporal changes of population for each population site considered are provided in **Table 2**.

Table 3 Temporal Change of Population within a Week

Category	Time Period			
	Weekday Day (WDD)	Weekday Night (WDN)	Weekend Day (WED)	Weekend Night (WEN)
Car Park (1)	100%	10%	50%	10%
Club House (1)	50%	20%	100%	20%
Commercial (2)	100%	10%	20%	0%
Community (1)	100%	100%	100%	100%
Hotel (1)	25%	100%	50%	100%
Kindergarten & Church (2)	100%	0%	100%	0%
Recreational (2)	40%	10%	100%	10%
Residential (2)	25%	100%	70%	100%
Retail (3)	50%	25%	100%	25%
Road (4)	100%	58%	100%	58%
School (2)	100%	0%	10%	0%
Theatre (2)	20%	10%	100%	10%

Note:

(1) Conservative assumption
(2) Reference to 2017 SSF QRA [4]
(3) Reference to South Island Line EIA [11]
*(4) Refer **Annex C***

3.4 Indoor/Outdoor ratio

Building structures can offer some protection from fires for the occupants inside. An indoor ratio of 95% is applied to the population in residential buildings and commercial buildings while the remaining 5% of population is assumed to be outdoor, accounting for outdoor activities and walking pathways. Considering the outdoor activities in school, an indoor ratio of 90% is applied. Passengers in vehicles are also considered as 100% outdoors population although vehicles may provide certain protection.

3.5 Source of Ignition

Flammable gas cloud from an accidental release can be ignited and led to fire or explosion if there are ignition sources present in the close proximity or along the dispersion path of the cloud. If the gas cloud is diluted outside the flammable concentration range (i.e. below Lower Flammable Limit), or in the absent of ignition sources, no fire hazards will be expected. The energy level, timing, location and ignition effectiveness of ignition sources in the vicinity of the hazardous installations affect the extent of gas cloud dispersion and its potential impacts.

Two types of ignition sources are defined in the PHAST RISK model, including:

- *Population source* which are assigned implicitly to all population groups by SAEFTI to account for human activities such as smoking, cooking and using electrical appliances.

- *Transportation route segments* which are defined for the moving vehicles on roads. The ignition probability of a transportation route segment is calculated form the traffic density, average vehicle speed, vehicle ignition efficiency and total length of the road. The vehicle ignition efficiency for moving vehicles is adopted to be 0.4 per 60 second [12]. Traffic flow and average vehicle speed are included in **Annex C**.

3.6 Meteorological Information

Meteorological conditions affect the consequences of a gas release, in particular wind directions, speeds and stabilities which influence the direction and degree of turbulence of a gas dispersion. Meteorological data from the Kai Tak Automatic Weather Station (Year 2019) was collected from the Hong Kong Observatory and adopted in the consequence modelling to compute the effects of various gas dispersions, fires and explosions. The data are rationalized into a set of weather classes in accordance with the Netherlands Organisation for Applied Scientific Research (TNO) Purple Book [12]. The meteorological data can be expressed in the combinations of wind speeds and Pasquill stability classes. Pasquill classes (A to F) represent the atmospheric turbulence, in which class A being the most turbulent class while class F being the least turbulent class.

The six most dominant sets of wind speed-stability class combination for both day-time and night-time are listed in **Table 4** and **Table 5** respectively. The average ambient temperature adopted in the analysis is 25°C and relative humidity is 80%.

Table 4 Day Time Wind Direction Frequency at Kai Tak Automatic Weather Station (Year 2019)

Direction	Weather Class						Total
	3.5B	2.0D	4.5D	7.0D	3.0E	1.5F	
0 – 30	1.01	0.31	0.38	0.07	0.21	0.99	2.97
30 – 60	1.34	0.35	0.52	0.00	0.45	0.40	3.06
60 – 90	2.26	0.14	0.80	0.17	0.14	0.14	3.65
90 – 120	10.80	0.47	6.86	2.03	0.85	0.31	21.31
120 – 150	16.12	1.25	8.04	0.73	2.05	1.18	29.37
150 – 180	8.25	1.04	1.04	0.00	0.66	1.49	12.47
180 – 210	2.19	0.50	0.14	0.00	0.09	0.21	3.14
210 – 240	2.90	0.42	0.14	0.00	0.09	0.21	3.77
240 – 270	8.98	0.57	1.86	0.07	0.26	0.31	12.05
270 – 300	1.93	0.31	0.50	0.02	0.21	0.28	3.25
300 – 330	1.32	0.31	0.52	0.00	0.26	0.54	2.95
330 – 360	1.11	0.17	0.31	0.00	0.12	0.31	2.00
All	58.23	5.82	21.10	3.09	5.40	6.36	100.00

Table 5 Night Time Wind Direction Frequency at Kai Tak Automatic Weather Station (Year 2019)

Direction	Weather Class						Total
	3.5B	2.0D	4.5D	7.0D	3.0E	1.5F	
0 – 30	0.00	0.00	0.45	0.00	0.71	3.47	4.64
30 – 60	0.00	0.10	0.48	0.00	1.83	2.28	4.69
60 – 90	0.00	0.05	1.45	0.05	0.93	1.05	3.52
90 – 120	0.00	0.07	12.99	1.95	5.57	3.47	24.05
120 – 150	0.00	0.31	9.37	0.57	8.90	9.23	28.38
150 – 180	0.00	0.26	0.29	0.00	2.62	7.30	10.47
180 – 210	0.00	0.07	0.19	0.00	0.95	2.55	3.76
210 – 240	0.00	0.02	0.38	0.00	1.00	2.07	3.47
240 – 270	0.00	0.02	2.71	0.17	1.88	3.78	8.57
270 – 300	0.00	0.00	0.67	0.05	0.40	2.47	3.59
300 – 330	0.00	0.07	0.45	0.00	0.93	1.36	2.81
330 – 360	0.00	0.05	0.29	0.02	0.59	1.09	2.05
All	0.00	1.02	29.72	2.81	26.31	40.14	100.00

4.0 Hazard Identification

4.1 Properties of LPG

LPG supplied in Hong Kong is a pressurized mixture of propane and butane (3:7 in mole ratio). Upon release to the ambient environment, it vaporises and mixes with air, forming a dense flammable gas cloud which tends to flow and disperse closed to the ground. The gas cloud may extend over a long distance until it becomes too diluted or encounters ignition sources.

4.2 Event Leading to an Accidental LPG Release

The main hazard associated with the LPG facilities is an accidental uncontrolled release of LPG resulting in a fire or explosion upon ignition. The initial events leading to an LPG release could be one of the following:

- Spontaneous failure of pressurised LPG equipment due to material / design / construction defect, fatigue, corrosion, erosion, etc.;
- Spontaneous failure of vaporiser;
- Loading failure, i.e. an LPG release occurs as a direct result of the road tanker unloading operation; and
- External events.

4.2.1 LPG Storage Vessel Failure

Failure of the LPG storage vessel includes cold catastrophic failure and partial failure (25mm hole), which may result from:

- Spontaneous failure;
- Loading failure due to overfilling / over-pressurisation of storage vessel; and
- External events, such as earthquake.

Considering the content in vessel varies in time due to consumption and refilling, the vessel is assumed nominally at maximum capacity (i.e. 3.5 tonnes) for 20% of time and at low inventory with 60% of maximum capacity (i.e. 2.1 tonnes) for the rest of the time [6].

4.2.2 LPG Road Tanker Failure

Failure of the LPG road tanker includes cold catastrophic failure and partial failure (25mm hole), which may be resulted from:

- Spontaneous failure; and
- Accidents during unloading caused by collision by another vehicle.

Similar to the case of storage vessel that the content of an LPG road tanker varies with time, road tanker is modelled to have full inventory for 20% of the time and 50% of inventory for the remaining 80% of time.

4.2.3 Pipework Failure

Spontaneous failure of the LPG pipework is possible due to materials defects, corrosion, fatigue and erosion. Most of the LPG pipework is mounted on the concrete floor/structure, which includes the liquid filling pipework for LPG unloading to the LPG storage vessel, the liquid supply line to the vaporisers and the vapour line from the LPG storage vessel to the gas regulators of the gas distribution pipework.

Pipework may fail in an earthquake, and some of the pipework may be subjected to failure due to impact of the LPG road tanker.

4.2.4 Flexible Hose and Loading Arm Failure

An accidental release from the flexible hose or loading arm may be caused by:

- Spontaneous failure; and
- Loading failures, including:
    - Misconnection error – an error where the driver / operator fails to properly connect the loading hose / loading arm and the hose / loading arm comes adrift during unloading; and
    - Disconnection error – an error where the driver / operator inadvertently disconnects the hose / loading arm while the valve is still open or has failed open;
    - Road tanker drive-away error – an error where the driver inadvertently drives the LPG road tanker away during unloading;

4.2.5 External Events

An LPG release may occur due to external events and the consequence could be catastrophic failure or leak. The related external events are listed as follows:

- Earthquake;
- Aircraft crash;
- Car crash;
- Landslide;
- Severe environmental events;
- Lightning strike;
- Dropped object;

- Subsidence; and
- External fire.

4.3 Safety Provisions

Various safety provisions are installed in the LPG Compounds. These provisions can act in different combinations to prevent or mitigate the hazards due to an accidental LPG release.

4.3.1 Isolation System

The following safety provisions are provided on LPG road tanker and in the LPG Compounds to prevent uncontrolled release of LPG:

- **Non-return valve** installed on the liquid inlet pipework can prevent back flow from the LPG storage vessel;
- **Excess flow valves** installed at the LPG road tanker and LPG storage vessel are used to stop the liquid flow when a large release occurs (e.g. guillotine failure of the pipe / hose);
- **Breakaway coupling** is installed to prevent the LPG spillage due to LPG road tanker drive-away while the hose / loading arm is still connected during unloading;
- **Double-check filler valve** is installed at the LPG filling point to prevent the release from the LPG storage vessel. The design of the valve is essentially two non-return valves in series;
- **Pressure relief valves** are installed on the LPG road tanker and LPG storage vessel to protect against excessive pressure build-up due to overfilling or over-heating by fire. The pressure relief valve can prevent the excessive pressure causing leak or catastrophic failure of the LPG road tanker / LPG storage vessel;
- **Manual isolation valve** are installed on the LPG road tanker and pipework for operator / drivers to isolation LPF installations in case of failure or for maintenance operation; and
- **Emergency shutdown (ESD) system** on the LPG road tanker isolates the tanker and stops unloading operation when activated.

4.3.2 Firefight / Fire Protection

The following detection and firefighting systems are implemented in the LPG road tanker and LPG Compounds to mitigate the hazards of accidental LPG release:

- **Chartek coating** on the LPG road tanker could give a protection and prevents formation of hot spots for at least 30 minutes in case of jet fire impingement [5].
- **Fire service protection system** includes dry powder fire extinguishers and sand buckets are provided for general firefighting uses. Fire brigade will be available

within a few minutes upon an emergency call in case of fire. BLEVE events could be prevented by effective firefighting measures by the well-trained firefighters.

4.4 Outcome of an Accident LPG Release

The following outcomes may result from an accidental LPG release:

- Jet fire;
- Flash fire;
- Vapour cloud explosion (VCE);
- Fireball; and
- Boiling Liquid Expanding Vapor Explosion (BLEVE).

Potential fire escalation to a BLEVE event is considered if a jet fire impinges on the LPG road tanker over a period of time, causing the formation of hot spots on the LPG road tanker wall and subsequent structural failure. Storage vessels in the two LPG Compounds are either buried underground or mounded in a concrete compartment filled with washed sand. Escalation to BLEVE is considered unlikely for the LPG storage vessels.

If there is no ignition source in the LPG vapour cloud or along the migration path of the cloud with the wind, the LPG vapour cloud will dissipate and cause no hazardous impact.

4.5 LPG Release Scenarios Considered

Representative LPG accidental release scenarios considered in this study are summarized in **Table 6.**

Table 6 Representative LPG accidental release scenarios considered

Equipment	Failure Type	Release Type	Potential Hazardous Outcomes
LPG Compound near LMSC Block I			
LPG Storage Vessel	Catastrophic failure	Instantaneous	Fireball, flash fire
	Partial failure (leak)	Continuous	Jet fire, flash fire
LPG Road Tanker	Catastrophic failure	Instantaneous	Fireball, flash fire
	Partial failure (leak)	Continuous	Jet fire, flash fire
Vessel Filling Line	Guillotine failure	Continuous	Jet fire, flash fire, BLEVE (1)
Supply Line to Vaporiser	Guillotine failure	Continuous	Jet fire, flash fire, BLEVE (1)
Vaporiser	Guillotine failure (of vaporiser coil)	Continuous	Jet fire, flash fire
Flexible Hose	Guillotine failure	Continuous	Jet fire, flash fire, BLEVE (1)

Equipment	Failure Type	Release Type	Potential Hazardous Outcomes
LPG Compound near LMSC Block G			
LPG Storage Vessel	Catastrophic failure	Instantaneous	Fireball, flash fire
	Partial failure (leak)	Continuous	Jet fire, flash fire
LPG Road Tanker	Catastrophic failure	Instantaneous	Fireball, flash fire
	Partial failure (leak)	Continuous	Jet fire, flash fire
Vessel Filling Line	Guillotine failure	Continuous	Jet fire, flash fire, BLEVE (1)
Supply Line to Vaporiser	Guillotine failure	Continuous	Jet fire, flash fire
Vaporiser	Guillotine failure (of vaporiser coil)	Continuous	Jet fire, flash fire
Loading Arm	Guillotine failure	Continuous	Jet fire, flash fire, BLEVE (1)

Note:

(1) BLEVE of LPG road tanker

5.0 Frequency Assessment

A frequency assessment involves analysis of likelihood of LPG containment failure leading to an accidental LPG release and subsequent outcome probabilities. The initiating failure probabilities are estimated from the historical accident statistics, published failure data report, industrial testing results and expert judgment. Base failure frequencies of LPG facilities (vessels, pipework, etc.) are derived from the initiating failure events by applying failure analysis techniques such as fault tree analysis. Occurrences of subsequent hazardous outcomes in an accident are estimated by event tree analysis, taking severity of the release event and surrounding environment into account.

5.1 Spontaneous Failure

5.1.1 LPG storage vessel failure

Storage vessel failure refers to cold catastrophic failure leading to instantaneous release of the inventory or cold partial failure causing a continuous leak. Failure rates of 1.8×10^{-7} per vessel year and 5.0×10^{-6} per vessel year are adopted for cold catastrophic and partial failures respectively [5]. The LPG storage vessels are stress relieved and 100% radiographically examined.

5.1.2 LPG road tanker failure

LPG road tanker can be regarded as a mobile LPG storage vessel. The cold spontaneous failure rate for LPG road tankers is considered to be higher than that for a fixed storage vessel. This is because of the stresses due to vibration during transportation, and cyclic loading associated with filling/unloading of the road tanker. The catastrophic and partial failure probabilities of an LPG road tanker are assumed to be 2.0×10^{-6} and 5.0×10^{-6} per year [5], respectively.

5.1.3 Pipework failure

Failure of LPG pipework can be guillotine failure (full-bore rupture) and partial failure (leak from pipe cracks). The generic guillotine failure rate of LPG pipework is taken as 1.0×10^{-6} per meter per year [5]. Pipework in the two LPG Compound are of small diameters which are less than 50mm, leak from pipework is considered insignificant contributors to the overall risk levels. The failure of pipework may result in uncontrolled continuous release of LPG, if and only if, isolation fails, i.e. simultaneous failure of safety equipment (e.g. non-return valve, excess flow valve) and safety actions (e.g. close of manual shut-off valves, activation of ESD system).

5.1.4 Vaporiser failure

LPG from the storage vessel is vaporised in the water-heated coils of the vaporisers. The fluid flowing through the heating coil is of two-phase. Guillotine failure of the coils is conservatively regarded as liquid release. Failure rate of vaporiser is taken as 1.0×10^{-6} per meter per year [5] for the coil failure, giving a failure frequency of 5.0×10^{-6} per year for an average coil length of 5 m.

5.1.5 Flexible hose and loading arm failure

Cold spontaneous failure of flexible hose and loading arm may occur during the road tanker unloading operations. Likelihood of a guillotine failure of flexible hose is taken as

9.0×10^{-8} per hour [5]. Failure rate of loading arm is considered at 10% of that of flexible hose, i.e. 9.0×10^{-9} per hour [5].

5.2 LPG Road Tanker Unloading Failure

5.2.1 Hose misconnection error

A misconnection error may occur if the hose is improperly connected to the filling point, including failure to open manual isolation valves prior to unloading operation. A likelihood of 3.0×10^{-5} per operation [5] is adopted. It is assumed that such error results in hose coming completely apart, leading to a full-bore release.

5.2.2 Hose disconnection error (during tanker unloading)

Hose disconnection error refers to inadvertently disconnecting the filling hose during the unloading operation, which requires a complete disregard of normal operating procedures, as well as the failure to re-tightening the coupling immediately upon loosening it. A gross human error of 2.0×10^{-6} per operation [5] is adopted in this study.

5.2.3 Disconnection with valve open

A release may ensue when the hose is disconnected if isolating valves are left open or fail to close. This event is considered insignificant because it involves failure of a series of safety valves (non-return valve, and double-check filler valve), in additional to failure of the driver and his assistant to close the manual shut-off valve.

5.2.4 Road tanker drive-away error

A drive-away error may occur due to repositioning of the truck during delivery. The outcome of this failure matches that of hose disconnection, i.e. full-bore release. Repositioning during delivery is deemed remote because the road tanker should be parked in a dedicated unloading bay with an implementation of numerous safety measures such as the use of wheel chocks, interlocks on shutters and parking brake. The operators are responsible for monitoring the unloading process during replenishment. Thus, the probability of drive-away error before operation completion is deemed very low and a failure rate of 4.0×10^{-6} per operation [5] is adopted.

5.2.5 Road tanker impact onto LPG facilities

The road tanker may strike the LPG installation during manoeuvring, causing damage to the LPG installation or the road tanker. A likelihood of 1.5×10^{-4} per operation [5] is adopted for this human error.

In view of the slow speed of road tanker during manoeuvring to its unloading bay, a release from the road tanker due to slight impact is considered remote because the road tanker is equipped with side and rear end protection (mechanical barriers & rear protection bumper) for the vessel, fittings, valves and pipework fitted to it.

The probability of damaging the pipework near the loading bay is considered very low in consideration of the low momentum of road tanker manoeuvring in slow speed. The probability of guillotine failure of pipework is assumed as 0.001. Furthermore, pipework close to the unloading bay in the two LPG Compounds are protected concrete shelf or concrete kerb which further minimise the chance and energy of direct tanker impact on

the pipework. The probability for the concrete shelf / kerb failing to stop the tanker leading to guillotine failure of the pipework is assumed as 0.1. A release of road tanker's LPG content from the damaged pipework could ensue only if the driver neglects his duty to check the pipework integrity and possible leakage before unloading starts.

5.2.6 Road tanker collision during unloading

The LPG road tanker parks in a designated unloading bay inside the LPG Compounds, which located at the end of access road / parking area. Given that road tanker must park into the LPG Compound by back-in, the vessel of road tanker is surrounded by fence. The chance of a vehicle having sufficient impact force to damage the fence and the vessel of LPG road tanker inside is deemed remote. Nevertheless, a frequency of 1×10^{-8} per operation for the event of road tanker collided by another vehicle is adopted in accordance to the QRA Methodology for LPG Installations in Hong Kong quoted [5]. Such failure may result to catastrophic rupture a probability of 1×10^{-4} or partial failure at a probability of 1×10^{-3}.

5.2.7 Loading pipework over-pressurisation

In an unloading operation, the operator may make an error that fails to open all valves on the filling line to the storage vessel, which would potentially result in over-pressurization of the loading pipework. This potential scenario is considered under "Misconnection error".

5.2.8 Storage tank overfilling/ over-pressurisation

As usual on-site practice of LPG unloading operation, the vessel should only be filled up to 80% of the total capacity. The filling in progress should be monitored by the operators through the ullage gauge at all time. The possibility of overfilling is deemed low and is taken to be 2.0×10^{-2} per operation [5]. However, even if overfilling occurs, an LPG release due to over-pressurisation will only happen if the following human error or failure of safety provisions take place:

- Operators fail to activate ESD system;
- Failure truck pump over-pressurization protection system; and
- Failure of pressure relief valve on the storage vessel.

The chances of overfilling escalating to catastrophic rupture and partial failure of storage tank are assumed as 0.1 and 0.01, respectively.

5.2.9 Human Error

In case of accidental failure, it is very probable that the onsite staff can rectify the problem before and after any hazard event occurs. Two competent operators are required to be engaged in the unloading process and stayed in close vicinity to the road tanker and the filling point during the unloading. They are suitably trained in unloading operation, first aid, firefighting and emergency response. Nevertheless, they might make errors in a series of operations. The probability is taken as 0.01 for "error in a routine operation where care is required" from "A Guide to Practical Human Reliability Assessment" [13].

Probability of human error becomes much higher under emergency situations when a hazard event occurs. The chance of failure to rectify the problem under extreme stresses is taken to be 0.3 for general rate of errors involving very high stress level [13].

Upon an accidental LPG release during unloading operation, the operators should immediately activate the ESD system on the tanker to terminate the unloading process and close the isolation valves. The human error to start the ESD system under an emergency situation is taken as 0.1 for failure to act correctly at a stressful emergency situation [13].

5.3 External Event

5.3.1 Earthquake

Hong Kong is not located within the seismic belt. According to Hong Kong Observatory, earthquakes occurring in the circum-Pacific seismic belt which passes through Taiwan and Philippines are too far away to affect Hong Kong significantly. Moreover, buildings and infrastructures in Hong Kong are designed to withstand earthquakes up to Modified Mercalli Intensity (MMI) VII. Therefore, it is assumed that MMI VIII is of sufficient intensity to cause damage to specially designed structures. The chance of earthquake occurring at MMI VIII and higher in Hong Kong is very low in comparison with other regions and is estimated to be 1.0×10^{-5} per year [5]. It is assumed that such earthquake may result in vessel leakage and pipework rupture at a probability of 0.01 [14].

5.3.2 Aircraft crash

The LPG Compounds are far away from the Hong Kong International Airport with a distance of about 27 km. The frequency of aircraft crash is estimated using the HSE methodology. The frequency of aircraft crash is estimated using the HSE methodology [15] and the estimated number of flights predicted from air traffic statistics between year 2006 and 2019 [16]. The calculated rate of aircraft crash to the two LPG Compounds are 3.82×10^{-10} per year for LPG Compound near LMSC Block I and 5.70×10^{-10} per year for LPG Compound near LMSC Block G. Both aircraft crash rate are less than 1.0×10^{-9} per year, and therefore, aircraft crash is not further considered.

5.3.3 Car crash

No entry of unauthorised vehicle is allowed in the two LPG Compounds. The LPG Compound near Block I is fenced from the access road, while the LPG Compound near LMSC Block G is separated from the car park by concrete wall. Only minor car accident might be expected at the sites, which is considered to impose negligible threat to the LPG installation. This risk is deemed to be included in the "Road tanker collision during unloading".

5.3.4 Landslide

Landslide may damage the LPG installation. Since there is no slope feature near the LPG store, landslide risk is not further considered.

5.3.5 Severe environmental events

Loss of containment due to severe environmental events such as typhoon or storm surge (large scale tidal wave) is considered unlikely since the LPG vessels are either buried

underground or mounded in a concrete compartment filled with washed sand. The LPG installation is designed safe to withstand the wind load for typhoon. In case of super typhoons observed in recent years, no major loss of containment incident had been reported in the LPG Compound. Moreover, the LPG Compound is fenced by concrete wall, which prevents trees falling into the Compound to damage the aboveground installations. Therefore, the risk of LPG release due to severe environmental events is deemed unlikely and not further considered in the analysis.

5.3.6 Lightning strike

The frequency of lightning strike on a properly protected building structure is extremely low in Hong Kong. Risk resulting from lightning strike on facilities in the LPG Compound is extremely low as the compound is fitted with lightning rod and surrounded by a number of high-rise buildings. It is deemed lightning strike is remote, therefore not further considered in the analysis.

5.3.7 Dropped object

The LPG Compound near LMSC Block I is mainly surrounded by Ko Shan Road Park that the chance having dropped object with sufficient weight and velocity to damage the LPG installations is very remote. Windows on LMSC Block I are not facing the LPG Compound and are separated at 10m away from the LPG Compound. The chance of dropped object falling on the installations in the LPG Compound near LMSC Block I is deemed remote.

The other LPG Compound is surrounding by LMSC Block G in a separation distance of at least 4m. Most of installations in the LPG Compound near LMSC Block G is covered by concrete cover. It is expected that any dropped object fall on the LPG installations can only cause neglectable effect. In addition, the LPG Compound is fenced by concrete wall and wired fence which prevent object in projectile motion falling into LPG Compound. Therefore, it is considered the threat from dropped objects is remote and not further assessed in the analysis.

5.3.8 Subsidence

Excessive subsidence may lead to failure of the structure and ultimately loss of containment scenario. However, subsidence is usually slow in movement and such movement can be observed and remedial action can be taken in time. Risk from subsidence is therefore deemed remote and not further considered.

5.3.9 External fire

External fire refers to the occurrence of a fire event outside the LPG Compounds which may lead to the failure of the LPG facilities. This might occur from minor vehicle accidents on the private access road / outdoor car park, probably involving engine failures (e.g. overheating during hot summer). The resulting fire is usually small, only affecting a few meters around the car, and could be quickly extinguished using fire extinguishers or by the fire brigade. The key facilities inside LPG Compounds are further protected by concrete building structures (e.g. the LPG vessel compartment). The risk of escalation of external fire to the LPG facilities is deemed negligible and not further considered.

5.4 Failure Frequencies

Fault Tree Analysis (FTA) was performed based on the initiating events as described above. The analysis derived a number of loss of containment scenarios that will lead to the release of LPG to the atmosphere. The failure rates adopted in the Fault Tree are summarized in **Table 7**. The Fault Trees are listed in **Annex D** and the derived frequencies of loss of containment scenarios are summarized in **Table 8** and **Table 9**.

Table 7 Failure Rate and Probabilities Adopted

Item		Failure Rate	Unit	Remark
Spontaneous Failure				
LPG storage vessel failure	Catastrophic	1.8×10^{-7}	per vessel per year	[5]
	Partial	5.0×10^{-6}	per vessel per year	[5]
LPG road tanker failure	Catastrophic	2.0×10^{-6}	per vessel per year	[5]
	Partial	5.0×10^{-6}	per vessel per year	[5]
Pipework failure	Guillotine	1.0×10^{-6}	per metre per year	[5]
Vaporiser failure	Guillotine	1.0×10^{-6}	per metre per year	[5]
Flexible hose failure	Guillotine	9.0×10^{-8}	per hour	[5]
Loading arm failure	Guillotine	9.0×10^{-9}	per hour	[5]
LPG Road Tanker Unloading Failure				
Hose / loading arm misconnection error		3×10^{-5}	per operation	[5]
Hose / loading arm disconnection error		2×10^{-6}	per operation	[5]
Road tanker drive-away		4×10^{-6}	per operation	[5]
Road tanker impact onto LPG installations		1.5×10^{-4}	per operation	[5]
Vehicle impact onto road-tanker		1×10^{-8}	per operation	[5]
Overfilling / over-pressurisation		2×10^{-2}	per operation	[5]
External Event				
Earthquake (above MMI VII)		1×10^{-5}	per year	[5]
Failure of Safety Provision				
Pressure relief valve failure		1×10^{-2}	per demand	[17]
Non-return valve failure		0.013	per demand	[5]
Excess flow valve failure (on vessel)		0.13	per demand	[5]
Excess flow valve failure (on tanker)		0.013	per demand	[5]
Emergency Shutdown (ESD) system fails		1×10^{-4}	per demand	[5]
Tank truck pump overpressure protection system failure		1×10^{-4}	per demand	Assume same as ESD system fails
Breakaway coupling failure		0.013	per demand	[5]
Double-check valve failure		2.6×10^{-3}	per demand	[5]

Item		Failure Rate	Unit	Remark
Human Error				
Fail to close manual valve		0.5	per demand	[5]
Fail to rectify the problem in routine check prior to unloading		0.01	per demand	[13]
Fail to activate ESD system		0.1	per demand	[13]
Fail to rectify the problem (under high stress)		0.3	per demand	[13]
Fire Protection / Fighting System Failure				
Protective fire coating failing to prevent BLEVE		0.1	per demand	[5]
Fire services failing to prevent BLEVE		0.5	per demand	[5]
Failure Probabilities				
Failure of LPG vessel due to overfilling	Catastrophic	0.01		[2][3][4]
	Partial	0.1		[2][3][4]
Failure of road tanker due to vehicle impact	Catastrophic	1×10^{-4}		[2][3][4]
	Partial	1×10^{-3}		[2][3][4]
Guillotine failure of pipework due to road tanker impact		1×10^{-3}		[4]
Guillotine failure of liquid supply vaporiser coil due to overfilling		0.5		[4]
Guillotine failure of pipework due to earthquake		0.01		[14]

Table 8 Failure Frequencies of Scenario Considered for LPG Compound near LMSC Block I

Fault Tree	Hazardous Event (Loss of Containment Scenario)		Base Frequency (per year)	Inven-tory Level	Time Fraction	Factored Frequency (per year)	Inven-tory Level	Time Fraction	Factored Frequency (per year)	Event Tree No.
1	Cold Catastrophic Failure of LPG Vessel *(Spontaneous Failure and External Event)*		1.82E-07	100%	0.2	3.60E-08	60%	0.8	1.44E-07	ETA 1
	Cold Catastrophic Failure of LPG Vessel *(Loading Failure)*			100%	1	2.08E-09	60%	0	0	ETA 1
2	Cold Partial Failure of LPG Vessel *(Spontaneous Failure and External Event)*		5.12E-06	100%	0.2	1.02E-06	60%	0.8	4.08E-06	ETA 2
	Cold Partial Failure of LPG Vessel *(Loading Failure)*			100%	1	2.08E-08	60%	0	0	ETA 2
3	Cold Catastrophic Failure of LPG Road Tanker		2.00E-08	100%	0.2	4.00E-09	50%	0.8	1.60E-08	ETA 1
4	Cold Partial Failure of LPG Road Tanker		5.15E-08	100%	0.2	1.03E-08	50%	0.8	4.12E-08	ETA 2
5a	Guillotine Failure of Vessel Filling Line	Release from Vessel	2.69E-07	100%	0.2	5.38E-08	60%	0.8	2.15E-07	ETA 3
5b		Release from Tanker	2.36E-10	100%	0.2	4.72E-11	50%	0.8	1.89E-10	ETA 3
6	Guillotine Failure of Supply Line to Vaporiser		1.13E-06	100%	0.2	2.27E-07	60%	0.8	9.07E-07	ETA 3
7	Failure of Vaporiser *(Spontaneous Failure and External Event)*		1.98E-06	100%	0.2	3.93E-07	60%	0.8	1.57E-06	ETA 5
	Failure of Vaporiser *(Loading Failure)*			100%	1	1.35E-08	60%	0	0	ETA 5
8a	Guillotine Failure of Flexible Hose	Release from Vessel	3.41E-08	100%	0.2	6.81E-09	60%	0.8	2.72E-08	ETA 3
8b		Release from Tanker	1.31E-06	100%	0.2	2.62E-07	50%	0.8	1.05E-06	ETA 3

Table 9 Failure Frequencies of Scenario Considered for LPG Compound near LMSC Block G

Fault Tree	Hazardous Event (Loss of Containment Scenario)		Base Frequency (per year)	Inven-tory Level	Time Fraction	Factored Frequency (per year)	Inven-tory Level	Time Fraction	Factored Frequency (per year)	Event Tree No.
9	Cold Catastrophic Failure of LPG Vessel *(Spontaneous Failure and External Event)*		1.82E-07	100%	0.2	3.60E-08	60%	0.8	1.44E-07	ETA 1
	Cold Catastrophic Failure of LPG Vessel *(Loading Failure)*			100%	1	2.20E-09	60%	0	0	ETA 1
10	Cold Partial Failure of LPG Vessel *(Spontaneous Failure and External Event)*		5.12E-06	100%	0.2	1.02E-06	60%	0.8	4.08E-06	ETA 2
	Cold Partial Failure of LPG Vessel *(Loading Failure)*			100%	1	2.20E-08	60%	0	0	ETA 2
11	Cold Catastrophic Failure of LPG Road Tanker		2.11E-08	100%	0.2	4.23E-09	50%	0.8	1.69E-08	ETA 1
12	Cold Partial Failure of LPG Road Tanker		5.45E-08	100%	0.2	1.09E-08	50%	0.8	4.36E-08	ETA 2
13a	Guillotine Failure of Vessel Filling Line	Release from Vessel	2.44E-07	100%	0.2	4.88E-08	60%	0.8	1.95E-07	ETA 3
13b		Release from Tanker	1.38E-10	100%	0.2	2.76E-11	50%	0.8	1.10E-10	ETA 3
14	Guillotine Failure of Supply Line to Vaporiser		1.05E-06	100%	0.2	2.11E-07	60%	0.8	8.42E-07	ETA 4
15	Failure of Vaporiser *(Spontaneous Failure and External Event)*		1.98E-06	100%	0.2	3.93E-07	60%	0.8	1.57E-06	ETA 6
	Failure of Vaporiser *(Loading Failure)*			100%	1	1.43E-08	60%	0	0	ETA 6
16a	Guillotine Failure of Loading Arm	Release from Vessel	3.59E-08	100%	0.2	7.18E-09	60%	0.8	2.87E-08	ETA 3
16b		Release from Tanker	1.38E-06	100%	0.2	2.76E-07	50%	0.8	1.11E-06	ETA 3

5.5 Event Tree Analysis

Event tree analysis (ETA) is used to develop the evolution of a failure event from its initial release to the final outcome scenarios, namely, jet fire, flash fire, fireball, etc. It depends on numerous factors such as release type (instantaneous or continuous), ignition sources and probabilities, and degree of congestion. The event tree analysis is outlined in **Annex E**. The event tree adopted for each loss of containment scenario is indicated in **Table 8** and **Table 9**.

SAFETI's built-in event trees are used to calculate the frequencies of hazardous outcome scenarios.

5.5.1 Catastrophic Failure of LPG Storage Vessel / Road Tanker

Large releases are assumed to have a probability of 0.9 for immediate ignition [5]. The immediate ignition of instantaneous LPG release from LPG storage vessel / road tanker will result in a fireball as the content will be instantly released to the ambient. In case of underground vessel in LPG Compound near Block I, the instantaneous release mass from underground is expected to have little effect and is taken as twice the flash fraction.

A delayed ignition may produce a flash fire or vapour cloud explosion (VCE). A past analysis determined that the maximum overpressure obtained from VCE arising from LPG installations on public housing estates in Hong Kong would be too low to contribute significant structural damage to buildings [5]. Hence a delayed ignition is assumed to be resulted in flash fire only.

5.5.2 Partial Failure of LPG Storage Vessel / Road Tanker

A lower probability of 0.05 is adopted for immediate ignition of partial failure (leak) of LPG storage vessel and road tankers [5]. Immediate ignition of a continuous pressurized release results in a jet fire. Delayed ignition of small release is assumed at a probability of 20%, resulting in a flash fire [5].

5.5.3 Failure of Pipework / Vaporiser / Hose / Loading Arm

The probabilities of immediate ignition and delayed ignition of guillotine failure of pipework, vaporiser, hose and loading arm taken as same as that of partial failure of LPG storage vessel and road tanker.

A jet flame from guillotine failure of aboveground installations may impinge on road tanker leading to BLEVE of tanker over a period of time. The probability of flame impingement from outdoor pipework, hose and loading arm is assumed as 0.01. In the LPG Compound near LMSC Block I, vaporisers are in an enclosed room. The chance of flame impingement from vaporiser to tanker in the adjacent unloading bay is reduced and is assumed as 0.0001.

In the LPG Compound near LMSC Block G, supply line to vaporiser and also the vaporisers are separated from the unloading bay by the mounded vessel in between. Jet flame from supply line and vaporisers towards the east will be blocked by the mounded vessel and is considered impossible to reach the road tanker. Besides, the mounded vessel is enclosed in a concrete chamber which offers thermal insulation against BLEVE. Hence,

escalation of flame impingement from supply line and vaporisers in LPG Compound near LMSC Block G is not further considered.

LPG road tankers are protected by a layer of Chartek coating preventing the formation of hot spots. Credit is given to the passive Chartek coating protection and fire-fighting services in the LPG Compound. The probability of coating failure is assigned as 0.1 [5]. Fire services system is assumed to have a chance of 0.5 [5] being ineffective in preventing a BLEVE.

6.0 Consequence Analysis

The consequence assessment estimates impact of each outcome in the area of concern. The consequence assessment consists of two major parts, namely:

- Source term modelling – to determine the appropriate discharge models to be used for calculation of the release rate, duration and quantity of the release; and
- Physical effect modelling – to determine the gas dispersion, fire and explosion effects zone based on the output of source term modelling.

6.1 Source Term Modelling

LPG is modelled as a mixture of 30% propane and 70% butane. LPG stored in a tank is pressurised to medium pressure to reach an equilibrium state between the liquid and vapour phases, depending on the ambient temperature.

Instantaneous release of the inventory is assumed for the cases of catastrophic failure. Partial failure or full bore rupture of pipework will lead to a continuous release, in which, discharge rate is calculated by SAFETI based on the leak size, release temperature, release pressure, and fluid phase. Duration of continuous discharge is determined by discharge rate and total inventory.

6.2 Physical Effect Modelling

6.2.1 Gas Dispersion

LPG vaporises rapidly and forms a vapour cloud upon release. Fire scenarios of different kinds may be developed in the presence of ignition sources in the proximity of an LPG release. If no ignition source exists, the vapour cloud will disperse downwind and will then be diluted to a concentration below its LFL. In this case, the vapour cloud will become too lean to be ignited and will have no harmful effect.

The dispersion characteristics of the vapour cloud are influenced by meteorological conditions and material properties, such as density. The built-in UDM model in DNV SAFETI is used for modelling the dispersion of unignited vapour cloud following an LPG release. The model takes into account various transition phases, from dense cloud dispersion to buoyant passive gas dispersion, in both instantaneous and continuous releases.

6.2.2 Jet Fire

When flammable fluid stored under pressure releases from an orifice, it will lead to a flame jet (i.e. jet fire) if it is ignited immediately. The flame length is determined from the momentum of the release. If a jet fire impinges on another pressurised LPG storage container, thermal intrusion and heat radiation could boil liquid and induce over-pressurisation and subsequent rupture of the container, causing a BLEVE.

6.2.3 Fireball and BLEVE

Immediate ignition of an instantaneous release of massive inventory inside a pressurised vessel will result in a fireball. A fireball is characterised by its high thermal radiation intensity and short duration time. The principal hazard of fireball arises from thermal

radiation, which is not significantly influenced by weather, wind direction or source of ignition.

A BLEVE occurs as fire escalation event upon integrity failure from fire impingement. It has similar characteristics to a fireball and its physical effects are calculated as a fireball.

6.2.4 Flash Fire

An LPG release, if not ignited immediately, would vaporise and form a vapour cloud around the release source. This cloud would move in the downwind direction, entraining air as it disperses and get diluted. If it gets ignited before it is diluted to below its LFL, a flash fire would result. Major hazards from flash fire are thermal radiation and direct flame contact. Since the flash combustion of a gas cloud normally lasts for a short duration, thermal radiation effect on people near a flash fire is limited.

6.2.5 Thermal Radiation

The major hazard of a jet fire, pool fire or fireball is the flame and the thermal radiation. Persons caught in the flame zone are considered be fatally injured. Persons outside the flame zone are determined by lethal probability using the following Probit equation [12]:

$$Pr = -36.38 + 2.56 \ln Q^{4/3t}$$

where Q is the thermal radiation intensity in W/m^2 and t is the exposure time in seconds.

6.2.6 Vapour Cloud Explosion

If the vapour cloud passes through a congested area (e.g. cluster of pipe racks, a confined space) and be ignited, the confinement will limit the expansion of the burning cloud, causing an explosion and damage to the surroundings by the resulting overpressure. In PHAST RISK, the hazardous effects are modelled by two concentric circular areas corresponding to heavy and light building damage, respectively. Fatality rates for persons outdoors and indoors are determined from the TNO Purple Book [12].

6.3 Hazard Impacts on Offsite Population

6.3.1 Worst Consequence Distance

Population in the vicinity of the LPG Compounds can be potentially affected by the hazardous events depending on the consequence distances. The affected distances of different hazardous events are simulated in PHAST RISK and the worst impact distances are summarised in **Table 10**.

Table 10 Summary of Worst Consequence Distances

Hazardous Event	Failure Scenario	Characteristics	Distance (m)
LPG Compound near LMSC Block I			
Fireball	Cold Catastrophic Failure of LPG Vessel	Fireball radius Lift off height	36.8 73.7
BLEVE	BLEVE of LPG Road Tanker	Fireball radius Lift off height	58.2 116.3
Jet fire	Guillotine Failure off Supply Line to Vaporiser	Flame length Thermal Radiation at 12.5kW/m^2 (1)	25.9 38.4
Flash fire	Cold Catastrophic Failure of LPG Road Tanker	Flash fire envelop at 100% LFL	281
	Cold Catastrophic Failure of LPG Vessel	Flash fire envelop at 100% LFL	139
LPG Compound near LMSC Block G			
Fireball	Cold Catastrophic Failure of LPG Vessel	Fireball radius Lift off height	36.8 73.7
BLEVE	BLEVE of LPG Road Tanker	Fireball radius Lift off height	58.2 116.3
Jet fire	Guillotine Failure of Vessel Filling Line	Flame length Thermal Radiation at 12.5kW/m^2 (1)	29.3 43.6
Flash fire	Cold Catastrophic Failure of LPG Road Tanker	Flash fire envelop at 100% LFL	281
	Cold Catastrophic Failure of LPG Vessel	Flash fire envelop at 100% LFL	139

Note:

(1) A level of 12.5 kW/m^2 is selected for reporting purpose. According to DNV/Statoil 2001, exposure to 12.5 kW/m^2 radiation for 20 seconds corresponds to 1% fatality.

The worst consequence of flammable vapour cloud resulting from an instantaneous rupture of an LPG road tanker may drift downwind up to 281 m at high wind speeds though the vapour cloud is very likely to be ignited during its migration across ignition sources such as moving vehicles and various human activities. The LPG vapour cloud can reach up to 40m high in close proximity to the LPG Compounds and gradually decrease when the vapour cloud drift downwind.

6.3.2 Indoor Protection Factor

Buildings are assumed to offer protection to occupants against fire and allow reduction in duration of exposure due to escape action of individual. In an event of flash fire, humans who are outdoor encompassed by the flash fire would be fatally injured. A fatality

rate of unity is assumed for outdoor population, and 90% protection factor is assumed for indoor occupants [5]. In case of fireball event, a protection factor of 50% is assumed for indoor population within fireball radius [5].

6.3.3 Shielding Factor

Shielding factors are assumed to account for protection by the front part of the building or by other buildings from fireball effects [5]. A shielding factor of 0.5 is assigned to those buildings wholly within the fireball diameter and partly inside the fireball diameter, i.e. 117 m of each LPG Compound. Buildings that are outside the fireball or are not in the direct line of sight of the LPG Compound are considered being protected by the buildings in the front.

6.3.4 Height Protection Factor

Population above the cloud height is not exposed to flash fire events. In another term, these population are "protected". The height protection factors to the "protected" population are corresponding to the proportion of building above the top of the cloud [5]. Since the two LPG Compounds are on gentle slopes, the height difference between the two LPG Compounds and the offsite population is considered in the height protection factor.

The height protection factor is used as a discount factor to the population of the area to address those who are not affected by the flashfire. It also applies to the jet fire scenario since the flame length of the jet fire is similar and does not exceed the cloud height of flash fire.

7.0 Risk Assessment

Risk summation combines the likelihood and consequence of hazardous event, as well as meteorological data and population in the hazard effect zones, to give a numerical measure of risks around the Station. The risk analysis is conducted by the simulation software – DNV PHAST SAFETI v7.2 developed by DNV and the outcome results are presented in terms of IR contours and SR (as F-N curves or Potential Loss of Life (PLL)). The risk outcomes are compared to the criteria set out in the risk guidelines, as specified in **Section 1.3.1**.

7.1 Results of LPG Compound near LMSC Block I

7.1.1 Individual Risk Result

The individual risk contours of the LPG Compound near LMSC Block I are presented **Figure 6**. The offsite individual risk is less than 1×10^{-5} per year and satisfies with the criterion stipulated in the HKRG. The individual risk level decreases as the distance increases from LPG Compound and is less than 1×10^{-9} per year at the PH site.

7.1.2 Societal Risk Result

The societal risk results of the LPG Compound near LMSC Block I are presented in the form of F-N curve in **Figure 7** with detailed data presented in **Table 13**. The societal risk levels of the LPG Compound of both base case and operation case fall within the acceptable criteria of the HKRG.

The F-N curves of both cases overlap with each other. This implies that the additional population brought by the Scheme cause negligible changes to the overall risk level of the LPG Compound.

The Potential Loss of Life (PLL) values of the LPG Compound near LMSC Block I for both cases are presented in **Table 11**. With the additional population of the Proposed Development, the PLL value has no change and is 1.34×10^{-5} no. of fatality per year. The major risk contributing event at the Scheme is flashfire arising from LPG Vessel and LPG Road Tanker.

Table 11 PLL of LPG Compound near LMSC Block I

Equipment	Base Case		Operation Case	
	PLL (no. of fatality per year)	% of total PLL	PLL (no. of fatality per year)	% of total PLL
LPG Vessel	9.27E-06	69.3%	9.27E-06	69.3%
LPG Road Tanker	2.17E-06	16.2%	2.17E-06	16.2%
Pipework, Vaporiser, Hose	1.94E-06	14.5%	1.94E-06	14.5%
Total	**1.34E-05**	**100%**	**1.34E-05**	**100%**

7.2 Results of LPG Compound near LMSC Block G

7.2.1 Individual Risk Result

The individual risk contours of the LPG Compound near LMSC Block G are presented **Figure 8**. The offsite individual risk is less than 1×10^{-5} per year and satisfies with the criterion stipulated in the HKRG. The individual risk level is less than 1×10^{-7} per year at the URA site.

7.2.2 Societal Risk Result

The societal risk results of the LPG Compound near LMSC Block G are presented in the form of F-N curve in **Figure 9** with detailed data presented in **Table 13**. The societal risk levels of the LPG Compound of both base case and operation case lie in ALARP region of the HKRG. Mitigation measure(s) is required reduce the risk level as low as reasonably practicable.

The Potential Loss of Life (PLL) values of the LPG Compound near LMSC Block G for both cases are presented in **Table 12**. With the additional population of the Proposed Development, the PLL barely increases by 0.06% from 6.16×10^{-5} no. of fatality per year to 6.17×10^{-5} no. of fatality per year. The major risk contributing event at the Scheme is flashfire arising from LPG Vessel and LPG Road Tanker.

It is worth to note that the preliminary design of the Scheme comprises of the residential towers on a podium with the lowest residential floor above +27mPD at height in the URA site. Residential towers are lifted above vapour cloud released from rupture of LPG vessel. This is a creditable mitigation measure to minimise population exposing to the hazard of LPG Compound near LMSC Block G. As such, the increase to the overall risk level cause by the additional population in the Scheme is reduced to insignificant and the F-N curves of both cases overlap with each other.

Table 12 PLL of LPG Compound near LMSC Block G

Equipment	Base Case		Operation Case	
	PLL (no. of fatality per year)	% of total PLL	PLL (no. of fatality per year)	% of total PLL
LPG Vessel	3.81E-06	61.9%	3.81E-06	61.9%
LPG Road Tanker	8.82E-06	14.3%	8.85E-06	14.3%
Pipework, Vaporiser, Loading Arm	1.47E-05	23.8%	1.47E-05	23.8%
Total	**6.16E-05**	**100%**	**6.17E-05**	**100%**

Table 13 F-N Data

No. of fatality	Frequency (/year)			
	LPG Compound near Block I		LPG Compound near Block G	
	Case 1 – Base Case in 2036	Case 2 – Operation Case in 2036	Case 1 – Base Case in 2036	Case 2 – Operation Case in 2036
1	3.56E-07	3.56E-07	8.79E-07	8.79E-07
2	2.92E-07	2.92E-07	8.00E-07	8.00E-07
3	2.78E-07	2.78E-07	7.62E-07	7.62E-07
4	2.69E-07	2.69E-07	7.33E-07	7.33E-07
5	2.64E-07	2.64E-07	7.18E-07	7.18E-07
6	2.57E-07	2.57E-07	6.96E-07	6.96E-07
8	2.45E-07	2.45E-07	6.28E-07	6.28E-07
10	2.39E-07	2.39E-07	5.87E-07	5.87E-07
12	2.33E-07	2.33E-07	5.56E-07	5.56E-07
15	2.28E-07	2.28E-07	5.26E-07	5.26E-07
20	2.18E-07	2.18E-07	4.65E-07	4.65E-07
25	1.65E-07	1.65E-07	4.18E-07	4.18E-07
30	1.47E-07	1.47E-07	3.85E-07	3.85E-07
40	1.40E-07	1.40E-07	3.56E-07	3.56E-07
50	1.33E-07	1.33E-07	3.27E-07	3.27E-07
60	1.13E-07	1.13E-07	2.98E-07	2.98E-07
80	4.14E-08	4.14E-08	1.79E-07	1.79E-07
90	1.81E-08	1.81E-08	1.71E-07	1.71E-07
100	1.76E-08	1.76E-08	1.57E-07	1.57E-07
120	8.84E-09	8.84E-09	1.52E-07	1.52E-07
150	4.93E-09	4.93E-09	1.46E-07	1.46E-07
200	1.65E-09	1.65E-09	1.10E-07	1.11E-07
250	5.66E-10	5.67E-10	1.04E-07	1.04E-07
300	2.68E-10	2.68E-10	3.29E-08	3.30E-08
400	7.69E-11	7.58E-11	1.33E-08	1.33E-08
500	1.20E-11	1.20E-11	1.03E-08	1.03E-08

No. of fatality	Frequency (/year)			
	LPG Compound near Block I		LPG Compound near Block G	
	Case 1 – Base Case in 2036	Case 2 – Operation Case in 2036	Case 1 – Base Case in 2036	Case 2 – Operation Case in 2036
600	3.49E-12	3.51E-12	1.96E-09	1.96E-09
800	6.24E-14	6.24E-14	1.72E-12	2.47E-12

8.0 Mitigation Measure

The societal risk of the LPG Compound near LMSC Block I is acceptable to the criteria of HKRG while the societal risk of the LPG Compound near LMSC Block G lies within the ALARP region.

The major risk contributor in the Scheme is flash fire arising from failure of vessel in LPG Compound near LMSC Block G. In the preliminary design of the Scheme, a practicable mitigation measure has already been implemented. The residential towers are lifted up on a podium with the lowest residential floor above +27mPD at height such that majority of residents are at height above vapour cloud released from catastrophic failure of LPG vessel. The lower floors of the URA site in the Scheme is designed to be club house, retail and community facilities which have lower population density.

With the mitigation measure implemented, the increase to overall PLL of the LPG Compound near LMSC Block G due to the Scheme is minimised at an insignificant level of 0.06%.

9.0 Conclusion

This QRA has studied the risk impact of the two LPG Compounds at Lok Man Sun Chuen to the Scheme and the surrounding population in future years when the Scheme is completed for population intake.

The results of the study have shown that the individual risks of the two LPG Compounds are in compliance with the HKRG. The individual risk level at the Scheme is less than 1×10^{-9} per year for risk posed by the LPG Compound near LMSC Block I in the south and less than 1×10^{-7} per year for risk posed by the LPG Compound near LMSC Block G in the north west.

With the development of the Scheme, the societal risks of the LPG Compound near LMSC Block I is acceptable, no mitigation measure is required in the PH site. Whilst the societal risks of LPG Compound near LMSC Block G lies in ALARP of the HKRG. Risk mitigation measure has been implemented in the design of the Scheme as follow:

- Lift up residential towers on podium with the lowest residential floor above +27mPD at height

With such measure, majority of residents in URA site are at height above vapour cloud released from failure of LPG vessel in LPG Compound. The increase to the overall risk level of LPG Compound near LMSC Block G induced by the Scheme is minimised. The PLL values of the two LPG Compounds near LMSC Block I and Block G have merely increased by 0% and 0.06%, respectively.

10.0 References

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Figures

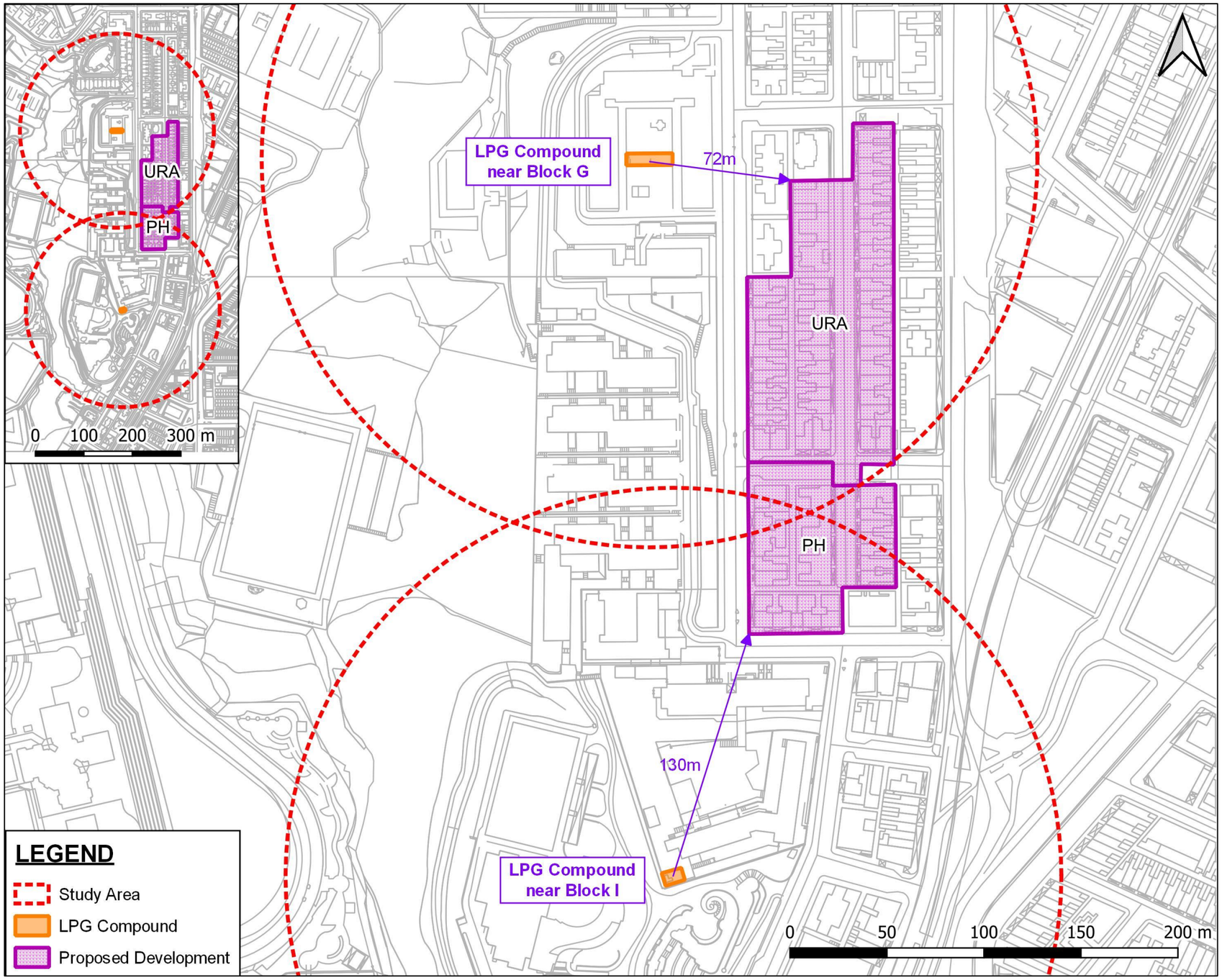


Figure 1 **Location of the Project Site and Study Area**

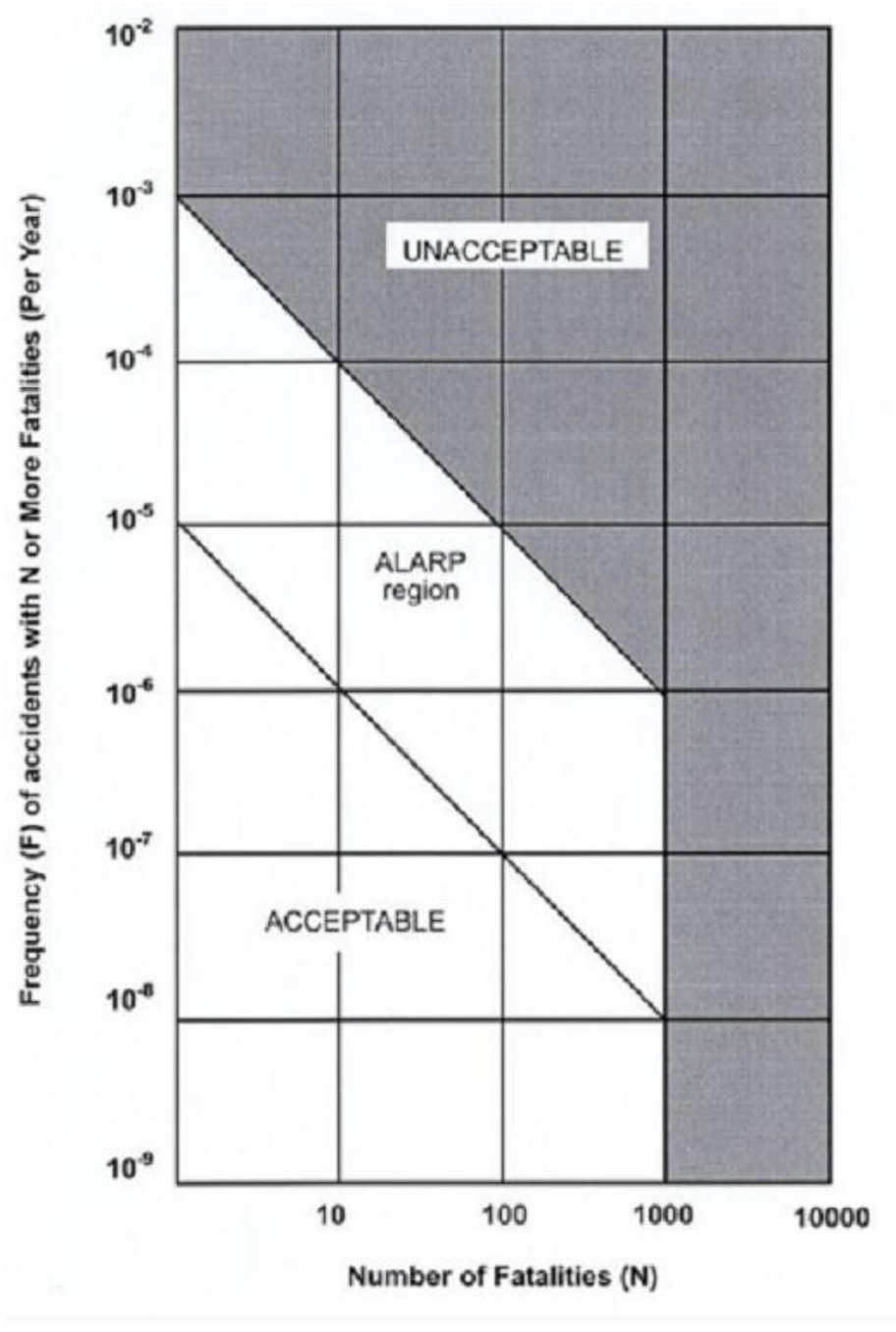


Figure 2 **Societal Risk Guidelines from Hong Kong Planning Standards and Guidelines**

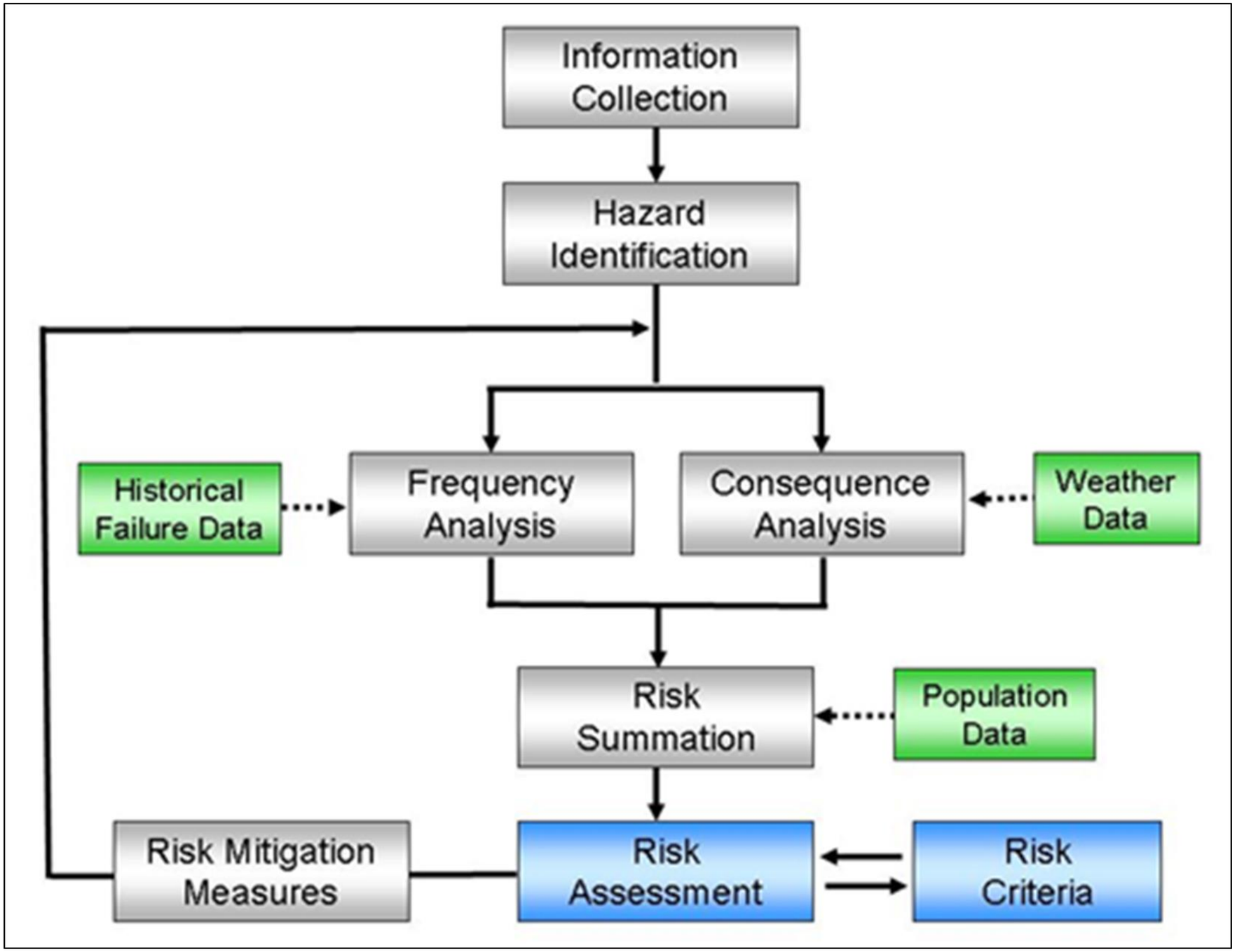


Figure 3 **Quantitative Risk Assessment Methodology**

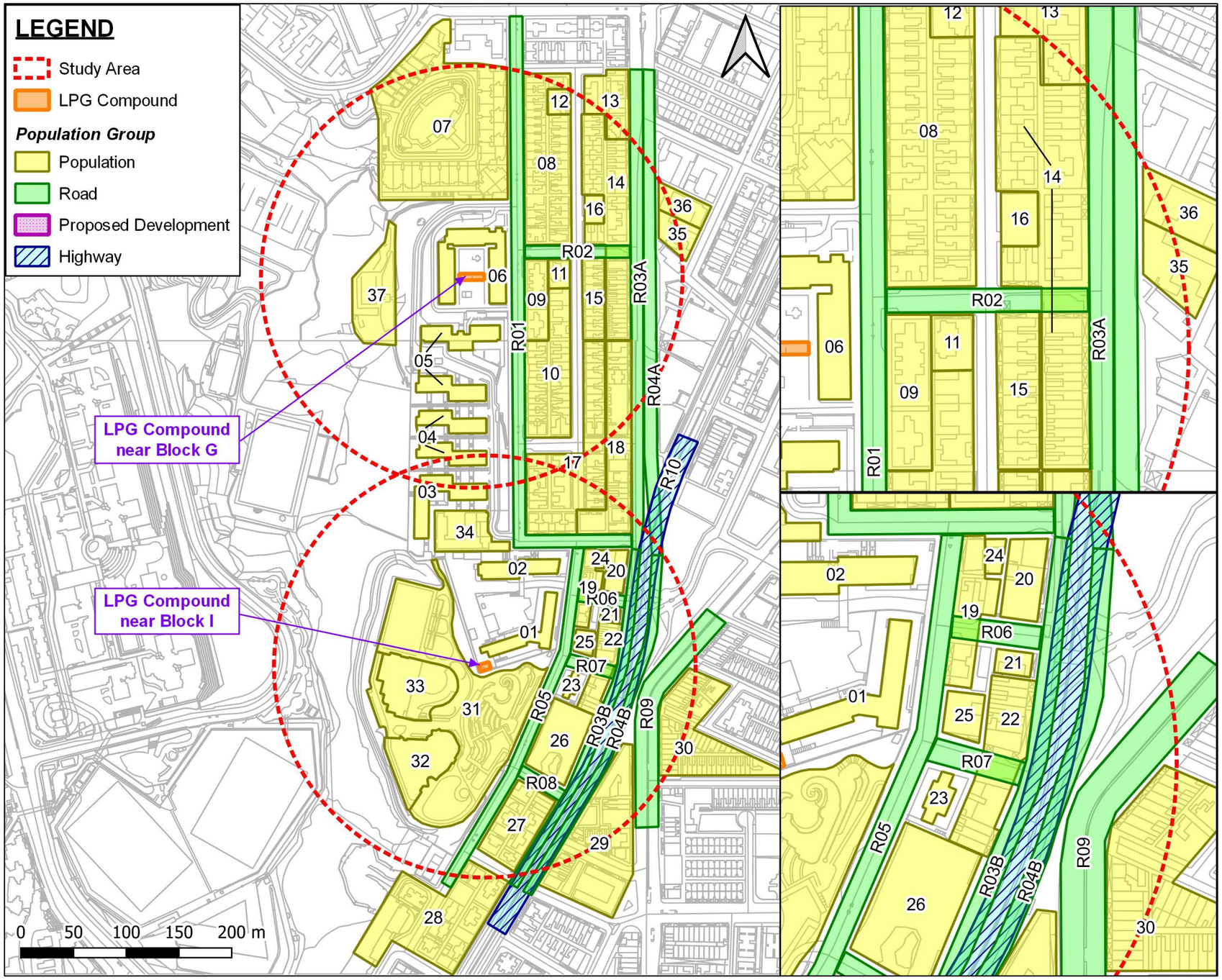


Figure 4 **Population Considered in Base Case**

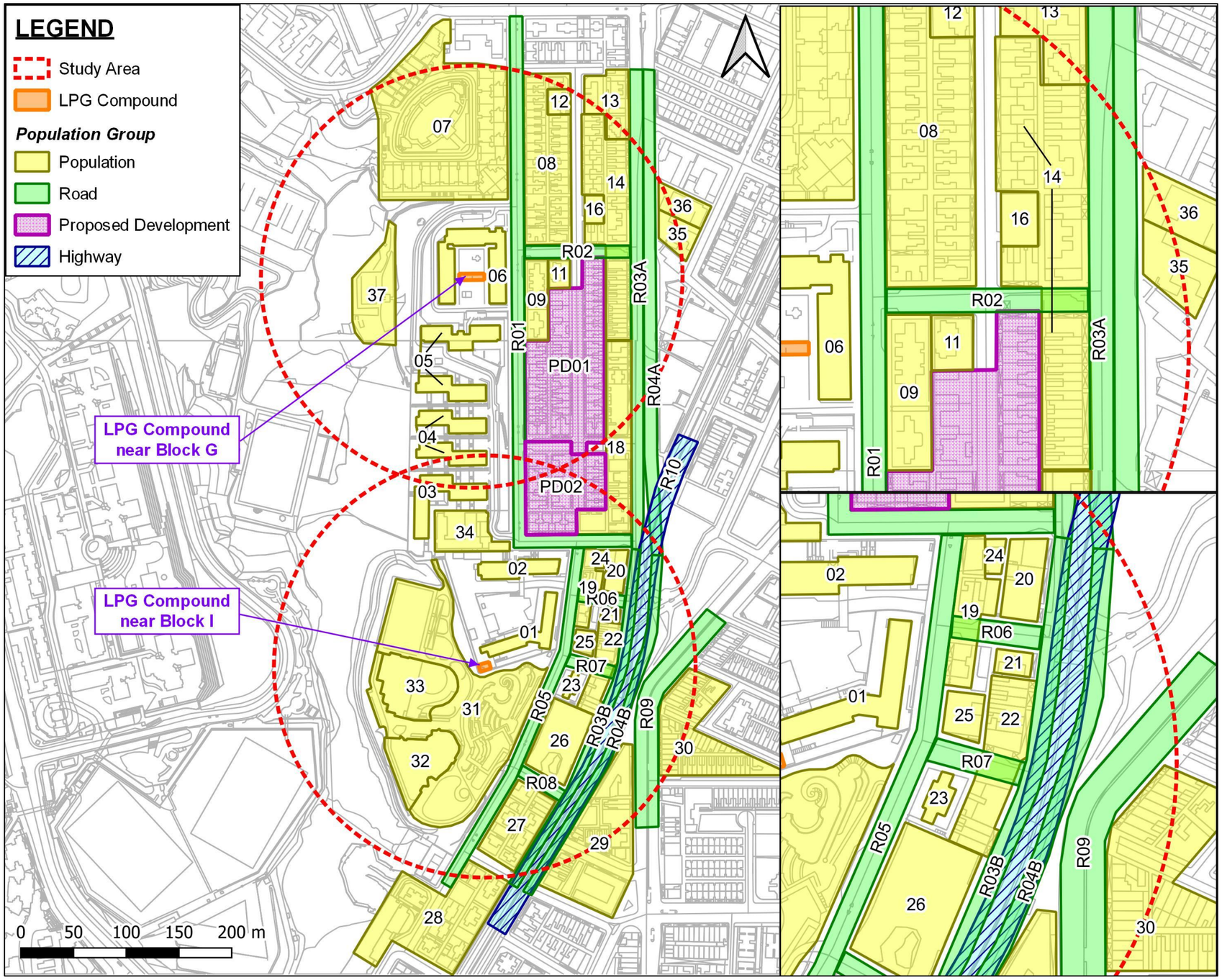


Figure 5 **Population Considered in Operation Case**

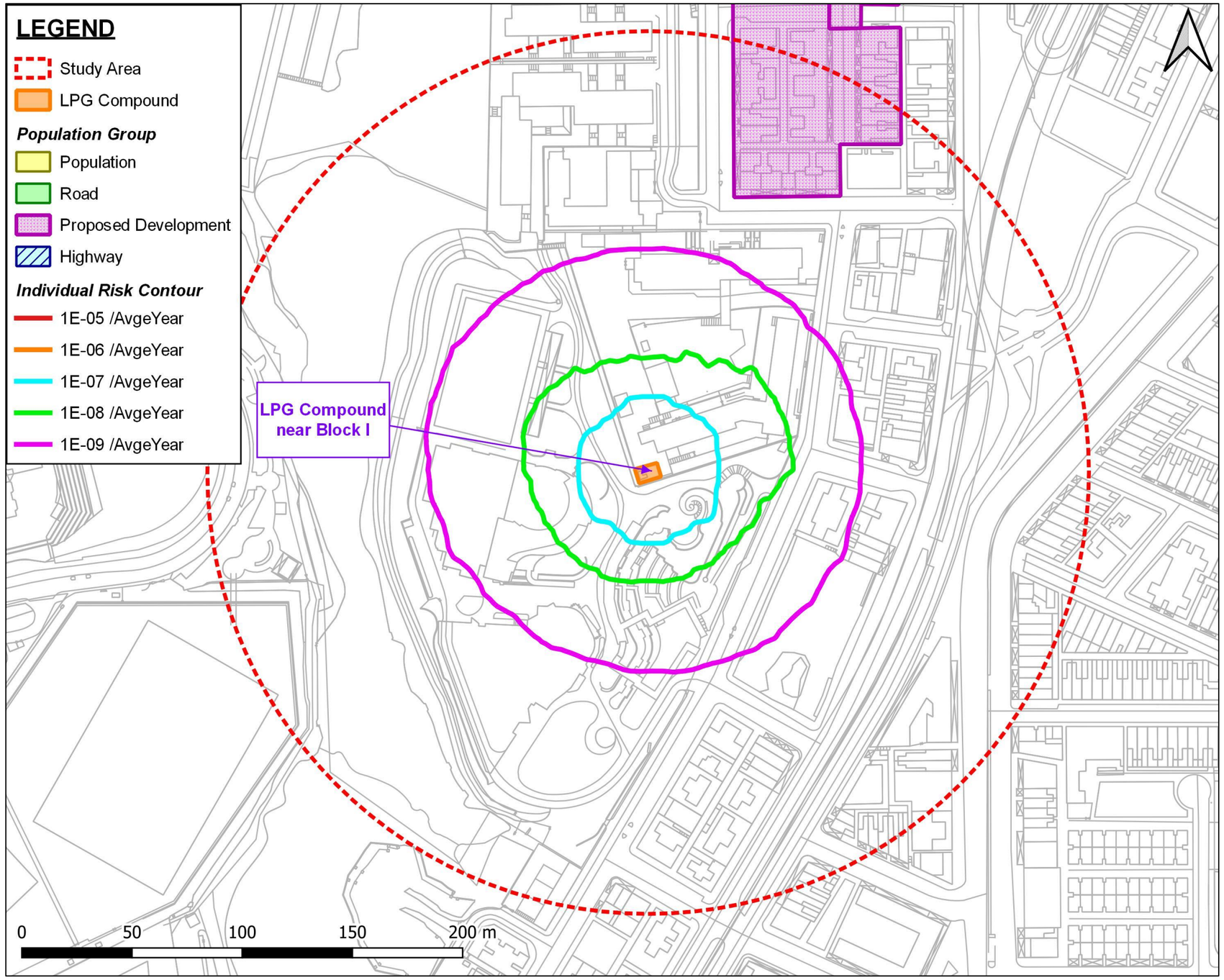


Figure 6 **Individual Risk Contours of LPG Compound near LMSC Block I**

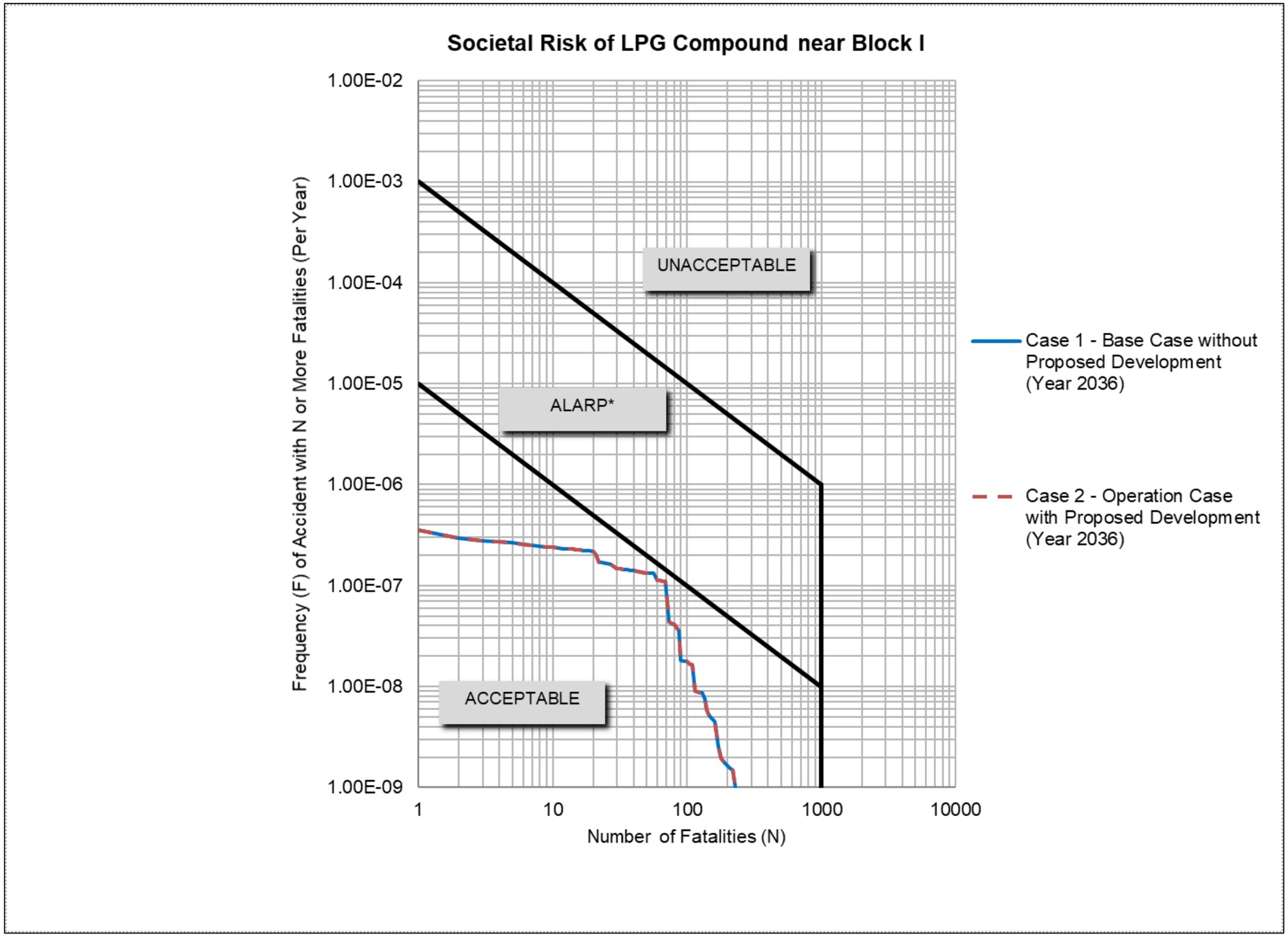


Figure 7 **Societal Risk Result of LPG Compound near LMSC Block I**

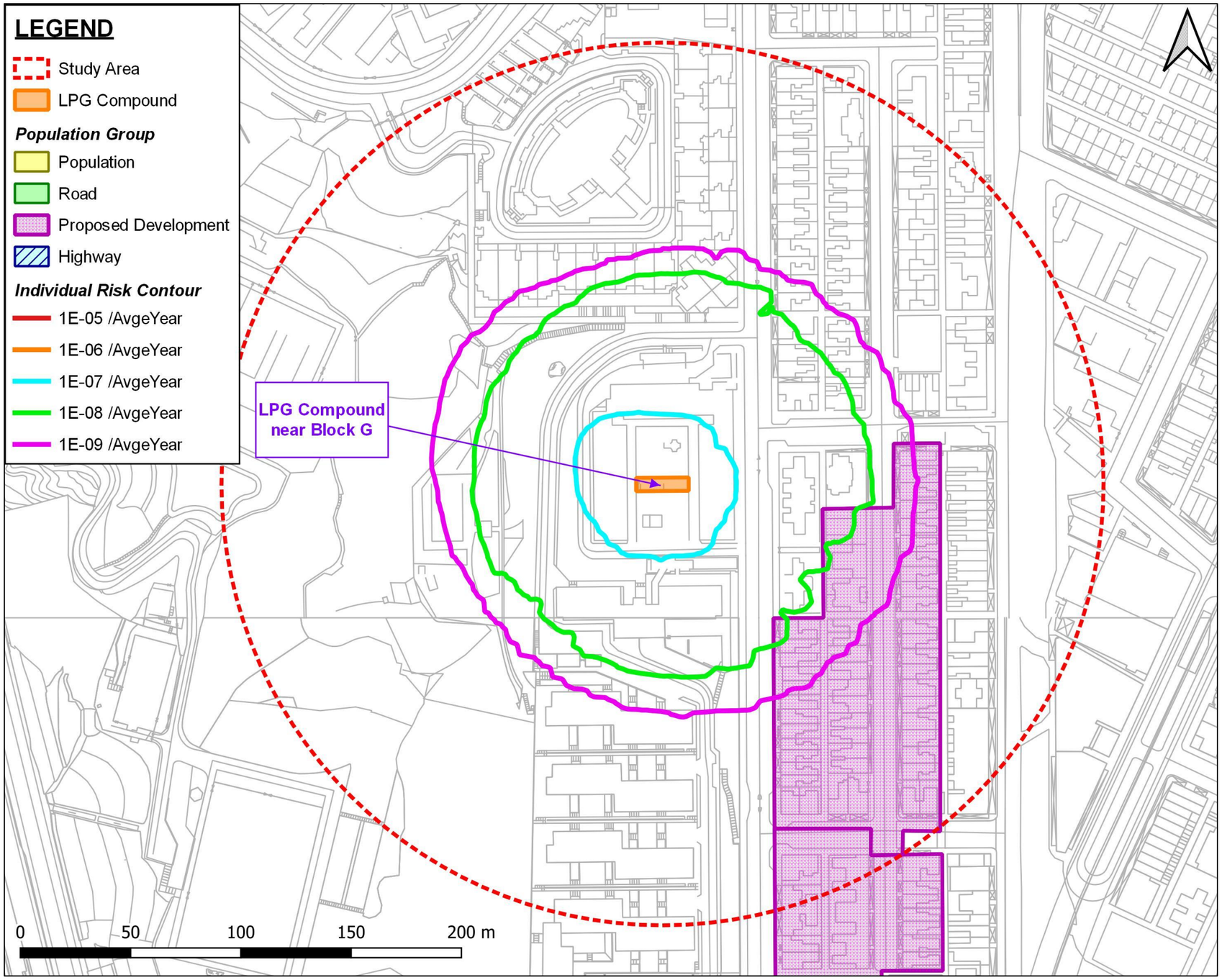


Figure 8 **Individual Risk Contours of LPG Compound near LMSC Block G**

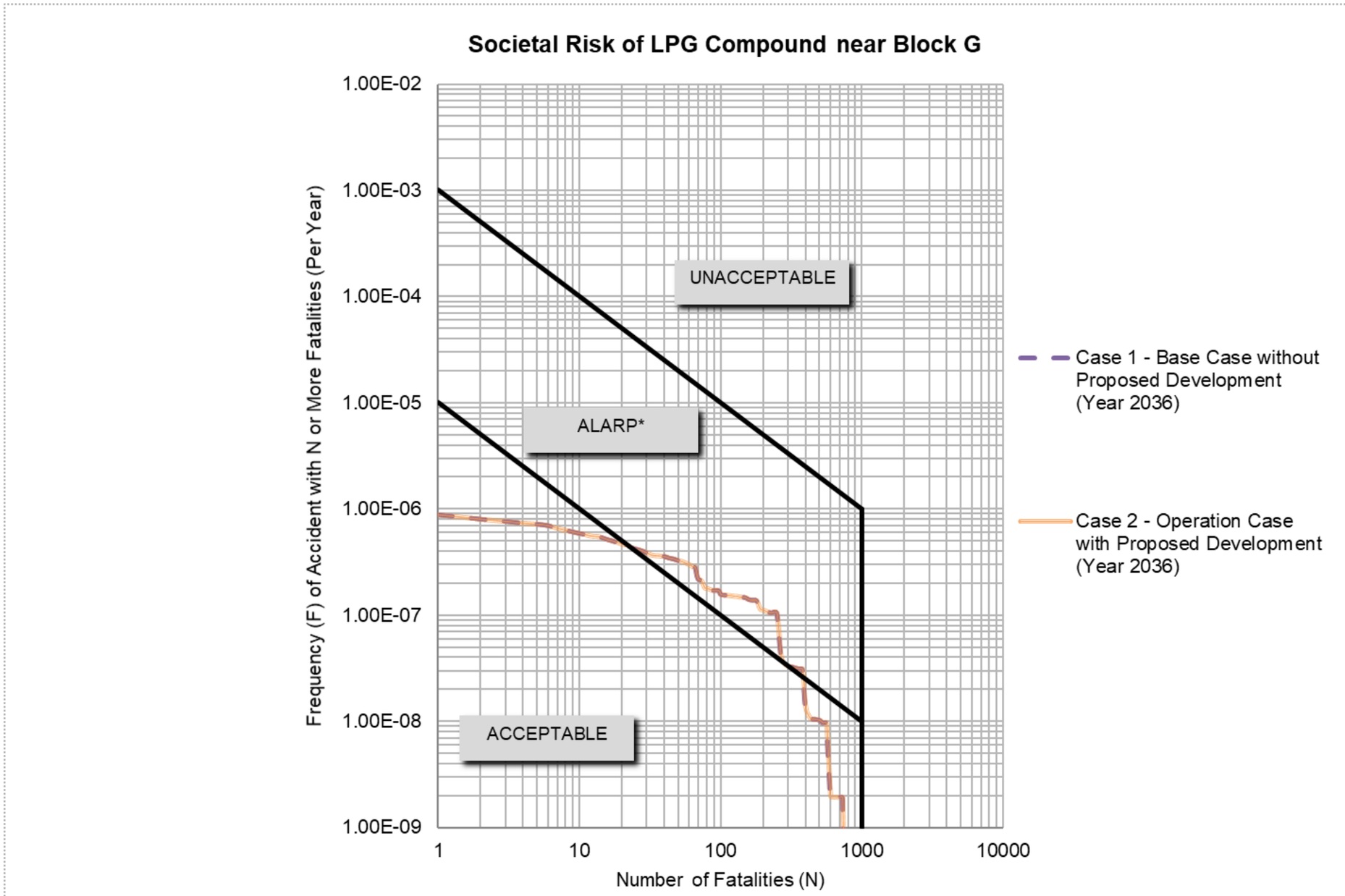


Figure 9 **Societal Risk Result of LPG Compound near LMSC Block G**

Annex A:
Details of LPG Installations

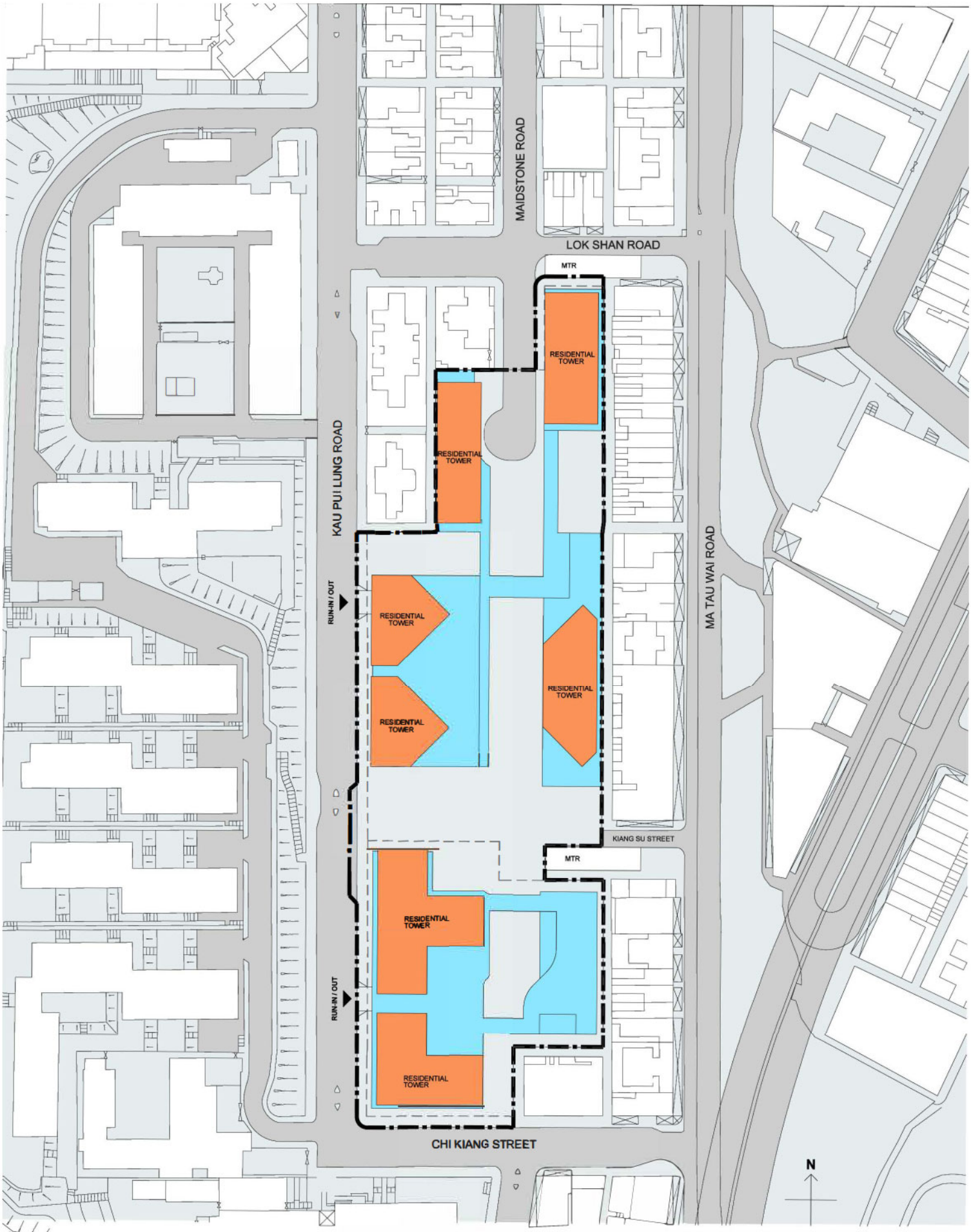
A1. Information of LPG Compound at Block I

Description	Value	Units
Vessel		
Number of Vessels	1	
Size of Vessel	3.50	te
Radiography Vessel	100	%
Stress Relief Vessel	100	%
Mounded or Below Ground? (M/B)	B	
Safety Devices	Relief valve	
Road Tanker		
Average size of road tankers	19	kL
Delivery Frequency	208	per year
Time required for unloading	10 – 20	min
Road Tanker Resident Time	25	min
Pumping rate	160	L/min
Safety Devices	Manual Isolation, ESD, EFV /Relief valve	
Filling Line to Vessel		
Line Length (from flexible hose to vessel)	5	m
Line Diameter	25	mm
Safety Devices	Double check valve, Relief valve, Pull away coupling, Manual Isolation	
Supply Line to Vaporiser		
Line Length	5.5	m
Line Diameter	40	mm
Safety Devices	Manual Isolation, ESD, EFV	
Vaporiser		
Number of Vaporisers	3	
Size of Vaporiser	200	Kg/h
Coil Length	5	m
Coil Diameter	25	mm
Flexible Hose		
Hose length	45.7	m
Hose Diameter	25	mm

A2. Information of LPG Compound at Block G

Description	Value	Units
Vessel		
Number of Vessels	1	
Size of Vessel	3.50	te
Radiography Vessel	100	%
Stress Relief Vessel	100	%
Mounded or Below Ground? (M/B)	M	
Safety Devices	Relief valve	
Road Tanker		
Average size of road tankers	19	kL
Delivery Frequency	220	per year
Road Tanker Resident Time	25	min
Pumping rate	160	L/min
Safety Devices	Manual Isolation, ESD, EFV /Relief valve	
Filling Line to Vessel		
Line Length (from loading arm to vessel)	17	m
Line Diameter	50	mm
Safety Devices	NRV, Double check valve, Relief valve, Pull away coupling, Manual Isolation	
Supply Line to Vaporiser		
Line Length	8	m
Line Diameter	40	mm
Safety Devices	Manual Isolation, ESD, EFV	
Vaporiser		
Number of Vaporisers	3	
Size of Vaporiser	200	Kg/h
Coil Length	5	m
Coil Diameter	25	mm
Loading Arm		
Loading Arm Length	2	m
Loading Arm Diameter	32	mm

Annex B:
Layout Plan of the Scheme



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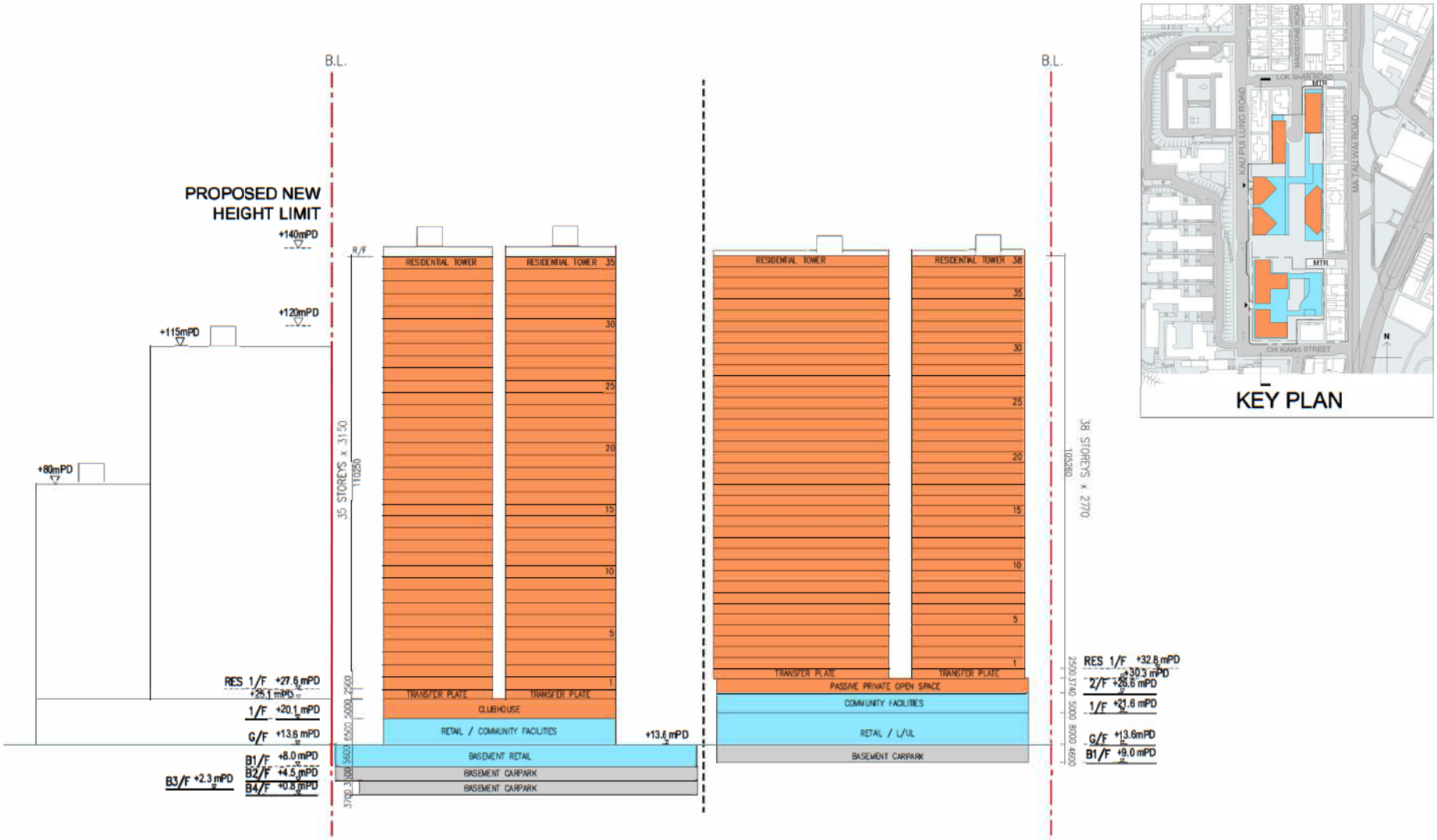
Ho & Partners Architects

KNT1907		
NAME	SIGN	DATE
		22/11/19

AND-A-01
NOTIONAL DESIGN - 140mPD BLOCK PLAN
1:1500@A4
Appendix 1.1 - Figure 01

Note: Subject to detail design



SECTION AA'

Note: Subject to detail design

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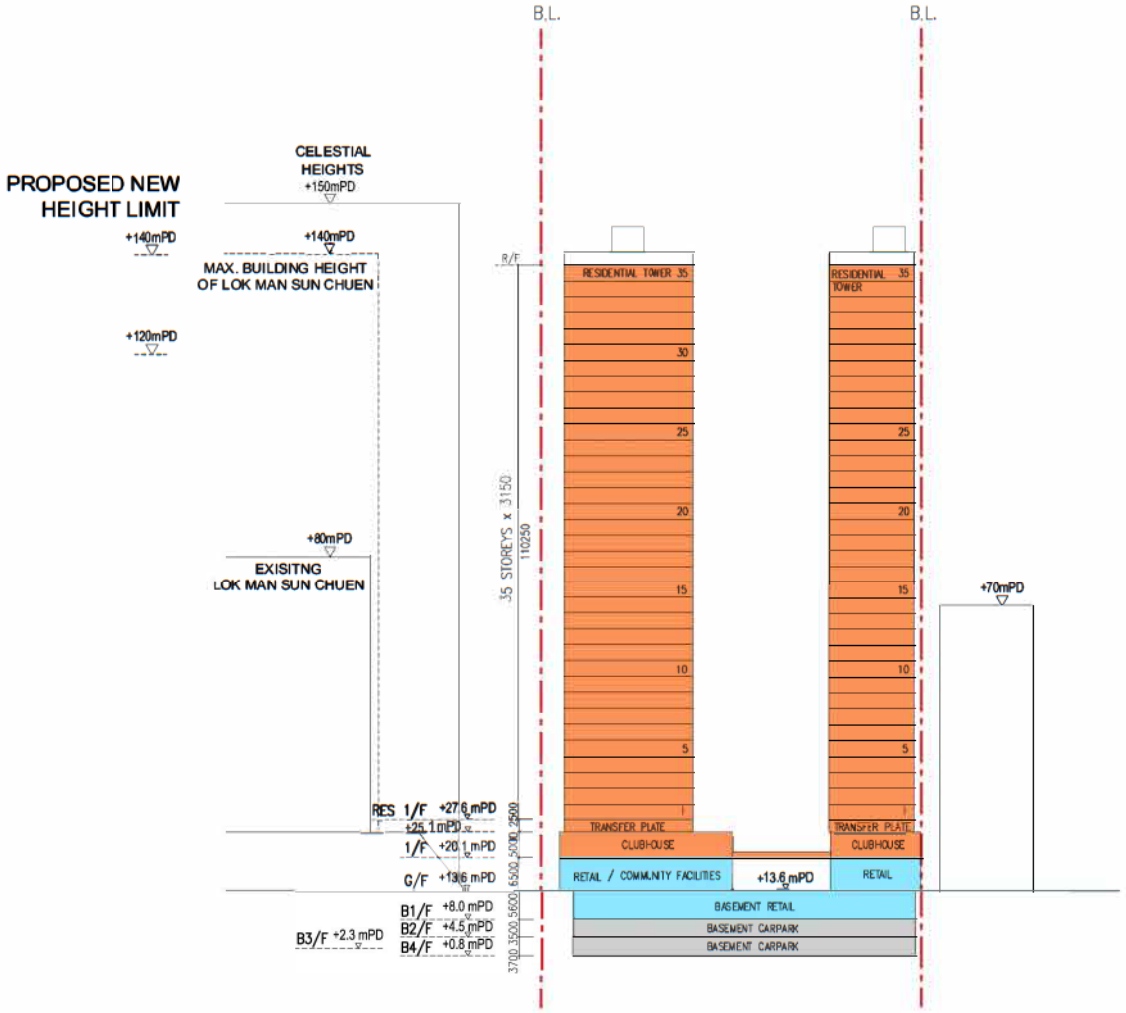
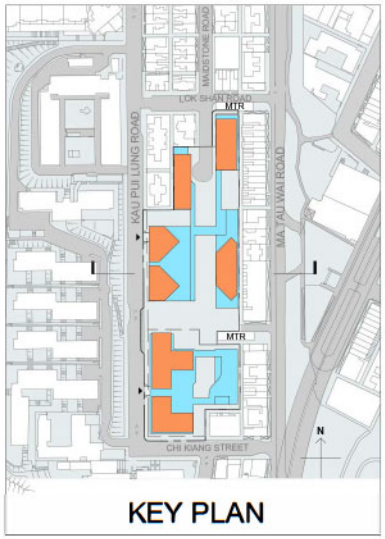
		22/11/19

ASK-A-06
140mPD SECTION 1:1500@A4

Appendix 1.1 - Figure 02



SECTION BB'



KEY PLAN

Note: Subject to detail design

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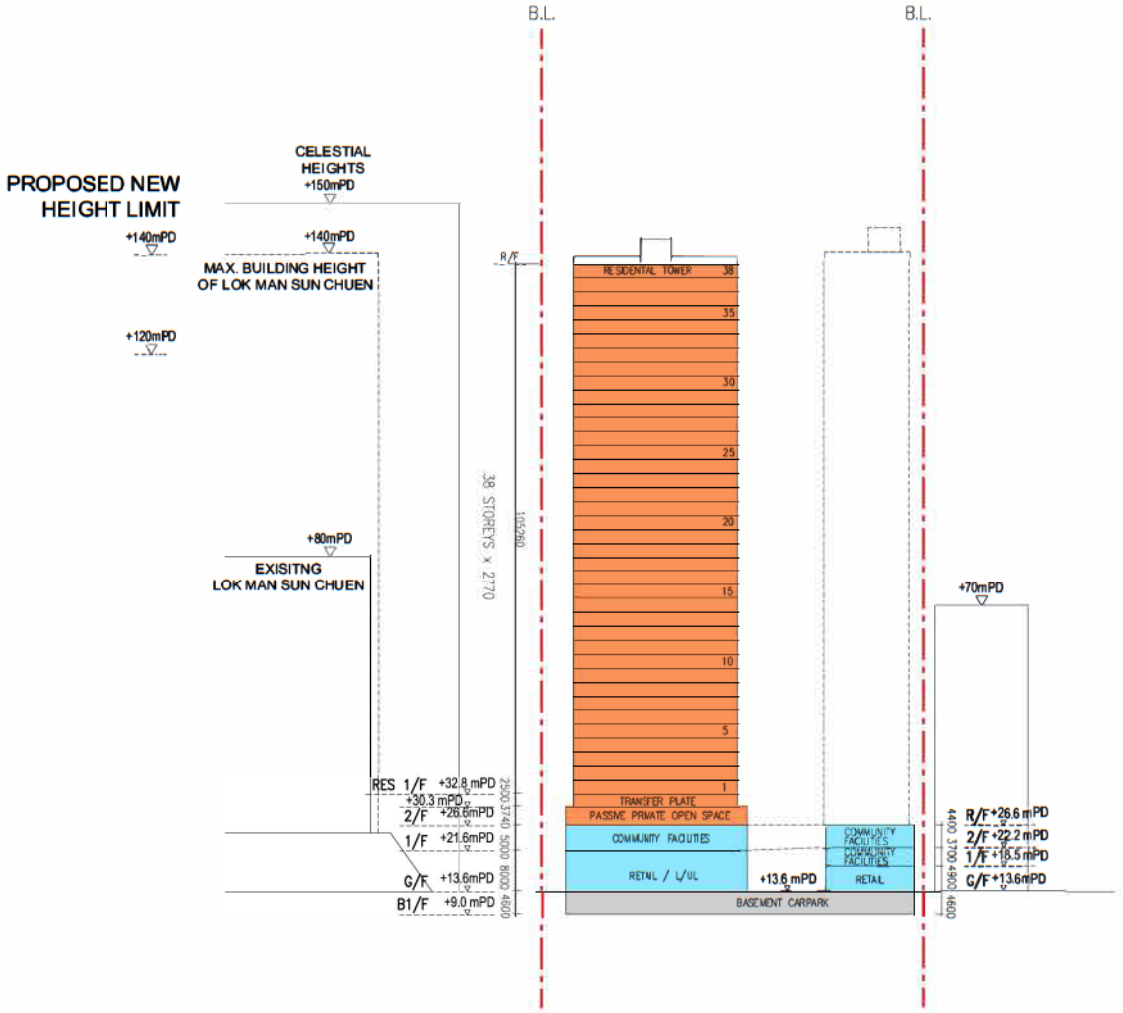
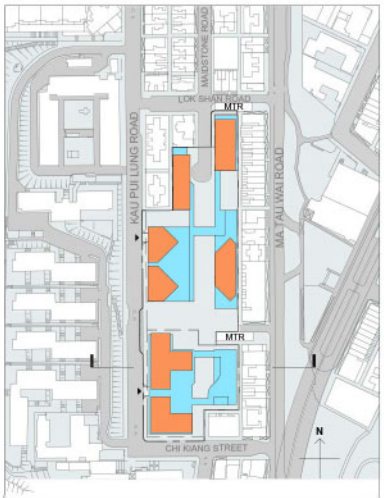
		22/11/19

ASK-A-07
140mPD SECTION 1:1500@A4

Appendix 1.1 - Figure 03





KEY PLAN

SECTION CC'

Note: Subject to detail design

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KNT1907		
NAME	SIGN	DATE
		22/11/19

ASK-A-08
140mPD SECTION 1:1500@A4

Appendix 1.1 - Figure 04

Annex C:
Calculation of Transient Population

C1. Estimation of Average Occupancy per Vehicle

The average occupancies of vehicles on roads concerned are estimated from statistics of nearby traffic stations in Annual Traffic Census 2018.

Station No.	3014		4212		4212 (no DD Fr. Bus)		4213	
Vehicle Type	Pro	Ocp	Pro	Ocp	Pro	Ocp	Pro	Ocp
Motor Cycle	2.7	1.0	3.9	1.1	3.9	1.1	4	1.1
Private Car	27.3	1.4	32.3	1.4	32.3	1.4	40.7	1.3
Taxi	25	1.7	22.6	1.9	22.6	1.9	26.6	2.1
Private Light Bus	1.3	1.4	1	4.3	1	4.3	1.1	2.9
Public Light Bus	8.7	8.5	5.7	9.1	5.7	9.1	0.3	7.6
Light Goods Vehicle	15.6	1.5	16.3	1.5	16.3	1.5	17	1.3
M&H Goods Vehicle	2.4	1.5	1.4	1.5	1.4	1.5	4.9	1.2
Non Fr. Bus	2.1	9.6	4.9	18.1	4.9	18.1	2.8	14.0
SD Fr. Bus	0.1	1.0	0.1	1.0	0.1	1.0	0.1	1.0
DD Fr. Bus	14.8	19.0	11.9	31.7			2.6	30.6
Average Occupancy	4.9		6.4		3.0		2.7	

Note:

(1) *Average occupancy* $= \sum(Probability_i \times Occupancy_i)/\sum Probability_i$

C2. Forecasted Traffic Flow from TNIA of the Scheme

The traffic forecast for TNIA of the Scheme is adopted as follows:

ID	Road	Index No.	Morning Peak Hour Traffic (veh/hr)	Evening Peak Hour Traffic (veh/hr)
R01	Kau Pui Lung Road	5	725	850
R02	Lok Shan Road	6	305	425
R03A	Ma Tau Wai Road (NB)	16	505	430
R03B	Ma Tau Wai Road (NB)	18	1105	1015
R04A	Ma Tau Wai Road (SB)	17	1610	1440
R04B	Ma Tau Wai Road (SB)	19	1035	990
R05	Ko Shan Road	8	675	630
R06	Anhui Street	9	15	30
R07	Kiang Hsi Street	10	20	15
R08	Shan Si Street	11	205	135
R09	To Kwa Wan Road	34 & 35	1735	1510
R10	East Kowloon Corridor	38 & 39	5350	5500

C3. Traffic Variation within the Day

The traffic flow variation on all roads within study area is assumed to be same as that on Chatham Road and Ma Tau Wai Road (from San Lau Street to Chi Kiang Street).

Station No.	Road	Ratio of Day-time and Night-time Traffic Flow		Ratio to WDD Traffic Flow	
		Day	Night	Day	Night
4212	Chatham Road and Ma Tau Wai Road (from San Lau Street to Chi Kiang Street)	63%	37%	100%	58%

C4. Calculation of Transient Population

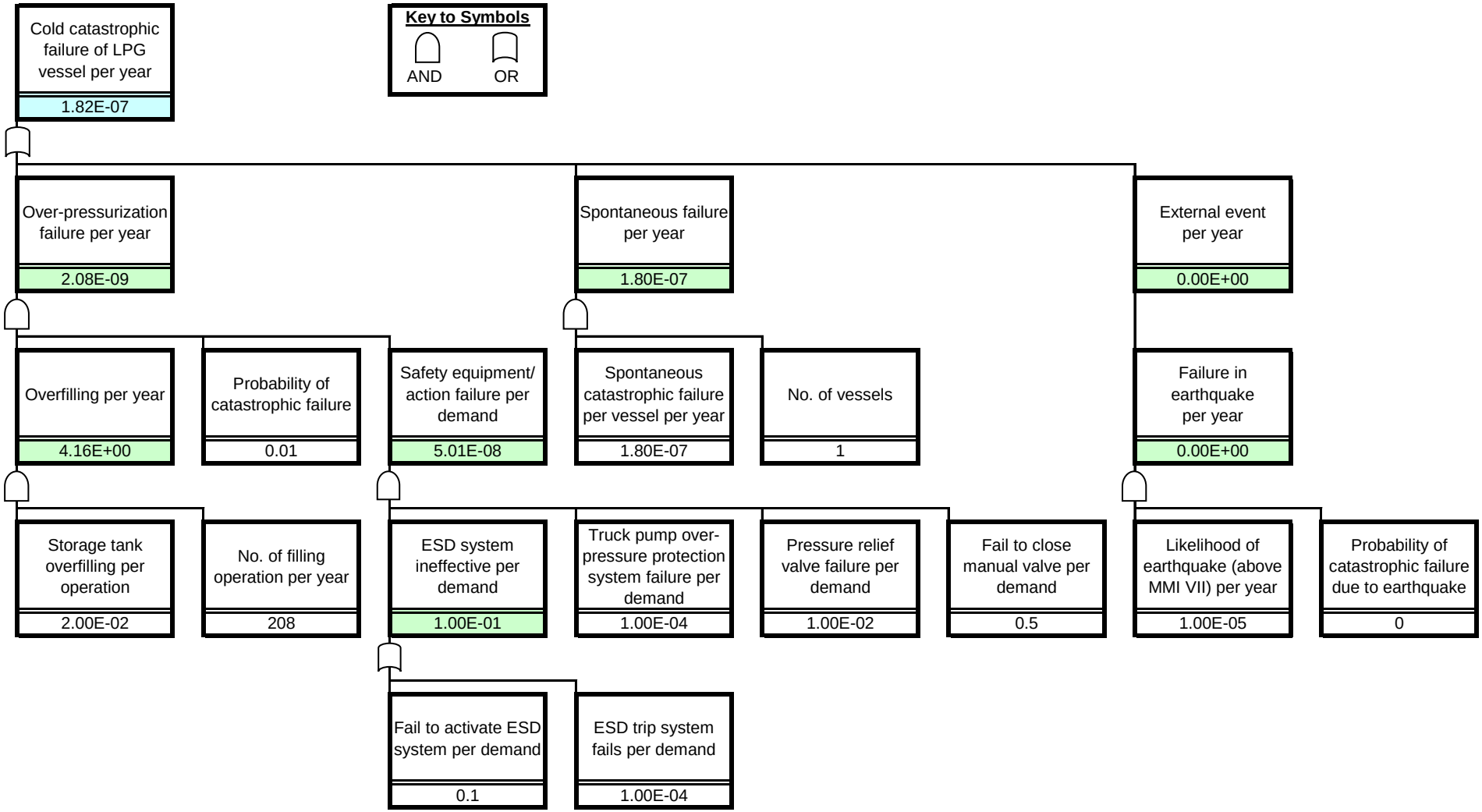
ID	Road Name	Average Occu-pancy	Speed (km/hr)	Road Length (m)	Daytime Traffic Popula-tion	Pedes-trian	Daytime Popula-tion
R01	Kau Pui Lung Road	3.0	50	600	27	80	107
R02	Lok Shan Road	3.0	50	100	2	20	22
R03A	Ma Tau Wai Rd (NB)	6.4	50	450	30	40	70
R03B	Ma Tau Wai Rd (NB)	6.4	50	340	49	20	69
R04A	Ma Tau Wai Rd (SB)	6.4	50	460	95	30	125
R04B	Ma Tau Wai Rd (SB)	6.4	50	350	47	20	67
R05	Ko Shan Road	3.0	50	350	15	30	45
R06	Anhui Street	3.0	50	50	1	5	6
R07	Kiang Hsi Street	3.0	50	50	1	5	6
R08	Shan Si Street	3.0	50	50	1	5	6
R09	To Kwa Wan Road	4.9	50	220	38	50	88
R10	East Kowloon Corridor	2.7	70	500	102	0	102

Note:

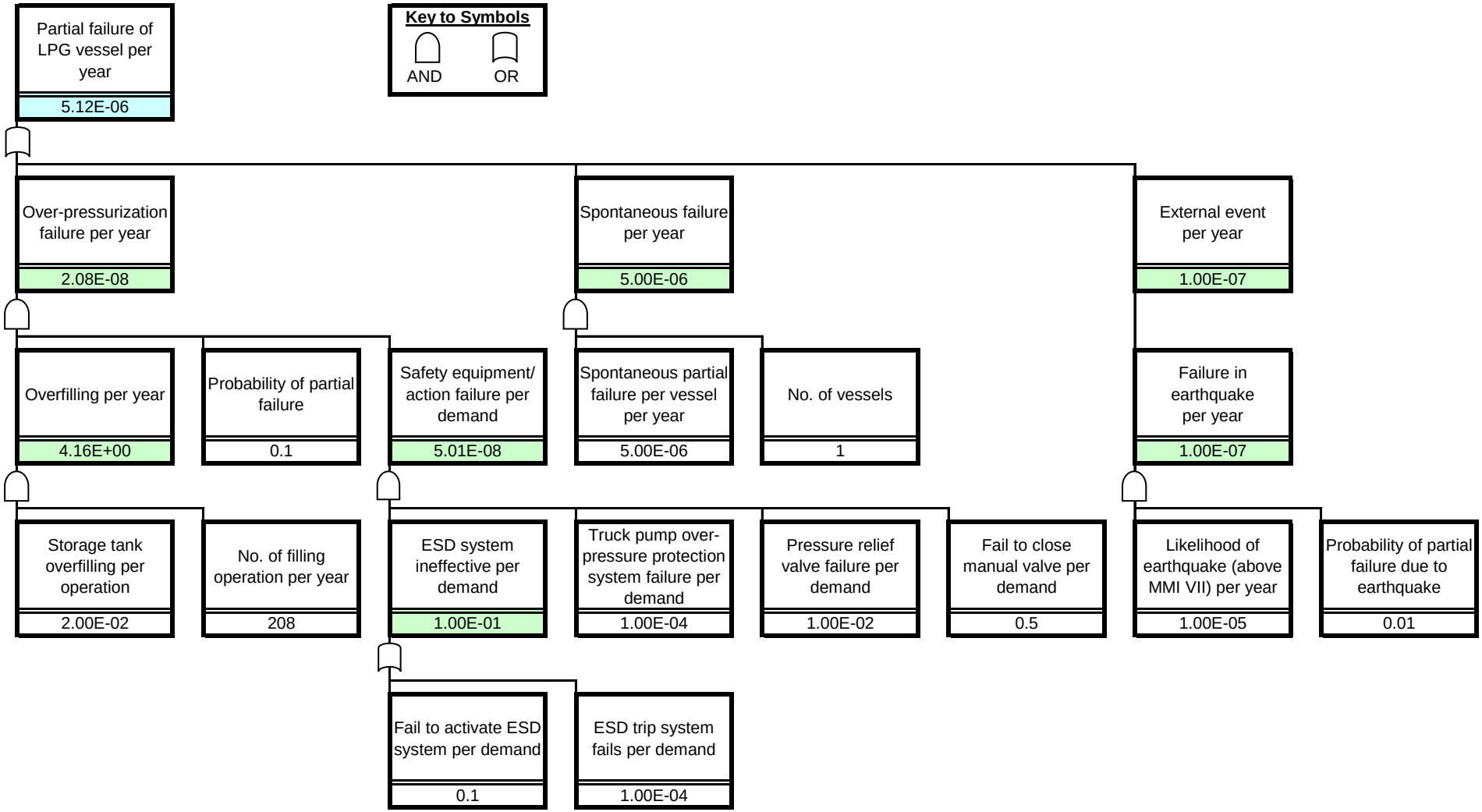
(1) Daytime Traffic Population = Morning Peak Hour Traffic × Average Occupancy × Road Length / Speed

Annex D:
Fault Tree Analysis

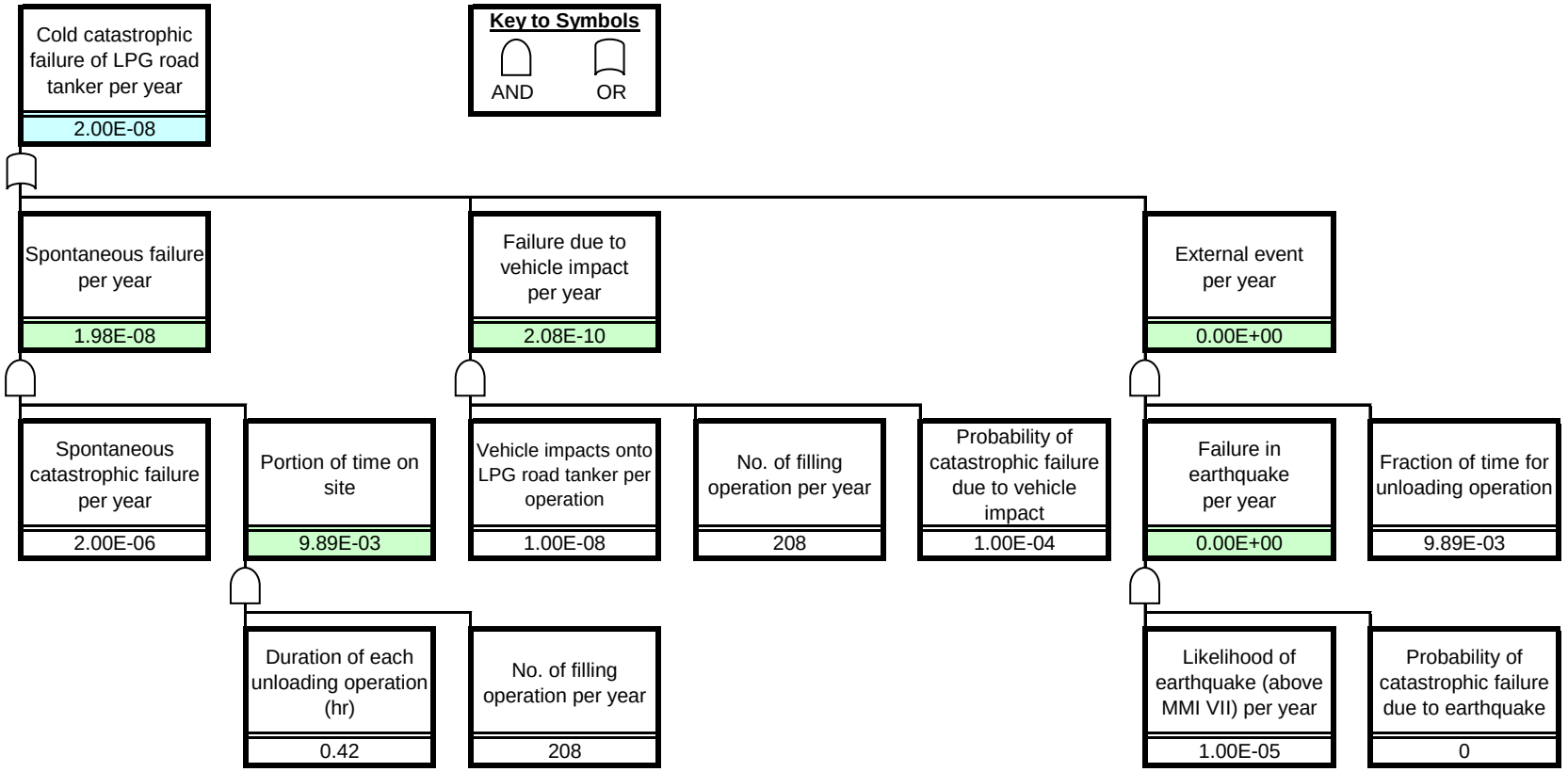
Fault Tree 1 - **Cold Catastrophic Failure of LPG Vessel (LPG Compound near Block I)**



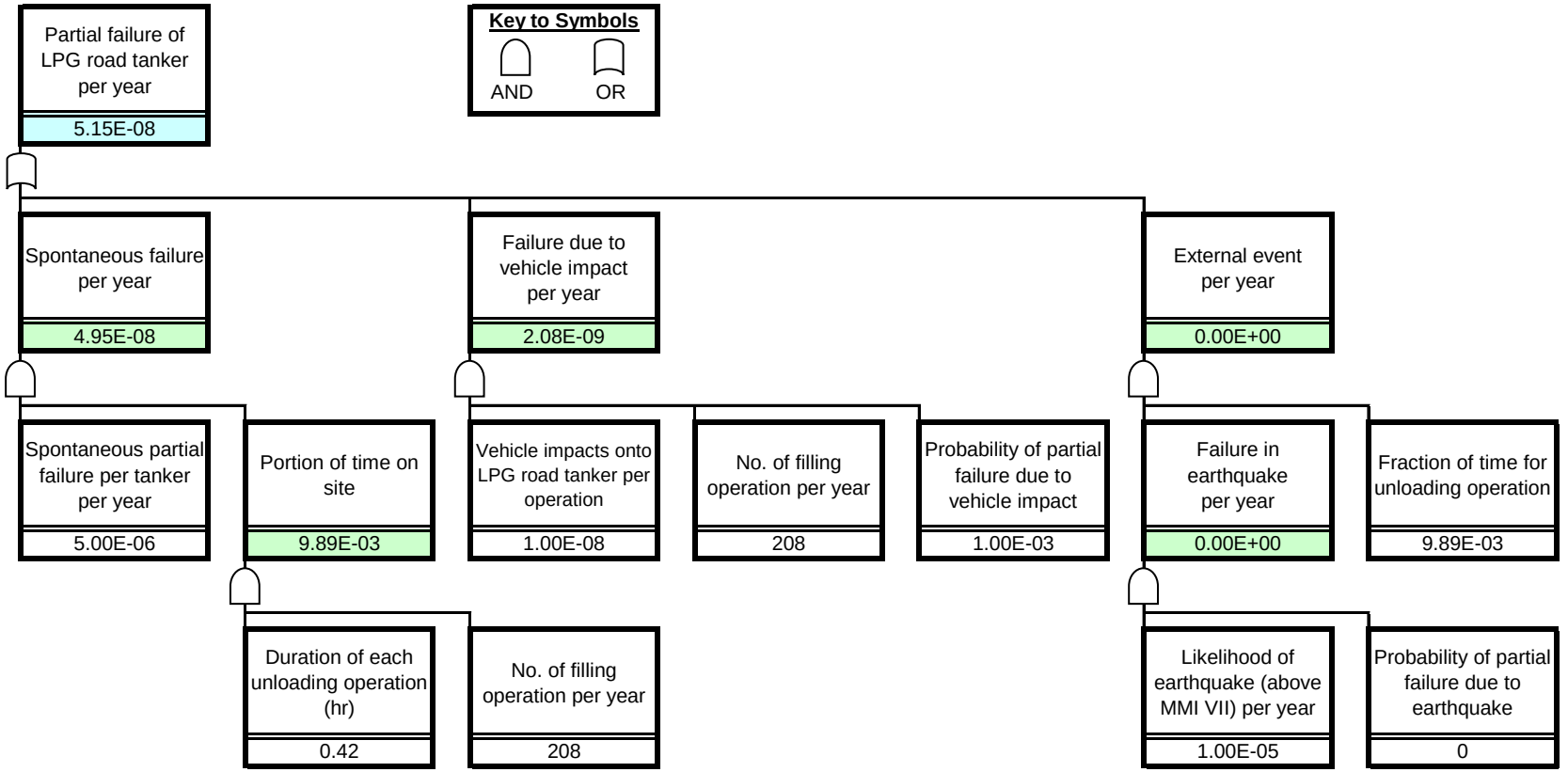
Fault Tree 2 - **Cold Partial Failure of LPG Vessel (LPG Compound near Block I)**



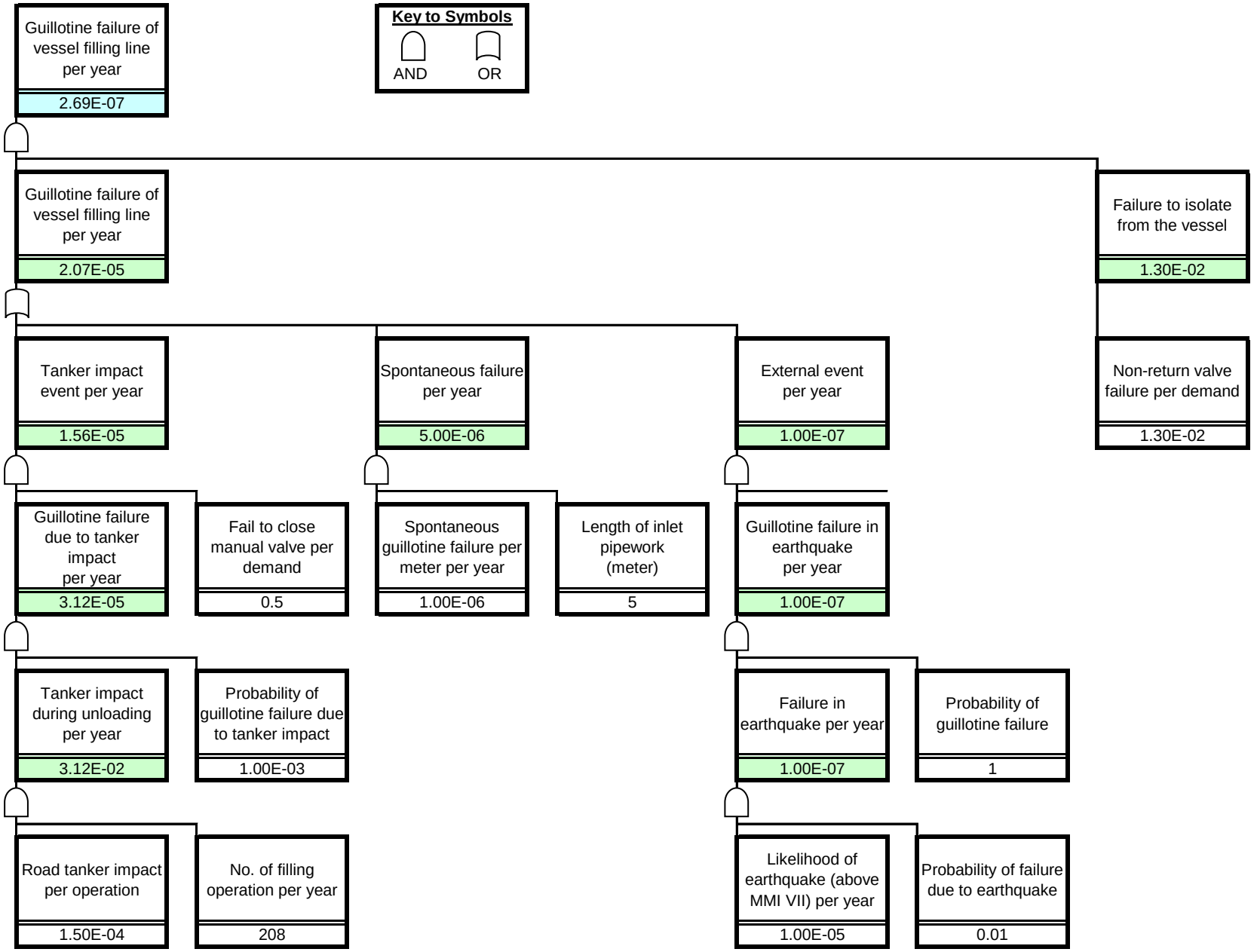
Fault Tree 3 - **Cold Catastrophic Failure of LPG Road Tanker (LPG Compound near Block I)**



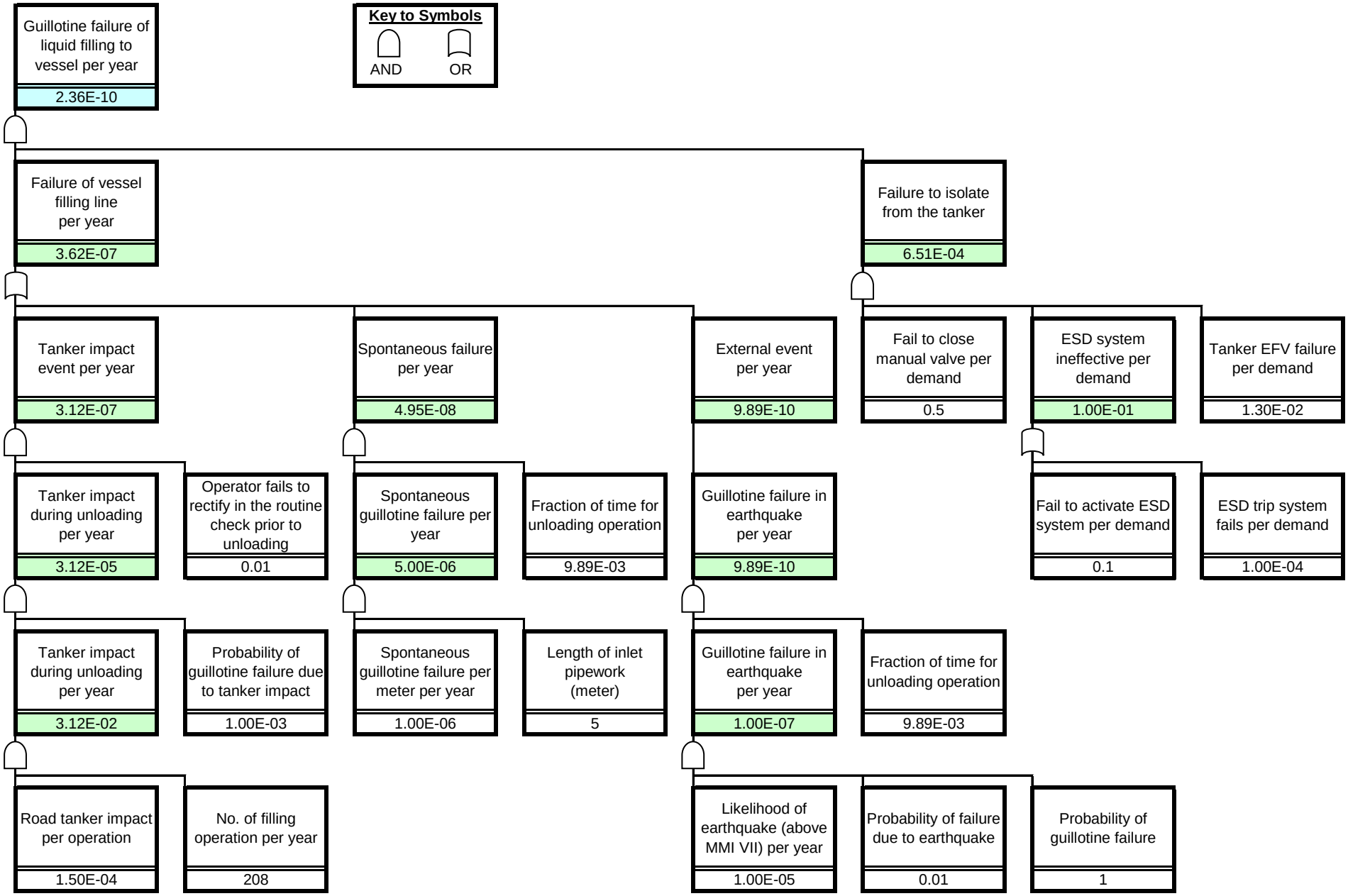
Fault Tree 4 - **Cold Partial Failure of LPG Road Tanker (LPG Compound near Block I)**



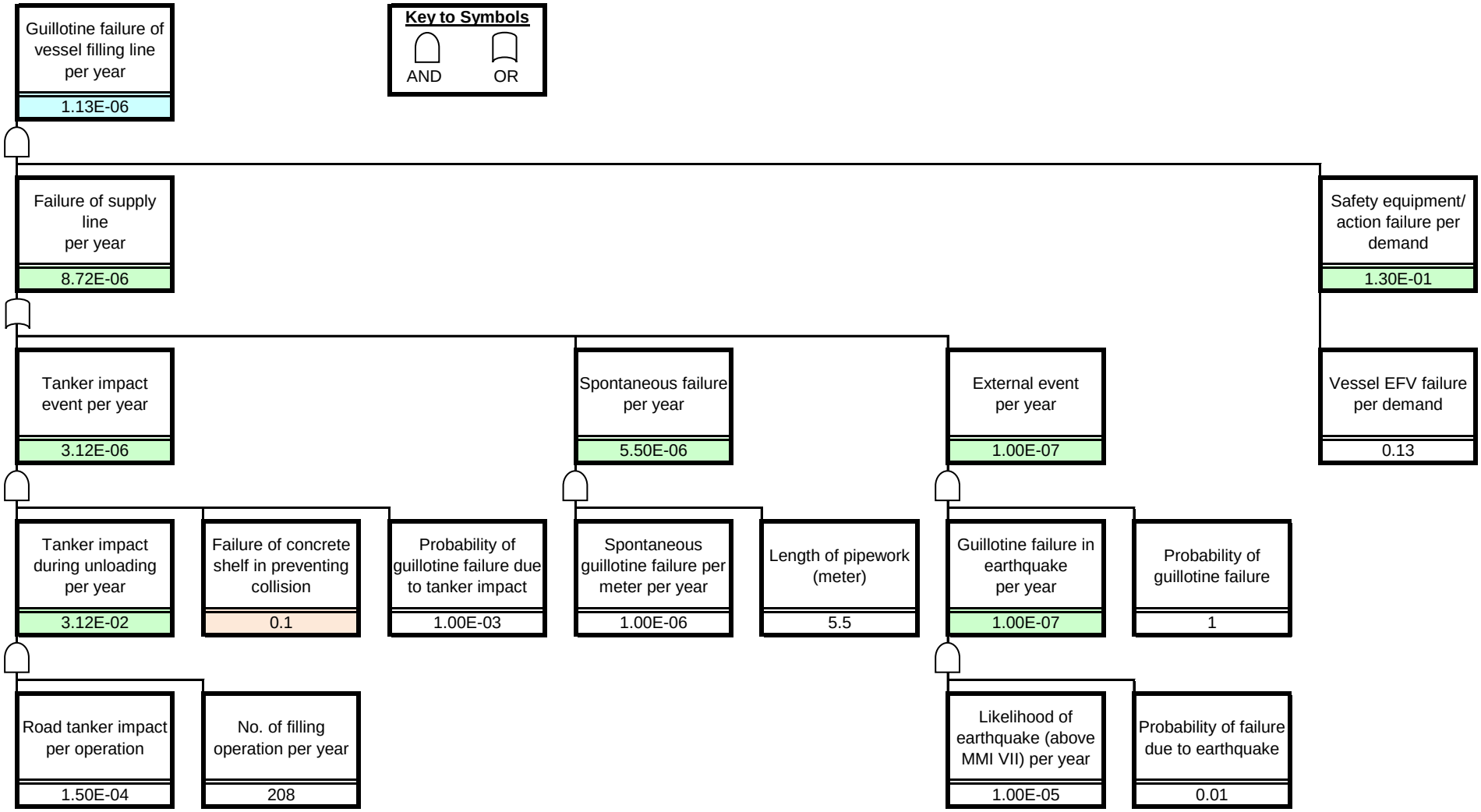
Fault Tree 5a - Guillotine Failure of Vessel Filling Line (Release from Vessel) (LPG Compound near Block I)



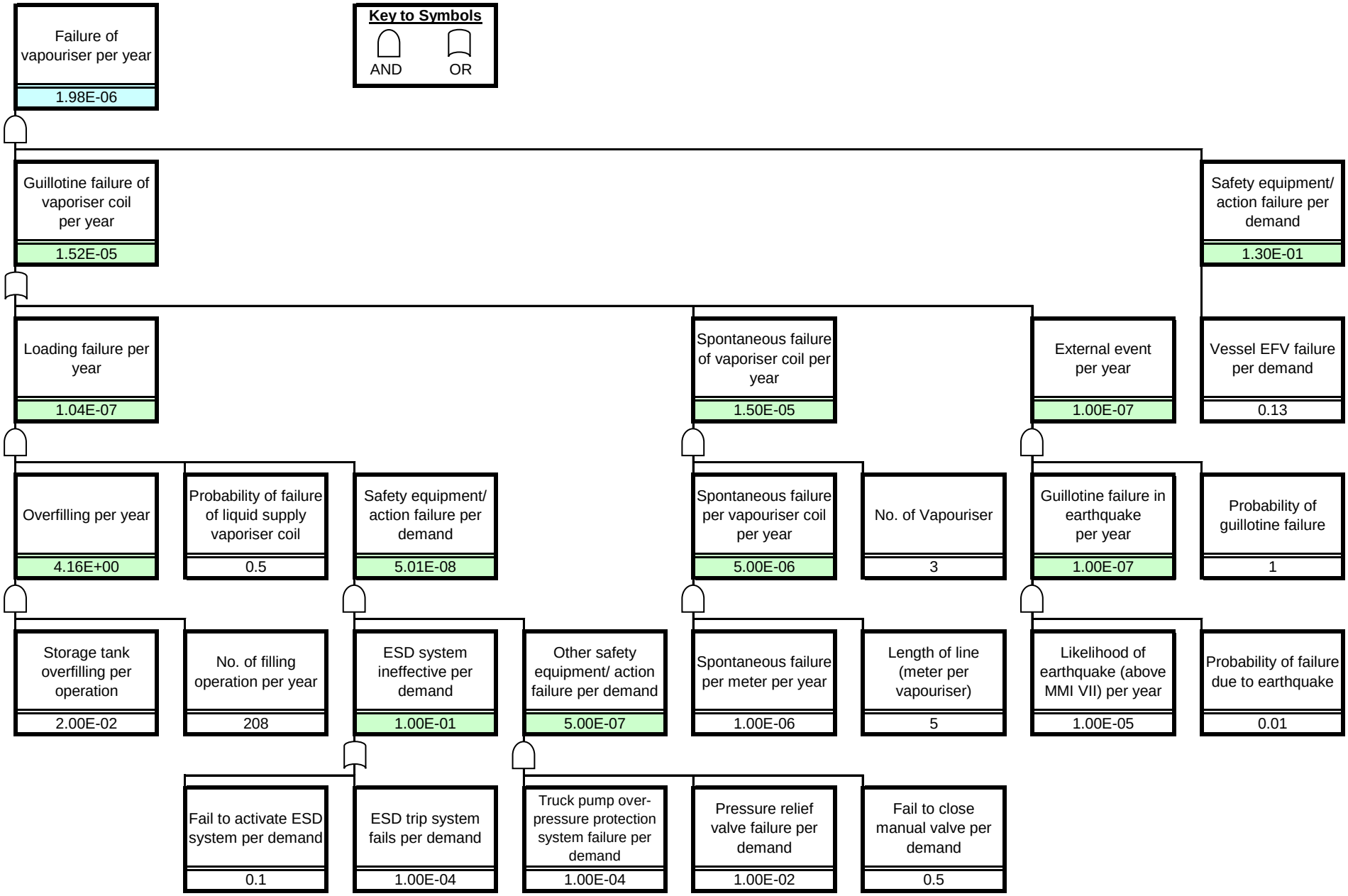
Fault Tree 5b - **Guillotine Failure of Vessel Filling Line (Release from Tanker) (LPG Compound near Block I)**



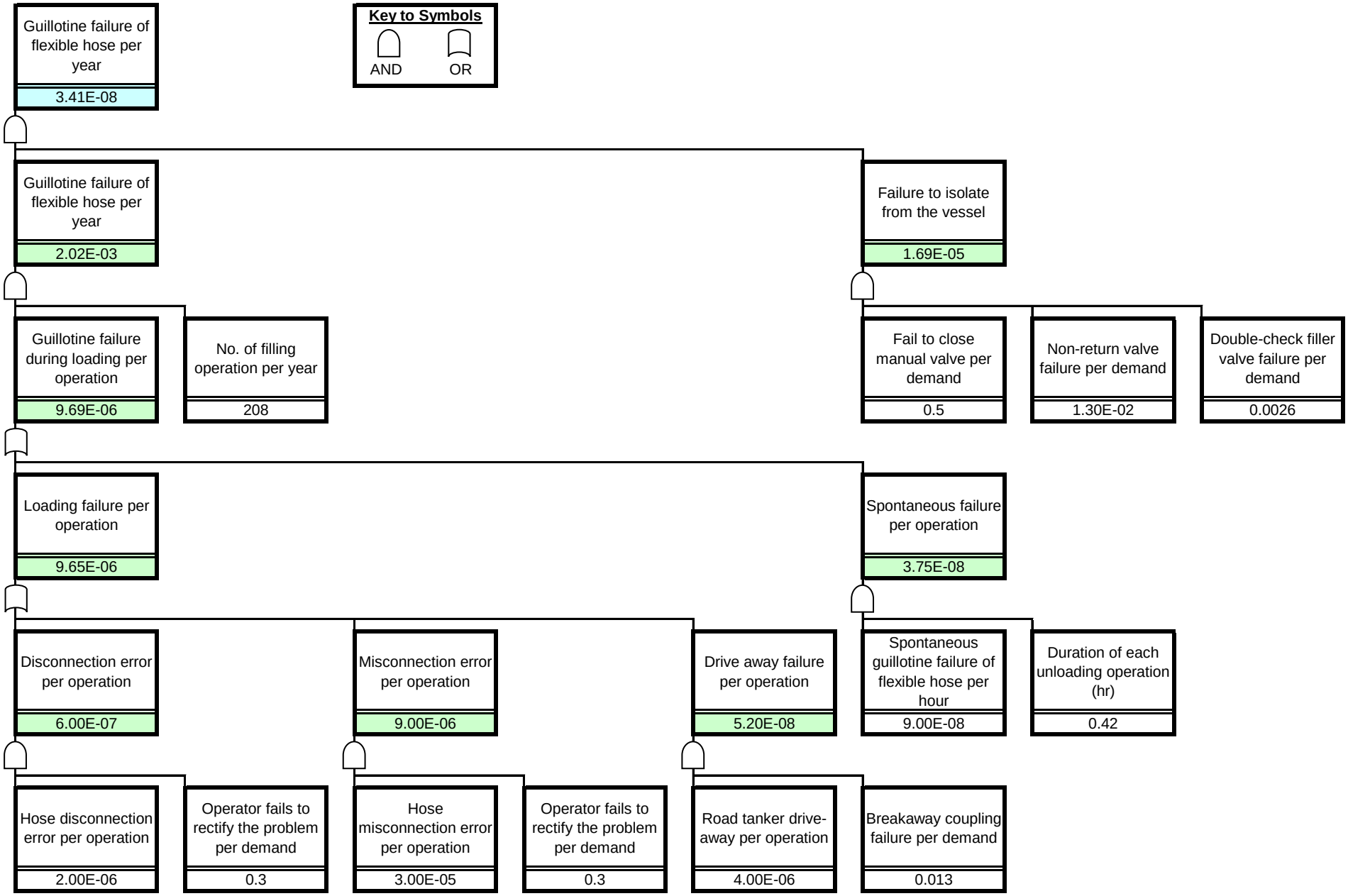
Fault Tree 6 - Guillotine Failure of Supply Line to Vapouriser (LPG Compound near Block I)



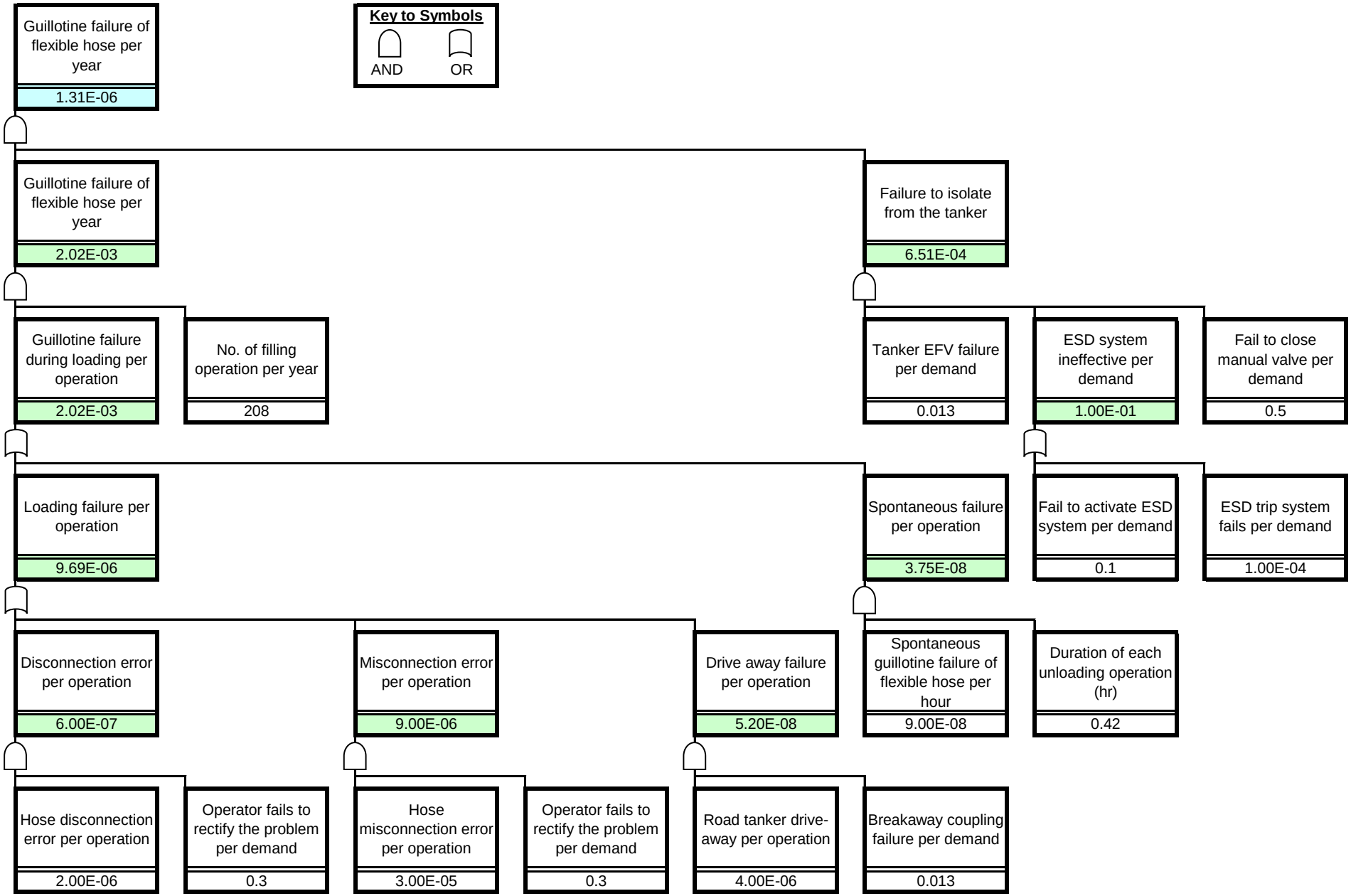
Fault Tree 7 - **Failure of Vaporiser (LPG Compound near Block I)**



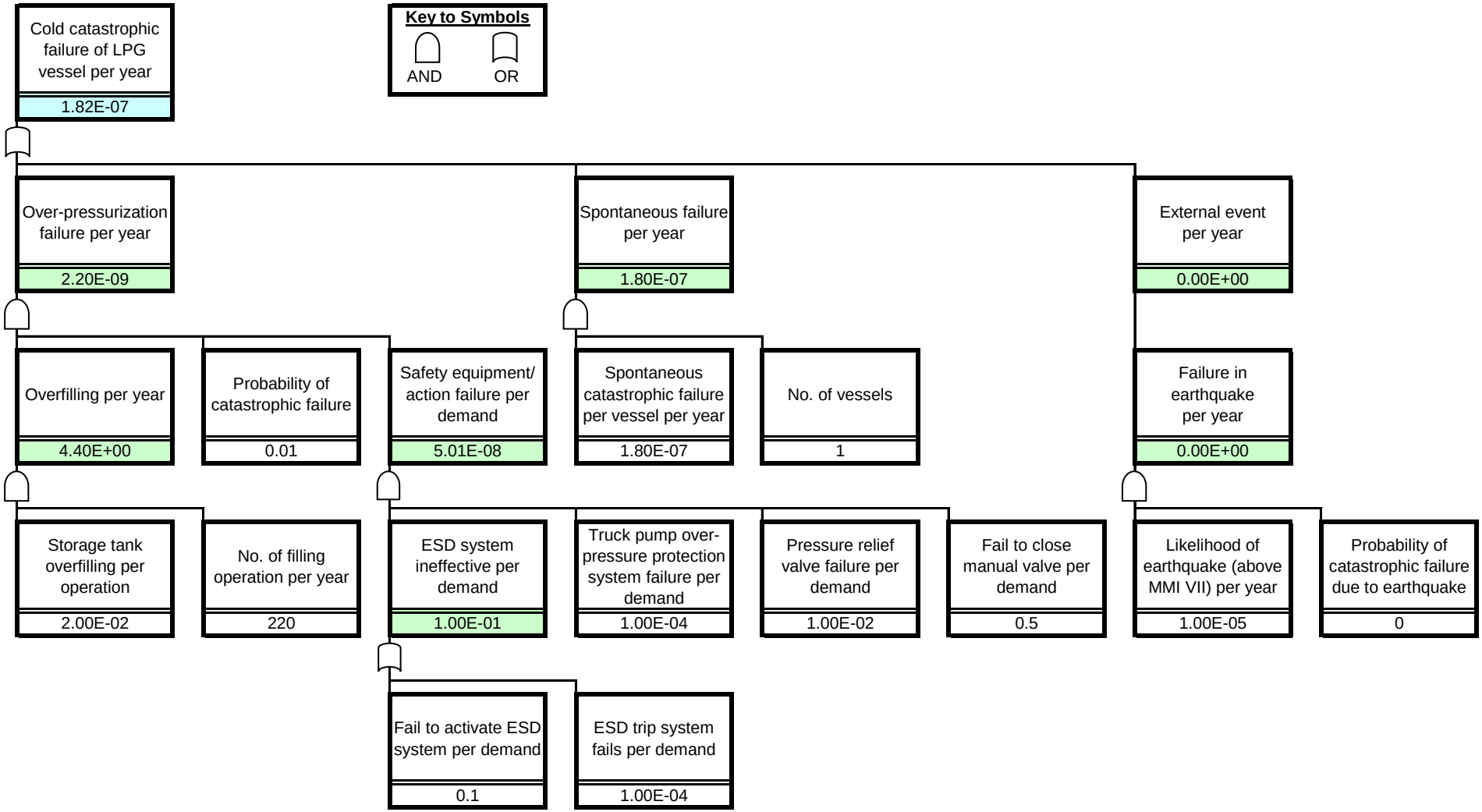
Fault Tree 8a - Guillotine Failure of Flexible Hose (Release from Vessel) (LPG Compound near Block I)



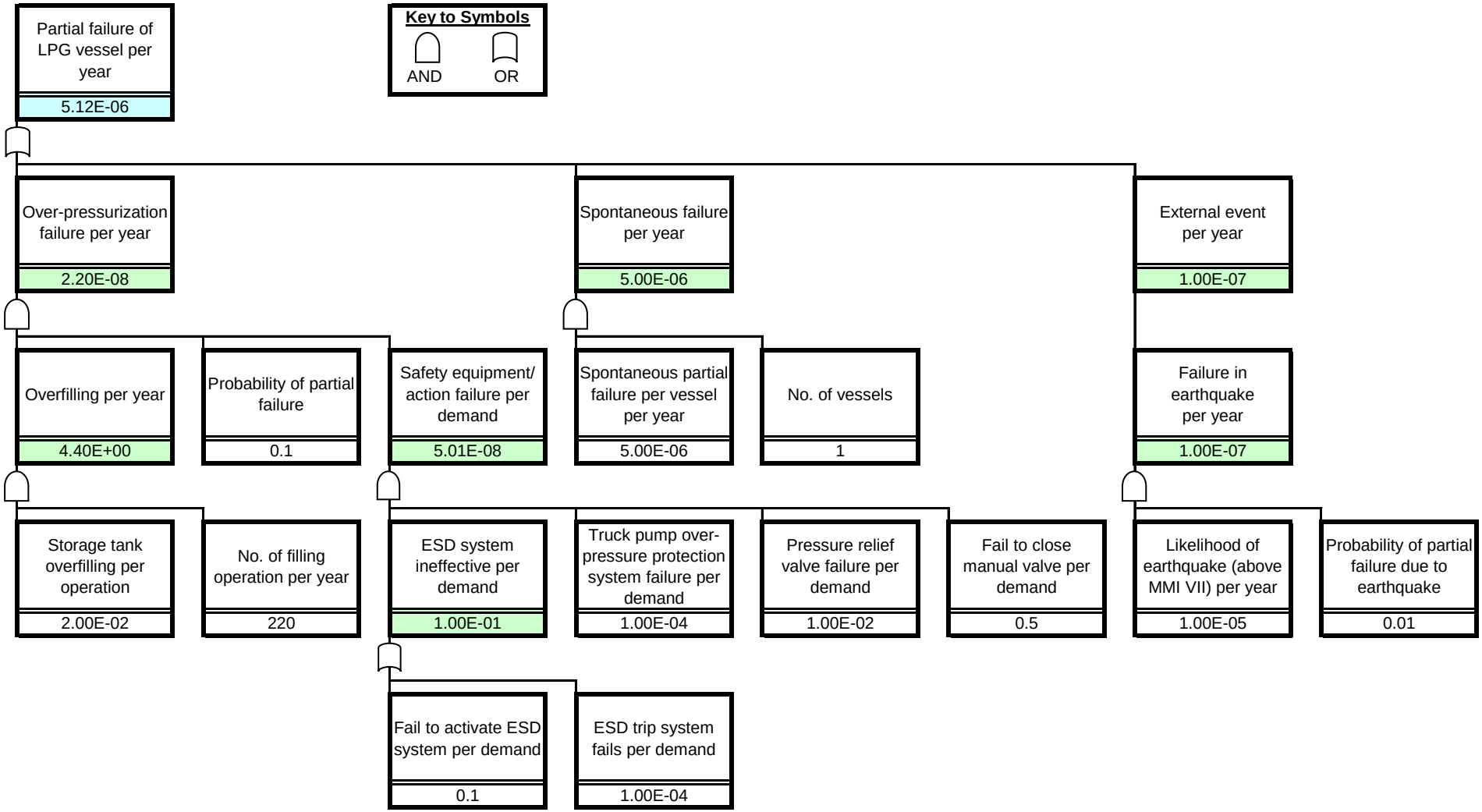
Fault Tree 8b **Guillotine Failure of Flexible Hose (Release from Tanker) (LPG Compound near Block I)**



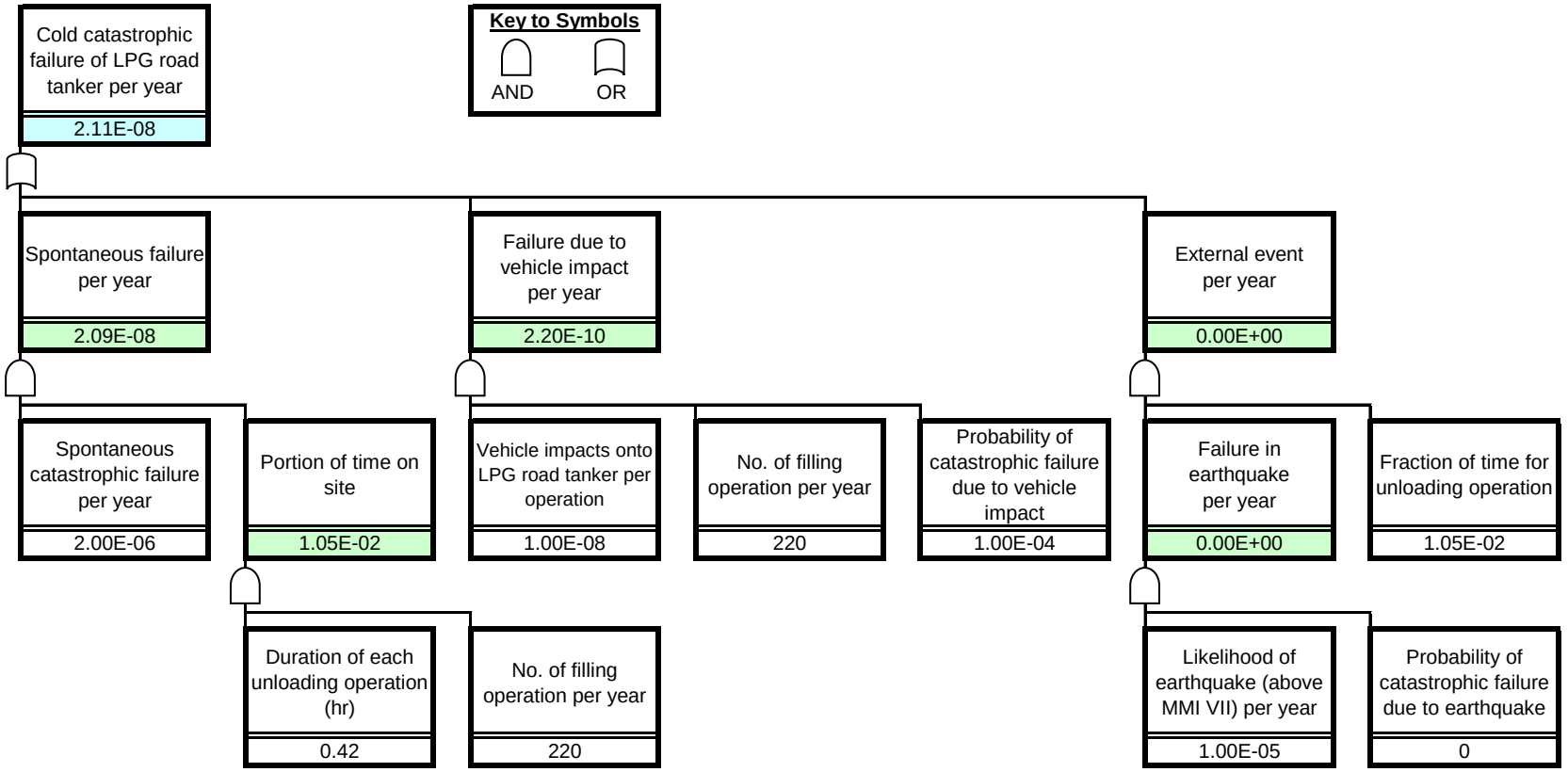
Fault Tree 9 - **Cold Catastrophic Failure of LPG Vessel (LPG Compound near Block G)**



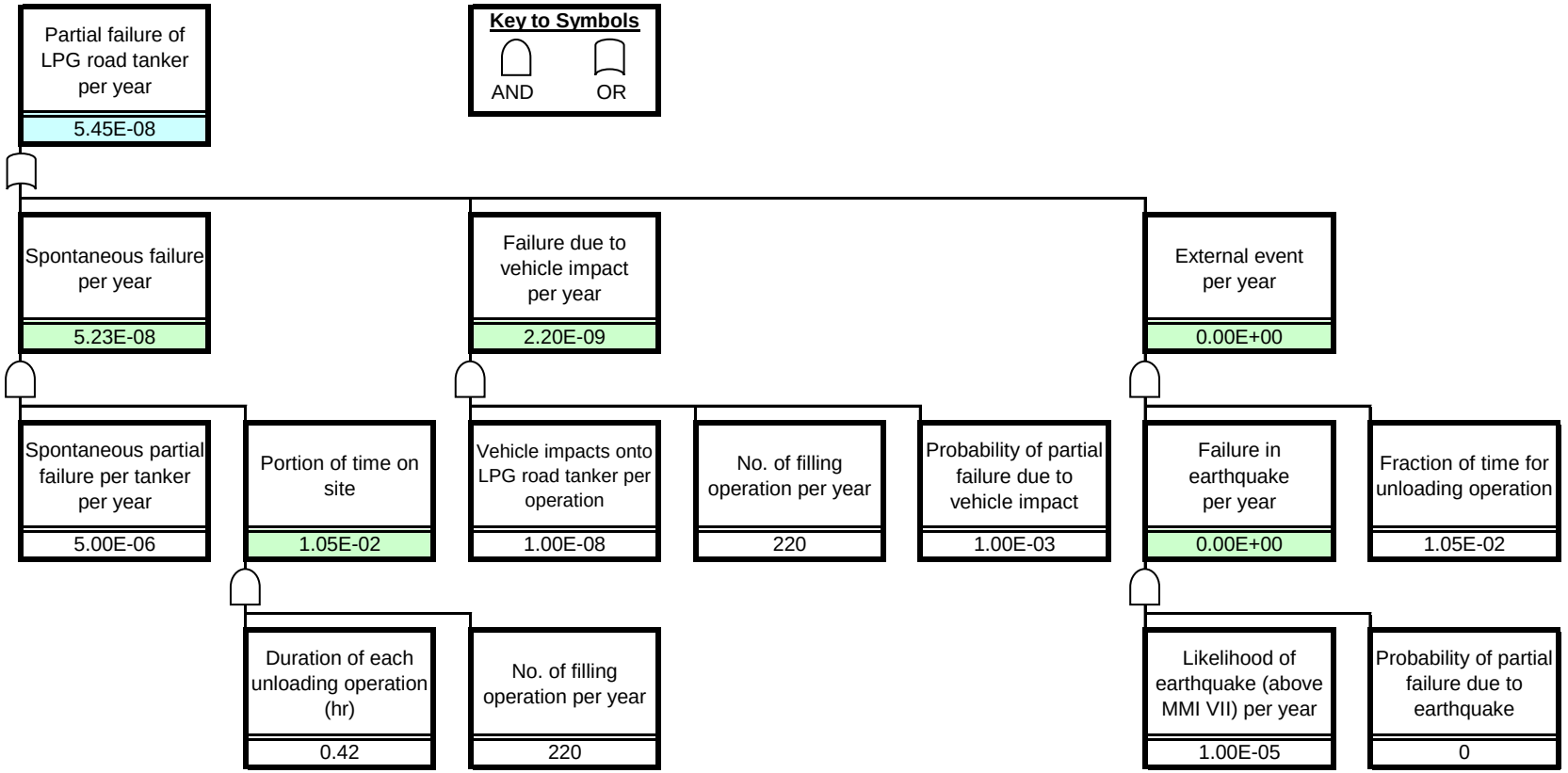
Fault Tree 10 - Cold Partial Failure of LPG Vessel (LPG Compound near Block G)



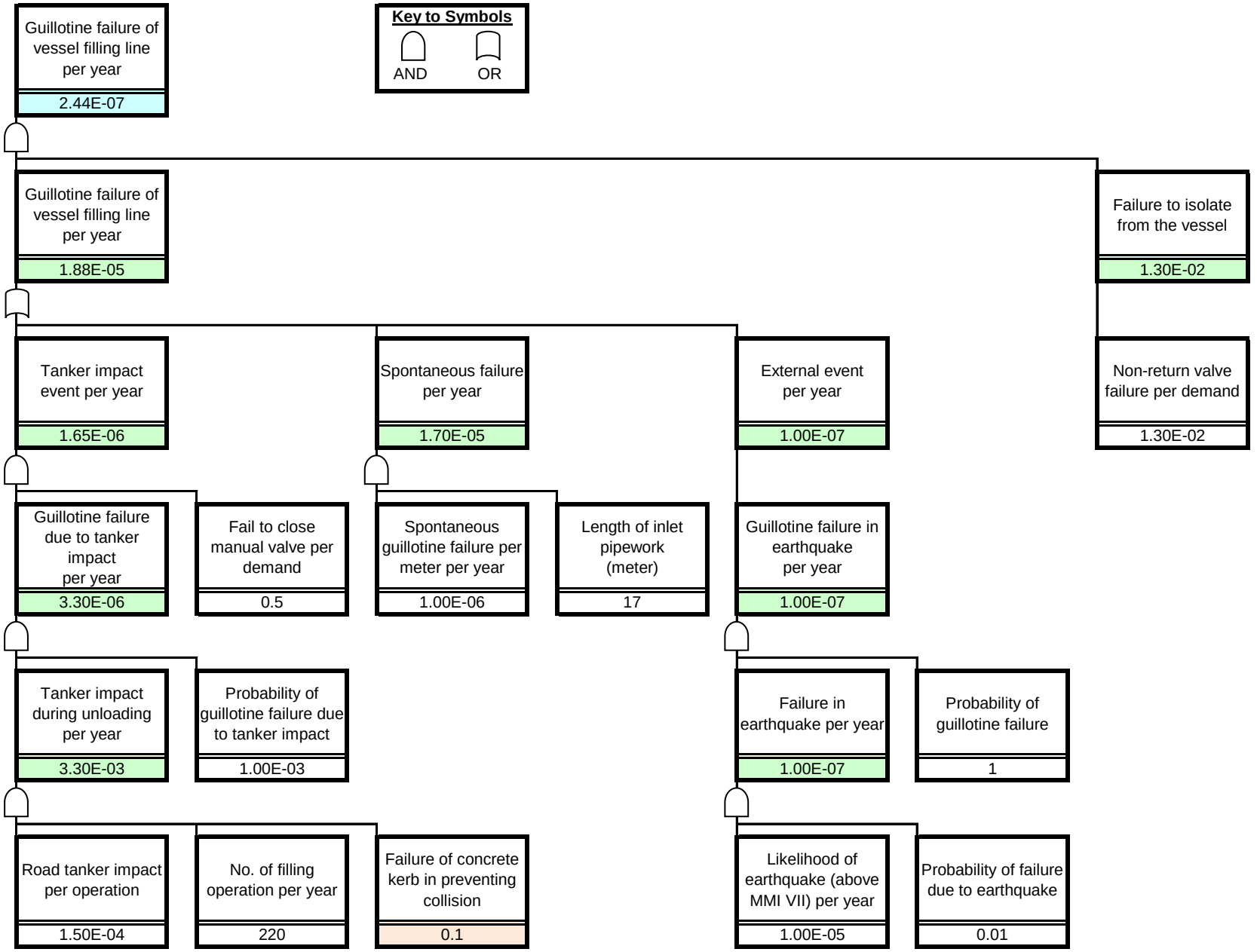
Fault Tree 11 - Cold Catastrophic Failure of Road Tanker (LPG Compound near Block G)



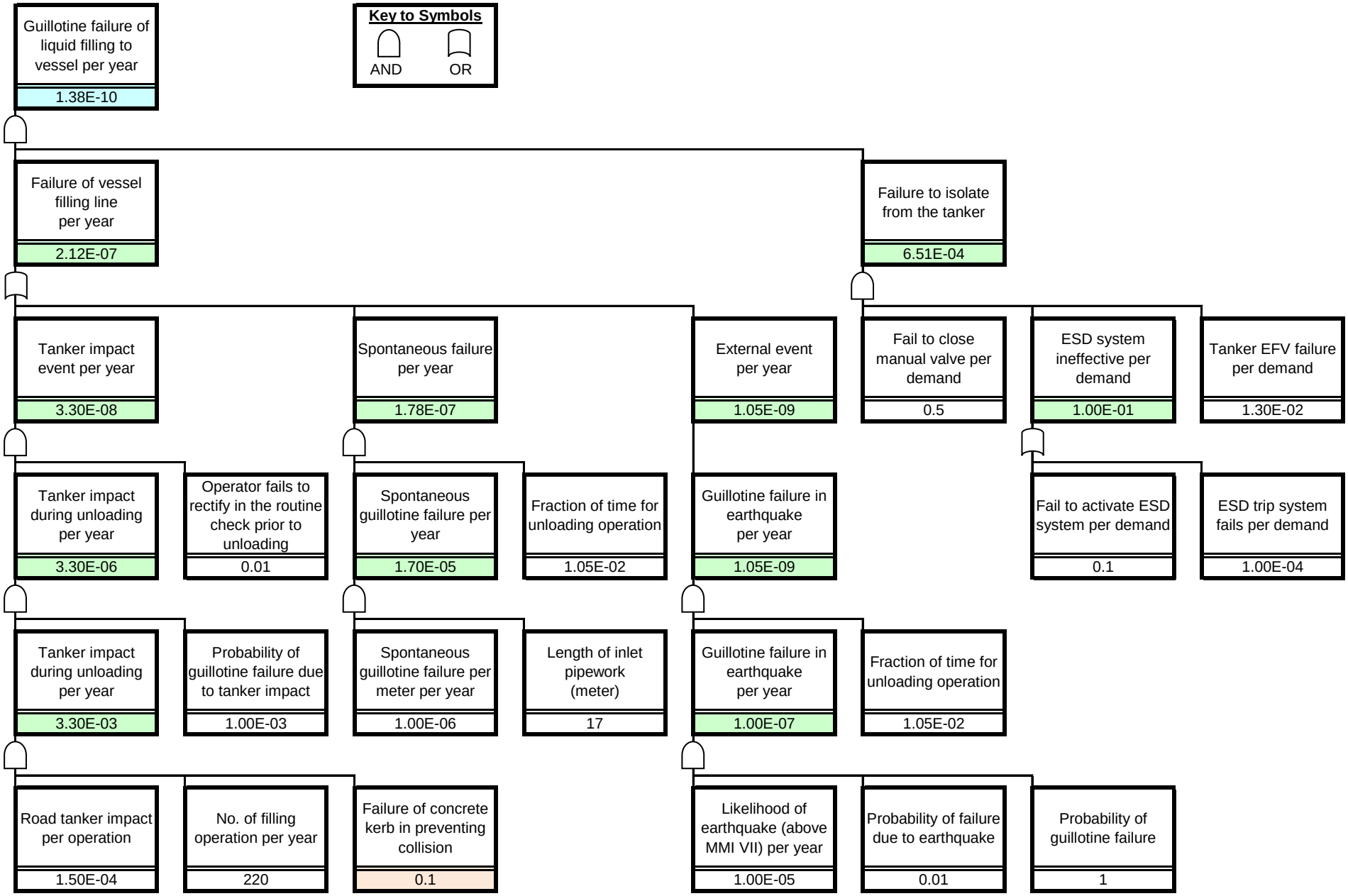
Fault Tree 12 - Cold Partial Failure of LPG Road Tanker (LPG Compound near Block G)



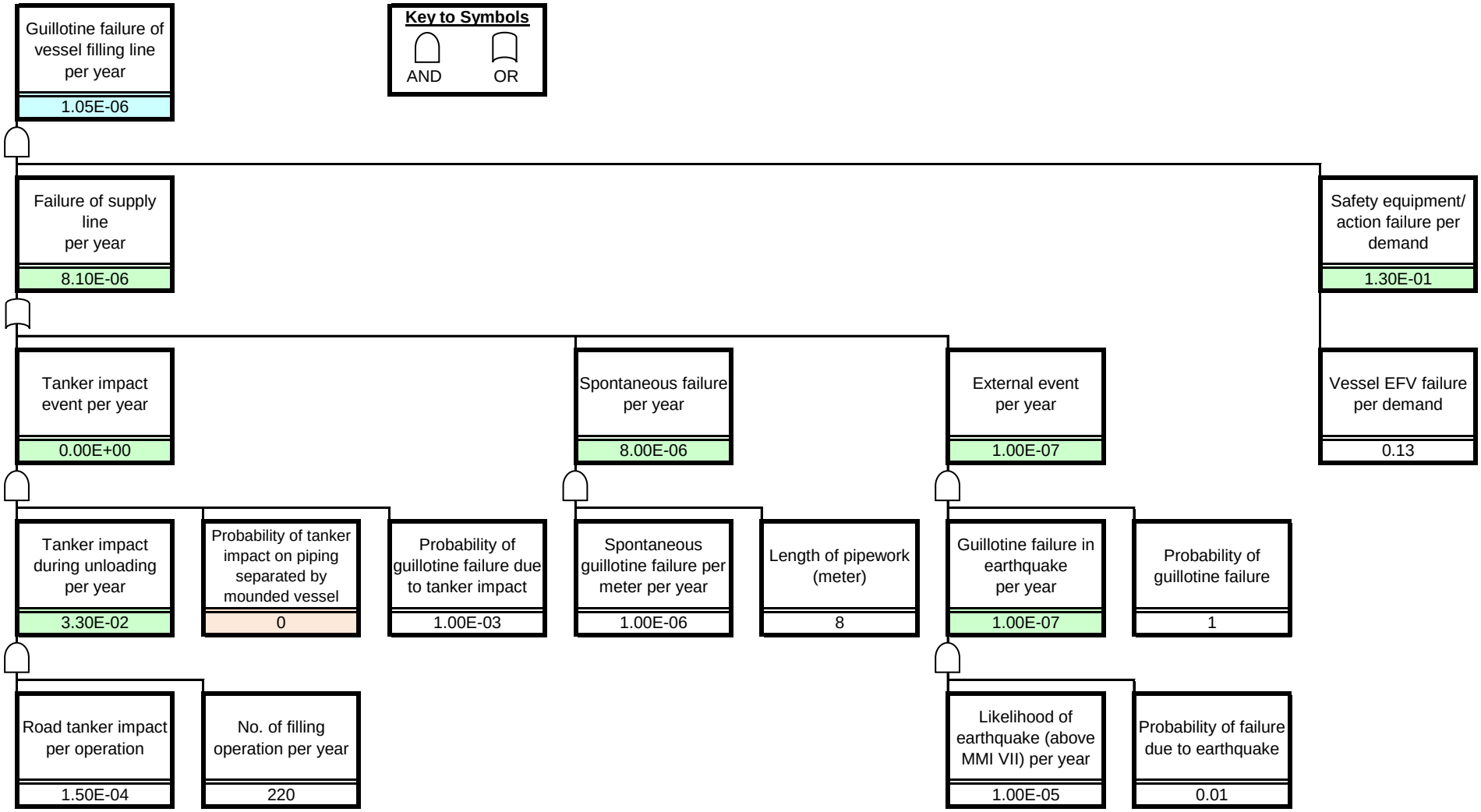
Fault Tree 13a - Guillotine Failure of Vessel Filling Line (Release from Vessel) (LPG Compound near Block G)



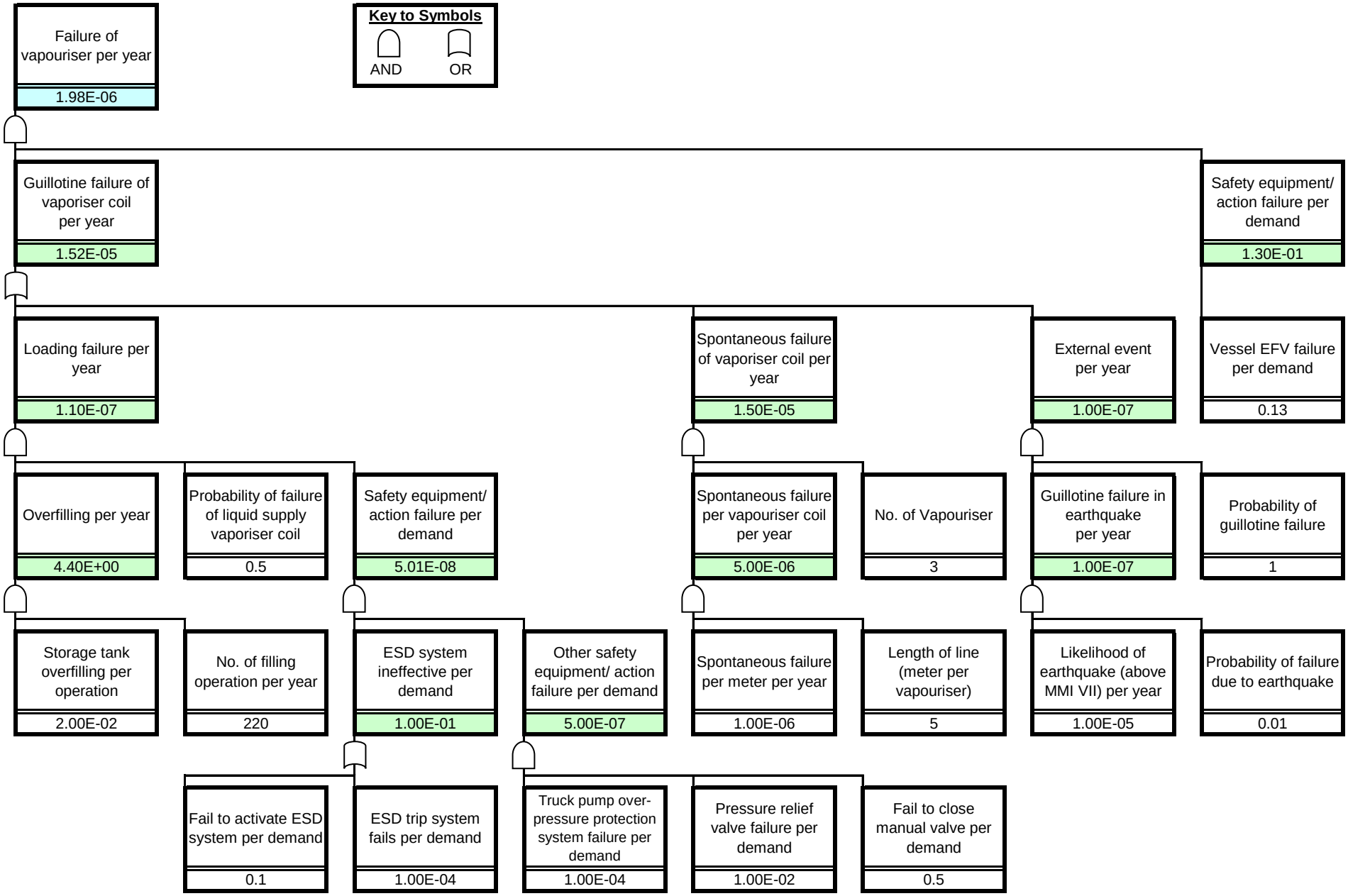
Fault Tree 13b - Guillotine Failure of Vessel Filling Line (Release from Tanker) (LPG Compound near Block G)



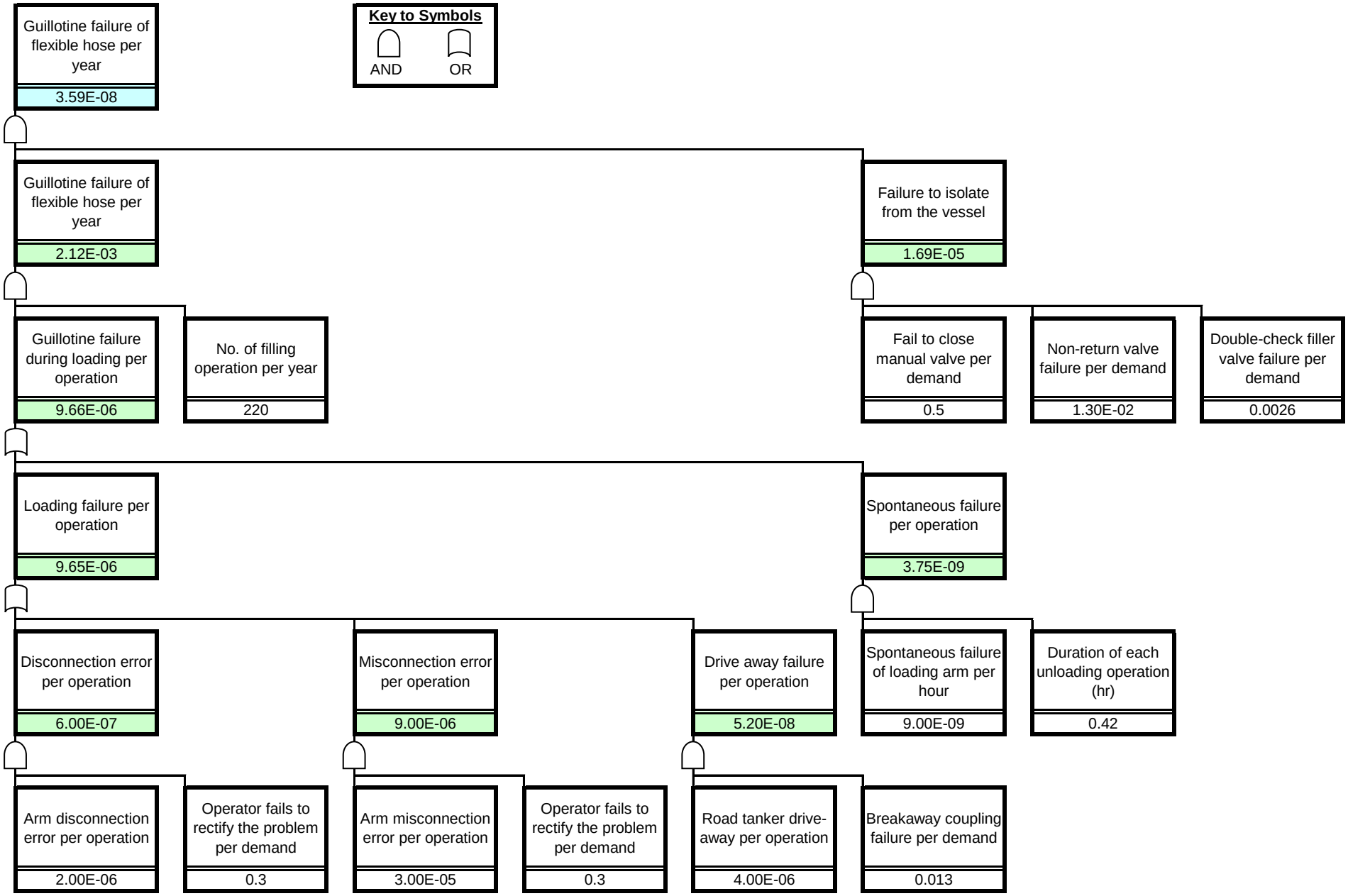
Fault Tree 14 - Guillotine Failure of Supply Line to Vapouriser (LPG Compound near Block G)



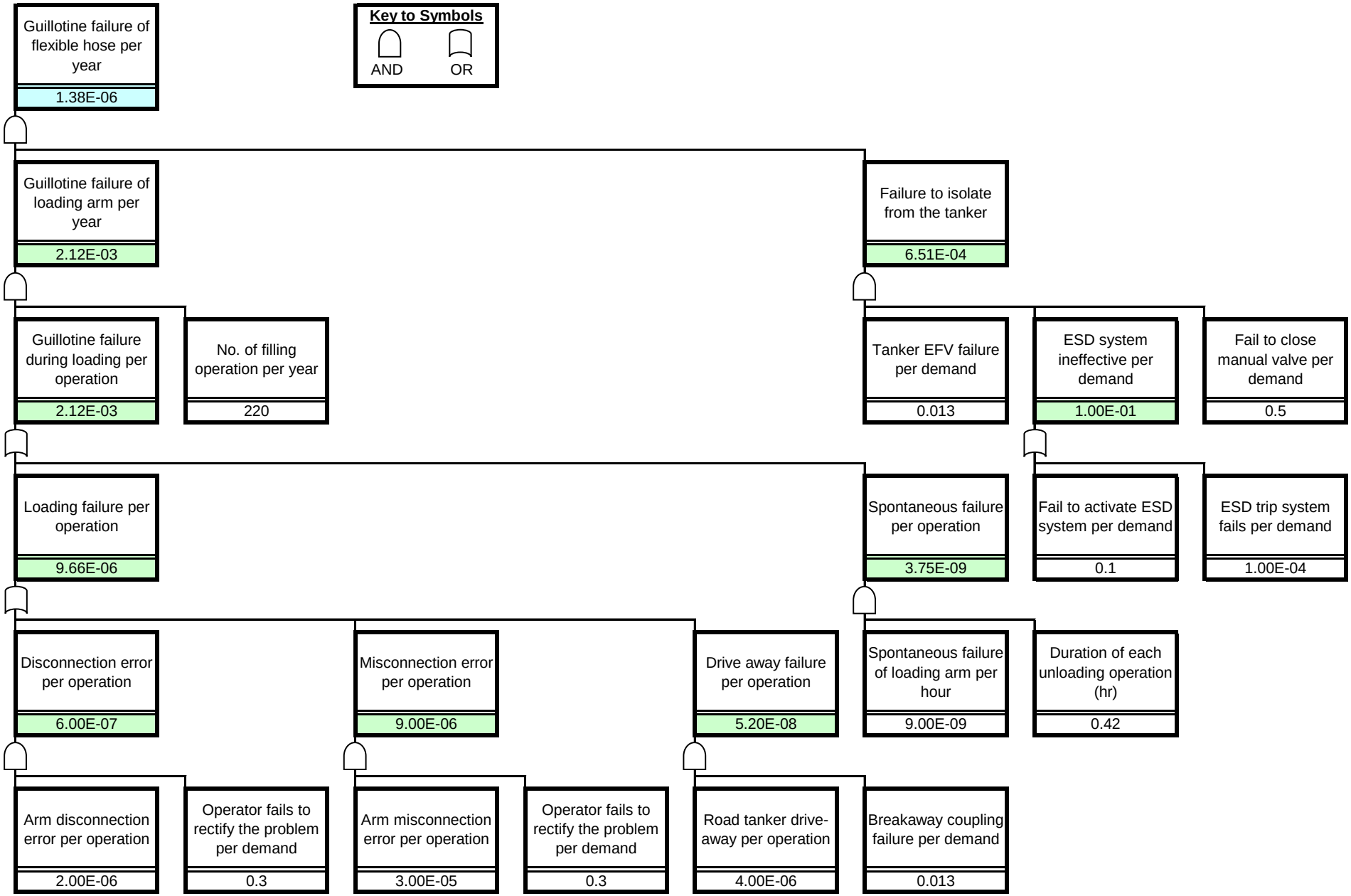
Fault Tree 15 - **Failure of Vaporiser (LPG Compound near Block G)**



Fault Tree 16a - Guillotine Failure of Loading Arm (Release from Vessel) (LPG Compound near Block G)

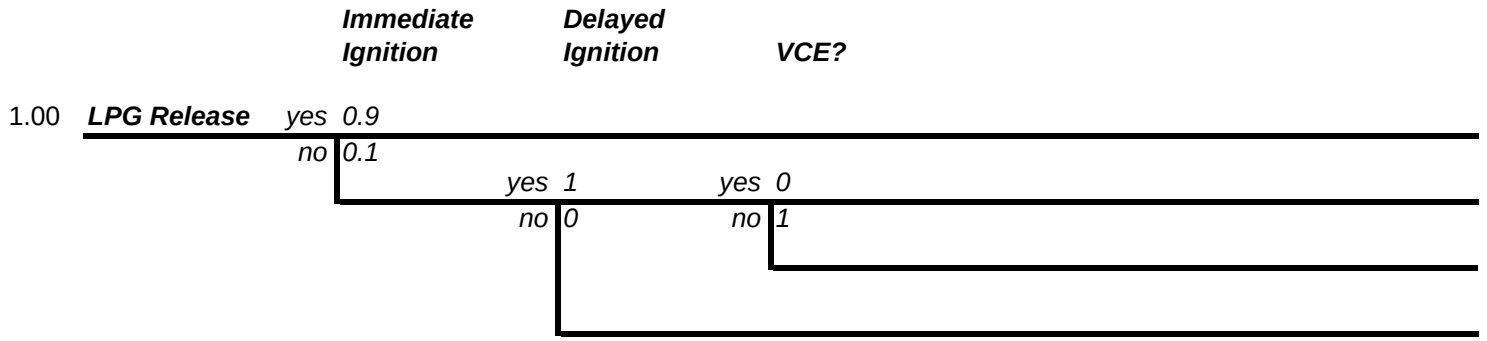


Fault Tree 16b - Guillotine Failure of Flexible Hose (Release from Tanker) (LPG Compound near Block G)



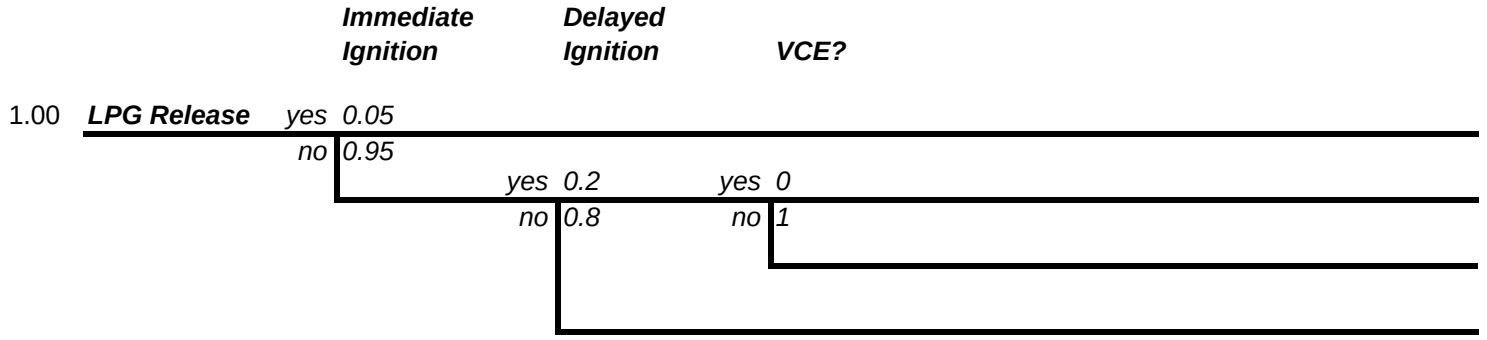
Annex E:
Event Tree Analysis

ETA 1 - LPG Instantaneous Release from Vessel / Road Tanker



Event Outcome	Outcome Probability
Fireball	9.00E-1
VCE	0.00E+0
Flash fire	1.00E-1
Unignited Release	0.00E+0
	1.00

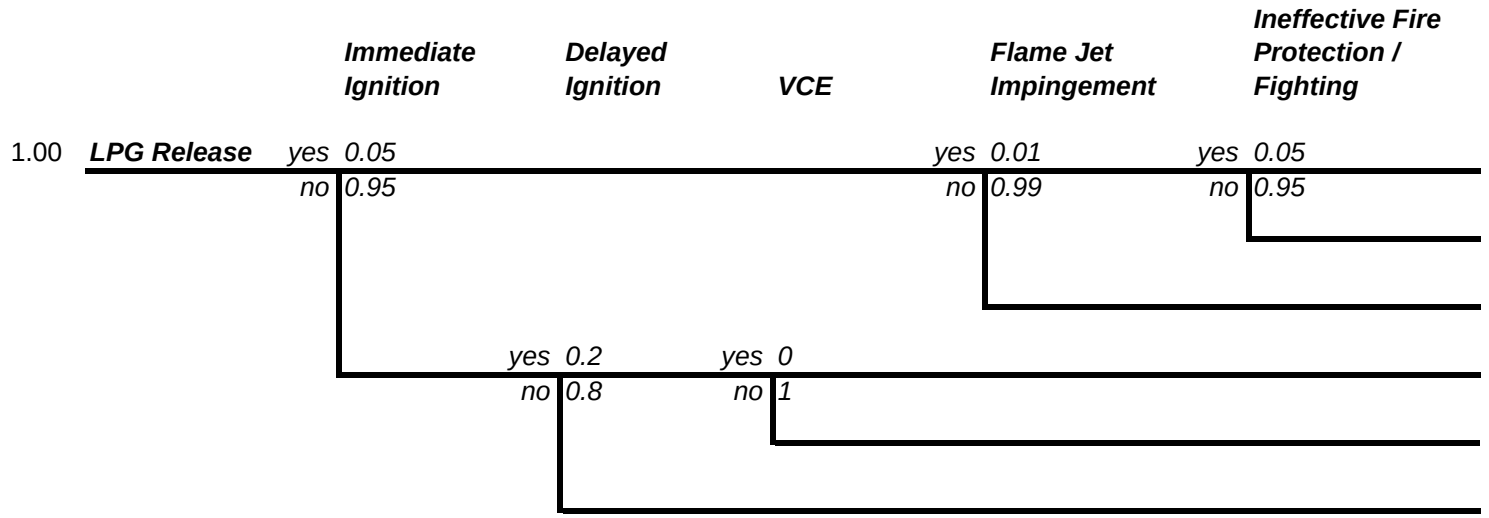
ETA 2 - LPG Continuous Release from Vessel / Road Tanker



Event Outcome	Outcome Probability
Jetfire*	5.00E-2
VCE	0.00E+0
Flash fire	1.90E-1
Unignited Release	7.60E-1
	1.00

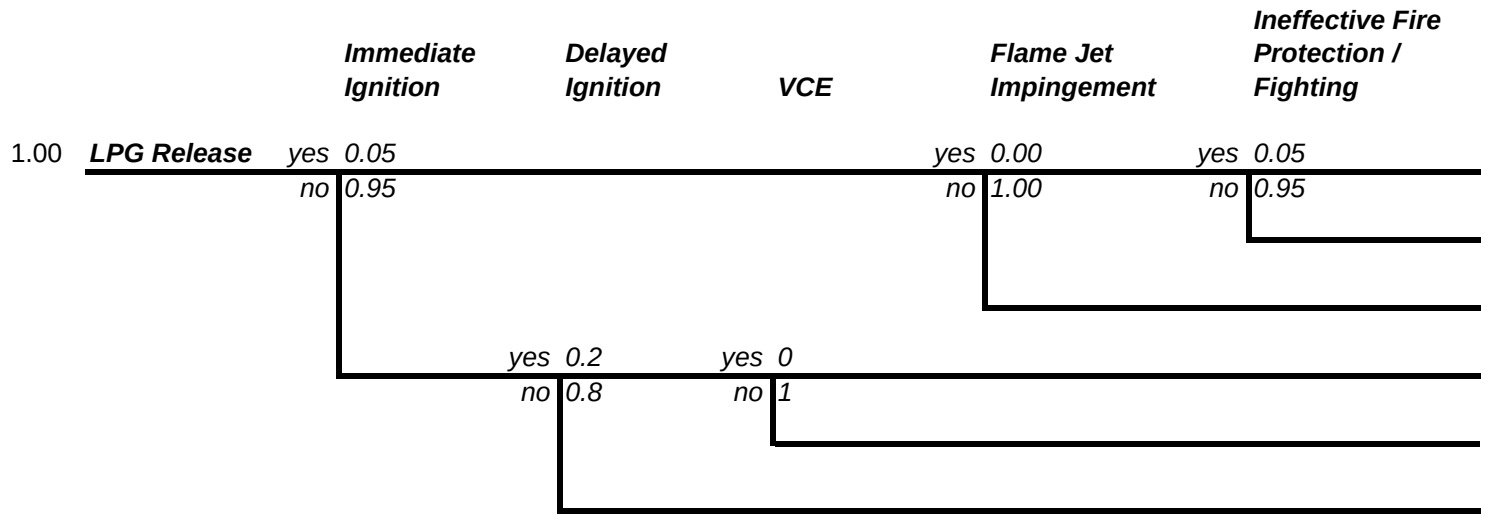
*** Jetfire from underground installations is considered in vertical direction**

ETA 3 - LPG Continuous Release from Outdoor Pipework



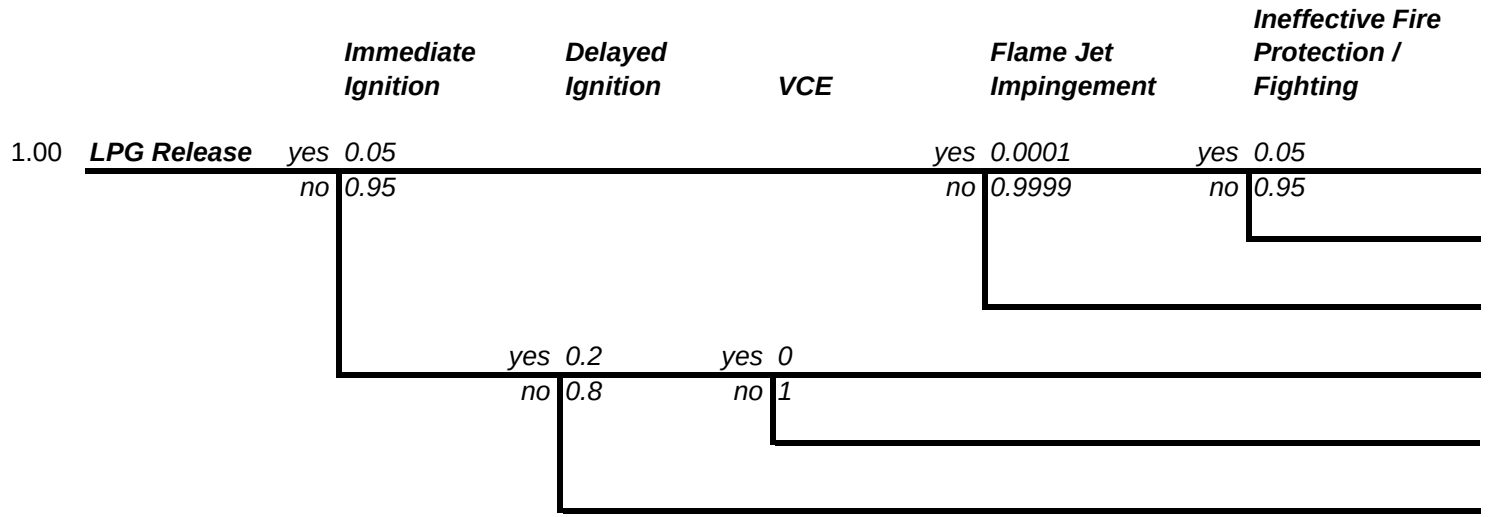
Event Outcome	Outcome Probability
BLEVE	2.50E-5
Jetfire	4.75E-4
Jetfire	4.95E-2
VCE	0.00E+0
Flash fire	1.90E-1
Unignited Release	7.60E-1
	1.00

ETA 4 - LPG Continuous Release from Outdoor Pipework (BLEVE Prevented)



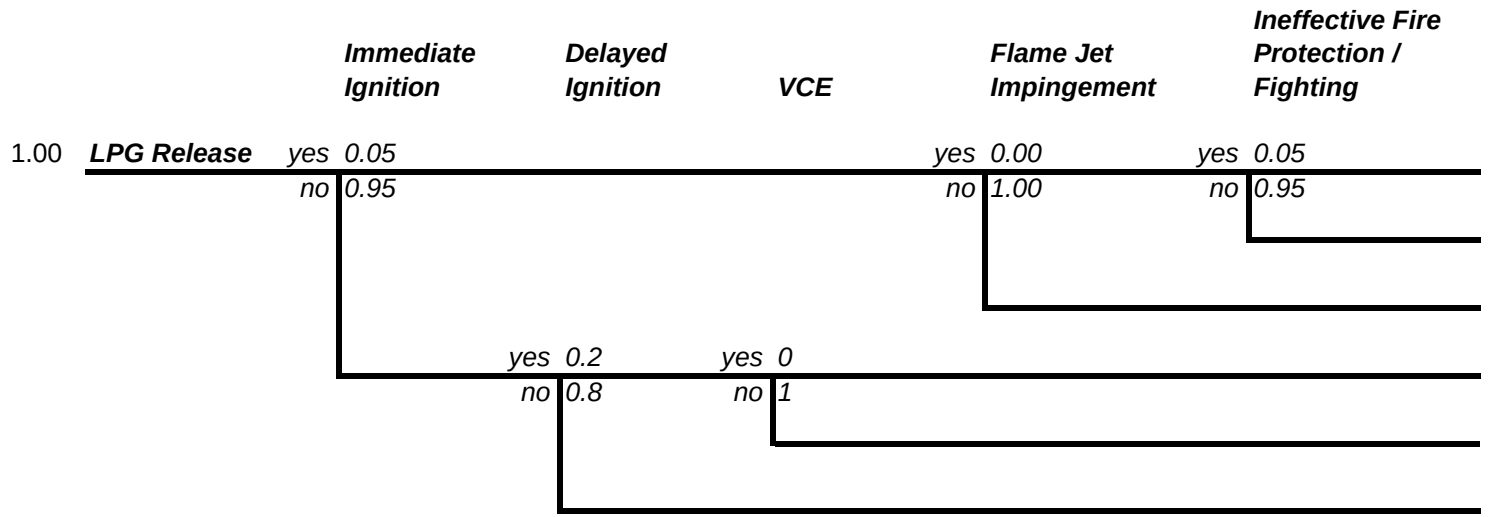
Event Outcome	Outcome Probability
BLEVE	0.00E+0
Jetfire	0.00E+0
Jetfire	5.00E-2
VCE	0.00E+0
Flash fire	1.90E-1
Unignited Release	7.60E-1
	1.00

ETA 5 - LPG Continuous Release from Indoor Pipework



Event Outcome	Outcome Probability
BLEVE	2.5000E-7
Jetfire	4.7500E-6
Jetfire	4.9995E-2
VCE	0.0000E+0
Flash fire	1.9000E-1
Unignited Release	7.6000E-1
	1.00

ETA 6 - LPG Continuous Release from Indoor Pipework (BLEVE Prevented)



Event Outcome	Outcome Probability
BLEVE	0.0000E+0
Jetfire	0.0000E+0
Jetfire	5.0000E-2
VCE	0.0000E+0
Flash fire	1.9000E-1
Unignited Release	7.6000E-1
	1.00

Annex F:
Atmospheric Stability Class-Wind Speed Frequencies

Day Time Atmospheric Stability Class-Wind Speed Frequencies at Kai Tak Automatic Weather Station (Year 2019)

Wind Speed	STABILITY CLASS						Total
	A	B	C	D	E	F	
0-2	5.3%	3.6%	0.0%	4.4%	0.0%	5.6%	18.9%
2-4	3.5%	19.1%	7.3%	12.0%	4.8%	1.3%	47.9%
4-6	0.0%	10.8%	7.6%	10.1%	0.5%	0.0%	29.1%
6-8	0.0%	0.0%	0.7%	3.1%	0.0%	0.0%	3.8%
>8	0.0%	0.0%	0.0%	0.3%	0.0%	0.0%	0.3%
Total	8.8%	33.5%	15.7%	30.0%	5.3%	6.8%	100.0%

Night Time Atmospheric Stability Class-Wind Speed Frequencies at Kai Tak Automatic Weather Station (Year 2019)

Wind Speed	STABILITY CLASS						Total
	A	B	C	D	E	F	
0-2	0.0%	0.0%	0.0%	0.6%	0.0%	34.0%	34.7%
2-4	0.0%	0.0%	0.0%	15.0%	24.0%	8.1%	47.1%
4-6	0.0%	0.0%	0.0%	13.9%	1.4%	0.0%	15.3%
6-8	0.0%	0.0%	0.0%	2.6%	0.0%	0.0%	2.6%
>8	0.0%	0.0%	0.0%	0.3%	0.0%	0.0%	0.3%
Total	0.0%	0.0%	0.0%	32.5%	25.4%	42.1%	100.0%

WSIA (Origianl Scheme)

(May 2020)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Water Supply Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
January 2020

Reference Number:
R6940_v1.1

Prepared by:

Kitty Wong
Senior Environmental Consultant

Approved by:

Tony Cheng
Senior Manager

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1.2 SUBJECT SITE AND ITS ENVIRONS 1
1.3 PROPOSED REDEVELOPMENT 1

2. WATER SUPPLY IMPACT ASSESSMENT 2

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Appendix A Layout Plans
Appendix B Freshwater and Saltwater Mains Record Plan from Water Supplies Department
Appendix C Calculation of the Freshwater and Saltwater Demands
Appendix D Capacity of Fresh and Salt Water Service Reservoir

1. Introduction

1.1 Background and Objectives

1.1.1 Urban Renewal Authority (URA) intends to proceed with Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

1.1.2 Ramboll Hong Kong Limited has been commissioned by URA to conduct this Water Supply Impact Assessment (WSIA) to assess the water supply arrangements in the vicinity of the Subject Site and demonstrate that the proposed development at the Site will not impose an unacceptable water supply impacts.

1.2 Subject Site and its Environs

1.2.1 **Figure 1** shows the location of the Project and its environs. It is currently occupied by the existing low-rise residential buildings which occupies the entire footprint of the site. It is bounded by Ma Tau Wai Road to the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

1.3 Proposed Redevelopment

1.3.1 The subject site covers a Scheme Area of approximately 16,500m^2. Under the current planning, the existing structure will be demolished for redevelopment. The site will then be separated into 2 areas, the area in the northern portion of the site is Urban Renewal Authority Site (URA Site) and area in the southern portion of the site is Public Housing Site (PH Site).

1.3.2 URA Site consists of five residential towers providing about 1541 residential units, clubhouses (about 3850m^2) at the first floor and retail/community facilities (about 9600m^2) at basement and ground floor.

1.3.3 PH Site consists of two residential towers providing about 950 residential units, retail/community facilities (about 2600m^2) at the first floor and ground floor.

1.3.4 The layout and section is shown in **Appendix A**.

2. Water Supply Impact Assessment

2.1 Existing Water Supplies

2.1.1 According to the record plan from Water Supplies Department (WSD) in **Appendix B**, there are existing fresh water and salt water mains connected to the Subject Site.

2.1.2 Based on the information for WSD shown in **Appendix D**, the Subject Site is within the supply zones of Ho Man Tin East Fresh Water Service Reservoir with capacity of 152,411m3.

2.1.3 Flushing water will be supplied from Lok Fu Salt Water Service Reservoir with capacity of 8,597m3.

2.2 Methodology

2.2.1 The unit water demands for the various population categories is made reference to Departmental Instruction 1309 issued by WSD and Guidelines. The number of worker is estimated based on Table 8 of Commercial and Industrial Floor Space Utilization Survey (CIFSUS) conducted by the Planning Department.

2.3 Assumption

2.3.1 As a conservative assessment, it is assumed URA Site provides 1550 residential units, clubhouses (about 3900m^2) at the first floor; community facilities (about 500m^2) and retail (about 9100m^2) at basement and ground floor.

2.3.2 It is also assumed that PH Site provides 960 residential units, community facilities (about 1800m^2) and retail (about 900m^2) at the first floor and ground floor.

2.4 Discussion

2.4.1 The proposed development at the Subject Site will result in new water demands which is estimated in **Appendix C** and summarized in **Table 1** below. As there is substantially great spare capacity in the service reservoirs serving the Site, the expected increase in demand can therefore be accommodated by the existing main supply facilities.

Table 1 Estimated Daily Freshwater and Saltwater Demand

	Daily Freshwater Demand (m^3/day)	Daily Saltwater Demand (m^3/day)
URA Site	1317.66	335.11
PH Site	807.54	190.38
Total	2125.20	525.49
Capacity to Existing Water Service Reservoir	1.39%	6.11%

2.4.2 The detailed connection arrangements for the Site and the local watermains will be reviewed in later stages of project implementation. Local upgrading and/or realignment will be implemented as required.

Construction and Maintenance

2.4.3 The Project Proponent will be responsible for the design, construction, repair and maintenance of the internal water supply facilities and connection to the main water system(s) to the satisfaction of relevant Government departments.

3. Overall Conclusion

3.1.1 Water supply assessments were conducted for the redevelopment at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

3.1.2 There will be new demands for both freshwater and saltwater from the development. However, the volumes involved are not particularly large and can be provided from the existing supply facilities.

3.1.3 It is concluded that the proposed development can be implemented without any adverse water supply impacts.

FIGURES

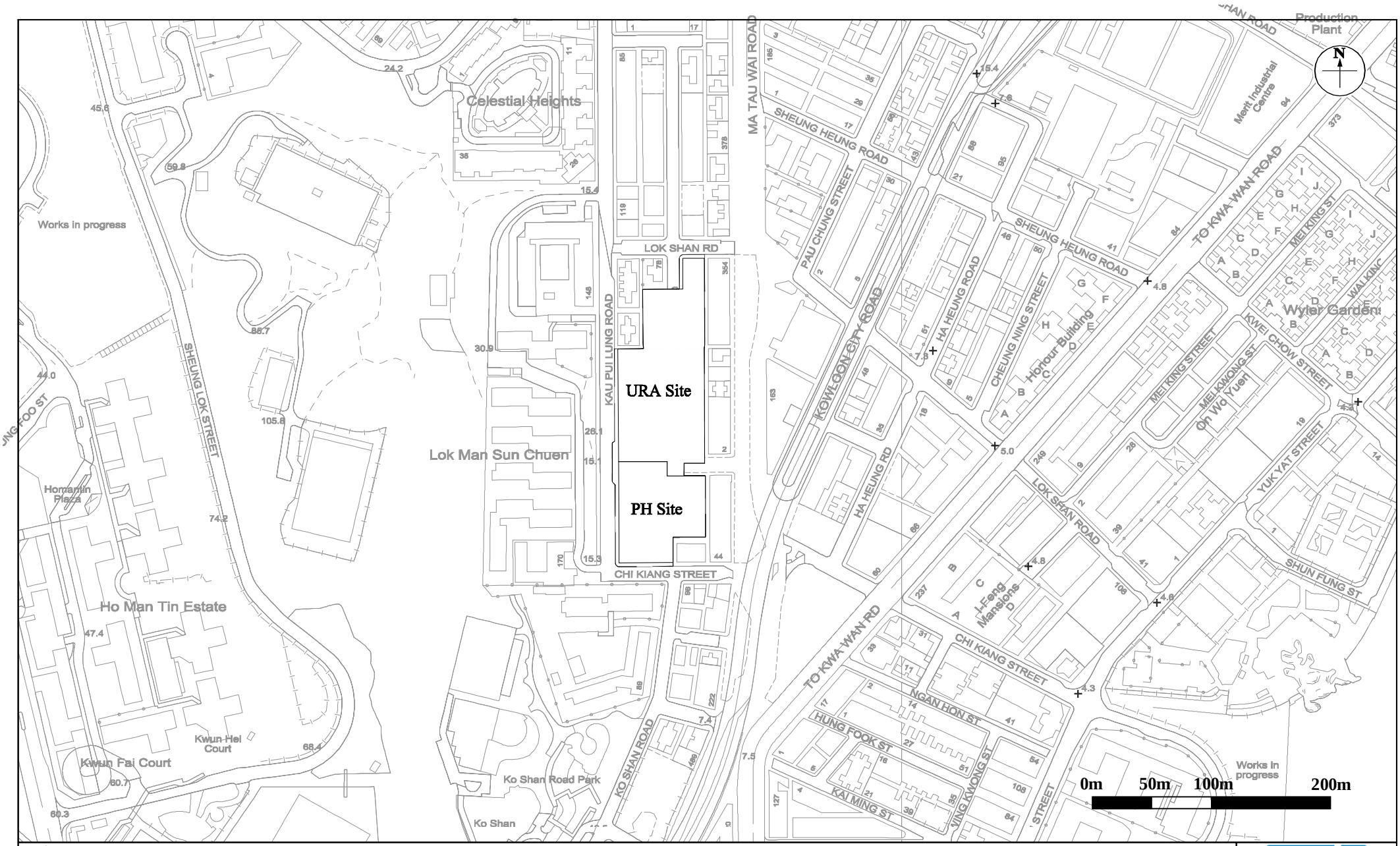
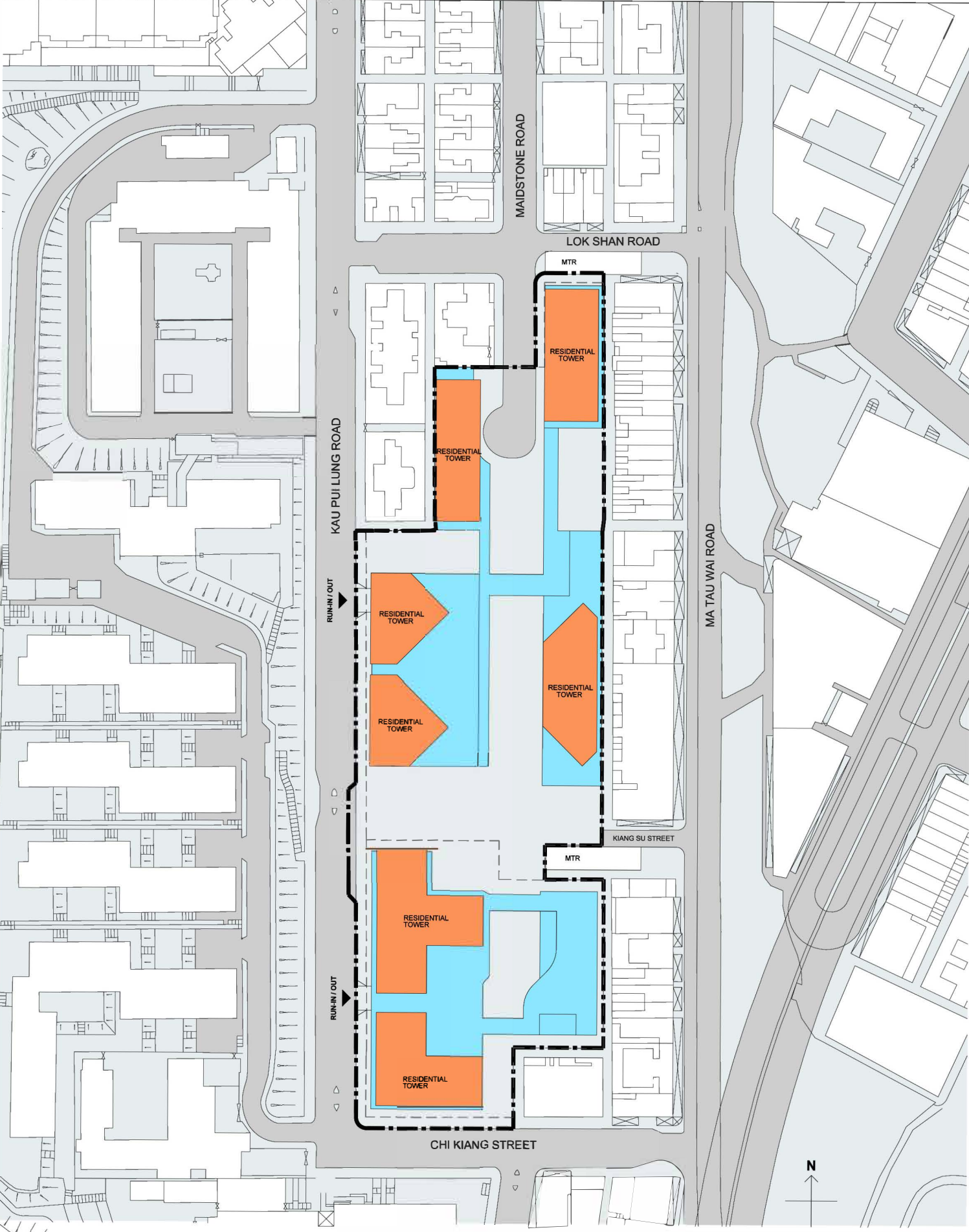


Figure: 1	RAMBOLL
Title: Location of the Subject Site and Its Environs	Drawn by: KW
	Checked by: TC
Project: Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)	Rev.: 1.0
	Date: Dec 2019

Q:\Projects\URACBS02EI00\04 Deliverables\01 EA Report\01 Figures\v1.0\Fig 1 Subject Site.dwg

APPENDIX A:
LAYOUT PLANS

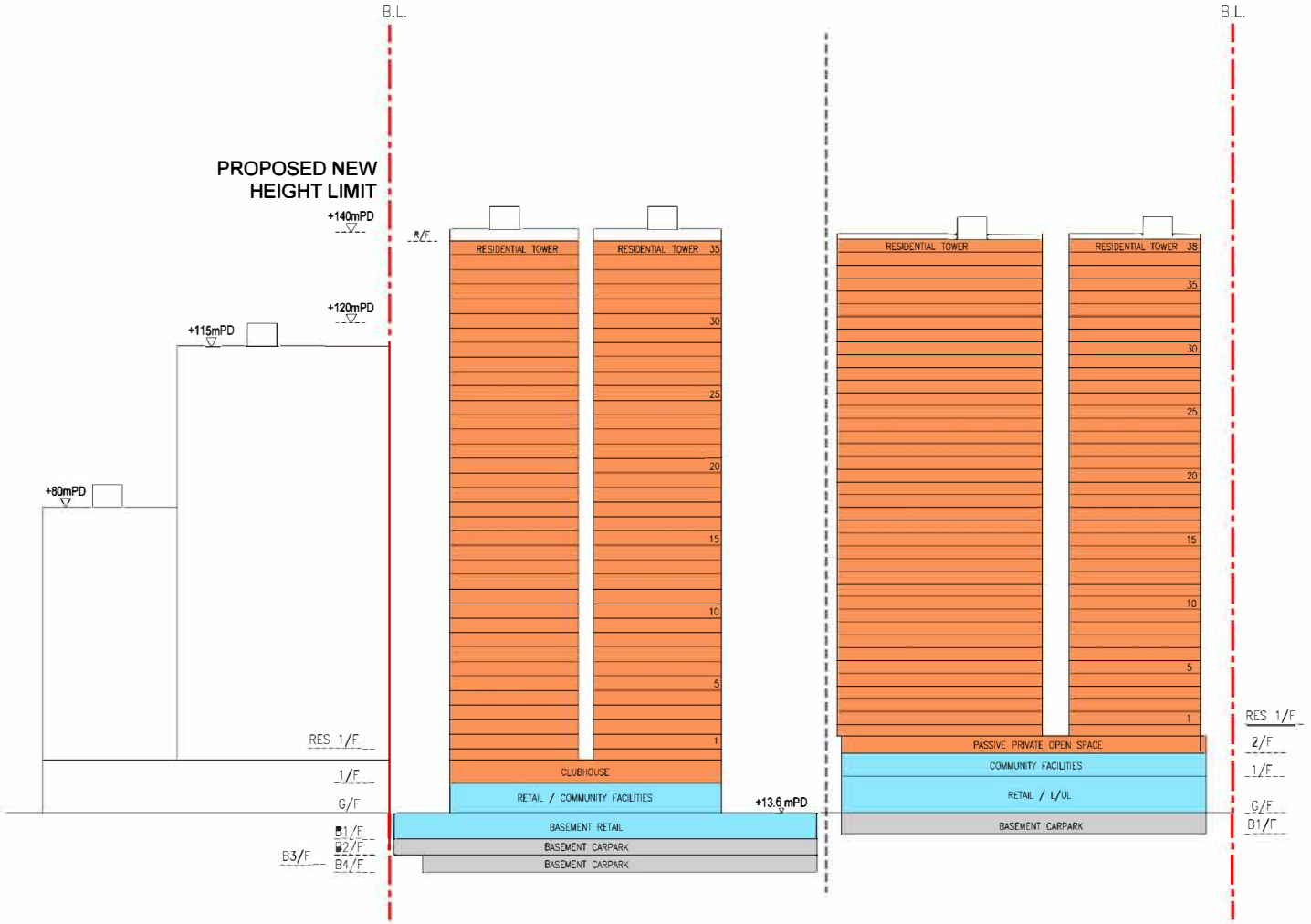


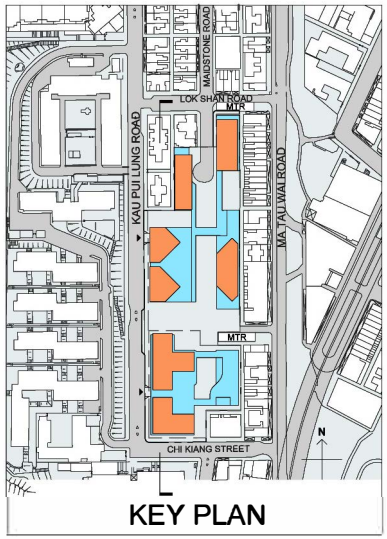
hpa
Ho & Partners Architects 何關鍾陸建築工程師樓地產發展顧問

KNT1907

NAME	SIGN	DATE
		22/11/19

AND-A-01
NOTIONAL DESIGN - 140mPD BLOCK PLAN
1:1500@A4
Appendix A - Figure 01





SECTION AA'

hpa

Ho & Partners Architects

KNT1907

NAME	SIGN	DATE
		22/11/19

ASK-A-06
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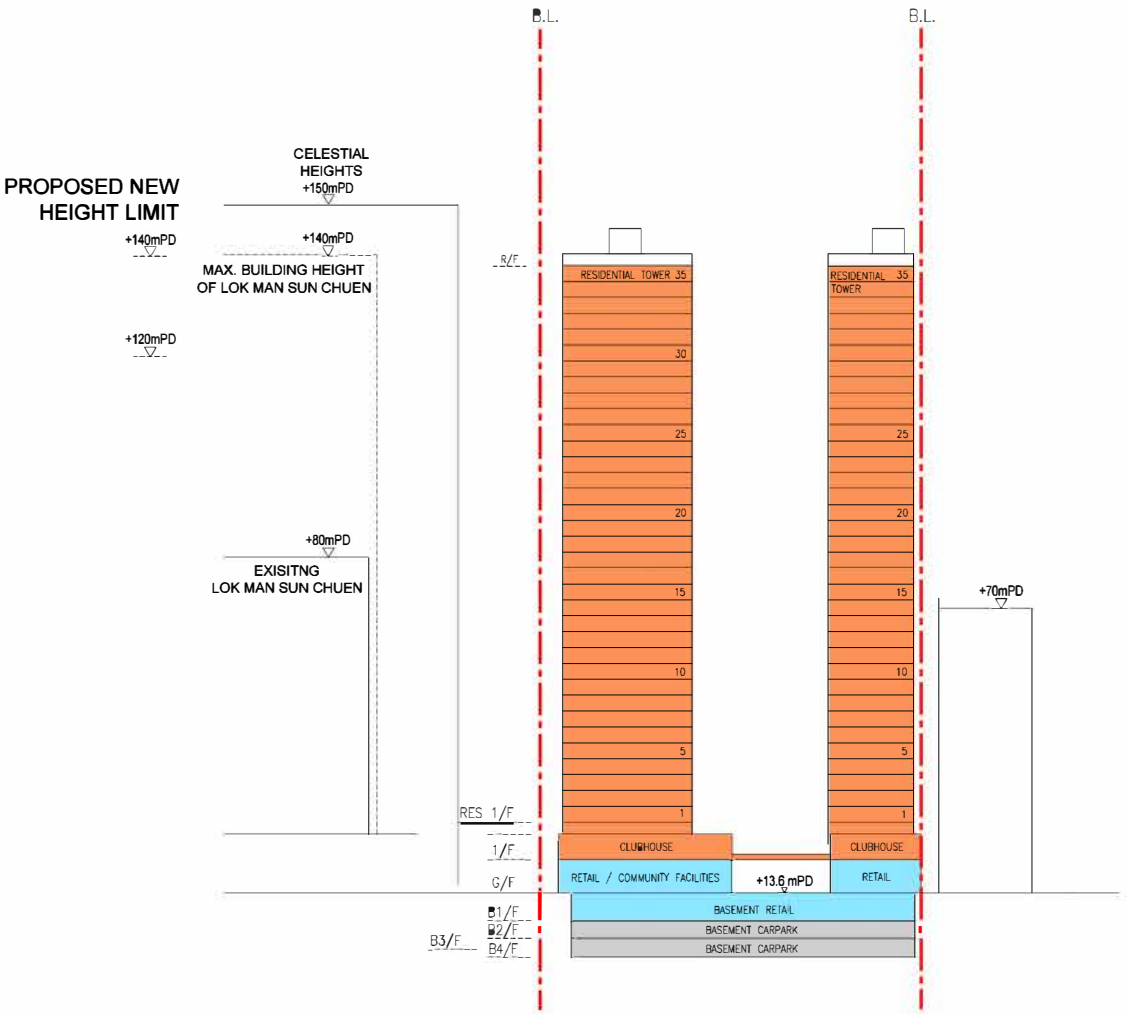
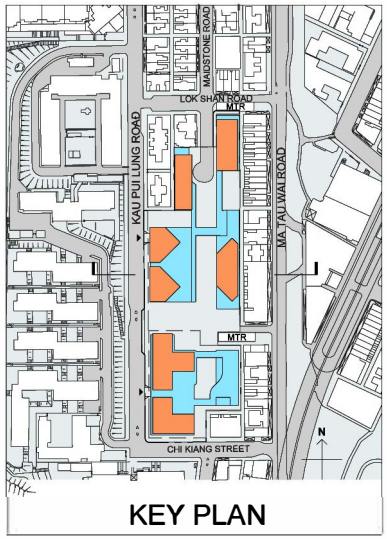
Appendix A - Figure 02



SECTION BB'



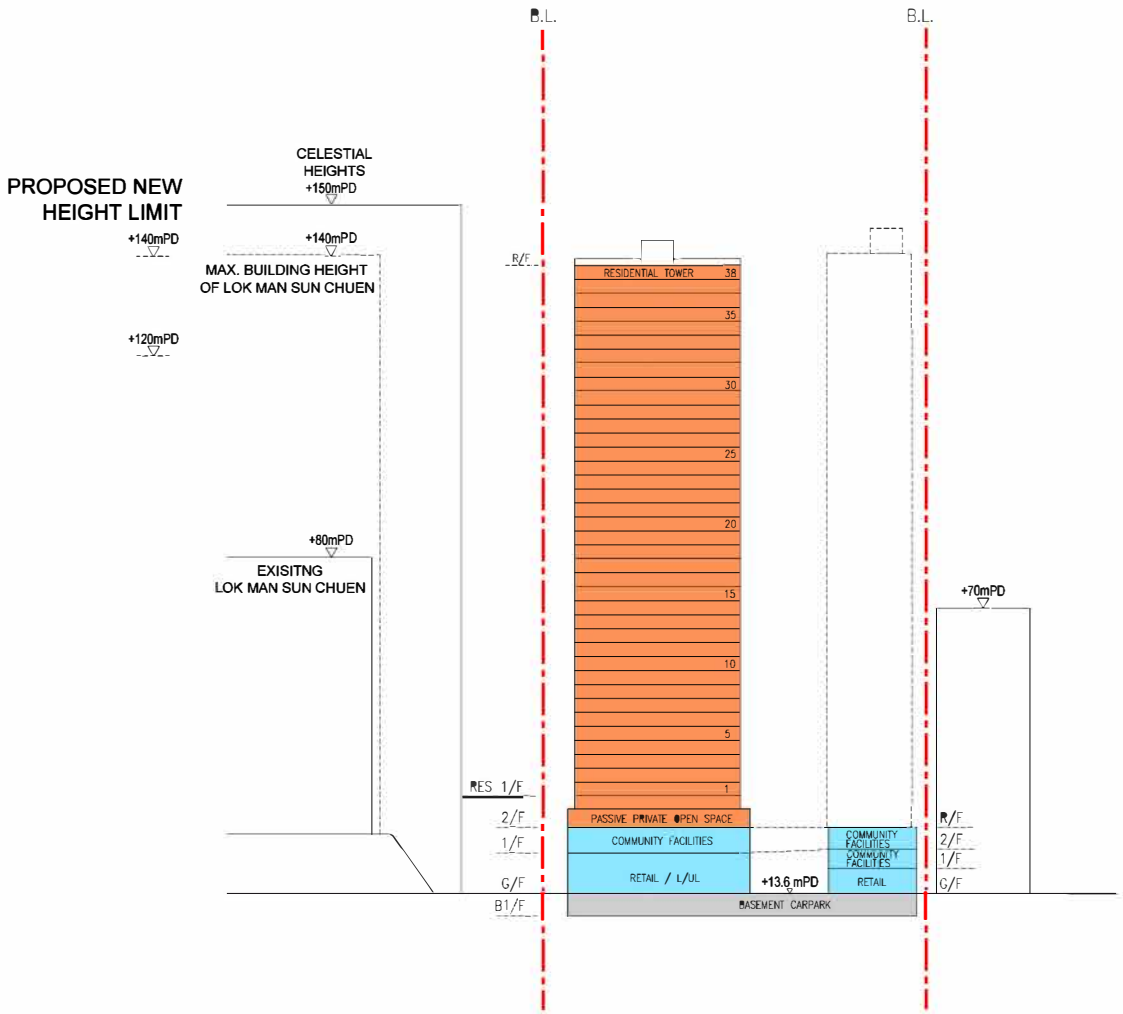
KEY PLAN

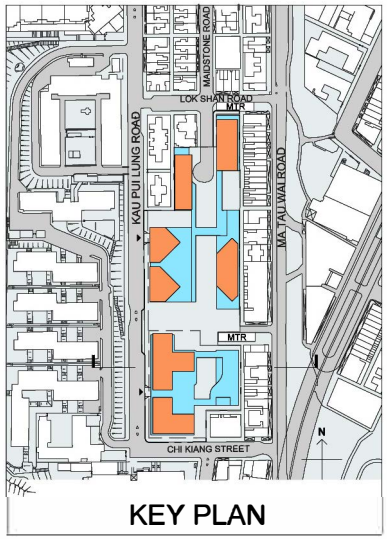
hpa 何Ho & Partners Architects

KNT1907

NAME	SIGN	DATE
		22/11/19

ASK-A-07
140mPD SECTION 1:1500@A4
Appendix A - Figure 03





KEY PLAN

SECTION CC'

hpa

何Ho & Partners Architects

KNT1907

NAME	SIGN	DATE
		22/11/19

ASK-A-08
140mPD SECTION 1:1500@A4
Appendix A - Figure 04

APPENDIX B:
FRESHWATER AND SALTWATER MAINS RECORD PLAN FROM WATER SUPPLIES DEPARTMENT

Freshwater Mains Record Plan
obtained from Water Supplies Department

URA Site

PH Site

8m WWR

WSD SUB-ALLOCATION TO LCSD

Saltwater Mains Record Plan
obtained from Water Supplies Department

URA Site

PH Site

8m WWR

WSD SUB-ALLOCATION TO LCSD

APPENDIX C:
CALCULATION OF
THE FRESHWATER AND SALTWATER DEMANDS

Table 1 - Populations

URA Site

A1. Residential Tower

1a. Total number of residential u	=	1550	units
1b. Total number of residents	=	4340	people -- (2016 Population Census: Average Household Size of 2.8)

A2. Clubhouse at First Floor (considered as Service Trade)

2a. Assumed Area	=	3900	m^2
2b. Assumed floor area per work	=	30.3	m^2 per worker -- (refer to Table 8 of CIFSUS - Community, Social & Personal Services)
2c. Total number of worker	=	129	people

A3. Retail at Basement and Ground Floor (considered as Service Trade)

3a. Assumed Area	=	9100	m^2
3b. Assumed floor area per work	=	28.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Retail Trade)
3c. Total number of worker	=	319	people

A4. Community Facilities at Ground Floor (considered as G/IC)

4a. Assumed Area	=	500	m^2
	=	0.05	ha

PH Site

B1. Residential Tower

1a. Total number of residential u	=	960	units
1b. Total number of residents	=	2688	people -- (2016 Population Census: Average Household Size of 2.8)

B2. Retail at Ground Floor (considered as Service Trade)

2a. Assumed Area	=	900	m^2
2b. Assumed floor area per empl	=	28.6	m^2 per worker -- (refer to Table 8 of CIFSUS - Retail Trade)
2c. Total number of employees	=	32	employees

B3. Community Facilities at First and Ground Floor (considered as G/IC)

3a. Assumed Area	=	1800	m^2
	=	0.18	ha

Table 2a - Water Demands of URA Site

	Type		Population (head)	Area (ha)	Freshwater			Saltwater		
					Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)	Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)
URA Site	A1	Residential	4,340	-	0.300	-	1302.00	0.070	-	303.80
	A2	Clubhouse (Service Trade)	129	-	0.035	-	4.50	0.070	-	9.01
	A3	Retails (Service Trade)	319	-	0.035	-	11.15	0.070	-	22.30
	A4	Community Facilities (G/IC)	-	0.05	-	0.200	0.01	-	0.070	0.00
						TOTAL	**1317.66**			**335.11**

Table 2b - Water Demands of PH Site

	Type		Population (head)	Area (ha)	Freshwater			Saltwater		
					Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)	Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)
PH Site	B1	Residential	2,688	-	0.300	-	806.40	0.070	-	188.16
	B2	Retails (Service Trade)	32	-	0.035	-	1.10	0.070	-	2.21
	B3	Community Facilities (G/IC)	-	0.18	-	0.200	0.04	-	0.070	0.01
						TOTAL	**807.54**			**190.38**
						TOTAL (URA Site + PH Site)	**2125.20**			**525.49**

Note:
Accuracy as shown
Refer WSD Departmental Instruction 1309 for the daily unit demand

APPENDIX D:
CAPACITY OF FRESH AND SALT WATER SERVICE RESERVOIR

水 務 署
Water Supplies Department

長沙灣辦事處
Cheung Sha Wan Office
九龍長沙灣荔康街二號水務署九龍西區大樓
WSD Kowloon West Regional Building, 2 Lai Hong Street, Cheung Sha Wan, Kowloon

RECEIVED
14 NOV 2019
BY:----------

本署檔號 *Our ref.* : (2) in WSD/K 1728/103/80 Pt.3
來函檔號 *Your ref.* : 328000509_0_002411.19

電話 *Tel.* : 2360 6113
傳真 *Fax.* : 2386 7813

7 November 2019

Ramball Hong Kong Limited
21/F, BEA Harbour View Centre,
56 Gloucester Road,
Wan Chai, Hong Kong.

(Attn: Ms Kitty Wong)

Dear Ms Wong,

Request for Information
Ho Man Tin High Level Fresh Water Service Reservoir and Salt Water Service Reservoir at To Kwa Wan

I refer to your above quoted letter dated 26.9.2019.

I attach herewith, for your information, a plan showing the 2 fresh water service reservoirs for water supply to the area around your proposed development. The capacity of Ho Man Tin East Fresh Water Service Reservoir is 152,411 m3 with daily consumption of 123 mld. Ma Tau Wai Fresh Water Service Reservoir has a capacity of 24,140 m3 with daily consumption of 36 mld.

Flushing water will be supplied via Tai Wan Salt Water Pumping Station with daily delivery of 85 mld and Lok Fu Salt Water Service Reservoir with capacity of 8,597 m3 to the proposed development.

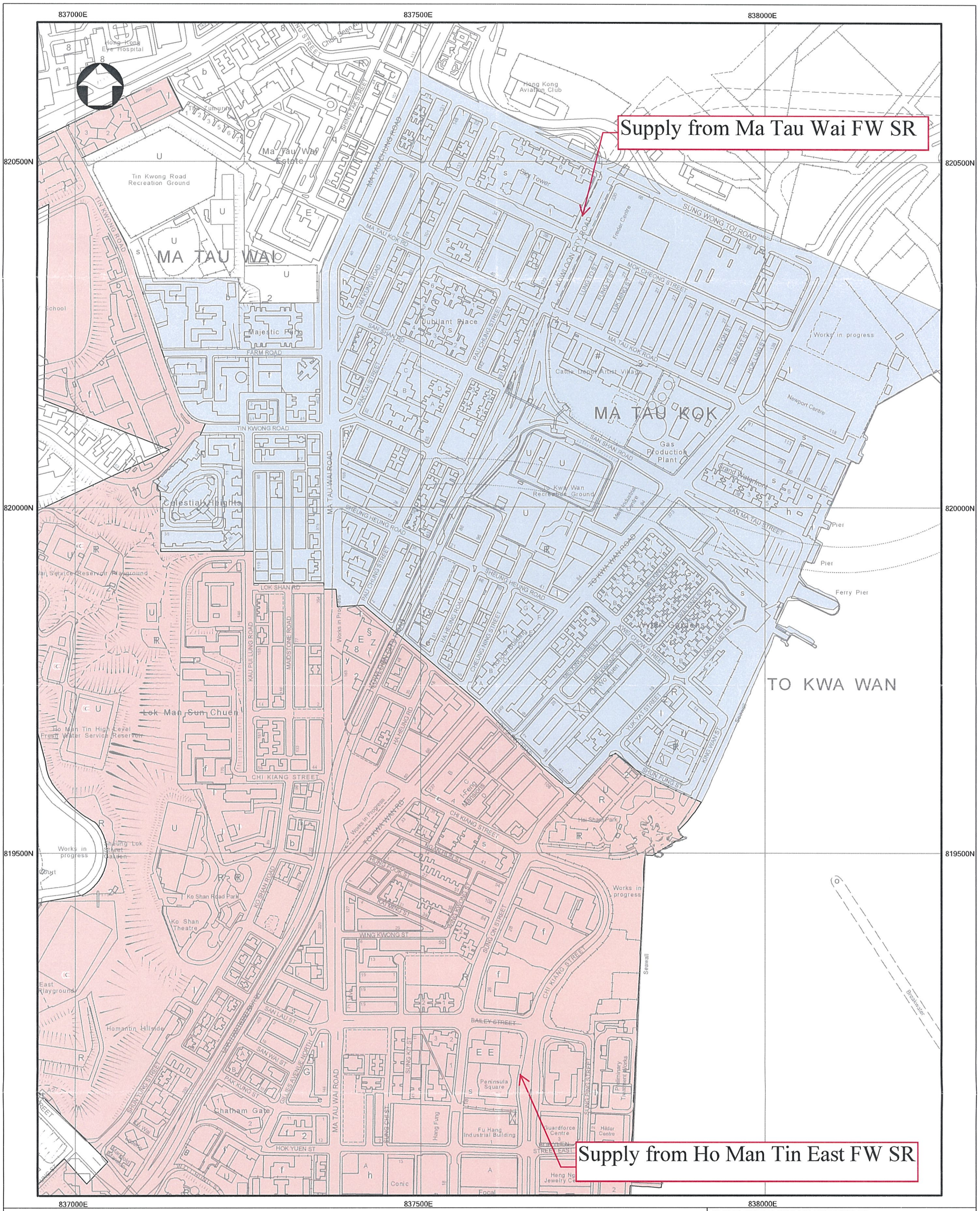
Yours faithfully,

(Thomas CHUNG)
for Chief Engineer/Kowloon
Water Supplies Department

Encl.

香港環境卓越大獎 Hong Kong Awards for Environmental Excellance
10 years+ 同心展關懷 caringorganisation

FRESH WATER



NOTES:
1. ALL DIMENSIONS ARE IN MILLIMETRES UNLESS OTHERWISE SPECIFIED.
2. ALL LEVELS ARE IN METRES ABOVE PRINCIPAL DATUM.
3. NO WSD SLOPES ARE AFFECTED IN THE VICINITY OF THE SITE.

PART COPY OF SURVEY SHEET NO(S).

11-NE-11C, 11D, 16B, 16D, 21A, 21B, 11-NW-15D, 20B, 20D & 25B

SHEET 1 OF 1 | SCALE 1:5000

水 務 署
Water Supplies Department

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WSIA (RtoC_2)

(Sep 2020)

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Water Supply Impact Assessment

Prepared for:

Urban Renewal Authority

Prepared by:
Ramboll Hong Kong Limited

Date:
August 2020

Reference Number:
R6940_v1.2

2. Water Supply Impact Assessment

2.1 Existing Water Supplies

2.1.1 According to the record plan from Water Supplies Department (WSD) in **Appendix B**, there are existing fresh water and salt water mains connected to the Subject Site.

2.1.2 Based on the information for WSD shown in **Appendix D**, the Subject Site is within the supply zones of Ho Man Tin East Fresh Water Service Reservoir with capacity of 152,411m^3 and daily consumption of 123 mld.

2.1.3 Flushing water will be supplied via Tai Wan Salt Water Pumping Station with daily delivery of 85 mld and Lok Fu Salt Water Service Reservoir with capacity of 8,597m^3.

2.2 Methodology

2.2.1 The unit water demands for the various population categories is made reference to Departmental Instruction 1309 issued by WSD and Guidelines. The number of worker is estimated based on Table 8 of Commercial and Industrial Floor Space Utilization Survey (CIFSUS) conducted by the Planning Department.

2.3 Assumption

2.3.1 As a conservative assessment, it is assumed that the URA Site provides 1550 residential units, clubhouses (about 3900m^2) on the first floor; community facilities (about 500m^2) and retail (about 9100m^2) in basement and ground floors.

2.3.2 It is also assumed that the PH Site provides 960 residential units, community facilities (about 1800m^2) and retail (about 900m^2) on the first floor and ground floor.

2.4 Discussion

2.4.1 The proposed development at the Subject Site will result in new water demands which is estimated in Appendix C and summarized in **Table 1** below. As discussed in S2.1.2 and S2.1.3 above, the existing consumption and reservoir capacity of the freshwater and saltwater serving the Site are summarized in **Table 2** below.

Table 1 Estimated Daily Freshwater and Saltwater Demand

	Daily Fresh water Demand (m^3/day)	Daily Salt water Demand (m^3/day)
URA Site	1453.91	303.80
PH Site	712.36	188.17
Total	**2166.27**	**491.97**

Table 2 Reservoir Capacity and Existing Consumption

	Freshwater (m^3/day)	Saltwater (m^3/day)
Existing Consumption	123,000	85,000 (pumping capacity)
Capacity of Reservoir	152,411	8,597

2.4.2 Based on the data given by WSD, the freshwater demand from the Subject Site (2,166.27 m^3/day) accounts for 1.4% of the capacity of the Ho Man Tin East Fresh Water Service Reservoir. Even with the existing consumption of 123 mld, the Ho Man Tin East Fresh Water Service Reservoir is considered sufficient to meet the demand. At the same time, the saltwater demand from the Subject Site (491.97 m^3/day) accounts for 0.58% of the pumping capacity of the Tai Wan Salt Water Pumping Station. There is substantial spare capacity in both the pumping station and service reservoir serving the Subject Site. Therefore, the expected increase in freshwater and saltwater demand can be accommodated by the existing water supply facilities.

2.4.3 The detailed connection arrangements for the Site and the local watermains will be reviewed in later stages of project implementation. Local upgrading and/or realignment will be implemented as required.

Construction and Maintenance

2.4.4 The Project Proponent will be responsible for the design, construction, repair and maintenance of the internal water supply facilities and connection to the main water system(s) to the satisfaction of relevant Government departments. The cost of any diversion of the existing watermains within the Subject Site boundary should be borne by the developer.

3. Overall Conclusion

3.1 Conclusion

3.1.1 Water supply assessments were conducted for the redevelopment at Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in To Kwa Wan.

3.1.2 There will be new demands for both freshwater and saltwater from the development. Based on assessment results, the demands from the Subject Site account for a small fraction of the capacity of the reservoirs and therefore, can be accommodated from the existing supply facilities.

3.1.3 It is concluded that the proposed development can be implemented without any adverse water supply impacts.

APPENDIX C:
CALCULATION OF
THE FRESHWATER AND SALTWATER DEMANDS

Table 1 - Populations

(The water supply impact were assessed with conservative approach by adopting larger area and number of residential units.)

URA Site

A1. Residential Tower

1a. Total number of residential units	=	1550	units
1b. Total number of residents	=	4340	people -- (2016 Population Census: Average Household Size of 2.8)

A2. Clubhouse at First Floor (considered as Service Trade)

2a. Assumed Area	=	3900	m^2

A3. Retail at Basement and Ground Floor (considered as Service Trade)

3a. Assumed Area	=	9100	m^2

A4. Community Facilities at Ground Floor (considered as G/IC)

4a. Assumed Area	=	500	m^2
	=	0.05	ha

PH Site

B1. Residential Tower

1a. Total number of residential units	=	960	units
1b. Total number of residents	=	2688	people -- (2016 Population Census: Average Household Size of 2.8)

B2. Retail at Ground Floor (considered as Service Trade)

2a. Assumed Area	=	900	m^2

B3. Community Facilities at First and Ground Floor (considered as G/IC)

3a. Assumed Area	=	1800	m^2
	=	0.18	ha

Table 2a - Water Demands of URA Site

	Type		Population (head)	Area (ha)	Freshwater			Saltwater		
					Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)	Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)
URA Site	A1	Residential	4,340	-	0.300	-	1302.00	0.070	-	303.80
	A2 & A3	Residential (Service Trade)	4,340	-	0.035	-	151.90	-	-	-
	A4	Community Facilities (G/IC)	-	0.05	-	0.200	0.01	-	0.070	0.00
						TOTAL	**1453.91**			**303.80**

Table 2b - Water Demands of PH Site

	Type		Population (head)	Area (ha)	Freshwater			Saltwater		
					Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)	Daily Unit Demand (m^3/head/day)	Daily Unit Demand (m^3/ha/day)	Daily Demand (m^3/day)
PH Site	B1	Residential	2,688	-	0.230	-	618.24	0.070	-	188.16
	B2	Residential (Service Trade)	2,688	-	0.035	-	94.08	-	-	-
	B3	Community Facilities (G/IC)	-	0.18	-	0.200	0.04	-	0.070	0.01
						TOTAL	**712.36**			**188.17**
						TOTAL (URA Site + PH Site)	**2166.27**			**491.97**

Note:
1. Accuracy as shown
2. Refer WSD Departmental Instruction 1309 for the daily unit demand
3. For non-domestic users: Service Trade - The unit demand for service trades (per head of residential population) is in accordance with the DI corresponding to the supply zones.
4. The water supply impact were assessed with conservative approach by adopting larger area and number of residential units.

Stage 2 Social Impact Assessment

市區重建局
URBAN RENEWAL AUTHORITY

Kau Pui Lung Road / Chi Kiang Street
Development Scheme (CBS-2:KC)

Stage 2 Social Impact Assessment

July 2020

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1. INTRODUCTION

1.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive, the Urban Renewal Authority (URA) was invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (the Scheme) aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. According to the directive under the PAs, some of the land within the Scheme is to be earmarked for public housing development upon approval.

1.2 The new Urban Renewal Strategy (URS) issued by the Government in February 2011 states that the URA will carry out Social Impact Assessment (SIA) studies in the form of "*a Stage 1 social impact assessment ….. before the publication of any proposed redevelopment project in the Government Gazette"*; and *"a Stage 2 social impact assessment …. after the proposed project has been published in the Government Gazette*".

1.3 The URS also states "*Early social impact assessments will be initiated and conducted by the DURF (District Urban Renewal Forum) before redevelopment is recommended as the preferred option. The URA will update these assessments by DURF before implementing any specific redevelopment project.*". As the early SIA conducted by Kowloon City DURF ("KC DURF") does not cover the area of the Scheme, there is no early SIA conducted by DURF which the URA could update for this Development Scheme.

1.4 The URA published in the Government Gazette the commencement of the Scheme by way of a development scheme under section 25 of the Urban Renewal Authority Ordinance on 22 May 2020. On the same day the Stage 1 SIA was made available for public inspection. This Stage 2 SIA report is based on the factual data and opinions collected as part of the freezing survey for this Scheme conducted from 22 May 2020 to 24 May 2020, and from the follow-up survey visits by appointment conducted up to 12 June 2020. The report only covers the information up to 12 June 2020.

1.5 This report covers the elements listed in paragraph 37 of the URS for the affected residents, families and businesses within the Scheme, including:-

(a) the population characteristics of the residents affected by the proposed project;
(b) the socio-economic characteristics of the affected residents;
(c) the rehousing needs of the affected tenants;
(d) the relocation needs of the affected shop operators;
(e) the housing preferences of the affected owners and tenants;
(f) the employment status of the affected owners and tenants;
(g) the place of work of the affected owners and tenants;
(h) the social networks of the affected owners and tenants;
(i) the educational needs of children of the affected families;
(j) the special needs of the elderly;
(k) the special needs of the disabled;
(l) the special needs of single-parent families, particularly those with small children;
(m) a detailed assessment of the potential social impact of the proposed project; and
(n) a detailed assessment of the mitigation measures required.

1.6 The Lutheran Church-Hong Kong Synod has been commissioned by the Urban Renewal Fund (URF) to act as the Social Service Team (SST) for this Scheme. They are tasked to provide assistance and advice to residents and business operators affected by the Scheme. Cases requesting assistance and those identified in the course of the SIA analysis as requiring assistance will be referred to the SST within two months for their follow-up actions.

2. BACKGROUND

2.1 The Scheme is located in Kowloon City District, which is bounded by a row of buildings at Ma Tau Wai Road to the east, Ming Fat Building and Chi Kiang Street to the south, Morning Joy Building, City 151 and Kau Pui Lung Road to the west and 80 Maidstone Road and Lok Shan Road to the north (**Figure 2.1**). It covers a gross site area of about 16,473 sq.m, subject to site survey, involving a cluster of 30 CBS sites developed under 28 CBSs (i.e. 3 of the CBS sites are developed under 1 CBS): Nos. 59-77, 99-117, 123-133 Maidstone Road (odd nos.), Nos. 82-128 Maidstone Road (even nos.), Nos. 153-175, 181-189 Kau Pui Lung Road (odd nos.), Nos. 1-3, 7-9 Kiang Su Street (odd nos.), Nos. 4-14 Kiang Su Street (even nos.), Nos. 52-58, 52A-58A Chi Kiang Street (even nos.), a portion of Maidstone Road and Kiang Su Street, government lanes, and portion of the surrounding public pavement, forming a comparatively completed land parcel for high density residential development. Subject to detailed design, the net site area used to calculate the development potential of the Scheme is about 15,475 sq.m (subject to site survey).

2.2 With the aim to increase the housing supply by piloting CBS redevelopment as set out in paragraphs 53 and 54 of the PA in 2018, the Scheme has been selected according to the prescribed multiple factors including but not limited to the following: cluster of CBS sites in high-density development areas (i.e. R(A) zone under the Outline Zoning Plan) in the urban districts, numbers of CBS involved, proximity to existing public rental housing and other ancillary facilities, building age and its existing development density.

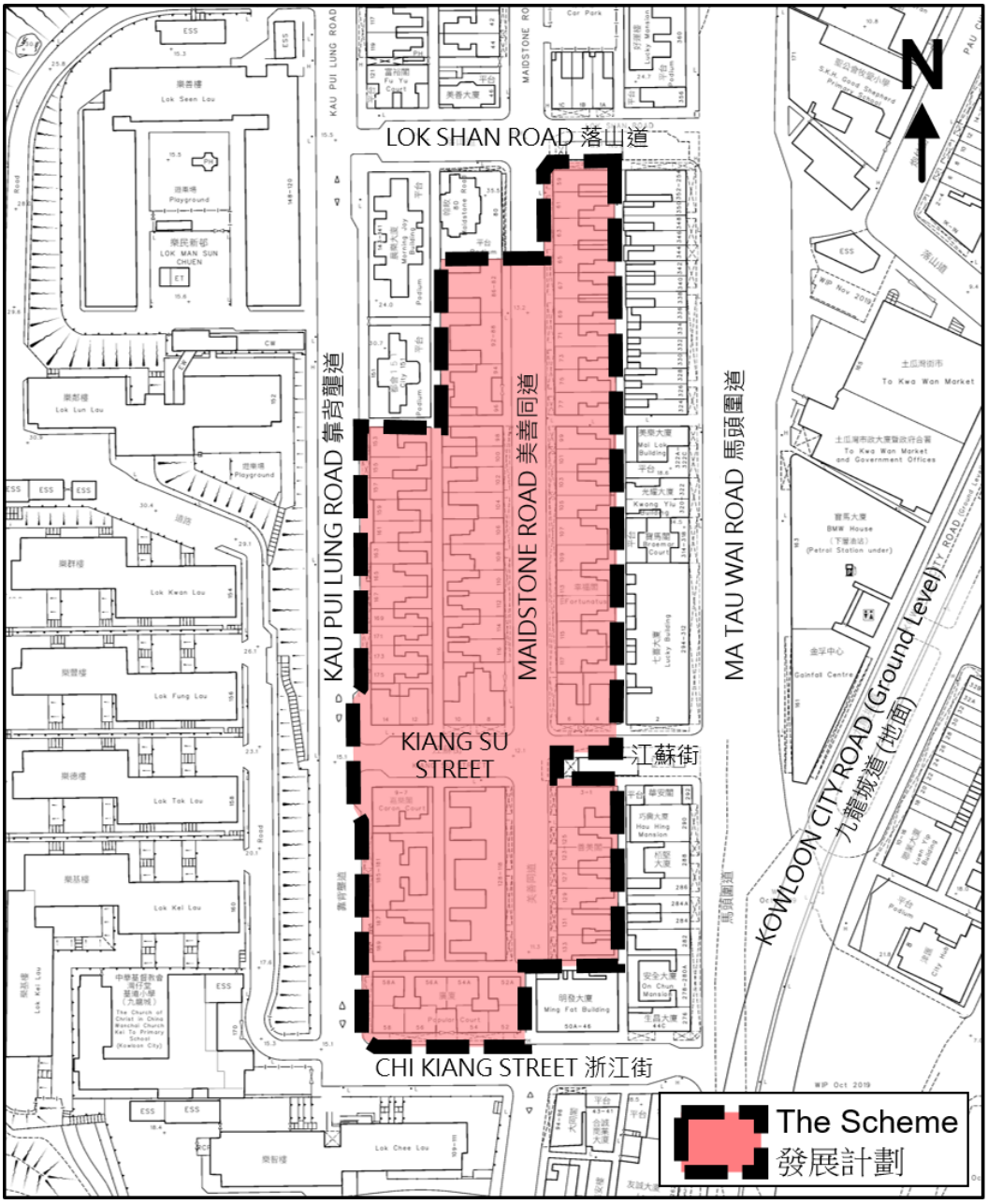


Figure 2.1 Location Plan

Distribution of Units and Households

2.3 The Freezing Survey (FS) successfully surveyed 428 domestic households (up to 12 June 2020). The detailed breakdowns of surveyed and the unsurveyed units will be illustrated in Section 3. **Table 2.1** shows the results of FS and SIA surveys within the Scheme[1]. For those who refused to do the SIA questionnaires, those who refused to answer particular questions in the SIA questionnaire and those who have not submitted the SIA questionnaires, have been categorized as "Nil Response" in the report.

[1] *The actual status of the information from the surveys has not been verified. All responses are based on the questionnaire surveys only.*

Table 2.1 Results of FS and SIA Surveys within the Scheme (as of 12 June 2020)

	No. of Households
Total No. of surveyed households	428
Successfully responded to both FS and SIA questionnaire	376
Only responded to FS but not completed SIA questionnaire	52

Business Operators and Non-domestic Premises

2.4 Regarding non-domestic uses, the FS successfully surveyed 2 business operators (up to 12 June 2020), occupying 1 wall shop for non-domestic use and 1 upper domestic unit for mixed use. The details will be illustrated in Section 11.

Views on redevelopment

2.5 Among 376 households responded to both FS and SIA questionnaire, 207 households indicated that they either strongly supported or supported the proposed Scheme while 55 households indicated that they either strongly against or against the proposed Scheme. The remaining 114 households had no comment or nil response to the question. These views collected from FS indicate the initial view of those respondents towards the proposed redevelopment and did not constitute any indication of owner to sell/ not to sell their properties.

Opinions on physical condition and living environment

2.6 About 30% of the surveyed households indicated that the problems of noise nuisance, outdoor air pollution / poor air quality and concrete spalling happened or occasionally happened to their accommodation. Meanwhile, the surveyed households generally indicated that no problem in terms of the living environment.

3. POPULATION & HOUSEHOLD CHARACTERISTICS

3.1 Except stated otherwise, the territorial average numbers used for comparison in this report are based on the 2016 Population By-census, and the assessments will be based on the latest available information for comparison where appropriate.

3.2 The total number of domestic units according to the approved GBP is 462. The population and household characteristics as surveyed in the Scheme is listed in **Table 3.1** and the status of surveyed units is shown in **Table 3.2** below.

Table 3.1 Population and Household Characteristics as surveyed in the Scheme (as of 12 June 2020)

Actual Successfully Surveyed Units	428 units (refer to **Table 3.2** below)
Total Number of surveyed Households	428 households
Total Population	1,424 persons
Average Household Size	About 3.3 persons per household; higher than the territorial average of 2.8 persons per household.
Degree of Sharing	1.0 (428 households / 428 surveyed units); similar to the territorial average of 1.0 for private permanent housing.

Table 3.2 Status of Surveyed Units (as of 12 June 2020)

	Domestic Use according to the original approved GBP	**Number of Households**
Surveyed units for domestic use	427	427
Surveyed unit for both Domestic and Non-Domestic Use (Mixed Use)	1	1
Unsurveyed units*	34	N/A

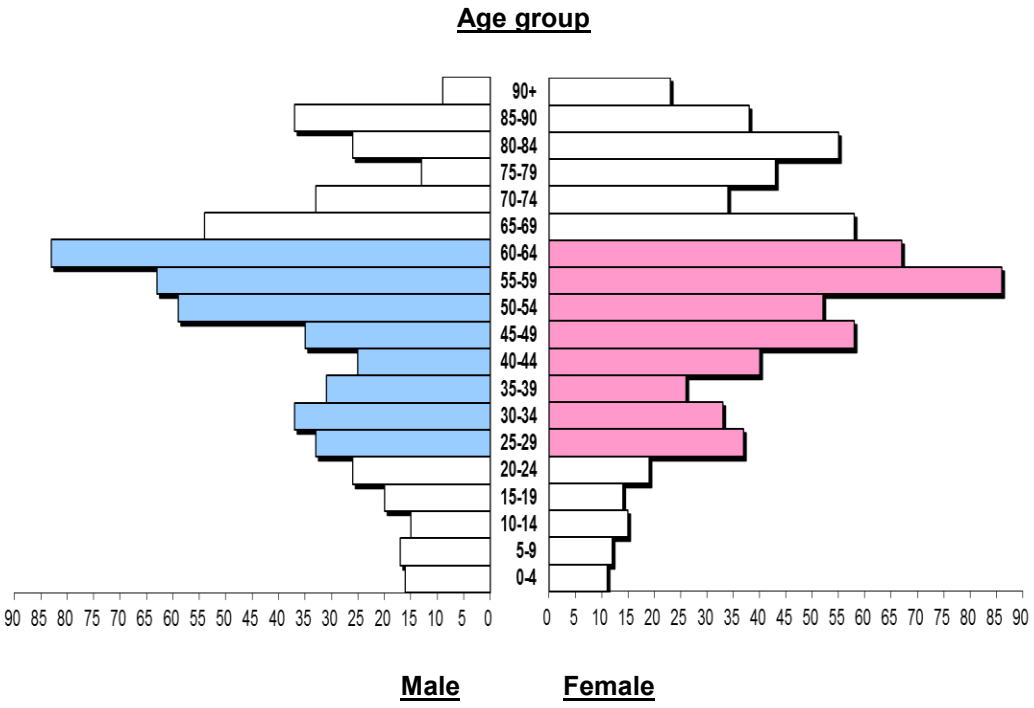
* According to the approved GBP, ground floors of the buildings at No. 7-9 Kiang Su Street (odd nos.) and at Nos. 118-128 Maidstone Road (even nos.) are non-domestic uses as covered children play area and carport respectively and both are unsurveyed.

3.3 A total of 1,424 residents were recorded in the Freezing Survey, 661 were male, 761 were female, and 2 residents did not provide any information. The distribution gives a ratio of about 87 male residents to every 100 female residents. **Figure 3.1** and **Table 3.3** shows the age structure of the surveyed population. The percentage of elderly is much higher than the territory wide level and the details of their special needs will be illustrated in Section 10.

Table 3.3 Age Structure of the Population (as of 12 June 2020)

Age Group	Surveyed in the Scheme	Territory Wide Level (para. 3.1 refers)	Comparison
0-14 (Children)	6%	11%	Lower
15-24 (Youth)	5%	11%	Lower
25-64 (economically active age group)	54%	62%	Lower
65+ (Elderlies)	30%	16%	Higher
No age information provided	5%	/	/
Total	**100%**	**100%**	

Figure 3.1 Age Structure



3.4 The distribution of surveyed household sizes is shown in **Table 3.4**. The percentage of 6 persons or above household within the Scheme is about 12% higher than that of 3% in territory wide level. Besides, there are 64 households (about 15%) with family of 3 generations and 1 household with family of 4 generations in one domestic unit. The special housing needs of these households will be discussed in Sections 5 and 12.

Table 3.4 Distribution of household size (as of 12 June 2020)

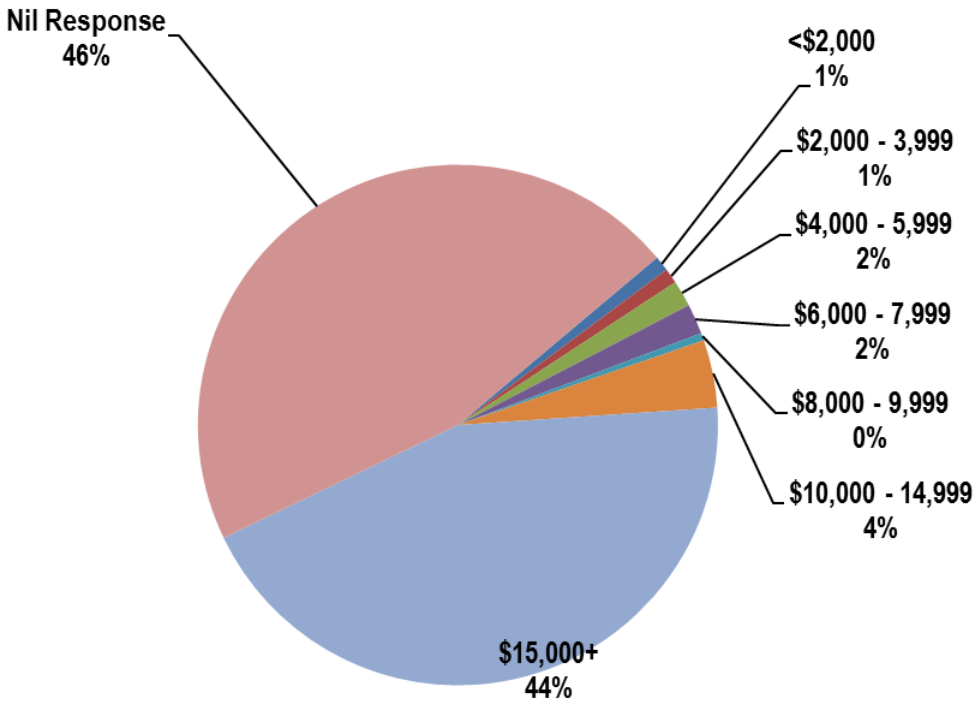
<table>
<tr><th>Household Size (persons)</th><th colspan="2">Surveyed in the Scheme</th><th>Territory Wide Level (para. 3.1 refers)</th><th>Comparison</th></tr>
<tr><td>0 (vacant)</td><td colspan="2">1%</td><td>N/A</td><td>N/A</td></tr>
<tr><td>1</td><td colspan="2">12%</td><td>18%</td><td>Lower</td></tr>
<tr><td>2</td><td colspan="2">24%</td><td>27%</td><td>Lower</td></tr>
<tr><td>3</td><td colspan="2">18%</td><td>24%</td><td>Lower</td></tr>
<tr><td>4</td><td colspan="2">22%</td><td>20%</td><td>Higher</td></tr>
<tr><td>5</td><td colspan="2">11%</td><td>8%</td><td>Higher</td></tr>
<tr><td>6</td><td>7%</td><td rowspan="3">12%</td><td rowspan="3">3%</td><td rowspan="3">Higher</td></tr>
<tr><td>7</td><td>3%</td></tr>
<tr><td>8 or above</td><td>2%</td></tr>
<tr><td>Total</td><td colspan="2">100%</td><td>100%</td><td>/</td></tr>
</table>

4. SOCIO-ECONOMIC CHARACTERISTICS

Income Level

4.1 This section will be based on the 428 households and 1,424 residents surveyed as of 12 June 2020. The distribution of household income is shown in **Figure 4.1** below.

Figure 4.1 Distribution of Household Income (HK$ per month) (428 surveyed households as of 12 June 2020)



	Surveyed in the Scheme	Territory Wide Level (para. 3.1 refers)	Comparison
Monthly income less than HK$10,000 per month	6%	19%	Lower
Monthly income less than HK$4,000 per month	2%	6%	Lower
Comprehensive Social Security Assistance (CSSA) Recipients	1% (4 households)	About 4% as at May 2020[2]	Lower

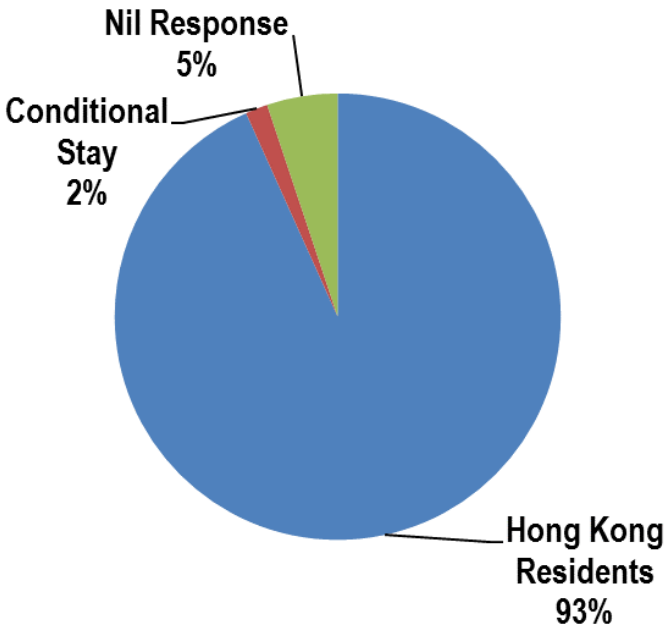
[2] *'CSSA caseload for May 2020, 16 June 2020, Press Release The Government of the Hong Kong Special Administrative Region.*

4.2 The URA and the SST will pay particular attention and offer assistance to those in need of help and refer them to relevant services and practical assistance from various Government Departments and services providers. Since the Scheme commencement, the URA and the relevant government departments have set up hotlines for the residents aiming to collect and offer direct assistance to those seeking help. For details, please refer to para. 12.8.

Residence

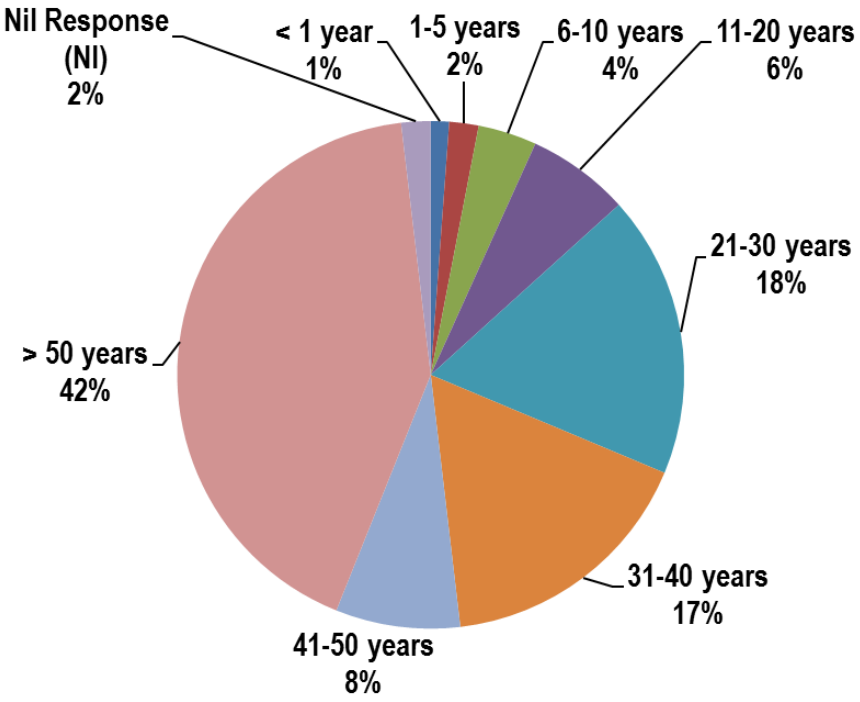
4.3 Twenty-three (23) residents (about 2%) were subject to conditions of stay in Hong Kong, as shown in **Figure 4.2**. None of them were found in tenant households.

Figure 4.2 HKSAR Resident Status (Total 1,424 residents in 428 surveyed household as of 12 June 2020)



4.4 The number of years of residency is shown in **Figure 4.3**. A total of 363 households (about 85%) have lived within the Scheme continuously for over 20 years. This group might find it more difficult to adjust to a new living environment. The assistance from the SST in providing orientation services and holding community gatherings will be important in helping these residents adapt to their new living environment. The long residence may have generated high dependency on the social network, existing educational, medical and community facilities in the district. Possible mitigation measures on these issues through offering rehousing options in the same district will be discussed in Sections 5 and 12.

Figure 4.3 Period of Residence at Current Premises (Total 428 surveyed households as of 12 June 2020)

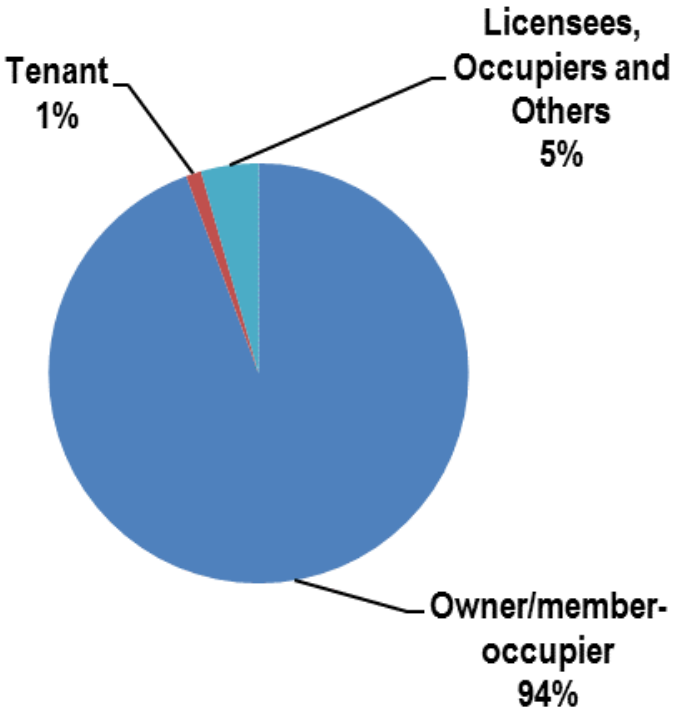


5. HOUSING

Re-housing Needs and Location Preference

5.1 **Figure 5.1** shows the occupancy status of households [3]. There are 404 owner/member-occupier households (94%) (261 households in units of dissolved CBS and 143 households in units of undissolved CBS classified as "owner/member-occupier households" for analysis purpose) and 24 others households[4] (6%) (5 tenants (1%) and 19 licensees, occupiers and others (5%), they are classified as "others households" for analysis purpose).

Figure 5.1 Occupancy Status of Households (Total 428 surveyed households as of 12 June 2020)



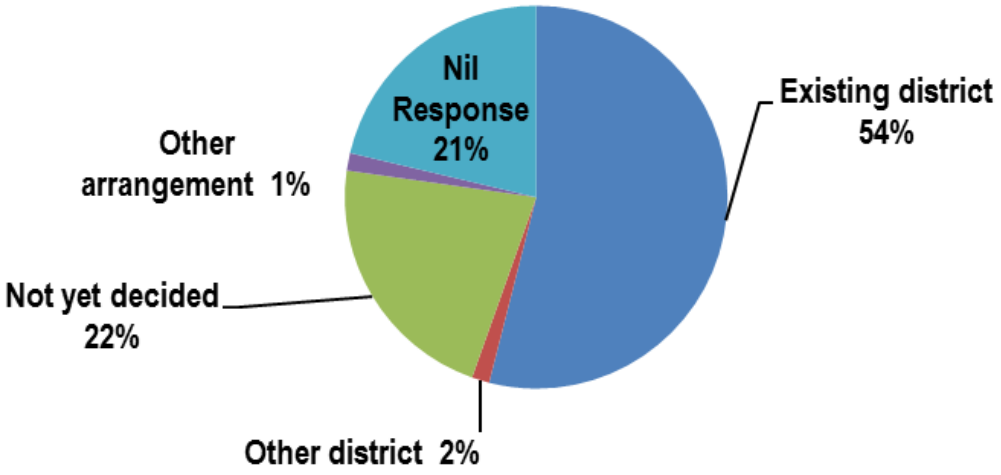
[3] *The actual occupancy and CBS membership status of the households has not been verified. All responses related to the occupancy status of households are based on the questionnaire surveys only.*

[4] *As listed in the FS and SIA questionnaire, other than owner-occupiers, the other 6 options including tenant, principal tenant, sub-tenant, licensee, occupier and others are classified as "others households" for analysis purpose.*

Affected Owner/member-occupier Households (404 Households as of 12 June 2020)

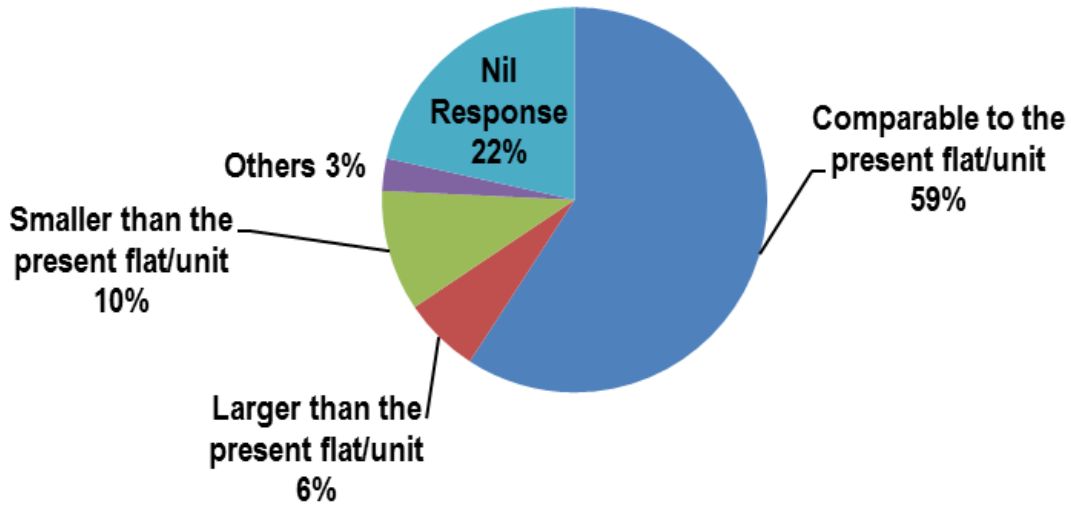
5.2 **Figure 5.2** shows the 404 surveyed owner/member-occupier households' preference of finding alternative accommodations in the existing district (i.e. Kowloon City) or in other districts.

Figure 5.2 Preference of Alternative Accommodation Location (404 owner/member-occupier households as of 12 June 2020)



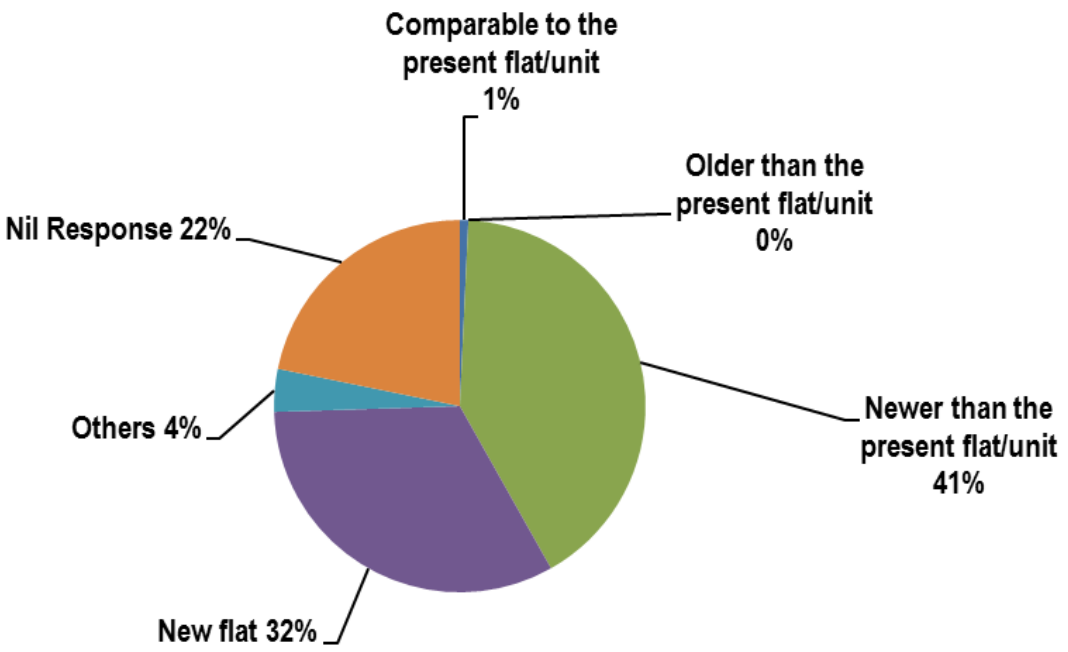
5.3 **Figure 5.3** shows the owner/member-occupier households' preference on flat size for the new accommodation.

Figure 5.3 Preference of Flat Size (404 owner/member-occupier households as of 12 June 2020)



5.4 **Figure 5.4** shows the owner/member-occupier households' preference on building age for the new accommodation. A relatively high percentage (about 32%), comparing to the URA's past experience in the same district, of households preferred a new flat.

Figure 5.4 Preference of Building Age (404 owner/member-occupier households as of 12 June 2020)



5.5 Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely home purchase allowance). For the CBS members/ex-members not yet settled the outstanding land premium to the Government, they have to settle the premium to release the alienation restriction before they can assign legal titles of their flats to the URA. The Government has reviewed its basis for land premium assessment and "Existing Use Land Value" will be adopted as the basis for assessment as this is not a CBS members/ex-members' self-initiated redevelopment. For details, please refer to para. 12.14.

5.6 As an additional option to cash offer, 'Flat-for-Flat' (FFF) option will be offered by the URA for eligible owner-occupiers according to para. 12.17. Besides, the Dedicated Rehousing Estate (DRE) near Muk Chun Street in Kai Tak Development Area (Kowloon City District) developed and managed by the Hong Kong Housing Society (HKHS) is another option offered at a discount market price similar to subsidized housing by the Government as mentioned in PA in 2018. However, an owner-

occupier who choses this option by the HKHS cannot join the FFF arrangement by URA. For details, please refer to para. 12.13 and 12.17. The two options can provide an opportunity for those households preferred buying a new flat in the district.

Affected Others Households (24 Households as of 12 June 2020)

5.7 Only 10 out of the 24 others households selected an option for the preference on new accommodation that 6 preferred private housing, 3 preferred public housing and 1 preferred URA rehousing.

5.8 According to the agreement made between the URA and the Hong Kong Housing Authority (HKHA) and HKHS, they will provide flats within their estates for rehousing eligible tenants. The URA will liaise with HKHA and HKHS to reserve flats in available estates to cater for the potential demand. Subject to the availability of rehousing flats, the URA will endeavour to arrange allocation of rehousing flats for the eligible tenants in East Kowloon as far as practicable.

6. EMPLOYMENT STATUS AND PLACE OF WORK

6.1 The employment status of 1,424 surveyed residents (including 1,356 in owner/member-occupiers households and 68 in others households) is analyzed in para. 6.2 to 6.5 below.

6.2 **Figures 6.1 and 6.2** show details of employment status of the affected residents of owner/member-occupier households and others households respectively. The findings of the survey show that the proportion of the retired residents of owner/member-occupier households (about 32%) is relatively high. Particular attention shall be paid to those retired residents if there is financial difficulty. The URA with the support of SST will offer timely assistance to relieve their anxiety. If the Scheme is to be implemented, the eligible households will receive cash offer under URA's prevailing acquisition policy.

Figure 6.1 Employment Status of Affected Residents of Owner/member-occupier Households (Total 1,356 residents in 404 surveyed households as of 12 June 2020)

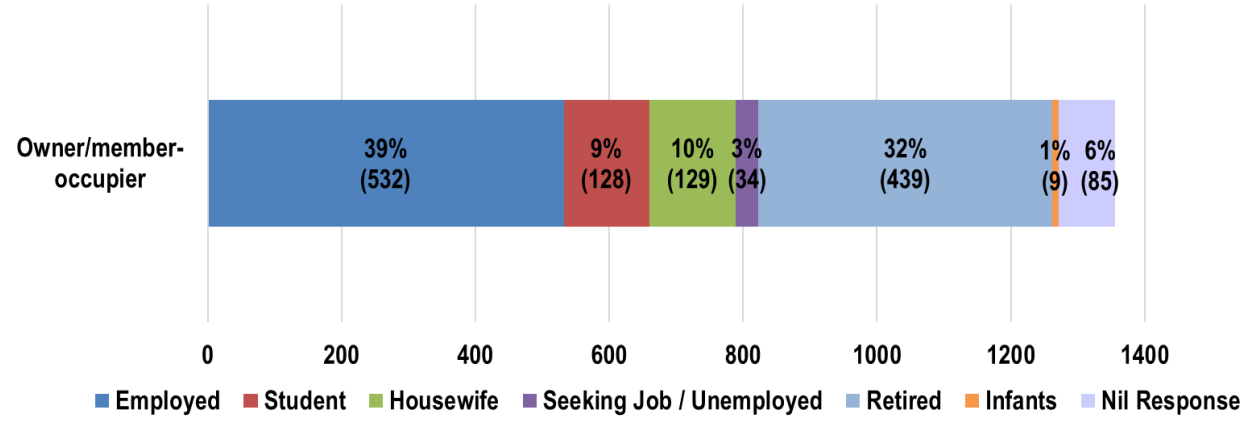
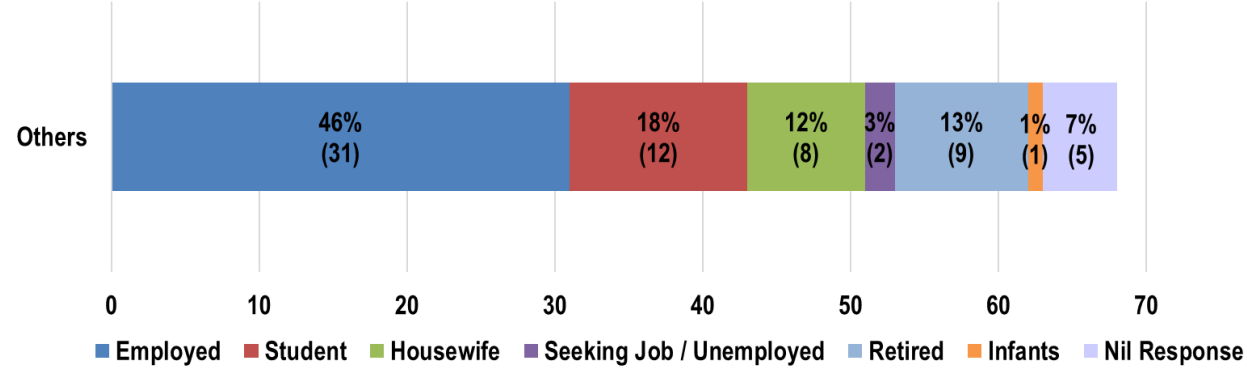


Figure 6.2 Employment Status of Affected Residents of Others Households (Total 68 residents in 24 surveyed households as of 12 June 2020)



6.3 The findings of the survey also show that the unemployment rate of the residents of owner/member-occupier households and others households (3% and 3% respectively), are both lower than the territory-wide unemployment rate of 5.9% (seasonally adjusted, for the period from Mar 2020 to May 2020[5]). There may be financial difficulty for this group of unemployed residents in the Scheme. If the Scheme is to be implemented, the eligible households will be subject to the URA's prevailing acquisition and tenant's ex-gratia allowance policies.

6.4 **Table 6.1** shows the percentage share of different places of work of the employed persons within owner/member-occupier and others households.

Table 6.1 Percentage Share of Different Places of Work of the Employed Persons within Owner/member-occupier and Others Households (as of 12 June 2020)

	Employed Persons in surveyed Owner/member-occupier Households (532 Residents)	Employed Persons in surveyed Others Households (31 Residents)
Kowloon City	13%	32%
Wong Tai Sin & Kwun Tong	12%	3%
Yau Tsim Mong	13%	16%
Sham Shui Po	2%	0%
Kwai Tsing & Tsuen Wan	6%	7%
Hong Kong Island	27%	26%
New Territories & Outlying Islands	11%	7%
Outside Hong Kong (including Mainland China)	5%	3%
No Fixed District	9%	6%
Nil Response	2%	0%

[5] *Information from website of Census and Statistic Department as at 17 June 2020.*

7. EMPLOYMENT AND ECONOMIC IMPACTS

7.1 **Table 7.1** summarizes the impacts of the proposed redevelopment on employment and economic conditions as anticipated by the 404 surveyed domestic owner/member-occupier households and 24 others households.

7.2 For impact on employment, around half (48% and 54% respectively) said there would be no impact. For those expressing negative impacts (11% and 4% respectively), they were concerned about the increase in transport expenditure and longer travelling time to workplace. For those concerned others households, the URA will endeavour to meet the locational preferences of residents for public rental housing from the HKHA and the HKHS subject to their eligibilities and the availability of flats at that time. The SST will investigate the needy cases as identified and depending on justifications, may make recommendations for rehousing on compassionate grounds.

Table 7.1 Anticipated Impacts on Employment and Economic Conditions (as of 12 June 2020)

Anticipated Impacts		Affected Owner/member-occupiers (404 surveyed Households)	Affected Others (24 surveyed Households)
Employment Condition	Positive Impact	2%	4%
	No Impact	48%	54%
	Negative Impact	11%	4%
	No Response	39%	38%
Economic Condition	Positive Impact	9%	12%
	No Impact	17%	25%
	Negative Impact	38%	38%
	No Response	36%	25%

7.3 For those expressing negative impacts on economic condition (38% and 38% respectively), their key concerns were about the less savings and additional expenditure resulting from the proposed Scheme. This is understandable as there are about 439 retired residents. The URA with the support of SST shall offer timely assistance to those residents if there is financial difficulty according to para. 6.2. Besides, if the Scheme to be implemented, the URA and the Government will synchronize the offer on the amount of outstanding premium to be settled to the

Government with the URA's acquisition offer, such that owner-occupiers accepting the offer shall not require to use their own savings to settle the outstanding premium. This aims to relieve their key concerns mentioned above.

8. SOCIAL NETWORK

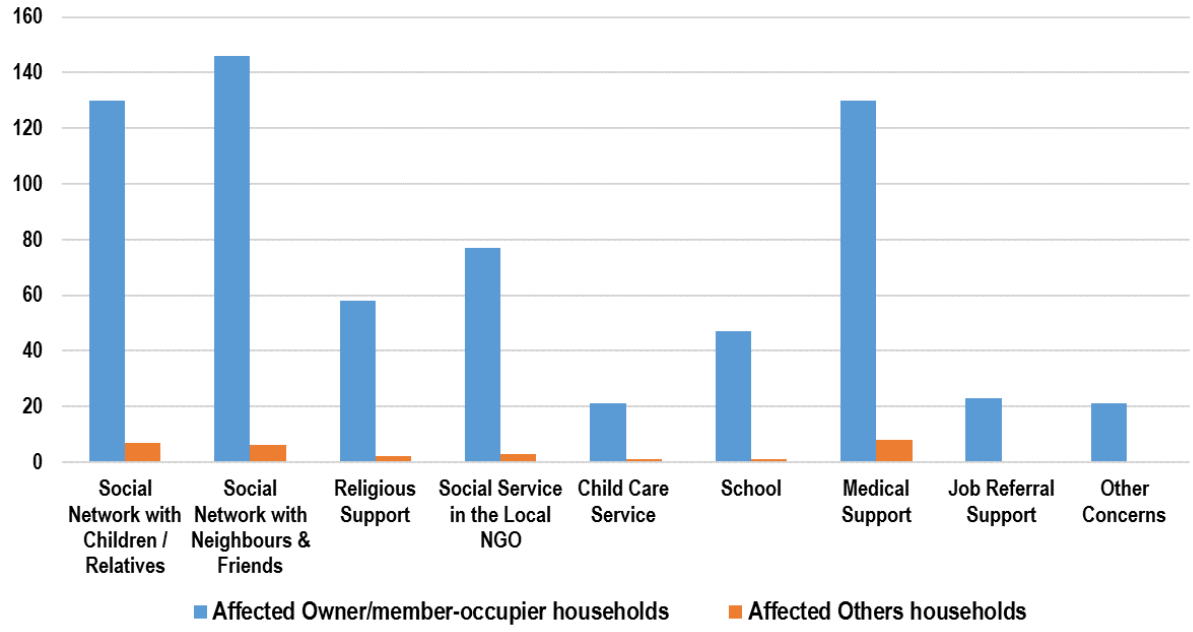
8.1 The likely impacts of the proposed redevelopment on the social network of owner/member-occupiers and others households are shown in **Table 8.1**. The percentage of households replied that the social network affected by redevelopment is relatively high (about 45% and 42%) comparing to the URA's past experience in the same district. It may be related to the long residence and the high dependency on the social network as mentioned in para. 4.4.

Table 8.1 Effects of Redevelopment on Social Network (as of 12 June 2020)

	Affected Owner/member-occupiers (404 surveyed Households)	Affected Others (24 surveyed Households)
No Impact	26%	37%
Affected	45%	42%
No Response	29%	21%

8.2 The possible effects of the Scheme on the affected households' social network (each household can choose more than one concern) is shown in **Figure 8.1**.

Figure 8.1 Nature of Effects on Social Network to Affected Households (as of 12 June 2020)



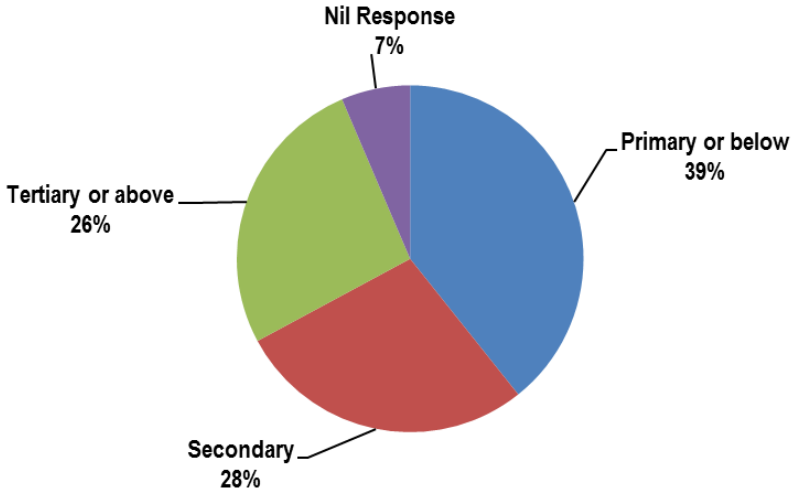
8.3 The SST will provide orientation sessions before and after rehousing to help the affected residents adapt to their new homes and introduce various community resources available in the area, including medical support, NGO services and

community facilities. It will help them to identify suitable medical / social service providers and religious institutions in the new residence setting. However, the social support with children / relatives and neighbours / friends may take longer to establish / re-establish in a new environment. The URA will also offer FFF option (in-situ or in the same district) for those eligible domestic owner-occupier households to minimize the effect on their intrinsic social networks and medical support.

9. EDUCATION NEEDS OF CHILDREN

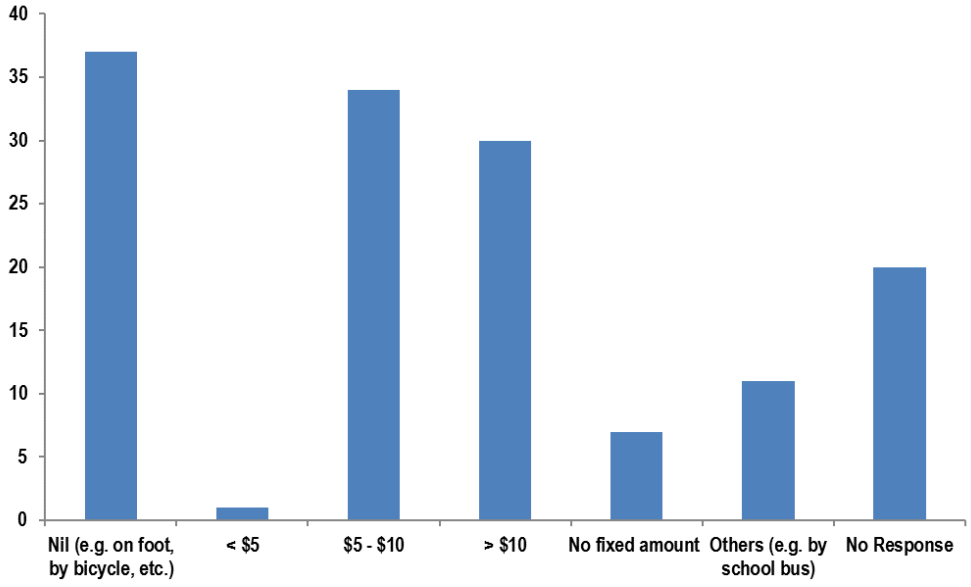
9.1 The survey identified 140 students residing in 98 households within the Scheme. Of this, 128 students (91%) were from owner/member-occupier households, 12 students (9%) were from others households. **Figure 9.1** shows the type of schools attended by the students residing in the Scheme.

Figure 9.1 Educational Level of Students (140 Students in surveyed households as of 12 June 2020)



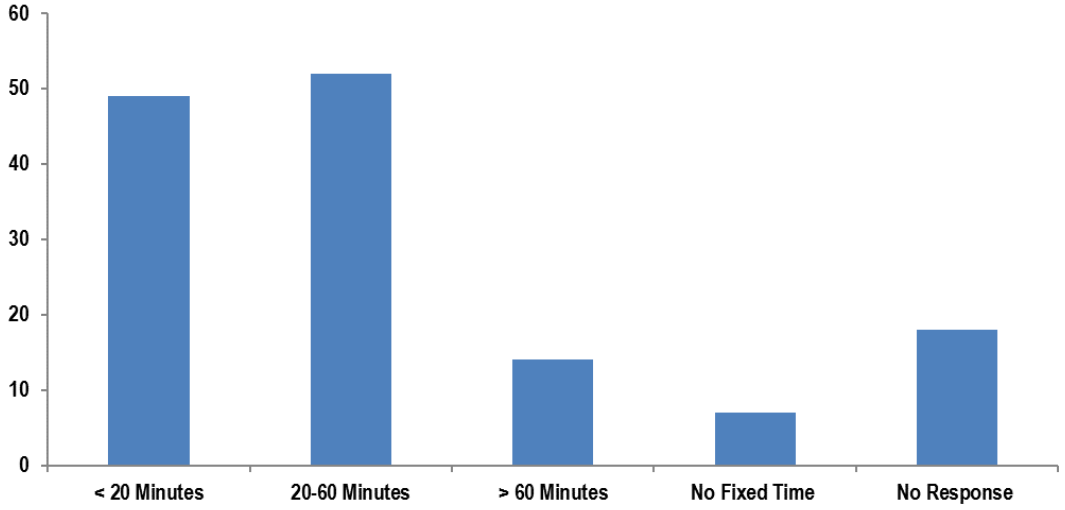
9.2 **Figure 9.2** shows the transport costs of the students in the interviewed households. Since 62 students (about 44%) within the Scheme are studying in Kowloon City District, it is not surprising that 37 students (about 26%) did not need to pay for transport to school.

Figure 9.2 Travelling Cost to School – Single Trip (as of 12 June 2020)



9.3 **Figure 9.3** shows the students' travelling time to school.

Figure 9.3 Travelling Time to School – Single Trip (as of 12 June 2020)



9.4 Of the 140 students, 55 (39%) are studying in primary school or kindergarten. Impact of the Scheme on this group of students may be greater as these students may need to change to another school if their families chose to move to other areas. It is understandable that parents generally wish their children to continue in their present schools. Relocation away from this area may cause inconvenience especially for primary and kindergarten students.

9.5 If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district) or the Government will offer an alternative option of the DRE at Kai Tak Development Area for those eligible domestic owner-occupiers that may contribute to minimize the impacts due to relocation to different district. Among these options, opportunities to retain in the same secondary school or primary school will be given due to the same primary and/or secondary school net. The URA with the assistance of the SST, will assist the affected families during the acquisition and rehousing stages to meet the educational needs of their children as much as possible. If necessary, appropriate assistance, resources and services from relevant Government departments will be sought.

10. GROUPS WITH SPECIAL NEEDS

10.1 An assessment has been made on the special needs of the elderly, persons with disability, single-parent families and ethnic minorities identified in the FS and SIA questionnaire.

Elderly Persons (Age 65 and above)

10.2 **Table 10.1** shows the distribution of elderly persons identified in the survey in the Scheme.

Table 10.1 Distribution of Elderly Persons identified in survey in the Scheme (as of 12 June 2020)

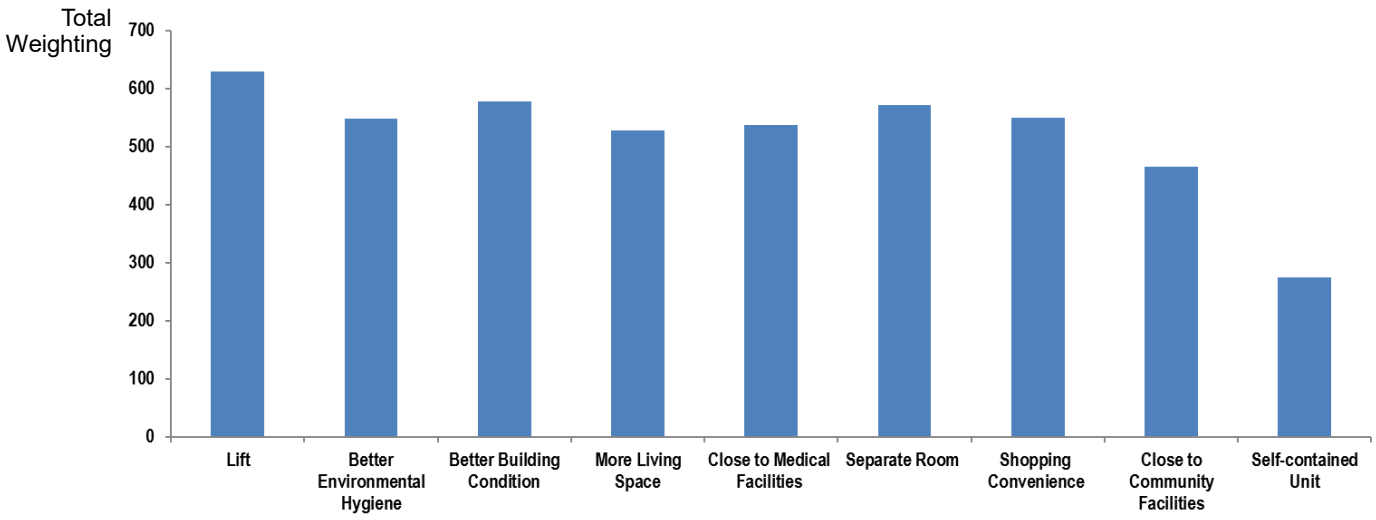
Total No. of Elderly and Households	
Total No. of Households with Elderlies	283 Households out of 428 surveyed households
Total No. of Elderly Residents	422 Elderly Residents
Household Sizes	
Singleton Households	33 Households (33 Elderly Residents)
Doubleton Households	30 Households (60 Elderly Residents)
Others	220 Households (329 Elderly Residents)
Type of Tenure	
Owner/member-occupiers	274 Households (97%)
Others	9 Households (3%)

10.3 Out of the 1,424 surveyed residents, 30% are elderly which is much higher than the territory wide level of 16%. The high proportion of elderly population within the Scheme has significant implications on the types of re-housing and other age-related concerns such as barrier-free access, health and medical facilities. The URA will assist displaced elderly residents to find replacement flats with lift as far as practicable to improve their living environment and to address their key concerns as per **Figure 10.1**. On the other hand, the URA will also offer FFF option (in-situ or in the same district) or the Government will offer an alternative option of the DRE at Kai Tak Development Area for those eligible domestic owner-occupiers to minimize the impacts due to relocation to different districts. Among these options, all are within the same district of hospital cluster (i.e. Kowloon Central Cluster), with the same health and medical facilities under the cluster.

10.4 It is generally understood that elderly persons, particularly singletons, may have more difficulty adapting to their new environment once rehoused. The URA and the SST will make an effort to alleviate their anxiety by providing information on the arrangement of rehousing and the new environment surrounding the estate. After their relocation to a new accommodation, the SST will follow up and provide assistance to the elderly. The SST will conduct programs on getting to know the local community facilities, visits to the social service providers, and provide assistance on referral to medical centers in the new neighbourhood. The URA "Project Engagement" team and the SST will pay special attention to the singleton and doubleton elderly households and adopt a proactive approach to deliver prompt assistance to the elderly through home visits.

10.5 **Figure 10.1** shows the weighed priority of the aspirations of the elderly when questioned about the improvements they would like to see in their new home. The major concerns of elderly on living environment are the presence of lift, better building condition and better environmental hygiene, which can be improved by moving to the rehousing units with better modern days facilities for better safety and health standard.

Figure 10.1 Elderly Concerns on Living Environment (based on the first three priorities chosen, can choose more than one answer; weighting of 3-most important, 2-importanat and 1-less important) (as of 12 June 2020)



Persons with Disability

10.6 Fifty (50) residents with disabilities (about 4% of total number of 1,424 residents) were recorded in the survey. Their disabilities mainly relate to wheelchair access,

mental health, or have some kinds of disease. Most residents with disabilities considered medical support, disability access / facilities, and counselling support as their primary concerns. Rehousing for disabilities may be considered on compassionate grounds if they are not eligible under the normal eligibility requirement.

Single-parent Families

10.7 Among the 428 surveyed households, 4 single-parent families with 7 children were identified in the survey. Their major concerns are more living space, better living environment and school.

Ethnic Minority Groups

10.8 Among the 428 surveyed households, 6 owner/member-occupier households were recorded with members to be ethnic minority groups including 3 households from Indonesia, 1 household from Philippines, 1 household from Thailand and 1 household from Malaysia.

10.9 All the 6 households with ethnic minority were owner/member-occupier households. Among them, 5 of these affected households responded there would not be impact on their families in terms of employment while 2 households considered no impact on their economic condition.

11. BUSINESS IMPACT

11.1 According to the FS, there are 2 business operators using 2 premises. One of them is using 1 unit (for domestic use according to GBP) for both domestic and non-domestic use (mixed use) while the other is a wall shop[6]. Both business operators responded to both FS and SIA forms. Those did not answer particular SIA question will be analyzed as "Nil Response" in the following analysis.

11.2 Regarding the occupancy status of business operators, one was tenant operator while another was the occupier of a wall shop. Regarding the nature of existing businesses, one of them is retail while the other one is office. Both of the interviewed business operators indicated that the shop has no chain store or other branches.

11.3 The years of business operation was less than 5 years for one and more than 30 years for another one. The size of premises are about 101-500 sq.ft. for one and 1,501-2,000 sq.ft. for another one. (The exact size of the premises can only be confirmed subject to detailed survey after CE-in-C approval of the Scheme).

11.4 The reasons for operating at the existing premises include good neighbours, wide customer base and low rent. Both interviewed operator are satisfied to the interpersonal relationship and business network. One of them is satisfied to the business performance while the other expressed neither satisfied nor dissatisfied.

11.5 Both interviewed operators do not support the proposed development. The operators preferred to continue the businesses nearby. The main concerns on relocation include high rental cost, high acquisition cost, loss of existing customer base and loss of good neighbors.

11.6 Both interviewed operator would like the URA to assist them in finding new premise to continue the business. Both operators also wanted to meet URA staff and SST for assistance in finding new premise for business. Upon request from the operators, the URA will assist to identify suitable premises with compatible use nearby to the Scheme to enable relocation and continue operation in the same district as far as practicable.

[6] *It is located very close to the boundary. Its actual location has not been verified and subject to site survey.*

12. MITIGATION MEASURES REQUIRED

Social Service Team

12.1 In accordance with the new URS, the URF has been set up to, inter alia, fund the SST which provides assistance to persons affected by URA-implemented redevelopment projects. The SST reports directly to the Board of the URF. The SST is expected to play a co-ordinating role in assisting the residents to access the services they need from relevant Government departments and / or other service providers. For instance, the help of the HKHA and the HKHS will be sought in the rehousing process, the Education Bureau in providing school places for children affected by home removal, the Social Welfare Department and various non-governmental organisations for counseling services, the Hospital Authority and Department of Health in medical assistance, etc. As at 30 June 2020, the SST has successfully contacted different client groups. A breakdown of the contacts by client groups is listed in **Table 12.1**.

Table 12.1 Breakdown of SST Contacts by Client Groups

Client Group	No. of Contacts
Domestic Tenants/Others	2
Domestic Owners/member-occupiers	156
Business Operators	0
Undisclosed Occupiers	173

12.2 The nature of the problems identified is summarized as follows:-

Table 12.2 Nature of Problems Identified Among the Contacts

Problem or Enquiry Nature	No. of Enquires from Households*
Domestic Tenants/Others	
a) Unclear on ex-gratia allowance and rehousing policies	2
b) Evicted by owners / outrageous rent rise	1
c) Worry about eviction, termination of tenancy or outrageous rent rise in future	2
Domestic Owners/member-occupiers and Undisclosed Occupiers	
a) Unclear on acquisition policies	320
b) Worry about the amount receivable not enough to purchase another flat in the same district	240

* Each household / shop operator may lodge more than 1 enquiry.

12.3 The SST is expected to adopt a proactive approach to identify individuals at risk early through home and shop visits and to deliver prompt assistance to the persons in need. For residents with no imminent needs, such a proactive approach can also enable the SST to establish a rapport with the clients and facilitate cooperation or engagement in future.

Public Briefing

12.4 To avoid gatherings under COVID-19 pandemic, project briefing videos instead of the public briefing in past practice are provided to the affected persons by URA when the Scheme is commenced. The videos explain the Scheme and include information on planning procedures, the URA's acquisition and rehousing policies, and assistance in the dissolution of CBS. The videos can be accessed by scanning the QR code or through the web link printed on the notices or letters, including the Freezing Survey covering letter, issued by the URA.

12.5 As the situation of pandemic and the government prohibition on group gathering for prevention and control of disease has gradually relieved in June and July, 3 public briefing sessions were organized by URA with government representatives from Civil Service Bureau, Development Bureau and Lands Department on 6 and 7 July 2020 to inform all the affected persons, the details of the Scheme and to obtain public views on the Scheme. Questions on Freezing Survey, planning, acquisition, tenant's ex-gratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting.

Project Engagement Programme

12.6 From a URA's project / scheme commencement to commencing acquisition and rehousing arrangement after DEVB's authorization or CE in C's approval of Scheme will usually take a long time. With the understanding that the affected persons are likely to experience doubts and worries during the long waiting period, the URA has implemented a "Project Engagement" Programme since October 2016 to provide direct contact services.

12.7 A special team of about 15 URA staff members has taken the initiative to visit every household and business operator affected by the URA projects to explain to them the policies in details, helping them understand the latest progress, acquisition, tenant's ex-gratia allowance and rehousing arrangements, and timeline of the projects. The

team also made follow-up visits to the households with special needs, and referred them to SST or the relevant departments for assistance as needed. Simple and easy-to-understand leaflets, in Chinese, English and other languages, if necessary and practicable, for the affected ethnic minorities, may be produced to explain the tenant's ex-gratia allowance and rehousing arrangements as well as help them understand their interests.

Enquiries and Hotline Services

12.8 Since the Scheme commencement, 4 government departments' hotlines regarding civil service housing benefits matter, land premium assessment for removal of alienation restriction, lease modification and resumption have been provided to residents within the redevelopment area. The URA also provides 3 hotline services to the residents and answers their enquiries. About 402 enquiries had been received via URA's hotlines between 22 May 2020 and 30 June 2020. The subject matters of the enquiries are summarised in **Table 12.3**.

Table 12.3 Nature of Enquiries

Subject Matters of Enquiries	Percentage
Scheme information, progress, timetable and planning procedures of urban renewal	7%
Acquisition, tenant's ex-gratia allowance and rehousing policies	42%
CBS dissolution	5%
Household survey (e.g. registration arrangement, briefing arrangement)	41%
Others	5%
Total enquiries: 402	**100%**

12.9 Based on past experience with implementation of redevelopment projects, the URA is confident that the prevailing acquisition, tenant's ex-gratia allowance and rehousing policies and arrangements, with the services offered by the SST and the URA will be sufficient to reasonably mitigate the impact on the majority of the affected persons arising from the proposed redevelopment. In summary, the principal mitigation measures being pursued include:-

(i) outreach activities by the SST to ensure that all affected persons potentially in need are identified on top of those who were already identified in the SIA survey;
(ii) assistance in finding public rental rehousing for eligible persons in need;

(iii) conducting initial assessment of the elderly with low incomes or retired or disability and other vulnerable groups for eligibility for compassionate housing;
(iv) providing orientation assistance for those in need after moving home such as familiarisation with new neighbourhood, accommodation and local facilities; and
(v) providing assistance to identify suitable replacement premises for affected businesses.

12.10 The URA will assist displaced owner/member-occupiers, especially for elderly, to find replacement flats within Kowloon as far as practicable. Redevelopment will inevitably affect the existing social network of some residents in the Scheme. The SST will follow up their cases for 6 months in average after their relocation to a new accommodation. In helping "the affected residents in maintaining and rebuilding social support network", the team will also conduct below activities:-

(i) After resettlement, the displaced residents will be contacted at least once after their old acquaintance in Kowloon City, e.g. through organizing a re-union gathering for displaced residents; and
(ii) the displaced residents will have established connections in their new neighbourhood, e.g. programs on getting to know the local facilities in new community and visitation to the social service providers in the new neighbourhood.

12.11 The URA together with the SST will ensure that the requisite services and practical assistance by relevant Government departments and / or service providers are made available to the community in need, and that social and livelihood problems relating to the Scheme are resolved in a timely manner.

Facilitating the Dissolution of CBS

12.12 To facilitate the dissolution of the CBS, the Urban Redevelopment Facilitating Services Co. Ltd. (URFS), a subsidiary of the URA, will provide free service to the CBS members to facilitate the dissolution of the CBS in the Scheme. URA will pay for the services provided by the solicitor appointed by URFS regarding dissolution, liquidation and transfer of titles to CBS members, to assist in the complicated procedures of the dissolution of the CBS and alleviate the financial expenditure of the CBS member. The use of this free service is unconditional and will not constitute any indication of the owners to sell or not to sell their properties.

Government Support

12.13 According to paragraph 54 of the PA in 2018, the dedicated rehousing approach can help address the accommodation issue arising from the redevelopment of CBS sites. Hence, for the affected eligible owner-occupiers of ex-CBS member in the Scheme, the Government has made special arrangements to offer an additional option for them to purchase subsidised sale flats of the DRE at Kai Tak of the same Kowloon City District to be developed and managed by the HKHS. Details of this additional option will be provided by the Government and HKHS in due course. Those eligible owner-occupiers who have chosen this option cannot join the FFF arrangement as mentioned in para.12.17 below.

12.14 The Government will also explore ways to facilitate dissolution of CBS and redevelopment of CBS, including:-

(i) synchronising the offer on the amount of outstanding premium to be settled with URA's acquisition offer;
(ii) adopting the "Existing Use Land Value" (as opposed to "Redevelopment Value") as the basis for assessing the land premium payable as this is not a self-initiated redevelopment by CBS members/ex-members not yet settled land premium;
(iii) waiving the administration fee for processing the settlement of outstanding land premium where applicable; and
(iv) streamlining the CBS dissolution procedures where possible.

Detail arrangement shall refer to the Government prevailing policy related to CBS.

Prevailing Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policy

12.15 In the briefing videos provided to the affected persons and at the public briefings held on 6 and 7 July 2020, the acquisition, tenant's ex-gratia allowance and rehousing policies based on the URA's prevailing policies for the affected owners and tenants were fully explained.

Domestic Properties

12.16 The URA will offer an owner-occupier of domestic property the market value (valued on vacant possession basis) of his / her property plus an ex-gratia allowance, namely Home Purchase Allowance (HPA), for purchase of the property. The CBS members have to settle the outstanding land premium to the Government to release the

alienation restriction before they can assign legal titles of their flats to the URA. The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view. The URA will offer an owner of tenanted or vacant domestic property the market value (valued on vacant possession basis) of his / her property plus a Supplementary Allowance (SA), where applicable, up to 50% of the HPA above mentioned. In addition to HPA or SA, the URA will offer an incidental cost allowance to owners of domestic properties to assist payment of removal expenses and expenditure relating to the purchase of a replacement property.

12.17 According to the new URS, and as far as relevant legislation allows, the URA will offer FFF arrangement to eligible owner-occupiers of domestic properties. Under such arrangement, new flats will be made available in a URA new development in-situ or URA development(s) in the same district or at suitable site (s) at market value (subject to changes in the relevant legislation and regulations) (as the URA may select for the purpose provided that necessary approval / authorization has been obtained at the time of FFF offer), as an additional choice to cash offer to such owner-occupiers. According to para. 5.3 and 5.4, subject to the actual demand of the affected owner-occupiers of large household size to move to a new flat with a similar size of the present units, the URA will further explore possible ways at FFF option addressing this need as far as practicable. The FFF option offered in the same district can minimize the impacts on social network, educational and medical needs of owner/member-occupier households as identified in the survey and mentioned in the previous sections due to relocation to different district. Details of FFF option can be obtained from:
https://www.ura.org.hk/en/redevelopment/owners-corner/flat-for-flat-scheme.

12.18 Affected eligible domestic tenants will be re-housed in units provided by the HKHA or the HKHS or the URA. Tenants who are re-housed will be offered an ex-gratia removal allowance. The allowance is in line with the HKHA's rates. The amount receivable will be according to the size of the household and the rates prevailing at the time.

12.19 Tenants who are not allocated re-housing due to various reasons or who decline re-

housing, may receive ex-gratia allowances. Details of the ex-gratia allowances for domestic tenants can be obtained from: https://www.ura.org.hk/en/redevelopment/tenants-corner/rehousing-and-ex-gratia-allowance-policies.

12.20 According to the new URS, the URA will adopt a compassionate approach in assessing the eligibility of owners of tenanted domestic units for ex-gratia allowance in exceptional circumstances such as elderly owners who rely on the rental income from their properties for a living.

12.21 In case where tenants were notified that their tenancies would not be renewed, the URA will explain to their owners that they would not get more allowance by evicting the tenants. The URA has also introduced the "Domestic Tenants Compassionate Assistance Programme" ("DTCAP") to take care of those domestic tenants whose tenancies commenced before the Freezing Survey of this Scheme and moved out from the properties because they have been required to move out from their properties by their landlords upon expiry or termination of their tenancies and before URA purchases the properties. In general, eligible domestic tenants who meet the criteria under this programme will be offered, after acquisition or Government resumption of the properties concerned, special ex-gratia allowance based on the rateable value of the properties concerned, the ex-gratia allowance is calculated according to the method as listed in **Table 12.4** below subject to a minimum amount of HK$180,000 (for an one-person household) and HK$200,000 (for a two-person or larger household) ("Minimum EGA"). The Minimum EGA for an one-person household and a two-person or larger household were increased from HK$70,000 and HK$80,000 to HK$160,000 and HK$180,000 in 2017 respectively, and adjusted to HK$180,000 and HK$200,000 in 2020 respectively. The Minimum EGA will be reviewed annually in accordance with the Annual Rental Index for Class A Domestic Properties publicized by the Rating and Valuation Department ("RVD") in April each year. Domestic tenants, who undergo the same situation as mentioned above and are not eligible for DTCAP, can apply for the URA's Relocation Assistance.

Table 12.4 Calculation of Special Ex-gratia Allowance for "Domestic Tenants Compassionate Assistance Programme"

Rateable Value (RV)	Special Ex-gratia Allowance
1st HK$10,000	9 times RV
2nd HK$10,000	8 times RV
3rd HK$10,000	7 times RV
4th HK$10,000	6 times RV
5th HK$10,000	5 times RV
6th HK$10,000	4 times RV
7th HK$10,000	3 times RV
8th HK$10,000	2 times RV
9th HK$10,000 and above	1 time RV

Non-Domestic Properties

12.22 For owner-occupied non-domestic premises, the market value of the affected property (valued on vacant procession basis) plus an ex-gratia allowance of 4 times the rateable value or 35% of the market value of the affected property, whichever is the higher, will be offered. Owner-occupiers may lodge a claim for business loss in lieu of both the ex-gratia allowance mentioned above and Ex-gratia Business Allowance (EGBA) mentioned in para. 12.23 below. For owners of tenanted or vacant non-domestic properties, the market value (valued on vacant procession basis) of the affected property plus an ex-gratia allowance of 1 time the rateable value or 10% of the market value of the affected property, whichever is the higher, will be offered.

12.23 For non-domestic tenants of non-domestic premises, an ex-gratia allowance of 3 times the rateable value of the affected premises will be offered. An additional payment of EGBA is also payable to tenants and owner-occupiers who commenced occupying the premises for business before the date of FS. In calculating the number of years of continuous operation, the expiry date of continuous operation is 2 years from the date which the URA issues initial acquisition offer to property owners. The amount is calculated at a rate of 0.1 times the rateable value for each year that the affected premises has been in operation up to a maximum of 30 years. For an incomplete year, the amount of EGBA is calculated on a pro-rata basis to the nearest month. The amount of EGBA is subject to a maximum amount of HK$700,000 (adjusted from HK$500,000 in 2017) and a minimum amount as described in **Table 12.5** below.

Table 12.5 Calculation of EGBA

Years of Continuous Operation	Minimum EGBA
10 years or less	HK$110,000 (adjusted from HK$70,000 in 2017, and will be reviewed annually in accordance with the Annual Rental Index for Retail Properties publicized by the RVD in April each year)
More than 10 years (maximum of 30 years)	Additional HK$10,000 for each completed year

12.24 According to the new URS, if requested, the URA will help identify suitable premises in the district of the redevelopment project to enable the affected shop operators to relocate and continue operation in the same district as far as practicable.

12.25 The acquisition, tenant's ex-gratia allowance and rehousing policies are subject to prevailing policies at the time of issuing acquisition policies. The policies are published on the URA's website and will be communicated to affected persons when acquisition of property interests for this Scheme commences. Prevailing policies relating to property acquisition, rehousing and ex-gratia allowances will be reviewed by the URA from time to time.

URBAN RENEWAL AUTHORITY
July 2020

Part 3 – Responses to Public Comments

Stage 1 Responses to Public Comments

(Dec 2020)

Urban Renewal Authority 市區重建局

Kau Pui Lung Road / Chi Kiang Street Development Scheme 靠背壟道 / 浙江街發展計劃 (CBS-2:KC)

Responses to Public Comments 回應公眾意見 (Reference Nos. 1-445)

(Consultation Period 諮詢日期 29.5.2020 – 19.6.2020)

Types of Comments 意見類別：

A) Support 支持 = 102
B) Object 反對 = 253
C) General Comments 一般意見 = 83

Notes 註：

1. Comments submitted in English will be responded in English 以中文提交的意見會以中文回應
2. According to Town Planning Board (TPB), all comments submitted by the same person would be treated as one 根據城市規劃委員會 (城規會)，同一名人士提交的所有意見將被視作為一份意見

Ref. Nos. **參考編號**	**Consolidated Comments and Justifications** **綜合意見種類及原因**	**URA's Responses** **市建局回應**
A) 支持意見 Support Comments (102 comments in total)		
***意見類別一：有關居住環境改善方面**		
1, 2, 27, 28, 70, 92, 102, 103, 116, 117, 120, 122, 123, 131, 145, 153, 154, 169, 171, 195-196, 206,	● 現時樓宇並沒有電梯，對住客造成不便 ● 重建新大廈設置電梯方便長者 / 小朋友 / 孕婦	根據核准一般建築圖則，靠背壟道 / 浙江街發展計劃 (該計劃) 內的所有樓宇均沒有電梯或其他無障礙設施，而該計劃的重建樓宇將設有現代化設施包括電梯及無障礙設施。

*註：意見的類別僅為市建局用作有效回應相同類別意見的分類，以供參考，並不是意見提出者指定的分類。

*Note: The comments are categorized by URA for easy reference in order to efficiently respond to similar comments. The comments are not categorized by commenters.

Ref. Nos. 參考編號	Consolidated Comments and Justifications 綜合意見種類及原因	URA's Responses 市建局回應
A) 支持意見 Support Comments (102 comments in total)		
208-209, 211, 244, 263, 266-267, 320, 330, 338		當該計劃獲批准後，市建局會向業主發出收購建議。如業主是以其物業作自住用途，市建局會以物業市值提出收購其物業，並加上一筆特惠津貼 (即自置居所津貼) 及相關津貼以資助業主因購買新居所引致的開支，相信可協助業主在其他地方重置居所。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。相信業主可以現金補償或「樓換樓」計劃選擇合適的重置單位改善居住環境及生活。
53, 169, 204, 212, 347	選址合適，鄰近地鐵站，十分方便，亦可與地鐵聯通發展為高效益項目	市建局依據2018年《施政報告》中所列出適合重建合作社樓宇的特點，包括考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，以挑選適合作試點項目的地盤選址。經過多方面考慮，該計劃選址是最符合上述條件，作為試點項目。 該計劃選址，毗鄰有公共屋邨，所涉及的公務員合作社樓宇亦較集中，並沒有摻雜其他非合作社樓

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		宇，在重建後可增加的樓面面積較高，加上地盤面積亦較大，能透過重整及重新規劃，進一步為社區帶來裨益，惠及區內居民。 該計劃毗鄰未來港鐵沙中綫土瓜灣站，可藉著港鐵站內已建的行人隧道網絡，進一步連繫土瓜灣舊區以及市建局在該區以小區發展模式發展的多個重建項目，加強兩個更新後的社區的連接，加大九龍城舊區更新的步伐。
67, 68, 71, 95, 155, 206, 208-209, 211, 212, 250, 348, 349	重建可改善土瓜灣社區，改善居住環境	該計劃與之前在土瓜灣區以小區發展模式來開啟的重建項目，發揮更大的協同效應，促進九龍城的地區更新。
101, 128, 314, 348	重建可改善治安問題	該計劃的重建樓宇將設有現代化設施，可改善該區的居住環境和治安問題。
1, 147, 151, 152, 155, 165, 168, 171, 212, 250, 312, 323-328, 332, 350	大廈結構破損、日久失修、天台漏水，有石屎剝落和倒冧危機，需要重建	透過該計劃的重建，將提供設有現代化設施的樓宇，改善該區的居住環境。
***Comment Category 1: Improved Living Environment**		
5, 96	To improve living conditions, security, environment and beneficial to the residents in To Kwa Wan	Through the redevelopment of the Scheme, residential buildings with better modern standard

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		facilities will be provided to improve the living environment in the district.
215	Inconvenient as living in a building without lift	According to the approved GBP, none of the buildings within the Scheme is served by lift or barrier-free access. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely home purchase allowance, HPA). As an additional option to cash offer, 'Flat-for-Flat' (FFF) option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. The cash offer and FFF option allow the owner-occupiers to rehouse in a suitable unit improving their living environment.
***意見類別二：有關社區更新方面**		
1, 2, 3, 53, 65, 66, 69, 118, 121, 163, 164, 172, 204, 206, 208-209, 211, 227, 248, 347	增加房屋供應	該計劃旨在落實《施政報告》的目標，透過充分利用合作社地段的發展潛力，房屋供應將增加約 5 倍，由現時約 460 個增加至約 2,500 個房屋單位。

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		因應《施政報告》的要求，該計劃若獲得批准，會預留部分土地興建公營房屋。
131, 155	可汲取合作社樓宇重建的經驗，加快釋放市區土地	該計劃是公務員合作社地段重建試點項目，市建局會總結試點項目的推展經驗，交予政府考慮。至於其他合作社樓宇的重建計劃，由政府考慮及作決定。
214	希望可藉此機會啟動重建樂民新村	樂民新村的重建計劃將由政府和香港房屋協會 (房協) 商討決定。而該計劃的地盤南面約三份之一的部分將無償交予政府，由運輸及房屋局委託的機構興建公營房屋。
***Comment Category 2: Urban Renewal**		
5, 44, 97, 98, 99, 119, 146	Better utilisation of land and increase of private and public housing supply	The Scheme aims to fulfill the objectives of the Policy Address 2018 and 2019 (PAs), to increase housing supply by full utilisation of the development potential of the cluster of Civil Servants' Co-operative Building Society (CBS) Scheme sites. According to the directive under the PAs, some of the land within the Scheme is to be earmarked for public housing development upon approval.

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***意見類別三：有關收購、租戶特惠津貼及安置政策**		
193, 195-196, 220, 261-263, 266-267, 323-328	● 希望提供相等面積的自置居所給受影響人士認購 ● 以呎換呎方式計算確保業主權益，能買回面積相約的單位	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。如獲得行政長官會同行政會議核准進行該計劃，市建局會為受影響合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇，屆時將會提供進一步的資料。 此外，政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。
195-196, 220, 248, 261-263, 266-267, 316, 323-328, 337, 445	● 希望收購價必須公平 ● 希望提供清楚和合理的補償	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅

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		物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 按市建局沿用行之有效的方式，將以公開抽籤方式，委託七間獨立顧問公司評估該假設重置單位的呎價，在去除最高和最低價值後，以五個評估價值的平均數作為該假設單位的呎價。而該假設重置單位的呎價，會在整個項目內劃一採用。
248	解散合作社的費用應由政府全部負擔，包括顧問費 (如有)	為協助合作社社員處理散社事宜，市建局已委聘一家對散社安排有專業知識和經驗的法律顧問，為兩個試點項目內尚未解散的合作社，提供免費法律顧問服務，協助社員盡早處理散社、分契和取回業權

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		事宜。使用此免費服務不設附帶條件，亦與業主出售或不出售其單位無關。
***Comments Category 3: Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policies**		
46, 247	● Support and hope to have a reasonable price ● Compensation should be in accordance with the fair current value of real estates properties in Hong Kong, and with various compensation options available for the owners / members	Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely HPA). The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.

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		As an additional option to cash offer, FFF option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. Besides, the Dedicated Rehousing Estate (DRE) near Muk Chun Street in Kai Tak Development Area (KTDA) developed and managed by the Hong Kong Housing Society (HKHS) is another option offered at a discount market price similar to subsidized housing by the Government as mentioned in PA in 2018.
***意見類別四：有關市建局項目程序 / 重建方面**		
210, 337	希望處理好居民的疑惑	受新型冠狀病毒疫情影響下，為避免人群聚集，減低居民及工作人員受感染的風險，市建局於2020年5月22日開展該計劃時，向受影響人士提供預先錄製的項目簡介影片以取代過往舉辦的公眾簡報會。該影片使居民能夠在疫情期間安全了解該計劃的內容，包括該計劃的規劃程序、該計劃若得到批准實施後的市建局物業收購及遷置安排，以及協助解散合作社安排。

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		由於疫情和政府為預防及控制疾病而制定的人群管制於 6 月及 7 月初逐步放寬，市建局聯同政府代表於 2020 年 7 月 6 日及 7 日，為該計劃的受影響的人士舉行了三場簡報會，作額外的平台並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。市建局並會進行「夥伴同行」探訪計劃，深入解釋政策及項目的最新進展、補償及遷置安排，以及時間表等等，而且透過不同途徑與居民保持溝通及交流，以釋除居民的疑慮。

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B) 反對意見 Object Comments (253 comments in total)		
***意見類別一：有關規劃設計及對周邊環境影響方面**		
8, 11, 14-19, 20-25, 31, 34, 37, 38, 42, 48-49, 56, 57, 60, 61, 109, 110, 111, 133, 134, 137, 157, 158, 174-178, 185-188, 217, 219, 233-236, 243, 258, 260, 272, 307, 313, 354, 356, 357	● 屏風樓，遮擋光線和周邊大廈視野，亦與整個社區格格不入 ● 造成屏風效應，影響周邊的空氣流通，令區內環境質素變差	項目視覺評估報告已提交規劃署審批，評估指出現時建議的初步建築佈局和樓宇高度，與周邊的高密度發展如樂民新村、晨樂大廈、都會 151 和翰畋等相容。相比較現有發展，該計劃擬議的步行街將會貫通落山道至浙江街，步行街在陽光照射和兩旁綠化下締造舒適的步行環境；相比較規劃大綱圖所容許的發展規模，擬議設計的最高建築物高度在主水平基準以上 140 米能創造出較大的建築物間距，減少屏風樓效應和遮擋光線的情況，比起主水平基準以上 120 米更擴大視覺空間。 融入以人為本的城市設計概念，為改善行人暢達性和步行環境質素，該計劃包括重新規劃美善同道及江蘇街的一部分，用作興建步行街 / 廣場，該步行街同時亦作為通風廊，促進地面步行環境的空氣流通。 環境顧問已完成空氣流通評估報告及將有關報告提交規劃署審批，評估指出現時建議的初步規劃佈局以及步行街 / 廣場的城市設計，比較規劃大綱圖所

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		容許的發展規模，能提昇江蘇街及靠背壟道一帶地面的空氣流通。
8, 10, 14-19, 30, 32, 33, 35, 45, 56, 59, 64, 73, 83, 106, 112, 124, 133, 135, 136, 138, 140, 141, 271, 300, 331, 392-393	● 地鐵地盤後，再有建築地盤，對周邊造成噪音及空氣的負面影響 ● 對周邊大廈結構造成負面影響	環境顧問已將環境評估報告提交環境保護署 (環保署) 審批，評估了該計劃在建築過程中對空氣的潛在影響，並提出相應的緩減措施。 市建局亦了解該計劃地盤施工期間可能對鄰近居民造成噪音滋擾，市建局會要求承建商盡量減低工程期間的環境影響，包括必須符合環保署對工程噪音的時間管制，注意隔音及衛生等問題，並且進行密切的監察，以確保施工時對周邊樓宇的結構不會造成影響。
14-25, 37, 48-49, 129, 173, 189-190, 194, 217, 234-236, 240, 258, 260, 271, 300, 303, 307, 313, 392-393, 399	● 對附近交通造成負面影響 ● 造成更嚴重的交通擠塞	交通顧問已把增加泊車位的交通影響評估報告提交運輸署審批。該計劃範圍內現有路邊泊車位 71 個，重建後將有約 140 個公共停車位供區內居民使用，有助減少該區在路面泊車或違例泊車情況，預計可以令附近路面更加暢通。 此外，該計劃重新規劃現有美善同道的掘頭路，將減少車輛窄路調頭而產生對行人的危險。

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11, 37, 41, 109, 114	商場引來旅行團 / 特定購物客	該計劃的非住用地積比為 0.79，低於九龍區住宅(甲類)的非住用地積比 1.5，加上部份非住用樓面面積將用於政府、機構和社區用途，因此商業零售部份的樓面面積是少於一般規劃大綱圖規定的發展。 此外，該計劃內商業零售設施的設計將配合步行街，主要服務當區居民。
12, 14-25, 34, 48-49, 58, 60, 61, 124, 157, 158, 173-178, 185-188, 217, 219, 233-236, 271, 276-279, 282, 287, 289, 293, 295-296, 304, 307, 310, 313, 341-342, 377, 392-393, 399	● 合作社樓宇具歷史特色，例如其露台及顏色設計，不時亦有電視台前來作取景之用 ● 保育此區特色建築群以符合市區重建局條例 5(e)："*保存有歷史、文化或建築學價值的建築物、地點及構築物*"	合作社樓宇建於 1959 至 1970 年期間，屬於當時政府以優惠價批出土地，並提供貸款，讓合資格的公務員透過成立合作社興建的典型純住宅樓宇，為合作社社員及其家屬提供居所。是次重建計劃並非保育項目，旨在落實《施政報告》對重建合作社樓宇的目標，透過充分利用合作社地段的發展潛力，增加房屋供應。於項目開展時，根據古物古蹟辦事處的記錄，該計劃內的建築群並未有被列入為歷史建築或法定古蹟，亦沒有被列入新增項目名單內等待進行評級。
20-25, 48-49, 115, 217, 219, 232, 234-236, 272, 303, 307, 313, 377, 399	興建高密度納米樓，大量增加人口，導致整體居住環境質素變差	該計劃將提供約 2,500 個中小型公私營住宅單位，單位平均樓面面積約 49 平方米 (即約 530 平方呎)，屬於正常的中小型住宅。

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		而環境顧問已將環境評估報告、渠道影響評估報告及供水影響評估報告提交相關部門審批。各報告評估了該計劃對環境、渠道、供水的影響，其中在渠道和供水方面將會建議更改舊有喉管並重新鋪置新的喉管，將減少因喉管老化而出現滲漏或破損的情況。 此外，該計劃將透過以下的方法改善整體已建設環境，包括提供休憩空間供公眾使用、設置步行街/廣場、設有園景裝置及種植花木及提供地下街連接港鐵站出口。
20-26, 31, 38, 48-49, 76, 108, 157, 217, 219, 233, 272, 307, 313	沒有包含一小段由落山道至美善同里的合作社樓宇，是刻意避免影響 "半山一號"，減少反對聲音	該計劃與一小段由落山道至美善同里的合作社樓宇之間，摻雜其他非合作社樓宇，該計劃旨在落實並達到合作社重建試點項目的目標，因此挑選合作社較集中的地段，故不會包含非合作社樓宇。
39, 366	奪去原本安靜的居住環境，亦失去一個可作休憩的地方	該計劃地盤現時被美善同道和江蘇街分割，而道路兩側均有路邊泊車位，行人路約為 2-3 米闊。離該計劃最近的公共空間為邊界外的高山道公園。

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		在土瓜灣港鐵站啟用後，預計將有更多的行人途經該計劃內的行人路段，現時居住環境亦自然地有所改變。 市建局明白發展同樣地帶來改變，但在整體重整及重新規劃後，該計劃將提供一個包括有蓋及無遮蓋地面空間、人車分隔的地面步行街 / 廣場予公眾享用，亦會提供不少於 400 平方米的休憩空間，增加活動空間及休憩處，提昇區內城市設計質素。
302	所有收回土地，包括南北段，應交房協 / 房屋署，興建出租公屋，為基層提供更多廉價月租居所。地下空間應交房協 / 房委會，發展為廉價 co-working space，供年輕人創業或作議員辦事處，或成為社區設施，例如公眾游泳池、老人活動中心及托兒中心，甚至成為設有充電樁柱的地下停車場	該計劃旨在落實《施政報告》的目標，透過充分利用合作社地段的發展潛力，房屋供應將增加約 5 倍，由現時約 460 個增加至約 2,500 個房屋單位。因應《施政報告》的要求，該計劃若獲得批准，地盤南面的三分之一將無償交予政府，由運輸及房屋局指定的機構發展。此外，該計劃將預留不少於 2,150 平方米的總樓面面積作政府、機構或社區設施，以滿足社區需要。
***Comment Category 1: Planning and Design and Impact on Surrounding Environment**		
6, 40	Historic character with balcony design and color matching	According to the CBS Scheme, the Government provided land at concessionary price and low-interest loans to groups of eligible civil servants who

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		formed CBSs for building blocks of flats for the occupation of CBS members and their family members. The CBS buildings within the Scheme were built in 1959 to 1970 and are typical residential buildings. The Scheme is not a preservation project. It aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. When the Scheme is commenced, according to the record of the Antiquities and Monuments Office (AMO), the buildings within the Scheme are **not** on the lists of historic buildings or declared monuments or included in the list of new items for grading assessment.
6, 412	Quiet environment and it can be an open space / leisure place for resident	The Scheme is currently divided by Maidstone Road and Kiang Su Street with on-street parking. There are pavement of about 2-3m wide. The nearest open space is Ko Shan Road Park which is located outside the Scheme boundary. After the operation of To Kwa Wan MTR Station, it is expected the pedestrian flow within the Scheme

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		will be increased and there will be a change in existing living environment. URA understands through the redevelopment of the Scheme would also bring changes to the living environment, however, after replanning and restructuring, the Scheme will provide an at-grade pedestrianised avenue / plaza, as a car-free environment, with at-grade uncovered and covered area for public enjoyment. Also, the provision of not less than 400 sq.m of open space will provide more event space and sitting area to enhance the quality of urban design in the district.
207, 259	Environmental impacts such as air quality and noise to the elderly and student	Environmental Assessment has been conducted by the consultant and submitted for the approval of Environment Protection Department (EPD). The potential air pollution during construction period of the Scheme is assessed with mitigation measures proposed to minimize adverse effect to the surroundings. The URA would closely monitor and request the contractor to minimise the noise generated during the construction of the Scheme and to follow and

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		fulfill the noise mitigation measures as stipulated by EPD for construction site.
207, 259, 301	Adverse traffic impact due to bringing more cars	Traffic Impact Assessment has been conducted by the consultant and submitted for the approval of Transport Department. The existing number of on-street parking spaces is about 70 within the Scheme and it is planned for about 140 public car parking spaces in the Scheme. The increased number of public car parking spaces will help to reduce the number of on-street parking and illegal parking and enhance the traffic in the vicinity. Besides, the existing dead-end of Maidstone Road will be restructured to minimize the danger to pedestrian due to vehicles u-turning.
228, 354	A "Pedestrian Zone" will attract floods of shoppers and tourists that will lead to noise pollution and lower living standards for the residents in the site and nearby	Current pedestrian circulation will change after new MTRC station commence operation. A non-domestic plot ratio (PR) of 0.79 of the Scheme is proposed, which is lower than the traditional non-domestic PR of 1.5 within R(A) zone in Kowloon. Also, part of the non-domestic GFA will be reserved to provide appropriate Government, Institution / Community (GIC) facilities, hence less GFA will be allocated for commercial / retail use and a large

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		shopping mall will not be developed within the Scheme. Flats will be located above ground floor hence reducing the noise nuisance as compared with the existing condition. Furthermore, the commercial / retail components will be integrated with the pedestrianised avenue / plaza, which will enhance the walkability and create a family-friendly environment for the enjoyment of the nearby residents.
270	Existing Maidstone Road and Kiang Su Street should be retained as public streets and should be excluded from GFA calculations	The existing Kiang Su Street and Maidstone Road, including its dead-end, will be restructured and replanned into a pedestrianised avenue / plaza as a car-free environment for the enjoyment of the nearby residents. The Scheme also aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. Thus, part of the Maidstone Road and Kiang Su Street are restructured for planning as part of the project to provide other uses including open space & pedestrianised avenue for public use and GIC. Meanwhile, the land resources will be

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		optimized to provide more housing supply including southern part of the site will be earmarked for development by the agent appointed by the Transport and Housing Bureau.
270	It is imperative that the location and form of public open space be determined at this early stage and Maidstone Road and Kiang Su Street should be considered as public open space (in addition to the 400 sq.m.) and not subsumed within private retail environment. Public open space must be clearly accessible at ground level and not only open "at reasonable hours" as stipulated in the report	The open space for public use is accessible at ground level. It will be open at reasonable hours to avoid disturbance to the resident late at night. The Scheme is in planning stage and the opening hours of the open space for public use is subject to implementation and operation plan in later stage if the Scheme is approved by CE-in-C.
270, 301	● The Scheme disrupts the views for the residents in Lok Man Sun Chuen and the building envelope is unsightly both from the street level and inconsistent with the existing neighbourhood ● The built form and design should minimise the mass and bulk. The result of current modelling approach is there will be a massive unmitigated wall along Kau Pui Lung Road confronting Lok Mun Sun Chuen. However there is no modelling nor analysis of the visual	Visual Appraisal has been conducted and submitted for the approval of Planning Department. According to the assessment, the proposed building layout and building height is compatible to the high density development including Lok Man Sun Chuen, Morning Joy Building, City 151 and 80 Maidstone Road in the surrounding environment. Comparing the existing development, the pedestrianised avenue / plaza of the Scheme linking Lok Shan Road and Chi Kiang Street will provide a better view from short viewpoints at the existing Maidstone Road to the south. Comparing

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	and environmental impact of such massive build along the road	the proposed Scheme to the development parameters under the prevailing Outline Zoning Plan, the building separation will be larger under 140mPD building height restriction. The blockage of view and sunlight will be reduced.
270	Proportion of public housing should be increased and dispersed within the Scheme to maintain social and income diversity	In response to the PAs, the Scheme, as pilot sites of CBS building redevelopment projects, targets to fulfill the objectives in PA by full utilisation of the development potential of the site. The housing supply will be increased by about 5 times from existing about 460 units to about 2,500 units. If the Scheme is approved to be implemented, about 1/3 of the site in southern part will be earmarked for development by the agent appointed by the Transport and Housing Bureau. Besides, not less than 2,150 sq.m. GFA will be reserved to provide appropriate GIC facilities to meet the community needs.
354	Land subsidence due to the soft subsoil in the redevelopment area and the construction of MTR at Ma Tau Wai Road. Instances of subsidence, in the form of large and numerous vertical cracks, are now visibly apparent in "Lucky Building 七喜大廈",	The URA will request the contractor of the CBS-2:KC development to closely monitor any impact to the surrounding buildings and ensure minimal disturbance and no structural danger.

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	4-6 Kiang Su Street as well as in structures in the residential car park of 118-128 Maidstone Road.	
***意見類別二：有關收購、租戶特惠津貼及安置政策**		
4, 9, 14-25, 45, 48-50, 54, 85-88, 105, 126, 157, 158, 173, 202, 205, 216, 217, 219, 233, 238, 245, 251, 260, 268, 271, 274-275, 280, 286, 290, 307, 313, 354, 382, 384, 387, 391-393, 429, 437, 439, 441-443	● 非業主自願，不應要求業主補地價 / 取消補地價 ● 補地價計算不公平 ● 強奪福利 / 剝奪公務員合法權益，如居住權和繼承權，有關權益是受到憲法保障的	根據地政總署的資料，政府早年以十足市值的三分之一地價批出合作社樓宇用地，隨後合作社成員在取得相關單位業權的時候，其轉讓契約設有轉讓限制條款，合作社樓宇業主必須先向政府繳付三分之二土地補價才可出售單位。有關補價是業主在取得業權時與政府之間的條款。任何減免均偏離一貫的政府政策和做法，亦對已完成補價的業主不公平。 政府已檢視其土地補價的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020 年 6 月 1 日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎適用於該計劃。

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		「現有用途土地價值」的補地價為樓面地價的三分之二，並加上合作社現樓及新樓市值的折讓比例。請參照以下假設例子的計算方法： (甲) 以「重建價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($\$100,000/m^2$) = $\$66,666/m^2$ (按樓面面積計) (乙) 以「現有用途土地價值」基礎計算作簡單說明 $\frac{2}{3}$ x樓面地價($\$100,000/m^2$) x $\frac{\text{合作社現樓價 } \$90,000/m^2}{\text{新樓樓價 } \$180,000/m^2}$ = $\$33,333/m^2$ (按樓面面積計) 在上述假設例子中，土地補價 (乙) 約為土地補價 (甲) 的百分之五十。由於每宗個案不同 (例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同)，上述假設例子只用作參考。 此外，(前) 合作社社員可向地政總署遞交申請評估補地價的金額作參考。

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		根據合作社樓宇的土地契約條款，(前) 合作社社員須向政府繳付土地補價，才可以轉讓其單位。業主作為業權人，有履行地契的責任。政府亦為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。此外，市建局及地政總署會協調簡化業主繳交補地價的手續。當該計劃獲批准後，市建局會向業主發出收購建議。在同一時間地政總署會提供補地價金額給業主考慮。 根據公務員事務局的資料，公務員房屋福利是根據個別公務員的聘用條款，以及有關房屋福利計劃的條款及條件提供予合資格的在職人員。合作社計劃是按資源酌情提供的房屋福利，並非公務員的服務條件，因此合作社計劃不能被視為合作社社員的終身福利。 舊有的公務員房屋福利當中包括有作為服務條件提供予合資格人員的公務員房屋福利計劃，例如高級公務員宿舍、自行租屋津貼等。政府一貫的政策是為在職公務員提供公務員房屋福利。

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		就未解散的合作社而言，合作社成員可於在生時提名符合其所屬合作社章程規定的實益承繼人，並於其身故後繼承會籍。如合作社已解散，前社員並已取得單位的業權，有關業權可於業主身故後作為其遺產留給承繼人。 根據合作社計劃，政府以優惠價批出土地，並提供貸款，讓合資格的公務員可透過成立合作社興建住宅樓宇。計劃的主要目的是為合作社社員及其家屬提供居所，當時的政策並沒有計劃讓合作社社員取得法定業權。合資格的公務員在成為合作社社員時已被視為享用了公務員的房屋福利。 至於讓社員取得其單位和土地業權成為業主，並且在日後在補地價後自由買賣其單位乃政府提供予社員的一項選擇。至於是否需要申請散社乃合作社內部事宜。前社員於成為業主後可按自身情況考慮何時向政府補回地價。 此外，該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價

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		為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。因此並非強奪居民的權益。
4, 9, 14-19, 47, 54, 63, 85, 91, 124, 205, 216, 217, 223, 232, 233, 238, 240, 245, 322, 361, 377, 379, 402, 403, 437	● 要求提供較高呎價賠償 ● 現實沒有面積和質素相若的單位作客觀和合理比較參考，市建局估價方法，非常可能嚴重低估收購價	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。

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		按市建局沿用行之有效的方式，將以公開抽籤方式，委託七間獨立顧問公司評估該假設重置單位的呎價，在去除最高和最低價值後，以五個評估價值的平均數作為該假設單位的呎價。而該假設重置單位的呎價，會在整個項目內劃一採用。
4, 9, 29, 51-54, 87-91, 100, 105, 158, 159, 160, 202, 205, 217, 219, 223, 232, 233, 276-279, 282, 287, 289, 293, 295-296, 304, 310, 322, 345, 354, 356, 357, 361, 379, 386, 389, 395, 399, 403, 437	● 要求同區呎換呎 / 重置新居面積相約 ● 難以買回同區環境 / 面積相約的單位 ● 分開居住導致家庭照顧困難	已經補了地價的合作社樓宇自住業主，可以獲得全數百分百的收購建議金額，相信受影響的自住業主可靈活運用該津貼，在同區或其他地區的私人市場，選擇購買面積相約的重置單位。 另外，未補地價合作社樓宇業主繳付補地價所需金額後，所得的收購建議金額餘款會較其他已補地價的合作社樓宇業主為少，因此政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。 如獲得行政長官會同行政會議核准進行該計劃，市建局會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的

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		選擇。選擇「樓換樓」的住宅自住業主必須先接受按「七年樓」呎價計算的收購建議金額，才可選擇「樓換樓」。市建局會進一步研究「樓換樓」選擇的安排，盡可能回應遷置的需要。
4, 14-19, 50, 51, 54, 100, 126, 157-160, 202, 217, 240, 243, 276-279, 282, 287, 289, 293, 295-296, 304, 310, 341-342, 354, 356, 357, 359-361, 379, 395, 402, 403, 437	● 須賠償因搬遷而新增的經濟開支，如裝修、傢俱、水電煤按金、管理費、地租、差餉等 ● 提供搬遷及租金津貼 / 臨時住所補償	根據市建局現行政策，除自置居所津貼或補助津貼外，住宅物業的業主亦可獲相關費用津貼，以資助業主因購買替代住宅物業而引致的開支及搬遷的相關費用；實際金額將於個別項目進行收購時作實及公佈。 如住宅物業的業主於購買替代住宅物業時的合理及必須實際開支（即出售受影響物業予市建局的律師費及購買替代住宅物業的搬遷費、印花稅、地產代理佣金及律師費），多於市建局給予的相關費用津貼，業主可向市建局提出申請發還超出相關費用津貼之開支，惟業主只可就其出售予市建局的每個住宅物業提交一份申請，並必須符合相關資格準則。 根據 2018 年《施政報告》指示，該計劃須按照市建局沿用的推展項目方式進行，包括市建局沿用的收

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		購、租戶特惠津貼及安置政策，而租金津貼並不符合上述政策。
14-19, 217, 268, 274-275, 280, 286, 290, 300, 303, 383, 399, 437	● 沒有預留原區安置房屋 ● 有權選擇原區安置，如興建原區專門用來安置的大廈，受影響居民可優先購買	市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。此外，政府亦決定將一幅位於啟德的用地給房協興建專用安置屋邨，為合資格的合作社單位自住業主作出特別安排，讓其可購買該專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在 2025 至 2026 年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。
216, 238, 245	補地價安排上未有提供支援	市建局會協助業主處理補地價的程序，簡化補地價的審批流程。而每名業主亦可獲政府豁免在補地價時所需支付的數萬元行政費，可減輕社員在處理補地價方面所涉的繁複程序和財政負擔。

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		此外，政府已檢視有關土地補價的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020 年 6 月 1 日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎適用於該計劃。這些安排，是對該計劃的重要支援。
402	啟德安置單位只有 400 至 500 呎，比本人現居單位差不多少一半，不實用，太狹小	有關位於啟德的專用安置屋邨將提供足夠資助出售單位，供受合作社試點項目影響的合資格前合作社社員自住業主購買。根據現有資料，按照初步設計概念，有關單位主要為兩房單位，其餘為三房單位。具體之單位面積、間隔和數目均以日後獲批圖則作準，預計有關準則將參考資助出售房屋的規格。政府及房協將會適時公佈預售計劃。 另外，如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇。相信業主可根據具體需要以現金補

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		償或「樓換樓」計劃選擇合適的重置單位改善居住環境及生活。
***Comments Category 2: Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policies**		
257	The location of the unit in the new development for rehousing affected residents should as far as possible be the same as the location of the properties they live	According to the new URS 2011, and as far as relevant legislation allows, the URA will offer FFF arrangement (in-situ or in the same district or at available sites) to affected eligible owner-occupiers of domestic properties. Under such arrangement, new flats will be made available in a URA new development in-situ or URA development(s) in the same district or available sites at market value, as an additional choice to cash offer to such owner-occupiers. The size of units offered for FFF is subject to further study and decision of the URA.
256, 270, 412	● Provide genuine and fair, equitable compensation ● The net amount of compensation should at least be sufficient for purchasing the property for rehousing, and renting a flat similar in size and ceiling height and in comparable location during the interim period, and covering the removal expenditure and related reasonable	The Scheme is commenced in accordance with the URAO and the usual project implementation approach, including prevailing acquisition and rehousing policies, adopted by the URA. The prevailing acquisition principle of URA is based on the property acquisition policy approved by the Finance Committee of the Legislative Council in March 2001 as the principle of compensation calculation.

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	expenses like legal fees, stamp duties, estate agent's fees	The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view. Following the prevailing practice, the URA will appoint 7 independent consultants by open ballot to assess the value per saleable area of the notional replacement flat. The average of the 5 assessed values after removing the highest and lowest values will be adopted for the whole Scheme. In addition to HPA or Supplementary Allowance (SA), the URA will offer an Incidental Cost

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		Allowance (ICA) to owners of domestic properties to assist payment of removal expenses and expenditure relating to the purchase of a domestic replacement flat. If the amount of necessary and reasonable expenses actually incurred by the owner of a domestic property in selling the affected property to URA (i.e. legal cost) and purchasing a domestic replacement flat (i.e. removal cost, stamp duty, agency fee and legal cost) exceeds the amount of ICA offered by URA, the owner may be reimbursed with the difference subject to certain eligibility criterion. As stated in PA 2018, the Scheme is commenced in accordance with the usual project implementation approach, including prevailing acquisition and rehousing policies, adopted by the URA and the interim rental subsidies deviates from the above policies.
256, 270	● Unreasonable requirement for payment of 2/3 land premium	According to the Lands Department, under the CBS Scheme, land was granted at a concessionary premium of one-third of the full market value of the land concerned and the outstanding land premium was two-thirds of the full market value.

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	● Provide genuine negotiation process including discussion on outstanding land premium and its possible concession	The Government has reviewed the basis for land premium assessment. An owner of an individual unit does not possess the land title while redevelopment needs the agreement of all owners. Thus, starting from 1 June 2020, "Existing Use Land Value (EULV)" will be adopted as the basis for assessment when an individual owner of CBS unit applies for the removal of the alienation restriction unless there is proof of single ownership of the building. This basis is applicable to the Scheme. The outstanding land premium on the basis of EULV is equal to 2/3 of the accommodation value times the ratio of the price of the existing CBS building and a new building, assuming the old and new buildings are of similar GFA in the same district. A hypothetic example is shown below: (A) On the basis of "Redevelopment Value (RDV)" $\frac{2}{3}$ x Accommodation Value ($100,000/m^2) = $66,666/m^2 (based on GFA)

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		(B) On the basis of EULV $\frac{2}{3}$ x Accommodation Value ($100,000/m^2) x $\frac{\text{CBS existing flat price } \$90,000/m^2}{\text{New flat price } \$180,000/m^2}$ = $33,333/m^2 (based on GFA) From the above hypothetic example, the outstanding land premium of (B) is 50% of that of (A). The above hypothetic example is only for reference as individual case is different due to different factors including location, orientation, floor, unit size and permissible PR, etc. Besides, (ex) CBS members can submit application to the Lands Department for the assessment of the outstanding land premium for their information.
256	For the option of buying subsidized sale flats of dedicated rehousing estate to be developed and managed by the Hong Kong Housing Society, is the size of the flats similar to the size of the CBS accommodation affected by the Scheme each with saleable area of over or close to 1,000 square feet and with high ceiling? If not, is it that each affected	According to the Development Bureau, other than those eligible CBS owner-occupiers who do not join FFF arrangement (in-situ or in the same district or at available sites) under URA's prevailing compensation package, the subsidised sale flats (SSFs) of the DRE near Muk Chun Street in KTDA is an alternative option offered at a discounted price

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	household may purchase 3 to 5 units such that the total saleable area of the units bought is no less than the saleable area of existing CBS property including the verandah?	based on a mechanism similar to that for other subsidised housing provided by the Government. According to the current information, mainly 2-bedrooms and 3-bedrooms units will be provided in accordance with the preliminary design concept of the DRE. Actual unit sizes, layout and number of the SSFs, which would make reference to the specifications of subsidised housing flats, are subject to the approved building plans. Details of the DRE will be provided by the Government and HKHS in due course.
256	It would be extremely unfair and unreasonable if the area of the verandah is excluded for the purpose of calculating the market value of my residence	Calculation of the acquisition offer of a property is based on the saleable area of the property. The definition of saleable area shall follow the Code of Measuring Practice issued in March 1999 and the Supplement to the Code of Measuring Practice issued in July 2014 by the Hong Kong Institute of Surveyors. According to the Code of Measuring Practice, the saleable area of a unit comprises the floor area exclusively allocated to that unit including balconies and other similar features.

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		URA will not purchase a structure which is not erected in compliance with the Buildings Ordinance or the terms of the Government lease and no value, compensation or allowance will be paid by URA in respect of such structure. Subject always to the owner having good title to the property or any part thereof, area calculations may be based on the boundary of the property as delineated on the assignment plan and the area as measured from the latest relevant building plans approved by the Buildings Department (if any). Specific premises will be considered with reference to the actual situation and cannot be confirmed in general.
256	It would be very unfair and unreasonable if my brother is not regarded as owner-occupier for the purpose of determining whether he is eligible for Home Purchase Allowance, participation in "Flat-for-Flat" Scheme and purchase of subsidized sale flat of dedicated housing estates developed and managed by the Hong Kong Housing Society, as he is the successor of the CBS membership but	Individual case of ownership or owner-occupier status of the unit will be reviewed and considered with reference to the actual situation and the prevailing policies after CE in C approval of the Scheme when the offer is made.

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	has already got married and moved to a separate residence	
305, 308, 311, 339, 346, 351	The law gives the civil servants the right to live there and the government does not have the right to take back their benefits	According to the Civil Service Bureau, the provision of civil service housing benefits is governed by the terms of appointment of individual officers and the eligibility criteria and terms and conditions of the respective housing benefit schemes. The CBS Scheme is a discretionary housing benefit where the provision is subject to resource availability. The CBS Scheme is not a condition of service and hence cannot be regarded as a life-long housing benefit of CBS members. Among the old forms of civil service housing benefits, there are civil service housing benefit schemes provided to eligible officers as a condition of service, e.g. Non-departmental Quarters, Private Tenancy Allowance, etc. It has been the Government's policy all along that civil service housing benefits are provided for serving officers. As far as beneficial succession of undissolved CBS flat is concerned, a CBS member may, during his/her lifetime, nominate a beneficial successor as

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		defined in the by-laws of the CBS concerned for beneficial succession of his/her membership upon his/her decease. If the CBS is dissolved and the former member is assigned with the legal title of his/her CBS flat, the ownership of the former CSB flat can be transferred to his/her successor as the estate. According to the CBS Scheme, the Government provided land at concessionary price and low-interest loans to groups of eligible civil servants who formed CBSs for building blocks of flats for the occupation of CBS members and their family members. The CBS Scheme did not aim to allow CBS members to possess the relevant legal title. An eligible civil servant is considered to have enjoyed the civil service housing benefit when he/she became a CBS member. It is the internal matter of the CBS concerned to decide whether to dissolve their society and allow their members to acquire the legal title of their CBS flats. Former CBS members may decide when to

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		pay the land premium to the Government according to their own situation.
***意見類別三：有關對社區網絡 / 社區設施的影響方面**		
9, 14-19, 77, 159, 160, 198-200, 217, 224-226, 233-236, 260, 276-279, 282, 287, 289, 293, 295-296, 304, 310, 341-342, 344, 356, 361, 362, 379, 382, 384, 387, 388, 389, 391, 395, 402, 403, 416, 429, 430, 431, 440	● 舊區重建計劃最基本應是改善街坊生活及保存舊區的社區網絡 ● 重建將會破壞社區內的鄰里關係 ● 須遠離鄰近的政府 / 社區設施、醫院、港鐵站、工作地點等等	如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響及合資格的住宅自住業主提供「**樓換樓**」選擇 (在其**重新發展計劃原址或同區或適當地盤**)，作為建議收購金額以外的額外選擇。此外，政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的**專用安置屋邨的資助出售單位**。上述的安置選擇均讓受影響的自住業主住戶有機會維持在原有的社區網絡。
74, 75, 81, 200, 356, 379	● 須離開原有校網，有小孩的家庭不願搬遷 ● 希望能在同區校網居住	如獲得行政長官會同行政會議核准進行該計劃，市建局會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，或可選擇購買由政府於啟德發展區內提供的專用安置屋邨單位，以緩解遷置可能構成的不便。上述的安置選擇均讓受影響的自住業主住戶有機會維持與該計劃同區的小學 34 校網及/或中學九龍城區校網。

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126, 143, 159, 173, 198, 199, 217, 219, 234-236, 240, 243, 271, 276-279, 282, 287, 289, 293, 295-296, 303, 304, 310, 336, 344, 345, 354, 362, 363, 364, 371, 379, 382- 384, 387, 389, 392-393, 399, 403, 416, 431, 440	被迫遷離習以為常的環境，生活不便，長者亦難以適應新環境	如獲得行政長官會同行政會議核准進行該計劃，市建局會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，或可選擇購買由政府於啟德發展區內提供的專用安置屋邨單位，以緩解遷置可能構成的不便。因此住宅自住業主如接受市建局的收購建議方案，相信可讓他們在同區購買較新的住宅或樓換樓單位居住，以保留在該區的網絡。 市建局及社區服務隊會盡量透過向長者提供安置事宜安排上及提供日後要遷往屋邨附近環境的資料，以紓緩長者有關的焦慮。社區服務隊會跟進已遷往新居所的長者個案，亦會舉辦活動協助長者認識社區設施、探訪新社區的社會服務單位及協助轉介至新社區的醫療服務。市建局的「夥伴同行」探訪計劃和社區服務隊將會特別關注獨居和二人住戶的長者，採取積極主動的探訪及提供適時的協助。
***Comments Category 3: Impact on Social Network / Community Facilities**		
179-183, 343, 346, 352	Residents are not easy to accommodate to a new environment	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer

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		an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers that may contribute to minimize the impacts due to relocation to different district. The URA and the SST will make an effort to alleviate their anxiety by providing information on the arrangement of rehousing and the new environment surrounding the estate.
294, 298, 301, 305, 306, 311, 315, 318, 334, 335, 339, 340, 343, 346, 352	● People who have been living for a long time would like to stay and do not want to move ● Relocating the elderly will have a long term detrimental effect on their mental and physical well being	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers that may contribute to minimize the impacts due to relocation to different district. The URA and the SST will make an effort to alleviate their anxiety by providing information on the arrangement of rehousing and the new environment surrounding the estate. After their relocation to a new accommodation, the SST will follow up and provide assistance to the elderly. The SST will conduct programs on getting to know the

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		local community facilities, visits to the social service providers, and provide assistance on referral to medical centers in the new neighbourhood. The URA "Project Engagement" team and the SST will follow up the singleton and doubleton elderly households and adopt a proactive approach to deliver prompt assistance to the elderly through home visits.
***意見類別四：有關市建局項目程序 / 重建方面**		
14-19, 50, 54, 125, 126, 157, 189-190, 202, 205, 217, 219, 223, 233, 240, 271, 356, 383, 392-393, 395, 425, 426	● 沒有收購 / 賠償 / 安置 / 補地價等詳細資料 ● 應盡快公佈收購程序及補償安排的具體方案	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購、租戶特惠津貼及安置政策。相關政策作為附錄 11 和 12 附夾於規劃報告中供公眾查閱。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，屆時將會提供進一步的資料。
14-25, 48-49, 157, 158, 202, 203, 205, 217, 219, 223, 233, 234, 307, 313, 354	不適當引用《收回土地條例》	根據《市區重建局條例》第 29 條的規定，市建局可向發展局局長提出申請，要求局長向行政長官會同行政會議建議，根據《收回土地條例》收回市建局為進行市區更新而所需的土地。

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		而在《市區重建策略》第25段中列明，儘管市建局可根據《市區重建局條例》，為進行重建而申請收回土地，但在向發展局局長提出申請前，市建局應考慮以協議方式收購所需土地。收購行動應在該計劃獲核准後，但在有關土地復歸政府所有之前進行。市建局將按此與合作社社員及業主協議進行收購。
14-25, 48-49, 199, 217, 243, 307, 313, 359-360	未有於項目公布前通知各住戶或合作社並進行諮詢	市建局須就所有重建發展計劃（包括試點項目）遵守保密原則，只會透過刊憲啟動相關項目時，才會對外公布項目細節，包括重建位置及範圍等資料。這是因為市建局對業主的「七年樓齡」補償較市場對這類舊樓的出價為高，對合資格租客亦有特惠津貼和安置安排，因此，項目在公布開展前必須保密，以免有人在獲悉消息後入住項目內已經撤銷轉讓限制的合作社樓宇單位，濫用補償安排或安置資源。 在諮詢公眾意見方面，該計劃根據刊憲公告，於2020年5月25日將該計劃的發展計劃草圖，包括第一階段社會影響評估報告呈交予城規會，並於2020年5月29日至6月19日的三星期時間內收集

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		公眾意見；於 2020 年 7 月 8 日將第二階段社會影響評估報告呈交予城規會，並於 2020 年 7 月 17 日至 7 月 31 日的兩星期時間內收集公眾意見；如城規會認為該草圖適宜公布，須當作是由城規會為施行《城市規劃條例》(第 131 章)而擬備的草圖，屆時將按《城市規劃條例》第 5 條展示兩個月以供公眾查閱及收集公眾意見。
14-25, 48-49, 217, 219, 233, 307, 313, 391	於項目公布當天進行戶口凍結登記過於倉猝及不公義，要求 7 天內交回或電話形式完成簡單問卷，是假諮詢及黑箱作業	根據《市區重建策略》第 31 及 32 段，公布項目的開始實施日期的目的，是讓市建局可參照這個日期，根據其政策決定受影響人士領取特惠津貼和獲得安置的資格。 市建局會在項目的開始實施日期進行凍結人口調查，以核實受影響人士領取特惠津貼和獲得安置的資格。這項調查應於當日或最多數日內完成，並必須全面而準確，以免有「假冒居民」魚目混珠，入住重建區，濫用補償安排或安置資源及避免有租戶被不公平逼走。 此外，市建局亦會在政府憲報公布建議項目後，進行第二階段社會影響評估及向受影響人士派發社會

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		影響評估問卷，而當中受訪人士的回應並不代表受影響業主已接受市建局的收購建議。
14-25, 29, 48-49, 50, 54, 126, 157, 173, 217, 219, 234-236, 240, 271, 307, 313, 354, 359-360, 362, 386, 392-393	市建局沒有安排公眾諮詢會，解釋有關研究評估和解答相關提問	受新型冠狀病毒疫情影響下，為避免人群聚集，減低居民及工作人員受感染的風險，市建局於2020年5月22日開展該計劃時，向受影響人士提供預先錄製的項目簡介影片以取代過往舉辦的公眾簡報會。該影片使居民能夠在疫情期間安全了解該計劃的內容，包括該計劃的規劃程序、該計劃若得到批准實施後的市建局物業收購及遷置安排，以及協助解散合作社安排。 由於疫情和政府為預防及控制疾病而制定的人群管制於6月及7月初逐步放寬，市建局聯同政府發展局、公務員事務局及地政總署的代表於2020年7月6日及7日，為該計劃的受影響的人士舉行了三場簡報會，作額外的平台並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。市建局並會進行「夥伴同行」探訪計劃，深入解釋政策及項目的最新進展、補償及遷置

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		安排，以及時間表等等，而且透過不同途徑與居民保持溝通及交流，以釋除居民的疑慮。
20-25, 43, 48-49, 52, 54, 55, 64, 78, 80, 89, 90, 91, 107, 113, 124, 126, 143, 157, 158, 173, 174-178, 185-190, 203, 217, 219, 224-226, 232-236, 240, 243, 258, 269, 271, 273, 276-279, 281, 282, 283-285, 287, 288, 289, 291-292, 293, 295-296, 297, 299, 303, 304, 307, 309, 310, 313, 336, 341-342, 345, 354, 356-362, 377, 382-384, 387, 388, 392-393, 395, 399, 402, 403, 430	● 違反市區重建局條例 5(b)：“*透過將老舊失修區重建成經妥善規劃，並(如適當的話)設有足夠交通設施、其他基礎建設及社區設施的新發展區，從而改善香港的住屋水平及已建設環境，以及已建設區的布局*” ● 根據《市區重建局條例》第 I 部 6(1)，此收購項目本身的住屋水平已很高及已建設環境也是頂級，所以根據第 I 部 6(2)，很明顯已經是有損害第 I 部 6(1)款的一般性的原則 ● 沒有選擇重建周邊破舊大廈，卻重建狀況良好的合作社樓宇 ● 合作社樓宇保養得宜	市建局為回應政府在 2018 及 2019 年《施政報告》中的邀請，根據《施政報告》中所列出適合重建合作社樓宇的特點，考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，物色一至兩個適合作高密度發展的合作社地段作為重建試點，該計劃是重建試點項目之一。 該計劃旨在落實並達到合作社重建試點項目的目標，因此挑選合作社較集中的地段，故不會包含其他周邊非合作社樓宇。 根據核准一般建築圖則，該計劃內的所有樓宇樓齡均為 50 年以上，沒有電梯或其他無障礙設施，對住客和長者出入造成不便，宜居性較差。 該計劃地盤現時被美善同道和江蘇街分割，而道路兩側均有路邊泊車位，行人路約為 2-3 米闊。在土瓜灣港鐵站啟用後，預計將有更多的行人途經該計

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		劃內的行人路段，人流相對增加。車輛於現有美善同道的掘頭路窄路調頭會產生對行人的危險。 該計劃內並沒有任何休憩空間供公眾使用，離該計劃最近的公共空間為邊界外的高山道公園。 因此，該計劃除了旨在落實《施政報告》的目標，透過充分利用地段的發展潛力，增加房屋供應外，市建局亦為該計劃的土地透過重整及重新規劃，提供設有現代化設施的樓宇、休憩空間供公眾使用、人車分隔的地面步行街 / 廣場，並設有園景裝置及種植花木、商業 / 零售用途，以及提供地下街連接港鐵站出口，改善整體居住環境、地區的連接性及暢達性，並透過合適的城市設計，營造更宜居的社區，達致更廣泛的社區裨益，惠及更多有需要的市民。
50, 157, 271, 392-393	違反 2011 年市區重建策略第 7 段："*進行市區更新時，應採用「以人為先，地區為本，與民共議」的工作方針。*"	市建局是按照《市區重建策略》進行工作，於實施該計劃時，絕對符合《市區重建策略》第 7 段中「以人為先，地區為本，與民共議」的工作方針。

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		本著「以人為先」的工作方針，在受新型冠狀病毒疫情影響下，為避免人群聚集，減低居民及工作人員受感染的風險，市建局於 2020 年 5 月 22 日開展該計劃時，向受影響人士提供預先錄製的項目簡介影片以取代過往舉辦的公眾簡報會。該影片使居民能夠在疫情期間安全了解該計劃的內容，包括該計劃的規劃程序、該計劃若得到批准實施後的市建局物業收購及遷置安排，以及協助解散合作社安排。 由於疫情和政府為預防及控制疾病而制定的人群管制於 6 月及 7 月初逐步放寬，市建局聯同政府代表於 2020 年 7 月 6 日及 7 日，為該計劃的受影響的人士舉行了三場簡報會，作額外的平台並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。市建局並會進行「夥伴同行」探訪計劃，而且向居民深入解釋政策及項目的最新進展、補償及遷置安排，以及時間表等等，以釋居民的疑慮。上述措施均是市建局按著「以人為先，地區為本」的工作方針執行。

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		在諮詢公眾意見方面，該計劃根據刊憲公告，於 2020 年 5 月 25 日將該計劃的發展計劃草圖，包括第一階段社會影響評估報告呈交予城規會，並於 2020 年 5 月 29 日至 6 月 19 日的三星期時間內收集公眾意見；於 2020 年 7 月 8 日將第二階段社會影響評估報告呈交予城規會，並於 2020 年 7 月 17 日至 7 月 31 日的兩星期時間內收集公眾意見；如城規會認為該草圖適宜公布，須當作是由城規會為施行《城市規劃條例》(第 131 章)而擬備的草圖，屆時將按《城市規劃條例》第 5 條展示兩個月以供公眾查閱及收集公眾意見。三段公眾諮詢的時期，亦是市建局執行「與民共議」的佐證。
233	違反基本法第 105 條的規定：“*香港特別行政區依法保護私人和法人財產的取得、使用、處置和繼承的權利，以及依法徵用私人和法人財產時被徵用財產的所有人得到補償的權利。*”	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購、租戶特惠津貼及安置政策。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，即該物業的實際價值，加上一筆特惠津貼 (即自置居所津貼)。 收購是以協議的形式進行，並非市建局徵用私人財產，因此基本法第 105 條並不適用。

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20-25, 48-49, 219, 234-236, 307, 313, 359-360	● 「規劃報告書」只有英文版本，許多人是看不懂和理解的，特別是長者 ● 需要一份中文的規劃報告書	按照城規會的慣常做法，其會議文件僅提供英文版本，提供英文版本的規劃報告書可方便城規會準備會議文件。 此外，由於規劃報告書中的技術評估報告涉及專業範疇，顧問公司慣常以英文撰寫及回覆政府相關部門，因此規劃報告書大部份內容只有英文版本，而報告書的行政摘要則中英版本均有提供。 有見及此，市建局為發展計劃草圖、註釋及說明書、第一階段及第二階段社會影響評估報告提供中文版本，盡量方便公眾了解該計劃。
***Comments Category 4: URA's Planning Procedure and Redevelopment Process**		
179-183, 228, 229, 256, 257, 259, 270, 298, 306, 315, 318, 334, 339, 340, 343, 352	● Buildings are in good conditions ● Buildings are well-maintained by the owners and they are not dilapidated which causing imminent danger to the public ● Areas in much poorer conditions where buildings are in dilapidated state deserve higher priority for redevelopment	In response to the PAs by the Chief Executive, the URA was invited to identify one or two clusters of CBS Scheme sites suitable for high-density development as pilot sites. The Scheme has been selected according to the prescribed multiple factors including but not limited to the following: cluster of CBS sites in high-density development areas (i.e. R(A) zone under the

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		Outline Zoning Plan) in the urban districts, numbers of CBS involved, proximity to existing public rental housing and other ancillary facilities, building age and its existing development density. The Scheme also seeks to improve the overall environment through redevelopment in accordance with the URS 2011. The concerned urban area is replanned to utilise the development potential and increase the housing supply. Part of the site will be earmarked for public housing development for the planning gain of general public. The connectivity and walkability is also improved through restructuring and urban design to create a livable community.
228, 256	● Violated the three core elements of the Urban Renewal Strategy 2011 approach of "People First, District-based, Public Participatory" ● The "People First, District-based, Public Participatory" approach should be adopted for urban renewal	The URA implemented the Scheme in accordance to the Urban Renewal Strategy 2011 approach of "People First, District-based, Public Participatory" Based on the "People First" approach, project briefing videos instead of the public briefing in past practice are provided to the affected persons by URA when the Scheme is commenced to avoid

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		gatherings and to minimize the risk of infection for residents and staffs under COVID-19 pandemic. The videos explain the Scheme such that residents can safely understand the content of the Scheme and include information on planning procedures, the URA's acquisition, tenant's ex-gratia allowance and rehousing policies, and assistance in the dissolution of CBS. As the situation of pandemic and the government prohibition on group gathering for prevention and control of disease has gradually relieved in June and July, 3 public briefing sessions were organized by URA with government representatives from Civil Service Bureau, Development Bureau and Lands Department on 6 and 7 July 2020 to inform all the affected persons, the details of the Scheme and to obtain public views on the Scheme. Questions on Freezing Survey, planning, acquisition, tenant's ex-gratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting. The URA also implemented "Project Engagement" Programme to visit residents to update about the project progress,

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B) 反對意見 Object Comments (253 comments in total)		
		explain the compensation and rehousing arrangement to ease their concerns. The above approach shows that the URA adopted "People First, District-based" approach. As mentioned in the Gazette, two public consultation periods are provided. After the submission of the Development Scheme Plan (DSP) to the TPB on 25 May 2020, submission of the public comment will be allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 will be allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the Town Planning Ordinance (TPO) (Cap. 131). It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months. The three public consultation periods proved that the URA follows "Public Participatory" approach.

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228, 354	Planning report only available in English and in the URA's web page, which is highly incomprehensible for the elderly	According to the usual practice of TPB, the meeting paper is available in English only. The English version of the planning report can facilitate the preparation of meeting paper. Besides, the planning report comprises technical assessment reports with professional contents completed by the consultants. English is the usual language for the technical assessment reports and response to departmental comments and thus the planning report is mainly available in English only while the executive summary of the planning report is available in both Chinese and English. For the convenience of the public to understand the Scheme, Chinese version is provided for the draft DSP including the Notes and Explanatory Statement, Stage 1 and 2 Social Impact Assessments.
228, 256, 354	● Limited time of public inspection period ● No public participation / consultation on planning design	As mentioned in the Gazette, the DSP, including the Stage 1 Social Impact Assessment (SIA) report and the Stage 2 SIA report, is available for public inspection when they are submitted to the TPB until

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	● Limited range of questions within a questionnaire that gave the residents no opportunity to contribute towards this redevelopment project	the draft DSP is considered by the TPB. Adequate time is allowed for public inspection. As the situation of pandemic and the government prohibition on group gathering for prevention and control of disease has gradually relieved in June and July, 3 public briefing sessions were organized by URA with government representatives from Civil Service Bureau, Development Bureau and Lands Department on 6 and 7 July 2020 to inform all the affected persons, the details of the Scheme and to obtain public views on the Scheme. Questions on Freezing Survey, planning, acquisition, tenant's ex-gratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting. The URA also implemented "Project Engagement" Programme to visit residents to update about the project progress, explain the compensation and rehousing arrangement to ease their concerns. As mentioned in the Gazette, two public consultation periods are provided. After the submission of the DSP to the TPB on 25 May 2020,

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		submission of the public comment will be allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 will be allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the Town Planning Ordinance (TPO) (Cap. 131). It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months. Based on the above, sufficient time and different platforms are provided for public engagement.
228, 354, 412	Without detailed information about compensation and/or rehousing arrangement	The Scheme is commenced in accordance with the URAO and the usual project implementation approach, including prevailing acquisition, tenant's ex-gratia allowance and rehousing policies, adopted by the URA. The prevailing policies are attached in the planning report as Appendices 11 and 12 for public inspection. Subject to the approval by the CE in C to implement the Scheme, the URA

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		will issue acquisition offer to an owner of domestic property. Further details will be provided when the offer is made.
256	The deadline for the public to make comments on CBS-2:KC is less than 1 month from the announcement of the Scheme, and the deadline is different from CBS-1:KC. As the residential properties and people affected including civil servants and/or their family members by the 2 projects are of the same type, this different treatment / arrangement may violate Article 25 of the Basic Law that all Hong Kong residents shall be equal.	As CBS-2:KC is implemented as a Development Scheme which involved amendment to the Outline Zoning Plan, two public consultation periods are provided as mentioned in the Gazette. After the submission of the DSP to the TPB on 25 May 2020, submission of the public comment will be allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 will be allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the Town Planning Ordinance (TPO) (Cap. 131). It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months.

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		Based on the above statutory procedure, not less than CBS-1:KC public consultation periods are provided to allow public to make comments for this CBS-2:KC Scheme when comparing to CBS-1:KC which is implemented by way of Development Project.
256	Why people affected by the Scheme are deprived of the right to object to the implementation of the Scheme and have their objection entertained and considered? Is this in accordance with Article 6 of the Basic Law?	People affected by the Scheme have the right to object to the Scheme through the Town Planning Ordinance (TPO) (Cap. 131). As mentioned in the Gazette, two public consultation periods are provided. After the submission of the DSP to the TPB on 25 May 2020, submission of the public comment will be allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 will be allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the TPO.

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		It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months.

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C) 一般意見 General Comments (83 comments in total)		
***意見類別一：有關收購、租戶特惠津貼及安置政策**		
13, 156, 241, 353, 355, 369, 374, 375, 376, 381, 390, 406, 407, 409, 417, 423, 427, 433, 434, 436, 438	● 希望可以原區安置 ● 建議興建原區專門用來安置的大廈，受影響居民可優先購買 ● 可考慮分階段發展以便原區安置	市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。此外，政府亦決定將一幅位於啟德的用地給房協興建專用安置屋邨，為合資格的合作社單位自住業主作出特別安排，讓其可購買該專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在 2025 至 2026 年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。
7, 84, 132, 151, 152, 156, 166, 201, 218, 230-231, 249, 252, 265, 317, 333, 353, 355, 367-370, 372, 374-376, 378, 380, 381, 394, 396, 397, 398, 400, 405, 406, 408, 409, 413-	● 期望合理補償 ● 應考慮以呎換呎 ● 希望能在同區買回與現時面積相約的單位	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。

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C) 一般意見 General Comments (83 comments in total)		
415, 417, 418, 423, 424, 435, 436, 438, 444		如獲得行政長官會同行政會議核准進行該計劃，市建局將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 已經補了地價的合作社樓宇自住業主，可以獲得全數百分百的收購建議金額，相信受影響的自住業主可靈活運用該津貼，在同區或其他地區的私人市場，選擇購買面積相約的重置單位。 另外，未補地價合作社樓宇業主繳付補地價所需金額後，所得的收購建議金額餘款會較其他已補地價的合作社樓宇業主為少，因此政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協

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		在啟德發展區興建和管理的專用安置屋邨的資助出售單位。 如獲得行政長官會同行政會議核准進行該計劃，市建局會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇。選擇「樓換樓」的住宅自住業主必須先接受按「七年樓」呎價計算的收購建議金額，才可選擇「樓換樓」。市建局會進一步研究「樓換樓」選擇的安排，盡可能回應遷置的需要。
433	據知本區鄰近山西街有居屋地盤，且已動工，未知能否分配居屋給受公務員重建計劃影響之住戶	根據發展局的資料，政府目前的計劃，是房協把位於啟德發展區 1E1 號地盤 (近沐縉街) 部分用作興建專用安置屋邨，以便為受影響的前公務員合作社社員自住業主提供多一項在私人市場以外購置重置單位的選擇，即購買該專用安置屋邨內的資助出售單位作居所。
436, 438	市建局在計算面積時，要包括地下住户的天井位	根據市建局現行政策，物業的收購價是根據物業的實用面積計算。市建局會委聘顧問公司，以量度該計劃內所有受影響物業的實用面積及附屬面積。實用面積的定義，是根據香港測量師學會於 1999 年 3

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		月制定的「量度作業守則」及於 2014 年 7 月所發出的「量度作業增補守則」之定義作為標準。在物業內的任何違法構築物 (如有)，不會計算其面積及相應的收購金額。 市建局在計算面積時，一般會以已登記轉讓文件圖則上界線劃定及以屋宇署最後批核的有關建築圖則 (若有) 量度所得的面積為準，並且業主必須擁有該物業或該部分的妥善業權。個別物業需要按實際情況考慮，不能一概而論。
***Comments Category 1: Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policies**		
72, 253-255, 329, 401, 411, 420-421	Hope to be compensated a replacement unit with similar size and environment in the same district	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers as additional choices to cash offer. These choices provide an option for the owner-occupiers to rehouse in the same district.
420-421	The housing benefits provided under the Co-operative Housing Scheme should not be taken away	According to the Civil Service Bureau, the provision of civil service housing benefits is governed by the terms of appointment of individual officers and the

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		eligibility criteria and terms and conditions of the respective housing benefit schemes. The CBS Scheme is a discretionary housing benefit where the provision is subject to resource availability. The CBS Scheme is not a condition of service and hence cannot be regarded as a life-long housing benefit of CBS members. Among the old forms of civil service housing benefits, there are civil service housing benefit schemes provided to eligible officers as a condition of service, e.g. Non-departmental Quarters, Private Tenancy Allowance, etc. It has been the Government's policy all along that civil service housing benefits are provided for serving officers. As far as beneficial succession of undissolved CBS flat is concerned, a CBS member may, during his/her lifetime, nominate a beneficial successor as defined in the by-laws of the CBS concerned for beneficial succession of his/her membership upon his/her decease. If the CBS is dissolved and the former member is assigned with the legal title of his/her CBS flat, the ownership of the former CSB

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		flat can be transferred to his/her successor as the estate. According to the CBS Scheme, the Government provided land at concessionary price and low-interest loans to groups of eligible civil servants who formed CBSs for building blocks of flats for the occupation of CBS members and their family members. The CBS Scheme did not aim to allow CBS members to possess the relevant legal title. An eligible civil servant is considered to have enjoyed the civil service housing benefit when he/she became a CBS member. It is the internal matter of the CBS concerned to decide whether to dissolve their society and allow their members to acquire the legal title of their CBS flats. Former CBS members may decide when to pay the land premium to the Government according to their own situation.
319	It is not fair to the CBS owners especially who have not yet paid the land premium and removed the alienation restriction, because if they need to pay the land premium based on "development	According to the Lands Department, the Government has reviewed the basis for land premium assessment. An owner of an individual unit does not possess the land title while

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	potential of the site", they can only receive the compensation based on "existing use value" from URA	redevelopment needs the agreement of all owners. Thus, starting from 1 June 2020, "Existing Use Land Value" will be adopted as the basis for assessment when an individual owner of CBS unit applies for the removal of the alienation restriction unless there is proof of single ownership of the building. This basis is applicable to the Scheme. The outstanding land premium on the basis of EULV is equal to 2/3 of the accommodation value times the ratio of the price of the existing CBS building and a new building, assuming the old and new buildings are of similar GFA in the same district. A hypothetic example is shown below: (A) On the basis of "Redevelopment Value (RDV)" $\frac{2}{3}$ x Accommodation Value ($100,000/m^2) = $66,666/m^2 (based on GFA)

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		(B) On the basis of EULV $\frac{2}{3}$ x Accommodation Value ($100,000/m^2) x $\frac{\text{CBS existing flat price } \$90,000/m^2}{\text{New flat price } \$180,000/m^2}$ = $33,333/m^2 (based on GFA) From the above hypothetic example, the outstanding land premium of (B) is 50% of that of (A). The above hypothetic example is only for reference as individual case is different due to different factors including location, orientation, floor, unit size and permissible PR, etc. Besides, (ex) CBS members can submit application to the Lands Department for the assessment of the outstanding land premium for their information. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely HPA).

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		The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.
***意見類別二：有關對社區網絡 / 社區設施的影響方面**		
132, 166, 218, 249, 252, 264, 353, 355, 370, 376, 378, 394, 396-398, 400, 410, 413-415, 417, 435, 438	● 重建將會破壞其社區網絡和鄰里關係，不願意離開自己熟悉的社區 ● 不希望遠離鄰近的政府 / 社區設施、醫院、港鐵站、工作地點等等 ● 這裡有熟悉的街坊及社區，如要搬往別區，擔心不能適應新環境，對居民帶來生活上的不便	如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展計劃原址或同區或適當地盤)，作為建議收購金額以外的額外選擇。此外，政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。上述的安置選擇

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		均讓受影響的自住業主住戶有機會維持在原有的社區網絡。
***意見類別三：有關市建局項目程序 / 重建方面**		
127, 130, 161, 230-231, 237, 239, 246, 252, 317, 365, 404, 405, 407, 414, 422, 423, 428, 432, 435	未有具體收購細節、賠償方案等實際資料	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購、租戶特惠津貼及安置政策。相關政策作為附錄 11 和 12 附夾於規劃報告中供公眾查閱。如獲得行政長官會同行政會議核准進行該計劃，市建局將會向受影響業主提出收購其物業，屆時將會提供進一步的資料。

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213, 353, 405, 406, 408, 413	● 建議市建局透過不同途徑對計劃作講解，回答居民問題，以免產生誤會 ● 市建局就有關重建收購計劃未有舉行簡介會，講解及回答居民的疑慮問題	受新型冠狀病毒疫情影響下，為避免人群聚集，減低居民及工作人員受感染的風險，市建局於2020年5月22日開展該計劃時，向受影響人士提供預先錄製的項目簡介影片以取代過往舉辦的公眾簡報會。該影片使居民能夠在疫情期間安全了解該計劃的內容，包括該計劃的規劃程序、該計劃若得到批准實施後的市建局物業收購及遷置安排，以及協助解散合作社安排。 由於疫情和政府為預防及控制疾病而制定的人群管制於6月及7月初逐步放寬，市建局聯同政府代表於2020年7月6日及7日，為該計劃的受影響的人士舉行了三場簡報會，作額外的平台並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。市建局並會進行「夥伴同行」探訪計劃，深入解釋政策及項目的最新進展、補償及遷置安排，以及時間表等等，而且透過不同途徑與居民保持溝通及交流，以釋除居民的疑慮。

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C) 一般意見 General Comments (83 comments in total)		
166, 167, 237, 249, 252, 353, 369, 376, 390, 410, 417, 438	合作社樓宇結構狀況良好，保養得宜，沒有重建必要	市建局為回應政府在 2018 及 2019 年《施政報告》中的邀請，物色一至兩個適合作高密度發展的合作社地段作為重建試點。市建局根據《施政報告》中所列出適合重建合作社樓宇的特點，考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，選出該計劃作為重建的試點項目之一。 該計劃旨在落實《施政報告》的目標，透過充分利用地段的發展潛力，增加房屋供應。因此在選定試點的選址後，市建局為該計劃的土地作重新規劃，以用盡土地的發展潛力，並應《施政報告》的要求，將提供公營房屋的元素納入規劃之中，達致更廣泛的社區裨益，惠及更多有需要的市民。
***Comments Category 3: URA's Planning Procedure and Redevelopment Process**		
197	Broad picture only and not concrete at this stage. There is no substantial details outlining the facilities and improvements in all aspects	The Scheme is in planning stage and the details are subject to detailed design if the Scheme is approved by CE-in-C.
150, 253-255, 411	Insufficient information regarding the compensation	The Scheme is commenced in accordance with the URAO and the usual project implementation approach, including prevailing acquisition, tenant's ex-gratia allowance and rehousing policies,

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C) 一般意見 General Comments (83 comments in total)		
		adopted by the URA. The prevailing policies as Appendices 11 and 12 are attached in the planning report for public inspection. Subject to the approval by the CE in C to implement the Scheme, the URA will issue acquisition offer to an owner of domestic property. Further details will be provided when the offer is made.
420-421	Freezing survey conducted instantly without any fair warning	URA has to keep confidentiality of all redevelopment projects (including the pilot projects) and will only disclose the details of the projects when the projects are commenced and published in the Gazette. Commencement of the projects must be kept confidential to prevent any person abusing the compensation system or the rehousing arrangement.

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Stage 2 Responses to Public Comments

(Nov 2022)

Urban Renewal Authority 市區重建局

Kau Pui Lung Road / Chi Kiang Street Development Scheme

靠背壟道 / 浙江街發展計劃 (CBS-2:KC)

Responses to Public Comments 回應公眾意見

(Reference Nos. 參考編號 1-880)

Consultation Period 諮詢期：

Stage 2 第二階段：17/07/2020 – 31/07/2020

Types of Comments 意見類別：

A) Support 支持 = 134
B) Object 反對 = 662
C) General Comments 一般意見 = 28

Notes 註：

1. Comments submitted in English are responded in English.
   市建局會以中文回應以中文提交之意見。
2. A total of 880 comments were submitted within the consultation period. As all comments submitted by the same person would be treated as one according to Town Planning Board (TPB), the total number of comments received by the URA is considered as 824, including a total of 134 support comments, 662 objecting comments and 28 general comments.
   公眾人士於諮詢期內共提交了 880 份意見。根據城市規劃委員會 (城規會)，同一名人士提交的所有意見將被視作為一份意見，因此經計算後市建局共收到 134 份支持意見，662 份反對意見，28 份一般意見，合計為 824 份意見。
3. The URA has categorized the received comments for easy reference and organized response to similar comments. Comments are not categorized by commenters.

為了更清晰回應相類似之意見，市建局將意見分類回應。此回應中的分類僅供參考，並不代表提意見人所作之分類。

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
A) 支持意見 Support Comments (134 comments in total)		
***意見類別一：有關收購、租戶特惠津貼及安置政策**		
6, 7, 129, 323, 324, 433, 516, 521-526.	● 支持重建但對補地價一事有疑慮，希望市建局能提供多種方法給予業主補地價寬減或津貼，或由市建局作為買方補地價 ● 應盡快公佈補地價金額 ● 減去補地價後所得到的金額，不能在市面上購買同樣大小面積的單位	備悉意見。根據地政總署的資料，政府早年以十足市值的三分之一地價批出合作社樓宇用地，隨後合作社成員在取得相關單位業權的時候，其轉讓契約設有轉讓限制條款，合作社樓宇業主必須先向政府繳付三分之二土地補價才可出售單位。有關補價是業主在取得業權時與政府之間的條款。任何減免均偏離一貫的政府政策和做法，亦對已完成補價的業主不公平。 政府已檢視其土地補價的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020 年 6 月 1 日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎亦適用於該計劃。 「現有用途土地價值」的補地價為樓面地價的三分之二，並加上合作社現樓及新樓市值的折讓比例。請參照以下假設例子的計算方法：

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
A) 支持意見 Support Comments (134 comments in total)		
		(甲) 以「重建價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($10,000/平方呎) = $6,666/平方呎 (按樓面面積計) (乙) 以「現有用途土地價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($10,000/平方呎) x $\frac{\text{合作社現樓呎價 \$9,000/平方呎}}{\text{新樓呎價 \$18,000/平方呎}}$ = $3,333/平方呎 (按樓面面積計) 在上述假設例子中，土地補價 (乙) 約為土地補價 (甲) 的百分之五十。按現時市況的初步估算，該計劃的單位補地價金額約為每平方呎 3,000 至 3,500 元。由於每宗個案不同 (例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同)，上述假設例子及每平方呎補價只用作參考。

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A) 支持意見 Support Comments (134 comments in total)		
		另外，政府減免處理土地補價的行政費，約五萬六千多元以減輕未補地價業主在單位業權轉售所涉及的經濟負擔。政府同時減免因散社而需進行的業權轉讓，所涉及的額外印花稅及從價印花稅。 基於同一項目內每個物業的補地價金額呎價(「補地價單價」)都不相同，若將收購金額扣除補地價金額後，不同物業業主所得餘款的呎價亦將各異。因此，市建局提供劃一補地價單價安排，使所有前合作社社員在同一項目內繳付相同的補地價單價。重建項目內所有未補地價的住宅物業於首次收購建議時最低的補地價單價作為「劃一補地價單價」。 如尚未繳付補地價金額的業主接受市建局發出的收購建議，只須支付以劃一補地價單價乘以單位實用面積計算的補地價金額(「劃一單價補地價金額」)，市建局將支付地政總署發出的補地價金額與「劃一單價補地價金額」之差額。至於已繳付補地價金額的前社員，如已繳付的補地價金額高於「劃一單價補地價金額」，可獲發還一筆等同兩者差額之金額。

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A) 支持意見 Support Comments (134 comments in total)		
		此外，前合作社社員可向地政總署遞交申請評估補地價的金額作參考。 根據合作社樓宇的土地契約條款，前合作社社員須向政府繳付土地補價，才可以轉讓其單位。業主作為業權人，有履行地契的責任。政府亦為合資格的合作社單位自住業主作出特別安排，讓其可購買由香港房屋協會(「房協」)在啟德發展區興建和管理的專用安置屋邨的資助出售單位。此外，市建局及地政總署會協調簡化業主繳交補地價的手續。當該計劃獲批准後，市建局會向業主發出收購建議。在同一時間地政總署會提供補地價金額給業主考慮。
62, 236, 291, 317-324, 433, 516, 521-526, 721.	● 支持重建但希望市建局提供公平、合理的收購賠償，足夠購買面積相若的市區單位 ● 希望市建局 / 政府 / 房協能提供相等面積的自置居所供居民認購或每戶可購買兩個位於啟德的資助房屋單位 ● 支持重建但希望能獲得原區安置及原址樓換樓，使居民不用重新適應新環境	備悉意見。靠背壟道 / 浙江街發展計劃 (該計劃) 是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅

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A) 支持意見 Support Comments (134 comments in total)		
		物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 合作社樓宇自住業主，可以獲得百分百的自置居所津貼金額，相信受影響的自住業主可靈活運用該津貼，在同區或其他地區的私人市場，選擇購買面積相約的重置單位。 另外，市建局為未補地價的業主提供劃一補地價單價安排，以協助他們補地價。如業主接受市建局發出的收購建議，只須支付以該計劃內最低的補地價單價作為「劃一補地價單價」乘以單位實用面積計算的補地價金額 (「劃一單價補地價金額」)。市建

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A) 支持意見 Support Comments (134 comments in total)		
		局將支付地政總署發出的補地價金額與「劃一單價補地價金額」之差額。 而未補地價合作社樓宇業主繳付補地價所需金額後，所得的收購建議金額餘款會較其他無須補地價的業主為少，因此政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在2026年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。 如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇。選擇「樓換樓」的住宅自住業主必須先接受市建局的首次收購建議金額，才可選擇「樓換樓」。 市建局明白在目前私人樓宇市場，單位普遍以中、小型為主；在重建項目內居住的大型家庭，難以在

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A) 支持意見 Support Comments (134 comments in total)		
		市場上尋找較大的單位一同居住。故此，市建局與政府磋商後，為項目推出更具彈性的單位重置方案。合資格的前社員自住業主家庭，如涉及「分支家庭」，在接受市建局的首次收購建議後，可以購買最多兩個專用安置屋邨的資助出售單位或「樓換樓」計劃單位等不同組合，減低重建對需要「分戶」及大型家庭的影響。
516.	公務員建屋合作社計劃是一種長俸公務員房屋福利，當時所簽訂的土地契約上並無提及合作社社員日後須就撤銷轉讓限制繳付土地補價，為何如今要剝奪社員的房屋福利	備悉意見。根據公務員事務局的資料，合作社計劃始於 1952 年，是按資源酌情提供的公務員房屋福利。舊有的公務員房屋福利中包括有作為服務條件提供予合資格人員的公務員房屋福利計劃，例如高級公務員宿舍、自行租屋津貼等。政府一貫的政策是為在職公務員提供公務員房屋福利。 公務員房屋福利是根據個別公務員的聘用條款，以及有關房屋福利計劃的條款及條件提供予合資格的在職人員。合作社計劃是按資源酌情提供的房屋福利，並非公務員的服務條件，因此合作社計劃不能被視為合作社社員的終身福利。

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A) 支持意見 Support Comments (134 comments in total)		
		根據合作社計劃，政府以優惠價批出土地，並提供貸款，讓合資格的公務員可透過成立合作社興建住宅樓宇。計劃的目的是為合作社社員及其家屬提供居所，當時的政策並沒有計劃讓合作社社員取得法定業權。合資格的公務員在成為合作社社員時已被視為享用了公務員的房屋福利。 為回應合作社社員希望取得業權的訴求，政府在1987 年推出指引，容許合作社在取得所有社員同意下解散，將單位及土地業權轉讓予個別社員，相關單位的轉讓契約設有轉讓限制條款，有關業主必須先向政府繳付土地補價才可出售其單位。隨後政府在1993年發出現行的指引取代舊指引，讓合作社在取得 75%社員同意後可申請解散繼而進行分契手續，讓個別社員取得其單位和土地業權成為業主，並於繳付由地政總署根據地契釐定的土地補價後把單位自由轉售。合作社計劃的條款和條件，以及相關標準(包括合作社社籍的申請資格)，一直沿用至今。

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A) 支持意見 Support Comments (134 comments in total)		
		容許合作社解散並讓社員由其所屬合作社取得其單位和土地業權成為業主，並於補地價後自由買賣其單位，是政府提供予社員的一項選擇。至於是否需要申請散社乃合作社的內部事宜。前社員於成為業主後可按自身情況考慮何時向政府補回地價。 此外，該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。因此並非強奪居民的權益。
516.	● 過渡期給予社員一個面積相若的居住單位或繼續在現址單位免租居住，直至樓換樓計劃或安置屋邨單位入伙後始收回舊單位 ● 過渡期或提供租金津貼，以便租住一個面積相若的居住單位	備悉意見。根據2018年《施政報告》指示，該計劃須按照市建局沿用的推展項目方式進行，包括市建局沿用的收購、租戶特惠津貼及安置政策，而租金津貼並不符合上述政策，市建局亦不會為受影響的業主提供過渡性房屋。 市建局明白業主需時尋找重置單位，因此，自住的業主可在物業完成買賣時與市建局簽訂准用協議並

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A) 支持意見 Support Comments (134 comments in total)		
		繼續於受影響單位居住一段指定時間，讓業主能夠有足夠時間尋找重置單位作搬遷安排。
521-526.	賠償計算天井面積	備悉意見。根據市建局現行政策，物業的收購價是根據物業的實用面積計算。市建局會委聘顧問公司，以計算該計劃內所有受影響業權的實用面積及附屬面積。實用面積的定義，是根據香港測量師學會於 1999 年 3 月制定的「量度作業守則」及於 2014 年 7 月所發出的「量度作業增補守則」之定義作為標準。在物業內的任何違法構築物 (如有)，不會計算其面積及相應的收購金額。 顧問公司在計算該等業權的面積時，一般會參考於田土廳已登記的文件及圖則(如轉讓契約、買賣合約及大廈公契等)，及屋宇署最後批核的相關建築圖則(如有) ， 計算業權範圍內擁有的面積。業主必須確保擁有其物業或相關附屬面積的妥善業權。
***意見類別二：有關社區更新方面**		
16, 18, 41, 43, 46, 58, 64, 65, 100, 118, 120, 125, 204, 380, 409, 449, 480, 553, 593, 594, 621, 625,	● 支持重建。地盤鄰近土瓜灣站，交通方便同時可善用剩餘地積比興建高密度樓宇，增加大量房屋單位	備悉意見。該計劃旨在落實《施政報告》的目標，透過充分利用合作社地段的發展潛力，房屋供應將增加約 5 倍，由現時約 460 個增加至約 2,300 個房屋單位。因應《施政報告》的最新政策指引，該計

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A) 支持意見 Support Comments (134 comments in total)		
627, 633, 687, 689, 716, 731.	● 重建能騰出更多珍貴的市區土地，同時增加公營房屋供應，縮短公屋輪候時間，改善房屋問題	劃若獲得批准，市建局會預留部分土地興建「首置」房屋，以協助收入較高但仍未能購買私樓的家庭置業。
17, 24, 98, 101, 105, 119, 121, 177, 235, 292, 368, 379, 480, 508, 593, 623, 648, 714, 717, 721.	● 支持重建。重建後能增添新式樓宇、新建購物街及商場，以及提供公眾休憩空間及社區設施，改善市貌，活化社區，為舊區帶來新景象 ● 希望規劃設計時能平衡商場及特色小店，保留舊區特色	備悉意見。該計劃是回應 2018 年及 2019 年政府《施政報告》的邀請，沿用市建局推展項目的方式，物色一至兩個適合的合作社地段作為重建試點。就《施政報告》中提及，該計劃除了以重建合作社樓宇釋放土地發展潛力，增加房屋供應外，亦藉著重建的機會，透過重整及重新規劃，將地面街道納入發展，以增加可用樓面面積及地盤的規劃裨益。 按初步計劃, 該計劃的地盤除一般私營房屋外，南面約三分之一的面積，會作首置房屋單位惠及社會。透過重新規劃，該計劃亦會為社區帶來更大社會裨益，惠及區內居民。當中擬建的地下購物街將連接毗鄰項目的土瓜灣站兩個出入口，並融合地面步行街的設計，串連成為一個多層行人道網絡，改善地區的連接性及暢達性，並透過合適的園林景觀和城市設計，為居民提供更佳的步行環境。除地下購物街， 該計劃初步設計提供一層地面商鋪，希望

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A) 支持意見 Support Comments (134 comments in total)		
		地面步行道兩旁提供沿街小鋪，維持街道活力及小街小鋪的地區環境。 此外，該計劃亦會提供政府、機構或社區設施，為社區提供多元活動空間，以滿足社區需要。
66, 122.	為長者及下一代的利益著想，支持重建	備悉意見，並感謝支持。
127, 627.	● 支持重建，可啟動樂民新村重建 ● 希望將來可擴展至其他地區	備悉意見。樂民新村的重建計劃將由政府和房協商討決定。 該計劃將可與市建局早前在土瓜灣區以小區發展模式來開啟的重建項目發揮更大的協同效應，促進九龍城的地區更新。
***Comment Category 2: Urban Renewal**		
21, 23, 178, 475, 719.	● Redeveloping old buildings can bring about a new image for To Kwa Wan and improvements on the urban environment by addressing the lack of services and facilities such as shops and parks. ● Redevelopment can bring benefits to residents of To Kwa Wan.	Noted. Through the redevelopment of the Scheme, residential buildings with better modern standard GIC/ retail facilities as well as open space will be provided within the Scheme to improve the living environment in the district.
39.	Support redevelopment for the sake of future generations.	Noted and thank you.

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
A) 支持意見 Support Comments (134 comments in total)		
410.	Redevelopment can increase housing supply.	Noted. The Scheme aims to fulfill the objectives of the Policy Address 2018 and 2019 (PAs), to increase housing supply by full utilisation of the development potential of the cluster of Civil Servants' Co-operative Building Society (CBS) Scheme sites. In addition, in response to the latest directive under the PAs, about 950 flats will be allocated to Starter Home units within the Scheme to increase different types of housing supply in the district.
***意見類別三：有關居住環境方面**		
19, 32, 49, 55, 63, 65, 99, 100, 103, 116, 117, 203, 234, 318, 321, 322, 345, 381, 411, 477, 521-526, 591, 641, 688, 718.	● 支持重建，現時樓宇太舊缺乏維修，漏水問題嚴重，石屎剝落，亦有倒塌風險 ● 需要恆常保養工作但維修費昂貴且成效甚微，居民沒有固定收入，難以長期承擔高昂的維修費	備悉意見。透過該計劃的重建，將提供設有現代化設施的樓宇，改善該區的居住環境。
20, 29-33, 44, 47-49, 57, 62, 104, 105, 116, 117, 199, 233, 293, 321-324, 409, 479, 506, 508, 554, 592, 686, 712, 713, 721.	支持重建，現時樓宇沒有電梯，長者、傷殘人士、孕婦上落樓梯比較困難。沒有電梯對訪客探訪或搬運重物時也構成不便，影響居民日常社交及生活便利。期望重建後好搬入有電梯的新式樓宇	備悉意見。根據核准一般建築圖則，該計劃內的所有樓宇均沒有電梯或其他無障礙設施，而該計劃的重建樓宇將設有現代化設施包括電梯及無障礙設施，改善該區的居住環境。

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
A) 支持意見 Support Comments (134 comments in total)		
51.	現時樓宇設計只有一條走火通道，若發生火警會造成慘劇，只能透過重建解決問題	備悉意見。透過該計劃的重建，將提供設有現代化設施的樓宇，改善該區的居住環境。
55, 56, 343, 641.	● 公務員合作社沒有管理處或保安員看守，陌生人能隨意進出，構成治安問題 ● 衛生環境不理想，鼠患問題嚴重，重建能改善治安及衞生問題	備悉意見。該計劃的重建樓宇將設有現代化設施，可改善該區的居住環境和治安問題。
***Comment Category 3: Living Environment**		
22, 25, 28, 126, 180, 294, 410.	The buildings are old and have no elevators which caused inconvenience for visitors and wheelchair users. Users find it difficult to carry heavy suitcase or large objects upstairs.	Noted. According to the approved GBP, none of the buildings within the Scheme is served by lift or barrier-free access. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely home purchase allowance, HPA). As an additional option to cash offer, 'Flat-for-Flat' (FFF) option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. The cash offer and FFF option allow the owner-occupiers to rehouse in a suitable unit improving their living environment.

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A) 支持意見 Support Comments (134 comments in total)		
27, 50, 475.	The buildings conditions are poor. There is an urgency to redevelop the old flats.	Noted.
622.	The buildings are deteriorated with structural problems and fire safety concern. There is only one fire escape route with inadequate fire hydrants and building services equipment.	Noted. Through the redevelopment of the Scheme, residential buildings with better modern standards will be provided to improve the safety of buildings.
***意見類別四：有關市建局項目程序 / 重建方面**		
26, 43, 44, 46, 47, 57, 63, 103, 106, 117, 118, 125, 128, 177, 203, 233, 234, 506, 625, 641, 687, 688, 731.	市建局應盡快推行，啟動重建	備悉意見，並感謝支持。
104, 128, 175, 236, 291, 590.	支持重建但希望市建局能盡快解答居民對收購、安置等的疑問，及公佈更多相關資料，有居民因資訊混亂感困惑	備悉意見。受新型冠狀病毒疫情影響下，為避免人群聚集，減低居民及工作人員受感染的風險，市建局於 2020 年 5 月 22 日開展該計劃時，向受影響人士提供預先錄製的項目簡介影片以取代過往舉辦的公眾簡報會。該影片使居民能夠在疫情期間安全了解該計劃的內容，包括該計劃的規劃程序、該計劃若得到批准實施後的市建局物業收購及遷置安排，以及協助解散合作社安排。

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
A) 支持意見 Support Comments (134 comments in total)		
		由於疫情和政府為預防及控制疾病而制定的人群管制於 2020 年 6 月及 7 月初逐步放寬，市建局聯同政府代表於 2020 年 7 月 6 日及 7 日，為該計劃的受影響的人士舉行了三場簡報會，作額外的平台並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。 市建局於 2021 年 11 月 22 至 24 日為該計劃的受影響居民舉行了 9 場居民會，發放規劃、最新收購物業之準則及安排並收集他們的意見。 此外，市建局於 2022 年 10 月 14 日向該計劃的受影響居民發放有關解散合作社、收購物業及收回土地補償安排的最新資訊。 市建局已開始進行「夥伴同行」探訪計劃，深入解釋政策及項目的最新進展、補償及遷置安排，以及時間表等等，而且透過不同途徑與居民保持溝通及交流，以釋除居民的疑慮。

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
B) 反對意見 Object Comments (662 comments in total)		
***意見類別一：有關規劃設計及對周邊環境的影響**		
74-76, 87, 88, 92-96, 110, 111, 130-144, 147-157, 159, 160, 181, 182, 184-187, 194-198, 206, 213-215, 224, 238-265, 269-278, 281, 295-309, 311, 312, 314-316, 325-329, 337, 338, 349-352, 376, 377, 439, 503, 507, 512, 543, 552, 575-589, 599-616, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 707, 708, 710, 715, 723-730, 733-738, 768, 773, 776, 782, 784, 801, 816, 824, 832, 834, 835, 838, 873.	● 重建計劃興建高層大廈形成屏風效應，空氣流通定必比現在情況差劣，空氣質素定會變差 ● 高樓會形成熱島效應及阻擋光線，亦阻礙其他樓宇景觀	視覺影響評估報告已提交規劃署審批，評估指出現時建議的初步建築佈局和樓宇高度，與周邊的高密度發展如樂民新村、晨樂大廈、都會 151 和翰畋等相容。相比較現有發展，該計劃擬議的步行街將會貫通落山道至浙江街，步行街在陽光照射和兩旁綠化下締造舒適的步行環境；相比較規劃大綱圖所容許的發展規模，擬議設計的最高建築物高度在主水平基準以上 140 米能創造出較大的建築物間距，減少屏風樓效應和遮擋光線的情況，比起主水平基準以上 120 米更擴大視覺空間。 融入以人為本的城市設計概念，為改善行人暢達性和步行環境質素，該計劃包括重新規劃美善同道及江蘇街的一部分，用作興建步行街 / 廣場，該步行街同時亦作為通風廊，促進地面步行環境的空氣流通。 環境顧問已完成空氣流通評估報告及將有關報告提交規劃署審批，評估指出現時建議的初步規劃佈局以及步行街 / 廣場的城市設計，比較規劃大綱圖所

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B) 反對意見 Object Comments (662 comments in total)		
		容許的發展規模，能提昇江蘇街及靠背壟道一帶地面的空氣流通。
74-76, 87, 88, 92-96, 110, 111, 130-144, 147-157, 159, 160, 181, 182, 184-187, 194-198, 206, 210, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-330, 332-336, 349-352, 376, 377, 401-403, 407, 408, 439, 512, 548, 551, 552, 575-589, 600-616, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 707, 708, 710, 715, 723-730, 732-738, 751, 773, 776, 782, 784, 816, 824, 832, 834, 835, 838, 871, 873.	● 反對規劃的步行街及商場，土瓜灣的傳統購物區集中在馬頭圍道以東，規劃中設立步行街不恰當， 令整個土瓜灣區人流混雜 ● 土瓜灣已有大量做內地遊客生意而非售賣民生用品的藥房，金鋪，假冒貨店等，增設商店街只會增加更多此類影響民生的商店 ● 美善同道已長期有旅遊巴停泊，購物街會吸引更多遊客滋擾民居，打擾居民作息時間影響民生，計劃步行街是多此一舉，摧毀內街寧靜	該計劃建議的非住用地積比為 1，低於九龍區住宅(甲類)的非住用地積比 1.5，因此商業零售部份的樓面面積是少於一般規劃大綱圖規定的發展。 此外，該計劃內商業零售設施的設計將配合步行街，主要提供小街小鋪作零售及服務予當區居民。規劃報告中亦有提及，擬議的步行街只會在合理的時間內對外開放，以避免在對居民造成滋擾。
130-144, 147-157, 159, 160, 181-187, 194-198, 206, 238-265, 269-278, 295-309, 311, 312, 314-	規劃擾亂原有街道，窒礙疏導交通，增加大量人口，令社區更擠迫，空氣污濁，認為在交通未妥善下不宜增加更多人口	交通顧問已把增加泊車位的交通影響評估報告提交運輸署審批。該計劃範圍內現有路邊泊車位約 100 個，重建建議提供地下公眾停車場，提供約 164 個公共停車位供區內居民使用，及將原有作行車車道

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B) 反對意見 Object Comments (662 comments in total)		
316, 325-329, 349-352, 376, 377, 439, 507, 512, 575-589, 600-616, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 707, 708, 710, 715, 768, 776, 782, 784, 801, 816, 824, 832, 834, 835, 838, 873.		的美善同道及江蘇街改為行人街 / 廣場，創造更多無車綠化空間。這些建議有助減少在路面泊車或違例泊車情況，預計可以令附近路面更加暢通及改善路邊空氣質數。 此外，該計劃重新規劃現有美善同道的掘頭路，將減少車輛窄路調頭而產生對行人的危險。
130-144, 147-164, 167, 168, 172-174, 181, 182, 184-187, 194-198, 206, 211, 212, 215, 216, 220-223, 226-232, 238-265, 269-278, 284-290, 295-309, 311, 312, 314-316, 325-329, 349-352, 439, 503, 507, 512, 575-589, 600-616, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 707, 708, 710, 715, 723-730, 733-738, 751, 753, 768, 776,	● 沙中線地盤已長期滋擾重建選址附近居民及老人院長者的生活及健康，不希望繼續被工程滋擾 ● 若重建開始地鐵出入口將變成地盤，令居民不能享用地鐵的便利 ● 重建選址附近不少樓宇已出現裂縫有結構危機，重建工程會令危機加劇 ● 建造地下街工程產生噪音沙塵，連同其他工程會增加蟲患及鼠患，影響環境衞生	透過該計劃的重建，可釋放土地發展潛力。除增加房屋供應外，將提供設有現代化設施的樓宇，改善該區的居住環境, 亦會提供更多社區設施, 為社區帶來更大社會裨益，惠及區內居民。 然而，市建局理解重建會在施工期間可能對鄰近居民造成噪音滋擾及其他環境問題。市建局的環境顧問已將環境評估報告提交環境保護署 (環保署) 審批，評估了該計劃在建築過程中對空氣的潛在影響，並提出相應的緩減措施。 此外，市建局會要求承建商盡量減低工程期間的環境影響，包括必須符合環保署對工程噪音的時間管

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
B) 反對意見 Object Comments (662 comments in total)		
782, 784, 816, 824, 832, 834, 835, 838, 871, 873.		制，注意隔音及衛生等問題，並且進行密切的監察，以確保施工時對周邊樓宇的結構不會造成影響。
171, 282, 283, 397, 398, 404-406, 545, 546, 549, 551, 732.	興建公營房屋只會吸引更多新移民來港享用福利，香港人不能受益，重建並非為香港人提供單位，反對更多內地新移民遷入社區	根據 2020 及 2021 年《施政報告》，政府委託市建局為市場提供更多首置單位。固市建局會在該計劃內提供私人樓宇及「首置」房屋，以增加私樓的房屋供應及協助收入較高但仍未能購買私樓的家庭置業。 因應以上的修定設計，市建局將會向城規會提交規劃報告書的補充資料以供城規會審議.
822.	新公共休憩空間於合理時間給公眾使用，此舉限制居民自由使用	該計劃建議位於地面層的休憩用地只會於合理時間內供公眾使用，以避免在深夜對居民造成滋擾。 該計劃仍處於規劃階段，如該計劃獲得行政長官會同行政會議的核准，休憩用地供公眾使用的開放時間將以其後實施及營運計劃階段為準。
***Comment Category 1: Planning and Design and Impact on Surrounding Environment**		
386, 448, 762, 845, 848, 878.	● The redevelopment would block the view of my home. ● Higher urban density would cause noise pollution, air pollution and security issue.	Visual Impact Assessment (VIA) has been conducted and submitted for the approval of Planning Department. According to the assessment, the proposed building layout and

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B) 反對意見 Object Comments (662 comments in total)		
	● Redevelopment will destroy the tranquility of the neighbourhood.	building height is compatible to the high density developments including Lok Man Sun Chuen, Morning Joy Building, City 151 and 80 Maidstone Road in the surrounding environment. Comparing the existing development, the pedestrianised avenue / plaza of the Scheme linking Lok Shan Road and Chi Kiang Street will provide a better view from short viewpoints at the existing Maidstone Road to the south. Comparing the proposed Scheme to the development parameters under the prevailing Outline Zoning Plan, the building separation will be larger under 140mPD building height restriction. The blockage of views will be reduced. Environmental Assessment (EA) has been conducted by the consultant and submitted for the approval of Environment Protection Department (EPD). The potential air pollution during construction period of the Scheme is assessed with mitigation measures proposed to minimize adverse effect to the surroundings. The URA would closely monitor and request the contractor to minimise the noise generated during

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B) 反對意見 Object Comments (662 comments in total)		
		the construction of the Scheme and to follow and fulfill the noise mitigation measures as stipulated by EPD for construction site.
762, 845, 848, 878.	The no. of parking spaces should be much higher, about 4 times or 7 times of the proposed no. of parking spaces.	TIA has been conducted by the consultant and submitted for the approval of Transport Department. There is no ancillary parking spaces for the existing CBS buildings within the Scheme. The existing number of on-street parking spaces is about 100 within the Scheme. Under the DSP, apart from the ancillary car park for the proposed development, the Scheme proposes to provide a Public Vehicle Park (PVP) to provide about 164 public car parking spaces. The increased number of public car parking space provision will help to alleviate the parking demand and illegal parking condition in the district.
763.	Objection that the total area for GIC facilities and Local Open Space (LOS) be limited to 30% of the total non-domestic GFA. The shortfall for both GIC and LOS was discussed in the meeting for the draft Ma Tau Kok OZP on 3 Jun 2020, which identified a 77% (573) shortfall of subsidized community care places for the elderlies and a 50% shortfall in LOS.	Under the revised design (2022), not less than 2,500m^2 GFA will be reserved to provide appropriate GIC facilities in the Scheme to meet the community needs. A Public Open Space (POS) of not less than 400m^2 will be provided with the Scheme. In addition, the existing Kiang Su Street and Maidstone Road, including its dead-end, will be

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	The proposed 400 sq.m. of LOS in the site makes little difference to address the 6.61 ha. shortfall in the OZP area. The URA redevelopment would add more population bringing more burden on these amenities. Why the shortfalls in community services are not being resolved via the URA developments in the district?	restructured and replanned into a pedestrianised avenue / plaza to provide a car-free environment for public enjoyment. The redevelopment will bring an improvement of the built environment and provide community facilities as well as public space to benefit the community. On the LOS provision, the LOS requirement of 1m^2 per person in accordance with the Hong Kong Planning Standards and Guidelines (HKPSG) will be developed at detailed design stage / GBP stage should the Scheme be approved by CE in C. As stated above, an appropriate portion of GIC and open space provision has been reserved and proposed in the Scheme in order to improve the living environment of the district. However, the shortfalls in community services of the district should be resolved by various means/ parties/ stakeholders in the district, and cannot solely by the URA projects.
***意見類別二：有關收購、租戶特惠津貼及安置政策**		

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
B) 反對意見 Object Comments (662 comments in total)		
2, 4, 5, 8, 205, 207, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 344, 347, 349-367, 369-371, 373-378, 382, 384, 385, 387-396, 412-424, 429, 430, 434, 435, 437-443, 445, 446, 450, 452, 453, 455-462, 464-474, 482-492, 494-505, 507, 509-512, 528-538, 540-542, 556-567, 569, 570, 572-589, 596, 600-616, 619, 620, 624, 626, 628-632, 634-640, 642-646, 649-658, 660-667, 669-671, 673-684, 690-695, 701-706, 715, 723-730, 733-745, 750, 752-754, 757, 759-761, 764, 766-769, 776, 778, 780-785, 788, 789, 797, 799, 801, 803, 814-816, 821-824, 830-838, 843, 844,	● 市建局未有提出具體收購價，收購條件及賠償方案欠缺透明 ● 因未知道賠償方案及地價的詳情，故反對重建項目	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購、租戶特惠津貼及安置政策。相關政策已附夾於 2020 年 5 月呈交予地規會的規劃報告書中附錄 11 和 12 內供公眾查閱。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，屆時將會提供進一步的資料。

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B) 反對意見 Object Comments (662 comments in total)		
850, 854, 860, 868-870, 872, 873, 876, 877, 880.		
3-5, 8, 78-80, 83-86, 130-144, 146-157, 159, 160, 176, 181, 182, 184-190, 192-198, 200-202, 205-207, 237-265, 269-278, 295-309, 311-316, 325-329, 342, 347, 349-367, 369-378, 382, 384, 385, 387-396, 412-424, 429, 430, 432, 434, 435, 437-447, 452-474, 482-492, 494-503, 505, 507, 509, 510, 512, 513, 515, 517, 528-538, 540-542, 556-567, 569, 570, 572-589, 596, 597, 599-616, 628-632, 634-640, 642-647, 649-658, 660-667, 669-671, 673-682, 690-708, 710, 715, 723-730, 733-745, 750-753, 758-761, 764, 766-769, 771, 776, 778, 780-785, 788-793,	● 補地價安排不公。未散社的舊契上並無補地價條文，只有已散社的分契上有註明，舊契是顯示合作社房屋是政府房屋政策一次性優惠價批地予公務員建屋，而且當年批出的優惠地價已經付清，沒有任何欠款，社員沒有必要補地價 ● 市建局是主導買家，業主並無意圖出售而是被市建局收購物業，不屬市場買賣，所以現時收購要求居民在被收購前補地價的要求並不合理 ● 現時並未有補地價及賠償價的實際金額，導致居民最後能獲得的淨賠償額不明確。居民憂慮扣除補地價後的最終賠償額不足夠在市場重新購入相若面積及質素的安置單位	根據地政總署的資料，政府早年以十足市值的三分之一地價批出合作社樓宇用地，隨後合作社成員在取得相關單位業權的時候，其轉讓契約設有轉讓限制條款，合作社樓宇業主必須先向政府繳付三分之二土地補價才可出售單位。有關補價是業主在取得業權時與政府之間的條款。任何減免均偏離一貫的政府政策和做法，亦對已完成補價的業主不公平。 政府已檢視其土地補價的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020 年 6 月 1 日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎適用於該計劃。 「現有用途土地價值」的補地價為樓面地價的三分之二，並加上合作社現樓及新樓市值的折讓比例。請參照以下假設例子的計算方法：

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798, 800, 804, 806, 810, 811, 814-816, 822-824, 829-838, 842-844, 847, 850, 860, 864, 865, 868-870, 872, 873, 876, 877, 880.		(甲) 以「重建價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($10,000/平方呎) = $6,666/平方呎 (按樓面面積計) (乙) 以「現有用途土地價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($10,000/平方呎) x $\frac{\text{合作社現樓呎價 \$9,000/平方呎}}{\text{新樓呎價 \$18,000/平方呎}}$ = $3,333/平方呎 (按樓面面積計) 在上述假設例子中，土地補價 (乙) 約為土地補價 (甲) 的百分之五十。按現時市況的初步估算，該計劃的單位補地價金額約為每平方呎 3,000 至 3,500 元。由於每宗個案不同 (例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同)，上述假設例子及每平方呎補價只用作參考。 另外，政府減免處理土地補價的行政費，約五萬六千多元以減輕未補地價業主在單位業權轉售所涉及

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		的經濟負擔。政府同時減免因散社而需進行的業權轉讓，所涉及的額外印花稅及從價印花稅。 基於同一項目內每個物業的補地價金額呎價(「補地價單價」)都不相同，若將收購金額扣除補地價金額後，不同物業業主所得餘款的呎價亦將各異。因此，市建局提供劃一補地價單價安排，使所有前合作社社員在同一項目內繳付相同的補地價單價。重建項目內所有未補地價的住宅物業於首次收購建議時最低的補地價單價作為「劃一補地價單價」。 如尚未繳付補地價金額的業主接受市建局發出的收購建議，只須支付以劃一補地價單價乘以單位實用面積計算的補地價金額(「劃一單價補地價金額」)，市建局將支付地政總署發出的補地價金額與「劃一單價補地價金額」之差額。至於已繳付補地價金額的前社員，如已繳付的補地價金額高於「劃一單價補地價金額」，可獲發還一筆等同兩者差額之金額。 此外，前合作社社員可向地政總署遞交申請評估補地價的金額作參考。

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		根據合作社樓宇的土地契約條款，前合作社社員須向政府繳付土地補價，才可以轉讓其單位。業主作為業權人，有履行地契的責任。政府亦為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。此外，市建局及地政總署會協調簡化業主繳交補地價的手續。當該計劃獲批准後，市建局會向業主發出收購建議。在同一時間地政總署會提供補地價金額給業主考慮。
3, 5, 8, 78, 84, 130-144, 147-157, 159, 160, 176, 181, 182, 184-190, 192-198, 200-202, 205-207, 237-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 349-367, 369-371, 373-378, 382, 384, 385, 387-396, 412-423, 429, 430, 434, 435, 437-447, 452-474, 482-492, 494-503, 505, 507, 509,	公務員合作社是房屋福利，當時合作社成員需放棄其他房屋津貼以換取合作社地權，現時安排形同剝削原有房屋福利，有違基本法第 100 及 102 條保障公務員待遇不變的條文，居民有權因被剝削福利要求賠償	根據公務員事務局的資料，合作社計劃始於 1952 年，是按資源酌情提供的公務員房屋福利。舊有的公務員房屋福利中包括有作為服務條件提供予合資格人員的公務員房屋福利計劃，例如高級公務員宿舍、自行租屋津貼等。政府一貫的政策是為在職公務員提供公務員房屋福利。 公務員房屋福利是根據個別公務員的聘用條款，以及有關房屋福利計劃的條款及條件提供予合資格的在職人員。合作社計劃是按資源酌情提供的房屋福

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510, 512, 513, 515, 517, 528-538, 540-542, 556-567, 569, 570, 572-589, 596, 599-616, 628-632, 634-640, 642-646, 649-658, 660-667, 669-682, 690-708, 710, 715, 720, 723-730, 733-745, 750, 752, 754, 759-761, 764, 767-769, 776, 782-785, 798-800, 803, 804, 806, 810, 811, 814-816, 823, 824, 829-838, 842, 847, 850, 860, 864, 865, 869, 870, 872, 873, 875-877, 880.		利，並非公務員的服務條件，因此合作社計劃不能被視為合作社社員的終身福利。 根據合作社計劃，政府以優惠價批出土地，並提供貸款，讓合資格的公務員可透過成立合作社興建住宅樓宇。計劃的目的是為合作社社員及其家屬提供居所，當時的政策並沒有計劃讓合作社社員取得法定業權。合資格的公務員在成為合作社社員時已被視為享用了公務員的房屋福利。 為回應合作社社員希望取得業權的訴求，政府在1987 年推出指引，容許合作社在取得所有社員同意下解散，將單位及土地業權轉讓予個別社員，相關單位的轉讓契約設有轉讓限制條款，有關業主必須先向政府繳付土地補價才可出售其單位。隨後政府在1993年發出現行的指引取代舊指引，讓合作社在取得 75%社員同意後可申請解散繼而進行分契手續，讓個別社員取得其單位和土地業權成為業主，並於繳付由地政總署根據地契釐定的土地補價後把單位自由轉售。合作社計劃的條款和條件，以及相關標準(包括合作社社籍的申請資格)，一直沿用至今。

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		容許合作社解散並讓社員由其所屬合作社取得其單位和土地業權成為業主，並於補地價後自由買賣其單位，是政府提供予社員的一項選擇。至於是否需要申請散社乃合作社的內部事宜。前社員於成為業主後可按自身情況考慮何時向政府補回地價。 此外，該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。因此並非強奪居民的權益。
8, 78-80, 83-86, 176, 194-198, 205-207, 237-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 349-367, 369-374, 376-378, 382, 384, 385, 387-396, 412-423, 429, 432, 434, 435, 437-442, 444-447, 452-456, 458-462, 464-473, 482-492,	市建局應賠償或資助業主因搬遷及裝修衍生出的費用，在過渡期提供無縫無償的住屋安排，津貼過渡單位租金，亦應賠償因遷離後管理費增加的開支	根據市建局現行政策，除自置居所津貼或補助津貼外，住宅物業的業主亦可獲相關費用津貼，以資助業主因購買替代住宅物業而引致的開支，如因出售受影響物業予市建局而支付的律師費及搬遷的相關費用；實際金額將於個別項目進行收購時作實及公佈。 如住宅物業的業主於因出售受影響物業予市建局及購買替代住宅物業時的合理及必須實際開支（即因

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494-503, 505, 507, 509, 512, 513, 517, 528-538, 540-542, 556-567, 569, 570, 572-589, 597, 599-616, 628-631, 634-640, 642-647, 649-658, 660-667, 669-671, 673-682, 690-695, 701-708, 710, 715, 723-730, 733-745, 750, 752, 753, 758-761, 767-769, 771, 776, 782, 784-787, 790-793, 814, 816, 822-824, 830-838, 842, 850, 860, 864, 865, 869, 872, 873, 876, 877, 880.		解除受影響物業轉讓限制的法定押記而須向地政總署繳付的行政費用、出售受影響物業予市建局的律師費及購買替代住宅物業的搬遷費、印花稅、地產代理佣金及律師費），多於市建局給予的相關費用津貼，業主可向市建局提出申請發還超出相關費用津貼之開支，惟業主只可就其出售予市建局的每個住宅物業提交一份申請，並必須符合相關資格準則。 根據2018年《施政報告》指示，該計劃須按照市建局沿用的推展項目方式進行，包括市建局沿用的收購、租戶特惠津貼及安置政策，而租金津貼並不符合上述政策，市建局亦不會為受影響的業主提供過渡性房屋。 市建局明白業主需時尋找搬遷單位，因此，自住的業主可在物業完成買賣後，與市建局簽訂准用協議並繼續於受影響單位居住，讓業主能夠有足夠時間購買新單位作搬遷安排。
78, 80, 84, 86, 176, 205-207, 347, 353-367, 369-371, 373-375, 377, 382,	● 合作社房屋鄰近地鐵站出口，樓宇狀況良好，樓價不能與一般假設同區七年樓齡單位或其他	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收

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384, 385, 387-396, 412-424, 429, 434, 435, 437, 438, 440-447, 452, 453, 455, 456, 458-473, 482-492, 494-502, 505, 507, 509-511, 513, 528-538, 540-542, 556-567, 569, 570, 572-574, 596, 597, 599, 632, 701-706, 739-745, 750, 752, 759-761, 764, 766-769, 776, 782-785, 789, 798, 800, 801, 804, 806, 810, 811, 816, 822-824, 830-838, 842, 847, 850, 860, 864, 869, 870, 872, 873, 876, 877, 880.	舊樓相比。市建局應以現實相若環境因素的市場樓宇作賠償估價 ● 市建局是購買合作社地段的剩餘發展權，現時估價低估地段應有的價值 ● 質疑測量師行估價時不能於同區找到有高樓底及後園的特色戶作估價比較因而壓低呎價 ● 計算實用面積定義不清楚，質疑賠償估價時何不計算天井及公眾地方面積，以及現時估價方法是否適用於公務員合作社	購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 獨立測量師進行評估時，會考慮當時在市場上新近成交的買賣及可資比較的個案，並以上述的指引作出評估（包括交通方便程度、面積大小、樓齡、座向等因素作出調整）。估值日期亦盡量貼近發出收

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		購建議的時間，希望收購價能反映市場的最新情況。 按市建局沿用行之有效的方式，將以公開抽籤方式，委託七間獨立顧問公司評估該假設重置單位的呎價，在去除最高和最低價值後，以五個評估價值的平均數作為該假設單位的呎價。而該假設重置單位的呎價，會在整個項目內劃一採用。 根據市建局現行政策，物業的收購價是根據物業的實用面積計算。市建局會委聘顧問公司，以量度該計劃內所有受影響物業的實用面積及附屬面積。實用面積的定義，是根據香港測量師學會於 1999 年 3 月制定的「量度作業守則」及於 2014 年 7 月所發出的「量度作業增補守則」之定義作為標準。在物業內的任何違法構築物 (如有)，不會計算其面積及相應的收購金額。 顧問公司在計算該等業權的面積時，一般會參考於田土廳已登記的文件及圖則 (如轉讓契約, 買賣合約及大廈公契等) ，及屋宇署最後批核的相關建築圖

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		則 (如有)， 計算業權範圍內擁有的面積。業主必須確保擁有其物業或相關附屬面積的妥善業權。
78-80, 83-86, 176, 313, 347, 353-367, 369-371, 373, 374, 382, 384, 385, 387-396, 412-423, 429, 432, 434, 435, 437, 438, 440-442, 444-447, 452, 453, 455-462, 464-473, 482-492, 494-502, 505, 507, 509, 513, 528-538, 540-542, 556-567, 569, 570, 572-574, 599, 701-706, 720, 739-745, 750, 752, 753, 758-761, 767-769, 771, 772, 776, 781, 782, 784, 785, 798, 800, 804, 806, 810, 811, 814-816, 822-827, 830-838, 842, 847, 850, 855, 860, 864, 865, 869, 872, 873, 876, 877, 880.	● 業主及承繼人應有原址安置的選擇和安排 ● 提供原地同等面積新單位安置 / 樓換樓	市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。此外，政府亦決定將一幅位於啟德的用地給房協興建專用安置屋邨，為合資格的合作社單位自住業主作出特別安排，讓其可購買該專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在 2026 年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。
130-144, 147-157, 159, 160, 181, 182, 184-187,	基於大部分居民不願意離開已長居數十年有感情的社區，當中不乏長者擔憂難以適應搬遷後新環境，	「原址原大」方案內提議市建局提供四項現金津貼給合作社業主（即租金津貼、搬遷、新屋裝修及添

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194-198, 205-207, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 342, 344, 349-367, 369-374, 376-378, 382, 384, 385, 387-396, 412-423, 429, 434, 435, 437-443, 445, 446, 452-456, 458-474, 482-492, 494-503, 505, 509, 510, 512, 517, 520, 528-538, 540-542, 556-567, 569, 570, 572-589, 596, 597, 599-616, 628-632, 634-640, 642-647, 649-658, 660-667, 669-671, 673-684, 690-695, 701-708, 710, 715, 723-730, 733-746, 750, 752, 758-761, 764, 765, 767-769, 773, 776, 782-787, 790-793, 802, 816, 817, 824, 830-838, 850, 852, 854, 857, 860, 861, 869, 870, 872-877, 880.	希望在原址終老，故建議市建局以新思維去推行計劃，在原址重建面積相若的單位，安置受影響原居民。市建局應認真正視及考慮部分合作社社員提出的「原址原大安置方案」，讓原居民能獲安置於重建原址裡跟原單位面積相當的獨立安置單位及享用土瓜灣站的便利，分享重建後的成果。原址原大方案亦可以大幅省卻市建局收購成本，維護原居民的應有權益，同時彰顯市建局的創局精神及宗旨	置相關物品津貼、將來35年管理費津貼、業主需支付的補地價津貼）；另外，方案亦要求一間原址原大、不設轉讓限制的新屋及新建的停車場歸合作社業主擁有及使用。 市建局經仔細分析和評估後，認為「原址原大」方案的三個建議均存在執行問題，及會為市建局造成沉重的財政負擔。 ● 原址原大方案提議市建局將地盤南面三份之一的部份改作合作社安置房屋。在市建局提交的修訂設計(2022 年)，該地段在市建局的建議內將會用作提供約 950 個「首置」房屋，以回應《施政報告》的政策指引。因此於地盤南面三份之一的部份提供合作社安置房屋並不可行。 ● 合作社業主要求的四項現金津貼，合共約每平方呎 11,140 元，及一個重建後實用面積平均 1,000 平方呎的新單位。假設新樓呎價約為 22,500 元；合作社業主實際收到的，包括現金津貼加上物業價值，總計約為每平方呎 33,640 元，此金額尚未計算業主要求擁有新建成停車場的價值。此方案下，業主實際收到的遠遠超

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		出根據市建局現行收購及遷置政策所計算的收購價。 ● 此外，按照該「原址原大」方案，以提供 462 個實用面積約 1,000 呎的單位計算，粗略估計，總建築樓面面積將超過 500,000 呎，換言之，市建局往後發展的項目將會減少 500,000 呎，可收回的投標地價或銷售價相應會減少，對市建局構成一定程度的財務負擔。 作為公營機構，市建局必須確保資源用得其所，並秉持審慎理財的原則，確保足夠資源履行市區更新的任務，「原址原大」方案已超出此項原則，亦會影響市建局履行市區更新工作的可用資源，故此，市建局不會考慮「原址原大」方案。
751, 790-793, 844, 868.	市建局網誌中提及到居民可選擇啟德安置房屋是令人反感的；為何居民要放棄 4 房私樓搬至面積只有現今一半的資助房屋，而至今亦無提供安置房屋的單位大小	有關位於啟德的專用安置屋邨將提供足夠資助出售單位，供受合作社試點項目影響的合資格前合作社社員自住業主購買。根據現有資料，按照初步設計概念，有關單位主要為兩房單位，其餘為三房單位。具體之單位面積、間隔和數目均以日後獲批圖則作準，預計有關準則將參考資助出售房屋的規格。政府及房協將會適時公佈預售計劃。

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		另外，如獲得行政長官會同行政會議核准進行該計劃，市建局將會向受影響業主提供收購建議以協助購買重置單位。市建局為合資格的住宅自住業主提供「樓換樓」計劃選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇。相信業主可根據個別需要以現金補償及「樓換樓」計劃選擇合適的重置單位改善居住環境及生活。
***Comments Category 2: Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policies**		
10-15, 35-38, 40, 52-54, 59-61, 67-72, 77, 89-91, 97, 102, 107-109, 112, 113, 115, 348, 425-428, 431, 746, 762, 794, 841, 845, 848, 850, 853, 858, 878.	● Unfair procedure of asking residents to agree to the plan without informing them the amount of acquisition offer and the outstanding land premium. ● The calculation of land premium by the Lands Department is very non-transparent. ● The URA should be responsible for settling the land premium as the project was not initiated by the residents many of who have no intention to sell.	According to the Lands Department, under the CBS Scheme, land was granted at a concessionary premium of one-third of the full market value of the land concerned and the outstanding land premium was two-thirds of the full market value. The Government has reviewed the basis for land premium assessment. An owner of an individual unit does not possess the land title while redevelopment needs the agreement of all owners. Thus, starting from 1 June 2020, "Existing Use Land Value (EULV)" will be adopted as the basis for assessment when an individual owner of CBS unit

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		applies for the removal of the alienation restriction unless there is proof of single ownership of the building. This basis is applicable to the Scheme. The outstanding land premium on the basis of EULV is equal to 2/3 of the accommodation value times the ratio of the price of the existing CBS building and a new building, assuming the old and new buildings are of similar GFA in the same district. A hypothetic example is shown below: (A) On the basis of "Redevelopment Value (RDV)" $\frac{2}{3}$ x Accommodation Value ($10,000/ft^2) = $6,666/ft^2 (based on GFA) (B) On the basis of EULV $\frac{2}{3}$ x Accommodation Value ($10,000/ft^2) x $\frac{\text{Unit Price of CBS existing flat } \$9,000/ft^2}{\text{Unit Price of New flat } \$18,000/ft^2}$

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		= $3,333/ft^2 (based on GFA) From the above hypothetic example, the outstanding land premium of (B) is 50% of that of (A). Based on preliminary estimates of the prevailing market situation, the land premium for the units within the Scheme is about $3,000-$3,500/ft^2. The above hypothetic example and premium per square foot are only for reference as individual case is different due to different factors including location, orientation, floor, unit size and permissible PR, etc. Moreover, the administrative fee for the removal of the alienation restrictions at about more than $56,000 chargeable by the Lands Department was waived. The ad valorem stamp duty and additional stamp duty regarding the property transaction after the dissolution of Co-operative Building Society were also exempted by the Government. In view of different unit rates of Premium for different properties within the same project, the net amount per square foot received by owners would be different after deducting the Premium from the

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		acquisition amount. Therefore, URA adopts levelling adjustments by making reference to the lowest unit rate of the Premium at the time of URA's initial acquisition offers for all the residential properties of which Premium have not yet paid, so as to ensure that all the ex-members of the CBSs in the same project would pay the same unit rate of Premium. Besides, (ex) CBS members can submit application to the Lands Department for the assessment of the outstanding land premium for their information. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely HPA). The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building,

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		situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.
191, 426-428, 431, 436, 598, 746, 762, 841, 845, 848, 853, 858, 878.	The plan is ill-founded and takes away the rights and benefits of the civil servants and violate the Basic Law.	According to the Civil Service Bureau, the CBS Scheme was launched in 1952. It is a discretionary housing benefit where the provision is subject to resource availability. Among the old forms of civil service housing benefits, there are civil service housing benefit schemes provided to eligible officers as a condition of service, e.g. Non-departmental Quarters, Private Tenancy Allowance, etc. It has been the Government's policy all along that civil service housing benefits are provided for serving officers. The provision of civil service housing benefits is governed by the terms of appointment of individual officers and the eligibility criteria and terms and conditions of the respective housing benefit

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		schemes. The CBS Scheme is a discretionary housing benefit where the provision is subject to availability of resources. The CBS Scheme is not a condition of service and hence cannot be regarded as a life-long housing benefit of CBS members. According to the CBS Scheme, the Government provided grant of land at concessionary price and low-interest loans to groups of eligible civil servants who formed CBSs for building blocks of flats for the occupation of CBS members and their family members. The CBS Scheme did not aim to allow CBS members to possess the relevant legal title. An eligible civil servant is considered to have enjoyed the civil service housing benefit when he/she became a CBS member. To address the demands of CBS members to acquire legal titles of their flats, the Government introduced guidelines in 1987 to permit the transfer of the titles to the respective flats and land to individual members upon the dissolution of CBSs with the consent of all members. The flats concerned are subject to alienation restrictions. The owners of flats have to pay the land premium

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		to the Government before selling their flats. The Government then issued the existing guidelines in 1993 to replace the old ones, under which a CBS may, upon obtaining the consent of 75% of its members, apply for dissolution. Individual members may then acquire titles to their flats and land by deed of assignment to become owners, and transfer their flats as they wish upon payment of a land premium as determined by LandsD according to the lease conditions. The terms and conditions of the CBS Scheme, and the relevant criteria (including eligibility criteria for CBS membership) have been adopted up till now. It is an optional arrangement for CBS members to decide whether to dissolve their CBS and acquire the legal titles to the flats and land to become owners, and transfer their flats as they wish upon payment of a land premium. Whether to apply for dissolution is the internal matter of the CBS concerned. Upon becoming the owners of flats, former CBS members may consider when to pay the land premium to the Government according to their own situation.

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346, 493, 746, 794.	● URA should provide rental subsidy during the transition period before the new properties are available for the affected residents to move back in. ● There should be better interim arrangements such as providing relocation expenses as many residents are retirees who cannot rent apartments.	The Scheme is commenced in accordance with the URAO and the usual project implementation approach, including prevailing acquisition and rehousing policies, adopted by the URA. The prevailing acquisition principle of URA is based on the property acquisition policy approved by the Finance Committee of the Legislative Council in March 2001 as the principle of compensation calculation. The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view.

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		Following the prevailing practice, the URA will appoint 7 independent consultants by open ballot to assess the value per saleable area of the notional replacement flat. The average of the 5 assessed values after removing the highest and lowest values will be adopted for the whole Scheme. In addition to HPA or Supplementary Allowance (SA), the URA will offer an Incidental Cost Allowance (ICA) to owners of domestic properties to assist payment of removal expenses and expenditure relating to the purchase of a domestic replacement flat. If the amount of necessary and reasonable expenses actually incurred by the owner of a domestic property in selling the affected property to URA (i.e. legal cost) and purchasing a domestic replacement flat (i.e. removal cost, stamp duty, agency fee and legal cost) exceeds the amount of ICA offered by URA, the owner may be reimbursed with the difference subject to certain eligibility criterion. As stated in PA 2018, the Scheme is commenced in accordance with the usual project

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		implementation approach, including prevailing acquisition and rehousing policies, adopted by the URA and the interim rental subsidies deviates from the above policies.
346, 348, 746, 784, 794, 830, 845, 850, 876.	● The residents should be allowed to resettle in a FFF unit in the same location with similar gross floor area as their previous homes. ● The location of the unit in the new development for rehousing affected residents should as far as possible be the same as the location of the properties they live.	According to the new URS 2011, and as far as relevant legislation allows, the URA will offer FFF arrangement (in-situ or in the same district or at available sites) to affected eligible owner-occupiers of domestic properties. Under such arrangement, new flats will be made available in a URA new development in-situ or URA development(s) in the same district or available sites at market value, as an additional choice to cash offer to such owner-occupiers. The size of units offered for FFF is subject to further study and decision of the URA.
348, 386, 426-428, 436, 481, 493, 668, 685, 746, 748, 762, 830, 845, 846, 848, 850, 876, 878.	● There is a lack of clear resettlement strategy for elderly residents. The compensation after deducting the land premium is not sufficient to buy a unit of similar size in the same district. ● It is unfair for the residents and elderlies to be resettled in inferior quality public housing in a new district which lack basic amenities.	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers, especially the elderly, as additional choices to cash offer. These choices provide an option for the owner-occupiers to rehouse in the same district.

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425-428, 746, 794, 845.	● The existing valuation method is not transparent and it is unfair especially for the one who is living on the ground floor with the yard. ● The valuation method should also consider common area in calculating compensation.	Calculation of the acquisition offer of a property is based on the saleable area of the property. The definition of saleable area shall follow the Code of Measuring Practice issued in March 1999 and the Supplement to the Code of Measuring Practice issued in July 2014 by the Hong Kong Institute of Surveyors. According to the Code of Measuring Practice, the saleable area of a unit comprises the floor area exclusively allocated to that unit including balconies and other similar features. The URA will appoint independent consultant to calculate the area of the property, including the saleable area and the area of its ancillary accommodation (if any). Subject to the owner having good title to the property or any part thereof, the area calculation of a property will normally base on the plans and documents (such as Assignment, Agreement for Sale and Purchase or Deed of Mutual Covenant etc.) registered in the Land Registry in addition to the latest approved general building plans available in the Buildings Department (if any).
762, 830, 845, 848, 876, 878.	The URA should provide multiple compensations to residents, including: a special one-off land	Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier

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	premium discount, monetary compensation to cover future homes before the final satisfactory settlement, compensation for all relocation expense, compensation for the deprivation of rights to rebuild the cooperative in the same land later, compensation for the purchase private residential units if owners prefer not to worry about future land premium debt, transparent information of land premium calculation and enough time for consideration, option to resettle with units of similar sizes in the same site, chance for residents to present their ideas for resettlement units, share the future return of redevelopment. The acquisition terms should be similar to that of Belcher's ex-western district CBS redevelopment.	of domestic property the market value, plus an ex-gratia allowance (namely HPA). The amount of HPA payable to individual owners is the difference between the value of a notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility at the beginning of the acquisition process. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view. As an additional option to cash offer, FFF option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. Besides, the Dedicated Rehousing Estate (DRE) near Muk Chun Street in Kai Tak Development Area (KTDA) developed and managed by the Hong Kong Housing Society (HKHS) is another option offered at a discount

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		market price similar to subsidized housing by the Government as mentioned in PA in 2018.
794.	It would be very unfair and unreasonable if my brother is not regarded as owner-occupier for the purpose of determining whether he is eligible for Home Purchase Allowance, participation in "Flat-for-Flat" Scheme and purchase of subsidized sale flat of dedicated housing estates developed and managed by the Hong Kong Housing Society, as he is the successor of the CBS membership but has already got married and moved to a separate residence.	Individual case of ownership or owner-occupier status of the unit will be reviewed and considered with reference to the actual situation and the prevailing policies after CE in C approval of the Scheme when the offer is made.
794.	For the option of buying subsidized sale flats of dedicated rehousing estate to be developed and managed by the Hong Kong Housing Society, is the size of the flats similar to the size of the CBS accommodation affected by the Scheme each with saleable area of over or close to 1,000 square feet and with high ceiling? If not, is it that each affected household may purchase 3 to 5 units such that the total saleable area of the units bought is no less than the saleable area of existing CBS property including the verandah?	According to the Development Bureau, other than those eligible CBS owner-occupiers who do not join FFF arrangement (in-situ or in the same district or at available sites) under URA's prevailing compensation package, the subsidised sale flats (SSFs) of the DRE near Muk Chun Street in KTDA is an alternative option offered at a discounted price based on a mechanism similar to that for other subsidised housing provided by the Government. According to the current information, mainly 2-bedrooms and 3-bedrooms units will be provided in accordance with the preliminary design concept of the DRE. Actual unit sizes, layout and number of

Ref Nos. 參考編號	Consolidated / Extracted Comments 綜合意見 / 意見節錄	URA's Responses 市建局之回應
B) 反對意見 Object Comments (662 comments in total)		
		the SSFs, which would make reference to the specifications of subsidised housing flats, are subject to the approved building plans. Details of the DRE will be provided by the Government and HKHS in due course.
***意見類別三：有關對社區網絡 / 社區設施的影響**		
2, 78, 84, 130-144, 146-157, 159, 160, 176, 181, 130-144, 147-157, 159, 160, 181, 182, 184-187, 194-198, 205-207, 237-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 347, 349-367, 369-371, 373-378, 382, 384, 385, 387-396, 412-423, 434, 435, 437-443, 445, 446, 450, 452-456, 458-462, 464-474, 478, 482-492, 494-503, 505, 507, 509-512, 520, 528-538, 540-542, 556-567, 569, 570, 572-589, 595, 596,	● 珍惜現時社區的人脈，對社區有歸屬感，重建會破壞居民與街坊數十年的關係及生活圈習慣 ● 該計劃內長者比例高，已習慣區內的生活模式、多年建立的人際網絡及醫療網絡，重建將迫使長者重新適應新環境；社區服務隊無法取代原有社區網絡 ● 社會影響評估報告（第二階段）亦指出居民收入偏低，其中不少已退休，重建後住屋支出將會增加，遷離後亦恐生活費貴重。重建將會降低居民的生活水平，加上疫情造成經濟及民生損害，大幅增加居民負擔 ● 合作社單位實用面積大，容納同一家庭多代同堂，遷離後難以在市場找到相若單位。如不能原址安置，重建計劃令居民遷離將會製造社會問題，包括長者精神健康、長者難以適應新居	如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展計劃原址或同區或適當地盤)，作為建議收購金額以外的額外選擇。此外，政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位，以緩解遷置可能構成的不便。 市建局及社區服務隊會盡量透過向長者提供安置事宜安排上及提供日後要遷往屋邨附近環境的資料，以紓緩長者有關的焦慮。社區服務隊會跟進已遷往新居所的長者個案，亦會舉辦活動協助長者認識社區設施、探訪新社區的社會服務單位及協助轉介至新社區的醫療服務。市建局的「夥伴同行」探訪計

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B) 反對意見 Object Comments (662 comments in total)		
600-619, 624, 626, 628-632, 634-640, 642-646, 649-658, 660-667, 669-684, 690-695, 701-711, 715, 723-730, 733-746, 750-752, 755, 759-761, 764, 767-769, 772, 776, 782-788, 798-800, 802-804, 806, 810, 811, 815-817, 820-822, 824, 826, 827, 830-840, 842-844, 847, 850, 852, 854, 855, 857, 860, 861, 863, 864, 866, 867, 869, 870, 872-874, 876, 877, 880.	住環境、影響家中孩子原區升學、多代家庭離散不能互相照顧等問題。重建消息加劇長者在肺炎疫情、經濟不景下已面臨的巨大精神及心理壓力。有居民指出當年正是為了能和家人同住才放棄其他房屋福利選擇合作社房屋	劃和社區服務隊將會特別關注獨居和二人住戶的長者，採取積極主動的探訪及提供適時的協助。 市建局明白在目前私人樓宇市場，單位普遍以中、小型為主；在重建項目內居住的大型家庭」，難以在市場上尋找較大的單位一同居住。故此，市建局與政府磋商後，為項目推出更具彈性的單位重置方案。合資格的前社員自住業主家庭，如涉及「分支家庭」，在接受市建局的首次收購建議後，可以購買最多兩個專用安置屋邨的資助出售單位。或「樓換樓」計劃單位等不同組合，減低重建對需要「分戶」及大型家庭的影響。
***Comments Category 3: Impact on Social Network / Community Facilities**		
451, 481, 493, 685, 748, 749, 762, 784, 830, 845, 846, 848, 850, 876, 878.	● Redevelopment would be a traumatic experience for the elderlies. The health and well-being of elderlies will be at risk if they are relocated to a new environment and their social network is destroyed. ● The project would create financial and emotional problems for families.	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers that may contribute to minimize the impacts due to relocation to different district.

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B) 反對意見 Object Comments (662 comments in total)		
		The URA and the Social Service Team (SST) will make an effort to alleviate their anxiety by providing information on the arrangement of rehousing and the new environment surrounding the estate. After their relocation to a new accommodation, the SST will follow up and provide assistance to the elderly. The SST will conduct programs on getting to know the local community facilities, visits to the social service providers, and provide assistance on referral to medical centers in the new neighbourhood. The URA "Project Engagement" team and the SST will follow up the singleton and doubleton elderly households and adopt a proactive approach to deliver prompt assistance to the elderly through home visits.
***意見類別四：有關市建局項目程序 / 重建方面**		
3, 8, 73, 80, 86, 130-144, 147-157, 159, 160, 165, 169, 170, 176, 181, 182, 184-187, 194-198, 206, 237-265, 269-278, 280, 295-309, 311, 312, 314-316, 325-329, 331, 340, 341, 347, 349-367, 369-	● 大部分樓宇並非嚴重失修，狀況尚可及保養良好，樓齡雖大但不是危樓，社會影響評估報告（第一階段）中亦有提及大部分樓宇狀況尚可，因此沒有重建急切需要 ● 重建計劃選址是有違市建局於市區重建局條例及市區重建策略中提及優先處理日久失修樓宇	市建局為回應政府在 2018 及 2019 年《施政報告》中的邀請，根據《施政報告》中所列出適合重建合作社樓宇的特點，考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，物色一至兩個適合作高密度發展的合作社地段作為重建試點，該計劃是重建試點項目之一。

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B) 反對意見 Object Comments (662 comments in total)		
371, 373, 374, 376, 377, 382, 384, 385, 387-396, 412-423, 434, 435, 437-442, 445, 446, 452-456, 458-462, 464-473, 482-492, 494-505, 507, 509, 512, 528-538, 540-542, 556-567, 569, 570, 572-589, 595, 599-616, 618, 619, 624, 626, 628-631, 634-640, 642-646, 649-658, 660-667, 669-682, 690-695, 701-708, 711, 715, 723-730, 733-740, 745, 750-752, 761, 767-769, 776, 782, 784, 785, 798, 800, 804, 806, 810, 811, 816, 822, 824, 826, 829-838, 842-844, 847, 850, 854, 860, 863, 864, 866, 869, 871, 873, 876, 877, 880.	的宗旨。市建局未能說服居民為何要重建保養良好、管理完善的樓宇 ● 社區與其他舊區相比光鮮整齊，治安良好，晚間清靜，沒有重建需要 ● 計劃應是改善居住環境而不是拆樓	根據核准一般建築圖則，該計劃內的所有樓宇樓齡均為 50 年以上，沒有電梯或其他無障礙設施，對住客和長者出入造成不便，宜居性較差。 該計劃地盤現時被美善同道和江蘇街分割，而道路兩側均有路邊泊車位，行人路約為 2-3 米闊。在土瓜灣港鐵站啟用後，現時有更多的行人途經該計劃內的行人路段，人流相對增加。車輛於現有美善同道的掘頭路窄路調頭會產生對行人的危險。 該計劃內並沒有任何休憩空間供公眾使用，離該計劃最近的公共空間為邊界外的高山道公園。 因此，該計劃旨在落實《施政報告》的目標，透過充分利用地段的發展潛力，增加房屋供應外，市建局亦為該計劃的土地透過重整及重新規劃，提供設有現代化設施的樓宇、休憩空間供公眾使用、人車分隔的地面步行街 / 廣場，並設有園景裝置及種植花木、商業 / 零售用途，以及提供地下街連接港鐵站出口，改善整體居住環境、地區的連接性及暢達

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		性，並透過合適的城市設計，營造更宜居的社區，達致更廣泛的社區裨益，惠及更多有需要的市民。
74-76, 87, 88, 92-96, 110, 111, 130-144, 147-157, 159, 160, 162, 163, 166, 181, 182, 184-187, 194-198, 205-207, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 339, 349-367, 369-371, 373, 374, 382, 384, 385, 387-396, 412-423, 434, 435, 437-442, 445, 446, 452, 453, 455, 456, 458-462, 464-473, 482-492, 494-505, 509, 512, 528-538, 540-542, 556-567, 569, 570, 572-589, 599-616, 618, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 701-711, 715, 723-730, 732-	● 市建局沒有把落山道與美善同里一段的合作社房屋納入計劃中，是為了避免「半山壹號」居民的強烈反對，相反受重建影響較深的樂民新村居民的反對聲音不容易受重視 ● 公務員樓宇狀況良好，重建令現時社區烏煙瘴氣，同一地段而未被納入重建範圍的公務員樓宇及土瓜灣其他舊樓狀況更差，劏房問題惡劣，應先重建其他舊區例如十三街、順寧道 ● 有美善同道 46 號居民質疑市建局何不一拼收回樓宇重建 ● 應先考慮重建其他更殘舊樓宇或低密度住宅區，例如九龍塘、加多利山、跑馬地及銅鑼灣白沙道一帶，更能善用市區土地	市建局為回應政府在 2018 及 2019 年《施政報告》中的邀請，根據《施政報告》中所列出適合重建合作社樓宇的特點，考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，物色一至兩個適合作高密度發展的合作社地段作為重建試點，該計劃是重建試點項目之一。 該計劃與一小段由落山道至美善同里的合作社樓宇之間，摻雜其他非合作社樓宇，該計劃旨在落實並達到合作社重建試點項目的目標，因此挑選合作社較集中的地段，故該計劃作為重建合作社的試點項目, 不會包含其他周邊非合作社樓宇。

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B) 反對意見 Object Comments (662 comments in total)		
745, 750-752, 759-761, 767-769, 776, 782, 784, 785, 816, 824, 829-838, 850, 860, 869, 871-873, 876, 877, 880.		
123, 130-144, 147-157, 159, 160, 181, 182, 184-187, 194-198, 206, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 349-352, 375, 439, 443, 503, 510, 512, 575-589, 596, 600-616, 628-632, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-695, 707, 708, 710, 715, 723-730, 733-738, 764, 776, 782-784, 816, 824, 832, 834-838, 844, 850, 860, 869, 870, 873, 877.	社會影響評估報告（第二階段）的結果斷章取義，凍結人口調查突如其來，居民在不清楚細節及賠償安排下回覆，所以報告並不反映現時居民意願	根據《市區重建策略》第 31 及 32 段，公布項目的開始實施日期的目的，是讓市建局可參照這個日期，根據其政策決定受影響人士領取特惠津貼和獲得安置的資格。 市建局會在項目的開始實施日期進行凍結人口調查，以核實受影響人士領取特惠津貼和獲得安置的資格。這項調查應於當日或最多數日內完成，並必須全面而準確，以免有「假冒居民」魚目混珠，入住重建區，濫用補償安排或安置資源及避免有租戶被不公平逼走。 此外，市建局亦會在政府憲報公布建議項目後，進行第二階段社會影響評估及向受影響人士派發社會影響評估問卷，以收集居民對重建計劃的意見，而當中受訪人士的回應並不代表受影響業主已接受市建局的收購建議。

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130-144, 147-157, 159, 160, 181, 182, 184-190, 192-198, 200-202, 206, 238-265, 269-278, 295-309, 311, 312, 314-316, 325-329, 349-367, 369-371, 373, 374, 377, 382, 384, 385, 387-396, 412-423, 430, 434, 435, 437-442, 445, 446, 452, 453, 455, 456, 458-462, 464-473, 482-492, 494-502, 505, 507, 509, 512, 513, 515, 528-538, 540-542, 556-567, 569, 570, 572-589, 595, 600-616, 628-631, 634-640, 642-646, 649-658, 660-667, 669-671, 673-682, 690-708, 710, 715, 723-730, 733-740, 745, 750, 752, 758, 761, 767, 769, 776, 782, 784, 785, 816, 824, 830-838, 850, 860, 869, 873, 876, 877, 880.	重建前沒有與公務員事務局溝通處理受影響公務員	基於執行合作社樓宇重建的複雜性和獨特性，在過去兩年多的時間，市建局曾與多個政府部門，在散社、補回地價、支付印花稅、補償方案及公務員房屋福利等事宜召開了多次的跨部門會議，探討不同務實的方案。市建局亦一直與公務員合作社樓宇重建試點項目的居民及業主保持溝通，舉行居民簡報會，與及和相關立法會議員、區議員及業主會面。 就合作社的特別情況，市建局會為社員提供協助及處理，而市建局亦於 2021 年 11 月 22 日至 24 日一共舉行了 9 場意見居民會，以了解相關業主及社員對市建局推行 CBS-2:KC 的想法及意見，收集的意見將協助市建局進一步了解居民對重建的意願。市建局亦會透過「夥伴同行」探訪計劃，主動接觸試點項目內的每個家庭及住戶，詳細解釋項目政策及其他相關資訊。

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B) 反對意見 Object Comments (662 comments in total)		
280, 751, 768, 822, 843.	● 項目範圍一帶的建築保留了香港舊代的面貌，就保育甚至旅遊來說亦有價值 ● 合作社樓宇有特別建築風格，不能與一般危樓相比。曾經多次有電視劇及電影於社區內取景，重建將會損害文化產業，應保留這個特色小區	合作社樓宇建於 1959 至 1970 年期間，屬於當時政府以優惠價批出土地，並提供貸款，讓合資格的公務員透過成立合作社興建的典型純住宅樓宇，為合作社社員及其家屬提供居所。是次重建計劃並非保育項目，旨在落實《施政報告》對重建合作社樓宇的目標，透過充分利用合作社地段的發展潛力，增加房屋供應。於項目開展時，根據古物古蹟辦事處的記錄，該計劃內的建築群並未有被列入為歷史建築或法定古蹟，亦沒有被列入新增項目名單內等待進行評級。
347, 353-367, 369-371, 373, 374, 382, 384, 385, 387-396, 412-423, 434, 435, 437, 438, 440-442, 445, 446, 452, 453, 455, 456, 458-462, 464-473, 482-492, 494-503, 505, 509, 511, 556-567, 569, 570, 572-574, 595, 701-706, 739, 740, 745, 750, 752, 755, 758, 761, 767-769, 780, 781, 784, 785, 801, 816, 824, 830-837,	市建局公眾簡介會的回答內容不清不楚，沒有嘗試解答居民的疑問亦沒有提供實質有關賠償的資料	市建局聯同政府發展局、公務員事務局及地政總署的代表於 2020 年 7 月 6 日及 7 日，為該計劃的受影響的人士舉行了三場簡報會，並收集意見。在會上市建局及相關政府代表向參加者講解凍結人口調查、規劃、收購、租戶特惠津貼及安置、解散合作社及補地價等問題。市建局並會進行「夥伴同行」探訪計劃，深入解釋政策及項目的最新進展、補償及遷置安排，以及時間表等等，而且透過不同途徑與居民保持溝通及交流，以釋除居民的疑慮。 就合作社的特別情況，市建局亦於 2021 年 11 月 22 日至 24 日一共舉行了 9 場意見居民會，以嘗試解答

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B) 反對意見 Object Comments (662 comments in total)		
850, 854, 860, 869, 873, 876, 877, 880.		居民的疑問, 及了解相關業主及社員對市建局推行 CBS-2:KC 的想法及意見，收集的意見將協助市建局進一步了解居民對重建的意願。
539, 544, 546, 547, 550-552.	反對有區議員提議重建樂民新村，現時生活舒適不希望被重置	市建局的主要職能是進行舊區更新，與香港房屋委員會（房委會）及房協在房屋政策有不同的角色及分工，而公營房屋主要由房委會和房協負責供應和管理。然而，樂民新村的重建計劃將由政府和房協商討決定，不屬於市建局範疇。
617, 801.	土瓜灣區不斷重建，但只是豪宅林立，沒有保育本區特色，居民生活未有改善；政府不應為發展而發展；新增單位有三分之二多為私樓，並非真正惠及普羅市民	該計劃是回應 2018 年及 2019 年政府《施政報告》的邀請，沿用市建局推展項目的方式，物色一至兩個適合的合作社地段作為重建試點。就《施政報告》中提及，該計劃除了以重建合作社樓宇釋放土地發展潛力，增加房屋供應外，亦藉著重建的機會，透過重整及重新規劃，將地面街道納入發展，以增加可用樓面面積及地盤的規劃裨益。 在修訂的設計 (2022 年)，初步設計是將該計劃的地盤除一般私營房屋外，南面約三分之一的面積，將按施政報告方向， 提供約 950 個首置單位供應市場需要。透過重新規劃，該計劃亦會為社區帶來更大

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		社會裨益，惠及區內居民。當中擬建的地下購物街將連接毗鄰項目的土瓜灣站兩個出入口，並融合地面步行街的設計，串連成為一個多層行人道網絡，改善地區的連接性及暢達性，並透過合適的園林景觀和城市設計，為居民提供更佳的步行環境。此外，該計劃亦會提供政府、機構或社區設施，為社區提供多元活動空間，以滿足社區需要。
756, 801, 842, 864.	● 市建局尚未回應第一階段公眾意見，如賠償金等問題便開展第二階段 ● 疫情當前市建局會否延長諮詢期，諮詢過程倉促	在諮詢公眾意見方面，該計劃根據刊憲公告，於 2020 年 5 月 25 日將該計劃的發展計劃草圖，包括第一階段社會影響評估報告呈交予城規會，並於 2020 年 5 月 29 日至 6 月 19 日的三星期時間內收集公眾意見；於 2020 年 7 月 8 日將第二階段社會影響評估報告呈交予城規會，並於 2020 年 7 月 17 日至 7 月 31 日的兩星期時間內收集公眾意見. 市建局已於 2020 年 12 月 30 日向城規會提交對第一階段公眾意見的回應. 然而，鑑於在計劃開展後的諮詢期內，市建局收集了不同意見，當中包括大部份與合作社的土地業權相關問題. 市建局與政府政策局及部門商討後，已於

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		2022 年 10 月 14 日向該計劃的受影響居民發放「有關解散合作社、收購物業及收回土地補償安排的最新資訊」。同時，市建局亦修訂了發展計劃草圖及初步設計，以回應施政報告方向指引， 於計劃內提供約 950 個首置單位，並同時改善設計，以進一步增加建議計劃對地區帶來的規劃裨益。 市建局現連同上述的合作社最新資訊，修訂草圖 (2022 年) 連同這份對第二階段公眾意見的回應提交城規會考慮。 如城規會在考慮草圖後認為該草圖適宜公布，須當作是由城規會為施行《城市規劃條例》(第 131 章) 而擬備的草圖，屆時將按《城市規劃條例》第 5 條展示兩個月以供公眾查閱及收集公眾意見，有關諮詢時間是根據《城市規劃條例》第 5 條訂定，並非由市建局決定。
***Comments Category 4: URA's Planning Procedure and Redevelopment Process**		
9-15, 35-38, 40, 52-54, 59-61, 67-72, 77, 89-91, 97, 102, 107-109, 112,	Misleading information of views of the residents on the Scheme in SIA2 report as the data was	URA has to keep confidentiality of all redevelopment projects (including the pilot projects) and will only disclose the details of the

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B) 反對意見 Object Comments (662 comments in total)		
124, 346, 425-428, 431, 598.	collected shortly after the project commencement when the residents were ill-informed.	projects when the projects are commenced and published in the Gazette. Commencement of the projects must be kept confidential to prevent any person abusing the compensation system or the rehousing arrangement.
9-15, 35-38, 40, 52-54, 59-61, 67-72, 77, 89-91, 97, 102, 107-109, 112.	URA did nothing to let the residents know about the opportunity to express their comments.	As mentioned in the Gazette, two public consultation periods are provided. After the submission of the DSP to the TPB on 25 May 2020, submission of the public comment was allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 was allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the Town Planning Ordinance (TPO) (Cap. 131). It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months.

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11-15, 35-38, 40, 52-54, 59-61, 67-72, 77, 89-91, 97, 102, 107-109, 112, 436.	URA had no intention of answering questions from the residents in the public briefings and addressing the concerns of the residents.	During the briefing sessions, questions on Freezing Survey, planning, acquisition, tenant's exgratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting. 9 briefing sessions were organized by URA on 22-24 November 2021 for members/owners of CBS-2 Development scheme to update and explain the latest planning, acquisition policy, CBS dissolution and outstanding land premium arrangement, to collect their views for implementation of the project. The URA also implemented "Project Engagement" Programme to visit residents to update about the project progress, explain the compensation and rehousing arrangement to ease their concerns.
11-15, 35-38, 40, 52-54, 59-61, 67-72, 77, 89-91, 97, 102, 107-109, 112.	SIA2 report did not mention the cases of emotional distress filed by the residents.	As mentioned in the SIA 2, the URA understands that the affected residents are likely to experience doubts and worries during the long waiting period from scheme commencement to commencing acquisition and rehousing arrangement. The URA has therefore implemented a "Project Engagement" Programme to provide direct contact services (e.g. site visits) in order to alleviate their anxiety by provide corresponding assistance, such as

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		explanation of the project details and referral of residents' special needs to SST or the relevant departments.
81, 145, 346, 348, 436, 448, 493, 748, 749, 794, 830, 846, 850, 876.	● There were insufficient information and communication for the residents. ● The time is inappropriate to launch the project due to the pandemic and social instability. ● The redevelopment timetable is unrealistic due to the impact of the pandemic and that there are too many elderlies who need longer time to digest the information.	Project briefing videos instead of the public briefing in past practice are provided to the affected persons by URA when the Scheme is commenced to avoid gatherings and to minimize the risk of infection for residents and staffs under COVID-19 pandemic. The videos explain the Scheme such that residents can safely understand the content of the Scheme and include information on planning procedures, the URA's acquisition, tenant's ex-gratia allowance and rehousing policies, and assistance in the dissolution of CBS. As the situation of pandemic and the government prohibition on group gathering for prevention and control of disease has gradually relieved in June and July 2020, 3 public briefing sessions were organized by URA with government representatives from Civil Service Bureau, Development Bureau and Lands Department on 6 and 7 July 2020 to inform all the affected persons, the details of the Scheme and to obtain public views on the Scheme.

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		Questions on Freezing Survey, planning, acquisition, tenant's exgratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting. 9 briefing sessions were organized by URA on 22-24 November 2021 for members/owners of CBS-2 Development scheme to update and explain the latest planning, acquisition policy, CBS dissolution and outstanding land premium arrangement, to collect their views for implementation of the project. The URA also implemented "Project Engagement" Programme to visit residents to update about the project progress, explain the compensation and rehousing arrangement to ease their concerns.
114, 267, 268, 279, 310, 386, 448, 451, 571.	The plan should be stopped due to strong opposition. The URA should respect those who wish to stay especially the elderlies.	The URA values the comments from the affected residents. An opinion survey has been conducted in November 2021 by the URA in order to better understand the views of the residents. According to the survey, 69% of them in favour of the Scheme. In view that most of the comments received were mainly related to CBS issues, especially on the land matters of the undissolved CBSs, the URA consulted Government Bureaux/Departments and

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		addressed the related comments and concerns. In this connection, the URA has taken the opportunity to revise the draft DSP to respond to the policy directives of providing more Starter Home (SH) units and to review the Scheme in order to achieve wider planning gains for the community. With the above considerations and changes, the URA revised the design of the Scheme to include provision of about 950 SH units and to revise the development proposals to further enhance the planning gains of the Scheme to the environment. The revised design (2022) is submitted to TPB for consideration. If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers, especially the elderly, as additional choices to cash offer. These choices provide an option for the owner-occupiers to rehouse in the same district.

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266, 386, 481, 598, 668, 722. 746, 762, 794, 830, 845, 850, 848, 858, 876, 878.	● The buildings are in good condition and the people wish to stay there. There is no urgency nor reason to redevelop the area. Hence, the project does not align with the URS. ● The URA should redevelop other areas first or areas where the residents wish for redevelopment or where the buildings are severely dilapidated. For example, there are other old buildings in To Kwa Wan which require redevelopment.	In response to the PAs by the Chief Executive, the URA was invited to identify one or two clusters of CBS Scheme sites suitable for high-density development as pilot sites. The Scheme has been selected according to the prescribed multiple factors including but not limited to the following: cluster of CBS sites in high-density development areas (i.e. R(A) zone under the Outline Zoning Plan) in the urban districts, numbers of CBS involved, proximity to existing public rental housing and other ancillary facilities, building age and its existing development density. The Scheme also seeks to improve the overall environment through redevelopment in accordance with the URS 2011. The concerned urban area is replanned to utilise the development potential and increase the housing supply. Part of the site will be allocated to Starter Home (SH) units for the planning gain of general public. The connectivity and walkability is also improved through restructuring and urban design to create a livable community.

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746.	It is unfair that the TPB does not consider compensation arrangements in a redevelopment project.	The Scheme is commenced in accordance with the URAO and the usual project implementation approach, including prevailing acquisition and rehousing policies, adopted by the URA. The prevailing acquisition principle of URA is based on the property acquisition policy approved by the Finance Committee of the Legislative Council in March 2001 as the principle of compensation calculation. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely HPA). As an additional option to cash offer, FFF option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. Besides, the Dedicated Rehousing Estate (DRE) near Muk Chun Street in Kai Tak Development Area (KTDA) developed and managed by the Hong Kong Housing Society (HKHS) is another option offered at a discount market price similar to subsidized housing by the Government as mentioned in PA in 2018.

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762, 845, 848, 850, 878.	The site is a scenic area with cultural value as it is frequently used as settings for TV drama and movies. Hence, it should be preserved.	The CBS buildings within the Scheme were built in 1959 to 1970 and are typical types of CBS residential buildings. The Scheme is not a preservation project. It aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. When the Scheme is commenced, according to the record of the Antiquities and Monuments Office (AMO), the buildings within the Scheme are not on the lists of historic buildings or declared monuments or included in the list of new items for grading assessment.
794.	Unclear on the reason why the time for people to comment different for CBS-1 and CBS-2 projects.	The Scheme, CBS-2: KC is implemented as a Development Scheme under section 25 of the URAO, which involves amendment to the Outline Zoning Plan (OZP) and will be submitted to Town Planning Board (TPB) for consideration; While for CBS-1: KC, which is implemented as a Development Project under section 26 of the URAO, which conforms to the zonings of the OZP for redevelopment. Given the two CBS projects are commenced under different Ordinances, the public

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		consultation procedures are different. Nevertheless, for CBS-2:KC, two public consultation periods are provided as mentioned in the Gazette, with the duration of 3 weeks in the 1st round and 2 weeks in the 2nd round of consultation. In addition, if the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the TPO (Cap. 131). It will then be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months. Based on the above statutory procedures, the public consultation period allowed for CBS-2:KC would not be less than CBS-1:KC, which is implemented as a development project with 2 months public consultation period.
794.	Why people affected by the Scheme are deprived of the right to object to the implementation of the Scheme and have their objection entertained and considered? Is this in accordance with Article 6 of the Basic Law?	People affected by the Scheme have the right to object to the Scheme under the public consultation mechanism in the Town Planning Ordinance (TPO) (Cap. 131). As mentioned in the Gazette, two public consultation periods are provided. After the

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		submission of the DSP to the TPB on 25 May 2020, submission of the public comment was allowed in a period of 3 weeks from 29 May 2020 to 19 June 2020. After the submission of stage 2 Social Impact Assessment (SIA 2) to the TPB on 8 July 2020, submission of the public comment on SIA 2 was allowed in a period of 2 weeks from 17 July 2020 to 31 July 2020. If the TPB deems the DSP as suitable for publication, it will be deemed to be a draft plan prepared by the TPB for the purposes of the TPO. It will be published under Section 5 of TPO and submission of public comments will be further allowed in a period of 2 months.
795.	Enquiry made to URA on missing SIA Stage 2 Report on the website.	The Stage 2 of the Social Impact Assessment ("Stage 2 SIA") report has been submitted on 8 July 2020 to the Town Planning Board (TPB) in accordance to the Notice of Commencement published in the Gazette (G.N. 2565) on 22 May 2020. Upon the submission of the report to the TPB, the URA prepared the printed copies of such report as well as the electronic version for public inspection at the URA's Headquarters, the URA's

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		Kowloon City Neighbourhood Centre and the URA's website. Due to the time required for delivery and logistic arrangement, Stage 2 SIA report of the Scheme was available on the 2nd day after submission, i.e. 9 July 2020, for public viewing at the URA's Headquarters and Kowloon City Neighbourhood Centre. As there was a technical problem that affected the online display of the Stage 2 SIA report on URA's website, the URA has immediately looked into the matter and fixed the technical problem. The online display of the Stage 2 SIA report resumed normal on 9 July 2020 and it is currently available for public inspection at the URA's website.
828.	URA should improve the life of residents by overhauling and beautifying the old buildings, instead of breaking them down and move the residents to low quality subsidized housing in Kai Tak.	The Scheme aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS Scheme sites. The Scheme seeks to improve the overall environment through redevelopment in accordance

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		with the URS 2011. Through the redevelopment of the Scheme, residential buildings with better modern standard facilities will be provided to improve the living environment in the district. The connectivity and walkability is also improved through restructuring and urban design to create a livable community. Apart from the option of the DRE at KTDA in Kowloon City District, the URA will provide cash offer or FFF option (in-situ or in the same district or at available sites) to those eligible domestic owner-occupiers.

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C) 一般意見 General Comments (28 comments in total)		
***意見類別一：有關收購、租戶特惠津貼及安置政策**		
1, 209, 383, 519, 555, 568, 659, 770, 774, 777,	● 由市建局補地價 / 要求豁免補地價 / 減低補地價金額	根據地政總署的資料，政府早年以十足市值的三分之一地價批出合作社樓宇用地，隨後合作社成員在

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779, 796, 805, 807-809, 812, 856, 859, 879.	● 在扣除補地價款項後，業主所得到的實際淨收購補償，不足以購買與原本面積相約的居所	取得相關單位業權的時候，其轉讓契約設有轉讓限制條款，合作社樓宇業主必須先向政府繳付三分之二土地補價才可出售單位。有關補價是業主在取得業權時與政府之間的條款。任何減免均偏離一貫的政府政策和做法，亦對已完成補價的業主不公平。 政府已檢視其土地補價的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020 年 6 月 1 日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎適用於該計劃。 「現有用途土地價值」的補地價為樓面地價的三分之二，並加上合作社現樓及新樓市值的折讓比例。請參照以下假設例子的計算方法： (甲) 以「重建價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價($10,000/平方呎) = $6,666/平方呎 (按樓面面積計)

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		(乙) 以「現有用途土地價值」基礎計算作簡單說明 $\frac{2}{3}$ x 樓面地價 ($10,000/平方呎) x $\frac{\text{合作社現樓呎價 \$9,000/平方呎}}{\text{新樓呎價 \$18,000/平方呎}}$ = $3,333/平方呎 (按樓面面積計) 在上述假設例子中，土地補價 (乙) 約為土地補價 (甲) 的百分之五十。按現時市況的初步估算，該計劃的單位補地價金額約為每平方呎 3,000 至 3,500 元。由於每宗個案不同 (例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同)，上述假設例子及每平方呎補價只用作參考。 另外，政府減免處理土地補價的行政費，約五萬六千多元以減輕未補地價業主在單位業權轉售所涉及的經濟負擔。政府同時減免因散社而需進行的業權轉讓，所涉及的額外印花稅及從價印花稅。 基於同一項目內每個物業的補地價金額呎價(「補地價單價」)都不相同，若將收購金額扣除補地價金額

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		後，不同物業業主所得餘款的呎價亦將各異。因此，市建局提供劃一補地價單價安排，使所有前合作社社員在同一項目內繳付相同的補地價單價。重建項目內所有未補地價的住宅物業於首次收購建議時最低的補地價單價作為「劃一補地價單價」。 如尚未繳付補地價金額的業主接受市建局發出的收購建議，只須支付以劃一補地價單價乘以單位實用面積計算的補地價金額(「劃一單價補地價金額」)，市建局將支付地政總署發出的補地價金額與「劃一單價補地價金額」之差額。至於已繳付補地價金額的前社員，如已繳付的補地價金額高於「劃一單價補地價金額」，可獲發還一筆等同兩者差額之金額。 此外，前合作社社員可向地政總署遞交申請評估補地價的金額作參考。 根據合作社樓宇的土地契約條款，前合作社社員須向政府繳付土地補價，才可以轉讓其單位。業主作為業權人，有履行地契的責任。政府亦為合資格的合作社單位自住業主作出特別安排，讓其可購買由

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		房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。此外，市建局及地政總署會協調簡化業主繳交補地價的手續。當該計劃獲批准後，市建局會向業主發出收購建議。在同一時間地政總署會提供補地價金額給業主考慮。
1, 209, 383, 555, 568, 796, 818.	● 希望作出公平、合理既收購賠償 ● 賠償足夠業主在同區購買面積和質素相約的重置單位，或提供資助房屋作為重置居所，附加轉讓限制 ● 市建局應提供多個補償方案，回應不同戶主需要，除金錢賠償外，建議在啟德 1E1 區原有安置計劃之中，讓戶主以市價兩折購入不多於 2 個單位；為戶主編配月租公屋單位而不需接受資產審查及不受富戶政策規管	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地

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		區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 合作社樓宇自住業主，可以獲得百分百的自置居所津貼金額，相信受影響的自住業主可靈活運用該津貼，在同區或其他地區的私人市場，選擇購買面積相約的重置單位。 另外，市建局為未補地價的業主提供劃一補地價單價安排，以協助他們補地價。如業主接受市建局發出的收購建議，只須支付以該計劃內最低的補地價單價作為「劃一補地價單價」乘以單位實用面積計算的補地價金額 (「劃一單價補地價金額」)。市建局將支付地政總署發出的補地價金額與「劃一單價補地價金額」之差額。 而未補地價合作社樓宇業主繳付補地價所需金額後，所得的收購建議金額餘款會較其他無須補地價的業主為少，因此政府為合資格的合作社單位自住業主作出特別安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在2026年左右落成，房協

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		會負責日後之營運及單位分配，以及適時公佈預售計劃。 如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展項目原址或同區或適當地盤)，作為給住宅自住業主的收購建議金額以外的選擇。選擇「樓換樓」的住宅自住業主必須先接受市建局首次收購建議金額，才可選擇「樓換樓」計劃。 市建局明白在目前私人樓宇市場，單位普遍以中、小型為主；在重建項目內居住的大型家庭」，難以在市場上尋找較大的單位一同居住。故此，市建局與政府磋商後，為項目推出更具彈性的單位重置方案。合資格的前社員自住業主家庭，如涉及「分支家庭」，在接受市建局的首次收購建議後，可以購買最多兩個專用安置屋邨的資助出售單位或「樓換樓」計劃單位等不同組合，減低重建對需要「分戶」及大型家庭的影響。
1, 383, 519, 555, 568, 659.	● 奪去原有公務員房屋福利 ● 應賠償業主因收購已被剝削的公務員房屋福利	根據公務員事務局的資料，合作社計劃始於 1952 年，是按資源酌情提供的公務員房屋福利。舊有的

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		公務員房屋福利中包括有作為服務條件提供予合資格人員的公務員房屋福利計劃，例如高級公務員宿舍、自行租屋津貼等。政府一貫的政策是為在職公務員提供公務員房屋福利。 公務員房屋福利是根據個別公務員的聘用條款，以及有關房屋福利計劃的條款及條件提供予合資格的在職人員。合作社計劃是按資源酌情提供的房屋福利，並非公務員的服務條件，因此合作社計劃不能被視為合作社社員的終身福利。 根據合作社計劃，政府以優惠價批出土地，並提供貸款，讓合資格的公務員可透過成立合作社興建住宅樓宇。計劃的目的是為合作社社員及其家屬提供居所，當時的政策並沒有計劃讓合作社社員取得法定業權。合資格的公務員在成為合作社社員時已被視為享用了公務員的房屋福利。 為回應合作社社員希望取得業權的訴求，政府在1987 年推出指引，容許合作社在取得所有社員同意下解散，將單位及土地業權轉讓予個別社員，相關單位的轉讓契約設有轉讓限制條款，有關業主必須

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		先向政府繳付土地補價才可出售其單位。隨後政府在1993年發出現行的指引取代舊指引，讓合作社在取得 75%社員同意後可申請解散繼而進行分契手續，讓個別社員取得其單位和土地業權成為業主，並於繳付由地政總署根據地契釐定的土地補價後把單位自由轉售。合作社計劃的條款和條件，以及相關標準(包括合作社社籍的申請資格)，一直沿用至今。 容許合作社解散並讓社員由其所屬合作社取得其單位和土地業權成為業主，並於補地價後自由買賣其單位，是政府提供予社員的一項選擇。至於是否需要申請散社乃合作社的內部事宜。前社員於成為業主後可按自身情況考慮何時向政府補回地價。 此外，該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。因此並非強奪居民的權益。

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218, 219, 383, 514, 519, 555, 568, 659, 770, 774, 777, 779, 856, 859.	● 建議市建局以新思維去推行計劃，積極考慮和接納街坊的建議方案，在原址重建面積相若的單位，安置受影響原居民 ● 提供原址或同區安置之「樓換樓」計劃，或以『呎換呎』方式不用補差價直接購買市建局在原區興建的單位，安置新單位面積必須與現住單位大小相若 ● 支持原址原大安置方案 ● 重建地段鄰近地鐵站出入口，發展潛力很大。原居民應有權分享重建成果，所以原址原大安置也是很合情合理的要求	市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。此外，政府亦決定將一幅位於啟德的用地給房協興建專用安置屋邨，為合資格的合作社單位自住業主作出特別安排，讓其可購買該專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在2026年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。 至於「原址原大」方案，方案提議市建局提供四項現金津貼給合作社業主（即租金津貼、搬遷、新屋裝修及添置相關物品津貼、將來35年管理費津貼、業主需支付的補地價津貼）；另外，方案亦要求一間原址原大；不設轉讓限制的新屋及新建的停車場歸合作社業主擁有及使用。

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		市建局經仔細分析和評估後，認為「原址原大」方案的三個建議均存在執行問題，及會為市建局造成沉重的財政負擔。 ● 「原址原大」方案提議市建局將地盤南面三份之一的部份改作合作社安置房屋，在市建局提交的修訂設計(2022 年)，該地段在市建局的建議內將會用作提供約 950 個「首置」房屋，以回應《施政報告》的政策指引。因此於地盤南面三份之一的部份提供合作社安置房屋並不可行。 ● 合作社業主要求的四項現金津貼，合共約每平方呎 11,140 元，及一個重建後實用面積平均 1,000 平方呎的新單位。假設新樓呎價約為 22,500 元；因此合作社業主實際收到的，包括現金津貼加上物業價值，總計約為每平方呎 33,640 元，此金額尚未計算業主要求擁有新建成停車場的價值。此方案下，業主實際收到的遠遠超出根據市建局現行收購及遷置政策所計算的收購價。

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		● 此外，按照該「原址原大」方案，以提供 462 個實用面積約 1,000 呎的單位計算，粗略估計，總建築樓面面積將超過 500,000 呎，換言之，市建局往後發展的項目將會減少 500,000 呎，可收回的投標地價或銷售價相應會減少，對市建局構成一定程度的財務負擔。 作為公營機構，市建局必須確保資源用得其所，並秉持審慎理財的原則，確保足夠資源履行市區更新的任務，「原址原大」方案已超出此項原則，亦會影響市建局履行市區更新工作的可用資源，故此，市建局不會考慮「原址原大」方案。
519, 555, 568, 659, 774, 856, 859.	● 搬遷費用和過渡期住所租金，應該全部由市建局負責 ● 過渡期租金及搬遷津貼 ● 新居裝修津貼	根據市建局現行政策，除自置居所津貼或補助津貼外，住宅物業的業主亦可獲相關費用津貼，以資助業主因購買替代住宅物業而引致的開支及搬遷的相關費用及因出售會受影響物業予市建局而支付的律師費。實際金額將於個別項目進行收購時作實及公佈。 如住宅物業的業主於出售受影響物業予市建局及購買替代住宅物業時的合理及必須實際開支（即因解除受影響物業轉讓限制的法定押記而須向地政總署

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		繳付的行政費用出售受影響物業予市建局的律師費及購買替代住宅物業的搬遷費、印花稅、地產代理佣金及律師費），多於市建局給予的相關費用津貼，業主可向市建局提出申請發還超出相關費用津貼之開支，惟業主只可就其出售予市建局的每個住宅物業提交一份申請，並必須符合相關資格準則。 根據2018年《施政報告》指示，該計劃須按照市建局沿用的推展項目方式進行，包括市建局沿用的收購、租戶特惠津貼及安置政策，而租金津貼並不符合上述政策。
555, 568, 659, 779, 796.	● 計算樓價估價賠償，應參考原址地段附近不超過七年樓齡樓宇，而不是同區距離較遠樓宇 ● 同區私人市場沒有與合作社單位相等呎數的單位，應以原區安置或相應賠償作參考 ● 賠償計算天井面積	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據2001年3月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。

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		自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 獨立測量師進行評估時，會考慮當時在市場上新近成交的買賣及可資比較的個案，並以上述的指引作出評估（包括交通方便程度、面積大小、樓齡、座向等因素作出調整）。估值日期亦盡量貼近發出收購建議的時間，希望收購價能反映市場的最新情況。 按市建局沿用行之有效的方式，將以公開抽籤方式，委託七間獨立顧問公司評估該假設重置單位的呎價，在去除最高和最低價值後，以五個評估價值的平均數作為該假設單位的呎價。而該假設重置單位的呎價，會在整個項目內劃一採用。

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		根據市建局現行政策，物業的收購價是根據物業的實用面積計算。市建局會委聘顧問公司，以量度該計劃內所有受影響物業的實用面積及附屬面積。實用面積的定義，是根據香港測量師學會於 1999 年 3 月制定的「量度作業守則」及於 2014 年 7 月所發出的「量度作業增補守則」之定義作為標準。在物業內的任何違法構築物 (如有)，不會計算其面積及相應的收購金額。 顧問公司在計算該等業權的面積時，一般會參考於田土廳已登記的文件及圖則 (如轉讓契約, 買賣合約及大廈公契等) ，及屋宇署最後批核的相關建築圖則 (若有) ， 計算業權範圍內擁有的面積。業主必須確保擁有其物業或相關附屬面積的妥善業權。
805, 807-809, 879.	考慮現時高山劇場對面房協地盤或未來樂民新邨重建作原區安置	根據發展局的資料，政府目前的計劃，是房協把位於啟德發展區 1E1 號地盤 (近沐縉街) 部分用作興建專用安置屋邨，以便為受影響的前公務員合作社社員自住業主提供多一項在私人市場以外購置重置單位的選擇，即購買該專用安置屋邨內的資助出售單位作居所。據了解，除此以外並沒有其他公營房屋的選項。

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812.	不應一貫沿用市區重建局條例收購合作社業主之單位，因為不同地區有不同的發展條件，重建後所得利益的差別很大	該計劃是根據《市區重建局條例》公布，將按照市建局沿用的收購及安置政策。市建局現行的物業收購準則是根據 2001 年 3 月立法會財務委員會通過的物業收購政策原用至今，作為計算補償的準則釐定，做法行之有效。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購建議，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。 自置居所津貼的計算，是指被收購單位市值與假設重置單位價值的差額。假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並將假定位於質素與收回樓宇可資比較的假設樓宇內，按收購程序開始時，在特點及交通方便程度方面屬類似地區。假設重置單位位於假設樓宇中層，座向一般和並不享有海景。 獨立測量師進行評估時，會考慮當時在市場上新近成交的買賣及可資比較的個案，並以上述的指引作出評估（包括交通方便程度、面積大小、樓齡、座

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		向等因素作出調整）。估值日期亦盡量貼近發出收購建議的時間，希望收購價能反映市場的最新情況。 按市建局沿用行之有效的方式，將以公開抽籤方式，委託七間獨立顧問公司評估該假設重置單位的呎價，在去除最高和最低價值後，以五個評估價值的平均數作為該假設單位的呎價。而該假設重置單位的呎價，會在整個項目內劃一採用。
856, 859.	位於啟德 1E1 地盤的專用安置屋邨的資助出售單位，等候入住時間大約為多少? 希望房協能提供更優惠的地價及售價給我們，我們亦可以優先選擇任何樓層及方向之單位	根據政府目前的計劃，有關的專用安置屋邨位於啟德 1E1 地盤，由房協興建並負責日後之營運及單位分配。按照初步設計概念，有關單位主要為兩房單位，其餘為三房單位。具體之單位面積、間隔和數目均以日後相關圖則作準，預計有關準則將參考資助出售房屋的規格。 有關資助出售單位的售價將會根據當時適用的居屋定價政策，以評定市值減折扣率。以目前的政策來說，折扣率將會參考房委會當時最新公布的「居者有其屋」計劃的折扣率。

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		專用安置屋邨單位初步預計在2026年左右落成，房協會適時公佈預售計劃。
***Comment Category 1: Acquisition, Tenant's Ex-gratia Allowance and Rehousing Policies**		
813.	Are we going to get back the same size of living area which we are now staying at present address? After redevelopment, we are looking forward to returning to existing location and continue living there.	If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district or at available sites) while the Government will offer an alternative option of the DRE at KTDA in Kowloon City District for those eligible domestic owner-occupiers as additional choices to cash offer. These choices provide an option for the owner-occupiers to rehouse in the same district.
***意見類別二：有關居住環境及對社區網絡 / 社區設施的影響**		
45, 856, 859, 862.	● 樓齡高，樓宇老化，有些單位缺乏保養，石屎剝落和漏水情況嚴重 ● 維修費用龐大，居民難以負擔，只可等待重建 ● 沙中線工程危害大廈結構安全，早日重建免生意外，改善居住環境	透過該計劃的重建，將提供設有現代化設施的樓宇，改善該區的居住環境。
383, 476, 514, 518, 774.	● 重建計劃未有顧及居民意願 ● 滿意目前居住環境、樓宇質素及本區設施 ● 對社區有感情和歸屬感 ● 居民及長者難以適應新環境	如獲得行政長官會同行政會議核准進行該計劃，市建局亦會為受影響及合資格的住宅自住業主提供「樓換樓」選擇 (在其重新發展計劃原址或同區或適當地盤)，作為建議收購金額以外的額外選擇。此外，政府為合資格的合作社單位自住業主作出特別

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		安排，讓其可購買由房協在啟德發展區興建和管理的專用安置屋邨的資助出售單位。上述的安置選擇均讓受影響的自住業主住戶有機會維持在原有的社區網絡。 市建局及社區服務隊會盡量透過向長者提供安置事宜安排上及提供日後要遷往屋邨附近環境的資料，以紓緩長者有關的焦慮。社區服務隊會跟進已遷往新居所的長者個案，亦會舉辦活動協助長者認識社區設施、探訪新社區的社會服務單位及協助轉介至新社區的醫療服務。市建局的「夥伴同行」探訪計劃和社區服務隊將會特別關注獨居和二人住戶的長者，採取積極主動的探訪及提供適時的協助。
***Comment Category 2: Living Environment and Impact on Social Network / Community Facilities**		
34, 42.	The buildings do not have elevators which caused inconvenience for wheelchair users and injuries for visitors.	According to the approved GBP, none of the buildings within the Scheme is served by lift or barrier-free access. Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely home purchase allowance, HPA). As an additional option to cash

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		offer, 'Flat-for-Flat' (FFF) option (in-situ or in the same district or at available sites) will also be offered by the URA for affected eligible owner-occupiers. The cash offer and FFF option allow the owner-occupiers to rehouse in a suitable unit improving their living environment.
***意見類別三：有關市建局項目程序 / 重建方面**		
82.	重建地盤鄰近沙中綫，重建價值好高。但地契十多年後到期，將來重建價值會更高，建議暫時擱置項目	市建局為回應政府在 2018 及 2019 年《施政報告》中的邀請，根據《施政報告》中所列出適合重建合作社樓宇的特點，考慮不同地盤選址的可用剩餘地積比率、所涵蓋的合作社數目，以及鄰近現有公共屋邨等多項因素，選出該計劃作為重建的試點項目之一。 市建局將繼續遵循《施政報告》的指示推行該計劃，透過充分利用合作社地段的發展潛力，增加房屋供應，從而達致更廣泛的社區裨益，惠及更多有需要的市民。
805, 807-809, 879.	長者時日無多，希望項目加速進行	備悉意見。

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C) 一般意見 General Comments (28 comments in total)		
812.	建議先安置後發展的方式重建	根據 2018 年《施政報告》指示，該計劃須按照市建局沿用的推展項目方式進行，包括市建局沿用的收購及安置政策。 市建局在獲得行政長官會同行政會議核准進行該計劃後，將會向受影響業主提出收購其物業，自住住宅物業的收購價為住宅物業市值交吉價，加上一筆特惠津貼 (即自置居所津貼)。另外，市建局亦會為受影響合資格的住宅自住業主提供「樓換樓」選擇（在其重新發展項目原址或同區或適當地盤），作為給住宅自住業主的收購建議金額以外的選擇。此外，政府亦決定將一幅位於啟德的用地給房協興建專用安置屋邨，為合資格的合作社單位自住業主作出特別安排，讓其可購買該專用安置屋邨的資助出售單位。專用安置屋邨單位初步預計在 2026 年左右落成，房協會負責日後之營運及單位分配，以及適時公佈預售計劃。
849, 856, 859.	● 市建局尚未回應及處理第一階段公眾意見而隨即開展第二階段諮詢，諮詢純屬空談，形同虛設，應延長諮詢期讓居民充分理解重建計劃及探討其他可行方案，不要迫遷	在諮詢公眾意見方面，該計劃根據刊憲公告，於 2020 年 5 月 25 日將該計劃的發展計劃草圖，包括第一階段社會影響評估報告呈交予城規會，並於 2020 年 5 月 29 日至 6 月 19 日的三星期時間內收集公眾意見；於 2020 年 7 月 8 日將第二階段社會影響

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C) 一般意見 General Comments (28 comments in total)		
	● 希望政府及市建局可以在 2022 年之前與受影響者磋商補償安排，讓業主清楚瞭解及達成共識	評估報告呈交予城規會，並於 2020 年 7 月 17 日至 7 月 31 日的兩星期時間內收集公眾意見；如城規會認為該草圖適宜公布，須當作是由城規會為施行《城市規劃條例》(第 131 章) 而擬備的草圖，屆時將按《城市規劃條例》第 5 條展示兩個月以供公眾查閱及收集公眾意見。 市建局一直與受重建項目影響的居民及業主保持溝通，舉行居民簡報會，與及和相關立法會議員、區議員及業主會面。另外，市建局會透過「夥伴同行」探訪計劃，主動接觸試點項目內的每個家庭及業戶，詳細解釋項目政策及其他相關資訊。因就合作社的特別情況，市建局也為社員提供特別的協助及處理，而市建局亦於 2021 年 11 月 22 日至 24 日一共舉行了 9 場意見居民會，以了解相關業主及社員對市建局推行 CBS-2:KC 的想法及意見，收集的意見協助市建局進一步了解居民對重建的意願。 市建局已於 2020 年 12 月 30 日向城規會提交對第一階段公眾意見的回應.

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		然而，鑑於在計劃開展後的諮詢期內，市建局收集了不同意見，當中包括大部份與合作社的土地業權相關問題. 市建局與政府政策局及部門商討後，已於 2022 年 10 月 14 日向該計劃的受影響居民發放「有關解散合作社、收購物業及收回土地補償安排的最新資訊」。同時，市建局亦修訂了發展計劃草圖及初步設計，以回應施政報告方向指引， 於計劃內提供約 950 個首置單位，並同時改善設計，以進一步增加建議計劃對地區帶來的規劃裨益。 市建局現連同上述的合作社最新資訊，修訂草圖 (2022 年) 連同這份對第二階段公眾意見的回應提交城規會考慮。
***Comment Category 4: Planning and Design and Impact on Surrounding Environment**		
179.	The streets are symbolic and characteristic with historical meaning to future generations, which could be used for city tours.	The Scheme also aims to fulfill the objectives of the PAs, to increase housing supply by full utilisation of the development potential of the cluster of CBS sites. Thus, part of the Maidstone Road and Kiang Su Street are restructured for planning as part of the project to provide other uses including open space

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		& pedestrianised avenue for public use and GIC facilities. The existing Kiang Su Street and Maidstone Road, including its dead-end, will be restructured and replanned into a pedestrianised avenue / plaza as the existing alignment of the Maidstone Road. Instead of being a traffic carriageway with narrow pavement in the existing situation, it will be converted to a pedestrianized avenue / plaza connected with the shops alongside and become a car-free environment for the enjoyment of the nearby residents.

Part 4 – Responses to Departmental Comments' Tables (Batches 1-8) (No appendices)

After Submission of Original Scheme (May 2020)

Batch 1

(Jul 2020)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Responses to Departmental Comments

Government Department	Comments	Responses
Received via email from TP/K10, DPO/Kowloon dated 2 June 2020		
EMSD	The proposed development is located in the vicinity of two existing LPG storage Installations near Lok Man Sun Chuen Block G and Block I. The project proponent shall conduct a Quantitative Risk Assessment for each of the LPG Storage Installations to ascertain that the risk levels are still acceptable according to Hong Kong planning Standards and guidelines after taking into account the increase in number of persons working (in construction & operation phase) or living due to the proposed development for our consideration.	Noted. Please refer to the Quantitative Risk Assessment including assessments for each of the LPG Storage Installtions.

Batch 2

(Sep 2020)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Responses to Departmental Comments (2nd batch)

Government Department	Comments	Responses
Received via email from TP/K10, DPO/Kowloon dated 4 June 2020		
Commissioner of Police	We have no comment on the proposed development. Nevertheless, we would like to draw your attention to the possible impact on traffic caused to the road network during the construction stage and after the completion stage of the project, like rising demands of parking spaces and loading / loading space, increasing pedestrian and vehicular flow when considering the proposed development.	Noted. The temporary traffic arrangement will be applied during construction stage if required after road gazettal of the road networks to the satisfaction of relevant departments. Adequate ancillary car parking spaces and loading / unloading spaces for the development will be provided together with proposed 140 public car parking spaces, subject to the agreement with TD, for the rising demands of parking spaces and loading / unloading spaces in the district.
Received via email from TP/K10, DPO/Kowloon dated 16 June 2020		
CTP/UD, PlanD (Landscape)	**Open Space Provision** (i) With reference to PR (Part 1) (Table 4.1 – Proposed Development Parameters of the Scheme refers), it is noted that 1,541 flats for URA site and 950 flats for PH site are proposed. However, there is no information regarding the estimated future population. Hence, the adequacy of open space provision to meet the minimum requirements of 1 m^2 per person in accordance with the Chapter 4 of HKPSG could not be ascertained.	As stated in para 4.7 of the Planning Report, the estimated future population is about 6,500 for the whole Scheme. The local open space will be provided to fulfill the minimum requirement of 1m^2 per person in accordance with the HKPSG and is subject to detailed design.
	(ii) With reference to Appendix 1 – Figure 05, "potential open space" is indicated on plan. However, the extent of POS should be demarcated on plan for reference. Besides, since the Scheme involves URA site and PH site, the provision of LOS should be self-contained for the two sites. Clarification should also be provided for other communal / private open space / landscape areas at separate levels.	The design of open space shall subject to further development at the detailed design stage, which the amenity area and square will be connected with the pedestrianized avenue at grade to create synergy. Considering the proposed at-grade pedestrian connections, pedestrianized avenue and potential open spaces shown on Appendix 1 – Figure 05 of the Planning Report together with the possible private open space and landscape areas on podia at both the URA site and PH site, the provision of LOS will be adequate and self-contained for the two sites.

	(iii) The management and maintenance responsibility of the POS should be clarified.	The management and maintenance responsibility of the open space for public use in the URA site will be taken up by the URA or its joint venture partner or its agent.
	Indicative Landscape Proposal (iv) There is no indicative landscape proposal, such as landscape plans, sections and elevations in appropriate scale to illustrate the indicative spatial quality of the proposed open space, the relationship with the buildings and the surrounding, and the hard and soft landscape treatments at various levels, in particular the street level within the Scheme area.	Please note that a conceptual landscape diagram at Appendix 1 – Figure 05 of the Planning Report has shown the landscape initiatives of the Scheme. The landscape proposal, as a whole will be incorporated with the detailed tower and podia design, will be subject to the detailed design stage. Tree planting at appropriate spacing will be incorporated at the pedestrianized avenue to create sun shading and to enhance the amenity value and promote opportunities for place making.
	(v) With reference to Appendix 1 – Figure 05, the Scheme area would cover considerable extent of the public footpaths. There is room to enhance the streetscape greening effect, e.g. along the "Pedestrianised Avenue", Kau Pui Lung Road and Chi Kiang Street etc. Effective landscape treatments (particularly by means of tree planting) on street level for bringing greenery contribution to the public realm should be considered.	Ditto. Landscape treatments and street greening will be considered. Enhancement of the streetscape greening effect will be carried out in the detailed design stage.
CES/UR, LandsD	(a) The Scheme comprises 30 private lots, public road and pavement. The private lots involved 30 Civil Servants' Co-operative Building Society (CBS) Scheme sites.	Noted.
	(b) Should the application be approved by the Town Planning Board, the Urban Renewal Authority (URA) is required to submit land grant application to LandsD for implementation of the private residential/commercial development proposal on the northern part of the Scheme area. There is no guarantee that the maximum GFA and other development parameters will be incorporated in the future land grant conditions. Appropriate lease conditions will be considered at a later stage after the planning approval is granted and after the approval of the land resumption application. If the land grant is approved by LandsD acting in its capacity as the landlord at its absolute discretion, it will be subject to such terms	Noted. Lease terms and land grant conditions will be dealt with in land grant stage. This is a government policy for nominal premium for URA redevelopment under URAO.

	and conditions, including but not limited to payment of premium, as may be imposed.	
	(c) **Development Intensity of the URA site and the proposed Public Housing (PH) site** According to the Report, the northern part of the Scheme area will be developed by the URA and the southern part will be earmarked for public housing development. While a maximum domestic gross floor area (GFA) of 122,263 m^2 and a maximum non-domestic GFA of 12,232 m^2 is stipulated in the proposed Notes to the DSP, the respective maximum domestic GFA and the maximum non-domestic GFA for the URA site and the proposed PH is not stipulated. Also, the respective site boundary of the URA site and the proposed PH site is not shown on the proposed DSP. It is noted that having considered that this is a special case where part of the resumed site will be used for PH development as a pilot CBS redevelopment project, DEVB has agreed to comment on the site demarcation at the stage of LandsD's preparation of land grant document. Also, PlanD will confirm whether the planning parameters in respective parts of the site are in overall consistent with those in the approved DSP.	Noted. The respective maximum domestic GFA and the maximum non-domestic GFA for the URA site and the PH site are stated in the Explanatory Statement of the DSP and the Planning Report. Subject to the approval of the DSP by CE-in-C, the planning parameters in both the URA and PH sites will be reflected and confirmed by PlanD for land grant preparation.
	(d) **Proposed Road Closure of Portion of Maidstone Road, Kiang Su Street and the Rear Lanes behind the Existing Buildings** - TD and HyD are requested to comment on the proposed closure of portion of Maidstone Road and Kiang Su Street and the rear lanes behind the existing buildings. - A section of Maidstone Road in the Scheme area will remain open after redevelopment. The applicant is required to clarify the management and maintenance party of the road concerned.	Noted. TD and HyD's comments are being sought. Road closure and gazettal procedure shall be followed after CE-in-C's approval of the DSP. It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibility of that section of Maidstone Road within the Scheme area (i.e. mainly the cul-de-sac).

	(e) **Provision of Public Car Park (Para. 4.9 and Notes to the draft DSP)**	
	- A Public Car Park is proposed in the basement of the URA site. TD and HyD are requested to comment on the proposed provision of the Public Car Park.	Noted. TD and HyD's comments are being sought.
	- The applicant is required to clarify the management and maintenance party of the Public Car Park.	It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibility of the Public Vehicle Park.
	(f) **Provision of Open Space and Pedestrianised Avenue/Plaza for Public Use (paras 4.16 & 4.26)**	
	- It is noted that not less than 400 m^2 of open space will provided for public use. The applicant is required to clarify which party will take up the management and maintenance responsibility of the proposed Open Space. I must emphasize that the management and maintenance responsibilities of public facilities should not be passed onto the future individual flat owners.	It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibility of the open space for public use and place making to enhance vibrancy and promote usage in addition to amenity function. The detailed arrangements will be dealt with in the DMC.
	- It is proposed that the proposed Open Space and the pedestrianised Avenue/Plaza will be open for public use at "reasonable hours". In the event that it is required to impose such requirement in the proposed land grant, the exact opening hours will be specified in consultation with PlanD to reflect the planning intention.	Noted.
	(g) **Provision of Government/Institution/Community (GIC) Facilities (para 4.26)**	
	It is noted that GIC facilities of not less than 500 m^2 GFA in URA site and about 1,650 m^2 GFA in the PH site will be provided. The applicant is required to advise what GIC facilities will be provided; and their management and maintenance party.	The type of GIC facilities and their management and maintenance parties will be subject to the liaison with SWD and other related departments after CE-in-C's approval of the DSP for subsequent land grant preparation.

DLO/KW, LandsD	(a) It is noted that a section of Maidstone Road within the Scheme Area will remain open after redevelopment. Please clarify whether this section will remain to be a public road managed and maintained by TD and HyD respectively.	After redevelopment, the large portion of the closed Maidstone Road will be pedestrianized and opened for public use at reasonable hours, while the small portion of Maidstone Road in the north with the cul-de-sac will serve for the vehicles to turn around if any car accidentally drives into this section of Maidstone Road and facilitate the pick-up / drop-off activities at the same time. It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibility of both parts of Maidstone Road, subject to the agreement with TD and HyD.
	(b) Whether the existing buildings within the public housing site are to be demolished by URA or the agent to be appointed by THB for implementation of the public housing project shall be agreed among the relevant parties.	Noted.
	(c) There are proposed pedestrian avenue/plaza and open space which will be open for public use at "reasonable hours". In the event that requirement to open such facilities for public use is required to be stipulated in the future land grants, the exact opening hours will be specified in consultation with PlanD.	Noted.
FSD	Please be advice that I have specific comment on the draft DSP subject to fire service installations and water supplies for firefighting being provided to the satisfaction of this Department. EVA arrangement shall comply with Section 6, Part D of the Code of practice for Fire Safety in Buildings 2011 administered by Buildings Department. Detailed fire safety requirements will be formulated upon receipt of formal submission of general building plans.	Noted and will be addressed in the GBP stage.
Received via email from TP/K10, DPO/Kowloon dated 26 June 2020		
SWD	In view of acute welfare demand, we would like to reiterate there is a dire need to provide welfare facilities in the area to cater for the ongoing welfare services needs, both territory-wide and at the district level. Please keep us abreast of the progress of the proposed development and advise us the area available for welfare facilities once confirmed. SWD will take into account factors such as the location, area, nearby environment, the supply and demand for services in the local	The need of welfare facilities provision in the area is noted and a total of 2,150 sq.m. of GIC facilities will be provided within the Scheme to meet the needs. Should TPB accepts the proposal and subject to the approval of the DSP by CE-in-C, the URA will liaise with SWD to

	community, etc. and explore the feasibility of provision of welfare facilities to cater for the ongoing welfare service needs, both territory-wide and at the district level. Sufficient lead time should be allowed for discussion about designing the layout plans, commenting on the rough indication cost, seeking funding for construction cost, etc.	confirm the proposed welfare facilities as the 2,150 sq.m. of GIC facilities.
	We have also indicated our comments on paras. 7.3 and 7.4 on P. 21 of the Social Impact Assessment Report in the attachment.	Noted.
Received via email from TP/K10, DPO/Kowloon dated 29 June 2020		
BD	2. I have the following comments under the Buildings Ordinance (BO) on the proposed DSP: (a) Under Section 31(1) of the BO, no building or other structure should be erected in, over, under or upon any portion of streets and lanes. Under Building (Planning) Regulation [B(P)R] 23(2)(a), areas of streets and lanes should not be included in site areas for the purpose of plot ratio (PR) and site coverage (SC) calculations. Applications for amalgamation of lots separating by existing streets and lanes for joint development, extinguishment and building over/under existing streets and lanes, and inclusion of any existing streets and lanes in site areas for PR and SC calculations have to be considered at the plan approval stage. (b) Government, institute or community facilities are gross floor area accountable under B(P)R 23(3)(a). (c) All proposed building works should comply with the BO.	(a) Noted. For replanning and restructuring of the Scheme area, the existing road and lane will be closed to provide a more pedestrian-friendly environment as reflected by the proposed pedestrian connections. Meanwhile, for increasing housing supply as stated in the 2018 Policy Address, the existing road and lane will be included for the purpose of plot ratio and site coverage calculations in the Scheme area. The road closure shall be subject to separate gazettal procedure after CE-in-C's approval of the DSP and the closed portion will be included in land grant preparation. (b) Noted. (c) Noted.
	3. The Planning Report has only included basic information and development parameters and it is noted that the scheme is subject to further refinement when its details are firmed up. Hence detail comments on the development potential of the proposal under the BO can only be formulated at the plan approval stage under the building regime.	Noted. The detailed design shall be submitted in the GBP stage.

	4. Buildings upon any land vested in the Housing Authority or over which the Housing Authority has control and management are exempted from the provisions of the BO under section 41(1)(aa) of the BO.	Noted.
Received via email from TP/K10, DPO/Kowloon dated 30 June 2020		
WSD	a) Unit demand of service trade is used to estimate fresh water demand of the trades serving the relevant residential population. The unit demand per head refers to the population served.	Noted, the unit demand for service trades is amended to be based on residential population. Please refer to the revised Table 2a&2b of **Appendix C** of the revised WSIA.
	b) Please provide more details on the club facilities to be developed to justify the use of service trade to estimate the demand.	The clubhouse will include recreational activities. As per WSD's comment, the unit demand for service trades is amended to be based on residential population. Please refer to the revised Table 2a&2b of **Appendix C** of the revised WSIA.
	c) Unit demand of salt water of 70 l/head/day is applicable to residential population only.	Noted, the saltwater unit demand for service trade has been removed. Please refer to the revised Table 2a&2b of **Appendix C** of the revised WSIA.
	d) Please justify the adoption of unit demand of 300 l/head/day. The development appears similar to home ownership scheme.	Noted, the freshwater unit demand of 0.23m^3/h/d is used for the Public Housing Site. The daily demands have been adjusted accordingly. Please refer to the revised Table 2b of **Appendix C** of the revised WSIA.
	e) The change in demand due to this development is concerned. Please assess the existing demand for comparison.	Based on assessment results, the demands from the Subject Site account for a small fraction of the capacity of the reservoirs and therefore, can be accommodated from the existing supply facilities. **Section 2.4.2** and **Section 3.1.2** of the WSIA has been revised accordingly.
	f) Several existing watermains of size varying from DN40 to DN150 fall within the development site. The cost of any diversion of the existing watermains should be borne by the developer.	The cost of any diversion of the existing watermains within the DSP boundary should be borne by the developer. **Section 2.4.4** of the WSIA has been revised accordingly.
Received via email from TP/K10, DPO/Kowloon dated 30 July 2020		
PlanD on planning report	**General** 1. Please confirm if the following is correct: URA has included the adjoining pavements along north-south	Please note that in the draft DSP, area coloured orange zoned "R(A)" is GFA accountable, while area coloured white but

	direction of Kau Pui Lung Road and portion of Maidstone Road (i.e. nos. 59-63 (odd nos.)) and along east-west direction of Chi Kiang Street and portion of Kiang Su Street (i.e. nos. 1-3 (odd nos.)) within the boundary of the DSP as part of the affected buildings overhang the pavement, but it will not be included in the site area for PR calculation.	within the DSP boundary is shown as 'Road' which is not included for GFA calculation.
	Public Vehicle Park (PVP) 2. Please confirm if the following is correct: URA proposed that the PVP is to be under the management and maintenance of URA or its joint venture partner or its assigned agent.	Please note that the statement is correct. It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibility of the PVP.
	The pedestrianized avenue/plaza 3. Para. 4.15 of Planning Report – "The pedestrianized avenue/plaza will be opened for public use at reasonable hours", why is it not for 24 hours?	The pedestrianized avenue/plaza will be opened for public use at reasonable hours to avoid disturbance to the residents late at night.
	4. Regarding "not less than 400m^2 open space in the URA site", is it inside the pedestrianized avenue/plaza? What is the open space area in the PH site?	The extent of open space in the URA site will be located with connections to the pedestrianized avenue/plaza, in additional to the area allocated for the pedestrianized avenue/plaza. Adequate local open space will be provided within the PH site. With the confirmation of relevant government department(s), there will be no public open space in the PH site, whereas the PH site will provide 1,650 sq.m. of GIC facilities as planning gain to the area.
	5. In Para. 4.16 of the Planning Report, it says "The pedestrianized avenue/plaza will form part of the development and will be maintained and managed by URA or its assignee for place making". However, in para. 7.8 of the ES, it says "The pedestrianized avenue/plaza within the URA site will form part of the development and will be maintained and managed by URA or its assignee for place making. The PH site will be developed under the same design concept and managed by the agent assigned by	Please note that the statement is correct. The pedestrianised avenue/plaza within URA site will be maintained and managed by the URA or its assignee, while the PH site will be developed under the same design concept and managed by the agent assigned by THB.

	Transport and Housing Bureau (THB)". Please confirm if the latter is correct.	
	Underground shopping street (USS) 6. Please provide information on the management and opening hours of the proposed USS.	The proposed USS which is part of the non-domestic use will be under the management and maintenance of the URA or its joint venture partner or its assigned agent. It will be opened for public use during the opening hours of the non-domestic portion or such other reasonable hours to be agreed by in the DMC considering the security and management issue.
	7. Please provide a preliminary breakdown of the non-domestic GFA to be provided in the USS and above-ground.	A breakdown of the non-domestic GFA of the proposed USS and above-ground is yet to be developed and subject to the detailed design stage. According to Appendix 1 – Figure 02 of the Planning Report, a total of 2-storey retail use will be provided on the ground floor and the basement floor.

Batch 3

(Oct 2020)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Responses to Departmental Comments (3rd batch)

Government Department	Comments	Responses
Received via email from TP/K10, DPO/Kowloon dated 30 July 2020		
EPD	**Comments on Appendix 6 – Sewerage Impact Assessment Report (Ref. R6775_v1.1)** 1. Appendix B: - (i) Table 2 - In consideration of the proposed sewer re-arrangement, hydraulic capacity calculations for manhole nos. FMH4024244 and FMH4024245 are suggested to be included; (ii) Table 3-1, 3-4 and 3-5 - Please provide a breakdown for the estimation of residential units within each catchment area; (iii) Table 4 - The table is incomplete, please check.	 (i) The hydraulic capacity calculations for manhole nos. FMH4024244 and FMH4024245 have been supplemented in Table 2 of **Appendix B** of the revised SIA as attached in Annex 1. Sewer upgrading work (between manhole nos. FMH4024244 and FMH4024245) is proposed and please refer to **Section 2.6** of the revised SIA for details. (ii) Please refer to Table 5 of **Appendix B** of the revised SIA (Annex 1) for the breakdown for the estimation of residential units within each catchment area. (iii) Table 4 of **Appendix B** of the revised SIA (Annex 1) has been revised accordingly.
	2. Please provide calculation spreadsheet (in Excel) in the resubmission.	Noted. Softcopy of the Excel file will be sent to EPD through a separate email.
	3. The implementation of sewerage works shall meet the satisfaction of DSD.	Noted. DSD's views have also been sought.

Received via email from TP/K10, DPO/Kowloon dated 2 September 2020		
DSD	DIA: 1. Para 2.3.2, the proposed manhole is at higher level of the concerned building. The proposal is technical infeasible. Subject to the proposal, upgrading of drainage from SMH4028813 to SMH4028821 may also be needed.	It is proposed to reverse the drainage direction in the rear access alleyway, from, say, the connection manhole from the City 151 building (SMH4028830, IL +12.46mPD), so the drains would run northwards to Lok Shan Road, with a new connection drain to SMH4028820 (675mm diameter pipe; IL +10.61mPD). Please refer to **Para. 2.3.2** of the revised DIA as attached in Annex 2 for details.
	2. Para 2.3.4, the proposed upgrade is suggested to be 750mm dia. instead of 675mm dia.	Noted. **Para. 2.3.4** and **Appendix D** of the revised DIA (Annex 2) have been revised accordingly.
	3. There are reported flooding at Ma Tau Wai Road in extreme adverse weather. One of the possible reason is the surface runoff from Lok Man Sun CHUEN and its uphill could not be effectively connected to the drainage system. The proposed development is suggested to consider flood storage facility or alike flood mitigating measures to help ease the concern.	Please note the DIA has demonstrated that the proposed development will not change the runoff from the Site. If there are existing deficiencies in the regional drainage system, eg. around Lok Man Sun Chuen and uphill areas, it would be more appropriate to address these problems as part of a larger strategic drainage master planning process, rather than in a piecemeal fashion, relying on individual developments and involving complex design processes and long-term maintenance liabilities.
	SIA: 1. Para 2.5.4, the conclusion of nil upgrading to existing sewerage is not supported. DSD maintenance experience noted that the existing sewers at Chi Kiang Street of 450-600mm dia. is running at their full capacity. The applicant is required to review and propose upgrading to the concerned sewers up to FMH4025767 at Sung On Street.	The concerned sewers up to FMH4025767 at Sung On Street have been reviewed. The 3 existing sewer segments (manhole no. FMH4024258 - FMH4025856) along Chi Kiang Street are proposed to be upgraded from 600mm dia. to 750mm dia. The capacity of the existing sewers along Chi Kiang Street of 450-600mm dia. is not more than 65%, upgrading work is therefore not required. Please refer to Table 4 of **Appendix B** of the revised SIA as attached in Annex 1.
	2. Para 2.6.2, the proposed manhole is at higher level of the concerned building. The proposal is technical infeasible.	According to the drainage record in GeoInfo Map, the invert level of manhole no. FMH4024244 is missing. The exact level is subject to site verification during detailed design stage.

		Nevertheless, sewer upgrading work (between manhole nos. FMH4024244 and FMH4024245) is proposed and please refer to **Section 2.6** and Table 2 of **Appendix B** of the revised SIA (Annex 1) for details.
Received via email from TP/K10, DPO/Kowloon dated 3 September 2020		
HyD	The project proponent shall take all necessary precaution to protect existing public carriageway / footway / highway structures / street furniture / underground utilities and surface channel from any damage which may arise out of the execution of or as a consequence of the development scheme. The project proponent shall be responsible for the reinstatement of any damaged items maintained by this Office and responsible for all compensation arising therefrom.	Noted.

Further Responses to Departmental Comments received on 6 October 2020

Government Department	Comments	Responses
Received via email from ATP/K10, DPO/Kowloon dated 6 October 2020		
SWD	According to the above R-to-C table, we are given to understand that URA agrees to reserve a total of 2150 square metres for incorporating welfare facilities. I should be grateful if you could (i) advise us whether this is referring to NOFA or GFA; and (ii) confirm the mix of welfare facilities to be incorporated at the subject site for our early planning, please. In view of acute welfare demand, I should be grateful if you would bring to the attention of relevant parties (including URA) about our dire need	The need of welfare facilities provision in the area is noted. Please note that a total of 2,150 sq.m. GFA will be reserved to provide appropriate GIC facilities within the Scheme to meet the community needs. The types of GIC facilities will be subject to liaison with relevant Government departments, including SWD, and with HKHA/HS, after CE-in-C's approval of the DSP for subsequent land grant preparation. The Kowloon City District Council will be consulted as required.

	to set up welfare facilities and advise us the feasibility of incorporating more welfare facilities for detailed assessment. SWD will take into account factors such as the location, area, nearby environment, the supply and demand for services in the local community, etc. and explore the feasibility of provision of welfare facilities to cater for the ongoing welfare service needs, both territory-wide and at the district level. Please also ensure that the proposed welfare facilities will be included in the District Council consultation paper to facilitate us in seeking funding for meeting the construction costs of the welfare facilities therein to tie-in with the development schedule of the proposed development. Sufficient lead time should be allowed for discussion about designing the layout plans, commenting on the rough indication cost, seeking funding for construction cost, etc.	
CTP/UD, PlanD (Landscape)	(i) Since the respective estimated future population for the URA site (1,541 flats) and PH site (950 flats) is not provided in this submission, the adequacy of open space provision to meet the minimum requirements of 1 m^2 per person in accordance with the Chapter 4 of HKPSG hence could not be ascertained.	Upon approval of the DSP by CE-in-C, detailed design of the proposed development will be carried out and the open space provision as required under the HKPSG (ie. 1sqm/person) will be provided. Details will be provided in detailed design stage.
	(ii) According to the RTC, noting that only the diagrammatic conceptual drawings showing the disposition of building blocks as provided in the Planning Report (May 2020) are available at this stage and the landscape design will be developed in the detailed design stage. In view that no additional or supplementary landscape related information and drawing is provided in this submission, hence our previous comments (i.e. Item 4 (ii), (iv) and (v) via memo dated 15.6.2020 refers) should still be valid.	Noted. Due to the notional design stage, only a conceptual landscape diagram is provided. Upon approval of the DSP by CE-in-C, detailed design of the proposed development will be carried out and more detailed plans will be provided in subsequent detailed design stage.

Batch 4

(Dec 2020)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Responses to Departmental Comments (4th batch)

Annual growth rate was changed from previous TIA of +0.80% to revised TIA of **+1.0%** as a conservative approach, which was reference to TD's request to other TIAs for vicinity developments.

Government Department	Comments	Responses
Received via email from TP/K10, DPO/Kowloon dated 6 July 2020 and 20 August 2020		
TD	1. All proposed modifications to public roads should comply with the requirements stipulated in the Transport Planning and Design Manual (TPDM).	Noted. All proposed modifications to public roads would comply with the requirements stipulated in TPDM.
	2. Please include the planned major transport infrastructure, the planned and committed developments in your assessment.	The planned major transport infrastructure, the planned and committed developments listed below have been included in the previous and revised TIA's: - Kai Tak Development - Central Kowloon Route - URA Project No. KC-008(A), KC-009, KC-010, KC-011 & DL-8, KC-012 & KC-013, KC-014 - 13 Hok Yuen Street The latest 2016-based TPEDM planning data have been used in the revised TIA.
	3. Swept path analysis should be conducted at difficult and abrupt alignments and location of turnings.	As per TD's request at planning submission stage, please refer to **Figures SP1** and **SP2** (Annex 1) for the swept path analysis of car park accesses and cul-de-sac for reference.
	4. Please provide the traffic impact assessment for construction stage as well. Please show clearly on a plan that the haul routes of all construction traffic generated / attracted by various construction	Please note that the traffic impact assessment during construction stage and other details will be provided under Cap 370 under the Roads (Works, Use and Compensation) Ordinance. The details

Government Department	Comments	Responses
	works and carry out assessments on the critical junctions along the routes.	of traffic arrangement and impacts are subject to the future Temporary Traffic Management proposals.
	5. The effect from the commissioning of the MTR Shatin-Central Link on the road network in the vicinity of the proposed development, especially the pedestrian and loading/unloading needs, should be included.	The MTR Shatin-Central Link's (SCL) associated projected pedestrian flows have already been reflected in the previous and revised traffic model and forecast. The 2 MTR entrances / exits of To Kwa Wan Station are located adjacent to the site and direct underground passageways are provided between B/F of the proposed development and the concourse of the MTR Station, subject to further co-ordination work with MTRC upon approval of the layout. Pedestrians to and from the proposed development would use these passageways to the MTR Station or to across Ma Tau Wai Road without the need to use the ground level pedestrian facilities and hence will improve the existing pedestrian network.
	6. Please add an additional paragraph or figures describing the access arrangement for pedestrians to and from the development.	The pedestrian routings are shown in **Figures RC 1** and **RC 2** as attached in Annex 1. The figures shown that the pedestrian could conveniently travel between the bus stops / GMB stops / MTR Station and the proposed development.
	7. Assessment on the learner drivers in the study area should be carried out.	As per TD's request at planning submission stage, please refer to **Figure RC 3** (Annex 1) for the proposed learner drivers' exam / learning route. As part of Maidstone Road and Kiang Su Street would be closed permanently, one of the existing learner drivers' exam / learning route will be affected. It is proposed to use Kau Pui Lung Road, Ko Shan Road, Kiang Hsi Street, Ma Tau Wai Road and back to Kau Pui Lung Road. Learner drivers are only allowed to drive on the public road during specified period which are off-peak hours: Mondays to Fridays- 6:00a.m. to 7:30 a.m.

Government Department	Comments	Responses
		9:30 a.m. to 4:30 p.m. 7:30 p.m. to 11:30 p.m. Saturdays- 6:00 a.m. to 7:30 a.m. 9:30 a.m. to 11:30 p.m. Sundays and Public Holidays- 6:00 a.m. to 11:30 p.m. The learner drivers' activities will be during off-peak hours, hence it is considered that the learners' activities in the vicinity will have minimal impacts to the overall traffic condition.
	8. Please carry out Road Safety Audit for the Project in accordance with the requirements stipulated in the Transport Planning and Design Manual unless otherwise agreed by the Director's Representative.	Noted. Road Safety Audit for the Project will be carried out in accordance with the requirements of TPDM if required, unless otherwise agreed by the Director's Representative, after approval of the Project but before implementation.
	9. Assessment on the adequacy of pedestrian facilities, including footpaths and at-grade/grade-separated road crossings within 500m from the proposed development, should be conducted.	As mentioned in the revised TIA as attached in Annex 2, 70% of pedestrians will be using mechanized trips for their journeys. Public transport stops and 2 MTR entrances / exits are located near the site and there will be underground passageways directly connected to the 2 MTR entrances /exits at B/F. Thus the studied sections are considered reasonable and acceptable to capture the anticipated increase in pedestrian flow generated by the proposed development.
	10. In general, if values of performance indicators of existing roads or junctions, i.e. volume to capacity ratio (v/c), Design Flow to Capacity ratio (DFC) and Reserve Capacity (RC), are forecast to be > 0.85, > 0.85 and < 15% respectively, then the project proponent has to undertake a TIA, to evaluate traffic impact, and most importantly to identify and carry out appropriate mitigation measures so identified with a view to restoring the v/c, DFC and RC of the affected roads or junctions to <= 0.85, <= 0.85 and >= 15% respectively as far as practicable.	The operation performance of junctions DFC and RC are <=0.85 and >=15% are listed below and as contained in the report submitted taken into consideration of the improvement measures taken:

Government Department	Comments	Responses

Ref.	Junction	Year 2033 DFC/RC					
		Reference Scenario (w/o Proposed Development)		Design Scenario (w Proposed Development)		Design Scenario (w the Proposed Development, w Proposed Improvement)	
		AM Peak	PM Peak	AM Peak	PM Peak	AM Peak	PM Peak
A	Tin Kwong Road / Sheung Shing Street	+7%	+38%	+6%	+37%	+34%	+71%
B	Tin Kwong Road / Kau Pui Lung Road	+12%	+15%	+5%	+9%	-	-
C	Ma Tau Wai Road / Tin Kwong Road / Ma Hang Chung Road	-4%	+11%	-7%	+8%	+16%	+35%

Improvement schemes at Junctions A and C as shown in **Figures 4.7** and **4.8** of the revised TIA (Annex 2) have been proposed and their RC will be >+15% after the improvement.

For Junction B, due to limited space, it is difficult to implement junction improvement works. Nevertheless, this junction will still have a positive RC in future years which is considered to be acceptable in the urban district.

<table>
<tr><th>Government Department</th><th>Comments</th><th>Responses</th></tr>
<tr><td></td><td></td><td>It is noted the detailed traffic arrangement of Tin Kwong Road and Farm Road is being reviewed by TD and MTRC due to the construction of SCL.</td></tr>
<tr><td></td><td><u>Specific Comments</u>

11. Please review the annual traffic growth rate adopted in paragraph 4.2.6 and the estimated traffic trips of the proposed development in Table 4.3. The developments, population and employment in this District until year 2033 should be considered. For the forecast trip rate of the proposed development, it should include all components including retails, GIC, management office and PVP in the development. Please review.</td><td>A more conservative approach taken reference to TD's request to other TIAs for vicinity developments is adopted. The <u>+1.0%</u> annual growth rate adopted in the revised TIA (Annex 2) is already the higher projection as compared with other growth rates as stated below, hence it is the more conservative approach and would cover any unexpected additional traffic growth.

The growth rate of +0.8% taken reference in the report is derived based on the latest 2016-based TPEDM data published by Planning Development.

2016-based TPEDM Population and Employment Planning Data
<table>
<tr><th colspan="5">Kowloon City District</th></tr>
<tr><th rowspan="2">Data</th><th colspan="3">Year</th><th rowspan="2">Average Annual Growth Rate</th></tr>
<tr><th>2016</th><th>2021</th><th>2026</th></tr>
<tr><td>Population</td><td>425,250</td><td>439,950</td><td>456,150</td><td>+0.70%</td></tr>
<tr><td>Employment</td><td>219,050</td><td>227,900</td><td>241,350</td><td>+0.97%</td></tr>
<tr><td>Total</td><td>644,300</td><td>667,850</td><td>697,500</td><td>+0.80%</td></tr>
</table>
Besides, reference has been made to the "Projection of Population Distribution 2019-2028" published by Working Group on Population Distribution Projection (WGPD) of Planning Department.</td></tr>
</table>

<table>
<tr><th>Government Department</th><th>Comments</th><th>Responses</th></tr>
<tr><td></td><td></td><td>
2018-based Projected Population by District Council District
<table>
<tr><th>District Council District / Broad Area</th><th>2026</th><th>2027</th><th>2028</th><th>Annual Growth Rate</th></tr>
<tr><td>Kowloon City</td><td>452,400</td><td>460,900</td><td>457,100</td><td>+0.52%</td></tr>
</table>
It is revealed that the growth rate is lower than that found by TPDEM.

Reference has also been made to “Hong Kong Population Projections 2020-2069” published by The Census and Statistics Department for the total population in Hong Kong.

Hong Kong Population Projections 2020-2069
<table>
<tr><th>Population</th><th>2024</th><th>2029</th><th>2034</th><th>Annual Growth Rate</th></tr>
<tr><td>Hong Kong</td><td>7,738,300</td><td>7,893,500</td><td>8,024,00</td><td>+0.36%</td></tr>
</table>
It is revealed that the growth rate is lower than that found by TPDEM.
</td></tr>
<tr><td></td><td>12. Please provide an estimate on the visitors or residents that would use the footpaths in the vicinity of the development. Please also review if capacity and forms of crossing facilities and LOS of the existing footpaths are capable to cater for the additional pedestrians as stated in Tables 5.2 and 5.4.</td><td>The estimated pedestrian trips by the proposed development have been included in Table 5.6 of the revised TIA (Annex 2). Tables 5.8 and 5.9 have summarized the pedestrian assessment due to the proposed development and all the footpaths and crossings have ample capacity to cater for the proposed development.</td></tr>
<tr><td></td><td>13. In Fig no. 2.2, please also indicate the pedestrian routes to major public transport access points.</td><td>The pedestrian routes to major public transport access points are indicated in Figures RC 1 and RC 2 (Annex 1) for reference.</td></tr>
<tr><td></td><td>14. In Figure nos. 2.1 and 2.2, please advise if there will be separation for the car park between URA site, PH site and PVP. If there will be no separation for the car park, please elaborate on the necessity on</td><td>Only two vehicular accesses to carpark are proposed. Separate carpark entrances will be provided for URA site and the PH site. The PVP is proposed to share with URA site. For reference, some</td></tr>
</table>

Government Department	Comments	Responses
	provision of three vehicular accesses for the development.	developments share the same access for both PVP and private car park through smart card management approach, eg. Alto Residences (TKOTL95) in Tseung Kwan O. Therefore, two vehicular accesses are considered adequate for this development.
	15. Please advise if there will be any traffic queue on the public road due to wait for the public vehicle car park. Please add a paragraph in TIA to describe the situation.	Detailed arrangement of car park will be provided at detailed design and GBP submission stages. Sufficient queue space would be allowed at detailed design stage for vehicle waiting to avoid queueing to public road.
	16. It is noted from paragraph 2.3.2 that existing carriageway of Kiang Su Street between the proposed development and Ma Tau Wai Road would be converted to pedestrian footpath. Please provide future arrangement details for the road section.	The details are indicated in **Figure RC 4** (Annex 1) for easy understanding: 1. Westbound of Kiang Su Street between the proposed development and Ma Tau Wai Road has already been converted from carriageway to footpath by MTRC due to construction of MTR entrance / exit. The remaining carriageway was converted from two-way to one-way traffic. 2. Due to the proposed development, the section of Maidstone Road and Kiang Su Street will be closed and formed as part of the Site. This causes the remaining section of Kiang Su Street to be blocked and a dead end will be formed. 3. Thus, it is proposed to convert this remaining section from carriageway to footpath. Details will be carried out in the later land grant / road gazettal stage under Cap 370 under the Roads (Works, Use and Compensation) Ordinance.
	17. In paragraph 2.5.2, the future management and maintenance responsibilities of the proposed cul-de-sac and the road section between Lok Shan Road and the proposed cul-de-sac, and whether it will be open to the public round-the-clock, should be clarified.	The proposed cul-de-sac within the boundary will be managed and maintained by the URA or its JV partner and it will be opened 24 hours to the public.

Government Department	Comments	Responses
	Besides, preliminary design of the cul-de-sac should be provided to demonstrate that enough spaces will be provided for performing loading/unloading, and at the same time, for U-turning of vehicles.	As the cul-de-sac is provided for short time pick-up / drop-off only, no long time parking / waiting will be permitted. Detailed design will be provided under Cap 370 under the Roads (Works, Use and Compensation) Ordinance.
	18. It is also noted that back alleys will be formed or maintained between the proposed development and the existing buildings. Please advise the future management and maintenance responsibilities of these back alleys and whether there will be improvement to the same.	The back alleys are located outside the site boundary, hence the URA will not manage and maintain them. The alleys are Government land and serve as MOE for the adjoining old buildings. The URA may consider improving built environment under a separate urban renewal initiative, after the approval of the Scheme and the agreement of stakeholders including relevant Government departments.
	19. There is a section of one-way carriageway at Chi Kiang Street between Ko Shan Road and Ma Tau Wai Road. Please review if any road improvement measures could be carried out to further enhance the accessibility of the proposed development.	The existing arrangement is considered acceptable, hence no improvement measures are required.
	<u>Provision of Parking Spaces, Loading and Unloading Spaces</u> 20. In Table 2.2, the parking provision for the PH site should be provided according to the latest parking provision in subsidized housing. Please review Table 2.2.	Please note that the parking provision under the prevailing HKPSG is already adopted for the PH site as shown in **Table 2.2** of the revised TIA (Annex 2). It is noted that there will be new proposed parking standards in the HKPSG which are yet to be promulgated. URA will further review and liaise with THB to adopt the latest parking provision as far as practicable for the subject PH site in accordance to the new parking standards then.
	21. In additional to the proposed ancillary parking facilities as listed in Table 2.2, parking facilities for the community use (500m^2 in URA site), GIC use (1650m^2 in PH site) and the Estate Management Office	As the requirement of car parking space for these proposed uses are low, the numbers mentioned in **Table 2.2** of the revised TIA (Annex 2) have already catered for them (i.e. 1 no. for community

Government Department	Comments	Responses
	($250m^2$ in PH site) should also be proposed and provided.	use in URA site and 2 nos. for GIC and Estate Management Office in PH site).
	22. The number of parking spaces to be provided in the public vehicle park (PVP) should take into account both the number of metered parking spaces to be deleted and the number of illegally parked vehicles in the vicinity of the PVP within 500m from the PVP. In view of the high parking demand, the Applicant should assess the local parking demand and review whether more parking spaces could be provided. Besides, parking spaces for commercial vehicles, such as coaches and good vehicles, should also be provided.	There will be approx. 100 affected existing car parking spaces. The proposed nos. of public car parking spaces will increase from 100 to 140, which is 40% higher than the existing provision. This has catered for the illegally car parking found in the vicinity. No commercial vehicles parking spaces are affected by the proposed development, thus no parking spaces for commercial vehicles will be provided.
	23. The future management and maintenance responsibilities of the PVP should be clarified.	It is proposed that the URA or its joint venture partner or its agent as the party for the management and maintenance responsibilities of the PVP.
	24. Please clarify whether the PVP will have its own vehicular access. Besides, the location of the PVP, whether it will be placed in URA site or PH site should also be clarified.	Please refer to the response to comment no. 14. Detailed arrangement of the car park, the exact location of the PVP, etc. will be elaborated at the detailed design and GBP submission stages.
	25. URA or its partner(s) should be responsible for the management, operation and maintenance of the PVP;	Please refer to the response to comment no. 23.
	26. Parking Vacancy Information System should be provided for the PVP;	Noted. The application of the Parking Vacancy Information System will be studied in the detailed design stage after approval of the Project.
	27. To create an enjoyable walking environment, you are encouraged to provide building canopies, including over public footpath(s) and/or right-of-way(s) in accordance with Chapter 8 of the Hong Kong Planning Standards and Guidelines provides for the provision of	The provision of building canopies over public footpath(s) and/or right-of-way(s) will be considered to enhance the pedestrian environment and subject to the detailed design stage.

Government Department	Comments	Responses
	building canopies (ie. Para. 5.6.11) and for the subject of pedestrian planning be included in development studies and planning applications (para. 5.9.2).	

Batch 5

(Mar 2021)

URA Kau Pui Lung Road / Chi Kiang Street (CBS-2:KC): Response to Departmental Comments (5th batch)

Responses to Departmental Comments

Departmental Comments	Responses
1. Urban Design and Landscape, Planning Department (UD&L, PlanD) – from air ventilation perspective	
Comments received via email from TP/K10, DPO/Kowloon dated 26 June 2020	
1. **Building heights of the existing developments** (section 1.2, Table 2.2 and Figure 1) – The consultant should clearly annotate the name of the existing developments and its building heights on plan.	The building heights of the existing developments have been provided in Table 2.2 in the original submission. As requested, **Section 1.2** and **Table 2.2** have been revised and **Figure 12** was added to show the names and building heights of the existing developments in the vicinity of the subject site. Please refer to the revised AVA in **Annex 1**.
2. **Noise barriers, elevated structures, planned and committed developments** (section 1.3) – The consultant should clarify whether all major noise barriers, elevated structures, committed developments have been modelled. For complete information, the consultant should provide the layout plan of those planned and committed developments and indicate those noise barriers and elevated structures being modelled in the simulation.	It is confirmed that all major noise barriers, elevated structures, committed developments have been modelled. As requested, please refer to **Appendix 6** in the revised AVA (**Annex 1**) for the layout plan of those planned and committed developments.
3. **Baseline Scheme** (section 1.4 and Appendix 1) – While the consultant has claimed that the Baseline Scheme has complied with all development parameters for the subject site stipulated on the OZP as well as SBD Guidelines, it is found that a portion of the proposed developments have encroached onto part of the existing roads (i.e. Maidstone and Kiang Siu Street). Thus, the Baseline Scheme does not comply with the requirement of the current OZP. The consultant should revise the Baseline Scheme accordingly. To avoid abortive work, the consultant should submit the revised Baseline Scheme to DPO for their agreement before redo the simulation.	A revised Baseline Scheme as agreed with DPO and complies with the requirement of the current OZP, with a smaller net site area and less GFA, has been adopted in the revised AVA (**Annex 1**) for assessment and comparison of the Proposed Scheme.

URA Kau Pui Lung Road / Chi Kiang Street (CBS-2:KC): Response to Departmental Comments (5th batch)

Responses to Departmental Comments

Departmental Comments	Responses
4. **Proposed Scheme** (section 1.5 and Figure 11) – Rather than describing every building separations in the proposal, the consultant should identify effective air ventilation mitigation measures which have been incorporated by the Proposed Scheme. Taking the 13m-wide building separation between T2 and T3 as an example, such building separation was fully blocked by the podium under T5 and may not benefit the pedestrian wind environment at the immediate downstream. Otherwise, the consultant should clearly state the level of such building separation.	As requested, please refer to revised **Section 1.5** and **Figure 11** with marked effective air ventilation mitigation measures in the revised AVA (**Annex 1**).
5. **Building height of the proposal** (paragraph 1.6.1) – The consultant should report the building height of each building tower under both Baseline and Proposed Schemes.	As requested, the building height of each building tower under both Baseline Scheme and Proposed Scheme have been indicated on the MLPs in **Appendixes 1** and **2** in the revised AVA (**Annex 1**).
6. **Effective width of the proposed North-South building separation** (paragraph 1.6.2) – The consultant should report the effective width of the proposed North-South building separation under both Baseline and Proposed Schemes.	Similar to Point (4), the effective width of the proposed North-South building separation under both Baseline Scheme and Proposed Scheme has been included in **paragraph 1.6.2** in the revised AVA (**Annex 1**).
7. **Total number of test points** (section 3.4) – The total number of test points does not tally with the summation of all perimeter, overall and special test points.	There is a typo, please refer to revised **Section 3.4** in the revised AVA (**Annex 1**) for the total number of test points.
8. **Test point** locations (Table 4.1 and Figure 7) • Referring to Figure 7, it is found that location of some test points (e.g. T05, T88 and T89, etc.) have overlapped with the existing developments and will affect the VR value. The consultant should make sure that all test points have been properly placed without creating the errors.	It is confirmed that all test points are correct. Some test points which have overlapped with the existing buildings, have been placed properly. Please refer to revised **Table 4.1** and **Figure 7** in the revised AVA (**Annex 1**).

Responses to Departmental Comments

Departmental Comments	Responses
• The consultant should provide a larger figure for showing the test point location with its ID clearly. • In view of the comments above, we would reserve our comments on this section pending on further revisions from the consultant.	
9. **Topography** (Appendix 3) – Referring to the figures shown in Appendix 3, we could not ascertain whether the topography has been modelled in the CFD simulation appropriately. The consultant should provide more information to illustrate the modelling of the actual topography. Otherwise, the accuracy of the simulation results would be affected.	As requested, more information is provided. Please refer to **Appendix 3** (i.e. model view) in the revised AVA (**Annex 1**) which has been updated based on the new simulation.
10. **Simulation results and directional analysis** (section 4) – Based on the provided information, we are not able to ascertain accuracy of the computational models and the actual topography modelled in the simulations. Thus, we would reserve our comment on the discussion of simulation results at this juncture.	As requested, more information is provided. Please refer to revised **Section 4** in the revised AVA (**Annex 1**) for the latest result of the simulation.
11. **Conclusion** (Section 5) – In view of the above, the consultant should update and revise the conclusion accordingly.	The conclusion has been updated accordingly. Please refer to revised **Section 5** in the revised AVA (**Annex 1**).
2. Urban Design and Landscape, Planning Department (UD&L, PlanD) – from urban design and visual aspects perspective	
Comments received via email from TP/K10, DPO/Kowloon dated 2 July 2020	
1. The proposal is to integrate substantial parts of the street blocks bounded by Ma Tau Wai Road, Lok Shan Road, Kau Pui Lung Road and Chi Kiang Street currently zoned "Residential (Group	Noted.

Responses to Departmental Comments

Departmental Comments	Responses
A)" ("R(A)") with a building height restriction (BHR) of 120mPD, and parts of Maidstone Road and Kiang Su Street currently shown as 'Road' on the OZP into a land parcel (the subject site) with a net site area of about 15,475m^2. The subject site is proposed to be rezoned to "R(A)" with a BHR of 140mPD and maximum domestic and non-domestic GFA of 122,263m^2 and 12,232m^2 respectively (i.e. maximum domestic and non-domestic Plot Ratio (PR) of about 7.9 and 0.79 respectively, and a total PR of about 8.69). The proposal is to accommodate the proposed composite development, which is divided into two portions by Kiang Su Street with the northern larger portion for URA private composite development and southern smaller portion for public housing (PH) development. It is noted that the high maximum domestic PR of 7.9 is because of the proposed domestic PR of about 8.69 for the PH development.	
2. According to the notional scheme, the northern URA composite development comprises of five tower blocks atop four separate podiums connected by elevated pedestrian links, and the southern PH development comprises of two bulkier tower blocks atop a podium which is connected to another podium by elevated pedestrian links. All car parking provisions are provided underground. The parts of Maidstone Road and Kiang Su Street integrated into the proposed development would generally be pedestrianised and retained as uncovered open areas. Potential open spaces are located along the interface between the URA site and PH site.	Noted.

Responses to Departmental Comments

Departmental Comments	Responses
3. The proposed development is directly adjacent to two entrances of the planned MTR Shatin-to-Central Link (SCL) To Kwa Wan Station at Lok Shan Road and Kiang Su Street respectively. According to the current submission, there would be an underground pedestrian passageway within the URA site providing connections to the two entrances.	Noted.
Urban Design 4. The subject site is located within a cluster of residential developments to the west of Ma Tau Wai Road zoned "R(A)" with BHRs ranging from 120mPD to 140mPD. On the other side of Ma Tau Wai Road, there is another cluster of residential developments sandwiched between Ma Tau Wai Road to the west and To Kwa Wan Road to the southeast zoned "R(A)" with BHR of 120mPD. While the proposal would generally be compatible with the prevailing character of the area and the proposed BHR of 140mPD for the site may not be incompatible with the surrounding intended height profile, the proposal may weaken the intended stepped height profile descending towards the waterfront.	Noted. Although the subject site is located within Ma Tau Kok OZP, its visual context should be viewed across Ma Tau Kok OZP and the adjoining Hung Hom OZP. The stepped height profile descending towards the waterfront is not weakened. The Scheme is sandwiched between "R(A)" zones with BHR of 140mPD to the west and with BHR of 120mPD to the east and with BHR of 100mPD to the further east across To Kwa Wan Road near Sung On Street. Thus, the proposed BHR of 140mPD can be regarded as the extension of the existing "R(A)" zone with BHR of 140mPD and the stepped height profile continues with the "R(A)" zones with BHR of 120mPD and 100mPD to the east.
5. The proposed pedestrianised avenue/plaza along existing Maidstone Road and Kiang Su Street as shown in the notional scheme would generally respect the existing street grid pattern and could help maintaining air and visual permeability currently offered by the streets, as well as potentially providing more ground floor spaces for pedestrian use. Regarding this design proposal, we have the following suggestions: (a) For ease of reference, please provide the aboveground site coverage (SC) of the notional scheme in the Supplementary	(a) The aboveground site coverage of the current notional design of the proposed development is about 65% based on the Net Site Area.

Responses to Departmental Comments

Departmental Comments	Responses
Planning Report (SPR).	Given the design is subject to change at detailed design stage and GBP will be submitted for departmental approval, the exact site coverage under B(P)R for domestic / non-domestic is yet to be ascertained.
(b) Apart from indicating in the proposed explanatory statement (ES) that the pedestrianised avenue/plaza will connect Lok Shan Road at the north and Chi Kiang Street at the south, please consider also indicating that the avenue/plaza will connect Kiang Su Street at the east and Kau Pui Lung Road at the west.	(b) It is confirmed that the pedestrianised avenue/plaza will also connect Ma Tau Wai Road at the east and Kau Pui Lung Road at the west. It is proposed to revise paragraph 7.7 of the ES as follow: *"To remove the existing dead-end condition for a better pedestrian environment, portion of Maidstone Road and Kiang Su Street has been included as part of the Area for the creation of a car-free environment, as a pedestrianised avenue / plaza is being provided within the Area. The pedestrianised avenue / plaza will connect* ***Lok Shan Road at the north, Ma Tau Wai Road at the east, Chi Kiang Street at the south and Kau Pui Lung Road at the west****. It will also link to the two future entrances of the MTR Shatin-to-Central Link (SCL) To Kwa Wan Station at Lok Shan Road and Kiang Su Street."*
(c) To ensure implementation of this design proposal, please consider indicating the requirement of pedestrianised avenue/plaza and open space for the PH site in the proposed ES as well.	(c) The THB has committed to follow the design intention and same design concept of the pedestrianised avenue/plaza and adequate local open space will be provided within the PH site. As shown on Appendix 1 – Figure 05 of the Planning Report, the pedestrianised avenue will be connected for both the URA site and PH site. To allow design flexibility, the requirement and areas of pedestrianised avenue/plaza and open space for the PH site will not be stated in the proposed ES of the DSP as it is subject to detailed design.

Responses to Departmental Comments

Departmental Comments	Responses
(d) According to the proposed ES, the pedestrianised avenue/plaza would be accessible to the public at reasonable hours only. Given that the existing Maidstone Road and Kiang Su Street are opened for public use 24 hours daily, please consider whether there is scope to open the pedestrianised avenue/plaza for public use 24 hours daily.	(d) The pedestrianised avenue/plaza will be opened for public use at reasonable hours to avoid disturbance to the residents late at night.
(e) Please consider indicating the opening hour of the underground pedestrian passageway with retail in the proposed ES.	(e) URA has no objection to indicate the opening hour of the underground pedestrian passageway with retail in the proposed ES of the DSP. It is proposed to revise paragraph 7.9 of the ES as follow: *"The pedestrianized avenue / plaza will also integrate with an underground pedestrian passageway with retail**, which will be opened for public use during the opening hours of the non-domestic portion or such other reasonable hours to be agreed by in the DMC considering the security and management issues,** within URA site to connect to the two future entrances of the MTR SCL To Kwa Wan Station at Lok Shan Road and Kiang Su Street. The re-planned pedestrian network will enhance connectivity, walkability and provide a car-free environment."*
(f) It would be helpful if the location of the underground shopping street could be indicated on the notional scheme plan.	(f) To maintain the design flexibility, the location of the underground shopping street will be confirmed in the detailed design stage.
6. It may be relevant for the applicant to provide some discussions on how the proposal would respect and respond to the characters of the existing built environment at the subject site and its surroundings, e.g. the existing building's overhang above the pavement providing shade and protection from rain, etc.	Subject to the approval from relevant government departments, the amenity features under a separate urban renewal initiative will be considered to enhance comfort of the pedestrian environment within the Scheme and its surroundings at detailed design stage to improve walkability and to keep street vibrancy.

Responses to Departmental Comments

Departmental Comments	Responses
Baseline Scheme for VA and AVA	
7. It is noted that the baseline scheme for the subject site adopted in the VA and AVA in the current submission is not an OZP-compliant scheme. As per your email dated 26.6.2020, it is noted that you have requested URA to prepare baseline scheme that complies with the OZP requirements. We agree that OZP-compliant scheme should be adopted as the baseline scheme for the purpose of VA and AVA in support of the current proposal. The applicant should review the VA and AVA as well as the relevant discussions in other parts of the current submission. Our comments from an air ventilation perspective conveyed to you via email dated 26.6.2020 shall remain valid.	Noted. A revised Baseline Scheme as agreed with DPO and complies with the requirement of the current OZP, with a smaller net site area and less GFA, has been adopted in the revised AVA and Visual Impact Assessment (VIA) for assessment and comparison of the Proposed Scheme. Please refer to the revised AVA in **Annex 1** and VIA in **Annex 2** respectively.
8. For ease of reference, the applicant may wish to provide the assumptions adopted in the baseline scheme for the subject site, including the site area, PR, SC, total GFA, BH, etc.	As requested, please refer to the revised AVA in **Annex 1** and VIA in **Annex 2** respectively for the assumptions adopted in the Baseline Scheme with comparison to the Proposed Scheme.
VA	
9. Given our comments at para. 8 above, we are not able to provide detailed comments on the VA at this juncture.	Please see response to Point (8) above.
10. It is noted that the VA prepared in support of the proposal has not strictly followed the methodology set out in TPB-PG No. 41. The applicant should be reminded that in general a visual impact assessment in support of a proposal for TPB consideration would have to be prepared in accordance with the TPB-PG NO. 41, in which it should outline the positive and negative visual resources/elements in the vicinity, assess the sensitivity of the potential viewers at the identified viewpoints (VP), appraise the	The submitted VA basically demonstrated the visual impact of the development to its surrounding areas. As requested, the VIA has been prepared and attached in **Annex 2** of the RtoC taking into the requirements of the TPB-PG No. 41.

Responses to Departmental Comments

Departmental Comments	Responses
visual changes experienced at the VPs (which is four-fold, viz. visual composition, visual obstruction, effect on public viewers and effect on visual resources), and hence the significance of visual impact experienced at the VPs brought about by the proposal could be determined.	
3. Planning Department (PlanD)	
Comments received via email from STP/K2, DPO/Kowloon dated 23 March 2021	
I refer to your submission on 30.12.2020 with the response to the 1st-round public comments for the subject DSP, and the departmental comments/further comments conveyed to you by our Ms. Jenny NGAN on 18.1.2021, 5.2.2021, 18.2.2021 and 25.2.2021 from TD and DSD. Please advise for our information the latest progress on the project, including an estimate on the submissions of further responses to public/departmental comments.	During the 2 stages of public consultations in June and July 2020, there were more than 1,200 comments, of which around 70% were objection. Under the impact of the Covid-19 pandemic in 2020 since the commencement and coupling with the complexity and diversity of the public comments, the process of responses took longer time. Furthermore, some comments were associated with different prevailing policies under jurisdiction of different Bureaux / Departments, the URA needs to consolidate and coordinate to address the comments (e.g. CSB on housing benefit of CBS members, DEVB/ HKHS on Dedicated Rehousing Estate (DRE) provision, and LandsD on land premium issue, etc). Additionally, as this is a pilot CBS project under the Chief Executive's Policy Address, it possesses a different ownership characteristics and rehousing needs. The URA targeted to complete an opinion survey providing further information to prepare the responses by Q3 2021. After that, the URA would explore further with relevant parties a suitable timeframe to proceed with the submission of the draft DSP for TPB's consideration.

Batch 6

(Jun 2021)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
1. Environmental Protection Department (EPD)	
Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 30 July 2020	
Air Quality Model 1. For cumulative assessment, major point sources (of the concerned pollutants identified in the study area) within 4km from project boundary (i.e., emissions from the cruises at Ocean Terminal and Kai Tak Terminal, HK & China Gas (To Kwa Wan), and Diamond Hill Crematorium), if can cause direct impact at the concerned ASRs, should be modelled explicitly by dispersion model to account for the sub-grid scale spatial variation in background concentrations induced by them; and	Please note that the layout of the Proposed Scheme has been reviewed and revised which is able to meet both vehicular and industrial buffer distance. Hence, quantitative air quality impact assessment is not required and the whole **Section 2** of the EA report has been updated. Please refer to the revised EA report as attached in **Annex 1** of the R to C. Besides, the comments on the quantitative air quality impact assessment are no longer required.
2. Please add appropriate headings to the results table in Appendix 2.6 to avoid confusion.	Please refer to our responses of item no. 1 above.
Comments on Appendix 3 – Environmental Assessment Report (Ref.R6859 v1.0) **Air Quality** 1. Table 2.2: The table is displayed incompletely. Please revise the page and update the table to include 2019 air quality monitoring station data.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
2. Section 2.4.3: Please indicate the representative air sensitive receivers on a plan.	As requested, the representative air sensitive receivers listed in **Table 2.2** have been indicated on **Figure 2.2** (see revised EA report as attached in **Annex 1** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
3. Section 2.4.6: Please add the following as recommended dust mitigation measures: (i) the area at which demolition work takes place should be sprayed with water or a dust suppression chemical immediately prior to, during and immediately after the demolition activities; and (ii) site hoarding of not less than 2.4 m high from ground level should be provided.	As requested, the recommended dust mitigation measures have been supplemented in **Section 2.5.4** (see revised EA report as attached in **Annex 1** of the R to C).
4. Section 2.5.5: While it is noted that "*No chimney was identified within 500m from the Subject Site… "*, please be reminded that it should be the responsibility of the URA and their consultants to ensure the validity of the chimney data. The URA and their consultants should confirm that the chimney emission data to be used in their assessment have been validated and updated by their own survey. If there are any errors subsequently found in their chimney data used, the assessment results may be invalidated.	Noted.
5. Section 2.5.6: In general, to avoid the double counting of vehicular emissions in Tier 2 and Tier 3 assessments which leads to over-estimation of air pollutant concentrations, please consider readjusting PATH model. For details, please refer to Section 3.3 of the EPD's Guidelines on Assessing the 'TOTAL' Air Quality Impacts (https://www.epd.gov.hk/epd/english/environmentinhk/air/guide_ref/guide_aqa_model_g2.html).	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.

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6. Section 2.5.8: Please note that the latest version of EMFAC-HK model, v.4.2 is available for use. Please adopt the latest version of EMFAC-HK model. For details, please refer to the following doclinks: (i) EMFAC-HK Vehicle Emission Calculation http://www.epd.gov.hk/epd/english/environmentinhk/air/guide_ref/emfac-hk.html (ii) General Notice for Adoption of the latest version of 'PATH' or 'EMFAC' for air quality assessment of projects https://www.epd.gov.hk/eia/eia/english/docupload/path&emfac.pdf	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
7. Sections 2.5.12, 2.5.24, 2.5.30 & Appendix 2.1: Please provide and use the traffic speed and traffic flow data of each road rather than speed fraction, to give true emission impact at the ASRs. Please note that roads with same speed limit should have different speed patterns. Assuming only one speed pattern for all concerned roads would lead to inaccurate prediction of vehicular emissions (over- or under-estimation) at individual roadside ASR. If distinct traffic patterns among the roads concerned are observed, please conduct estimation of vehicular emission factors on an individual road basis.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
8. Section 2.5.14: Please be reminded to provide the TD's endorsement on traffic data when available.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
9. Section 2.5.15: The captioned development is not a road project.	The quantitative air quality impact assessment is no longer required.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

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The description is irrelevant to the case. Please revise.	Please refer to our responses of item no. 1 under "Air Quality Model" section above.
10. Sections 2.5.22, 2.5.23 & 2.5.29 & Appendix 2.3: To represent the worst case scenario, please adopt the lowest set of temperature and relative humidity among the 8760-hour combinations. Please refer to the attached reference (Attachment 1) for the recommended approach on handling of temperature and humidity in the vehicular emission calculations. Attachment 1 – Guideline_Use of Temperature and Relative Humidity Data in EMFAC Calculation.pdf	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
11. Section 2.5.27: Trips and vehicle kilometres travelled (VKT) adopted do not match with the default value of Trip and VKT in the EMFAC model. Please rectify.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
12. Section 2.5.31: (i) It is noted that "only 8 out of 16 vehicle classes would have starting emission." As for EMFAC-HK v4.1 & the latest version v4.2, apart from petrol and LPG vehicles, start emissions for diesel vehicles fitted with selective catalytic reduction (SCR) should be included. Please clarify the starting emission factors used in the AQIA. (ii) It is noted that the starting emission is calculated by assuming all trips happen at the rural & local road by which the starting emission on the roads will be overestimated. The URA and their consultants are advised to adopt project-specific number of trips for each road from traffic survey or traffic forecast in	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.

Departmental Comments	Responses
the calculation of starting emission. The consultants should identify parking site for buses and heavy goods vehicles, and determine the diurnal pattern of the number of trips and soaking time for starting emission at the parking site based on site surveys. Please refer to the attached reference (Attachment 2) for the recommended approach for the calculation of starting emissions. Attachment 2 – Calculation of Start Emission in Air Quality Impact Assessment.pdf	
13. Section 2.5.35 & Appendix 2.3: Please update the estimation of % VMT for local and rural roads with HK by referencing the 2018 Traffic Census Data. Furthermore, the estimation result is 13% as shown in Appendix 2.3 but it is stated as 12% in S.2.5.35. Please revise.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
14. Appendix 2.6: The tables are displayed incompletely. Please revise the page.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
15. Please provide the template namely "Information for EMFAC submission (EmfacMode)" for EMFAC checking.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.
16. The Air Quality modelling files are being reviewed and our comments will be provided separately when available.	The quantitative air quality impact assessment is no longer required. Please refer to our responses of item no. 1 under "Air Quality Model" section above.

Departmental Comments	Responses
Waste Management	
17. Section 5.1.1: Please clarify whether waste arising from the construction works of the Project have been considered. If affirmative, please revise the 2nd statement as appropriate.	It is to clarify that the waste arising from the construction and demolition works of the Project have been considered. **Section 5.1.1** has been revised accordingly (see revised EA report as attached in **Annex 1** of the R to C).
18. Section 5.2: Please review whether there are other guidelines/ circulars/legislation relevant to the assessment (e.g. Cap 132BK, Project Administration Handbook for Civil Engineering Works).	Noted. **Section 5.2** has been revised to supplement the guidelines/ circulars/legislation (see revised EA report as attached in **Annex 1** of the R to C).
19. Section 5.3:	
(i) Please check to ensure the estimated quantities, handling arrangements and the terms used for the respective waste streams are consistent with Table 5.1 and within the Section.	The whole **Section 5.3** has been revised accordingly. It is confirmed that the estimated quantities, handling arrangements and the terms used for the respective waste streams are consistent with **Table 5.1** and within the Section (see revised EA report as attached in **Annex 1** of the R to C).
(ii) Repeated and irrelevant information should be deleted to avoid confusion. Please check.	Noted. The repeated and irrelevant information in both **Sections 5.3** and **5.4** have been removed (see revised EA report as attached in **Annex 1** of the R to C).
(iii) Please state clearly whether the control measures proposed in Section 5.4 would be adopted for the waste management issues identified.	The control measures proposed in **Section 5.4** will be adopted for the waste management issues identified. **Section 5.4** has been revised accordingly (see revised EA report as attached in **Annex 1** of the R to C).
(iv) Section 5.3.9: According to ETWB TC(W) 19/2005, Waste Management Plan (WMP) becomes part of Environmental Management Plan (EMP) to be submitted to Architect/	The whole **Section 5.3** has been revised accordingly. The previous section regarding the Waste Management Plan has been removed (see revised EA report as attached in **Annex 1** of the R to C).

Departmental Comments	Responses
Engineer for approval before construction works. Please revise the text as appropriate. (v) Section 5.3.10: Please revise the term "licensed waste collectors" as "waste collectors".	Please refer to **Section 5.3.4** for the revised term (see revised EA report as attached in **Annex 1** of the R to C).
20. Section 5.4.6: Please elaborate the relevant measures to be adopted from the "Recommended Pollution Control Clauses for Construction Contract".	As requested, more information is provided. Please refer to the revised **Section 5.4.6** for the examples of the relevant measures (see revised EA report as attached in **Annex 1** of the R to C).
21. Section 6: Please include waste assessment in the conclusion.	As requested, the conclusion of the waste assessment has been supplemented in **Section 6.1.5** (see revised EA report as attached in **Annex 1** of the R to C).
Land Contamination 22. There is no coverage on land contamination assessment in the submission. The URA and their consultants should confirm with documentary justifications to substantiate whether there is any potential land contamination issue arising from the past and present land use activities in the Project site according to the prevailing guidelines. Land contamination assessment and remediation (if any) should be completed prior to development in the Project site.	Noted. Upon DSP approval, URA will review the land contamination issues with reference to the prevailing guidelines on land contamination assessment at detailed design / land granted to URA if required. A detailed land contamination assessment and remediation shall be conducted prior to the construction of the Proposed Scheme to ascertain any land contamination issues, if considered necessary.
Asbestos 23. Please remind the URA to observe the relevant requirements under the Air Pollution Control Ordinance and Waste Disposal Ordinance for asbestos control prior to demolition of the existing buildings.	Noted.

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Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 August 2020	
Noise General Comment: 1. According to this NIA, full compliance with the traffic noise planning standard of 70dB(A) cannot be achieved. With compliance rate of 88% (max 75dB(A)) under the base case, and compliance rate of 91% (max 74dB(A)) under the mitigated scenario, it appears that the consultant has not yet exhausted all practicable noise mitigation designs/measures to reduce the traffic noise impact. For example, measures including further setback, alternative building form, different incident angle to the roads, construction of barrier / canopy with projection beyond the site boundary and use of acoustic windows, should be explored to further abate the noise impact.	Please note that the layout of the Proposed Scheme has been reviewed and revised in order to meet both vehicular and industrial buffer distance for the air quality impact assessment. Also, the latest traffic forecast data for Year 2045 provided by the traffic consultant and endorsed from Transport Department has been adopted. Hence, the Noise Impact Assessment (NIA) in the EA report has been updated accordingly. Please refer to the revised **Section 3** for details (see revised EA report as attached in **Annex 1** of the R to C). As stated in the revised NIA, a base case scenario demonstrated that the noise compliance is now up to 86%. Given the design constraints as stated in **Section 3.10**, the current notional design has exhaustively explored all possible noise mitigation measures to minimize the traffic noise impact to the proposed development. Under the mitigated scenario as proposed in the NIA, mitigated measures including the use of acoustic balcony, acoustic windows (top-hung type) and acoustic fins were adopted to mitigate the noise. Based on the latest result, the compliance rate is now increased to 94% (max 74dB(A)) under the mitigated scenario. Given the current notional design is at planning stage and subject to CE in C approval, detailed design will be carried out after approval to design the building and at-source mitigation. Detailed mitigation measures such as baffle type acoustic windows, whether any combination of window pane separation, windows height, window

Departmental Comments	Responses
	opening and windows overlapping, etc. would be explored in the subsequent detailed design stage to optimize an acceptable noise compliance rate as far as practicable.
Detailed Comments: 2. Figures 3.1 & 3.2: Please ensure the information presented in these figures are consistent with the model. For example, the length of fin at N5-21 is not consistent with that in the noise model: TNIA_AM_atgrade_others.	There are typos. **Figures 3.1** and **3.2** and the noise model have been revised accordingly (see revised EA report as attached in **Annex 1** of the R to C).
3. Appendix 3.1: TD's endorsement on the traffic forecast for Year 2045 should be provided.	Noted. TD's endorsement on the traffic forecast data for Year 2045 is provided in **Appendix 3.1** (see revised EA report as attached in **Annex 1** of the R to C).
4. Appendix 3.2: In the title of the final mitigated scenario for both Urban Renewal Authority Site and Public Housing Site, please check if "Acoustic Window" should be removed as it was not considered in the assessment.	It is confirmed that acoustic window (top-hung type) has been considered as a proposed mitigation measure in the assessment. **Appendix 3.2** has been revised accordingly (see revised EA report as attached in **Annex 1** of the R to C).
5. Figure 4.3: The legend concerning the ASRs of B & C appears to be incorrect. Please rectify.	**Figure 4.3** has been revised accordingly (see revised EA report as attached in **Annex 1** of the R to C).
6. Appendix 4.3 - Sound Power Measurement Calculation Sheet for A04: Please clarify why Averaged $L'_{pA(ST)}$ is the same as the Averaged $L_{pA(BG)}$ for A04 (VRV).	It is to clarify that the data shown in **Appendix 4.3** was presented in 1 decimal place, which appear the same. In fact, we use more decimal place for calculation, which the noise level of Averaged $L'_{pA(ST)}$ is 63.13dB(A) and Averaged $L_{pA(BG)}$ is 63.10dB(A) respectively for A04 (VRV).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 13 November 2020	
Annex 1 – Sewerage Impact Assessment Report (Ref. R6775_v1.2) 1. Section 2.3 – (a) The Consultant is suggested to include the unit flow factor (UFF) for Wholesale & Retail and UFF for industrial flow (Central Kowloon). (b) Please clarify if catchment inflow factor has been adopted in hydraulic analysis.	Noted. The unit flow factor for Wholesale & Retail and industrial flow (Central Kowloon) have been adopted and added in **Section 2.3**. Please refer to the revised SIA report as attached in **Annex 2** of the R to C. It is to clarify that the catchment inflow factor has been adopted in hydraulic analysis. As the site is within Central Kowloon, the catchment inflow factor is 1. This statement has been added into **Section 2.3.8** (see revised SIA report as attached in **Annex 2** of the R to C).
2. Sections 2.5.4 and 2.6.3: Please state which party / parties will be responsible for the proposed sewer upgrading works between FMH4024258 and FMH4025856, and FMH4024244 to FMH4024245. In view that the said sewers will be under capacity in the scenario of accommodating sewage generated from the proposed development, the project proponent should implement the proposed mitigation measures to eliminate the surcharged condition prior to the sewer connection works from the proposed development to public sewerage. The Consultant is also advised to seek comment and agreement from DSD, the maintenance authority of local sewers, on this matter.	URA or its joint venture partner(s) or its assignee will be responsible for the necessary upgrades prior to the sewer connection works from the proposed development to public sewerage. URA may explore different options for the necessary upgrades due to the redevelopment. For clarity sake, relevant sections in the SIA report have been revised. Please refer to **Sections 2.5.4** and **2.6.3** in the revised SIA report (see **Annex 2** of the R to C). Please refer to DSD comments in Section 2 on page 13 of this table.
3. Section 2.6.2: It is noted that new sewer pipes would be proposed for the adjacent buildings. In case temporary sewer diversion is required during the re-arrangement period, please demonstrate the effectiveness of the sewer diversion.	Please note that a new arrangement of new sewer pipes for the adjacent buildings (Morning Joy Building, City 151 and 80 Maidstone Road) has been proposed, as compared to previous submissions. Please refer

Departmental Comments	Responses
	to updated **Section 2.6**, **Figure 4** and **Appendix C** for details (see revised SIA report as attached in **Annex 2** of the R to C). The procedures for the sewer diversion for the adjacent buildings are proposed as follows:- 1. Construct 5 new sewer segments (A4-A6, A6-A7, A7-A8, A8-A9, A9-S2) at Kau Pui Lung Road and test for successful connection before next step. 2. Construct 2 new sewer segments (A3-A4, A5-A4) and test for successful connection before next step. 3. Once the sewerage discharge from Morning Joy Building and 80 Maidstone Road via sewer segments A1-S2 is satisfied, the existing sewer segments A3-A5 (FMH4023925 to FMH4023926) will be abandoned. 4. Similarly, once the sewerage discharge from City 151 via sewer segments A5-S2 is satisfied, the existing sewer segments at the downstream of A5 (FMH4023926) will be abandoned.
4. Section 2.6.3: It is noted the exact dimension and alignment of the proposed sewer, especially for FMH4024244 to FMH4024245 would be determined in the detailed design stage. Please be reminded that if the proposed alignment would be modified such that the proposed sewerage design will no longer tally with the proposed sewerage in the SIA, review and / or update of the SIA may be required.	Please refer to our responses of item no. 3 above and please note that segments Sa-Sb (FMH4024244 - FMH4024245) will not be discussed in the revised SIA report. This comment is no longer required. Nevertheless, the exact dimension and alignment of the proposed new sewer pipes will be reviewed in the detailed design stage. If the proposed alignment would be modified, update of the SIA will be conducted accordingly.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
5. Appendix B –	
(a) Table 1: Please advise if there would be any swimming pools in the proposed clubhouse for the URA site.	There is no swimming pool provided in the proposed clubhouse for the URA site under current assumption. In case there is any amendment on the design parameters during the detailed design stage, a revised SIA will be submitted to reflect the changes.
(b) Table 2: Please review the roughness coefficient adopted for Segment Sa-Sb (FMH4024244 - FMH4024245).	Please refer to our responses of item no. 3 above and please note that segments Sa-Sb (FMH4024244 - FMH4024245) will not be discussed in the revised SIA report. This comment is no longer required.
(c) Table 2: For those manholes with unknown or doubtful invert level (e.g. FMH4024257), manhole survey may be required to determine the actual invert levels and pipe capacity. Please agree with DSD on the result of manhole survey.	Noted. Manhole survey, if required, will be conducted during the detailed design stage.
(d) Table 3-2: Please adopt a more conservative UFF for teachers and staff of C.C.C WanChai Church Kei To Primary School.	As requested, a more conservative UFF of J11 has been adopted for teachers and staff of C.C.C WanChai Church Kei To Primary School. **Table 3-2** of **Appendix B** has been revised accordingly (see revised SIA report as attached in **Annex 2** of the R to C).
(e) Table 3-6: The Consultant is suggested to provide the source of reference for the assumed area for existing industrial buildings, and the assumed no. of employees for Ko Shan Theatre.	The source of reference for the assumed area for existing industrial buildings and Ko Shan Theatre has been supplemented in **Table 6** of **Appendix B** (see revised SIA report as attached in **Annex 2** of the R to C).
(f) Table 5: Based on the best available information, some buildings (e.g. planned use for 3 San Lau Street, 3 Shansi Street, Lung Teck Mansion and 75 Ma Tau Wai Road) in the concerned sewerage catchment F were omitted. Please check and revise the assessment as necessary.	Noted and **Table 5** of **Appendix B** has been revised accordingly (see revised SIA report as attached in **Annex 2** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

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Departmental Comments	Responses
6. The Consultant is suggested to provide softcopy of the report (in pdf) and calculation spreadsheet (in Excel) as well as all Response to Comments as appendix. Please also highlight the revised / updated content of the SIA report in next submission to facilitate review.	Noted and shall be provided accordingly.
7. The sewerage works shall be implemented to the satisfaction of DSD. The Consultant should seek DSD's view on the SIA.	Noted.
2. Drainage Services Department (DSD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 22 April 2021	
On SIA: 1. The SIA for the subject planning application needs to meet the full satisfaction of Environmental Protection Department (EPD) as the planning authority of sewerage infrastructure.	Noted.
2. Section 2.5.4 and 2.6.3 - Please clarify if the proposed sewerage works are to be implemented by the applicant.	URA or its joint venture partner(s) or its assignee will be responsible for the necessary upgrades prior to the sewer connection works from the proposed development to public sewerage. URA may explore different options for the necessary upgrades due to the redevelopment. For clarity sake, relevant sections in the SIA report have been revised. Please refer to **Sections 2.5.4** and **2.6.3** in the revised SIA report (see **Annex 2** of the R to C).
3. Section 2.5.3 - Please state the material for the proposed sewer pipes.	The material for the proposed sewer pipes is slimed clayware. **Sections 2.5.4** and **2.6.3** have been revised accordingly (see revised SIA report as attached in **Annex 2** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (6th batch)

Departmental Comments	Responses
4. Table 2 & 2a - Please review the roughness coefficient for segment Sa-Sb based on the calculated flow velocity, which could be referenced to the criteria stated in Table 5 of Sewerage Manual Part 1.	Please note that a new arrangement of new sewer pipes for the adjacent buildings (Morning Joy Building, City 151 and 80 Maidstone Road) has been proposed, as compared to previous submissions. Segments Sa-Sb (FMH4024244 - FMH4024245) will not be discussed in the revised SIA report and therefore, this comment is no longer required. Please refer to updated **Section 2.6**, **Figure 4** and **Appendix C** for details (see revised SIA report as attached in **Annex 2** of the R to C).
5. The SIA did not mention about their impact to the existing sewage discharge from 141-151 Kau Pui Lung Road and 80 Maidstone Road. As these premises could not discharge after URA abandonment of the existing sewerage at the downstream of FMH4023924, URA need to demonstrate the feasibility of the URA-implement sewerage diversion works in this SIA instead of in detail design stage.	Please refer to our responses of item no. 4 above.

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URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
1. Highways Department (HyD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 26 November 2020	
We have no adverse comment from highway maintenance point of view provided that: 1. All the proposed road works would be carried out by the project proponent. 2. Please ensure the safety of road users in the vicinity of the works area during the course of the works. 3. Extreme care should be taken to prevent damage to the existing highway structures, pavements and highway facilities other than those affected by the proposed road works. Any damage to the existing highway structures, pavements and highway facilities other than those affected by the proposed road works shall be made good in compliance with Highways Standards by the project proponent at his own costs and to our satisfaction. 4. The Director of Highways and/or his officers, his contractors, servants, agents, workmen or any persons so authorized by him with or without tools, equipment, machinery or maintenance vehicles and subject to reasonable notice and supervision, shall from time to time be permitted free access to the area for inspection, maintenance and repairing of the concerned highway structures, pavements and highway facilities. The project proponent shall not be entitled to claim for any damages or compensation or payments in this respect.	Noted.

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Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
2. Social Welfare Department (SWD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 26 November 2020	
According to the submission, we are given to understand that *"a total of 2 150 square meters in GFA will be reserved to provide appropriate GIC facilities within the Scheme to meet the community needs. The types of GIC facilities will be subject to liaison with relevant Government departments, including SWD, and with HKHA/HS, after CE-in-C's approval of the DSP for subsequent land grant preparation. The Kowloon City District Council will be consulted as required"*. We also observed that the "community facilities" will be provided as part of the residential blocks according to the schematic plans. We consider it optimal if the mix of welfare facilities could be confirmed as early as possible. Please confirm whether our proposed social welfare facilities could all be incorporated in the subject development before your submission of DSP, please. Please also ensure the disposition of welfare facilities could be complied with the relevant licensing requirements, e.g. no part of the SCCC shall be situated at a height of more than 24 metres above ground level, when planning the disposition of welfare facilities. In view of acute welfare demand, I should be grateful if you would bring to the attention of relevant parties (including URA) about our dire need to set up welfare facilities at other development sites in the vicinity of the subject site. Alternatively, in case there is a change in the scheme of the subject development, e.g. more area will be available for incorporating welfare facilities, etc., we would like to explore the feasibility of incorporating more welfare facilities. SWD will take into account factors such as the location, area, nearby environment, the	Please note that not less than 500 sq.m. GFA will be reserved for GIC uses within URA site. Upon approval of the DSP by CE-in-C, URA would consider incorporating Neighbourhood Elderly Centre as a proposed social welfare facility within the non-domestic portion of URA site. The disposition of welfare facility would be complied with the relevant licensing requirements and is subject to liaison with SWD for subsequent land grant preparation. The Kowloon City District Council will be consulted in future as required. For the remaining not less than 1,650 sq.m. GFA reserved for GIC uses within PH site, please consult HKHA/HS to explore the feasibility of incorporating other proposed social welfare facilities within PH site to cater for the ongoing welfare service needs.

Departmental Comments	Responses
supply and demand for services in the local community, etc. and explore the feasibility of provision of welfare facilities to cater for the ongoing welfare service needs, both territory-wide and at the district level. Please make sure the proposed welfare facilities will be included in your submission to District Council in future and keep us abreast of the target date of land grant to facilitate us in preparing estimate for meeting the construction cost of welfare facilities in the subject development in a timely manner.	
3. Urban Design and Landscape, Planning Department (UD&L, PlanD) – from landscape planning perspective	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 26 November 2020	
2. Since no additional or supplementary landscape related information and drawing is provided in this submission, our previous comments from landscape planning perspective via memo dated 25.9.2020 should still be valid.	Noted. As mentioned in our last responses to comments, upon approval of the DSP by CE-in-C, detailed design of the proposed development will be carried out. The landscape proposal will be incorporated with the detailed tower and podia design, and will be provided in the subsequent detailed design stage.
4. Transport Department (TD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 18 January 2021	
3. The remaining short section of the Maidstone Road (between Lok Shan Road and future roundabout) will form a cul-de-sac on public road which is undesirable for traffic circulation and should be avoided. Please review. In addition, please advise if the proposed roundabout at Maidstone Road would open for 24-hour public use without vehicular gate.	Please note that Maidstone Road is currently a dead-end without any U-turn design available and will become part of the application site ("the Site"). The preparation of CBS-2:KC draft DSP with the proposed road closure and cul-de-sac with a roundabout were better than the current design; it had already circulated to TD and other relevant government departments during the pre-commencement stage and no objections were received.

Departmental Comments	Responses
	For the two run-in/out of the proposed development (CBS-2:KC), they will be located at Kau Pui Lung Road, not in the cul-de-sac of Maidstone Road. Appropriate traffic management will be adopted, e.g. not allowing parking at the roundabout. The existing run-in/out for the existing building at No. 80 Maidstone Road is located on Maidstone Road to the north of the Site, and hence the short section of Maidstone Road will be maintained for its vehicles ingress/ egress. Please refer to **Figure RC 1** of the revised TIA report as attached in **Annex 1** of the R to C for your easy understanding. It is noted that the existing vehicles entering Maidstone Road are mainly for on-street parking and pick-up/ drop-off/ loading/ unloading activities associated with the buildings along Maidstone Road, but not for by-passing. As the on-street parking spaces will be re-provided and the buildings will be redeveloped within the Site, and the new vehicular accesses will be located along Kau Pui Lung Road, the future demand of the proposed roundabout will be mostly for short time pick-up/ drop-off of the proposed development which the traffic demand is low. Thus, the effect on traffic circulation due to closure of the section of Maidstone Road is negligible. It is confirmed that the proposed roundabout will be opened for 24-hour without vehicular gate to the public. Subject to gazettal of road closure scheme and land grant stage for management and maintenance of this roundabout at Maidstone Road, further liaison among URA and relevant government departments including TD, HyD and LandsD would be carried out at appropriate time after DSP approval.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
4. The impact of construction traffic during the construction stage should be carried out in the planning stage. Please review.	With reference to other construction sites, it is estimated that the maximum number of construction vehicles per day would be 80 (i.e. 200 pcu/day) during the peak construction period. For an operation of 8 hours, the hourly construction traffic generated and attracted by the proposed development is 25pcu/hr, which is much lower than that the estimated trips of the proposed development (201pcu/hr) after the completion. Therefore, the assessment on design year 2033 (after completion) is already a conservative case. Subject to CE in C's approval of the draft DSP, detailed construction traffic impact assessment will be provided under Cap 370 under the Roads (Works, Use and Compensation) Ordinance at the detailed design/ road closure stage. The details of traffic arrangement and impacts are subject to the future Temporary Traffic Management proposals.
7. Quantitative assessment on the learner drivers' activities on weekdays and weekends respectively should be carried out. In addition, regarding the influence on driving exam routes, please consult Driving Services Section of TD.	Learner's traffic flow has been extracted as shown in **Figure RC 3**. The learner's traffic flow has contributed less than 5% of the total surveyed traffic flow and has an insignificant impact on the traffic condition even if the exam route has been re-routed as shown in **Figure RC 2** (see the revised TIA report as attached in **Annex 1** of the R to C). Subject to CE in C's approval of the draft DSP, URA or its joint venture partner(s) or its assignee shall consult Driving Services Section of TD regarding the influence on driving exam routes at the detailed design and GBP submission stages.
8. Road Safety Audit for the Project in planning stage should be carried out before the detailed design as stipulated in the Transport Planning and Design Manual unless otherwise agreed by the Director's Representative.	The Project has involved the road closure of only sections of Maidstone Road and Kiang Su Street, and some minor works on public roads, which would have insignificant impacts on road users' behaviour.

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	Therefore, it is believed that the Road Safety Audit could be exempted in this Project. If necessary, Road Safety Audit for the Project will be carried out at the detailed design stage, subject to CE in C's approval of the draft DSP.
9. It is anticipated that the retail ($9132m^2$ + $700m^2$) and the GIC facilities ($700m^2$) components in the development would attract large amount of visitors, assessment on the adequacy of pedestrian facilities, including footpaths and at-grade/grade-separated road crossings to and from the proposed development should be carried out.	It is confirmed that the number of visitors induced by retail and GIC, etc. of the proposed development has been considered in the previous assessment. Please refer to **Table 5.6** of the revised TIA as attached in **Annex 1** of the R to C. The study area is the core area which would cover public transport stops nearby with 2 MTR entrances/ exits located adjacent to the Site, and there will be underground passageways directly connected to the 2 MTR entrances/ exits at B/F. The most critical pedestrian activities due to the proposed development would occur in this area, and it is believed that the impact by the proposed development to the other areas outside the study area would be insignificant. As all the studied pedestrian facilities would operate very well with LOS A or V/C ratio below 1.0 in the design year, it is believed that all the other area outside would have even better operation performance.
10. The proposed improvement schemes at Junctions A and C shall be implemented by the Applicant. For Junction B, the Applicant shall review the junction performance since SCL would commission soon.	The latest MOC of junctions after the reinstatement works by MTRC due to SCL had been adopted in the assessment. Junction A would operate with ample capacity in design year and therefore no improvement is required. Please refer to **Chapter 4** of the revised TIA as attached in **Annex 1** of the R to C.

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	Subject to CE in C's approval of the draft DSP, URA or its joint venture partner(s) or its assignee will be responsible for the implementation of the proposed improvement scheme at Junctions B and C.
15. Please demonstrate that the internal road will be able to accommodate the anticipated car queuing at both PVP and ancillary parking spaces without queuing back to the public road.	According to In-house survey/ interview results, the trip rate for car park during the peak hour is 0.17 pcu/hr/parking space. For car park with about 395 (251+140 (PVP) =391 (say 395)) nos. of parking spaces at URA site, it is expected that the estimated vehicular trips attracted will be 68 pcu/hr at peak hour. Similarly, there are about 80 nos. of parking spaces at PH site, it is expected that the estimated vehicular trips attracted will be 14 pcu/hr at peak hour. Please note that the drop bar of the car park will be operating with a frequency of every 30s. This gives a capacity of 120 cars per hour, which is much greater than the demand of 68 pcu/hr and 14 pcu/hr respectively. In addition, the drop bar of the car park will be set back and placed near B1/F. It would provide a queuing length of more than 36-42m (equivalent to 6-7 vehicles) available for holding the cars waiting to get into the car park in order to minimize the potential queuing at Kau Pui Lung Road. Appropriate access control facilities will be designed and provided within the Site at the detailed design/ GBP submission stage, subject to CE in C's approval of the draft DSP.
16. The proposed conversion from carriageway to footpath shall be designed and constructed in strict compliance with the requirements of TPDM. The Applicant should ascertain the responsibilities for construction and future maintenance and	Noted. The proposed conversion from carriageway to footpath at Kiang Su Street will be designed and constructed in strict compliance with the requirements of TPDM. The construction will be carried out by URA or its joint venture partner(s) or its assignee. MTRC and relevant

Departmental Comments	Responses
management of the proposed road new access road from relevant departments.	government departments will be consulted at land grant stage and the footpath will be handed over to the government for future maintenance and management.
17. The proposal of turning on existing through roads into cul-de-sac is undesirable to traffic circulation and should be avoided.	Please refer to our response to comments in Point 3 above.
19. Currently, vehicles from Kau Pui Lung Road can access Ma Tau Wai Road via Kiang Su Street. However, the proposed development would block Kiang Su Street which adversely affected the local accessibility. Therefore, justification should be provided for such proposal and improvement measures on traffic circulation is considered necessary to enhance the accessibility of the proposed development.	In order to maintain traffic circulation, it is proposed to convert the section of Chi Kiang Street between Ko Shan Road and Ma Tau Wai Road from westbound to eastbound. Hence, vehicles from Kau Pui Lung Road can access Ma Tau Wai Road northbound via this section of Chi Kiang Street. Please refer to **Figure 4.12** of the revised TIA as attached in **Annex 1** of the R to C for details. Subject to CE in C's approval of the draft DSP, URA or its joint venture partner(s) or its assignee will be responsible for the implementation of the proposed improvement scheme.
20. Please adopt the new parking standard in the parking provision of the development. For the public housing site, the latest parking provision in subsidized housing should be adopted. Please review Table 2.2.	Noted. Latest HKPSG parking standard has been adopted in the revised TIA. Please refer to revised **Tables 2.2** and **2.3** of the revised TIA as attached in **Annex 1** of the R to C for details.
21. Please assess the parking, loading and unloading demand of the Community Use for URA site and GIC use in public housing site. In addition, please provide parking provision for the Estate Management Office (250m^2) in public housing site according to the HKPSG.	As stated in the remarks of **Table 2.2** of the revised TIA as attached in **Annex 1** of the R to C, 1 car parking space for Community Use in URA Site and 2 car parking spaces for GIC use in PH Site are proposed in view that no parking standard is provided for community and GIC use in HKPSG. Also, as the nature of Estate Management Office is an ancillary use for the public housing in PH Site and different from commercial office, it is considered that the office standard in HKPSG is not applicable.

Departmental Comments	Responses
	As the proposed development will be well served by public transport (especially with direct connection with To Kwa Wan MTR Station and the Site in future) and a public car park will be provided within the Site (with 40 extra spaces above the existing on-street provision), the actual parking demand for Community Use, GIC and Estate Management Office will be very low. Moreover, the daily loading and unloading demand of these facilities would be very low and a total of 20 loading and unloading bays will be provided within the Site and could be used if necessary. Therefore, it is believed that total 3 nos. of car parking spaces is sufficient for the daily operation of Community Use, GIC and Estate Management Office use. The actual number of parking spaces and loading and unloading bays for Community Use, GIC and Estate Management Office use shall be subject to future liaison and agreement with the user departments/ parties on operation needs, including TD.
22. Please consider providing parking spaces for commercial vehicles, such as coaches and good vehicles, in the PVP, which should be within the private development.	Currently, there is no commercial/ retail use at the Site. It is noted that there is no commercial vehicles on-street parking spaces affected by the proposed development. Thus, no commercial vehicles parking spaces will be re-provided. Ancillary car parking spaces for the future commercial/ retail GFA will be provided, hence, the commercial vehicle parking demand generated by the proposed development will be satisfied.
23. The access arrangement and future management and maintenance issues of the PVP should be ascertain at the current stage. Please clarify.	It is to clarify that only two vehicular accesses to carpark are provided. Separate carpark entrances will be provided for URA Site and PH Site. The PVP would share the same access with the ancillary car park in URA Site.

Departmental Comments	Responses
	Subject to CE in C's approval of the draft DSP, URA or its joint venture partner(s) or its assignee will be responsible for future management and maintenance of the PVP.
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 9 February 2021	
28. For the junction assessment of Junction G (Ma Tau Wai Road / Chi Kiang Street) as shown in Table 3.2 and 4.8, the junction performance in 2033 (PM) are better than that in 2019 but the traffic flow have increased significantly, which is unreasonable. Please review and explain.	Please note that there was a TTA arrangement at Junction G due to SCL construction works during the period of our traffic survey in 2019. The number of lanes has been reduced which give a worse result. Currently, the junction is already returned to its original layout and therefore the RC becomes better in design year in 2033 (PM). Please refer to **Figures 3.8** and **4.5** for the arrangement in different year (see the revised TIA report as attached in **Annex 1** of the R to C).
29. For Junction A (Tin Kwong Road / Sheung Shing Street) and C (Tin Kwong Road / Ma Tau Wai Road), please provide the swept path analysis for the proposals. For Junction A, there is significant increase in left turn movement in 2033, please explain. In addition, please advise the remaining footpath in the junction improvement proposal. For Junction C, please review the road markings at the junction as well.	To reflect the effect of SCL (i.e. Tuen Ma Link (TML) Phase 2), traffic flow of BDTM Model K2 has been adopted as the base flow in future case assessment. Thus, the traffic pattern in Junction A is different from surveyed flow. The latest MOC of junctions after the reinstatement works by MTRC due to SCL had been adopted in the assessment. Junction A would operate with ample capacity in design year and therefore no improvement is required. For Junction C, the road markings at the junction has been updated as shown in **Figure 4.11** of the revised TIA as attached in **Annex 1** of the R to C. Swept path analysis of the junction is also provided as requested (**Figure SP1**).
30. For Junction N (Ma Tau Chung Road / Sung Wong Toi Road / Fu Ning Street) as shown in Figure 4.5, no junction improvement works would be carried out / planned to be carried out by other	Please note that based on the latest assessment, the junction could operate with ample capacity and therefore no improvement required.

Departmental Comments	Responses
projects. Please review and recommend improvement proposal for consideration.	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 25 February 2021	
31. Table 4.4 refers. The adopted traffic rates for residential flat lesser than $60m^2$ by interpolation is inappropriate. The use of traffic rates should follow the requirement of TPDM.	Noted. The TPDM traffic rates have been followed in the revised TIA.
32. Typo error is found in Table 4.7 for "Sunday Peak", please review.	There is a typo. It should be "Weekday PM Peak". Please refer to the revised **Table 4.6** of the revised TIA as attached in **Annex 1** of the R to C.
5. Drainage Services Department (DSD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 22 April 2021	
On DIA: Appendix D: - Table 1: Climate change effects should be considered in accordance with Section 6.8 of the SDM. Mid and end-21st century should be considered in the assessment.	Please note the previous "**Appendix D**" is now revised as "**Appendix C**". As requested, climate change effects and mid and end-21st century are considered in the assessment. **Table 1** has been revised to show the additional flows. **Tables 4c, 4d, 6c** and **6d** have been added to demonstrate that the proposed drainage improvements will have adequate capacities for the potential increased future runoff. Please refer to the revised DIA report as attached in **Annex 2** of the R to C for details.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
- Please show the catchments on a layout plan.	As requested, a new **Figure 5** has been added to clearly show the catchment areas (see the revised DIA report as attached in **Annex 2** of the R to C).
- As there is additional catchment going through SMH4028820, please assess the hydraulic performance of drains downstream of SMH4028820.	Noted. The assessment has been carried out and please refer to **Figure 4b** and **Table 5a-6d** of **Appendix C** for details (see the revised DIA report as attached in **Annex 2** of the R to C).
- Table 4b, Remark 3: Please clarify why there is a "10% reduction in flow" instead of reduction in flow area and capacity.	There is a typo. Remark 3 is revised as "Qsilt: 10% reduction in capacity for gradients not greater than 1 in 25; 5% reduction in flow for gradients greater than 1 in 25".
General comment: - To relieve the increasing pressure on the drainage system due to development and ensure sustainable development in Hong Kong in face of climate change, provision of blue-green drainage infrastructure according to Section 3.2.2 of DSD's Stormwater Drainage Manual and DevB TC(W) No. 9/2020 is strongly encouraged to be incorporated in the development with a view to reducing the quantity as well as improving the quality of site runoff. The project proponent should actively consider the incorporation of Blue-Green Elements and the principle of "single site, multiple uses" in DIA and project design for enhancing the adaptive capacity of the drainage system and other associated beneficial uses. In fact, similar concept is already embraced in the stormwater management section of BEAM Plus Neighborhood in which credits will be granted for promotion of infiltration and provision of temporary storage.	Noted. Upon DSP approval, the provision of blue-green drainage infrastructure in accordance with the DSD's Stormwater Drainage Manual, if applicable to the Project, would be explored in the subsequent detailed design stage to reduce the quantity and improve the quality of site runoff as far as practicable. Please refer to **Section 2.2.3** of the revised DIA report as attached in **Annex 2** of the R to C.

Departmental Comments	Responses
- As mentioned in our previous comment, the proposal would worse the flooding at Ma Tau Wai Road and the proposed drainage works did not address on this. URA is requested to revise the drainage proposal for DSD comment.	As mentioned in our last responses to comments, the proposed development will have no adverse impact on the runoff from the Site and will not therefore worsen any pre-existing drainage / flooding problem(s). If there are existing deficiencies in the regional drainage system, it would be more appropriate to address these as part of a larger strategic drainage master planning process, rather than in a piecemeal fashion, relying on individual developments and involving complex design processes and long-term maintenance liabilities. Nevertheless, it is noted that the provision of blue-green drainage infrastructure would reduce the peak runoff from the Site and therefore help to alleviate the problems caused by the inadequate main drainage system. Upon DSP approval, URA would consider this option and explore the design concept in the subsequent detailed design stage.
6. Urban Design and Landscape, Planning Department (UD&L, PlanD) – from urban design and visual aspects perspective	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 5 May 2021	
2. The subject site is located within a cluster of residential developments to the west of Ma Tau Wai Road zoned "R(A)" with BHRs ranging from 120mPD to 140mPD. On the other side of Ma Tau Wai Road, there is another cluster of residential developments sandwiched between Ma Tau Wai Road to the west and To Kwa Wan Road to the southeast zoned "R(A)" with BHR of 120mPD. The proposed development comprises a northern portion for URA development with five tower blocks atop four separate podiums connected by elevated pedestrian links, and a southern portion for public housing (PH) development with two bulkier tower blocks atop a podium which is connected to another podium by elevated pedestrian links, with BHR of 140mPD for both the URA and PH	Noted.

Departmental Comments	Responses
developments. Parts of Maidstone Road and Kiang Su Street will be integrated into the proposed development and generally be pedestrianised and retained as uncovered open spaces. Given the context and as illustrated in the photomontages of the VIA, although the proposal with a proposed BHR of 140mPD may weaken the intended stepped height profile descending towards the waterfront, it would generally be compatible with the prevailing character and intended height profile of the surrounding area. The proposal would unlikely induce significant adverse effect on the visual character of the surrounding townscape.	
3. According to the notional scheme, the proposed landscaped pedestrianised avenue/plaza along existing Maidstone Road and Kiang Su Street would generally respect the existing street grid pattern and could help maintaining air and visual permeability currently offered by the streets, as well as potentially providing more ground floor spaces for pedestrian use. There would be an underground pedestrian passageway within the URA site providing connections to the two entrances of the planned MTR Shatin-to-Central Link (SCL) To Kwa Wan Station at Lok Shan Road and Kiang Su Street respectively. Potential open spaces are located along the interface between the URA site and PH site. It is also noted from the proposed ES that there is an intention to minimise the massing of podium to create a pedestrian-friendly environment. These measures may promote pedestrian connectivity and visual interest, as well as improve the pedestrian environment.	Noted.
4. As gathered from the R-to-C, it is noted that THB has committed to follow the design intention and same design concept of the pedestrianised avenue/plaza and adequate local open space will be	Noted.

Departmental Comments	Responses
provided within the PH site. URA has clarified that the proposed pedestrianised avenue/plaza will be opened for public use at reasonable hours instead of 24 hours daily to avoid disturbance to the residents late at night. It is also noted that URA will consider amenity features to enhance comfort of the pedestrian environment within the site and its surroundings at detailed design stage to improve walkability and to keep street vibrancy.	
Specific Comments 5. Regarding R-to-C Item No.2 – 5(b): Given that the existing streets integrated in the proposal are currently providing direct and at-grade connections to the surrounding streets, please consider whether it is appropriate to clearly indicate that the pedestrian avenue/plaza should provide direct and at-grade connections connecting Lok Shan Road at the north, Ma Tau Wai Road/Kiang Su Street at the east, Chi Kiang Street at the south and Kau Pui Lung Road at the west.	It is to clarify that the pedestrianised avenue / plaza will provide direct and at-grade connections connecting Lok Shan Road at the north, Ma Tau Wai Road at the east, Chi Kiang Street at the south and Kau Pui Lung Road at the west.
6. Regarding the VIA submitted, the following clarifications may be considered: • Para. 3.1.4: With reference to Figures 2.1 & 2.2, the residential blocks under the proposed scheme do not seem to be slimmer than those under the baseline scheme as claimed. Also, the smaller building footprint seems to be describing the podium instead of the residential towers. Please review and revise the whole paragraph as appropriate.	Noted. It is to clarify that the smaller building footprint is describing the podia. **Para. 3.1.4** is revised and please refer to the revised VIA report as attached in **Annex 3** of the R to C.

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• Para. 3.1.5: It is not clear what does the "setback from the podia" refer to. Does it refer to residential blocks setback from the podia edge? Or the podia setback from the pedestrianised avenue/plaza? Please clarify.	Noted. It is to clarify that there will be a podia setback from the pedestrianised avenue/plaza. **Para. 3.1.5** is revised and please refer to the revised VIA report as attached in **Annex 3** of the R to C.
• Column on Key Visually Sensitive Receivers in Table 3.1: With reference to TPB-PG No.41, the visual sensitivity of the public viewers from the viewing points (VPs) can be qualitatively graded as high, medium or low. Please provide the gradings of the visual sensitivity of public viewers identified herein.	Noted. The gradings of the visual sensitivity of public viewers have been supplemented in **Table 3.1** (see the revised VIA report as attached in **Annex 3** of the R to C).
• Column on Effect on Visual Elements and Resources for VP3 in Table 3.1: Judging from Figure 3.5, it is noticed that the enhancement of visual permeability is mainly restrained at the pedestrian level along Kiang Su Street as compared with the Baseline Scheme. Please supplement the last sentence in this regard.	Noted. The last sentence is revised as "However, with the proposed massing layout and visual corridor along Kiang Su Street, the Proposed Scheme will have enhanced visual permeability at the pedestrian level along Kiang Su Street as compared with Baseline Scheme.". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex 3** of the R to C. Please also note that Kiang Su Street is currently a road with vehicular access. The proposed development will pedestrianize the current Kiang Su Street area without any significant built-over, that will improve the visual elements as well.
• Column on Visual Composition for VPs 3 and 4 in Table 3.1: There is no discussion on the sky view as one of the visual resources. Please supplement to ensure consistency for the discussions on visual composition for all VPs.	Noted. Discussion on the sky view on Visual Composition for VPs 3 and 4 has been supplemented in **Table 3.1** (see the revised VIA report as attached in **Annex 3** of the R to C).
• Column on Visual Obstruction and Visual Permeability for VP 5 in Table 3.1: For the last sentence, the appraisal should assess the degree of visual obstruction/permeability of the Proposed Scheme instead of the Baseline Scheme. Please rewrite.	Noted. The last sentence is revised as "However, the Proposed Scheme will affect the existing visual permeability along Kiang Su Street when compared with Baseline Scheme.". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex 3** of the R to C.

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• Column on Resultant Overall Visual Impact for VP 1 in Table 3.1: With reference to other VPs (e.g. VP 3), it seems that the visual impact ratings are derived from the comparison of the Proposed Scheme with the existing condition. For consistency, please consider whether the visual impact rating for this VP should be "slightly adverse" instead of "negligible".	Noted. It is to clarify that the visual impact rating for VP1 is "slightly adverse". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex 3** of the R to C.
• Column on Resultant Overall Visual Impact for VP 5 in Table 3.1: Given that the Proposed Scheme would block the view corridor along Kiang Su Street and induce noticeable blockage of sky view, please consider whether the visual impact rating for this VP should be "moderately adverse" instead of "slightly adverse". Please also review and revise the discussions under "Effect on VSRs" as appropriate.	Noted. It is to clarify that the visual impact rating for VP5 is "moderately adverse" and the discussions under "Effect on VSRs" has been revised accordingly. Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex 3** of the R to C.
• Para. 4.2: Given that the stepped building height profile from the inland area towards the waterfront is already reflected in the existing BHR under the OZP, the proposed development would not create, but rather generally respect such stepped height profile. Please review and revise.	Noted. **Para. 4.2** has been revised accordingly (see the revised VIA report as attached in **Annex 3** of the R to C).
• Para. 4.3: Please consider moving this paragraph to Section 3.2 under "Identification of Viewpoints".	Please note the previous **Para. 4.3** has now moved to **Para. 3.2.2** (see the revised VIA report as attached in **Annex 3** of the R to C).
7. Urban Design and Landscape, Planning Department (UD&L, PlanD) – from air ventilation perspective	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 7 May 2021	
1. **Baseline Scheme** (sections 1.4 & 1.6 and Figure 10) – The consultant should identify and illustrate the air ventilation	Mitigation measures for the Baseline Scheme have been listed and illustrated on plan in the report. Please refer to **Section 1.4.2** and

Departmental Comments	Responses
mitigation measures (e.g. building separations, etc.) on plan for complete information.	**Figure 11a** for the air ventilation mitigation measures (see the revised AVA report as attached in **Annex 4** of the R to C).
2. **Proposed Scheme** (section 1.5 and Figure 11) – Referring to Figure 11, it seems the building separation between T2 and T3 should be considered as good air ventilation design feature. Thus, the consultant should report its width in text and indicate it on plan.	Please note there is at least 13m building separation between T2 and T3. Please refer to **Section 1.5.2** and **Figure 11b** for the mitigation measures for the Proposed Scheme (see the revised AVA report as attached in **Annex 4** of the R to C).
3. **Test point locations** (Table 4.1 and Figure 7) ■ Kai Pui Lung Road – Since the perimeter test points have been placed much closer than the overall test points, the consultant should select some of the perimeter test points (i.e. P17 to P26) when calculating the SAVR of this focus area. ■ Sheung Heung Road – Overall test point T40 should be excluded in this focus area. ■ Kiang Su Street – The consultant should show the demarcation of this focus area on Figure 7. ■ Ball court on rooftop of To Kwa Wan Market – The consultant should use the same name for indicating the focus area on Figure 7.	Noted. **Table 4.1** and **Figure 7** have been updated accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).
4. **Overall wind performance under annual condition** (section 4.3, 2nd paragraph) ■ The simulation results show that the similar VR around Maidstone Road, Ko Shan Road, Ko Shan Road Park and Po Leung Kuk Madame Chan Wai Chow Memorial School. The	Noted. **Section 4.3.2** has been updated accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).

Departmental Comments	Responses
consultant should clarify and revise the text where appropriate. ■ With reference to simulation results, it is found that the Proposed Scheme has lower VR along part of Ma Tau Wai Road but better VR area to the west of Lok Man Sun Chuen when compared with the Baseline Scheme under annual condition. However, these phenomena have been discussed in text.	
5. **Overall wind performance under summer condition** (section 4.3, 3rd paragraph) – Since the VR along the most part of Kowloon City Road was covered by the East Kowloon Corridor, it is difficult to read the VR differences between two schemes. The consultant should clarify and indicate the mentioned differences on simulation results. Otherwise, please amend the relevant discussions.	To avoid confusion, Kowloon City Road has been deleted from **Section 4.3.3** (see the revised AVA report as attached in **Annex 4** of the R to C).
6. **NNE wind** (paragraph 4.5.1) – The simulation results show that the Proposed Scheme would create larger wake to the west of proposed T3 and T4 when compared with the Baseline Scheme. The consultant should clarify and revise the relevant discussion where appropriate.	Noted. **Section 4.5.1** has been revised accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).
7. **NE wind** (paragraph 4.5.2) ■ The simulation results show that the Proposed Scheme would have lower VR along Maidstone Road when compared with the Baseline Scheme. However, this phenomenon has been discussed in text.	Noted. **Section 4.5.2** has been revised accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).

Departmental Comments	Responses
■ Item a – The consultant should explicitly admit that the Proposed Scheme would have larger wake along circled part of the Kau Pui Lung Road when compared the Baseline Scheme.	
8. **ENE wind** (paragraph 4.5.4, Item a) – The consultant should explicitly admit that the Proposed Scheme would have larger wake along circled part of the Kau Pui Lung Road when compared the Baseline Scheme.	Noted. **Section 4.5.3** has been revised accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).
9. **S wind** (paragraph 4.5.8) ■ Item a - The consultant should explicitly admit that the Proposed Scheme would have adverse air ventilation impact along Kau Pui Lung Road when compared the Baseline Scheme. ■ The simulation results show that the Proposed Scheme has higher VR along part of Maidstone Road next to proposed blocks HA1 and HA2 when compared with the Baseline Scheme. However, these phenomena have not been discussed in text.	Noted. **Section 4.5.8** has been revised accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).
10. **Conclusion** (Section 5) – In view of the above, the consultant should update and revise the conclusion accordingly.	Noted. **Section 5** has been updated accordingly (see the revised AVA report as attached in **Annex 4** of the R to C).
11. **VR contour and vector plots** (Appendix 4) – The consultant should show the VR contour and vector plots of the whole computational domain for checking.	As requested, contour and vector plots for domain are provided in **Appendix 4** of the revised AVA (see the attached **Annex 4** of the R to C).

Departmental Comments	Responses
8. Environmental Protection Department (EPD)	
Further Comments Received by email from ATP/K10, DPO/Kowloon, PlanD dated 13 August 2021	
Annex 1 – Revised Environmental Assessment Report (Ref. R6859_v1.1) Noise 1. According to the revised EA report, full compliance with the road traffic noise planning standard of 70dB(A) cannot be achieved. However, it appears there are feasible noise mitigation measures which would be able to mitigate road traffic noise levels to within standards, including further setback and the adoption of acoustic windows. The consultant should propose measures to those units with exceedance and demonstrate that 100% road traffic noise compliance is feasible.	The reason / evidence of not adopting 100% compliance rate is already stated in **Section 3.10** of the Noise Impact Assessment (NIA) in the revised EA report. Given the current notional design is at planning stage and subject to CE in C approval, detailed design will be carried out after approval to design the building and at-source mitigation. Detailed mitigation measures such as baffle type acoustic windows, whether any combination of window pane separation, windows height, window opening and windows overlapping, etc. would be explored in the subsequent detailed design stage to optimize an acceptable noise compliance rate as far as practicable.
Waste Management 2. Section 5.3: Please clarify if asbestos-containing wastes are anticipated from the Project works. If affirmative, please state clearly the legislation to be followed and the handling arrangements accordingly in the relevant Section(s).	It is to clarify that asbestos-containing wastes may potentially be found during the demolition phase of the existing residential buildings. Please refer to **Sections 5.3.12** and **5.3.13** for the relevant legislation to be followed (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).

Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
3. Table 5.1:	
(a) Given the Project area and the proposed development scheme (e.g. levels of basement), please review if the estimated quantities of C&D materials are appropriate.	Noted. The estimated quantities of C&D materials has been revised and **Table 5.1** has been updated accordingly (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(b) In general, on-site reuse and recycling should be considered prior to off-site options. Please review and provide the estimated quantities of C&D materials to be reused on-site and recycled.	Noted. **Table 5.1** has been updated accordingly (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(c) Please revise the handling arrangement of the general refuse to tally with Section 5.3.10.	Noted. **Table 5.1** has been updated accordingly (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(d) Please review if C&DMMP should be prepared and submitted according to the requirements of the Project Administration Handbook for Civil Engineering Works.	It is confirmed that C&DMMP is required for this project. Please refer to **Section 5.4.5** for details (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
4. Section 5.4.6:	
(a) Re R-to-C item (19)(iv): Please address our previous comment. Please review if ETWB TC(W) No. 19/2005 is applicable for the project. According to the ETWB TC(W) No. 19/2005 in Section 5.2, Waste Management Plan becomes part of the Environmental Management Plan to be submitted to the Project Architect/Engineer for approval before construction works. Please revise the text as appropriate.	It is confirmed that ETWB TC(W) No. 19/2005 is applicable for this project. Please refer to **Section 5.4.4** for details (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(b) Please state clearly the circular to be followed for the proposed trip-ticket system.	Please note that TCW No. 6/2010 will be followed for the proposed trip-ticket system. **Section 5.4.8** has been updated accordingly (see the

Departmental Comments	Responses
	extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(c) Please review if the sewage issues should be addressed in other relevant Chapter (e.g. Water quality).	Noted. The previous section "Waste Nuisance Control" originally under **Section 5.4.6** has been removed (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
(d) Re R-to-C item (19)(ii): The Section "chemical waste control" is repeating Section 5.4.4. Please combine the Sections as appropriate.	Noted. The previous section "Chemical Waste Control" originally under **Section 5.4.6** has been removed (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
5. Sections 5.4.7 and 6.1.5: Please revise the Sections to tally with the details of waste assessment conducted in Chapter 5.	Noted. **Sections 5.6.1** and **6.1.5** have been revised accordingly (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
6. Chapter 5: Please address the waste management issues during operation phase of the Project.	As requested, the waste management during operation phase of the Project has been supplemented in **Section 5.5** (see the extracted pages of the revised EA report as attached in **Annex 5** of the R to C).
Land Contamination	
7. Re R-to-C item (22): There is no coverage on land contamination assessment in the revised EA. In general, land contamination assessment and remediation (if needed) should be completed prior to the development of a site according to the prevailing guidelines. If land contamination assessment is not carried out before approval of the DSP, a clause should be imposed in the land grant condition of the subject site to request URA to conduct a land contamination assessment and carry out remediation (if needed) prior to the development of a site according to the prevailing guidelines. Please state clearly the proposed arrangement on conducting land	Noted. As mentioned in our last responses to comments, upon approval of the DSP by CE-in-C, URA will review the potential land contamination issue during the detailed design stage. Detailed land contamination assessment and remediation (if needed) will be completed and submitted to EPD with reference to the prevailing guidelines on land contamination assessment prior to the development of the proposed development site. Please note that no construction works or development of site will be carried out prior to the completion of land contamination assessment and remediation, if necessary.

Departmental Comments	Responses
contamination assessment upon DSP approval in the EA. Please also clarify the meaning of the statements "if required" and "if considered necessary" in the R-to-C, as land contamination assessment submissions should be submitted to EPD for agreement in general.	
Annex 2 – Revised Sewerage Impact Assessment Report (Ref. R6775_v1.4) 8. Section 1.3: Please state the population intake year for the proposed development.	As requested, in the technical assessment, **Section 1.3.4** has been added to state the population intake year for the proposed development is year 2030 (see the extracted pages of the revised SIA report as attached in **Annex 6** of the R to C). The assumption of population intake year is only for the sake of technical assessments and it is subject to the decision to proceed with the Scheme by URA, TPB, the approval of CE in C and the acquisition programme.
9. Appendix B, Table 5: It appears that the some planned developments (e.g. 1-27 Wing Kwong Street and 111-127 Ma Tau Wai Road) in the concerned sewerage catchment F is not included in the hydraulic assessment, please review.	Noted. According to the SIA report of URA To Kwa Wan Road / Wing Kwong Street Development Scheme (KC-016), the buildings at 1-27 Wing Kwong Street and 111-127 Ma Tau Wai Road are within part of the URA redevelopment projects and will be redeveloped. The sewage generation from these planned developments have been reviewed. Please refer to the revised **Figure 3**, **Tables 3-6**, **4** and **5** of **Appendix B** and **Appendix D** for details (see the extracted pages of the revised SIA report as attached in **Annex 6** of the R to C).
10. The consultant is suggested to provide softcopy of the report (in pdf) and calculation spreadsheet (in Excel) as well as all Response to Comments as appendix. Please also highlight the revised / updated content of the SIA report in next submission to facilitate review.	Noted and shall be provided accordingly.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (7th batch)

Departmental Comments	Responses
11. The sewerage works shall be implemented to the satisfaction of DSD. The consultant should seek DSD's view on the SIA.	Noted.

After Submission of Enhanced Scheme (Nov 2022)

Batch 8

(Feb 2023)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
1. Kowloon City District Office, Home Affairs Department (HAD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 November 2022	
1. KCDO welcomes the increase in GIC GFA but have no particular opinion on the type of GIC facilities to be incorporated into the proposed development as long as proper public consultation has been made.	Noted. URA will consolidate comments from departments and public during public consultation process of the draft DSP and to confirm the actual GIC uses from departments/user parties at implementation stage of the Scheme.
2. We anticipate that there will be considerable local concern on the change of the housing type in the southern portion (i.e., from public housing into Starter Home units). It is suggested that URA, PlanD and the relevant B/Ds consult AC, DC members and other prominent local personalities on the change of housing type at the captioned site.	Noted. KCDC will be consulted on the revised scheme in February 2023.
2. Electrical and Mechanical Services Department (EMSD)	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 November 2022	
No comment.	Noted.
3. Civil Engineering and Development Department (CEDD)	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 November 2022	
No comment.	Noted.
4. Water Supplies Department (WSD)	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 November 2022	
No comment.	Noted.
5. Social Welfare Department (SWD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 25 November 2022	
On the understanding that 2 500 sq. m. in GFA will be available for incorporating welfare facilities, we consider that our proposed Neighbourhood Elderly Centre, Special Child Care Centre, 60-place Day Care Centre for the Elderly and Home Care Services for Frail Elderly Persons could be incorporated at the subject site.	Noted. The types of GIC facilities will be subject to liaison with relevant Government departments, including SWD, after CE-in-C's approval of the DSP, for confirmation of usages with practical feasibility and funding availability for subsequent land grant preparation.

Departmental Comments	Responses
In the event that any part of the site will be earmarked for public housing development, please ensure about 5% of the gross floor area will be set aside for the provision of welfare facilities.	Please note that no public housing development will be provided in the Scheme as submitted in the Revised scheme (2022). Instead, there will be provision of subsidized sale flats (SSFs) / Starter Home (SH).
6. Environmental Protection Department (EPD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 November 2022	
Part 6 - No. 2 – Environmental Assessment (Ref. R6859_v2.0) Noise 1. According to the EA report, full compliance with the road traffic noise planning standard of 70dB(A) cannot be achieved. It appears that the URA and its consultant have not yet exhausted all practicable noise mitigation designs/measures to reduce the traffic noise impact. For example, measures including alternative building form to avoid orientation of noise sensitive facades directly facing nearby roads, construction of barrier / canopy on podium with projection beyond the site boundary, etc. are available and should be explored to further abate the noise impact.	The reason / evidence of not able to achieve 100% compliance rate is stated in **Section 3.10** of the Noise Impact Assessment (NIA) in the extracted pages of the revised EA report (**Annex A** of the R to C). Despite so, the current noise compliance level is 94% which is already very high; while the noise mitigation design adopted and the recommended at-receiver mitigation measures are explained in Section 3.5 and 3.7 respectively. Given the current notional design is at planning stage and subject to CE in C's approval, detailed design will be carried out after approval to design the building and at-source mitigation. Detailed mitigation measures such as baffle type acoustic windows, whether any combination of window pane separation, windows height, window opening and windows overlapping, etc. would be explored in the subsequent detailed design stage to optimize an acceptable noise compliance rate as far as practicable.
2. Traffic Noise Impact Assessment: There are some errors in the noise assessment model. For example, the traffic flow and percentage heavy vehicle of Chi Kiang Street, and the road heights of Ma Tau Wai Road (Link 14-17), Pau Chung Street (Link 21) and East Kowloon Corridor (Link 38-39) in the noise assessment model appear to be incorrect. Please check and rectify.	Noted. The noise assessment models have been reviewed and revised (see the extracted pages of the revised EA report as attached in **Annex A** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
3. Table 3.2 - Schedule of Noise Mitigation Measures: There are typos on the schedule of noise mitigation measures, e.g. the Enhanced Acoustic Balconies for Tower 6 - Flat C. Please check and rectify.	Noted. The noise assessment models have been re-run as per Comment #2 and the result tables for the Traffic Noise Impact Assessment in **Appendices 3.2** and **3.3** (see the extracted pages of the revised EA report as attached in **Annex A** of the R to C). **Section 3.6.2**, **Tables 3.1** and **3.2** in the main text, and **Figures 3.1** to **3.4** have been reviewed and revised accordingly (see the extracted pages of the revised EA report as attached in **Annex A** of the R to C).
4. Appendix 3.1: Please provide TD's endorsement on the road traffic data adopted in the assessment.	Latest available road traffic data which tallies with the development parameters and trip generation of the adjacent URA's development projects has been submitted to TD for endorsement in October 2022. TD's reply is pending.
5. Appendices 4.4 and 4.5: (a) According to Figure No. C1103/C/SCL/ACM/M52/041, two sets of cooling tower (CT-TKW-001 & CT-TKW-002) in Appendix 4.5 are located at To Kwa Wan MTR station Exit D instead of Exit A. This is inconsistent with the results in Appendix 4.4. Please check and rectify. (b) Please advise if there is any fixed noise source in the proposed development.	Noted. The description of the two sets of cooling tower (CT-TKW-001 & CT-TKW-002) in **Appendix 4.4** has been rectified accordingly (see the extracted pages of the revised EA report as attached in **Annex A** of the R to C). The discussion of the fixed noise source in the proposed development has been added in **Section 4.8** in the extracted pages of the revised EA report as attached in **Annex A** of the R to C.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
Land Contamination 6. The URA and its consultants should confirm with documentary justifications to substantiate whether there is any potential land contamination issue arising from the past and present land use activities in the Project site according to the prevailing guidelines. In general, land contamination assessment and remediation (if needed) should be completed prior to the development of a site according to the prevailing guidelines. If land contamination assessment is not carried out before approval of the DSP, a special condition should be imposed in the relevant land grant condition of the subject site to require the developer to conduct land contamination assessments and carry out remediation (if needed) prior to the development of the site according to the prevailing guidelines.	Noted. As mentioned in our last responses to comments, upon approval of the DSP by CE-in-C, URA will review the potential land contamination issue during the detailed design stage. Detailed land contamination assessment and remediation (if needed) will be completed and submitted to EPD with reference to the prevailing guidelines on land contamination assessment prior to the development of the proposed development site. Please note that no construction works or development of site will be carried out prior to the completion of land contamination assessment and remediation, if necessary.
Part 6 - No. 3 – Sewerage Impact Assessment (Ref. R6775_v2.0) 7. Section 2.4.4: Please provide more information to substantiate the assumed ratio for retail and restaurant.	Under current preliminary design stage, the actual uses in the retail podia within the Subject Site has yet been confirmed. The ratio of 1:4 for restaurant:shop adopted in the SIA is a conservative approach in assuming some restaurant uses in future by making reference to similar URA redevelopment projects in the urban context. Nevertheless, the SIA can be further reviewed and updated, if necessary, after the design parameters of the Proposed Development is confirmed at detailed design stage.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
8. Sections 2.5.4 and 2.6.3: Please provide the details of "necessary upgrades" for clarity.	For **Section 2.5.4**, the necessary upgrades mean the upgrade of 3 existing sewer segments S14-S17 (see **Figure 2** of the extracted pages of the revised SIA report as attached in **Annex B**). **Section 2.5.4** is updated accordingly. For **Section 2.6.3**, the necessary upgrades means the sewer construction and connection of 7 new sewer pipes (A3-A4, A5-A4, A4-A6, A6-A7, A7-A8, A8-A9, A9-S2) for the 3 adjacent residential buildings (see **Figure 2** of the extracted pages of the revised SIA report as attached in **Annex B**). **Section 2.6.3** is updated.
9. Appendix B, Table 2: (a) For those manholes with unknown or doubtful invert level (e.g. FMH4024257), manhole survey may be required to determine the actual invert level and pipe capacity. Please agree with DSD on the result of manhole survey. The consultant should revise the hydraulic calculation based on the actual invert level of the concerned manholes. (b) Please supplement the hydraulic calculation for sewer connecting terminal manholes S1 and S5.	(a) The reminder is well noted. Manhole survey, if required, will be conducted during the detailed design stage. The SIA will then be further updated based on the result of the manhole survey. (b) The locations of the two new manholes within the Site (NMH01 and NMH02) have been added in **Figure 2** of the extracted pages of the revised SIA report as attached in **Annex B**). It is proposed to construct two 225mm dia. sewers connecting terminal manholes S1 and S5. Please refer to the newly added **Tables 2b & 4b** in **Appendix B** of **Annex B** of the R to C for the hydraulic calculation. However, please note the proposed locations and details of the new manholes are for indicative only and they shall be reviewed in later design stage.
10. Please provide softcopy of the report (in pdf) and calculation spreadsheet (in Excel) as well as all Response to Comments as appendix in next submission. Please also highlight the revised / updated content of the SIA report in next submission to facilitate review.	Noted and shall be provided accordingly.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
11. The sewerage works shall be implemented to the satisfaction of DSD. DSD should be consulted on the SIA.	Noted.
7. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from landscape planning perspective	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 November 2022	
Landscape Observation 2. The Scheme area (about 16,473m^2) is located at To Kwa Wan and bounded by Ma Tau Wai Road to the east and Kau Pui Lung Road to the west, falls within an area currently zoned as "Residential (Group A)" ("R(A)") and an area shown as 'Road' on the draft Ma Tau Kok Outline Zoning Plan (OZP) No. S/K10/25. URA proposes to rezone the area to "R(A)" zone on the draft DSP.	Noted.
3. According to aerial photo in 2021, the site is situated in an area of urban landscape character. There is no existing trees within the proposed site development boundary. With reference to the Draft Explanatory Statement para. 7.6 and 7.12, *"Not less than 400m^2 of public open space (POS) and not less than 2400m^2 of covered and uncovered area of the pedestrianised avenue / plaza for public use at reasonable hours would be provided"* and *"A cohesive landscaping, tree planting and greening will be provided in the pedestrianised avenue / plaza and open space....minimum coverage of greening of 20% of the net site area will be provided"*. According to the Planning Proposal (Part 4) para. 1.26,*" Local open space provision within the Scheme will follow the HKPSG and to be ascertained at detail design".*	Noted.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
8. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from urban design and visual perspective	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 November 2022	
Urban Design and Visual 2. The Site is located within a cluster of residential developments to the west of Ma Tau Wai Road zoned "R(A)" with building height restrictions (BHRs) ranging from 120mPD to 140mPD. On the other side of Ma Tau Wai Road, there is another cluster of residential developments sandwiched between Ma Tau Wai Road to the west and To Kwa Wan Road to the southeast zoned "R(A)" with BHR of 120mPD. The proposed development comprises a northern site for private housing development with five tower blocks atop four separate podia connected by elevated bridge/deck linkages, and a southern site for Starter Home with two bulkier tower blocks atop a podium which is connected to another podium for proposed GIC facilities by elevated bridge/deck linkages, with BHR of 140mPD for both the northern and southern sites. Portions of Maidstone Road and Kiang Su Street will be integrated into the proposed development and generally be pedestrianised and retained as uncovered open spaces. Given the context and as illustrated in the photomontages of the VIA, although the proposal with a proposed BH of 140mPD may weaken the intended stepped height profile descending towards the waterfront, it would generally be compatible with the prevailing character and intended height profile of the surrounding area. The proposal would unlikely induce significant adverse effect on the visual character of the surrounding townscape.	Noted.
3. According to the revised notional scheme, the proposed landscaped pedestrianised avenue/plaza along existing Maidstone Road and Kiang Su Street, which will be opened for public use at reasonable hours, would generally respect the existing street grid pattern and could help maintaining air and visual permeability currently offered by the streets, as well as potentially providing more ground floor spaces	Noted.

Departmental Comments	Responses
for pedestrian use. There would be an underground pedestrian passageway with retail to connect to the two entrances of the MTR To Kwa Wan Station at Lok Shan Road and Kiang Su Street at basement level. Potential open spaces are located at the pedestrianised avenue/plaza. It is also noted from the proposed ES of the draft DSP that there is an intention to minimise the massing of podium to create a pedestrian-friendly environment. These measures may promote pedestrian connectivity and visual interest, as well as improve the pedestrian environment.	
Building/Podium Setbacks and Separations 4. According to para. 1.11 of the revised Planning Proposal, a "wide at-grade pedestrianised avenue/plaza" and "two major east-west corridors" will be created within the Scheme. Similarly in para. 7.13 of the proposed ES of the draft DSP, it states that "wide building separations are proposed between residential towers…to enhance air flow in east-west directions". With reference to para. 5.1.2 of the revised AVA-IS report, it is stated that the Scheme has provided 3 main enhancement features, including (i) 17m building separation along the north-south pedestrianised avenue/plaza; (ii) 13m building separation between Towers 2 and 3; and (iii) 23m corridor between podia along Kiang Su Street. For the sake of consistency and for ease of reference, URA may wish to provide information regarding the building/podium setbacks and separations provided within the Scheme in the Planning Proposal and the proposed ES of the draft DSP, as well as indicate the dimensions on relevant plan(s).	Please be clarified that paragraph 1.11 of the revised Planning Proposal is a general description of the notional layout, which is subject to detailed design. To facilitate good design features to enhance the air ventilation performance of the proposed development, the following 2 wind enhancement features that proposed in the revised AVA report (see **Annex C** of the R to C) will be incorporated in the **Revised ES** (see **Part 2** of the R to C): - (i) a minimum 15m width podia separation along the north-south pedestrianised avenue for north-south wind flow; and (ii) a 23m breezeway between podia along Kiang Su Street for east-west wind flow; , with any footbridges, canopies, architectural features, open-side decks, sitting area and circulation space, etc., shall be allowed in between the podia, where appropriate and practicable, in the proposed development. The above two wind enhancement features will be incorporated in the design and layout of the future developments in the "R(A)" zone, subject to minor adjustment of widths and alignments to be agreed with relevant government departments at detailed design stage.

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
5. URA may wish to add a new section on "Building/Podium Setbacks and Separations" in the proposed ES of the draft DSP, and elaborate on how these urban design measures could enhance visual and air permeability.	Please see above response to Pt. 4.
Planning Proposal *Para. 1.17* 6. Please clarify whether the elevated bridge/deck linkages connecting the podia within the scheme area are accessible by the public and elaborate on the opening hours of the elevated bridge/deck linkages.	Under the current notional design, the elevated bridge/deck linkages connecting the podia within the scheme area will be accessible by residents of the proposed development only. The accessibilities and opening hours of the linkages will be further explored and designed at detailed design stage.
Visual Impact Assessment *Para. 3.3.1* 7. For the sake of clarity, please state that the visual appraisal is prepared based on the comparison between the OZP-compliant scheme and the proposed scheme. 8. For the photomontages in Figures 3.3 to 3.7, URA may wish to provide annotations for the existing and planned/committed developments as shown in the photos for easy reference.	Noted. The visual appraisal is prepared based on a comparison between the OZP-compliant scheme and the proposed scheme. The two schemes are described in Section 2 of the VIA. Noted. **Figures 3.3** to **3.7** have been updated accordingly (see the revised **Figures 3.3 to 3.7** as attached in **Annex D** of the R to C).
VP3: Lok Man Sun Chuen *Effect on Visual Elements and Resources* 9. It is noted from Figure 3.5 that the podium will be less bulky and the building gap along Kiang Su Street will be wider as compared with the baseline scheme. Hence, it does not seem that the proposed development would create "significant" visual change to VP3. Please revise as appropriate. 10. Similarly, with a wider visual corridor along Kiang Su Street under the proposed scheme, it does not seem that the effect on VSRs from this VP is considered as "moderate". Please revise as appropriate.	Noted and agree. To clarify, the proposed development would create "moderate" visual change to VP3. Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex D** of the R to C. Noted and agree. To clarify, the effect on VSRs from this VP is considered as "low" instead of "moderately". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex D** of the R to C.

Departmental Comments	Responses
11. In view of the aforementioned comments for VP3, please consider whether the rating of overall visual impact should be adjusted to "partly enhanced/partly adverse" instead of "moderately adverse".	Noted. It is to clarify that the visual impact rating for VP3 is "partly enhanced/partly adverse" instead of "moderately adverse". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex D** of the R to C.
VP4: Junction of Ko Shan Road and Kiang Hsi Street 12. It is noted from Figure 3.6 and the discussion herein that the podium will be less bulky and the visual permeability along Maidstone Road will be enhanced as compared with the baseline scheme. In this regard, please consider whether the rating of overall visual impact should be adjusted to "partly enhanced/partly adverse" instead of "slightly adverse".	Noted. It is to clarify that the visual impact rating for VP4 is "partly enhanced/partly adverse" instead of "slightly adverse". Please refer to the revised **Table 3.1** in the revised VIA report as attached in **Annex D** of the R to C.
9. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from air ventilation perspective	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 November 2022	
Air Ventilation 1. **Baseline Scheme** (paragraph 1.6.2 and Appendix 1) – Design features, including (i) 15m-wide building separation at grade along Maidstone Road; (ii) 31m-wide building separation between Towers T1 and T5; and (iii) 22m-wide building separation between Towers T2 and T5, are also the air ventilation mitigation measures. The consultant should list them out in text and illustrate them on plan.	Please note that those design features are already listed in the text as described in paragraph 1.6.2. **Figure 02** of **Appendix 1** has been revised to illustrate the measures on the plan under Baseline Scheme (see the revised AVA report as attached in **Annex C** of the R to C).
2. **Proposed Scheme** (paragraph 1.7.2 and Appendix 2) – The consultant should indicate the mentioned GIC block on plan.	As requested, the indication of GIC block has been added on **Appendix 2** (see the revised AVA report as attached in **Annex C** of the R to C).

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (8th batch)

Departmental Comments	Responses
3. **List of corresponding test points for each focus area** (Table 4.1 and Figure 8) ▪ Lok Man Sun Chuen – Overall test points T88 to T91 should be excluded from this focus area. ▪ Kiang Su Street – Special test point S07 should be included in this focus area.	Noted. **Table 4.1** and **Figure 8** have been revised accordingly (see the revised AVA report as attached in **Annex C** of the R to C).
4. **Test point locations and its VR data** ▪ With reference to the Appendix 5, it is found that the VR value of many test points are closed to zero under many simulated wind directions. It seems that those test points are either too closely placed to the modelled developments or topography which affect the accuracy of the simulation results and correct reflect the impact on the footpath of the nearby streets. ▪ The consultant should review the location of those test points and update the relevant VR wind data where appropriate. The same set of test points should be adopted in both schemes. ▪ The consultant should update the list of corresponding test points for each focus area accordingly. As such, we would reserve our comment on these tables at this juncture.	Noted. Several test points have been relocated to avoid being placed too close to the modelled developments. **Table 4.1**, **Figures 10a**, **10b**, **11a** and **11b**, and **Appendix 5** have been updated accordingly (see the revised AVA report as attached in **Annex C** of the R to C).
5. **SVR, LVR and overall pedestrian wind environment under both Baseline and Proposed Schemes** (sections 4.1 to 4.3) – The consultant should update and revise these sections in accordance with the comments above.	Noted. **Sections 4.1 to 4.3** have been revised according to the updated VR of the test points. (see the revised AVA report as attached in **Annex C** of the R to C).
6. **SE wind** (paragraph 4.5.6, item e) – With reference to the simulation results, the mentioned phenomenon is not obvious. The consultant should clarify and revise the relevant discussion where appropriate.	Noted. **Section 4.5.6** has been revised accordingly (see the revised AVA report as attached in **Annex C** of the R to C).

Departmental Comments	Responses
7. **SSE wind** (paragraph 4.5.7, item b) – With reference to the simulation results, the Proposed Scheme has lower (not slightly) VR along Maidstone Road / future pedestrianised avenue when compared to the Baseline Scheme. The consultant should clarify and revise the relevant discussion where appropriate.	Noted. **Section 4.5.7** has been revised accordingly (see the revised AVA report as attached in **Annex C** of the R to C).
8. **Conclusion** (Paragraph 5.1.2) – For complete information, the consultant should list all mitigation measures to be incorporated in the Proposed Scheme.	Noted. **Paragraph 5.1.2** has been revised accordingly (see the revised AVA report as attached in **Annex C** of the R to C).
10. Hong Kong Police Force (HKPF)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 28 November 2022	
2. Our office, from the traffic policing point of view, in principle, has no adverse comment on the drafted proposal.	Noted.
3. With that said, we would like to point out that the vehicular run-in/out is designed on the one-lane-two-way Kau Pui Lung Road at about 50m from its junction with Chi Kiang Street.	Noted.
4. With the (611 ancillary + 164 public) parking spaces, it is important that **no queuing vehicle will be allowed** on Kau Pui Lung Road eastbound and westbound. As such, certain responsibilities of car park management should be mentioned in subsequent submission of **draft of development scheme and deed/lease conditions**.	Noted. Operation and management details of the proposed underground public vehicle park will be determined at subsequent detailed design and land grant stage upon DSP approval.
11. Lands Department (LandsD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 2 December 2022	
2. While I have no particular comments on the Report from district land administration viewpoint, your are reminded that my previous comments in para. 3(c) of the memo dated 4.6.2020 in the even series shall remain valid: "3. (c) There are proposed pedestrian avenue / plaza and open space which will be open for use at "reasonable hours". In the event that requirement to open such facilities for public	Noted.

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use is required to be stipulated in the future land grants, the exact opening hours will be specified in consultation with PlanD."	
12. Drainage Services Department (DSD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 7 December 2022	
SIA: (a) Section 2.5.4 - VC pipes were proposed for upgraded 750mm dia. sewers, in which concrete with protective liner may be preferred from O&M aspects.	Noted. The material to be used shall be further reviewed in later design stage. To allow some flexibility, **Section 2.5.4** has been updated as "…The material for the proposed sewer pipe is slimed clayware or concrete with protective liner or other materials preferred from O&M aspects as appropriate" (see the extracted pages of the revised SIA report as attached in **Annex B** of the R to C).
(b) Section 3.1.3 - Please clarify if the diversion works are to be implemented by project proponent.	Please note that the diversion works are to be implemented by project proponent or its assignee. **Section 3.1.3** has been updated accordingly (see the extracted pages of the revised SIA report as attached in **Annex B** of the R to C).
(c) Sections 2.5 and 2.6 - the usage percentage of the concerned existing sewers before and after the proposed development should be presented in table in the text.	Currently (i.e. before the proposed development), the sewage from the existing buildings within the site boundary and Catchment A2 (i.e. the 3 adjacent residential buildings) discharge via a group of existing sewers within and around the Subject Site, and to Manhole S8 (FMH4024266). After the proposed development, the existing sewers within the Subject Site will be demolished and reconstructed. The sewage from the Proposed Development within the Subject Site and Catchment A2 will discharge via two separate new routings as discussed in **Sections 2.5** and **2.6**. (see the revised SIA report as attached in **Annex B** of the R to C). As the sewage discharge routings for before and after the proposed development are totally different, we consider the comparison is not applicable.

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(d) Section 2.6 - for the concerned existing sewers (from MH1 to MH14), survey should be conducted to check the condition and the need of rehabilitation by the proposed development at a later stage.	The reminder is well noted. Under current SIA, the said existing sewers have sufficient capacity to cater with the proposed development. Should there be need to upgrade the said sewers when found at detailed design stage, further proposal to upgrade/rehabilitation would be proposed for departments' agreement.
DIA: (a) Corrigendum No. 1/2022 of the SDM has been issued. Please review your assessment.	Noted. The rainfall parameters to end-21st Century plus Design Allowance have been adopted for design purposes. Please refer to the updated **Appendix C** (amendment highlighted in yellow) of the revised DIA as attached in **Annex E** of the R to C). We also slightly adjust the invert level of Manhole D1, so **Appendix C** and **Figure 4a** are updated accordingly.
(b) The drains from SMH4028824 to SMH4028826, and the drains from SMH4029194 to SNH4114280 along the rare lane are very close the site, please consider reconstructing the drains such that they flow in opposite direction northward, similar to A1 to A6, so as to further relieve the following at Kiang Hsi Street in the south.	The existing drains are outside the Site Boundary and run parallel to existing foul sewers in the access lane, so there is little space available to relocate them any further from the Site and no apparent technical benefit from redirection of flow.
(c) Please also consider diverting the flow from the Northern Site northward from P2 to P3, then to A1.	The Northern Site will discharge to Manhole A1. Manholes P2 and P3 simply accept flows from local surrounding areas (Catchment R1 **(Figure 5)**, as existing), so diversion would provide no apparent technical benefit and would involve an additional length of drain from P3 to A1. Also, any diversion from P2/P3 towards Manhole A1 would be likely to affect the invert level of Manhole A1 (and downstream manholes).

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13. Transport Department (TD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 12 December 2022	
1. Paragraph 1.10 of Planning Proposal and Paragraphs 2.3.1, 2.5.2 of TIA report – It is noted that the closure of Maidstone Road near Lok Shan Road will form a cul-de-sac. Apart from the roundabout within the site boundary, please review to take up the traffic management of the remaining short section of Maidstone Road leading to the roundabout.	The said portion of Maidstone Street is outside DSP boundary and is government land. Besides, it is the run in/out of an existing residential building "80 Maidstone Road" which is outside the DSP Scheme. The users of the building have its right of way to use that remaining portion of the Maidstone Road. Therefore, URA will only manage and maintain the roundabout within the DSP boundary.
2. Paragraphs 1.10, 1.16 of Planning Proposal and Paragraph 2.3.2 of TIA report – Please confirm whether there will be a 24-hour pedestrian access within the development connecting the proposed footpath section at Kiang Su Street. If that section is mainly for the access of passengers to and from the MTR station, its traffic need cannot be justified. Instead, it may attract street management problem in the future.	As mentioned in paragraph 1.16 of the Planning Proposal and shown in **Figure 1.5** of Preliminary Design, the pedestrianized avenue/ event plaza and pedestrian connections will be opened for public use at reasonable hours. However, as according to the Appendix of Joint Practice Note No. 4 (JPN4) under Group III (Item 3), upon request of provision of covered public passageways and walkways as required by Government, URA could consider to provide not less than 3m-width at-grade passageway within the proposed pedestrianized avenue along north-south direction and along the east-west direction. That provision, according to Group III Item 3 of JPN4, shall be qualified as a covered public passageways and walkways as requested by Government and shall be GFA exempted from the proposed development. Besides, the area within the DSP Scheme will be maintained and managed by the URA or its assignee to avoid management problem in future.
3. Paragraph 1.29 of Planning Proposal and Paragraph 2.5.1 of TIA Report – Please elaborate why two vehicular access are required for the car park of the proposed development.	Two carpark entrances are proposed to serve Northern site and the Southern site separately, with allocation for private housing development and starter home development. The two separate vehicular accesses can allow future design flexibility and operation needs for two developments.
4. Table 2.3 of TIA Report – Regarding the parking provisions for community/GIC uses,	Noted. Given the project is in planning stage and subject to approval, the detailed design and actual number of parking provision for community/GIC

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please confirm with the relevant government departments).	uses shall be subject to confirmation of actual GIC facilities to be included and with further agreement with relevant GIC providers/user departments on the parking needs.
5. Paragraph 4.3.1 of TIA report – It is noted that some major developments are missing, such as URA's KC-018 and KC-019 projects and the Dedicated Rehousing Estate Development at To Kwa Wan Road. Please confirm with PlanD the updated list of projects in the vicinity and the respective planning parameters, and include their traffic impact in the TIA.	Noted. Comments from PlanD has been sought. URA's KC-018 and KC-019 projects have been included in the assessment. Development parameters of other major planned/committed developments in the vicinity are also updated and shown in **Table 4.3** (see the revised TIA report as attached in **Annex F** of the R to C).
6. Paragraph 4.5:1 of TIA report – Please elaborate the traffic trip rate adopted for the PVP.	The traffic trip rates adopted for the PVP are based on results from internal survey at Hung Hom Station public carpark.
7. Paragraph 4.5.3 of TIA report – Please advise if any illegal parking survey has been carried out to substantiate the additional number of spaces in the proposed PVP. If affirmative, please append the survey record in the report.	Despite no illegal parking survey conducted in the area, it is observed from site visits that some illegal parking was found along Maidstone lane at present. To address the local demand, about 164 parking spaces are proposed at the PVP, which is over 1.5 times of the existing 100 on-street parking spaces affected by the proposed development. It is believed that the additional parking space provision could address the parking demand in the area.
8. Paragraph 4.7.2 and Table 4.7 of TIA Report – The RC of Junction X is marginal, please review if there are any improvement measures.	It is noted that there is no change in DFC even with our proposed development. Therefore, the impact by the proposed development to this junction is insignificant and thus no improvement by us is required.
9. Paragraph 4.8.1 and Figure 4.4 of TIA report – Please review the feasibility to provide an island at Tin Kwong Road westbound of Junction B to facilitate the proposed MOC with split phase arrangement.	Please note that it is difficult to provide an island for split phase due to site constraint. Moreover, the existing MOC of westbound traffic is already in split phase without an island at Tin Kwong Road.
10. Table 4.9 of TIA Report – It is noted that the RC ratio of Junction C (Ma Tau Wai Road/ Tin Kwong Road/ Ma Hang Chung Toad) is still on the high side after the improvement. Please review and advise further improvement measures.	Please note that there is no room for further improvement of the junction due to site constraint. The proposed improvement has already changed the junction from negative R.C. (-7%) to positive (+16%), which is a significant improvement.

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11. Figure 4.6 of TIA Report – It is noted that the left-turning movement from Ma Tau Wai Road northbound at Junction G (Chi Kiang Street/Ma Tau Wai Road) will be deleted resulting from the proposed modification to Junction F (Chi Kiang Street/Ko Shan Road). Please review whether the section of Chi Kiang Street between Ko Shan Road and Ma Tau Wai Road can be converted to a two-way road to maintain the existing left-turning movement from Ma Tau Wai Road northbound. Otherwise, please advise the re-routing for the concerned movement. Please also review the road markings and traffic signs at the concerned section of Chi Kiang Street and Ma Tau Wai Road northbound.	Please note that vehicle could still left turn from Ma Tau Wai Road northbound through Anhui Street / San Lau Street / Pak Kung Street to Ko Shan Road after the proposed modification to Junction F.
12. Paragraph 5.2.5 of TIA Report – Please obtain initial agreement from MTR on the proposed underground passageways connecting the development and To Kwa Wan MTR station to support your pedestrian assessment assumption.	Liaison between URA and MTR on the proposed underground passageways connecting the development and To Kwa Wan MTR station would be carried out at appropriate time after DSP approval.
13. It is expected that traffic flow at Kau Pui Lung Road will be increased due to the redevelopment project. Please review whether improvement works is required to enhance the existing crossing facilities at Kau Pui Lung Road which are frequently used by vulnerable users, including school children and the elderly.	It is revealed that the existing crossing facilities are in good condition, sufficient visibility and no potential hazard to school children and the elderly was observed. The crossing facilities would be reviewed in detailed design stage, if necessary.
14. The Driving Services Section of TD should be consulted on the affected driving exam routes at an earlier stage.	Subject to CE in C's approval of the draft DSP, URA will submit detailed design and GBP plans for departmental comment and approval, including TD, at GBP submission stages.
15. Please arrange temporary relocation of the metered parking spaces affected by the development during construction stage.	Noted. Temporary relocation and/or phased redevelopment will be explored at detailed design/ construction stage to minimise impact to parking demand.
16. According to TPDM Vol. 5 Ch.7, Road Safety Audit (RSA) for permanent road schemes that will result in changes in road characteristics should be conducted at investigation/feasibility study, detailed design	Noted. RSA for the Project will be carried out in accordance with the requirements of TPDM at the detailed design and construction stages upon DSP approval, subject to further liaison with TD at detailed design stage.

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and construction stages to ensure that road safety implications of new road projects are fully considered for all road users. Please observe the TPDM requirement and submit the RSA findings to this office for review once available.	
17. In view of the high demand of coach parking in the district, please explore the feasibility of providing parking spaces for coaches in the PVP.	No coach parking spaces will be affected by the proposed development. Thus, no coach parking spaces will be provided in the PVP.
14. Kowloon District Planning Office, Planning Department (DPO/K, PlanD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 12 and 16 December 2022	
Air Ventilation Assessment 1. Please check and ensure the correctness of the building height of the existing developments reported in the AVA. It is noted that there are discrepancies between the building heights shown on Figure 4a and 4b and our records. Those with significant discrepancies are highlighted in yellow (see attached) for your clarification please.	Noted. **Figures 4a** and **4b** have been updated accordingly (see the revised AVA report as attached in **Annex C** of the R to C).
2. Please check and confirm whether all the major noise barriers, elevated structures, planned and committed developments within the Surrounding Area have been modelled in the simulation appropriately.	Noted. It is confirmed that all the major noise barriers, elevated structures, planned and committed developments within the Surrounding Area have been modelled in the simulation appropriately.
Consolidated Report 3. It is noted that not all the technical assessments submitted on 3.11.2022 are in full version (e.g WSIA and QRA), and the same applies to the planning report (e.g. executive summary, background, existing conditions section on technical assessments are missing). As the submissions made between 22.5.2020 and 11.3.2022 including the technical assessments are based on the previous scheme, URA should submit a consolidated version of the relevant and updated report to reflect the latest proposal and the condition within the DSP boundary (e.g.	To clarify, the Project CBS-2:KC was commenced on May 22, 2020 and the submission of the draft DSP, together with the required technical assessments, was made to Town Planning Board (TPB) on the same day. The changes in the recent submission are mainly to tally with the latest Policy Address that requests URA to provide Starter Home (SH) units. In this connection, the submission on November 3, 2022 are information to update the necessary TAs in reflecting the minor changes to accommodate SH provision and its related planning parameters and

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the number of CBSs dissolved/undissolved and planning development in the vicinity in the Planning Report). All the relevant RtoC to departmental and public comments should be included in the consolidated report. Please note that the consolidated version should not contain any new information other than those already submitted to the Town Planning Board.	notional design. There is no change to the boundary of the draft DSP as submitted in May 2020. For those TA that are not affected by the revised layout and parameters, including WSIA and QRA, they are referred to the original submission provided on May 22, 2020. The same applies to the executive summary, background information, existing condition, technical assessment sections in the original planning report submitted on May 22, 2020 to reflect the situation as of commencement time of the draft DSP in May 2020.
Public Open Space, Pedestrian Avenue, Event Plaza 4. Please advise if the proposed public open space of about 400sq.m refers as 'potential open space' in Figure 1.5. If affirmative, please revise the legend to read 'potential public open space' for clarity. Please advise the maintenance and management responsibility of the POS.	Please be clarified that the "potential open space" shown in **Figure 1.5** (see **Part 3** of the R to C) includes both the 400sq.m. public open space and other kinds of open space, such as pedestrian avenues and event plaza, that will be provided in the Scheme for public use at reasonable hours. The specific location of the 400sq.m. POS shall be subject to detailed design. The management and maintenance of the POS shall be subject to liaison with relevant government departments and to be determined before land grant.
5. Please advise the minimum width of the Pedestrian Avenue.	It is proposed to have a minimum 15m podia separation along the N-S pedestrianized avenue, with any footbridges, canopies, architectural features, open-side decks, sitting area and circulation space, etc., shall be allowed in between the podia, where appropriate and practicable, in the proposed development. Actual design is subject to practicability and minor adjustment at detailed design stage to maintain design flexibility.
6. Please indicate the location of event plaza in Figure 1.5.	To maintain design flexibility, indicative locations of the potential open space for event plaza are shown in **Figure 1.5** (see **Part 3** of the R to C), which will be confirmed in the detailed design stage.

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Pedestrian Network 7. According to Para. 1.17 of the Planning Report, a multi-level pedestrian network is proposed. Please provide a plan illustrating the overall multi-level pedestrian linkages so that the overall restructuring of pedestrian network could be fully appreciated.	**Figure 1.6** is prepared for illustrating the overall multi-level pedestrian linkages of the proposed Scheme (see **Part 3** of the R to C).
8. Please advise if the 1) at-grade pedestrian avenue, 2) underground connection to the MTR station at basement level and 3) possible elevated bridge/deck linkages respectively are open to public, and their opening hours. Please note that the existing Maidstone Road area is currently a public road and is open to public at all time. The same should be maintained in future for pedestrian access. Justification should be provided if the at-grade pedestrian avenue is not open for public use 24 hours daily.	It is URA's intention to maintain the (1) at-grade pedestrian avenue for public access at reasonable hours to avoid disturbance to the residents of above residential developments late at night. However, as according to the Appendix of Joint Practice Note No. 4 (JPN4) under Group III (Item 3), upon request of provision of covered public passageways and walkways as required by Government, URA could consider to provide not less than 3m-width at-grade passageway within the proposed pedestrianized avenue along north-south direction and along the east-west direction. That provision, according to Group III Item 3 of JPN4, shall be qualified as a covered public passageways and walkways as requested by Government and shall be GFA exempted from the proposed development. (2) The opening hours of the underground pedestrian passageway with retail facilities connecting the MTR station will be subject to detailed design, but in general, be open for public use during the opening hours of the non-domestic portion. (3) Under current design, the elevated bridge/deck linkages will be accessible by residents of the proposed development only.
9. Please advise if underground shopping street is still part of the proposed scheme. If affirmative, its preliminary concept including layout.	The underground shopping street within the Scheme area is part of the proposed scheme. Design of the underground layout will only be commenced after DSP approval.

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Visual Corridors and AVA Wind Enhancement Features 10. Para. 1.19 and 1.20 of the Planning Report – Please advise the width of the two ventilation corridors, and whether they are also refer as visual corridors in Para. 1.19.	It is proposed to have a minimum 15m podia separation along the N-S pedestrianized avenue and 23m podia separation along Kiang Su Street in E-W direction, with any footbridges, canopies, architectural features, open-side decks, sitting area and circulation space, etc., shall be allowed in between the podia, where appropriate and practicable, in the proposed development. The design is subject to minor change with agreement with Planning Department at detailed design stage to maintain design flexibility. The two ventilation corridors shall serve as visual corridors to enhance visual comfort in the area.
11. Please provide a diagram indicating all the proposed design measures (with dimensions) under the proposed scheme (140mPD scheme), including the building separations and ventilation corridors.	A diagram with indicative dimensions of building separations is provided in **Figure 1.1** of **Appendix 2** of the revised AVA report as attached in **Annex C** of the R to C.
The DSP Plan 12. Areas without any zoning on the Plan, i.e. those pavements and road areas should be zoned 'Road' accordingly. Please revise the Plan adopting the format of To Kwa Wan Road/Wing Kwong Street DSP by annotating these areas as 'Major Road and Junction'.	Noted. The draft DSP has been revised accordingly (see **Part 2** of the R to C).
Figure 1.5 in the Part 5 Preliminary Design 13. Please add the annotation for the GIC block oppose to T6 and T7.	Noted. Annotation for the GIC block has been added on **Figure 1.5** (see **Part 3** of the R to C).

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14. Legend for the red dotted line is missing (see below). 	Noted. Legend for the red dotted line has been added on **Figure 1.5** (see **Part 3** of the R to C).
Plan 7 of the Planning Report (URA's submission in May 2020) 15. The Planning Report states there are 30 CBS sites developed under 28 CBSs, however, only 29 CBS sites are indicated on Plan 7. Please clarify.	It is to clarify that there are 30 CBS sites under 28 CBSs within the site boundary as stated in the Planning Report (May 2020). **Plan 7** of the Planning Report of the submission in May 2020 has been updated (see **Annex G** of **Part 4** of the R to C).
16. Please confirm if Table 3.1 showing that there are 19 out of 28 CBSs dissolved, and 9 out of 28 CBSs undissolved is still valid. Should there be any updates on the ownership status of the CBSs, relevant paragraphs in the Planning Report should be updated.	There are 30 CBS sites under 28 CBSs within the site. As of December 2022, among the 28 CBSs, there are currently 20 dissolved CBSs and 8 undissolved CBSs as at January 2023. Relevant paragraphs and table in the Planning Report have been updated accordingly (see **Annex H** of **Part 4** of the R to C).
Appendix 10 – Tentative Implementation Programme (URA's submission in May 2020) 17. Please update the implementation programme.	Noted. The implementation programme has been updated accordingly. (see **Annex I** of **Part 4** of the R to C).
15. Urban Renewal Section, Lands Department (UR, LandsD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 22 December 2022	
c. It is noted that GIC facilities provision of not less than 2,500m^2 is proposed. URA is required to advise what GIC facilities will be provided; and their management and maintenance party.	The type of GIC facilities and their management and maintenance parties will be subject to the liaison with relevant departments to confirm funding and facilities after CE-in-C's approval of the DSP for subsequent land grant preparation.

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d. Presumably, the "covered area" and "commercial/retail components" included within the pedestrianized avenue/event plaza as proposed by URA (para. 1.15 of the Planning Proposal in Part 4 of the Submission ("Part 4") refers) are GFA countable. Would PlanD please clarify with URA.	Please note that GFA calculation of the proposed "covered area" and "commercial/retail components" included within the pedestrianized avenue/event plaza will be complied with the requirements and procedures as set out in JPN4.
e. According to para. 1.16 of Part 4, "The pedestrian avenue/event plaza will form part of the proposed development and will be maintained and managed by the URA or its assignees…", URA is to clarify what "its assignees" are referred to.	"Its assignees" refers to the party(ies) to be appointed by the URA to maintain and manage the pedestrian avenue/event plaza. Similar practice were adopted in many other URA projects previously. The maintenance and management arrangement of the proposed pedestrian avenue/event plaza will be ascertained at the land grant stage.
g. It is noted from para. 1.5 of Part 4 that "… basement floor, which is proposed to be connected with the MTR To Kwa Wan Station directly…" is proposed by URA. We reserve comments at this preliminary stage from land administration point of view when the detailed proposal has not yet been available from URA.	Noted. Liaison between URA and MTR on the proposed connection between the site and the MTR To Kwa Wan Station at the basement floor would be carried out at appropriate time after DSP approval.
h. Any proposed road works in relation to the Scheme including the closure of roads/lanes is subject to the Roads (Works, Use and Compensation) Ordinance (Cap. 370). URA is required to seek comments from relevant departments including TD and HyD concerning their proposed road works for proceeding with the relevant procedures (including gazettal of Plan and Scheme as necessary) under Cap. 370.	Noted. TD and HyD's comments are sought in parallel in this submission. Road scheme application and gazettal procedures following Cap. 370 will be made for proposed road closure after CE-in- C's approval of the DSP.
i. Should the application be approved by the Town Planning Board, URA is required to submit land grant application to LandsD for implementation of the private residential/SH/commercial development proposal on the Scheme area. Appropriate lease conditions will be considered at later stage after the planning approval is granted. If the land grant is approved by LandsD acting in its capacity as the landlord, it will be subject to such terms and conditions as considered appropriate by LandsD at its absolute	Noted.

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discretion, including but not limited to payment of premium and administrative fee.	
j. Our previous comments set in paras. (a), (d), (e), (f) and (h) of our memo dated 15.6.2020 (copy attached) are still valid. LandsD's comments set out in paras. (a), (d), (e), (f) and (h) of memo dated 15.6.2020:	
(a) The Scheme comprises 30 private lots, public road and pavement. The private lots involved 30 Civil Servants' Co-operative Building Society (CBS) Scheme sites.	Noted.
(d) <u>Proposed Road Closure of Portion of Maidstone Road, Kiang Su Street and the Rear Lanes behind the Existing Buildings</u>	
- TD and HyD are requested to comment on the proposed closure of portion of Maidstone Road and Kiang Su Street and the rear lanes behind the existing buildings.	Noted. TD and HyD's comments are sought in parallel in this submission. Road scheme application and gazettal procedures following Cap. 370 will be made for proposed road closure after CE-in- C's approval of the DSP.
- A section of Maidstone Road in the Scheme area will remain open after redevelopment. The applicant is required to clarify the management and maintenance party of the road concerned.	It is proposed that the URA or its joint venture partner(s) or its assignee(s) as the party for the management and maintenance responsibility of that section of Maidstone Road within the Scheme area (i.e. mainly the cul-de-sac).
(e) <u>Provision of Public Car Park (Para. 4.9 and Notes to the draft DSP)</u>	
- A Public Car Park is proposed in the basement of the URA site. TD and HyD are requested to comment on the proposed provision of the Public Car Park.	Noted. TD and HyD's comments are sought in parallel in this submission.
- The applicant is required to clarify the management and maintenance party of the Public Car Park.	It is proposed that the URA or its joint venture partner(s) or its assignee(s) as the party for the management and maintenance responsibility of the Public Vehicle Park, subject to final liaison and agreement with relevant government departments.

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(f) Provision of Open Space and Pedestrianised Avenue/Plaza for Public Use (paras 4.16 & 4.26)	
- It is noted that not less than 400 m^2 of open space will provided for public use. The applicant is required to clarify which party will take up the management and maintenance responsibility of the proposed Open Space. I must emphasize that the management and maintenance responsibilities of public facilities should not be passed onto the future individual flat owners.	Noted. The management and maintenance of the 400sq.m. POS shall be subject to liaison with relevant government departments and to be determined before land grant. For the pedestrianized avenue/ event plaza proposed within the DSP, it is proposed that the URA or its joint venture partner(s) or its assignee(s) to be the party for the management and maintenance responsibility for public enjoyment at reasonable hours and for place making to enhance vibrancy and promote usage in addition to amenity function. The detailed arrangements will be dealt with in the land grant/DMC. M&M of these facilities will not pass to individual flat owners of the development.
- It is proposed that the proposed Open Space and the Pedestrianised Avenue/Plaza will be open for public use at "reasonable hours". In the event that it is required to impose such requirement in the proposed land grant, the exact opening hours will be specified in consultation with PlanD to reflect the planning intention.	
(h) For other various technical assessments appended in the Report, I would rely on other concerned departments to provide their expert comments on the proposal/assessments respectively.	Noted.
16. Buildings Department (BD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 10 January 2023	
(a) Extinguishment of Streets Lanes	
(i) For proposed development scheme involving extinguishment of existing streets/lanes and projections in, under, over and/or upon such, application for exemption from Section 31(1) of the BO might be considered subject to favourable comments from relevant government departments.	Noted. The extinguishment of existing streets/lanes and projections, application of GFA exemptions, will comply with the relevant BO and relevant ordinances/regulations and be demonstrated at the GBP submission stage for approval.
(ii) Noting that existing streets/lanes would be include in the proposed development	Noted. Please refer to above response to (i).

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schemes, URA is required to ensure that the proposed development schemes should not result in contraventions of the BO and its allied regulations in the adjacent existing building in terms of site access, site classification, provision of natural lighting and ventilation (L&V), fire resisting construction (FRC), means of escape (MoE), emergency vehicular access (EVA) and drainage connection, etc.	
(iii) Noting that the drainage system along the existing streets/lanes within the subject site also serves the adjoining buildings, please consult Drainage Services Department on this issue if necessary in order to maintain the drainage connection for the adjoining buildings.	Noted. Please refer to above response to (i). Comments from DSD is sought in parallel in this submission.
(iv) It appears that the scheme boundary of the proposed development would abut/encroach on the exit route of MTR To Kwa Wan Station, hence, adversely affecting the means of escape of the station. You are advised to consult the MTR Corporation Limited, Fire Services Department, Railway Development Office of Highways Department, Electrical and Mechanical Services Department and Lands Department in this regard.	Noted. Comments from FSD, HyD, and EMSD are sought in parallel in this submission. MTRC will be consulted at appropriate time after DSP approval.
(b) Site Area with Streets/Lanes Pursuant to regulation 23(2)(a) of Building (Planning) Regulations (B(P)R), street including lanes should be excluded from site area for the purpose of site coverage (SC) and plot ratio (PR) calculations unless exempted.	Noted. Under the replanning and restructuring of the Scheme, some existing roads and lanes within the Scheme are proposed to be closed permanently to form part of the site. The proposed road closure works will be gazetted under Roads (Works, Use and Compensation) Ordinance (Cap. 370) and are proposed to be included for SC and PR calculation.
(c) Underground Shopping Street (USS) outside site Please note that the land stratum under street (i.e. USS and possible underground connection to MTR To Kwa Wan Station (UC), etc.) outside individual site should not	Noted. The proposed underground passageway/underground shopping street (USS) are within the DSP scheme boundary. Detailed design of the proposed USS will be made at

Departmental Comments	Responses
create a separate notional site or generate notional site areas to any individual site; and street and the land stratum outside site should be excluded from site areas for PR and SC calculations under B(P)R for each individual site. In addition, such USS/UC should be included in gross floor areas calculations and the resultant PR (based on the site area excluding USS/UC) should not exceed the limits under the B(P)R.	detailed design stage for GBP submission for approval in accordance to B(P)R and relevant Ordinance/ Regulations.
(d) Covered Pedestrianised Avenue The covered pedestrianised avenue should be included in GFA and SC calculations under B(P)R. However, GFA exemption may be considered subject to compliance with the criteria stipulated in PNAP APP-108 and full justifications provided by AP at building plan submission stage.	Noted. Under the replanning and restructuring of the Scheme, the existing Maidstone Street within the Scheme is proposed to be closed permanently and turned into a pedestrianized avenue to form part of the site. However, as according to the Appendix of Joint Practice Note No. 4 (JPN4) under Group III (Item 3), upon request of provision of covered public passageways and walkways as required by Government, URA could consider to provide not less than 3m-width at-grade passageway within the proposed pedestrianized avenue along north-south direction and along the east-west direction. That provision, according to Group III Item 3 of JPN4, shall be qualified as a covered public passageways and walkways as requested by Government and shall be GFA exempted from the proposed development. After CE in C approval of the draft DSP, the road closure shall be subject to separate gazettal procedures under Cap. 370 and the closed section will be included in the land grant preparation for departmental comment.
(e) Exemption of Government, Institution or Community (GIC) Facilities In general, the GIC facilities should be accountable for domestic/non-domestic PR / GFA calculations according to their respective use in accordance with B(P)R. However, under Joint Practice Note No. 4, for such GIC facilities that would become Government	Noted.

Departmental Comments	Responses
Accommodation (GA) (i.e. these provisions will be handed over to the Government as required under the lease), the Buildings Department may consider exempting the GA from PR/GFA calculations if the GA will be exempted from GFA calculations under the new / amended Outline Zoning Plan and the provision of such GA is included in the corresponding leases.	
(f) Compliance with the BO All building works are subject to compliance with the BO. Detailed comments under the BO on individual sites for private developments such as permissible PR, SC, MoE, FRC, L&V, emergency vehicular access, private streets, and/or access roads, open space, barrier free access and facilities, compliance with the sustainable building design guidelines, etc. will be formulated at the building plan submission stage.	Noted.
17. Fire Services Department (FSD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 10 January 2023	
Please be informed that I have no specific comment on the captioned plan subject to water supplies for firefighting and fire service installations being provided to the satisfaction of the Director of Fire Services. 2. Detailed fire services requirements will be formulated upon receipt of formal submission of general building plans. 3. The EVA provision shall comply with the standard as stipulated in Section 6, Part D of the Code of Practice for Fire Safety in Buildings 2011, which is administered by the Buildings Department. 4. In addition, as the development may involve basement, Para.5 in Part 1 of FSD Circular Letter 4/96 shall be complied with.	Noted.

市區重建局
URBAN RENEWAL AUTHORITY

Our Ref: URA230313384

By Email

21 March 2023

The Secretary,
Town Planning Board,
15/F, North Point Government Offices,
333 Java Road, North Point, Hong Kong

Dear Sir/Madam,

Draft Development Scheme Plan for the Urban Renewal Authority
Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
- Responses to Departmental Comments, Batch 10 -

We refer to our submission of the captioned draft Development Scheme Plan (DSP) to Town Planning Board (TPB) dated 22 May 2020 and the subsequent submission on the enhancement scheme of the captioned draft DSP dated 3 November 2022. With the Departmental Comments received via Kowloon District Planning Office's emails on 17 March 2023, we would like to enclose our Responses to Comments (R to C) to the departmental comments for your necessary action.

Please note that the information contained in the R to C is mainly technical clarifications to address various comments and there is no fundamental change to the submitted draft DSP. We consider that the information provided will be sufficient for the TPB to consider the draft DSP in due course.

Should you have any enquiry, please feel free to contact Ms. Charis Leung at 2588 2058. Thank you for your kind attention.

Yours faithfully,

Mike Kwan
General Manager
Planning & Design

encl.

c.c. (w/e – by email)
Kowloon DPO, PlanD (Attn: Mr. Jon Mak, STP/K2)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (10th batch)

Table of Content:

Ref. Nos.	Departments
1.	Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – Air ventilation perspective
2.	Environmental Protection Department (EPD)
3.	Transport Department (TD)

URA Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

Responses to Departmental Comments (10th batch)

Departmental Comments	Responses
1. Urban Design and Landscape Section, Planning Department (UD&L, PlanD) – from air ventilation perspective	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 17 March 2023	
Please find attached UD's comments on Para. 7.14 of the ES on Air Ventilation.	Noted. Para. 7.14 of the ES has been revised accordingly (see **Annex 1** of the R to C).
2. Environmental Protection Department (EPD)	
Received by email from TP/K10, DPO/Kowloon, PlanD dated 17 March 2023	
In view of the limited time available for reviewing the submission, we are unable to provide detailed comments on the updated assessments in the R-to-C submission. Nevertheless, our comments on the URA DSP vide our email dated 21.2.2023 remain applicable and should be reflected in the TPB paper accordingly. Overall, insurmountable environmental impacts arising from the proposed DSP are not anticipated. To ensure proper evaluation of noise, sewerage and land contamination issues, and implementation of necessary mitigation and remediation measures, relevant special conditions are recommended to be imposed in the future land title document.	Noted.
Regarding the R-to-C submission, we have the following observations: (i) <u>Noise</u>: According to the R-to-C, full compliance with the traffic noise planning standard of 70dB(A) is still not achieved based on the submission. URA should exhaust all practicable noise mitigation designs/measures to minimise the traffic noise impact.	Noted. URA will explore on practicable noise mitigation measures at detailed design stage.
(ii) <u>Land Contamination</u>: Item 3.4.(iii) of URA's response to comment on land contamination is misguided and misleading. It is inappropriate and unjustified to state that land contamination assessment would "*impose time implication to the future implementation programme and delay of housing supply of the Project*". In this regard, URA may review their previous R-to-C submissions and note	As responded in our R to C Batch 9 (March 2023), desktop study with aerial photos and required documentary justification can be provided at detailed design stage if EPD considers necessary to justify any need to add special condition in land grant.

Departmental Comments	Responses
that they have been advised repeatedly since July 2020 to confirm with documentary justifications to substantiate whether there is any potential land contamination issue arising from the past and present land use activities in the Project site according to the prevailing guidelines. Despite our repeated advice and the fact that there are no insurmountable difficulties in preparing such information at the current planning stage, it was URA's decision to defer the assessment to a later stage after approval of the DSP by CE-in-C. Unless URA would provide documentary justifications to substantiate there is no potential land contamination issue arising from the past and present land use activities in the Project site, a suitable mechanism, e.g. special condition in land grant, should be in place to ensure the issue is suitably followed up.	
3. Transport Department (TD)	
Further Comments Received by email from TP/K10, DPO/Kowloon, PlanD dated 17 March 2023	
(3) Please elaborate the time for your mentioned "reasonable hours". Please consider the pedestrainised avenue, pedestrian connection and the potential public open space to be opened for 24 hours to the public as there are elderly homes at the Kau Pui Lung Road.	For at-grade pedestrianised avenue and pedestrian connection, it is intended to open for public access at reasonable hours to avoid disturbance to the residents of the above residential development. Taking examples of some POS within private developments such as in URA Kwun Tong Town Centre development, the opening hours is from 9a.m. to 10p.m. daily. The actual opening hours of the pedestrian avenue/pedestrian connection will be determined at land grant stage. For the potential POS in the Scheme, it will be subject to liaison and agreement with relevant government departments including LCSD to determine the future opening hours.
(8) Please be noted that the attraction of coaches/ tourists to the area is due to the type of	The reason for not providing coach parking is provided in our R to C (Batch 9 (March 2023)).

Departmental Comments	Responses
restaurants / shops nearby, instead of the provision of coach parking spaces. It is recommended to provide coach parking spaces in the PVP. Nonetheless, we take note of the site constraints, please provide the swept path analysis for the 12m long vehicle at the basement carpark for our reference.	Attached please also find the swept path for a 12m coach to enter and leave the basement car park level 1 (**Annex 2** of the R to C). As shown in the plan, the designed car ramp cannot cater for the turning radius of a 12m coach leaving the site. A wider car ramp will be needed and it will encroach into the proposed basement pedestrian passageway and necessary staircases/E&M space, which is not preferred as it would jeopardise the continuous basement passageway and retail provision in the proposed development.

Management of the underground public vehicle park will be arranged at the development stage.

Government, Institution or Community (GIC) Facilities

7.12 To meet the need for community facilities in the vicinity and the increased population after redevelopment, GIC uses are proposed in the Development Scheme. Not less than 2,500m^2 non-domestic gross floor area would be proposed for GIC use in the GIC block or within the non-domestic portion of the development, subject to confirmation of usage and funding from relevant Government departments. In order to facilitate provision of GIC facilities, in determining the relevant maximum plot ratio of the development and / or redevelopment, any floor space that is constructed or intended for use solely as GIC facilities, as required by the Government, may be disregarded.

Landscaping and Greening

7.13 A cohesive landscaping, tree planting and greening will be provided in the pedestrianised avenue / event plaza and POS to meet the Sustainable Building Design (SBD) Guidelines to enhance the local streetscape and walking environment. According to SBD Guidelines, minimum site coverage of greening of 20% of the net site area will be provided.

Air Ventilation

7.14 According to the air ventilation assessment report (AVA 2022) for the proposed development, two major wind enhancement features will be provided, i.e. a minimum 15m-wide breezeway along the pedestrianised avenue for north-south wind flow; and a minimum 20m-wide podium separation along Kiang Su Street for east-west wind flow, with footbridges, canopies and architectural features provided in between the podia. Various building and podium separations are also provided where appropriate and practicable to enhance the local pedestrian wind environment. The two major wind enhancement features should be incorporated in the design and layout of the developments in the "R(A)"zone. In the event that the two proposed wind enhancement features are not adopted in the future design scheme, further AVA study should be conducted by the project proponent in accordance with the

joint HPLB-ETWB Technical Circular No. 1/06 on Air Ventilation Assessment (or its latest version) for demonstrating that the performance of any future development would not be worse than the proposed scheme adopted in the AVA 2022.

8. IMPLEMENTATION OF THE DEVELOPMENT SCHEME

8.1 The proposals set out in the Plan form an integral part of the Development Scheme for the Area.

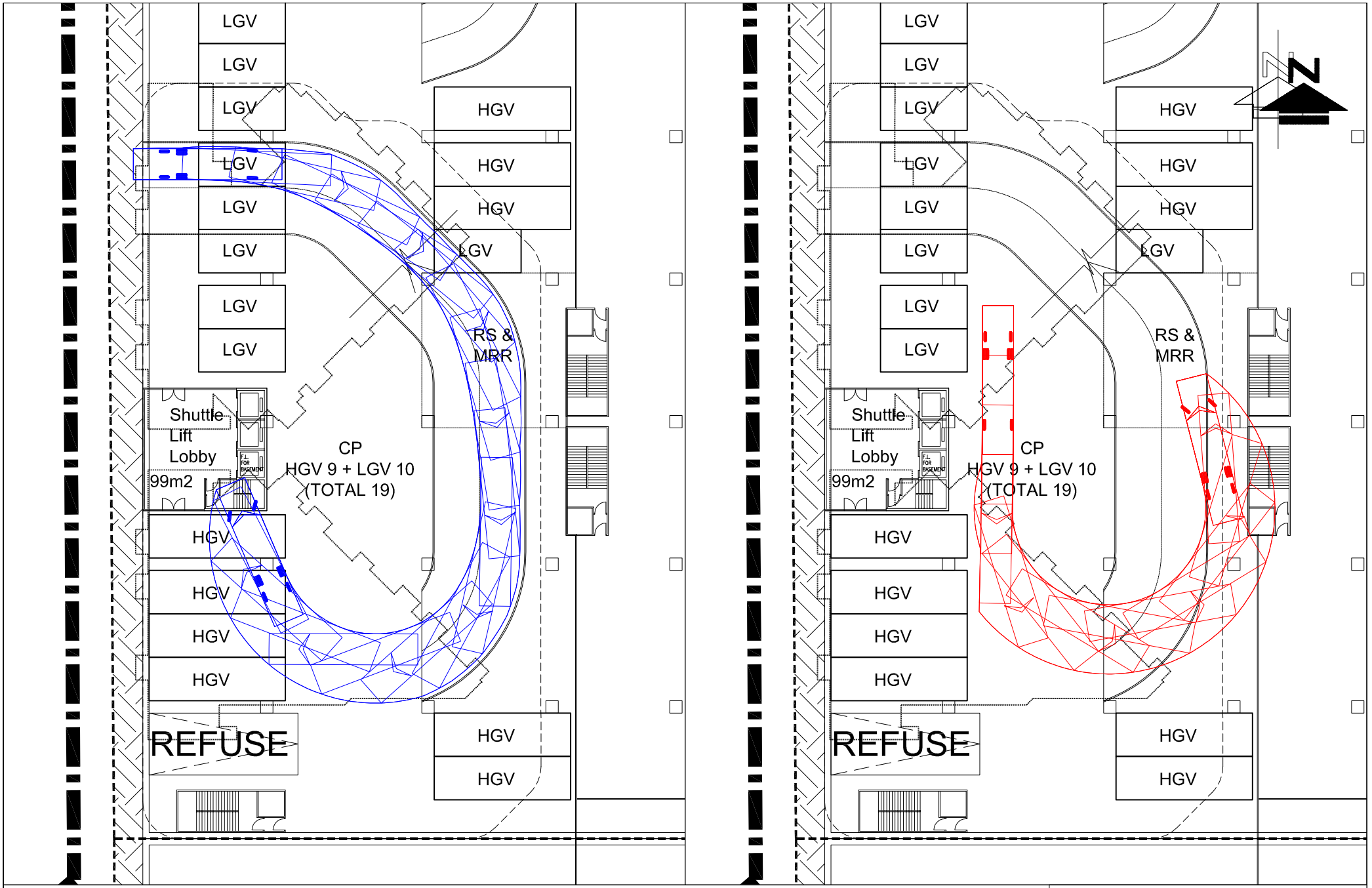
8.2 The URA does not own or lease any land within the boundaries of the Development Scheme and intends to acquire the properties within the Area of the Development Scheme. With respect to any of such properties which cannot be acquired by purchase, the Secretary for Development would consider, upon the application of the URA, recommending to the CE in Council the resumption of properties under the Lands Resumption Ordinance, if necessary.

8.3 All eligible tenants will be offered an ex-gratia payment package in accordance with the URA's policy. The URA has already entered into agreement with the Hong Kong Housing Society (HKHS) and the Hong Kong Housing Authority (HKHA) for the purpose of making available rehousing units by HKHS or HKHA to rehouse affected tenants who satisfy the eligibility criteria of HKHS or HKHA.

8.4 Non-domestic tenants (if any) of properties acquired by the URA whose tenancies are terminated by the URA due to implementation of the Development Scheme may be offered an ex-gratia allowance to assist in their business relocation.

8.5 Details of the acquisition, compensation and rehousing policies are subject to the URA's prevailing policies at the time of acquisition. The URA may implement the Development Scheme on its own or in association with one or more partners.

TOWN PLANNING BOARD
MARCH 2023



SP-01 - SWEPT PATH ANALYSIS OF COACH ON NORTH SITE

22101HK - SCALE 1:400@A4 - 20230320

LEGEND :

SWEPT PATH (IN)

SWEPT PATH (OUT)

The 3rd Meeting of
the Housing and Development Planning Committee (HDPC) of
the Kowloon City District Council (KCDC)

Date:	23 June 2020 (Tuesday)	
Time:	2:30 p.m.	
Venue:	Conference Room, Kowloon City District Office	

Present:

Chairman:	Mr LAI Kwong-wai	
Vice-chairman:	Mr WONG Wing-kit	
Members:	Miss CHAU Hei-man	
	Ms LEUNG Yuen-ting	(Left at 5:02 p.m.)
	Mr PUN Kwok-wah, JP	(Left at 5:20 p.m.)
	Mr LEE Hin-long	(Arrived at 2:37 p.m.) (Left at 6:15 p.m.)
	Mr KWOK Tin-lap	(Arrived at 2:54 p.m.)
	Mr LAM Tak-shing	(Left at 5:40 p.m.)
	Mr YUM Kwok-tung, Pius	
	The Hon LEE Wai-king, Starry, SBS, JP	(Arrived at 3:29 p.m.) (Left at 6:05 p.m.)
	Mr YEUNG Chun-yu	
	Mr TSANG Kin-chiu	
	Mr SIU Leong-sing	
	Miss MAK Sui-ki, Jakki	
	Mr FUNG Man-tao, Joshua	
	Mr HE Huahan	(Left at 5:02 p.m.)
	Dr KWAN Ka-lun	
	Mr MA Hei-pang	
	Mr NG Po-keung, MH	(Arrived at 4:09 p.m.) (Left at 5:40 p.m.)
	Mr HO Hin-ming, BBS, MH	
	Mr CHO Wui-hung, MH	(Left at 4:12 p.m.)
	Mr CHEUNG King-fan	(Left at 5:02 p.m.)
	Mr YANG Wing-kit	(Left at 4:53 p.m.)
	Dr KWONG Po-yin	(Arrived at 2:38 p.m.)

Secretary:	Mr CHIU Tai-wai, David	Executive Officer I (District Council), Kowloon City District Office
In Attendance:	Miss TSE Yik-ching, Alison	Assistant District Officer (Kowloon City)
	Miss MAK Wai-man, Sandy	Senior Liaison Officer (Building Management), Home Affairs Department
	Mr MAK Chung-hang	Senior Town Planner / Kowloon 2, Planning Department
	Mr CHIU Ying-cheung	Senior Property Service Manager (Kowloon West and Sai Kung), Housing Department
	Ms Alisa TSE	Senior Building Surveyor / E3, Buildings Department
	Mr MA Chun-hang	Engineer / Kowloon (Customer Services) Inspection, Water Supplies Department
Attendance by Invitation:		
Item 2, 3 and 12	Mr KWAN Yee-fai, Mike	General Manager (Planning and Design), Urban Renewal Authority
	Ms NG Po-shan, Austen	Senior Manager (Acquisition and Clearance), Urban Renewal Authority
	Mr Eugene YUE	Senior Manager (Community Development), Urban Renewal Authority
Item 4	Mr WONG Wing-hung, Stephen	Project Director 2, Transport and Housing Bureau
	Ms LEE Lee	Senior Project Manager 1, Transport and Housing Bureau
	Mr FUNG K. M., David	Assistant Chief Executive Officer, St. James' Settlement

	Mr WONG C. M, Raymond	Senior Manager (Family and Counselling Services), St. James' Settlement
	Mr CHAN Yiu-lun	Project Manager, St. James' Settlement
	Mr NG Sze-on, Song	Service Supervisor (Community Development Services), St. James' Settlement
Item 6	Ms YAN Sin-wah	Senior Manager (Community Development), Urban Renewal Authority
	Mr LEE Wing-kong, Daniel	Acting General Manager (Rehabilitation), Urban Renewal Authority
Item 7	Ms YAN Sin-wah	Senior Manager (Community Development), Urban Renewal Authority
	Mr LEE Wing-kong, Daniel	Acting General Manager (Rehabilitation), Urban Renewal Authority
	Mr LEUNG Kwok-wai	Acting Assistant Division Officer (Building Improvement)1, Fire Services Department
	Mr YIM Ying-kei	Senior Station Officer (Building Improvement)1, Fire Services Department
Item 8	Ms YAN Sin-wah	Senior Manager (Community Development), Urban Renewal Authority
	Mr LEE Wing-kong, Daniel	Acting General Manager (Rehabilitation), Urban Renewal Authority

	Mr CHEUNG Ka-yu, Gary	Electrical and Mechanical Engineer/General Legislation 8, Electrical and Mechanical Services Department
Item 9	Mr LAM Hang-yue, Robert	Estate Surveyor/Urban Renewal 7 (Urban Renewal Section), Lands Department
	Ms Oryza CHUNG	Senior Manager (Acquisition and Clearance), Urban Renewal Authority
	Ms YAN Sin-wah	Senior Manager (Community Development), Urban Renewal Authority
Item 11	Mr TAI Tak-chung	Senior Engineer/Sewage Treatment 2/1, Drainage Services Department

* * *

Opening Remarks

1. **The Chairman of the Housing and Development Planning Committee (HDPC)** welcomed Members, representatives of government departments and attendees to the meeting.

2. Before discussing the agenda items, **the Chairman** reminded Members to declare interests in accordance with the Standing Orders of the Kowloon City District Council (Standing Orders). If Members' property rights, occupation or investment, etc. involved conflict of interest with the items to be discussed later, they should make a declaration before the discussion so that he would consider if the members concerned should withdraw from the discussion or voting. In addition, according to Order 36(2) of the Standing Orders, the quorum for the committee meetings was half the number of committee members. As HDPC had 24 members, once there were less than 12 members present at the meeting, the Chairman would adjourn the discussion immediately. Also, in view of the updates of the pandemic, **the Chairman** requested Members to grasp the time for making speeches to prevent the duration of the meeting

from being unduly long so as to reduce social contact and minimise the risk of community transmission.

Confirmation of Minutes of Last Meeting

3. **The Chairman** declared that the minutes of the 2nd meeting were unanimously endorsed by Members without amendments.

Urban Renewal Authority
Shing Tak Street / Ma Tau Chung Road Development Project (CBS-1:KC)
Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
(Paper No. 28/20)
Concern over Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
(Paper No. 29/20)
Motion: Request to the Urban Renewal Authority for Organising a Briefing on Urban Renewal As Soon As Possible to Allay Public Concerns
(Paper No. 38/20)

4. **The Chairman** stated that as the three aforementioned items were all related to the development plans of the Urban Renewal Authority (URA), after consulting Members, he announced that the three items would be discussed together. He also invited Members to refer to the written reply submitted prior to the meeting, i.e. Document No. 1 tabled.

5. **Mr Mike KWAN, General Manager (Planning and Design) of URA,** presented Paper No. 28/20, with the main points as follows:

(i) In the 2018 and 2019 Policy Address, the Government urged URA to explore and identify one to two lots for the Civil Servants' Co-operative Building Society Scheme (CBS) which were suitable for high-density development as pilot sites for redevelopment in accordance with the URA's prevailing project implementation approach, in a bid to boost the housing supply, with some of the land recovered earmarked for public housing development. In response to the call, URA announced in a gazette notice the commencement of the above two pilot projects on 22 May 2020.

(ii) URA implemented the Shing Tak Street / Ma Tau Chung Road Development Project (CBS-1:KC) and the Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) in accordance with Section 26 and 25 of the Urban Renewal Authority Ordinance respectively and the difference between the two projects was that the latter involved changes in the use of the outline zoning plans.

Shing Tak Street / Ma Tau Chung Road Development Project (CBS-1:KC)

(iii) CBS-1:KC was located at Shing Tak Street, Ma Tau Kok Road and Ma Tau Chung Road with a total site area of about 5 200 square metres. The buildings to be rebuilt were aged more than 50 years and all of them did not have lifts. Nine CBSs and about 154 households were involved while the actual number of affected households would not be available until the result of freezing survey was released.

(iv) As CBS-1:KC was adjacent to Ma Tau Wai Estate and a number of bus stops were installed at Ma Tau Chung Road, URA planned to widen the adjoining footpaths in order to relieve the crowded condition at the bus and mini-bus waiting area facing Ma Tau Chung Road.

(v) According to the standards and guidelines of the Planning Department (PlanD), the proposed development parameters of CBS-1:KC would be calculated with reference to the development approach of urban Kowloon, meaning that the domestic plot ratio would be 7.5 while the non-domestic plot ratio would be 1.5. The Authority proposed to provide around 640 medium and small-sized residential flats at the preliminary stage and the gross floor area would be around 38 000 square metres, including about an overall floor area of 32 000 square metres for residential use and around 6 000 square metres of shop space.

(vi) The consultation period for CBS-1:KC was between 22 May 2020 and 22 July 2020. Members of the public were welcome to submit general views (including both supporting or opposing views) in

written form within the consultation period. The Authority would refer objections which were not withdrawn to the Secretary for Development for consideration. The Secretary for Development would then decide whether to carry out this development project or not, and those who raised objections could lodge an appeal within 30 days after the decision concerned was made. If no appeal was lodged or the appeal procedure concluded, the Authority would then make acquisition offers to the property owners concerned. In case of no appeal, the procedure would be completed within nine to 12 months starting from 22 May 2020.

Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)

(vii) CBS-2:KC was located at Kau Pui Lung Road, Chi Kiang Street, Maidstone Road, Lok Shan Road and Kiang Su Street with a total site area of about 16 500 square metres. The buildings to be rebuilt were more than 50 years old and all of them did not have lifts. 28 CBSs and about 462 households were involved. As the development scheme involved changes in the use of the outline zoning plans, the Authority had submitted it to the Town Planning Board (TPB) for consideration on 22 May 2020.

(viii) URA planned to pedestrianise a portion of Maidstone Road and Kiang Su Street through restructuring and re-planning so as to segregate pedestrians and vehicles as well as strengthen the linkage between north/south areas and east/west areas in the district. The Authority would build a piazza which would be integrated with the pedestrian walkway to provide the community with open spaces for various uses. In addition, the Authority also planned to build an underground shopping street which would connect two MTR station entrances, forming a multi-level pedestrian network. Underground space would also be utilised to house an underground car park, providing around 400 car parking spaces, about 140 of which were dedicated for public use.

(ix) The Authority initially proposed to provide around 2 500 medium and small-sized residential flats and the overall floor area for residential

use would be around 122 000 square metres. In addition to the shop space of about 12 000 square metres, the gross floor area would be around 134 000 square metres. URA would reserve some of the land at the southern part of the site for the Transport and Housing Bureau (THB) for developing public housing. It was estimated that around 950 medium and small-sized residential flats would be provided and the domestic gross floor area would be around 45 000 square metres.

(x) As URA had already submitted the development scheme to TPB for consideration on 22 May 2020, TPB carried out a public consultation and collected opinions in respect of the scheme from 29 May 2020 to 19 June 2020. In addition, anyone with views concerning the scheme could make submissions to THB before the completion of the consideration process and the announcement of the scheme. The whole planning process would last for around 18 to 24 months depending on the amount of opinions received and the reasons behind. If TPB agreed to submit the development scheme to the Chief Executive in Council for consideration, and consent and approval was obtained from by Council, the Authority would only make acquisition offers to the property owners concerned in accordance with the established policy after the approval and gazettal of the scheme.

(xi) The Authority urged Members to assist households affected in submitting opinions regarding the above two pilot projects.

6. **Ms Austen NG, Senior Manager (Acquisition and Clearance) of URA,** made supplementary comments, with the main points as follows:

(i) URA would proceed with the acquisition process after the completion of the planning process and the approval of the project. When acquiring an owner-occupied domestic property, URA would offer the market value (valued on vacant possession basis) of the property plus the Home Purchase Allowance (HPA) to the owner-occupier, which was the difference in the market values between a seven-year-old notional replacement flat in similar locality and the property under acquisition. In addition, owner-occupiers could also opt for the Flat-for-Flat (FFF) Scheme provided by URA as an alternative to

cash compensation. Owners could purchase "in-situ" flats after redevelopment or flats developed by URA in the same district. However, the details would only be provided when the Authority made acquisition offers.

(ii) When acquiring a tenanted or vacant domestic property, URA would offer the owner the market value (valued on vacant possession basis) of the property plus an allowance which was half the value of HPA. Also, when acquiring a parking space, URA would offer the market value (valued on vacant possession basis) of the property plus an allowance which was 10% of the market value (valued on vacant possession basis) of the property.

(iii) Unlike the acquisition process of typical old buildings, there were two types of CBS for acquisition: (i) dissolved CBS; and (ii) CBS yet to be dissolved. If CBS had been dissolved, ex-members who took up the legal titles of their properties could complete the property transaction with URA after paying a land premium to remove the alienation restrictions on CBS buildings. If ex-members had not taken up the legal titles, they would need to complete the formalities and pay the premium before completing the property transaction.

(iv) If CBS had not been dissolved, the Authority and the Lands Department (LandsD) would still make acquisition and land premium offers to members but the offers were for reference only. If members planned to dissolve CBS, they must obtain the consent of more than 75% of the members and complete the formalities, including dissolving CBS, modifying the land lease, distributing sub-deeds to members and forming an owners' corporation. Moreover, Urban Redevelopment Facilitating Services Company Limited, the wholly-owned subsidiary of URA, could provide free legal assistance in order to help members complete the dissolution process.

(v) A special arrangement would be made for eligible owner-occupiers of CBS projects. They could purchase the subsidised sale flats of dedicated rehousing estates developed and provided by HKHS as a replacement flat. However, owners who accepted this arrangement could not opt for the FFF Scheme.

7. **Mr YANG Wing-kit** introduced Paper No. 29/20, stating that CBS was counted as a type of housing benefit for civil servants in the past and the compensation was not enough for owners to buy a flat of similar size in the same district after deducting the premium. Therefore, he opined that the Authority did not offer sufficient incentives for owners to accept this development scheme.

8. **Mr MA Hei-pang** consolidated his opinions as follows: (i) he remarked that URA did not organise physical briefings for the two pilot projects in view of the pandemic. As 20% of the people in the district were elders and most of them did not know how to watch the online briefing videos from URA, they became anxious about the unexpected freezing survey. This showed a serious lack of transparency in the development scheme; (ii) he said that the first stage consultation for CBS-2:KC had ended and therefore, the Authority should organise briefings as soon as possible and inform the households about examples of successful acquisition and the amount of land premium payable; (iii) he remarked that Annex III of the Sino-British Joint Declaration ensured the rights and interests of civil servants after Hong Kong's return, therefore, URA had the responsibility to explain owners' rights and interests to them, including matters related to land premium and the actual amount of money they could receive; (iv) he asked if some of the undissolved CBSs rejected the dissolution and acquisition offer, how the Authority would handle and whether they would invoke the Lands Resumption Ordinance for land recovery and redevelopment; (v) he quoted the minutes of the meeting of the Subcommittee on Redevelopment of Buildings Developed under the Civil Servants' Co-operative Building Society Scheme under the Panel on Development of the Legislative Council on 1 March 2016, saying that there were views that it was unfair for URA to accord priorities to the redevelopment of CBS buildings; (vi) he said that the land lease of CBS had stated the relevant rights and interests of flat owners like the right of inheritance and resumption. However, the Authority requested for land resumption unilaterally which deprived serving and retired civil servants of their housing benefits. Therefore, URA had the responsibility to pay the land premium; (vii) he said that as the buildings in two pilot projects were structurally good. The buildings in poor condition should be redeveloped first; (viii) he quoted the saying of Mr WU Moon-hoi, Marco, the father of the Home Ownership Scheme, that "developers could first make an agreement with owners, stating that a flat for owners' personal use with an area of not more than that of their old flats would be provided once new buildings were completed. Both owners and developers did not need to pay the premium for the flat until the owners wanted to sell their newly built flats. Developers were only required to pay the premium to the Government for plot

ratio bonus. Before the new buildings were completed, developers could provide temporary apartments or rental subsidies to help owners solve their transitional housing needs." He also pointed out that there were less households opting for the FFF Scheme from the Authority, and therefore, the Authority should take into consideration this method seriously; and (ix) as the site of the project was elongated in shape, he suggested that the Authority should conduct the redevelopment in stages so that residents could be rehoused in the vicinity of their original homes.

9. **Mr YANG Wing-kit**'s views were consolidated as follows: (i) he stated that as the Authority had not calculated the amount of land premium to be paid, households could not decide whether to accept the acquisition offer or not. He suggested that URA should first provide the amount of land premium to be paid so that residents could make better decisions; (ii) he inquired whether exchanging a flat for multiple small-sized flats was allowed; (iii) he pointed out that if households chose to buy the "in-situ" flat in future redevelopment, it might take ten years from moving out to moving in. Hence, he requested the Authority to provide additional housing rental allowance; (iv) he reiterated that CBS was kind of housing benefit for civil servants in the past, so the Government should handle the matter in a more open-minded manner; and (v) he suggested to consolidate Members' views and relay them to TPB and the Development Bureau (DEVB).

10. **Dr KWONG Po-yin** opined that since there were multiple redevelopment projects under URA in the district, URA should accord affected households the priority to buy flats built in the projects by the Authority in the same district so that they could be rehoused and live in the same district as soon as possible.

11. **Mr HO Hin-ming** consolidated his comments as follows: (i) he stated that the matter related to land premium was under the terms of reference of LandsD and thus, the Department had the responsibility to explain the method for calculating premium payment. He also requested the Department to send representatives to the meeting next time when relevant items were discussed. He also asked the Chairman and the Secretariat to invite representatives from the Department to join the meeting; and (ii) he viewed that if the living environment was improved, households should make up the difference in the property prices instead of the land premium. Hence, he concurred with the opinion that "owners and developers did not need to pay the premium for the flat until the owners wanted to sell their newly-built flats".

12. **Mr Pius YUM**'s opinions were consolidated as follows: (i) he remarked that

the Working Group on Concern over Urban Renewal was formed under the Committee. He then asked URA to join the working group and send representatives to the meeting so as to strengthen the communication between households and Members; and (ii) when carrying out the redevelopment projects in the past, the Buildings Department (BD) had issued orders to households who received acquisition offers, making it difficult for them to decide whether to spend money to comply with the order or not. Therefore, he requested the Secretariat to make an inquiry to BD to see whether the Department had issued any order to the apartments of the above two pilot projects. He also asked the Department to show leniency when executing the orders.

13. **Mr LEE Hin-long** opined that URA did not follow its approach of "people first, district-based, public participatory". Thus, he asked the Authority to make improvements and organise briefings promptly.

14. **The Hon Starry LEE** said that the redevelopment of CBS was a new attempt and there existed the problem related to land premium payment. Hence, the Authority should maintain a positive interactive relationship with the households concerned.

15. **Ms Austen NG of URA** responded with the main points as follows:

(i) URA understood that some of the households were worried about the compensation issue. Under the existing policy, when acquiring an owner-occupied domestic property, the Authority would offer an owner-occupier the market value of the property plus HPA or a supplementary allowance calculated on the basis of the value of a notional seven-year-old replacement flat to the owner-occupier. In addition, URA would provide the FFF Scheme as a rehousing arrangement so that households could purchase apartments like De Novo in Kai Tak from URA at the prevailing market price. However, the actual supply and relevant details would be available when URA made an acquisition offer. Moreover, eligible owner-occupiers could purchase the subsidised sale flats of dedicated rehousing estates to be developed and provided by HKHS as an option of flat replacement.

(ii) Owners who wished to remove the alienation restriction on CBS flats were required to pay the outstanding two-thirds of the land premium to the Government, which was not equivalent to two-thirds of the

acquisition price offered by the Authority. The acquisition price would be set out once the acquisition offer was made and also, LandsD would provide the value of the land premium payable for reference. However, the value of the land premium payable concerned would only be confirmed after calculation.

(iii) CBS-1:KC and CBS-2:KC had one and nine undissolved CBSs respectively. As it would take more than a year for the dissolution of CBS, the Authority would provide assistance for dissolving CBS in a bid to enhance the flexibility in the implementation of projects.

(iv) Once the planning process was completed and the commencement of the projects were approved, URA would make estimations based on the then market conditions and make acquisition offers and quoted the value of the land premium to households. Due to the fact that both projects were still in the planning stage and it would take a long time before acquisition offers were made, the Authority could not provide the acquisition offers of the projects and the actual amount of premium payable for households' reference in the meantime.

(v) Even though the redevelopment of CBSs was different from that of typical old buildings, URA would commence two CBS pilot projects following the implementation strategy for redevelopment project. Therefore, the relevant arrangement of the FFF Scheme was the same as that of typical redevelopment projects. If households chose to purchase flats that were not yet completed under URA's FFF Scheme, they had to make arrangements by themselves before their intake of new flats.

(vi) URA would provide more information about the FFF Scheme for households' consideration once the acquisition offers were made.

(vii) URA could recommend land resumption to the Government within 12 months after the commencement of the project under the Urban Renewal Authority Ordinance. The Government would review the proposal and consider whether to invoke the Lands Resumption Ordinance or not.

16. **Mr Eugene YUE, Senior Manager (Community Development) of URA,** responded that URA had noticed the opinions from households and the slight relief of the pandemic. Therefore, the Authority was actively arranging multiple briefings in early July and would inform households of the two projects and Members the soonest upon confirmation.

17. **Mr Mike KWAN of URA** replied with the main points as follows:

(i) URA would try to invite LandsD to answer the questions related to land premium.

(ii) According to Section 29 of the Urban Renewal Authority Ordinance, URA could apply in writing to the Secretary for Development, requesting him to recommend to the Chief Executive in Council the land resumption under the Lands Resumption Ordinance. However, the Government would consider whether to approve the application or not.

(iii) URA would be glad to join the Working Group on Concern over Urban Renewal and send representatives to the meeting.

(iv) According to the Stage 1 Social Impact Assessment (SIA) Report, BD had issued orders in respect of the Kau Pui Lung Road / Chi Kiang Street pilot project but there were not so many relevant cases. He restated that the implementation of two projects was a response to the invitation made in the 2018 and 2019 Policy Address. Although the buildings in the two projects were structurally good, no lifts or barrier free facilities were provided in all buildings and most of them were single-staircase buildings which posed potential fire safety hazards.

(v) The closing date of the consultation for CBS-1:KC was 22 July 2020. Even though the first stage public consultation of CBS-2:KC concluded on 19 June 2020, TPB would make the Stage 2 SIA Report available for the public and collect their opinions on it from 17 July 2020 to 31 July 2020. In addition, if the project was gazetted by TPB, the public could make written representations during the statutory consultation period, which was within two months after the

gazettal. It was expected that the procedure concerned would begin at the end of 2020 or early next year where the timetable to be confirmed by TPB. URA advised the public to pay attention to the updates.

(vi) Regarding Shing Tak Street / Ma Tau Chung Road Development Project and the Kau Pui Lung Road / Chi Kiang Street Development Scheme, the Authority received two and about 250 opinions respectively so far.

18. **The Chairman** instructed the Secretariat to consolidate Members' opinions and referred them to TPB and DEVB. He also asked the Secretariat to explain the above two pilot projects to BD, and inquired if they had issued orders to the relevant flats. Finally, he requested the Secretariat to express to LandsD the Council's wish of having the Department's representatives in the meeting next time when CBS, land premium and items related to redevelopment were discussed.

19. **Mr YANG Wing-kit** inquired whether matters about the redevelopment of CBS should be discussed in the meeting of the Working Group on Concern over Urban Renewal. He was also worried that the representative from the Department would more likely be absent from the meeting of a working group.

20. **Mr Pius YUM** said that URA had promised to join and send representatives to the meeting of the working group, hence, it was more appropriate to discuss relevant items in the meetings of the working group.

21. **The Chairman** pointed out that KCDC had no legal power to oblige departments to send representatives to meetings and the terms of reference of the Working Group on Concern over Urban Renewal had included discussing the redevelopment related matters and inviting representatives from departments to meetings. As the working group was not in formal operation yet, he approved the discussion of the item concerned in the meeting of the Committee and suggested dealing with relevant matters in the working group in the future.

22. **The Chairman** then proceeded to handle the motion in item 12, stating that the motion was forwarded by Mr MA Hei-pang and seconded by Mr TSANG Kin-chiu. The Chairman declared the motion valid.

23. **Mr Ma Hei-pang** presented Paper No. 38/20 and moved the motion: Request to the Urban Renewal Authority for organising a briefing on urban renewal as soon as possible to allay public concerns.

24. **The Chairman** asked if any Member proposed an amendment.

25. **Mr YANG Wing-kit** said that although he supported the original motion, he proposed the amended motion to make it clearer: Request to the Urban Renewal Authority for organising briefings on urban renewal for Shing Tak Street / Ma Tau Chung Road Development Project (CBS-1:KC) and Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) as soon as possible to allay public concerns.

26. **The Chairman** stated that the amended motion was forwarded by Mr YANG Wing-kit and seconded by Mr HE Huahan. The Chairman declared the motion valid.

27. **Mr TSANG Kin-chiu** opined that the amended motion put forward by Mr YANG Wing-kit indicated his political stance. In response to the discussion in the Council just now, he proposed the amended motion: Request to the Urban Renewal Authority for organising briefings on urban renewal for Shing Tak Street / Ma Tau Chung Road Development Project (CBS-1:KC) and Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) as soon as possible and participating in the meeting of the Working Group on Concern over Urban Renewal under KCDC to allay public concerns.

28. **The Chairman** stated that the amended motion was forwarded by Mr TSANG Kin-chiu and seconded by Mr MA Hei-pang. The Chairman declared the motion valid.

29. **Mr YANG Wing-kit** did not consider the amended motion he proposed as an expression of political stance. He asked Mr TSANG Kin-chiu to withdraw the remarks he made and requested the Chairman's ruling on the issue.

30. **Mr TSANG Kin-chiu** opined that if Members held similar opinions, they should raise the motion before the meeting instead of proposing amendments to the motion during the meeting. Therefore, he would not withdraw the remarks concerned.

31. **Mr HO Hin-ming** reckoned that the amended motion proposed by Mr TSANG Kin-chiu was also an indication of political stance.

32. **The Chairman** urged Members not to make statements without his permission.

33. **Mr YANG Wing-kit** said that he had submitted the Paper before the meeting and reiterated that he supported the original motion. He asked for the Chairman's ruling again.

34. **The Chairman** stated that Mr TSANG Kin-chiu's remarks were just personal opinions and he had no power to demand him to withdraw the remarks concerned.

35. **Mr MA Hei-pang** opined that most of the members supported the motion and thus, he suggested that the Chairman should proceed to voting on the motion.

36. **The Chairman** stated that according to Order 21 of the Standing Orders, if there was more than one amended motion, they would be dealt with in the order they had been moved, where motions proposed later would be voted on first.

37. **The Chairman** invited the members in attendance to vote on the amended motion forwarded by Mr TSANG Kin-chiu by show of hands on a named basis, and the results were as follows:

Support	:	21 votes	(Dr KWONG Po-yin, Mr YANG Wing-kit, Mr CHEUNG King-fan, Mr HO Hin-ming, Mr NG Po-keung, Mr MA Hei-pang, Dr KWAN Ka-lun, Mr HE Huahan, The Hon Starry LEE, Mr YEUNG Chun-yu, Mr TSANG Kin-chiu, Mr SIU Leong-sing, Miss Jakki MAK, Mr Joshua FUNG, Mr Pius YUM, Mr LAM Tak-shing, Mr KWOK Tin-lap, Mr PUN Kwok-wah, Mr LEE Hin-long, Miss CHAU Hei-man, Mr WONG Wing-kit)
Objection	:	0 vote	
Abstention	:	1 vote	(Mr LAI Kwong-wai)

38. **The Chairman** announced that the amended motion forwarded by Mr

TSANG Kin-chiu was passed.

39. **Mr YANG Wing-kit** asked if the mover and seconder of the original motion could propose an amended motion.

40. **The Chairman** said that according to Order 20 of the Standing Orders, Members (other than the member initiating the motion) could move an amendment to the motion after it had been put to the meeting for discussion. As the original motion was forwarded by Mr MA Hei-pang and the amended motion was proposed by Mr TSANG Kin-chiu, he opined that the act did not violate the Standing Orders.

Transitional Housing Project – James' Garden
(Paper No. 30/20)

41. **Mr Raymond WONG, Senior Manager (Family and Counselling Services) of St. James' Settlement,** introduced the Paper, with the main points as follows:

(i) The aims of establishing James' Garden were: (i) to address the housing needs of grassroots families and improve their quality of living; (ii) to provide affordable rent so as to ease their financial burden; (iii) to build social capital for the resident families; (iv) to provide appropriate support services including parenting groups, children's play groups and child care; and (v) to study the effectiveness of the Transitional Housing Scheme through data collection.

(ii) The Highway Department Depot and Training Centre, which was proposed to be converted into James' Garden, was located at 23 Hok Yuen Street. The three-storey building was expected to be converted into 18 three-person flats and 20 four-person flats, and be provided to single-parent families with two to three young children which had applied for public rental housing (PRH) and been waiting for three years or above.

(iii) The average living space per person of James' Garden was no less than 70 feet. Each flat would be equipped with an open kitchen and a bathroom with toilet, and the 14 four-person flats on the ground

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 Reference Number:	200604-191545-21080
提交限期 Deadline for submission:	19/06/2020
提交日期及時間 Date and time of submission:	04/06/2020 19:15:45
發展計劃草圖名稱 Name of Draft Development Scheme Plan:	靠背壟道／浙江街: 就發展計劃草圖提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Draft Development Scheme Plan
「提意見人」姓名/名稱 Name of person making this comment:	Lam Yi Man Meir

意見詳情
Details of the Comment :

As a resident of To Kwa Wan, I certainly support this redevelopment project commenced by URA. The buildings situated along Maidstone Road and Kau Pui Lung Road are mostly over 50 years, they are worn out and dilapidated. There are no lifts, no security guards, which makes it unfavourable for living at the moment. Therefore, there is definitely an urgency to redevelop such old buildings in order to improve the living conditions and convenience of the residents, especially for seniors. In addition, redeveloping the old buildings could lead to better use of the land by maximising the plot ratio. The city land could be better used in building more private and public residential flats for the people in Hong Kong.

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

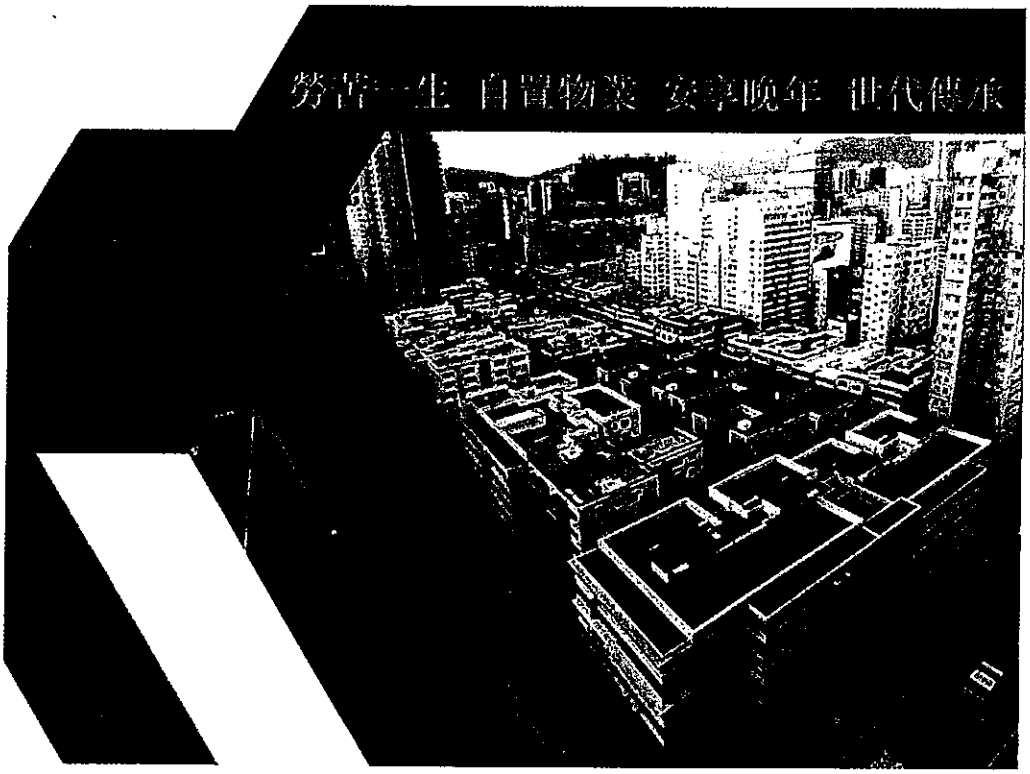
有關的規劃申請編號 The application no. to which the comment relates CBS-2-KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

見附件

「提意見人」姓名／名稱 Name of person/company making this comment NG SHUN KAI
簽署 Signature [signature] 日期 Date 10/6/2020

附件



重建計劃

毀人家園

奪人權益

破壞和諧

城規會 CBS-2:KC 重建發展項目，反對理由

致城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓

敬啓者：

市建局的靠背龔道/浙江街發展計劃(CBS-2:KC)

古聖人有說，一個理想的社會是「人不獨親其親，不獨子其子；使老有所終，壯有所用，幼有所長，鰥、寡、孤、獨、廢、疾者，皆有所養」，即各階層的人都能得到公平合理的照顧，得到和諧安穩的生活。
所以需要一個良好管治能力的政府，各部門協調一起籌劃管理，才能達到這個理想 ，其中考慮周全的城市規劃更不可缺少的。
1. 城市規劃是地區對城市建設進行宏觀調控的手段
2. 城市規劃是政策形成和實施的工具
3. 城市規劃形成了城市未來的空間架構

尤其是城市社會、經濟、政治關係形態化的和作為這種表像載體的城市土地利用系統，為社會市民的居住、勞動、學習、交通、休息以及各種社會活動創造良好條件。
一個理想城市規劃主要的用途及目標，讓資源得到合理分配，市民的居住環境素質得以保持及提升。 這個質素保持及提升有分為硬件及軟件兩方面，
硬件方面主要是土地及樓宇供應數量及分佈，讓多一些人得到安身之所。
軟件方面，影響層面比較廣泛，除了經濟效益外，需要讓更多市民提升基本的居住水平質素外，更重要是原有居民的生活質素得到保障及尊重，不會造成顧此失彼的情況，避免製造社會不公平及矛盾問題。這樣才能帶給社會真正的和諧

市建局的 CBS-2:KC 重建發展項目，雖然有著增加房屋供應及增加政府財政收入的好處，但本人強烈反對城規會通過這個計劃，內容如下：

1. 反對對原有環境的負面影響
2. 反對計劃對附近交通的負面影響
3. 反對計劃造成社區和諧的負面影響
4. 反對市建局重建計劃的程序不公義，企圖矇騙居民出售及城規會的同意
5. 反對計劃造成業主基本權益受剝奪
6. 反對市建局偏頗的咨詢文件，誤導本區居民，製造社會矛盾
7. 總結

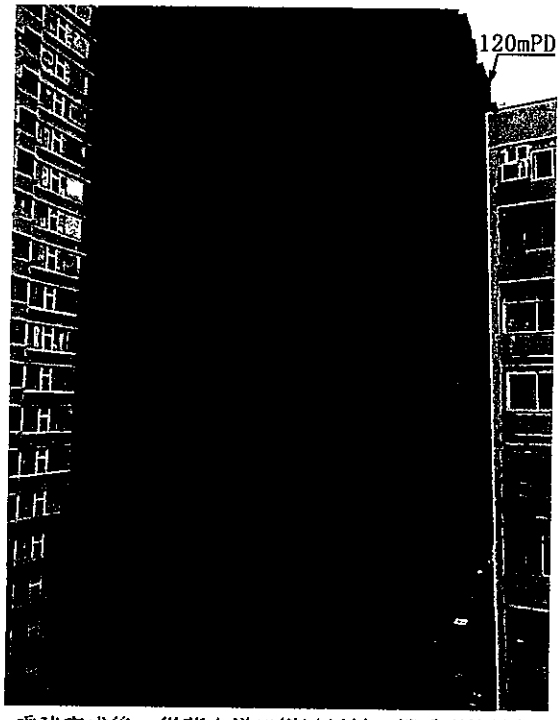
1. 反對原有環境受到負面影響

*- 低密度的公務員合作社樓宇只有五六層高，與高層的樂民新村依循山勢的建築群形成和諧配搭，給樂民新村帶來光明和十分通風的開揚居住環境。一帶的低密度矮樓層公務員合作社的樓宇發揮了健康緩衝寧靜地帶，隔離了馬頭圍道的繁雜環境。

*- 市建局報告說改善本區環境，重建不會影響空氣流通，是不實的。

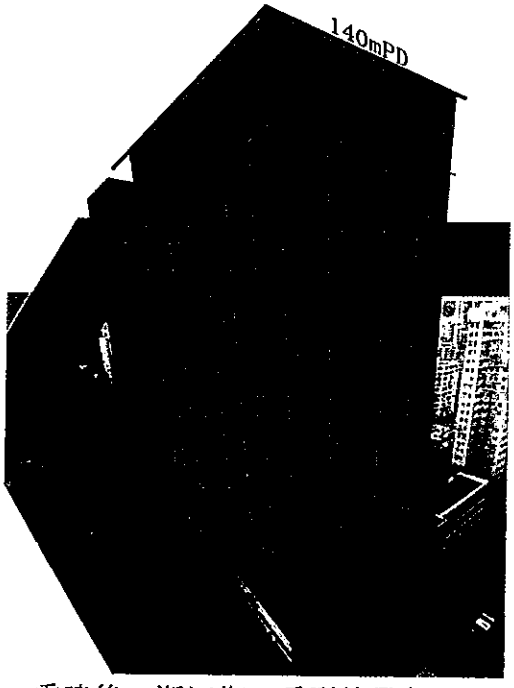
簡單常識一般人都知道，有物件擋在前面，不可能空氣流通會比沒有障礙物的好。某些地方或會因為隧道效應（tunnel effect），風力會加強， 整體來說，無可置疑，空氣流通定必比現在情況差劣的。

*- 從以下照片合成圖，看得出重建後建築群的體積，必然會產生熱島效應，阻擋光線和空氣自然流通。不單大範圍遮擋著樂民新村的視野，且令區內的空氣環境質素定會下降變差。

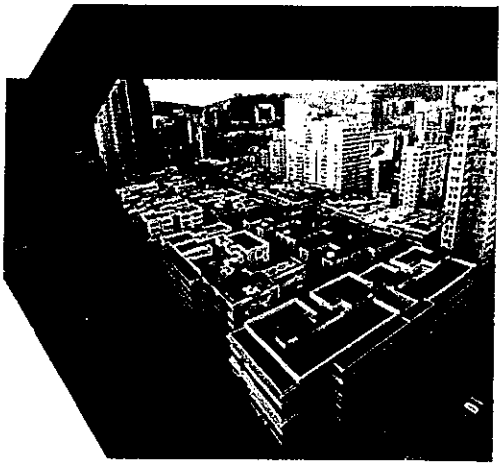


重建完成後　從落山道口樂民新村15樓看到的景象

從落山道口樂民新村15樓看到的原來景象



重建後，浙江街口看到的景象



浙江街口看到的現有景象

*- 重建項目會把原來的橫向發展改為豎向發展，除了空氣流通問題外，樓宇密度形成屏風效應。

*- 根據計劃書的重建總平面，前面擋著樂民新村的景觀視野，只留著塔樓與塔樓之間的空隙，緊靠著七喜大廈那邊，留下一個不舒服的距離，若這段的馬頭圍道私樓重建，屏風效應會更加明顯

*- 市建局沒有把落山道與美善同里一段的合作社房屋一併納入本計劃中，以整區規劃來看，排除一小段的合作社樓宇令人感覺很奇怪的。有合理的推斷，這一段的重建會嚴重影響“半山壹號”豪宅的環境及視野，勢必引來“半山壹號”居民的強烈反對。樂民新村的低收入住戶，在社會上發出的聲音相對會薄弱很多，即使重建對他們環境帶來負面的影響，反對聲音也不容易給重視。這樣更特顯那兩份「第一階段社會影響評估」和「規劃報告書」是帶有刻意美化、企圖誤導和欺騙性，蒙蔽城規會批核計劃，蒙混過關

*- 規劃中說明有地下連通地鐵站，設立步行街，這計劃是很不適合。土瓜灣區的傳統購物區都是集中在馬頭圍道以東，內裡有著各式各樣的商店是與日常民生息息相關的，物價相宜，吸引區外人前來購買日用食材和用品。計劃把原來純住宅區改為步行街的商業區，環境一定會受到很大的影響，令整個土瓜灣區都是人流混雜。

*- **反對本計劃對本區居住環境有著負面影響及計劃書的失實分析。**

2. 反對計劃對附近交通的負面影響

*- 本區內街都是比較狹窄，本身負荷不到繁忙交通，只靠馬頭圍道及土瓜灣道兩條主幹道，在繁忙時段，靠背壟道往天光道方向塞車情況嚴重。隨著本區不少重建項目，人口會更大幅增加，地鐵通車雖可帶來方便， 但人口及商業店鋪數量急劇增加下，日常的運輸交通將對區內小街道產生巨大壓力，令區內塞車情況急速惡化。

3. 反對計劃造成社區和諧的負面影響

a. 反對給長者們帶來不必要的困擾

*- 很多本區居民在 1960 年前後開始居住於上址, 近六十年的光景, 四代人的生活經歷, 留下不少集體回憶，這種無形資產，非金錢所能買到。

*- 剛搬來的時候，從開山劈石，一個小山丘，一片片的泥地，下雨時附近滿地泥濘，泥水從靠背壟道滾滾流向馬頭圍道，晴天時聽到爆石的巨響，塵土飛揚，家裡經常滿佈塵埃，需要不停打掃清潔。

*- 香港五六十代的高出生率，難民潮的出現，當時是一個人浮於事經濟不景氣的社會，百廢待興的年代，一般家庭要養活一家多口絕對是非常吃力的事。當時市民的平均教育程度不高，要成為一定職級公務員更是不容易。

*- 本區第一代居住的公務員，都是需要達到一定薪級點，有一定的專長能力水平的。政府推出合作社計劃，給予這群公務員一個便利，讓他們能自置居所，有一個穩定安居環境中，能樂業地服務香港市民，從而令香港得以快速成長，步向繁榮。

*- 當時很多家庭三代多人，有的甚至超過十人，同住一單位，一家多人的生活費加上每月要分期償還政府的貸款，生活壓力可想而知。

*- 經過多年的辛勞，社會環境的改善，合作社公務員最後完成償還貸款，真正擁有自己的物業財產，為自己一家的生活有了穩固的保障。

*- 很多第一代打拼的公務員，已經離世，遺屬不少年逾七八十以上，當中學歷不高的為數不少，幾十年來的生活圈子都是離不開這個社區。很多仍然健在，自己可以自由外出走動，到熟悉的菜市場購物，結交不少同區朋友， 也經常聯絡住在不遠的親戚。也有些身體狀況不理想的， 需要經常出入社區附近的醫療設施。

*- 不少老人都有記憶力退化現象，特別對越新近的東西越容易忘記，搬遷到一個全陌生地方, 會大大增加外出回不了家的風險。

***- 反對重建計劃，強逼搬遷到陌生地方，給一生打拼的長者們帶來精神及體力的大折騰，穩定了幾十年的他們，到耄耋之年時才再來為房子來奔波操勞操心，是明顯對長者們的不尊重及無理的欺負！**

b. <u>反對強行奪走長年守待的成果</u>

*- 幾十多年前的地鐵早期計劃，本應有土瓜灣地鐵站的，之後有不同理由被拖延，成為地鐵計劃中最後一期，區內居民一直在忍受著交通不便和擠塞之苦。

*- 過往幾十多年外出上班的居民，排隊擠上巴士，特別到香港島上班的一族，飽受紅隧漆咸道的嚴重塞車情況，被擠在巴士裡面超過一個多小時，常有發生。

*- 多年前得知有地鐵準備開通，且地鐵站口近在咫尺， 眾街坊非常期待開通那天的來臨， 出門一定方便很多。

*- 很多長者也非常高興等了不知多少年的地鐵站，可讓他們避免舟車勞頓，乘坐地鐵去不同地區看看。

***- 反對這重建計劃，令大家長年的期望完全落空！忍受著多年興建時的不方便及惡劣環境，等到快要通車時卻被逼遷，享受不到應有的成果。**

c. <u>反對帶來不必要的突變衝擊-美好生活環境被逼放棄，經濟開支被逼增加</u>

*- 美善同道合作社的樓宇密度，樓層高度及寧靜、明亮、整潔的街道形成一個很舒適的居住環境，每個合作社的建築各有特色， 形成一個簡單卻很有變化的建築風格 （電視台拍攝取景的熱點)。

*- 樓齡雖比較高，但整體狀況非常良好，聚居的都是公務員及其家庭成員，治安條件也非常良好，加上地鐵線交通新網絡，是同區最好最理想的居住地點及環境。

*- 合作社房屋有別於同區其他地方，一直都維護得很好，合作社每幾年自行進行維修及翻新，居民大家都很喜歡這個社區。斷斷不是市建局報告中所形容“保養尚可”及“沒有樓宇管理”，把我們管理很好的物業與土瓜灣一些失修舊區混為一談，企圖誤導城規會及公眾。

*- 這地段是本區擁有難得的美好居住環境，完完全全沒有重建的必要性及逼切性，如被逼遷，不可能再在同區找到同樣質素的居住環境！

*- 且重建強逼我們增加生活開支，除了高昂私人樓物業管理費，還有潛在的其他開支還，如交通，日常消費等等將會有不同程度增加，嚴重影響我們的生活計劃。

*- 不少退休很久的公務員，當年的退休金在現今的生活指數下，本已經不是十分充裕了，搬遷後增加的生活費定會嚴重影響他們的生活質素。

*- 市建局創立的精神原意，是對公眾造成滋擾及安全威脅作出處理，根據市區重建局官方簡介說明 https://www.ura.org.hk/tc/about-ura

“市區重建局（市建局）是根據<u>《市區重建局條例》</u>於二零零一年五月成立的法定機構，透過進行、鼓勵、推廣及促進本港市區更新，應對市區老化問題，並改善舊區居民生活

環境。

市建局依循政府的《市區重建策略》所載的指引，並採取「以人為先，地區為本，與民共議」的方針，進行市區更新的工作。市建局以「重建發展」和「樓宇復修」兩大核心業務，加上「保育」和「活化」，為香港市民創建一個可持續發展的優質生活環境。”

*- 強收良好狀態的合作社樓宇，完全與市建局的創局宗旨違背。

***- 反對市建局的重建計劃違背創局原意，給本區帶來不必要、不合理的經濟壓力增加及居住質素下降的突變！**

4. 反對市建局重建計劃的程序不公義，企圖矇騙居民接受收購及城規會的認同

a. 不明朗及碎片化資料

*- 以現有的計劃書公佈的程序及非常碎片化的資料，業主們根本無從得知齊全資料作預算，分析，考慮，衡量來作決定。

b. 時間表

*- 沒有開出收購估價的時間表

*- 沒有補地價時間表

*- 沒有告知如達成協議後，何時賠償付款及滯後多久發放時間表

*- 沒有說明“樓換樓”方案的詳細，一概不清楚

c. 額外費用

*- 沒有說明提及因逼遷搬入新單位時受影響的額外開支，如裝修工程費用，設計師服務費用、重設合適傢具、水、電、煤氣註冊登記費/按金等等。

d. 申訴機制

*- 沒有說明有什麼申訴機制及申訴所產生的費用補償，保障受影響居民的申訴權利

e. 額外印花稅支出

*- 沒有說明購買其他物業，產生額外印花稅及補償問題。

f. 過渡期安排

*- 沒有提及在過渡期的住宿租金的安排和補償。

g. 裝修折舊補償

*- 近年大筆花費為單位大翻新的業主，計劃書沒有交代折舊補償。

h. 低估收購價

*- 計劃書說明會以同區七年樓齡作參考，現實是沒有面積相若的單位，於地鐵站旁，有著良好治安及衛生環境，作客觀和合理比較參考，計劃書建議那套估價方法，非常可能會嚴重低估收購價。

*- 沒有說明有公平的上訴機制。

i. 高估的地價

*- 土瓜灣站是獨特的地鐵線站，可直達馬鞍山等新界地方，又近接過海線，方便的程度和價值不是其他大部分地鐵站可比擬，所以，CBS-2:KC 項目地價會很高昂，相信會比鄰近“半山一號”更要高。

*- 沒有說明有公平的上訴機制。

j. 不可能買到原區的同等單位

*- 低估的收購價，扣除巨額高估的補地價，是萬萬不可能做到如市建局說的能在同區同等同大小的單位，居住素質定會大幅度惡化！

k. 騙局式的交易

*- 市建局在沒有清楚明確的資料，卻要業主做出被收購的決定；

*- 加上需要先同意出售，才有權利自行聘請測量師，複核面積大小，本末倒置。

l. 不適當引用土地收回條例

*- 今次的試點計劃，特意引用《收回土地條例》，這條例在過往是沒有被用來收回發展成熟及保養良好的樓宇小區。表示市建局是以一種高壓手段企圖來強行收購我們的財產。這是開了一個極壞的先例，日後可以隨意收回政府想要的樓宇地段，不管樓宇狀況好壞，不管業主同意與否。變相可任意強搶市民的財產

m. 市建局的身份

*- 計劃書沒有釐清市建局的身份，沒有說明市建局將會是重建項目的發展商，還是要請私人發展商來參與。市建局是以什麼身份來收購房屋，事前是必須清楚說明。

5. 反對計劃造成業主基本權益受剝奪

a. 業主應享有的權益

*- 合作社是政府當年給公務員一種便利，鼓勵合資格的公務員自置居所，有穩定居住環境，完完全全不能與公屋福利相提並論。

*- 當時公務所付出的金額，包括樓宇附近的馬路建設。

*- 合作社模式與居者有其屋模式有很多類似地方，居屋模式基本是套用之前合作社模式修改而成。

*- 最早期的居屋，住滿五年就可以自由轉讓且不需要補回地價，後期的居屋政策雖有所改變但仍然有不少優惠政策，如自住一段時間後可以補回地價，自由出售轉讓。

*- 合作社房屋是不能自由轉讓，只能轉讓給合資格的公務員。

*- 新買家需要全款付清，銀行不接受按揭貸款。

*- 所以選擇購買合作社房屋，心裡早已以自住為目的，希望長久在這裡住下去。分契與否對他們來說意義不是最重要。

*- 這一群公務員用其一生為香港社會服務，對香港的進步、繁榮、穩定作出莫大貢獻，但卻換來被逼令犧牲應有的基本權益。

*- 長者們當年含辛茹苦為生活奔波，買樓置業為了一家安定生活，也為了下一代的將來有保障，斷不會希望辛辛苦苦供完樓款後，房子卻給很低的補償條件被收回去。

*- 加上現今香港的房地產價格嚴重脫離現實，現在要買私樓的較年輕一代談何容易。

*- 住在合作社房屋的比較年輕一代，看著父母有留下來的產業，不少都放棄在外邊再置業，一心住在祖屋物業。

*- 合作社的長者們心願，即使現在身體大不如前，上下樓梯都要費很大力氣，但都很反對被逼遷，除了寬大的空間適合養老外，大都希望房子能留給子孫後代，繼承財產，讓他們不至於成為悲慘的無殼蝸牛。

*- **反對這計劃剝奪業主香港特別行政區基本法所賦予的財產擁有權及財產繼承權益。**

b. 反對計劃沒預留居民原區安置房屋，破壞原有和諧生活環境

*- 計劃預留大面積給將來的發展商圖利，美其名以增加公營房屋供應為理由，卻沒有考慮這一大群勞苦功高的公務員及其家屬在享有本來優厚的居住環境，給予原區安置另一個選擇。沒有選擇方案在同一地段上建設跟現有合作社面積相若的單位。（如在計劃

中的公營房屋位置改為原區安置合作社公務員）

*- **反對原區安置選擇權給剝奪。**

6. **反對市建局偏頗的咨詢文件，誤導當區居民，製造社會矛盾**

*- 這是一份急就之章的計劃文件，缺乏全盤考慮，很多關鍵因素都全忽略，

*- 一直以來政府和有關當局，從未以書面形式透明地通知各住戶或合作社，充分地告知社區有關發展和說明本區公務員合作社已被選擇為重建試點。這是有關方面的失職，程序不公義，有惡意隱瞞之嫌。

*- 計劃不單看不出有積極維護業主及其同住親屬的應有權益，反而有計劃地剝奪居住者的應有權益。

*- 廣泛利用長者不熟悉的網上發通告。

*- 書面通知書，選擇性派發，不是每一戶得到及時知會。

*- 咨詢文件不持平，只有片面強調重建的好處，迴避說明有什麼負面影響潛在風險及得失。是一份極具有引導性的計劃書，企圖蒙著居民的眼睛來作出錯誤的決定。

*- 戶口凍結登記的當天已經有市建局職員進行電話問卷，在居民還沒弄清楚在發生什麼事前，進行倉促的電話問卷調查是很不公義。 書面問卷的設計也是很簡單概括，有便於市建局刻意去美化「第一階段社會影響評估」和 「規劃報告書」。

*- 一份未經深思熟慮的計劃書市建局卻已經送城規會審核及拿出來作公眾咨詢，資料太概括及不足，加上市建局給予咨詢期時間很緊促，對當區居民極不公平。

*- 這計劃的草擬成熟程度，遠不足以在現階段進行城規計劃項目立案

*- 市建局沒有安排公眾咨詢會，來解決居民很多的疑慮。

*- **反對計劃沒有在事前充分對受影響居民作出咨詢。**

*- **與其說這是一份咨詢文件，倒不如說更像一份切切實實不允許有反抗的知會文件，居民的權益沒受到應有的尊重。計劃如在這不清不楚情況下獲得城規會通過，會製造社會另一大矛盾，引起公務員對政府的不信任，對政府有效管治造成莫大的隱憂。因而強烈反對這計劃獲得通過。**

7. **總結**

*- 香港房屋居住是急需要解決的問題，但不是光靠把舊房子拆掉重建就能解決的，舊區重建主旨是改善環境。環境及狀況良好的舊區是需要保留，沒必要拆卸，讓當區居民繼續好好安居樂業。城市規劃不應該為了增加房屋供應，隨意犧牲居民的基本權益。

*- 短期解決的方法也可以從改變土地用途，利用棕地或荒廢的設施譬如關閉的校舍等等，這些來得比較容易，影響層面沒有那麼廣泛。

*- 有許多未善用的土地，遠遠未發揮土地應有效用。官口在政府有關當局，因時制定利民住屋政策，讓這些土地發放正能量，兼且受影響的業權人士數目肯定少許多。以改變土地用途，及從一些荒廢和沒地價問題的土地下功夫，引用《收回土地條例》收地發展，大量增加樓宇供應量，造成民怨的程度減小，容易得到正面評論的效果。

還是政府懼怕那些土地業權人是財雄勢大，取軟避硬，欺善怕惡，改用就手欺壓良民的方法？

*- 濫用《收回土地條例》，利用市建局為代理人強行去收購管理和狀況良好的公務員樓

宇，是開了一個非常壞的先例，為社會埋下另一個矛盾，嚴重影響政府管治誠信。

*- 業主及其家人成為重建計劃的政策嚴重受害者，精神心理情緒都大受不必要的打擊影響。

*- 這是市建局首次收購合作社樓宇，CBS-2:KC 的項目是其中的試點項目，既無之前的經驗，卻開出比以前項目從未有的苛刻無理條件，為日後同類型的收購，立下嚴重不良的壞先例，容易加劇社會矛盾，在現今複雜的政治環境情況下，若通過此項計劃，有潛在不穩定的風險

*- 整個計劃的透明度，清晰度遠不如理想，造成嚴重的程序不公義情況，引起很多街坊的強烈不滿，在在破壞現今社會所剩無幾的和諧。

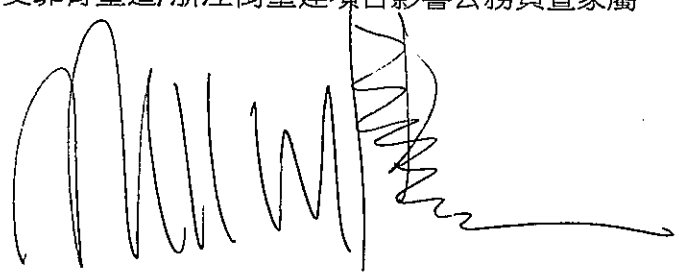
*- 市建局「第一階段社會影響評估」和 「規劃報告書」的評語說法，是以偏概全，有誤導和貶低之意，嚴重失實。實際是為第二階段的美化評估報告作部署準備。

*- 綜合以上各項，這重建計劃除了能增加房屋土地供應及庫房收益的好處之外，在軟件方面如環境、交通、經濟、民生、權益、政治各方面有著不少嚴重負面影響，是一個顧此失彼的計劃，且失去的比得到的更多，嚴重破壞社會的和諧， 製造不公平不公義的現象，完全背離一個理想社會的應有準則。

***-所以我強烈反對城規會通過市建局這 CBS-2:KC 重建計劃。**

此致

受靠背壟道/浙江街重建項目影響公務員暨家屬



2020 年 6 月 10 日

副本致：

市區重建局
香港皇后大道中 183 號中遠大廈 26 樓

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates _____

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary) 請閱附件

「提意見人」姓名／名稱 Name of person/company making this comment SK C&01
簽署 Signature SK 日期 Date 10.6.2020

附件

致城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓

敬啓者：

市建局的靠背壟道/浙江街發展計劃(CBS-2:KC)

試點區內的公務員樓宇背景

1. 記得於 1960 年代搬入土瓜灣公務員合作社居住時，此處一帶荒蕪，只有幾間五六層高的樓宇，有些高低不一的小土堆和小山丘，樓宇附近有不少建築地盤在施工，那時的靠背壟道是崎嶇不全通的，有一座山在路的另一邊，浙江街那邊是密不通行的。每日中午時段會打鑼警示山頭要爆石，後來建成了依山的樂民新村。此山有特別用途，其一是水務署的水務設施，其二是山頂安裝了巨型紅色飛機導航燈，俗稱紅燈山，引導飛機降落啟德機場，因此，本區一帶的樓宇不可起得高。早期此區房屋不多，入夜後另有一番氣氛。

2. 當年的政府為了便利公務員置業安居，穩定士氣和有效施政，讓合資格的公務員組織成立公務員建屋合作社，向政府申請土地和貸款，建屋入住。那筆貸款有一部分還義務地用作開整地盤及附近一些土地，也是幫助政府開發荒蕪地方，為建立社區出一分力，作出貢獻，並按期還回貸款。公務員就是這樣有自己的物業安居。

3. 四十多年前，地下鐵開始建造時說，土瓜灣是有地鐵站的，但是繼觀塘和過海線之後，之後有不同理由被拖延，多年以來區內居民飽受交通不便和擠塞之苦，一直在忍受。

4. 1980 年代開始，公務員合作社響應政府的計劃去分契，有些不分契。兩者都是同一理念，就是早前向政府以借貸形式投資安樂窩，惠及家人，也為開發這區作出貢獻，這些金錢和精神上的投資，並不是商業投資，單純是置業安居，但求長住久安。那些不分契的更強烈地反應出來。

5. 幾年前開始動工建造地鐵，一眾街坊無不歡喜，雖是施工期間帶來不便，但仍理解地包容和忍受。很簡單，從開荒到有地鐵，足足等了五十多年，終可享受到期盼多年的甜果，滿以為是政府的德政。突然奇來的收購這區公務員建屋合作社行動，說是按：*"行政長官於 2018 及 2019 年《施政報告》中，宣佈邀請市建局物色一至兩個適合作高密度發展的公務員建屋合作社（合作社）地段作為重建試點，並研究按照市建局沿用的推展項目方式，重建該些合作社地段。該項目旨在落實《施政報告》的目標，透過充分利用合作社地段的發展潛力，以增加房屋供應。"* 今回是市建局第一次直接收購公務員樓，有地價的糾纏問題，更強用《收回土地條例》。那《施政報告》是否落錯點?

6. 一直以來政府和有關當局，從未以書面形式透明地通知各住戶或合作社，充分地告知社區有關發展和說明本區公務員合作社已被選擇為重建試點。這是有關方面的失職，程序不公義，是惡意隱瞞。

<u>違反《市區重建局條例》5(b)</u>

7. 根據《市區重建局條例》**5(b)**，市建局的宗旨為透過將老舊失修區重建成經妥善規劃，並(如適當的話)設有足夠交通設施、其他基礎建設及社區設施的新發展區，從而改善香港的住屋水平及已建設環境，以及已建設區的布局。

8. 市區重建局的網址上提供那份 *「第一階段社會影響評估」第5.1項說，"該計劃內大部分樓宇呈「維修及保養尚可」的狀況"。第5.2項說"而尚未解散合作社則沒有業主立案法團作樓宇管理"。 第 5.3 項說"根據市建局在樓宇復修的經驗，即使已完成該類維修工程的樓宇，亦需要每5至6年進行一次全面性樓宇復修，才能避免樓宇狀況化至失修狀況。"* 「規劃報告書」(只提供英文版本) 也有類以的說法。

9. 合作社有些是分了契，有些還未分契。分了契的成立了業主立案法團作樓宇管理，尚未分契的則繼續以盤古初開的合作社作樓宇管理，從不間斷。合作社一向自律管理和維修樓宇，除了保持自己的樓宇外觀外，也與鄰近的合作社樓宇保持區內觀感上的和諧，維修未必關乎破損，有些是每隔幾年純粹是粉飾和保護外牆而已，由於這模式保養花費較少且效果好，不少樓宇是採用這模式。個別的樓宇有維修問題，是有其個別原因。因此，區內絕大部分樓宇是狀況良好至非常良好的。

10. 離試點不遠處，就有樓宇狀況大幅度比下去的樓宇，「第一階段社會影響評估」和 「規劃報告書」卻沒有圖文並茂地提及這些樓宇，作事實和客觀的比較，這些破舊失修的樓宇更加需要急切關注，是顛倒黑白。

11. 本試點區本來已經是一個完善社區，各式各類商店和社區設施一應俱全，地鐵的落成帶來新景象，令社區進一步更加完善。土瓜灣站是獨特的地鐵線站，可直達馬鞍山等新界地方，又近接過海線，方便的程度和價值不是其他大部分地鐵站可比擬。地鐵站出入口離公務員樓只有零至三分鐘步程，無道理摧毀好端端有特式的樓宇建築群，違背第 7 段所述《市區重建局條例》**5(b)**的宗旨。

<u>符合《市區重建局條例》5(e)</u>

12. 電視台和電影制作公司常來取景拍攝，我們十分歡迎他們到來，是表示他們欣賞此區的環境和樓宇藝術特色，攝取特色景物得以豐富他們制作的藝術內涵美，同時是對本區的認同。這批管理得狀況良好近 60 年樓齡且有特式的公務員樓，是切合《市區重建局條例》**5(e)**：*"保*

存有歷史、文化或建築學價值的建築物、地點及構築物”，應該繼續保留和保育此區有歷史由來的特式建築群，是香港各類屋宇發展的集體回憶，留下有蹟可尋的歷史。近如澳門，遠至外地有同樣措施保護歷史文化，小鎮社區風情亦是吸引遊客的賣點，帶動各區的活力。

13. 所以，「第一階段社會影響評估」和 「規劃報告書」的評語說法，是以偏概全，有誤導和貶低之意，實在有為著找試點硬要落實計劃著墨之嫌。

規劃倒退

14. 很遺憾那份長達 658 頁的「規劃報告書」只有英文版本，許多人是看不懂和理解的，特別是長者。不知市建局和有關當局是有甚麼十分的迫切性或是藉疫情為由，沒有安排與居民溝通的大會，解釋有關研究評估和解答相關提問，改為以網上一言堂的發報。從突然 **5** 月 **22** 日公告開始，要於 **7** 天內交回那份簡單問卷，或以電話形式回應。在毫無解釋和可靠資料下，居民如何可以對這龐大兼且影響深遠的計劃作出合理和可靠的回應。這是不盡不實的假諮詢，是程序不公義的黑箱作業和迴避手法，以快刀斬亂麻的方式，好讓苦主糊里糊塗地接納，蒙受不必要的嚴重長期經濟損失，以致精神和經濟上打擊和困擾。實際是為第二階段的美化評估報告作準備，撰寫可靠性和反映性極低的不公義失實甚至誤導性高的評估，誤導和陷城規會不義，作批核決定。

15. 基於飛機航道原故有高度限制，樂民新村是依山而建，是緊貼自然山，所以可建得高。低密度的公務員合作社樓宇只有五六層高，與樂民新村形成建築群的和諧配搭，給樂民新村帶來光明和十分通風的開揚居住環境。一帶的低密度矮樓層公務員合作社的樓宇發揮了健康緩衝寧靜地帶，隔離了馬頭圍道的繁雜。

16. 「第一階段社會影響評估」和 「規劃報告書」說此區的環境差，要改善。諷刺的是，地鐵的落成使本區更完善，地鐵土瓜灣站出入口，可到達試點區內各樓宇零至三分鐘步程，也是居民期盼了五十多年遲來的春天。應該讓地鐵盡快通車，發揮應有效能，改善幾十年來馬頭圍道 – 漆咸道通往海底隧道一帶的道路不時有的嚴重交通擠塞問題，觀察成效。

17. 「規劃報告書」內的規劃研究，實際是摧毀狀況良好和有特式的樓宇，把本來已是井然有序的街道圍圈起來，破壞了井然有序有利交通暢順的街道設計。把開揚闊落的單位變成為人詬語的的高密度樓群的納米樓，大量增加人口，把原本寧靜和人口平衡的社區，變成人煙稠密的社區，導致整體居住環境質素反而變差，也興浪幫助推高一帶的地價、樓價，以至租金和物價。計劃的發展帶來大量增加整個土瓜灣區人口數目，從而衍生的各類問題。

18. 以施政報告增加樓宇供應量為由，規劃中說是地下連通地鐵站，設立步行街，是不切實際的，參看現時各地鐵站內的店鋪可見一斑。又以囍帖街為例，囍帖街現在只是一個名稱，沒有當年街道的特色和社區功能，發展後的商店和步行街，華而不實，沒有甚麼特式和吸引力，人們只是通過那條街道，商店門堪羅雀，與毗鄰舊式樓宇的街舖的營業情況大比下去。

土瓜灣區內各式各樣的商店是與日常民生息息相關的，物價相宜，吸引區外人前來購買日用食材和用品，不是那些如商場模式般可有可無的商店可比較。

19. 樂民新村與公務員合作社樓宇互相構成開揚光明和十分通風的居住環境。規劃建議中的高密度納米樓樓群，其實給樂民新村制造了屏障，陽光、通風、噪音等等的探索和評估，看似專業科學的研究，說設計有何等的改善，這純粹是建基於概念的假設上再假設的評估。常識常理告訴我們，任何高度的建築物都是佔用空間，這些高密度高廈加上各樓層的生活活動所發出的熱氣，樓群必然會產生熱島效應，阻擋光線和空氣自然流通。反觀現時低密度的公務員樓宇上空，是無遮無擋的空間，現實在眼前，肯定是那概念設計無法類比的，對樂民新村居民有害而無利，也令這區的各類環境質素變差。例如“半山一號”落成後，已阻隔該方向的光線和通風，不如以前舊警察宿舍時那麼開揚通風。

20. 這計劃揀選試點有個吊詭之處。試點一帶的公務員合作社樓宇是由浙江街至美善同里的，但偏偏少了和不包含一小段由落山道至美善同里的公務員合作社樓宇。正如前段指出的理由，規劃必然遭受“半山一號”的強烈反對，更特顯那兩份「第一階段社會影響評估」和「規劃報告書」是有美化、誤導和欺騙性，蒙蔽城規會批核計劃，蒙混過關。

21. 「規劃報告書」內的概念規劃和評估，是假設上的假設，與現時可見的實情比較下是變差和脫節的，是破壞良好社區的倒退規劃。那規劃和評估是不客觀實際的，是破壞了本來人口平衡，寧靜和設施完善的小社區，令居住環境反而變差，是倒行逆施的規劃。

<u>《收回土地條例》</u>

22. 今回的試點計劃在前期至居民愕然得知時，有很多不是之處，偏要在疫情下蓄意動作，是不公不義的擾民計劃行動，還要引用《收回土地條例》。市建局沒有交代今回計劃有任何申訴和上訴渠道和機制，沒有提供有關法律支援資訊。市建局在公文中並沒有說明這條例內裡的條文是否完全適用於政府? 在內裡的某些條文政府是否有絕對的豁免權? 其中該條例 第 9 條是否適用於今回試點計劃。第 9 條是這樣的：

> 9. 禁止對政府採取法律行動
> 除本條例條文另有規定外，不得因根據本條例進行的收地導致任何人蒙受損失或損害而對政府或任何其他人採取任何法律行動或進行任何訴訟。

若是適用，很顯然政府蓄意向弱勢開刀，做成先例，為未來更進取的不公義計劃開路。若是不適用，則市建局失責，沒有清楚交代，該法例條文有保障苦主的合法權益。若第 9 條文不適用於今回計劃，則《收回土地條例》是公義上的兩刃劍。若是適用，即政府有豁免權，則只有司法覆核這步才可討回公義。政府和有關當局有龐大的金錢和法律支援，更突顯大石砸死蟹，刁難合理卻無助的弱民，更是為政府出力的公務員和其家屬。從宏觀大局看，濫用《收回土地條例》不利社會長久安穩和諧。再者，這有否剝奪了業主在香港特別行政區基本法下

所賦予的財產擁有權及財產繼承權益?

剝奪了公務員的合法權益以及帶來不必要的後遺症痛苦

23. 原本住在闊落的空間，尤其對長者的情緒起鎮靜作用，若被無理收購，所得的被剝削所謂賠償，是買不回現時樓宇面積空間優質單位，僅可購買比現時單位面積少了一半或更多的低質素單位，生活空間質素變差，加上搬遷的勞役，莫說長者，年青的也會鬱結。有好些長者透露，情願爬樓梯或用上樓梯車，都要留死在家中。

24. 還有一點要提出的，公務員退休時，是以當年退休時的薪級點作每月長糧計算基準的，很多公務員已退休很久了，積蓄也少了，與家屬二三代同堂，一是家庭的維繫照顧；二是減輕緊張的樓宇市場的供應壓力；三是減輕家屬要外住的租金或購買高昂樓價的經濟壓力；四是在家安享晚年也不願鬱結在安老院。因此，計劃所帶來對受影響的苦主是牽連甚廣的，即時的有精神和肉體創傷，且有深遠的經濟負擔，簡單例子是樓宇管理費。政府口口聲聲幫市民脫貧，減輕政府的施政壓力，令市民對不濟的政府形象改觀，反過來制造本來經濟平衡的公務員變成另一批貧窮組別，是否反智?

25. 至於賠償方面，市建局是以很籠統的模式表達，實際的計算準則和上下限全沒交代。時有所聞市建局以籠統的條文和計算公式欺瞞無知的業主，令賠償價有很大偏差，收購破舊單位時以不同狀況樓層為由有不同的一言堂計算方法。要知道，收的是那塊寶貴的土地作整體發展謀利，而不是發展重用其收購回來的單位。今回還有補地價的死結，但無提供地價實質資料，前路更加黑暗和不明朗，根本無可靠和合理資料去預算能否根據個別需要去購買所需的居住單位。對於市建局的種種不是，多年來坊間已熱傳多時。市建局是有政府大靠山，實際是政府代理出手人，是政府地產商。此試點計劃是官商地鐵勾結，是民怨來由之一。

26. 認同住屋是重中之重的民生問題，鳥瞰全港，有許多未善用的土地，遠遠未發揮土地應有效用。官口在政府有關當局，因時制定利民住屋政策，讓這些土地發放正能量，兼且影響業權人的數目肯定少許多。抑或是這土地的業權人是財雄勢大，取軟避硬，欺善怕惡，就手欺壓良民。若政府有誠意找試點建屋利民，應該從這些荒廢和沒地價問題的土地下功夫，引用《收回土地條例》收地發展，大量增加樓宇供應量，肯定會有正面評論的效果，更加應該積極去幫助那些有切實需要關注的樓宇，而不是濫用《收回土地條例》，利用市建局為代理人強行去收購管理和狀況良好的公務員樓宇。

27. 公務員聯同本區市民在五六十年代起互相努力，把當時的落後社會逐步改善過來，其中合民情兼且合理的房屋規劃，令社會煥然一新，建立區內社交人際網絡，社會得以長治久安的和諧。現住在這慘被刻意揀選為試點的公務員，過往無功也有勞，歷來明君皆善待良臣和功臣，除了要增加"樓宇供應量"常用的口號外，如上文所指出欺善怕惡，政府有何強而有說服力的理由，非要此地點不可? 這類搞作給人印象是擾民的官商地鐵勾結的"共榮圈"，可以引來每一位市民有廣泛共鳴，為社會伏下深遠影響。

28. 深信閱讀這份反對和建議書不是機器，是有血有肉的理性人，當中或許無住屋問題，但相信有大部人有住屋的問題和擔憂，他人君體也相同，相煎何太急。

結語

29. 今回是市建局第一次直接收購狀況良好的公務員樓，有地價不公開和往後才透露的糾纏問題，還引用《收回土地條例》，強勢行動。「第一階段社會影響評估」和 「規劃報告書」的評語說法，是以偏概全，有失實、誤導性和貶低之意，配合市建局假借疫情的迴避手法，實在是硬要落實計劃著墨和開路。計劃是違背《市區重建局條例》5(b)和 5(e)的宗旨的。請再參閱第 14 段之前的段落。

30. 市建局的不公義黑箱作業手法是不公義、不可靠和有誤導性。規劃是基於概念的假設，與現在的可見實情比較，是倒退和站不住腳的。請再參閱第 14-21 段。

31. 試點計劃偏偏向有地價問題的公務員樓開刀，剝奪了公務員的合法權益以及帶來不必要的後遺症痛苦，忽略了我們應有原區居住在良好樓宇和環境的權利，剝奪了業主在香港特別行政區基本法下所賦予的財產擁有權及財產繼承權益。政府不去用精力收閒置土地發展，增加公私型樓宇供應量，卻花精力和時間去摧毀管理良好、狀況良好的公務員樓。請再參閱第 22-25 段。

32. 坊間已熱論市建局的多方面不是，發展重建出來的樓宇質素相比低於私人發展商，樓價和往後的經費，例如管理費，不遜於私人發展商的物業。說成政府地產霸權也不為過。

33. 以上是強烈反對這試點計劃的理由，有交織著的意見，這並不是橫蠻的無理反對，絕對不象政府和有關當局的無理刁難。現在我們強烈要求撤回和取消這個不透明、程序不公義和不明所以的選址試點試驗計劃。也懇請有關當局日後有任何計劃時，請透明坦誠地與受影響市民溝通，以合乎程序公義進行。我們要的是和諧，厭惡無謂的對抗。

此致

受靠背壟道/浙江街重建項目影響的公務員暨家屬

2020 年 6 月 10 日

副本致：

市區重建局
香港皇后大道中 183 號中遠大廈 26 樓

致城市規劃委員會秘書
香港北角渣華道333號北角政府合署15樓

日期: 2020年6月15日

敬啓者:

市建局的靠背壟道/浙江街發展計劃(CBS-2:KC)

就上述的發展計劃，在一個沒被預先通知的情況下, 突然上門凍結人口調查, 才知悉市建局有以上的重建計劃. 其實,重建地區不是壞事, 但需平衡各方,包括籌劃管理、受影響的持份者等等. 以下是本人對上述計劃的意見:

1/ 應有合理時間作咨詢及溝通- 其實這次重建計劃, 對一般市民來說, 不是一件小事, 應需給予受影響市民一個合理時間作考慮. 反觀是次重建項目, 完全沒有足夠時間作咨詢及溝通. 真難想像一個如此龐大的項目, 涉及上百億資金, 一個有效率的部門會如此粗疏, 直接影響市民對是次重建的信心. 在此, 希望 貴局能延遲施行上述的發展計劃. 重新給予市民一個合理時間及空間作考慮.

2/ 帶給長者們的煩擾- 很多居民在上址居住已五十餘年, 留下不少集體回憶.當時樂民新村還未建成, 下雨時滿地泥濘. 晴天時聽到爆石巨響,塵土飛揚. 當時社區還未算發展完善. 時至今天, 一聲'重建'而又沒有在適當的時間上公佈收購金額, 這使到這群長者憂慮不堪. 這樣有違市區重建策略- '以人為先, 地區為本, 與民共識' 的工作方針.

3/ 帶來突變,被逼轉換生活環境- 這區擁有難忘回憶及美好居住環境. 房子整體狀況非常良好, 完全沒有重建的必要性及逼切性. 如要逼遷, 居民會受以下轉變:

a/ 增加生活開支-如高昂的物業管理費、交通、日常消費等等, 都會直接影響他們的生活質素.

同時, 他們期待已久的地鐵運輸, 可省卻他們舟車勞頓之苦. 但, 若這計劃實施後, 又未能同區安置, 或賠償金額不足以購買同區私樓時, 對受影響市民不公及剝奪了他們長年守待的成果.

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4/ 政策欠缺誘因及公義- 合作社的產生, 是給公務員的一種便利. 鼓勵合資格的公務員自置居所, 挽留人材. 當時公務員所付出金額, 包括樓宇及其附近的馬路設施, 從此處可見, 除了有政府貸款及稍為低地價外, 並沒有其它福利. 反觀, 早期居屋, 住滿五年就可以自由轉讓且不需要補回地價. 從這點去看, 公務員的待遇還比不上普通市民.

5/ 重建計劃的程序不公義- 以現有重建計劃書公佈的程序及零碎資料, 持份者根本無從得知齊全資料作預算、分析、考慮來作決定. 如收購估價時間表、補地價時間表、 補地價的計算方式、 搬遷補償、 '樓換樓'方案詳情、搬遷時住屋過渡期的安排和補償及大廈翻新折舊補償等等都一一欠奉.在沒有清晰明確的資料下,卻要業主做出散社決定.令人感到困擾.

6/ 有違市建局的宗旨- 市建局/城規會的宗旨是促進社區的衛生、 安全、 便利及一般福利,為市民締造一個組織更完善、更高和更稱心的居住環境,而不是犧牲原有居民的居住環境及福利,去完成重建.

從計劃書而言, 咨詢文件偏頗, 看不出有積極維護業主應有權益,反而用高壓手段,如'收回土地條例' 來壓迫我們一眾受影響市民, 剝奪業主基本權益.再者, 如 貴局濫用上述條例,是開了一個極壞的先例,直接影響政府管治誠信. 故此,希望 貴局能暫緩執行,騰出足夠時間,與民溝通,清晰禪述受影響一方的權益.

受靠背壟道/浙江街重建項目影響的住戶陳先生

RECEIVED
11 JUN 2020
Town Planning Board

副本致:

市區重建局
香港皇后大道中183號中遠大廈26樓

城市規劃委員會,

本人年過七十, 住在市建局現規劃收購的地段中其中一個合作社以超過四十年, 雖然這次是特首提意, 但城規會有沒有想過, 這次收購的地段, 所有的房屋都是原好和保養良好的, 現在的收購美其名是發展多一些房屋, 但請不要忽視需要把現有安穩居住和生活的原有居民無情的趕走, 雖然是有補償和津貼, 但現有居民生活質數肯定以被強逼性降級, 這樣的規劃是否要張痛苦加在一些預備安享晚年的老人家身上, 在整過社會土地規劃上肯定有些比較不會涉及太多居民的生活和住所的.

敬希城市規劃會體恤大部分上年紀的原居民的痛苦和無奈, 反對這個規劃, 雖然我這個意見對你們來說, 可能影響不太, 希望貴會員同心體會一下, 亦希望政府不要用這些趕絕民生的政策, 另找地方, 麻煩你們了.

梁

一合作社居民

[redacted]

RECEIVED
15 JUN 2020
Town Planning Board

tpbpd@pland.gov.hk

寄件者: Wong Raymond [redacted]
寄件日期: 2020年06月15日星期一 12:09
收件者: tpbpd@pland.gov.hk
副本: [redacted]
主旨: 遞交市建局靠背壟道/浙江街發展計劃(CBS-2:KC) 反對意見
附件: CBS-2KC 重建發展計劃 · 反對理由 [Final].pdf

致：城市規劃委員會秘書

本人對靠背壟道/浙江街發展計劃(CBS-2:KC) 提交反對意見，
詳見附件

Raymond Wong
[redacted]

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

As attached

「提意見人」姓名／名稱 Name of person/company making this comment Mr. Wong, Raymond
簽署 Signature _____ 日期 Date June 15, 2020

反對：市建局靠背壟道/浙江街發展計劃(CBS-2:KC)

致城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓
tpbpd@pland.gov.hk

敬啓者：

有關：市建局靠背壟道/浙江街發展計劃(CBS-2:KC)

反對理由：

1. 土瓜灣是九龍少有的純住宅地區，區內沒有大型購物商場，以馬頭圍道為分界，東面有較多商業活動，由於租金便宜，進駐了很多專門招待國內遊客的商舖，特別在翔龍灣、偉恒昌、炮仗街、九龍城碼頭一帶，太多內地低價團旅客已對本區居民造成嚴重滋擾，很多的商舖、食肆、酒樓根本就不是以服務本區居民為目的，旅客的不文明行為，包括大聲喧譁，抽煙，橫衝直撞，小朋友在花叢小便等，已多次在傳媒報導，一提到土瓜灣就會聯想到國內遊客喧譁，與民爭路，旅遊巴與車爭路、泊位等問題，四川街已發生過旅遊巴撞死街坊事件(立法局於 2019 年 5 月 22 日亦有專題討論)，成為土瓜灣區的一大垢病；

2. 本計劃 CBS-2:KC 坐落於馬頭圍道以西，主要為公營房屋(樂民新村)，公務員樓，半山壹號，原本沒什麼商業活動，只有零星小店，一旦改為步行街、地下購物中心，停車場等，務必又引進一大批自由行及低價團旅行，將原本寧靜，純住宅的土瓜灣西區變為另一個喧嘩吵鬧的非民生購物區，打破原本寧靜、治安好的環境，對原本在馬頭圍道以西啲居民滋擾相當大；

3. 市建局的首要工作是協助環境惡劣，殘破失修的樓宇進行重建，計劃中在土瓜灣西重建的公務員樓，並非危樓，沒有結構危險。在文件 CBS-2KC_SIA1 (第一階段社會影響評估中 P.18, 5.1)，亦列明“維修及保養尚可”。事實上，這一帶的公務員建屋合作社，每隔一段時間均會做定期維護和翻新，在 NOW TV 節目，[樓市每日睇 2013]，稱美善同道一帶的公務員樓，充滿歐洲風情法式元素，有巴黎 13-14 區精品酒店的建築風格，雖未達到需要保育歷史建築的程度，但將它與一般結構有危險，如馬頭圍道和黃埔街的寐樓唐樓相比而需要清拆重建，實在可惜；

4. 馬頭圍道以西一帶的居民，一直抱著“忍一時”的心態去承受興建沙中線帶來嘅震盪、噪音、交通擠塞、改路、灰塵、甚至大廈出現的裂紋，終於守得雲開看見落山道、江蘇街的地鐵站出口之際，以為終於可以享用等了十多年的土瓜灣地鐵站，換來的卻是收到市建局有關重建的通知，大部分居民均感到愕然和憂慮！亦有違市建局以人為本的信念；

5. 商鋪亦言，受長年興建地鐵，噪音、改道、灰塵等影響，人流已大幅減少，大部份馬頭圍道的商鋪早已經營不下去，在看見曙光之際，卻又要面對另一個大型地盤影響人流及營商環境，對這些小商戶的經營者來說，亦太不公平；

6. 對於馬頭圍道的住宅大廈的住戶，興建沙中線時已為他們大廈帶來裂紋、石屎剝落等問題已有傳媒廣泛報導，如再在他們身后的美善同道再興建高樓大廈，不排除為他們的大廈結構帶來二次傷害，帶來另一個十年浩劫，亦為住客的生活帶來再次的不便，實在殘忍；

7. 房協曾經推出重建「公務員建屋合作社」樓宇先導計劃，然而反應並不理想，證明公務員根本沒有太大出售其單位的意慾。在市建局馬頭圍道辦事處的同事應很清楚，同一面地產代理舖的公務員樓廣告，標題都是“已補地價”/“只限公務員” 等字眼，但過馬路另一面的地產舖的廣告很多都提會及“具重建價值”/“具收購概念” 等字眼，證明馬頭圍道東面的市場，更期待市建局來收購，市建局在馬頭圍道東面搞拆遷重建，更市場主導，更合邏輯；

8. 政策 3600 度的改變令人摸不著頭腦：

	附圖
a) 2014 年 6 月：在整份“九龍城市區更新計畫規劃研究最終報告”，158 頁的報告從沒有提及美善同道及靠背壟道的的名字，更不用說這一帶的公務員樓需要重建或復修；	A
b) 2016 年 7 月 29 日：房協推重建「公務員建屋合作社」，合作社須齊集相關地段 100%業主的參與；	B
c) 2018 年 9 月 25 日：重建公務員建屋合作社計劃轉交市建局；	C
d) 2019 年 9 月 11 日：政黨強烈要求政府引用土地收回條例；	D
e) 2019 年 10 月 16 日：林鄭月娥施政報告：《收回土地條例》是把“尚方寶劍”	E
f) 2020 年 5 月 20 日：大公報獨家，重建公務員樓業主可買房協資助房屋，	F
g) 2020 年 5 月 22 日：公佈重建土瓜灣兩個公務員建築合作社計畫：市建局總監（收購及遷置）黃偉權 - 如業主不同意收購，市建局會尋求政府使用《收回土地條例》收回買不到的業權。	G
小結：	
h) 按 2014 年九龍城市區更新計畫研究最終報告，收購公務員樓完全沒有迫切性；重建優先範圍應是土瓜灣五街 13 街一帶，以及九龍城道與落山道一帶；	A
i) 市建局的信念到底是以人為本，還是以盈利為本？看中美善同道、靠背壟道地鐵出口這塊寶地，超強校網，非要用尚方寶劍搶奪回來？	
j) 不到五年時間，政策為何有如此 3600 度的轉變？2016 年 7 月，說的是需要集齊 100%的業權，公務員樓才能申請重建。至 2020	H

年 5 月，市建局竟然說如果業主唔同意收購，可以引用土地回收條例收回買不到的業權，<u>由 100%業主主導變為 100%政府主導！</u>是否市建局被區議員/立法局議員的民意/大數據誤導，市建局好心做了壞事？	

9. 被誤導的民意：按九龍城區議員楊永傑接受星島日報訪問時表示，與區內街坊進行初步調查，發現約八成半支持重建合作社(附圖 G) 。如果以此數據提供給市建局，作為應先拿美善同道和靠背壟道的公務員樓作重建試點，意見會有很大的誤導性。美善同道和靠背壟道的單位，在保養水準、交通便利、校網、購物，治安、管理費、少閒雜人等，其它唐樓根本是無可比擬的。按市建局的收購經驗，即使那些條件更差，如大門鐵閘鎖屢遭破壞、偷電、蛇蟲鼠蟻、品流複雜、日久失修的唐樓，要八成業權同意也不容易。如市建局早前想收購的土瓜灣道項目，及深水埗東京街項目等，均達不到八成，更何況是八成半，數據令人懷疑；

10. 地鐵是近期香港社會事件被針對的目標，建築地盤內的所有用具、設施、建築材料均容易被人作為堵路的工具，擾亂社會秩序嘅武器。土瓜灣地鐵站及馬頭圍道正正處於進入東九龍的咽喉地帶，一旦發生社會事件，容易堵住整個東九龍地區，減少在市區地鐵站附近的地盤面積及數量亦應作為社會風險評估的一個考慮；

11. 當年入職做公務員很多都是追求安穩定的生活，買公務員樓除了因為有折扣外，更因為它面積較大可以，可以與父母一起同住，又可以安心生兒育女，不用擔心生活空間，公務員樓可以世代相傳，有安穩的生活直至終老。由於公務員樓售賣有轉讓限制，如以投資的角度購買，是不合適的；

12. 公務員收入穩定，子女又有津貼到英國讀書，所以公務員二代一般受教育水平亦都較高，生活亦較安穩，因此整個社區嘅鄰居鄰裏關係都較好，治安亦佳，鮮有發生如搶劫、自殺、被追數、被淋紅油、家裡吵吵鬧鬧的場面，由於公務員樓都是以自住為主，居民流動率亦較低，如此價質的小社區及鄰居實在其它社區很難找到；

13. 由於沒有追求更大居住空間的必要性，因此很多公務員業主及他們的家屬，均未有在外邊再置業作投資或細屋搬大屋的打算。以我 90 年代大學畢業為例，當時大學畢業生一個月的工資是可以買三英呎樓，現在的大學畢業生，普遍一個月的工資是買不到一英呎樓。如現在要根據土地收回條例，強迫這批公務員或他們的家眷，臨老才要到自由市場去爭房協安置屋，或搬到中轉房屋等待原區重置住面積小很多的單位，也太殘忍，太折騰這班公務員及其家屬吧！亦有違了當初加入公務員團隊想安安穩穩過日子的原意；

14. 如果因為公務員樓是因為當年政府以優惠價賣給公務員，現在就有較大理由可以引用“收回土地條例”收回這私有財產。那其它政府以優惠價賣給市民的項目，例如居屋，港人港地等，將來會否又有較大機會被政府以“土地收回條例” 這把尚方寶劍收回呢？

15. 補地價根本就是機會成本：以家父是紀律部隊督察為例，當年他是每月拿房屋租金津貼的。當年的津貼，是足夠讓我們一家四口在市區租一個新樓三房連車位的單位，該單位目前已有 39 年樓齡，現市值月租是 HKD 2.5 萬，一年就是 30 萬，20 年就是 600 萬。假如目前政府提供同樣的條件，給你可以用折扣價購買一個大單位，條件是你需要放棄未來 20 年的 600 萬房津，而且單位將來有機會被政府按所謂同區 7 年樓齡的市價徵回，政府徵回時你還要補回當年的折扣百分比，我相信沒有一個人會願意購買，除非你是“麥齊光”，拿租金津貼租回自己的單位。因此補地價完全是一個“機會成本”(Opportunity Cost)，所謂 1/3 or 2/3 未補地價我們早已付了，是家父犧牲他的租金津貼兌換回來，政府徵回單位時不可能要家屬補回。否則，當年的租金津貼就白白犧牲了；

16. 最後，我居住在美善同道這單位 30 多年，三代均居住在這裡，對這單位、鄰居、社區有深厚感情，多年來已投資過百萬裝修這單位。目前兩位小朋友亦在本區上學，均可步行往返學校，當他們看見家門外、美善同道、靠背壟道一帶貼滿市區重建局的文件，誤以為是拆遷通知，異口同聲的大表反對、大表憤怒；

17. 按文件 CBS-2KC_SIA1 第一階段社會影響評估，P.28 結論 9.1: ‘由於合作社樓宇並沒有電梯或其他無障礙設施，一些居民特別是長者期望搬遷至設有現代化設施的樓宇單位，可能會歡迎透過金錢補償或安置(如適用)而改善他們的居住環境，但其他的受影響人士則可能不願意受到打擾，只想維持現狀。’ 我的立場亦很簡單、很清晰，只想維持現狀，什麼補償安排亦沒有興趣。

--完--

此致

受靠背壟道/浙江街重建項目影響公務員暨家屬

Raymond Wong

2020 年 6 月 15 日

附圖 A

2.1.1 本章旨在匯報九龍城區基線資料更新的主要重點及分析結論，更新後的基線資料有助讀者了解九龍城區各方面的最新情況，並作為討論該區市區更新課題的起點。有關更新工作於2012年中旬進行，資料更新至2012年6月，主要以兩份研究文件作基礎，包括由九龍城區議會委託顧問進行並於2010年完成的《九龍城市區更新地區願景研究》以及由諮詢平台於2011年編製的《九龍城市區更新願景 - 回顧與前瞻》，並着重了解及分析初步方案所識別出市區更新焦點範圍的現況，當中包括龍塘分區的東南部、土瓜灣分區及紅磡分區，作為其後制訂更新計劃的基礎。初步方案的市區更新焦點範圍及其市區更新方向詳情如下：

重建優先範圍
- 土瓜灣五街及十三街一帶
- 土瓜灣九龍城道與落山道一帶
- 土瓜灣環字八街 / 銀漢街 / 崇安街一帶

復修及活化優先範圍
- 龍塘街前圍道一帶
- 紅磡溫思勞街 / 機利士南路一帶

重建及復修混合範圍
- 土瓜灣銀漢街 / 上鄉道 / 貴州街 / 旭日街一
- 紅磡庇利街 / 春田街 / 崇安街一帶
- 紅磡黃埔街 / 寶其利街 / 蕪湖街一帶

活化商貿範圍
- 紅磡鶴園街 / 鶴園東街 / 民裕街一帶

Study on Urban Renewal Plan for
Kowloon City
九龍城市區更新計劃規劃研究
最終報告
2014年6月

附圖 B

主頁 / [illegible] / 重建「公務員建屋合作社」樓宇先導計劃

重建「公務員建屋合作社」樓宇先導計劃

[illegible]

[illegible]

- 2016 年 7 月 29 日，房協推重建「公務員建屋合作社」：房協早前已為先導計劃訂立準則，如提出申請的合作社須齊集相關地段 100%業主的參與，並於合理時間內簽署具約束力的協議及完成買賣交易；此外，重建地盤面積合計不應少於 1,400 平方米，以便為「資助出售房屋」項目提供所需的發展空間。

附圖 C

- 2018-09-25

- 2019 年 9 月 11 日- 東方日報全版廣告

附圖 D

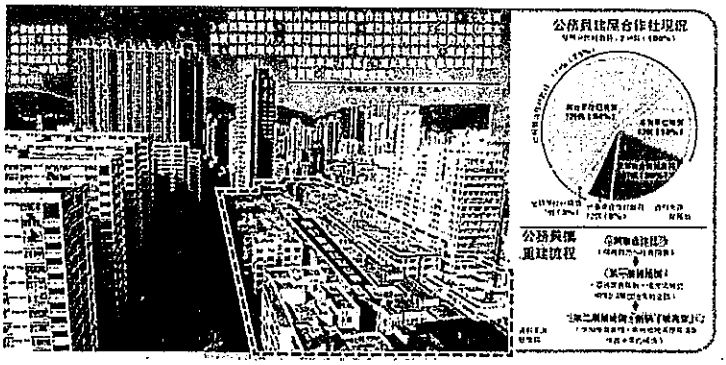
附圖 E

附圖 F

重建公務員樓 業主可買房協資助屋

時間：2020-05-20 04:23:19　　來源：大公報

下一篇：林鄭：專責個案下影響復課



圖：市建局重建試點項目，較大機會是位於土瓜灣英皇道及馬頭圍道一帶逾30幅合作社

市區重建局最快月內啟動公務員合作社樓宇重建試點項目，《大公報》收到署家消息，市建局為理順收購，會作出特別安排，合資格自住業主除獲現金賠償外，還可以選購房屋協會的市區專用支置屋邨的資助出售單位，包括興建中的啟德發展區項目。有市建局非執董認為，重建公務員合作社樓宇是「雙贏」，若允許受影響業主購買資產出售房屋，有助理順收樓阻力。

\大公報記者 言敦建（文、圖）

市建局公布兩個土瓜灣公務員合作社重建試點項目

2020-05-22 HKT 12:32

分享 0　分享工具

市建局公布公務員合作社重建試點項目，預計重建後單位總數由目前約600個增至超過3千個。（郭志強攝）

00:00　01:04

隙曉霞報道

市建局公布兩個位於土瓜灣的公務員合作社重建試點項目，預計重建後單位總數，由目前約600個增至超過3千個。完成收購後，會無償撥出部份土地予政府，興建公營房屋。

市建局表示，由於有部份公務員合作社仍然未啟社，要完成相關程序，但要令住戶接受收購，有一定難度，如最終有住戶不接受收購，市建局可能向政府提出引用《土地收回條例》收回業權。

讚 0

過最新一次調查，該區內的公務員合作社數量較多，並且分布較為集中，位處黃大仙東頭邨及新蒲崗邨之中，剛好有三十七個位於該區內，雖然中間位置被部分私人發展項目分隔，但仍可分為兩北兩部分，以高密度方式發展，極為符合市建局早前提及的選址條件。

政府去年曾經公布，計劃將一幅啟德用地預留作重建房協的真善美村，再在真善美村原址重建樂民新村。據了解，由於樂民新村正好位於龍背鹽道公務員合作社對面，推動該處的重建，實相可為日後提早重建樂民新村鋪路。消息人士出：「對不少長者而言，他們會擔心適應困難，故希望能夠做到原區安置，加上現時政府可利用該類用地興建居屋、綠置居或首置盤，可為居民帶來『可租可買』的選擇。」

當局更估計，只要能夠啟動重建土瓜灣區一帶的公務員合作社，可讓整個地區以小社區方式逐步重建，補充當區社福設施不足，並將原有的街道經濟和小店經營模式復現，消息人士說：「希望以此帶來示範作用，作為重建其他地區合作社的藍本，故今次的經驗將會十分值得參考。」

可南北兩部分高密度發展

九龍城區議員楊永杰表示，早前與區內街坊進行初步調查，發現約有八成半支持重建合作社，主要原因為該批連家樓齡現時已普遍超過五十年，面對樓宇老化、頻繁維修等問題，加上沒有升降機，居民上落需行樓梯，對日漸年老的住客均甚為辛苦，因此有不少居民希望重建換取更舒適環境。

楊永杰續指，鄰近的樂民新村日後亦將清拆，區內居民普遍希望於原區安置，以保持區內的鄰里關係，因此亦希望在合作社重建時，撥出部分用地予房協興建資助房屋，讓樂民新村的居民選入，日後再於樂民新村原址撥出部分用地予市建局作交換。

原文刊於《星島日報》

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CB5-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

請見附頁一.

「提意見人」姓名／名稱 Name of person/company making this comment

簽署 Signature [redacted] 日期 Date 13.6.2020.

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附頁一.

就有關市區重建局收購物業 CBS~2:KC 意見如下

1. 這個重建計劃牽涉的單位最多地盤面積最大 ，想必不是一時三刻才推出此計劃, 為何沒有面對面的公開大會，讓住戶可向市建局查詢呢？如因為疫情關係不可有此安排，為何不可以推遲呢？記得這計劃是回應林鄭特首的施政報告，但都已經差不多兩年時間才推出，想必局方已有全盤計劃，但你們給予住戶 提出意見時間是少於一個月，是否合理呢？須知道合作社住戶多是退休公僕或是已上了年紀的長者，他們要和下一代商量。但他們的子女在經濟下滑的環境下 ，是否可以立即冷靜地分析？

2. 長者住戶 未必知道市區重建局收購物業準則簡章（簡章）裏面的字句定義。 另外，靠背壟道/ 浙江街發展計劃 時間 表內更濛糊，究竟這個計劃是城規會 領航 ，還是市區重建局呢？這可印證第一點要開會解釋。

3. 你們要得到法定的住戶首肯才可收購整幢大廈，對嗎？所以，業主希望局方能將所有資料如收購呎價 ， 特惠和搬遷津貼多少， 要補回多少地價給政府等，要如實告訴給業主知道，業主才考慮是否接受這次收購行動。

4. 業主可購買合作社單位的條件是公務員才可以買， 這也是公務員的房屋福利之一，雖然有部分業主已退休 ，但這個單位是他們服務政府時的房屋福利。 雖然，建合作社房屋時，政府是用折現價賣地給當時的公務員起樓，讓當時的公務員可安居樂業，專心工作。所以，作為明理的業主明白如要轉讓，是要補回那時市值的地價。現在業主希望繼續可以在自己單位安享晚年，但因要配合施政報告，要收購我們的單位，但還要補地價，合理嗎？如你們要我們的單位，首要條件是業主不用補地價。
公務員的房屋福利除了可選擇購買合作社單位外，也可以選擇用公務員的配額申請公屋或可自置物業，然後部分供款由政府支付。請問如公務員的自治單位或公屋因重建拆卸要不要不要補回差額，供款給政府呢？所以，業主一致反對補地價給政府。

5. 這個重建計劃由落山道做界線，即由落山道到浙江街，但業主感覺奇怪落山道到合一道那邊，沒有任何重建行動，為什麼呢？那方的樓齡和樓宇結構比浙江街和江蘇街長和殘舊，為何偏偏選中我們這區呢？ 我們業主一致認為我們居住的單位週邊配套設施齊備，交通方便，樓宇結構堅固，沒有漏水。為何要收取我們的單位呢？我們居住這裏幾十年已習慣這裏環境，恐怕未必適應新環境！

6. 現在我們的大廈 管理費便宜，大約 一元一呎，但如因重建遷往其他單位，可能要幾倍價錢一呎，請問退休的業主如何負擔呢？因你們這個重建計劃有業主已有恐懼感，他們驚不能適應新環境，如居住單位狹窄會令業主/我們有情緒病，情緒低落或躁狂等。請問局方這樣對待退休公僕或現職公務員是否合理呢？

結論， 除非有特別誘因 ，大部分業主不希望搬離現有單位或者這區。

SUNNY CHANG [redacted]

附頁一.

就有關市區重建局收購物業 CBS~2:KC 意見如下

1. 這個重建計劃牽涉的單位最多地盤面積最大 ，想必不是一時三刻才推出此計劃，為何沒有面對面的公開大會，讓住戶可向市建局查詢呢？如因為疫情關係不可有此安排，為何不可以推遲呢？記得這計劃是回應林鄭特首的施政報告，但都已經差不多兩年時間才推出，想必局方已有全盤計劃，但你們給予住戶 提出意見時間是少於一個月，是否合理呢？須知道合作社住戶多是退休公僕或是已上了年紀的長者，他們要和下一代商量。但他們的子女在經濟下滑的環境下 ，是否可以立即冷靜地分析？

2. 長者住戶 未必知道市區重建局收購物業準則簡章（簡章）裏面的字句定義。 另外，靠背壟道/ 浙江街發展計劃 時間 表內更濛糊，究竟這個計劃是城規會 領航 ，還是市區重建局呢？這可印證第一點要開會解釋。

3. 你們要得到法定的住戶首肯才可收購整幢大廈，對嗎？所以，業主希望局方能將所有資料如收購呎價 ，特惠和搬遷津貼多少， 要補回多少地價給政府等，要如實告訴給業主知道，業主才考慮是否接受這次收購行動。

4. 業主可購買合作社單位的條件是公務員才可以買， 這也是公務員的房屋福利之一，雖然有部分業主已退休 ，但這個單位是他們服務政府時的房屋福利。 雖然，建合作社房屋時，政府是用折現價賣地給當時的公務員起樓，讓當時的公務員可安居樂業，專心工作。所以，作為明理的業主明白如要轉讓，是要補回那時市值的地價。現在業主希望繼續可以在自己單位安享晚年，但因要配合施政報告，要收購我們的單位，但還要補地價，合理嗎？如你們要我們的單位，首要條件是業主不用補地價。
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結論， 除非有特別誘因 ，大部分業主不希望搬離現有單位或者這區。

SUNNY CHANG [redacted]

城市規劃委員會

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CB5-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

請見附頁一

「提意見人」姓名／名稱 Name of person/company making this comment

簽署 Signature [redacted] 日期 Date 13.6.2020.

tpbpd@pland.gov.hk

寄件者: Rosa Wong <[redacted]
寄件日期: 2020年06月16日星期二 10:05
收件者: tpbpd@pland.gov.hk
主旨: Comment relates CBS-2:KC
附件: Scannable __ _ 2020_6_16_ __9_50_54.PNG; 未命名的附件 00030.txt; Scannable __ _ 2020_6_16_ __9_53_29.PNG; 未命名的附件 00033.txt; Scannable __ _ 2020_6_16_ __9_54_36.PNG; 未命名的附件 00036.txt; Scannable __ _ 2020_6_16_ __9_56_21.PNG; 未命名的附件 00039.txt

tpbpd@pland.gov.hk

寄件者: ben ben <[redacted]
寄件日期: 2020年06月17日星期三 10:47
收件者: tpbpd@pland.gov.hk
主旨: SUBMISSION OF COMMENT RELATES CBS-2:KC
附件: P1.jpg; P2.jpg

2 pages of attachment are submitted for your review.

致城市規劃委員會秘書：

專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓

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意見詳情（如有需要，請另頁說明）

Details of the Comment (use separate sheet if necessary)

對於現在生活環境我們很滿意，不僅交通方便位處市區，鄰里關係良好，樓宇因經常維修而保養得宜。

現是年紀老邁已退休良久的長者，對重建計劃感到非常擔心，有以下意見:

1) 「樓換樓」好像是不錯方案， 但重建項目需時，貴局如何解決在過渡期的安置問題，請提供明確及具體安排作考慮;

2) 同區安置方案的地段聞說是在啟德，請分享具體資料如實際地點及其預計落成日期;

3) 有感整個重建計劃的透明度不足，欠缺實際及明確資料: 例如怎樣計算樓宇內公共空間、如何處理補地價等...問題。大家都清楚合作社建屋是從前公務員的房屋福利政策，選擇了這安排是要放棄其他的，如每月拿取房屋津貼、輪候入住公屋等，現因為政府要主動收回土地，若退休公務員及其家屬要作出大額補地價，等同懲罰並剝奪福利。故很多社員不願意輕言解散合作社，有謂一動不如一靜。

理解政府須要積極覓地建屋，明白讓更多市民安居樂業之重要性。 作為負責任之市民，我們願意配合重建計劃，希望政府及貴局清楚我們這些長者業主的需要，
為重建作出妥善安排，保障大家應有的權益。

謝謝!

「提意見人」姓名 Name of person making this comment 梁培錦

簽署 Signature SIGNED 日期 Date 2020-6-17

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200617-215403-05438
提交限期 **Deadline for submission:**	19/06/2020
提交日期及時間 **Date and time of submission:**	17/06/2020 21:54:03
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就發展計劃草圖提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Draft Development Scheme Plan
「提意見人」姓名/名稱 **Name of person making this comment:**	Pauline

意見詳情
Details of the Comment :

To whom it may concern, As a local businesswoman and a resident of Celestial Heights, I 'd like to say first and foremost your plans are UNSOUND! The infrastructure around this area is already woefully inadequate to support the current level of economic activity. Tokwawan will become even more of a disaster when the new underground shopping street and residential development, that you have authorized start to fill up! How primary and secondary school students supposed to go through Tin Kwong Road in the school peak hour. Some of them even need to stand the in corner between Tin Kwong Road and Ma Tau Wai traffic road. Until you come up with a way to get children and students moving around without congestion, building more and more is not the solution. You have obviously not been in this area at back to school time! The destruction of this civil servants' quarters around Ma Tau Wai Road is totally unacceptable also. You can destroy it once but it will take 10 years rebuild those high rise buildings. There has to be a better way, that includes proper infrastructure development. Air quality and noise to the elders and students are a serious issue too. Those special design civil servants' quarters must be protected, I vehemently object to you simply destroying 5 storeys high and build 30 storeys high rises and put even more cars. Please find more old and obsolete Tanglou in 13th streets to put your high rises and additional roads on, not beautiful Maidstone Road and Kau Pui Lung Road!!! Your sincerely, Pauline Chong

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致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
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有關的規劃申請編號 **The application no. to which the comment relates** CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary) 見附件

「提意見人」姓名／名稱 Name of person/company making this comment SK CHOI
簽署 Signature _____ 日期 Date 18.6.2020

RECEIVED
18 JUN 2020
Town Planning Board

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附件

致城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓

敬啓者：

市建局的靠背壟道/浙江街發展計劃(CBS-2:KC)

我們強烈反對這試點計劃。在 6 月 10 日已呈交了反對意見書 (附件一)，現再有補充，詳述如下。

「第一階段社會影響評估」第 5 項的說法有失實 和 違背《市區重建局條例》5(b)和 5(e)的宗旨

1. 評估中的第 5.1 項-"該計劃內大部分樓宇呈「維修及保養尚可」的狀況" 和 第 5.3 項-"根據市建局在樓宇復修的經驗，即使已完成該類維修工程的樓宇，亦需要每 5 至 6 年進行一次全面性樓宇復修，才能避免樓宇狀況化至失修狀況。"

合作社一向自律管理和維修樓宇，樓宇結構良好，每隔幾年會維修粉飾外牆，做些小修補或更換設施，樓宇結構良好，除了保持自己的樓宇外觀外，也與鄰近的合作社樓宇保持區內各樓宇之間的和諧和鮮活，並非評估中暗示樓宇的維修、保養和整體狀況不佳。

2. 第 5.2 項-"而尚未解散合作社則沒有業主立案法團作樓宇管理"

散了社的是成立業主立案法團作樓宇管理，未散社的仍然按法例由公務員合作社作樓宇管理。評估的說法是錯誤的，是誤導性地說樓宇缺乏管理。

3. 這些評估是為計劃要符合《市區重建局條例》而寫的，如上文所指出，是與事實不符，所以選址是違背《市區重建局條例》所說的收破壞樓宇重建。

4. 評估中沒有探討公務員合作社的樓宇的歷史背景，在社區裏這些樓宇的建築上和文化上的特色，在區內發揮甚麼角色，全無研討，純為選點計劃開項下筆。沒有顧及《市區重建局條例》所說 "保存有歷史、文化或建築學價值的建築物、地點及構築物 " 這批管理得狀況良好近 60 年樓齡且有特色的公務員樓，其特色吸引了電視台常來取景拍攝。市建局應該考慮這點，繼續保留和保育此區有歷史特式建築群。

9. 試點一帶的公務員合作社樓宇是由浙江街至美善同里的，為何不包括一小段由落山道至美善同里的公務員合作社樓宇，落成年分還要早。想怕那規劃會遭受“半山一號”的強烈反對，更特顯那兩份「第一階段社會影響評估」和 「規劃報告書」是有美化和誤導性。計劃顯然沒有考慮和顧及一帶居民的整體利益，蒙蔽城規會批核計劃。所以，規劃是不週全和不實際的，是倒退和誤導的，令原來良好居住環境變差。

<u>不公義兼不能上訴的賠償細則，剝奪了公務員的合法權益</u>

10. 買賣是雙方透明的公平交易，一般發展商收購私人樓，明碼實價，有明確收購價，有不少還有測量師評核估算價報告給與賣方參考，因熾熱的樓市和收購過程的滯後時間考慮，免得業主有損失顧慮而反對，會給與業主還比評核價高的收購價，就是前瞻性的超前價，方便賣方有充足和可靠資料，有效率地作出思考和決定。打一個譬喻，你到餐廳用套餐，先看菜單和價錢，向店員了解收費細節，包甚麼，不包甚麼，若有添加菜式或食材，收費如何，有無優惠等等；適合的就下單，否則另作選擇或起座離店。

11. 今次的計劃是有地價因素。在收樓收地上市民的產業是明確的，政府是洞悉一切的。市建局董事會的核心成員包括政府有關部門，例如屋宇署署長，地政總署署長，規劃署署長和民政事務總署副署長。理應可從各有關部門統籌相關資料，例如，地政總署提供地價，增加計劃的透明度和便利暢順進行，有效率地提供明確收購價，好讓受影響業主有充足和可靠資料考慮和作出決定。事實剛好相反，根據市建局提供的文件，先要承諾接納市建局的收購，才有賠償資料提供，是反常理的運作，是何奇荒謬，不如一般私人發展商的正常處理方式。市建局做法是黑箱和不公義，連消費者委員會所倡議的透明公平交易的基本水平都不能達到，是蒙混和欺騙手法。

12. 試點原本已是一個完善社區，地鐵落成通車後更是一個優質地點，土瓜灣地鐵站出入口與公務員樓是零距離，地價必然會上升。要找七年樓齡有相若的單位，非鄰近的“半山一號”莫屬，雖然“半山一號”的地處和方便程度都不及我們這群公務員樓，卻是較為貼地的市場價值參考。而另一方面，新落成的「翰畋」(美善同道 78 至 80 號) 前身是公務員樓，與地鐵站出入口是零距離，更是貼切不過，更能真實地反映類似的地處和實際地產市場的活動價。按道理市建局以公平公義原則必須列這兩個地點為計算賠償指標的起步點，不是甚麼“七年樓齡有相若的單位”的含糊說法。若市建局硬說甚麼理由，找其他相若面積但樓宇狀況和地點大大不如我們的單位樓宇作比較，其立心路人皆知，有意圖把樓宇的賠償計算基準無理地大幅度壓下去，得出極不合理的賠償金額，兼且業主對最終定價沒有機制去上訴，市建局也沒有提供全資的法律支援。

13. 在那份“市區重建局收購物業準則簡章”第 3 點說：“假設重置單位為同一地區內與收回單位面積相若的七年樓齡單位，並.....”；第 24 點說：“為計算假設重置單位呎價，市建局將會聘請七家專業測計師行進行評估工作。” 上文已指出，符合計劃中最實際相

上加斤。物業的繼承後，家屬也受如此下去的長遠經濟損失。既然市建局是計劃發起人，應如一般地產發展商 (但沒有免地價優勢) 一樣，道義上承擔一切因此而起的收購程序的開支，兼且清付補地價，並且補償給業主貼合市場相若地處的樓價賠償金額，以及所有因計劃引致業主的經濟損失 (例如合理年份的管理費差額)。

19. 再者，賠償方面沒有提及：
(a) 收購及有關金額的交收時間安排，這會出現錢未到手而買不到樓或完成買樓手續所需的一切現金交易；
(b) 過渡期的住宿租金的安排和補償，特別是經濟差的受影響人士；
(c) 因遷入新單位時受影響且本無必要(因迫遷)的開支，例如，裝修，重設合適傢具，水、電、煤註冊登記費/按金等等。

<u>對受影響居民的折騰</u>

20. 很多公務員已退休很久了，積蓄也少了，與家屬二三代同堂，原因：一是家庭的維繫照顧；二是減輕家屬要外住的租金或購買高昂樓價的經濟壓力；三是減輕緊張的樓宇市場的供應壓力；四是在家安享晚年也不願鬱結在安老院 (可減輕政府這方面的壓力)。公務員與其家屬本意是在此長居久安，不必要的計劃帶給業主的影響是牽連甚廣，即時的有精神和肉體創傷 (有些街坊已是八九十年歲)，且有深遠的經濟負擔。本來是業主的公務員因這個不知所謂計劃，變成經濟嚴重損失的一群。那份「第一階段社會影響評估」第 8.8 章節，看似體恤，實質是涼薄和貓哭老鼠的，說可考慮為有需要的業主 (其實因受迫害而變差) 編配入住公屋，原本好地地的業主因遭無理掠奪剝削變成公屋租戶，是何等荒謬和涼薄。政府口口聲聲幫市民脫貧，反過來制造本來經濟平衡的，為政府出力的公務員變成另一批貧窮組別，是不合情理和剝奪公務員本應享有的權利和福利。對於市建局的種種不是，坊間已熱傳多時。市建局是有政府大靠山，有多方面優惠，實際是政府代理出手人，是地產發展商，利用時機，官商勾結，劫貧濟富的掠奪，眼見不可多得的優質地段，把一切拋諸腦後，借個名堂可大展拳腳進帳，說是政府地產商也不為過，失去市建局的原義精神。

21. 原本住在闊落的空間，尤其對退休長者和遺屬的情緒有正面作用，若被無理收購，被剝削後所得的所謂賠償，是買不回如樓宇面積相同的好單位，僅可購買比現時單位面積細小的低質素單位，生活空間質素變差。有好些長者透露，知道計劃後心情憂慮和沮喪，情願行樓梯，都要留死在家中。搬到不認識的狹小單位，失去了多年的街坊老友，失去了價廉物美的街市，人會很快抑鬱而死。本來已完善的社區，因為地鐵通車，變得更加完美，沙中線可到馬鞍山新界和香港島，交通比以前更加方便。想不通為何要清拆狀況良好的公務員樓，剝奪我們的業權和地權，剝奪我們享受住在這區的權利，拆散在社區建立的廣泛社交網絡。這是違反基本法，剝奪了業主在香港特別行政區基本法下所賦予的財產擁有權及財產繼承權益。

和支持。按《市區重建局條例》所述，市建局是去修葺樓宇和重建狀況破壞的樓宇，上文已述我們樓宇是良好的；但很奇怪，在同街道上市建局不收購比我們樓齡還要高的樓宇，卻收我們較鮮明和良好的。又從網上資料和影片得知，多年來已有其他地區個別公務員樓有樓宇問題，主動向政府提出重建，但遭政府冷淡回應，以種種理由推卻了。如果本區有個別原因的失修，按理市建局是可以援手修葺；如果本區有個別樓宇有重建需要，也可單棟式發展，市建局也有重建單棟樓的項目，增加屋宇單位供應量，無必要濫收濫拆。例如，美善同道 78 至 80 號前身是公務員樓，也是單一地段重建發展成「翰畋」。

結語

29. 如上文第 26-28 討論的怪誕選址，街坊們的普遍反應是，比我們年期更早，狀況比我們差的卻不收購，就是因為有兩個新地鐵出入口正正零距離在我們這裡，是黃金地段，發展後可得非常高回報的暴利，藉著政府的邀請，狐假虎威，還威嚇說明要用《收回土地條例》。另一方面，政府為了增加單位供應量，昏了頭腦，忘了公務員合作社樓宇是獨特的公務員房屋福利，同意把這計劃刊憲，是助紂為虐。已經有其他不同地區樓宇業主向政府表達強烈意願，政府應該優先關注他們的狀況很差的樓宇，評估幫助修葺或重建。另一方面，不銳意去用收回土地條例徵收閒置的土地，可增加大量公私型房屋單位供應量，欺善怕惡，多年以來，以各種理由蹉跎歲月。所以，市建局的選址是有違反原來宗旨。

30. 在疫情下推出這試點計劃，借疫情為理由，在網上發報，迴避與居民開溝通大會，以不透明，不公平，不公義的程序，意圖蒙騙受影響居民，糊塗地接受計劃。在 5 月 22 日當天派發的通告，要求在 7 天內交回問卷，但無著眼呼籲受影響業主在甚麼時段內仍可向市建局提交意見，只說所有意見要在 6 月 19 日前向城規會反映，有瞞騙或封殺向市建局提交意見的機會之嫌。好像除了賺錢外，甚麼都與市建局無關。合理的想法，是為 2020 年 7 月 8 日或之前擬備及呈交第二階段社會影響評估報告予城規會作準備，誤導城規會作出批核決定，把責任轉嫁城規會。

31. 今次是市建局第一次直接收購狀況良好的公務員樓，有地價不公開和往後才透露的問題，還用《收回土地條例》強行收屋收地。「第一階段社會影響評估」和「規劃報告書」的評語說法，是偏頗、失實、誤導和故意貶低公務員樓，配合迴避手法，為強推計劃而寫的。計劃是違背市建局的精神，去收破舊失修的樓宇作重建，為未來的收購立下比以前更卑劣的先例。

32. 規劃報告中的發展，是清拆現有良好的樓宇和社區，興建高樓層納米單位樓群，與現在可見實情比較，如「規劃報告書」封面所顯示，是破壞本來良好的社區居住環境。比現時開揚的社區差好多，樓群會使通風變差，令區內悶熱，不光猛。是倒退的計劃。

38. 計劃首先是選址的錯誤，繼而是程序和手法不公平，不公義，有誤導和欺壓性。旺角的波鞋街和灣仔的囍帖街還記憶尤新，吹噓和卑劣手法，最後發展出來的並不是原先計劃的那一回事。如第 10 段例子說明，連消費者委員會所倡議的透明公平交易的基本水平都不能達到，如何令人安心出讓貴重資產?

39. 市建局除了強用《收回土地條例》外，也引用《市區重建局條例》第 25 條款作計劃行動，一切範疇，包括反映意見，賠償，過渡安排等等，不受理，說是交給城規會，轉嫁一切給城規會，令我們申訴無門，甚為氣憤。

40. 所以，我們強烈反對並要求市建局和政府撤回和取消這個選址試點試驗計劃；並懇請城規會認真地考慮不要通過這個不公義帶欺壓性，兼且破壞原是完善和良好樓宇狀況的社區的試驗計劃。也懇請市建局和有關當局日後有任何計劃時先有充分統籌，請透明坦誠地與受影響市民溝通和諮詢，提供明確資料，以合乎程序公義進行。挽回市建局聯同政府在過往的收購項目中的卑劣形象。

41. 見 23 段，有歷史背景的特殊公務員合作社房屋政策下，當時政府是一次性地優惠批地給合作社，公務員是以借錢形式自建房屋成業主，業主是有業權和地權，公務員樓有延續性的繼承權，是政府對公務員給與的房屋福利和承諾，安居樂業。反過來，房屋置業津貼是政府給與公務員金錢津貼置業；同是公務員身分因不同房屋福利，業主身分也截然不同。前者是自資付出，後者是受惠於津貼。明白這點，公務員合作社樓宇並非是一般的樓宇。前者是來得艱苦，請多些體恤。

此致

一群受計劃影響的居民

2020 年 6 月 17 日

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** _____

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

詳見附件

「提意見人」姓名／名稱 Name of person/company making this comment KONG KEE TUNG
簽署 Signature _____ 日期 Date 16/6/2020

RECEIVED
18 JUN 2020
Town Planning Board

234

致　城市規劃委員會

香港北角渣華道 333 號北角政府合署 15 樓

敬啓者：

<u>市建局的靠背壟道/浙江街發展計劃(CBS-2:KC)</u>

本人反對城規會通過此計劃，原因如下：

<u>環境方面</u>

本人居住於落山道鄰近美善同道及靠背壟道已超過廿年，喜歡此區的環境清幽，旺中帶靜，通風採光良好。重建計劃把現時低密度的公務員樓宇拆卸，認為絕對會對本人居住環境帶來負面影響。

<u>通風採光將變差空氣環境質素下降</u>

現時低密度的公務員合作社樓宇只有五至六層高，與樂民新村形成建築群的和諧配搭，給樂民新村及周邊帶來光明和十分通風的開揚居住環境。一帶的低密度矮樓層公務員合作社的樓宇發揮了健康緩衝寧靜地帶，隔離了馬頭圍道的繁雜。

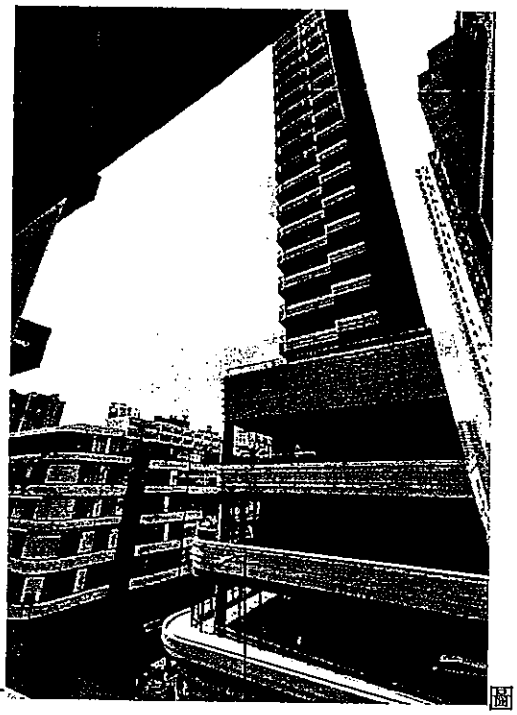
規劃建議中的高密度納米樓樓群，其實給樂民新村和周邊制造了屏障，陽光、通風、噪音等等的探索和評估，看似專業科學的研究，規劃說設計如何能改善區內居住環境，純粹是建基於概念的假設上再假設的評估。（報告內沒有比較重建前樓宇和計劃興建新樓宇的通風及採光度。事實上，無論興建 120mPD 還是 140mPD 的高樓，其通風及採光效果一定比現時為差。）

從以下照片合成圖所見，

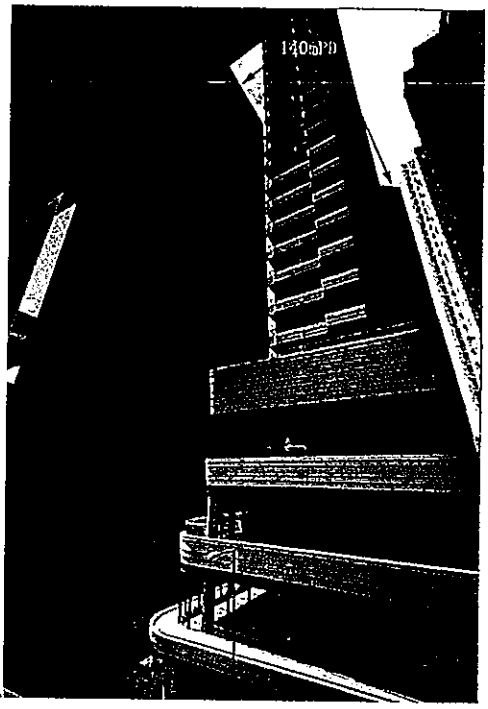
圖一是重建前落山道角度的景觀，

圖二是根據報告書中重建後的情況。

重建後建築群的體積及高度，必然會產生熱島效應，阻擋光線和空氣自然流通。這幾年位於美善同道和落山道交界建成的私人住宅"翰畋"已經讓本人及其家人感受到採光度減少，居住環境變得比以前陰沉，重建後情況定會加劇，不單更大範圍遮擋著附近樓宇的視野，影響此街道景觀的開揚性，區內的空氣環境質素一定會下降變差。



圖一



圖二

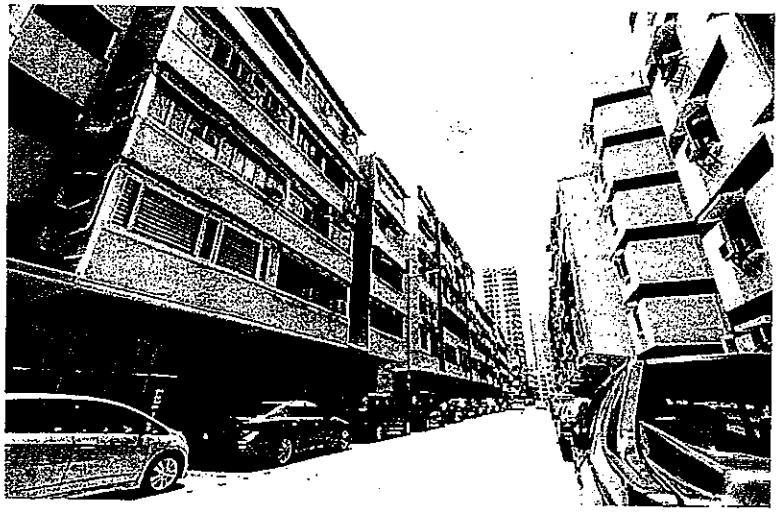
反觀現時低密度的公務員樓宇上空，是無遮無擋的空間，肯定與計劃中的概念設計無法類比的，重建方案對附近居民有害無利，也會令這區的各類環境質素變差。（又例如"半山一號"落成後，已阻隔該方向的光線和通風，不如以前舊警察宿舍時那麼開揚通風。）

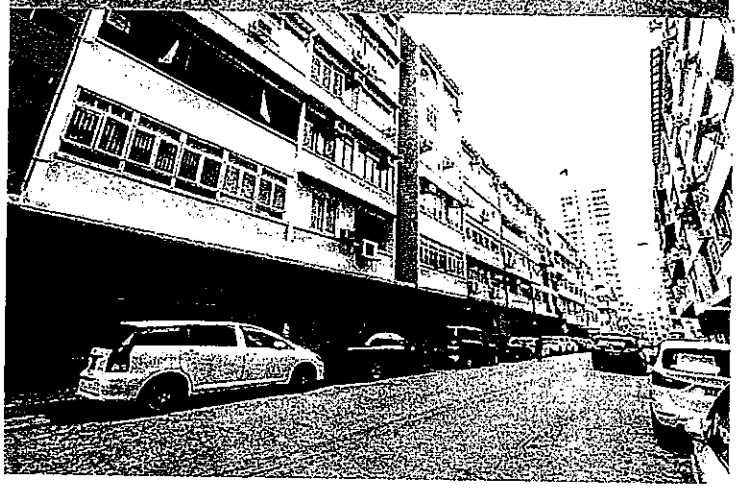
<u>破壞原有美好環境反映報告失實</u>

合作社房屋有別於同區其他地方，一直都保養完善，大家都很喜歡這個社區。本人出入經過也看到這些樓宇有定期維修及翻新，認為區內絕大部分樓宇是狀況良好至非常良好的，沒有拆卸的迫切性，斷不是市建局於第一階段影響評估報告中所形容"保養尚可"及"沒有樓宇管理"，把管理很好的物業與土瓜灣一些較為失修舊區（例如十三街）混為一談，企圖誤導城規會及公眾。

美善同道/靠背壟道 vs 十三街

美善同道：





靠背壟道：

十三街：

回顧 2017 年當局撤回中環士丹頓街/永利街重建項目改劃申請的案例，當時規劃署表明不支持當局是次申請，署方的意見強調有關唐樓於不久前才維修以合乎屋宇署的命令，狀況良好而非市建局所指的「不佳」。這令人質疑當局有否汲取教訓，作政策上的改進及事前對清拆社區而引來之各方面影響進行仔細的討論和處理，還是重蹈覆轍，及只是基於跟從施政報告中所提及要揀選公務員建屋合作社作為重建試點，而隨隨便便選一個區域下刀？

步行街設計並不以人為本

以施政報告增加樓宇供應量為由，規劃中說是地下連通地鐵站，設立步行街，是不切實際的，參看現時各地鐵站內的店鋪可見一斑。以囍帖街為例，囍帖街現在只是一個名稱，沒有當年街道的特色和社區功能，發展後的商店和步行街，華而不實，沒甚麼特色和吸引力，人們只是通過那條街道，商店門堪羅雀，失去原有社區活力，與毗鄰舊式樓宇的街舖的營業情況也大比下去。

在土瓜灣區內，商店集中在馬頭圍道以東，即使從這邊住宅區到區內商店集中區域只屬步行距離，十分方便，商店服務範圍亦足以應付此區人口。

而且，土瓜灣區內各式各樣的商店是與日常民生息息相關的，物價相宜，吸引區外人前來購買日用食材和用品，不是那些如商場模式般可有可無，一式一樣的商店可以比較。

新冒起交通及治安問題

概念設計中的步行街有機會引仲新的交通問題。

原有的區域分佈一直都是馬頭圍道以東是街市及購物中心，以西都差不多是純住宅，而且一直延伸到漆咸道都是這樣的分佈，形成一個土瓜灣有靜有旺的清楚分界。

現在這計劃把本來已是井然有序的街道圍圈起來，把傳統的靜區加入商業步行街大量商舖，破壞了有利交通暢順的街道設計及原有的寧靜環境，減少原有街道面積，隨著人口和人流激增，大量旅遊巴停泊，區內的交通情況一定惡化，空氣和噪音污染嚴重。

另外，向來此區治安良好，若重建變成步行街，及把開揚闊落的單位變成為人詬語的的高密度樓群的納米樓，預計大量增加的人口和人流，把原本寧靜和人口平衡的社區，變成人煙稠密的社區，到時人流複雜，整體居住環境質素反而變差，區內治安問題會容易惡化，周邊居民定必受影響。

這地段是本區擁有難得的美好居住環境，完全沒有重建的必要性及逼切性。

保育方面

評估中沒有探討公務員合作社的樓宇的歷史背景，在社區裏這些樓宇的建築上和文化上的特色，在區內發揮甚麼角色，全無研討，卻為著選點計劃開項下筆。沒有顧及《市區重建局條例》5(e)-"保存有歷史、文化或建築學價值的建築物、地點及構築物"這批管理得狀況良好近 60 年樓齡且有特色的公務員樓，其特色吸引了電視台和電影制作公司常來取景拍攝（例如電影《意外》、《奪命金》、2020 年度 ViuTV 電視劇《二月廿九》等等），反映他們亦欣賞此區的環境和樓宇藝術特色，攝取特色景物得以豐富他們制作的藝術內涵美，同時是對本區的認同。當局應該依《市區重建局條例》5(e)繼續保留和保育此區有歷史由來的特式建築群，是香港各類屋宇發展的集體回憶，留下有跡可尋的歷史，以免長久下去令香港淪落成失去了原有文化，給人一種到處也是設計相似，沒有特色的高樓，也抹殺了下一代及外邊的人認識香港本土歷史的機會。

社區方面

當初本人廿年前選擇住在此區是為了方便照顧居住於美善同道（是次重建計劃範圍內）的家人親戚，多年來有著緊密的家庭聯繫，能每天探望。

重建計劃強逼親戚老人家搬遷到陌生地方，除了擾亂他們向來寧靜、和睦、互助的社區網絡，帶來精神及體力的大折騰，他們需要重新建立社區網絡，對年紀大的老人家說來說是非常奔波操勞操心；我們的家庭連結因此而被破壞，不能每天探望，亦有機會要去照顧及處理他們因重建搬遷而引起的精神和心理問題，而且探望及照顧所花的交通時間和支出將大增，為我們帶來很多不便和壓力。

咨詢方面

正當以為可以透過當局發佈的一些研究文件，希望對此重建計劃有進一步了解時，很遺憾地發現那份長達 658 頁的「規劃報告書」只有英文版本，許多人是看不懂和理解的，特別是長者。

未知市建局和有關部門是有甚麼十分的迫切性或是藉疫情為由，沒有安排與居民溝通的大會，解釋有關研究評估和解答相關提問，改為在網上發報。從 5 月 22 日突然公佈重建計劃，在短短的咨詢期中及在毫無解釋和可靠資料下，居民如何可以對這龐大兼且影響深遠的計劃作出合理和可靠的回應？當局亦未有積極宣傳及鼓勵市民發表意見，有很多周邊居民也對此計劃不清不楚，要知道周邊居民也是計劃中受影響的一方。

這是有形無實的假諮詢，是程序不公義的黑箱作業和迴避手法，以快刀斬亂麻的方式，好讓苦主及附近居民糊里糊塗地接納，蒙受不必要的嚴重長期經濟損失，以致精神和經濟上打擊和困擾。實際是為第二階段的美化評估報告作準備，撰寫可靠性和反映性極低的不公義失實甚至誤導性高的評估，誤導和陷城規會不義，作批核決定。

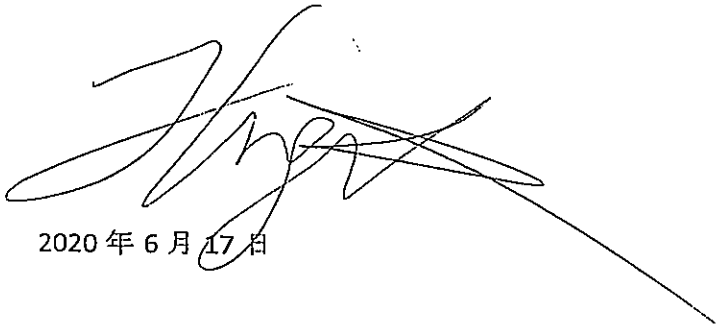
總結

以上是反對這重建計劃的理由。本人要求撤回這個不透明和不明所以的選址試點試驗計劃。懇請市建局和有關當局日後有任何計劃時先有充分統籌，對清拆社區而引來之各方面影響進行仔細的討論和處理，而不是給一份避重就輕的報告書便蒙混過關，要透明坦誠地與受影響居民溝通，提供明確資料，以合乎程序公義進行。

沒有人比受重建影響的居民和周邊居民更熟悉社區的情況、動力、潛質、問題和改善的方向。除非當局從來不打算聆聽我們的聲音。居民的意願、需要和各種生活習慣，是重建計劃的重要考慮，而不是容許我們淪為商業利益主導的市區重建政策下的犧牲品。

此致

受靠背壟道/浙江街重建項目影響的周邊居民



2020 年 6 月 17 日

tpbpd@pland.gov.hk

寄件者: M Leung [redacted]
寄件日期: 2020年06月18日星期四 4:08
收件者: tpbpd@pland.gov.hk
主旨: Fwd: COMMEMTS ON CBS-2:KC
附件: Comments on CBS-2KC.pdf

Dear Sir/Madam

I refer to my e-mail to you just now and enclose my comments on CBS-2:KC for your perusal.

Yours faithfully

Maria Leung

---------- Forwarded message ---------
From: **M Leung** <[redacted]
Date: Thu, 18 Jun 2020, 03:43
Subject: COMMEMTS ON CBS-2:KC
To: <tpbpd@pland.gov.hk>

Dear Sir/Madam

I enclose my comments on CBS-2:KC for your perusal.

Yours faithfully

Maria Leung

致城市規劃委員會秘書：
by e-mail : tpbpd@pland.gov.hk

有關的規劃申請編號：CBS-2:KC
意見詳情：

本人對於今次政府收購重建的意見可分為三大部份：(一)政府取試點太草率，(二)沒有清晰詳細收購及安排，(三)心聲。闡述如下。敬希細閱。

(一)政府取試點太草率
政府要取這一帶作為試點是太倉卒。
(1) 為何要在這疫情嚴峻下強行此計劃？需知這是很大很大的工程。會涉及很多法律問題、工序及很多文件。本應該要舉行座談會給合作社社員，清清楚楚的解說所有一切，亦可讓社員查詢所有疑慮，才是公平的交易。但現因應疫情嚴峻，只是放下一大堆文件，又叫社員上網觀看甚麼甚麼。試問那些年事已高的社員如何做得到。難道要他們不清不楚的就把自己興建的屋宇被政府搶奪了嗎？為何不待疫情過後才正式開始。好讓各社員得到清晰的解說，公平的交流，這不是好辦得多嗎？
(2) 我們這一帶的合作社時不時都進行大大小小的大廈維修以保持質素良好。況且，我們去年剛剛完成了政府推出大廈修葺的指令，各社員都付出了一筆可觀的數字。怎料大廈要被砍爛鏟平，有如把大筆辛苦儲下來的金錢掉進鹹水海！相信政府推出指令時，另一方面都已知這一帶要進行收購重建計劃，為何還要我們花了辛辛苦苦儲下來的金錢作大廈維修呢？這不是對這批年老的公務員很不公嗎？相反，為何不去找一些本已破爛不堪從不作維修的合作社，或那些從來不聽政府指令不作維修而又得到政府關顧

的破爛舊樓來重建呢？這豈不是來得實際得多嗎？
(3) 雖說將有鐵路落成。但需知這鐵路是十多年前計劃興建以解決及舒緩當年或可說估計完工年份時的人口增加而興建。試問是否可以承受當重建完成後所增加的人口呢？到時交通阻塞問題豈不是又重生了嗎？

(二)沒有清晰詳細收購及安排
另外問題是這收購重建計劃來得太草率。沒有關顧到社員的憂慮。很多重要問題都不能作出清晰的答案。怎教眾多的社員能安心作出正確的選擇呢？這有如強搶民居！我們的憂慮是：
1) 沒有明確的收購價，或還有任何費用要支付，社員實得的賠償是多少、補地價[見(2)下]又是多少等等。在這一切未明朗前，已經要社員作出表態及決定，實屬不公。
2) 為何要加上補地價條款？這個是最不恰當。當初，政府雖是以借款形式給社員自行建設合作社，這似乎是幫助了社員。其實想清楚，這是政府得益多於社員。社員是要還款的，而且由設計、繪圖、劃則、建屋都是社員自己負責的。政府不用花費額外金錢及人力就已解決那麼多公務員的居住問題。所以，是誰得益最多呢？相比現在政府要花費大量金錢才能進行興建居屋、公屋給市民。而他們是不需付出甚麼的。試想，政府還要收取補地價是公平嗎？
3) 如社員不接受今次政府收購重建的條件，後果又會是如何？要知道很多社員都年事已高，甚至不願搬離久已習慣的舒適居所及附近環境。
4) 雖然似乎是免費提供律師幫助散社。但沒有清楚說明還有其他可能的費用。例如：要取得業權、轉承繼權、成立業主立案法團等等不同的開資要花費多少？
5) 沒有說明收樓後還有多少時間讓社員找尋新的居所。要知道很多社員都年事已高，要找新居所真的要花很多時

間。要知道新的居所一定比現在每個月的費用會大很多。更可能超出他們的能力。如真的未能找到居所，政府如何安排或協助？

6）雖說可以樓換樓，沒有說明若所揀的樓未能如期落成，政府如何安排及協助？又會否牽涉其他費用社員要負責？

(三)心聲

本人與家人自本合作社建成後已同住於本區，即已超過40年多。由當初這一帶是一個很寧靜的地方，至各高樓大廈在此興建，那些大大的沙泥灰塵，交通的不便等等，我們都忍受過去。跟著年月過去，經歷那麼多年，這區人口更加漸漸多了，交通更變得常常阻塞，政府找不到好的方法去解決，我們都忍受過去。

豈料自紅磡海底隧道於1972年通車後，阻塞情況變得更甚，交通於大部分時間(幾乎全日)都變得水涉不通！我們都忍受過去。

後來得知要改善這區交通，政府決定興建沙中線以助解決這區人口增多的交通問題，於2010年開始施工。我們又開始要忍受這一大工程所帶來的惡劣環境、交通更加變得一團糟。不過，這都算了。只想著忍多十年，這處交通就可以有大大的改善，就會有好的日子吧！豈料，因多種不同原因弄至這區的地段推遲再推遲。

這種種不利這區的居住環境，我們都沒有搬走的念頭，是為什麼？理由是我們喜歡本社的建築設計及單位的間隔實用及坐向。而且本社各社員都很融洽相處，這是最值得珍惜的。還有，大家都有共識去維持本大廈的質素是要緊的。因此，各社員於那麼多年以來，就算辛苦一點都願意負責一定的數目作為久不久的大大小小維修。我可以肯定一向以來我們這處的大廈是最具完善質素之一的合作社。

我更加要強調我們最喜歡的是這一帶靜中帶旺的居住環境。要知道我所講我們喜歡的是這一帶(即現時計劃重建中的 CBS-2:KC)，而不是土瓜灣全區。心想著只要沙中線通車，就可以享受我們忍耐得來的成果了。 豈料，於五月時突然從新聞得知這一帶要被列為重建試點，真是晴天霹靂！

要知道很多社員都年事已高，甚至不願搬離久已習慣的舒適居所及附近環境。再加上是經濟問題，新居所每個月/每年的費用一定比現在的大得多，更可能超出他們的能力。

試問政府為何以如此狠的政策，讓這班年老的公務員或遺孀以後過著不安的生活呢？

「提意見人」姓名：Maria Leung
日期： 2020年6月17日

Last modified: 03:19

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

請看附件

「提意見人」姓名／名稱 Name of person/company making this comment nat

簽署 Signature _____ 日期 Date 13 JUN 2020

1 賠償要合理

附件

*1952 年合作社公務員付三分一地價是公務員福利，現在市建局要收回，還要合作社公務員付三分之二地價，如果合作社公務員知道幾十年後要補地價，合作社公務員當初會否參加合作社？

公務員選擇買私樓是否會更加合理？

以居屋為例，市建局會否追收只求安穩居住的居屋居民補地價？

*好多住在合作社的公務員都是當時的精英，政府為了挽留人才才有合作社的計劃，而且住在合作社的公務員都是做到退休為止，為政府服務了幾十年，到最後都不能有一個安定的居所？

*住宅最高地積比率 10 倍，由原本四層變做 20 層一定有賺，以往市建局大都是重建伙數少的低密度舊樓可以發展剩餘地積比率來賺取回報係高利潤回報，公務員樓的地積比僅 3 倍，重建後可增到 7 至 7.5 倍。

*十多年樓齡呎價都要平均一萬七千五百蚊，請問我哋得到的賠償能夠係同區買會同等呎數的住宅嗎？

*如果合作社諗住賣出業權，可以一早像美善同道 6 及 8 號以拍賣形式賣出，就係因為合作社居民只係諗住有個安定的居所，才不賣出業權。

*現有居民是有三房，有些單位更是住滿六人，請問現在怎樣安置這六

人(不單止房間一般是兩間，而且實用面積更加細。

*即使政府唔係用呢個方法計算也很類似

補地價計算方法如下：

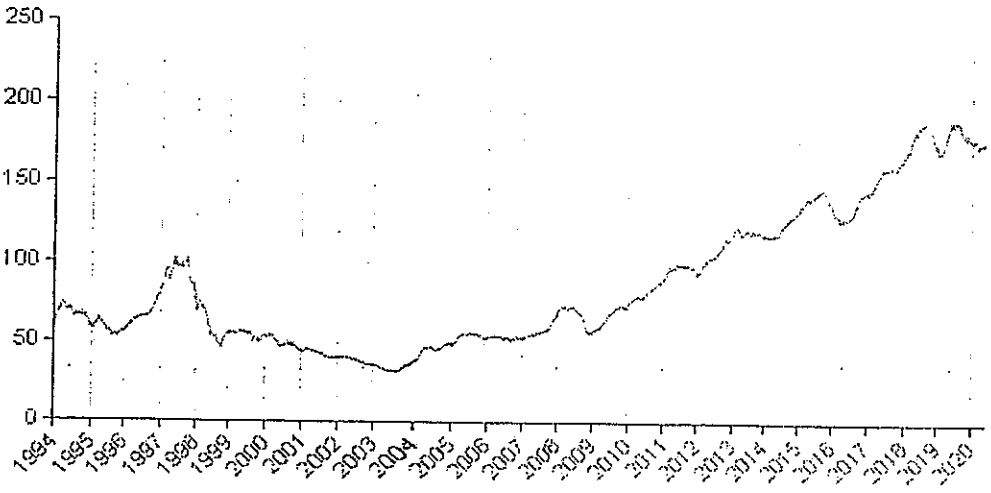
補價 ＝ 補價時市值 × {(購入時十足市值 － 原來樓價) ÷ 購入時十足市值}

最大問題係越遲補地價越唔著數

因為點都用到補價時市值

假設舊年補價時市值是 200 萬，但係今年樓價升咗 10%即係 220 萬，即係要補多啲

中原城市領先指數 CCL 由 1994 年到現在已經升咗 2.5 倍



所以現在合作社居民係冇諗住賣出，只求有個安穩嘅居所，如果要賣出一早已經補咗地價，唔會等到幾十年後才補地價。

2 生活條件轉差

*城規會的宗旨是促進社區的衞生、安全、便利及一般福利，為市民締造一個組織更完善、效率更高和更稱心的居住和工作環境。而不是犧牲原有居民的居住環境及福利，去完成重建。

*位於未來港鐵站出口旁，這是合作社居民一直渴望擁有的福利，但係港鐵一起好，就要為住屋擔憂。

*樓宇現況很好，亦有維修，無需重建。

*經過逃犯條例事件和武漢疫情，失業率明顯上升，各人需要一段時間復原，若由一個生活安定的環境轉去一個擠迫狹窄啲住屋條件，一定會發生各樣問題，例如家庭糾紛，又會影響消費意欲。

*即使有工作的，面對無薪假期和減薪，對生活已受影響，若加上住屋生活環境的變差，必定引起社會各樣問題。

*合作社的公務員大部分都是退休人士，他們對醫療的需求亦都很重要，現在他們求醫的地方，就只需要過一條馬路的土瓜灣政府診所，若搬往別處或者更遠的地方，必定對他們的健康有壞的影響。

*喺教育方面，合作社處於 34 校網，有著名小學中學，例如華英中學、陳瑞祺喇沙書院等，若改變他們的住所他們的子女便不能享有原有的福利。

*喺香港文化方面，美善同道是一個重要的角色，有很多著名電視電影都在這裏取景因為這裏民風純樸亦有住戶借出屋內環境給製作人員拍攝，若不能原區安置這種文化很難得以承傳，失去區內原有特色。

*喺生活環境方面，合作社居民都能夠保持空氣清新，低水質污染，低噪音污染，這都全憑美善同道和浙江街居民的生活素質和修養所能達致。

*喺娛樂方面，最近的莫過於高山劇場，足球場，公園，石春路，這都提供現有居民最方面的娛樂運動設施，若搬離這地點，能夠參與這些設施的機會必定減少。

*若重建，這裏的消費物價必定上升，原本住在這裏的居民，要應付狹窄的生活空間，也要面對高昂的消費物價，必定減低這區的消費意欲。

*市建局也應考慮對現有居民的社會責任應盡量避免對現有居民造成負面影響。

*飲食方面合作社居民只需過一條馬路就可以去到街市買到心儀的食材，若搬往別處變對他們的生活質素降低。

*交通方面合作社居民只需半條街的距離便可以有就近的巴士站，少於一分鐘便可以乘搭港鐵，這些都是原有居民一路享有的福利，所以原區安置才能維持居民的生活水平。

*美善同道 80 號翰畋管理費$4.48，我哋現在交緊都係一呎一蚊相差四倍半。

3. 雙贏方法

*建議重建後給予合作社社員同區呎換呎，並在過渡期給予合作社社員搬遷及租金津貼，

如果市建局能夠做到同區呎換呎，相信任何重建項目都不會受到居民反對，因為居民所要的是安定的居所，而市建局所要的是順利進行並受到廣大市民參加重建，市建局所出的是建築物料費用和工程費用，這些費用相比補地價和津貼更少，因為重建的都是低密度住宅和低地積比率，重建任何一幢低地積比率的大廈，而起過一棟新的高地積比率大廈一定有賺，所以這個方法是雙贏。

*測量顧問指出，香港建築成本冠絕亞洲，但建築成本是否構成樓價上升重要成因？其實樓價組成包括地價、建築成本(包括顧問費)、其他費用(利息及雜費)和利潤，當中建築成本只佔樓價 15 至 20%，大部份成本是地價和發展商利潤。

高樓價主因，是由於香港地價高昂。

*喺政府方面，如果能夠推行同區以呎換呎去重建樓宇，必受廣大市民歡迎並增加支持政府人數， 這亦都有利於政府推行其他政策， 居民和政府的爭拗亦都大大減少。

所以唯有同區呎換呎，才能保持現有居民的生活水平，又能讓市建局

順利重建而又受到各區市民歡迎。

結論及建議

*懇請城市規劃委員會以書面回應及強烈建議：同區呎換呎，並在過渡期給予合作社社員搬遷及租金津貼。

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CB5-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

支持城規會重建公務員合作社
意見：一因大廈樓齡已老，維修維修成本高昂。
一要求原區重置，以樓換樓或一步上蓋
實現團以樓換樓加搬遷費津貼。
一附近無長者活動地，需要多些住關空間
一要規劃一個大型商場，方便購物飲食娛樂。
一要建些醫療設施，方便長者醫療需要。
一大角嘴區一直欠缺停車位，可以考慮
建成半座特色的地標建築。

「提意見人」姓名／名稱 Name of person/company making this comment
簽署 Signature [signature] 日期 Date 18-6-2020

250

tpbpd@pland.gov.hk

寄件者: Nelson [redacted]
寄件日期: 2020年06月18日星期四 12:18
收件者: tpbpd@pland.gov.hk
副本: inquiry@mail1.ura.org.hk; judy.chan.npp@gmail.com; vincentcheng@dab.org.hk; amlegco@gmail.com; ckchow@hkex.com.hk
主旨: 强烈反对： 市建局的靠背垄道/浙江街发展计划(CBS-2:KC)
附件: CBS-2KC 城规会反对意见 [关浩洋议员].pdf

见附件

强烈反对：

市建局的靠背垄道/浙江街发展计划

(CBS-2:KC)

致城市规划委员会秘书：
tpbpd@pland.gov.hk
香港北角渣华道 333 号北角政府合署 15 楼

各位领导、特府大人物：

市建局早前公布启动土瓜湾乐民新村旁公务员合作社楼宇重建试点项目。回顾该合作社的一段历史，一众住户甚感无奈，认为政府一直要求我们与小区发展共患难，承受着种种不便，但当小区设施渐见完善，当局又将我们遗弃，赶离小区，无法共繁荣。

上世纪 50 年代，政府批地兴建合作社时，附近一片荒芜。到 60 年代，为了发展乐民新村，政府在合作社背后的山坡开山劈石，居民每日被逼生活于沙尘滚滚之中。随着乐民新村于 70 年代开始陆续入伙，区内人口不断增长，居民又面对小区设施以及交通配套不足的困局。及后，政府公布《集体运输计划总报告书》，居民满心欢喜，期待铁路发展可以改善区内交通。遗憾是苦等了 40 年，相关工程才正式动工。转眼间，10 年工程期过去了，居民除了继续饱受沙尘滚滚之困，更因地铁施工问题而令楼宇出现安全威胁，每日惶恐不安。近日，政府公布屯马线将于 2021 年通车，经历土瓜湾超过半世纪的发展过程，居民满以为终可享受社会发展后的成果之时，却突然被要求收回土地，居民感到十分无奈。

我们认为当年公务员合作社的政策，目的是为公务员提供住屋福利，为政府留住人才，也是公务员用一生的工作换取政府提供的房屋福利，现在政府要收回土地，却未有像何爵士宝翠园的妥善安排，是剥夺我们作为公务员的房屋福利！

为此，我们强烈反对今次市区重建局 CBS-2:KC 的发展计划，以及计划内向城规会提出的相关改动申请。

当年前市建局非执行董事蒋丽云议员出席合作社旧楼的业主申诉会和参观的单位，是在长沙湾顺宁道一带的咸水公务员楼，不是美善同道、靠背垄道这一带！这一带保养和环境都很好。希望现届市建局主席及民建联同仁不要搅错地方，好心做了坏事，迫我们这边的老干部及家属拆迁，老人家寝食难安！

此致

受靠背垄道/浙江街重建项目影响公务员暨家属

邵太

2020 年 6 月 18 日

副本致：

市区重建局
inquiry@mail1.ura.org.hk
香港皇后大道中 183 号中远大厦 26 楼

非执行董事（非官方成员）
陈家佩：judy.chan.npp@gmail.com
郑泳舜：vincentcheng@dab.org.hk
麦美娟：amlegco@gmail.com

主席
周松岗, GBS, JP：ckchow@hkex.com.hk

tpbpd@pland.gov.hk

寄件者: Chor Fan Julia Tang [redacted]
寄件日期: 2020年06月19日星期五 10:51
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主旨: Re: Project of Urban Renewal Authority (CBS-2:KC) - Comments on Kau Pui Lung Road / Chi Kiang Street Draft Development Scheme Plan

To: Urban Renewal Authority

Dear Sirs

Re: Comments on Kau Pui Lung Road / Chi Kiang Street Draft Development Scheme (the "Scheme") Plan

Further to my e-mail to the Secretary, Town Planning Board and the Urban Renewal Authority ("**URA**") immediately below ("**1st E-mail**"), I set out my additional comments and questions for your attention:

1. People Affected Denied Right To have Objection Entertained and Considered

I am surprised to find that while the URA announced both the Scheme and the Shing Tak Street / Ma Tau Chung Road Development Project ("**Shing Tak Street Project**") on the same day (i.e. 22 May 2020), the deadline for the public to make comments on the draft Development Scheme Plan of the Scheme is 19 June 2020 (i.e. less than 1 month from announcement of the Scheme) but for the Shing Tak Street Project the deadline for submitting objections to and comments on the project is 22 July 2020. May I know the justifications for the difference in treatment in terms of right of the people affected by the 2 proposed redevelopment projects to raise comments and objections and to have their objections entertained and considered? Aren't the residential properties covered by the 2 proposed redevelopment projects of the same type? Isn't it that for both projects, the people affected include civil servants, retired civil servants and / or their family members? Does this arrangement violate the fundamental principle that all Hong Kong residents shall be equal before the law as expressly provided in Article 25 of the Basic Law?

Does the URA expect people affected by the Scheme to digest the information relating to the Scheme immediately after the Scheme is announced, work full time to try to understand how the Scheme and the arrangements affecting their residence and interest work, assess their implications, seek clarification when necessary and form and express their views on its draft Development Scheme Plan in writing in the hope that their comments can be made to the Town Planning Board in time no later than the deadline of 19 June 2020 while at the same time having to entertain the conduct of the freezing survey?

It is stated in the notice published by the URA in the Gazette on 22 May 2020 that comments on the draft Development Scheme Plan (發展計劃草圖) of the Scheme (rather than the Scheme itself) should be made in writing to the Secretary of the Town Planning Board no later than 19 June 2020. The comments sought are therefore more on the development project to be carried out at the site covered by the Scheme rather than the redevelopment project as a whole (including but without limitation to compensation of the parties affected by the Scheme) or comments from the perspective of the parties affected by the Scheme.

Why people affected by the Scheme are deprived of the right to object to the implementation of the Scheme and have their objection entertained and considered (*Section 25(2) of the Urban Renewal Authority Ordinance (Chapter 563 of the Laws of Hong Kong)*)? Is this in accordance with Article 6 of the Basic Law and manifestation of the "People First, District Based, Public Participatory" approach, which according to the Urban Renewal Strategy issued by the Development Bureau should be the approach to be adopted for urban renewal?

Is the area covered by the Scheme full of dilapidated buildings causing imminent danger to the public and the residents and infested with the problem that the owners of the existing properties in this area all neglect to repair and maintain their properties to the extent that overriding public interest exists that justifies such drastic and harsh treatment of the people affected by the Scheme, many of whom had served the Government for decades till retirement?

2. Unreasonable Requirement for Payment of 2/3 Land Premium

The buildings affected by the Scheme are relatively speaking well maintained and are not dilapidated. While the same formula for calculating compensation is adopted by the URA for redevelopment of privately owned dilapidated accommodation where more than one household may live under the same roof, illegal / unauthorized property partitioning may be involved and risk to public safety may be an issue because of unauthorized building works and / or want of repair and maintenance, there is the exception that land premium has to be paid to the Government for the accommodation affected by the Scheme but such requirement is not applicable for the privately owned dilapidated accommodation. Given that the Scheme has not been initiated or requested by the parties affected and has been forced upon them and the properties affected by the Scheme are all Civil Servants' Co-operative Building Society (CBS) Scheme accommodation, which is a form of housing benefits of civil servants from their employment (i.e. part of their remuneration package and without which the civil servants concerned may have quitted their job in the Government) rather than subsidized housing for Hong Kong residents who meet certain conditions in terms of say income and asset value and opting for this form of housing benefit deprives the civil servants concerned of the opportunity to get other forms of housing benefit, is the first key principle underlying the Government's approach to urban renewal as stated in the Urban Renewal Strategy (i.e. owners whose properties are acquired or resumed for the implementation of development projects should be offered fair and reasonable compensation) followed when the requirement to pay 2/3 land premium applies to CBS accommodation forced to be redeveloped but not to privately owned dilapidated accommodation covered by the URA's redevelopment projects where the obtaining of land at concessionary land premium in the past in the case of CBS accommodation is actually at the expense of not having the right of privately owned property owners to freely sell let and mortgage the property or enter into agreement to do so or just leave the property vacant and being subject to conditions and restrictions imposed by the Government for the housing benefit? Examples of these conditions and restrictions include (a) the parties to whom a cooperative society member may transfer his / her membership are confined to civil servants save for transfer by reason of succession; (b) for a male cooperative building society member his wife's CBS accommodation had to be given up after the marriage (this applies to my family); (c) prevention of double housing benefits where the civil servant has to give up the CBS housing benefit if his / her spouse has housing benefit from employment (whether in the Government or in the private sector).
Would it be rather unfair to a civil servant that opts for CBS accommodation rather than housing allowance for purchasing private residential property when the latter option does not require surrender to or sharing with the Government profit for selling the property but the CBS accommodation option requires payment of the land premium concession even when the sale of the CBS accommodation to the URA is forced upon rather than voluntarily or at the request of the cooperative building society member bearing in mind the requirement for

the civil servant opting for the CBS accommodation to work as civil servant till retirement in order to be eligible for staying in the CBS accommodation after retirement?

Moreover, it appears that the URA's policy regarding compensation is to enable an owner-occupier affected by a URA redevelopment project to purchase a notional replacement flat described in paragraph 1 of the URA's leaflet on the principles adopted by the URA in property acquisition (other than industrial properties). Why owner-occupiers of CBS accommodation affected by the Scheme (who have not asked for the acquisition by the URA and to the contrary sale of the CBS accommodation to the URA has been forced upon them) are discriminated where the net amount of compensation intended for them would substantially fall short of the amount required for purchasing a notional replacement flat as described in paragraph 1 of the said leaflet?

3. Net Amount of Compensation and Subsidies Should be Sufficient for Purchase of Rehousing Unit, Rent in the Interim, Removal Costs and Other Reasonable Expenses

For each CBS accommodation affected by the Scheme, the net amount of compensation and subsidies the cooperative building society member concerned is entitled to receive should, no matter how the property market fluctuates, at least be sufficient for purchasing the property for rehousing mentioned in (2) in the 1st E-Mail ("**Rehousing Unit**"), renting a flat similar in size and ceiling height and in comparable location as that property during the interim period after moving out the existing CBS property but before moving to the Rehousing Unit (alternatively the URA may rent such residential properties from the private property market or Government Property Agency to rehouse affected parties that choose to purchase a Rehousing Unit during the interim period) covering the removal expenditure for moving from the CBS accommodation to the rented accommodation and from the rented accommodation to the Rehousing Unit and related reasonable expenses like legal fees, stamp duties, estate agent's fees.

4. Management Fee Increase Compensation

The compensation for each CBS property affected by the Scheme should include the difference between
(i) the present value of the stream of recurrent expenditure (with inflation rate included) on building management (including reserve for repair and maintenance) for a flat with size comparable to the existing CBS property and
(ii) the present value of the stream of recurrent expenditure (with inflation rate included) on building management (including reserve for repair and maintenance) for the CBS property concerned
less reasonable premium for the lift service for the property mentioned in (i) ("**Management Fee Increase Compensation**").

Of course, if the option contemplated in (2) in the 1st E-Mail is chosen and (2)(a) in the 1st E-Mail is implemented, the Management Fee Increase Compensation need not be included in the compensation.

5. Size of Subsidized Housing in Dedicated Rehousing Estate & the Number Allowed to be Purchased

Generally it is not uncommon that the saleable area of each property affected by the Scheme is close to or more than 1,000 square feet. For the option of buying subsidized sale flats of dedicated rehousing estate to be developed and managed by the Hong Kong Housing Society, is it that the Hong Kong Housing Society will tailor make for the people affected by the Scheme subsidized sale flats each with saleable area of over or close to 1,000 square feet and with high ceiling like that of the accommodation covered by the Scheme? If not, is it

that each affected household may purchase 3 to 5 units such that the total saleable area of the units bought is no less than the saleable area of that household's existing CBS property (including the verandah)?

6. Compensation for Time Spent

As the Scheme has been forced upon the parties affected and very substantial time has to be spent by them as a result, they should also be reasonably compensated for the time spent arising from the Scheme including time for amongst others
(i) packing and removal taking into consideration that the move is from accommodation with size of the CBS accommodation and resided by the household for decades;
(ii) understanding how the Scheme works and its implications;
(iii) the freezing survey;
(iv) discussing and negotiating with the URA and authorities concerned;
(v) completing the procedures for dissolution of the cooperative building society, transfer of title to the CBS property from the cooperative building society to the member and from the member to the URA; (vi) assessing the options on and getting replacement accommodation.

Please note that depending on the circumstances and each individual's preference it may be that the time that has to be spent by a party affected by the Scheme can never be sufficiently and satisfactorily recompensed as the time sacrificed because of the Scheme can be used to do other things, some of which may only be done at a particular point of time or certain age. If the URA thinks that parties affected by the Scheme should not be compensated for the time spent because of the Scheme, please explain why this is reasonable and justifiable.

7. Saleable Area of the Verandah

The verandah in the CBS property where I reside is above the pavement immediately outside the building where the CBS property is and apparently is outside the boundary of the site where the CBS building is built. The verandah is represented by the rectangle in dotted line immediately outside the boundary of the said site in the plan attached to the Government Lease in respect of the site. I have been told that a verandah fee had been paid to the Government for the verandah. All along the verandah in my residence has been used as such. In the circumstances, it would be extremely unfair and unreasonable if the area of the verandah is excluded for the purpose of calculating the market value of my residence.

8. Affected Cooperative Building Society Member Should be regarded as Owner-Occupier

For the CBS property where I reside, it was my father who was the member of the cooperative building society and our family is one of the few households in the building that live in the same CBS property from the very beginning up till now. My father had nominated my brother as his successor for the cooperative building society membership. After my father's demise, my brother has become and is now the cooperative building society member in respect of the unit. Like the practice of many Hong Kong people, my brother has moved to a separate residence since he has got married. I have been residing in the CBS property for decades, whether before or after the demise of my parents and my brother's marriage and it has been my only residence. Both my brother and I are adults and my income from work is sufficient for supporting myself. There is no need for any of my family members to support me and I do not pay my brother any money for allowing me to live in the CBS accommodation but I do pay all the outgoings (including but without limitation to the quarterly fees for garbage collection cleaning of common area and repair and maintenance fund) in respect thereof. All along the only persons that have resided in the CBS property are my parents, their children (including myself) and domestic helpers.

It would be very unfair and unreasonable if my brother is not regarded as owner-occupier for the purpose of determining whether he is eligible for Home Purchase Allowance, participation in "Flat-for-Flat" Scheme and purchase of subsidized sale flat of dedicated housing estates developed and managed by the Hong Kong Housing Society.

Considering at least (1) in the First E-Mail, I would request the URA to drop the Scheme and instead carry out redevelopment of areas with dilapidated buildings. If for whatever reason, the Scheme has to proceed, it is important that it is done in manner that is consistent with the Urban Renewal Strategy with the salient features of the civil servants' housing benefit concerned and CBS accommodation taken into account and as far as compensation and rehousing arrangements are concerned the suggestions above are followed.

Thank you for your attention.

Yours faithfully

Tang Chor Fan Julia
Tel No.[redacted]

Sent from my iPhone

On 19 Jun 2020, at 10:31 AM, Chor Fan Julia Tang [redacted] wrote:

To:

(1) Secretary, Town Planning Board
15/F North Point Government Offices
333 Java Road
North Point
Hong Kong

(2) Urban Renewal Authority

Dear Sirs

Re: Comments on Kau Pui Lung Road / Chi Kiang Street Draft Development Scheme (the "Scheme") Plan

I write to express my views on the captioned scheme plan and related matters:

1. Higher Priority for Redevelopment of Areas with Dilapidated Buildings

There are many areas in Hong Kong where the buildings have several storeys only. The area covered by the Scheme is only one of such areas and amongst such areas is one where the buildings are comparatively speaking well maintained with relatively pleasant outlook. In fact, the Planning Report of the Scheme prepared by the Urban Renewal Authority ("**URA**") states that

according to the URA's Building Condition Survey conducted in May 2020, most of the buildings within the Scheme are in "Acceptable" conditions.

For your information, at least for the building where I live, which is in the area covered by the Scheme, whether or not there is subsidy or incentive scheme for maintenance from or run by the URA, maintenance works have all along been done regularly.

For better utilization of scarce resources and improving the living conditions of those who have much more imminent need for such, areas in much poorer conditions where buildings are in dilapidated state deserve higher priority for redevelopment. In fact, it's not difficult to find such areas in the vicinity of the area covered by the Scheme.

Redevelopment of an area where the URA itself admits that most of the buildings therein are in "Acceptable" conditions but not an area where the buildings are dilapidated is actually not in accordance with the statutory purposes of the URA.

In view of at least the aforesaid, I should be grateful if the Town Planning Board would determine that the captioned draft development scheme plan is not suitable for publication under the Town Planning Ordinance (Chapter 131 of the Laws of Hong Kong).

2. <u>New Development to Include Rehousing Units with Size and Ceiling Height Similar to the Accommodation Covered by the Scheme</u>

If for whatever reason, redevelopment of the site covered by the Scheme is to go ahead, after the redevelopment, the redeveloped site should have residential properties of similar size (including the area of the verandah) and ceiling height to the individual units proposed to be redeveloped for rehousing the members of the cooperative building societies concerned and the residents of the units to be redeveloped (each an "**Affected Party**") where
(a) the recurrent expenditure the members of the cooperative building societies concerned need to pay for building management (including reserve for repair and maintenance) is more or less the same as the existing amount they are paying plus inflation rate and reasonable premium for the lifts to be provided in the new development; and
(b) the location of the unit in the new development for rehousing an Affected Party should as far as possible be the same as the location of the property he / she now lives / has ("**Existing Property**") such that where an Affected Party's Existing Property is close to both MTR station exits on Lok Shan Road and Jiang Su Street, the Affected Party would not as a result of the redevelopment be deprived of the convenience he / she can enjoy in terms of access to MTR when the To Kwa Wan MTR station is opened bearing in mind that residents in the units proposed to be redeveloped have suffered the disturbance nuisance and inconvenience caused by the construction of the Shatin to Central Link for so many years. In the event that the Affected Party is deprived of the said convenience, the Affected Party should be reasonably compensated.

Redevelopment is for improving quality of life rather than the opposite and it is clear from the Urban Renewal Strategy issued by the Development Bureau that the primary goal of urban renewal is to improve the quality of life of residents in the urban area. The arrangements suggested above are for the

purpose of preventing downgrading the quality of life of those affected by the Scheme.

Thank you for your attention.

Yours faithfully

Tang Chor Fan Julia
Tel No.[redacted]

Sent from my iPhone

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200618-173127-74788
提交限期 **Deadline for submission:**	19/06/2020
提交日期及時間 **Date and time of submission:**	18/06/2020 17:31:27
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就發展計劃草圖提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Draft Development Scheme Plan
「提意見人」姓名/名稱 **Name of person making this comment:**	Ng Sui Long

意見詳情
Details of the Comment :

堅決反對靠背壟道/浙江街發展計劃 (CBS-2:KC) 違反《市區重建局條例》5(b) 根據《市區重建局條例》5(b)，市建局的宗旨為透過將老舊失修區重建成經妥善規劃，並(如適當的話)設有足夠交通設施、其他基礎建設及社區設施的新發展區，從而改善香港的住屋水平及已建設環境，以及已建設區的布局。 市區重建局的網址上提供那份「第一階段社會影響評估」第5.1項說， "該計劃內大部分樓宇呈「維修及保養尚可」的狀況"。第5.2項說 "而尚未解散合作社則沒有業主立案法團作樓宇管理"。 第5.3項說 "根據市建局在樓宇復修的經驗，即使已完成該類維修工程的樓宇，亦需要每5至6年進行一次全面性樓宇復修，才能避免樓宇狀況化至失修狀況。" 「規劃報告書」（只提供英文版本）也有類以的說法。 合作社有些是分了契，有些還未分契。分了契的成立了業主立案法團作樓宇管理，尚未分契的則繼續以盤古初開的合作社作樓宇管理，從不間斷。合作社一向自律管理和維修樓宇，除了保持自己的樓宇外觀外，也與鄰近的合作社樓宇保持區內觀感上的和諧，維修未必關乎破損，有些是每隔幾年純粹是粉飾和保護外牆而已，由於這模式保養花費較少且效果好，不少樓宇是採用這模式。個別的樓宇有維修問題，是有其個別原因。因此，區內絕大部分樓宇是狀況良好至非常良好的。 離試點不遠處，就有樓宇狀況大幅度比下去的樓宇，「第一階段社會影響評估」和 「規劃報告書」卻沒有圖文並茂地提及這些樓宇，作事實和客觀的比較，這些破舊失修的樓宇更加需要急切關注，是顛倒黑白。 本試點區本來已經是一個完善社區，各式各類商店和社區設施一應俱全，地鐵的落成帶來新景象，令社區進一步更加完善。土瓜灣站是獨特的地鐵線站，可直達馬鞍山等新界地方，又近接過海線，方便的程度和價值不是其他大部分地鐵站可比擬。地鐵站出入口離公務員樓只有零至三分鐘步程，無道理摧毀好端端有特式的樓宇建築群，違背第7段所述《市區重建局條例》5(b)的宗旨。

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就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200618-191622-19023
提交限期 **Deadline for submission:**	19/06/2020
提交日期及時間 **Date and time of submission:**	18/06/2020 19:16:22
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就發展計劃草圖提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Draft Development Scheme Plan
「提意見人」姓名/名稱 **Name of person making this comment:**	Anthony Orr

意見詳情
Details of the Comment :

I strongly object to the draft development scheme for the following reasons: A) the scheme totally disrupts the views for the residents in Lok Man Sun Chuen B) the proposed scheme torn the fabric of the current streetscape apart by closing parts of the streets and destroying the current tranquil setting which forms a unique characteristic of this neighbourhood C) the existing demographics of the residents at the proposed site are predominantly retired civil servants, uprooting these senior citizens who have dutifully served the public throughout their life time is completely insensitive. They have developed a strong bond as a community. This community forms an integral part of each resident's life, each member in this community is socially and physically dependant on each other. Relocating them will have a long term detrimental effect on their mental and physical well being. D) the amount of vehicular traffic generted as a result of the proposed development will undermine the existing road network E) the proposed building envelope is unsightly both from the street level and inconsitent with the existing venecular of this neighbourhood. Kindly consider the above comments and move to reject the submission accordingly.

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致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

本人為九龍城區議員馬希朋，就市建局 CBS-2:KC 初步意見如下：

1. 是次諮詢程序不透明，亦欠缺充分討論。市建局以疫情為由，遲至現時為止亦沒有舉行 briefing，只以 QR code 方式，上載項目簡介。受影響單位仍未能充份得到解答

2. 就是次項目，我亦委托了城市規劃師 吳永輝先生 撰寫了意見書，詳見附件。就意見書內的社會影響評估，看到重建區有迫切的社區問題及重建需要。如市建局仍進行項目，宜優化現金補償及提供樓換樓安置選擇（見附件 6.1），而當中可考慮作分階段發展以便原區安置（見附件 8.2）

請城規會積極考慮上述建議，保障一眾公務員應有的權益！

「提意見人」姓名／名稱 Name of person/company making this comment

簽署 Signature _____ 日期 Date 18/6/2020

就規劃申請提出意見

Comments on Planning Application

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	收到日期 Date Received	

重要提示：

Important Notes:

(1) 意見必須於指定的法定期限屆滿前向城市規劃委員會（委員會）提出；
the comment should be made to the Town Planning Board (the Board) before the expiry of the specified statutory period;

(2) 委員會考慮申請的暫定會議日期已上載於委員會的網頁(www.info.gov.hk/tpb/)。考慮規劃申請而舉行的會議(進行商議的部分除外)，會向公眾開放。如欲觀看會議，請最遲在會議日期的一天前以電話(2231 5061)、傳真(2877 0245或2522 8426)或電郵(tpbpd@pland.gov.hk)向委員會秘書處預留座位。座位會按先到先得的原則分配；
the tentative date of the Board to consider the application has been uploaded to the Board's website (www.info.gov.hk/tpb/). The meeting for considering planning applications, except the deliberation parts, will be open to the public. For observation of the meeting, reservation of seat can be made with the Secretariat of the Board by telephone (2231 5061), fax (2877 0245 or 2522 8426) or e-mail (tpbpd@pland.gov.hk) at least one day before the meeting. Seats will be allocated on a first-come-first-served basis;

(3) 供委員會在考慮申請時參閱的文件，會在發送給委員會委員後存放於規劃署的規劃資料查詢處(查詢熱線 2231 5000)，以及在會議當日存放於會議轉播室，以供公眾查閱；及
the paper for consideration of the Board in relation to the application will be available for public inspection after issue to the Board Members at the Planning Enquiry Counters of the Planning Department (Hotline: 2231 5000) and at the Public Viewing Room on the day of meeting; and

(4) 在委員會考慮申請後，可致電2231 4810或2231 4835查詢有關決定，或是在會議結束後，在委員會的網頁上查閱決定摘要。
after the Board has considered the application, enquiry about the decision may be made at tel. no. 2231 4810 or 2231 4835 or the gist of the decision can be viewed at the Board's website after the meeting.

就市區重建局靠背壟道 / 浙江街項目 CBS-2 KC 收回公務員合作社樓宇受影響人士的權益及社會影響評估之初步意見

項目：靠背壟道 / 浙江街發展計劃 (CBS-2:KC)

日期：2020 年 6 月 18 日

攢寫人：吳永輝 城市規劃師

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1 撮要：

1.1 市建局擬重建靠背壟道 / 浙江街 CBS-2 KC 項目，項目範圍如附件圖則。

1.2 行政長官在《施政報告》中，宣佈邀請市區重建局(市建局)物色一至兩個適合作高密度發展的公務員建屋合作社(合作社)地段作為重建試點，並研究按照市建局沿用的推展項目方式，重建該些合作社地段，透過充分利用合作社地段的發展潛力，以增加房屋供應。因此選中本項目的合作社。

1.3 本人受馬希鵬議員委託跟進相關的幾個問題，經參考相關資料，與測量師及團隊商討，義務提出以下初步意見。當有更多資源及進一步的資料提供，或有需要作出修訂。

1.4 我的意見撮要如下：『市區重建局在照顧重建區福祉上多年來受到街坊批評，此案情況亦接近。根據初步視察，該重建區並沒有以往一些舊區環境惡劣、危樓眾多、日久失修、密度過高、治安欠佳等等問題。因此，收樓重建能否改善居民福祉，有沒有侵犯一個本來良好的社區的居民的權益，是值得考慮的。如果收樓重建並沒有明顯的計劃以改善當區居民之福祉，而只在於推行政府的收地政策，則應該提供較優厚及合理的，如原區安置及賠償條件供居民選擇，以令居民樂於接受。』

2 背景：

2.1 公務員合作社建屋計畫，是基於早在 1952 之 Secretariat Temporary Circular No.74 及 1956 之 Secretariat Standing Circular No.9，各合作社地契略有不

同，但大致都是協助公務員自行組織合作社，然後殖民地政府貸款全部數目給合作社向政府購地及建築樓宇。貸款要支付利息分 20 年攤還。不過，在地價上有所折讓，大約支付 1/3 地價，而且每份合作社的地契上都註明各單位面積，換言之，當時政府只是讓公務員有一安定及可以承繼的單位業權，而不能像一些較少限制的私人樓宇地契，在重建時可以享受因規劃增加地積比的樓面積。

3 公務員合作社樓宇享有什麼保障?

3.1 經與測量師及專業團隊商討，我們認為其有關權益是受到憲法保護的：

3.1.1 香港公務員合作社樓宇的權益，與其他在英治時期批出的土地契約一樣，受到《中英聯合聲明》及《基本法》的保障。《中英聯合聲明》有以下保障：

引述

中英聯合聲明 附件三
關於土地契約

中華人民共和國政府和聯合王國政府同意自《聯合聲明》生效之日起，按下列規定處理關於香港土地契約和其他有關事項：

一、《聯合聲明》生效前批出或決定的超越一九九七年六月三十日年期的所有土地契約和與土地契約有關的一切權利，以及該聲明生效後根據本附件第二款或第三款批出**的超越一九九七年六月三十日年期的所有土地契約和與土地契約 有關的一切權利，按照香港特別行政區的法律繼續予以承認和保護。**

3.1.2 而《基本法》有以下的保障：

引述

《基本法》第一百條

香港特別行政區成立前在香港政府各部門，包括警察部門任職的公務人員均可

留用，其年資予以保留，薪金、津貼、福利待遇和服務條件不低於原來的標準。

《基本法》第一百零二條

對退休或符合規定離職的公務人員，包括香港特別行政區成立前退休或符合規定離職的公務人員，不論其所屬國籍或居住地點，香港特別行政區政府按不低於原來的標準向他們或其家屬支付應得的退休金、酬金、津貼和福利費。

3.2 考慮公務員合作社樓宇的有關權益，應該包括以下數點：

3.2.1 建屋合作社為當時加入合作社的公務員提供一擁有特定居住權益的居所，而相關權益由合作社的地契及其他相關的政府文件構成，加入的公務員要支付一定費用，當中一部份作建屋費，另一部份作地價，約算為 1/3 地價；

3.2.2 合作社的地契享有一般地契的權益，有繼承權，有重置權。繼承權是指家人及後代於該公務員去世後可以繼承，重置權是指如天災大火衰敗等破壞樓宇，公務員得以自資重建一樣形式一樣面積的居所；

3.2.3 合作社的地契持有人享有受限制的買賣權，這是由於最初政府有支持補助，因此買賣權受到一定限制，售樓之前要補回地價，要賣給合資格的公務員等;

3.2.4 合作社的地契註明各單位的面積，因此，該公務員及其家庭享有其所屬單位的面積。這是在地契上準確說明的，因此應該可以享用是既不多於，亦不少於各自地契註明的單位面積，及附屬設施公共設施。不多於者，即就算自行重建時有規劃的地積比率可以多建，該公務員及其家庭亦不能像其他私人樓重建時可以享有增加的樓面積；不少於者，即政府不能夠減少該樓契註明供該公務員家庭享用的單位的面積及附帶之權益；

3.2.5 由於香港的社會環境，樓宇價格昂貴而單位細少，相對而言有近一千呎的公務員單位便比較寬裕，因此，公務員樓有較多的兩代同堂、三代同堂家庭，安居樂業，而這種家庭特色，於一般重建區，並不常見；

3.2.6 另一種社區特色，就是社群的鄰里關係。由於居民都是公務員家庭，背景相若，多年共同居住於同一小區，而早年子女多就讀鄰近區內學校，因此建立社群鄰里關係。收樓重建將會破壞這種關係；

3.2.7 區內長者人口眾多，有照顧需要，適應新生活地點困難，因此部份十分擔心，拒絕被收樓，亦可以理解；

3.2.8 根據初步視察，該重建區並沒有以往一些舊區環境惡劣、危樓眾多、日久失修、密度過高、治安欠佳等問題。因此，收樓重建是否改善居民福祉，是值得探討的方案；

3.2.9 如果收樓重建並沒有明顯改善當區居民之福祉，而只在於推行政府的收地政策，則應該提供較優厚及合理的安置及賠償條件，以令居民接受。

4 收回本區公務員合作社樓宇的社會影響評估應該考慮什麼因素？

5 與收回一般舊區私人樓宇的情況是否一樣，受影響人士有什麼權益及合理期望?

6 根據《市區重建策略》，市建局在項目公布前進行的第一階段社會影響評估須包括以下主要元素，市建局已經在網上公佈資料；基於此逐一作出初步評論，以指出一些應該有的考慮點。由於並沒有政府或市建局擁有的詳細資料，因此初步評論或因能穫得更多資料而修訂。

6.1 建議項目範圍的人口特點

6.1.1 公務員合作社樓宇本身就是人口特點，一些法律權益保障的基礎已經在上文簡要補充；

6.1.2 較多兩代同堂及甚至三代同堂居住，反映了獨特的社群特色；

6.1.3 老人眾多，不便搬遷，如因新屋較細而要拆散大家庭，令老人更難適應；

6.2 該區的社會經濟特點

6.2.1 極少店舖，沒有不配合互相衝突的土地用途；

6.2.2 一般舊區低收入及領受社會救濟及社署支援者較多、產業混亂、工業甚至儲存危險品等，這些問題在本區都不存在；

6.3 該區的居住環境

6.3.1 該區中低密度居住環境優良，初步視察樓宇健康，部份近年進行大維修；應不存在危樓，就算有居住環境問題都只是少數，市建局提供補貼可以改善；

6.3.2 舊樓沒有電梯，對居住高層長者是有不便；

6.4 該區經濟活動的特點,包括小商舖及街頭攤檔等

6.4.1 基本上沒有商業，附近則有大量小商店提供服務；

6.4.2 基本上沒有街頭攤檔或食肆污水等各種問題，有都只是輕微；

6.5 該區內人口擠迫程度

6.5.1 區內人口並不擠迫；多數是近千呎單位；

6.5.2 由於沒有調查權，無從得知有沒有分租戶劏房戶的情況，但相信十分輕微；

6.6 該區設有的康樂、社區和福利設施

6.6.1 重建區內沒有什麼設施，但鄰近區內有各種設施，市建局報告內有說明；

6.6.2 不掌握各政府部門有沒有對社區和福利設施提出要求，這有待規劃署或市建局提供；

6.7 該區的歷史背景、文化和地方特色

6.7.1 公務員樓背景已簡介；市建局報告對全區歷史背景已有介紹

6.8 就建議項目對社區的潛在影響所進行初步評估

6.8.1 市建局報告已有簡介，本報告作出補充；

6.8.2 政府提出要收回土地以供提供增加密度的居所，及改善街景設計，行人環境，增加停車位等；

6.9 所需舒緩措施

6.9.1 對少數屋宇有維修需要的提供協助；

6.9.2 合作社樓宇並沒有電梯對長者出入不便，目前本港有協助長者及病人出行上落樓梯的福利服務，要有特別資源投入至可為本區長者提供；

6.9.3 一般重建區最易受影響的是長者、殘疾人士、單親家庭、低收入住戶，及非常依賴現有社區網絡 (包括接受鄰近朋友/親屬的援助/照顧)的人士；如本計劃落實進行，便須提供各種服務；

6.9.4 社區服務隊可提供一些支援服務；

6.9.5 與一般重建區一樣，居民會分成一些希望取得現金補償遷出，而另一些則不希望遷出；市建局宜在鄰近地區提供樓換樓安置機會、及在有人遷出之後管理及維護好地區環境；

6.9.6 從初步分析看來，本項目除了為政府提供市區土地之外，未見對原區居民福祉有明顯的改善。

7 公務員合作社房屋家庭應享有更佳的合理期望

7.1 公務員合作社房屋是 50 及 60 年代特別為此立法的公務員住房福利。是附有條件的住房福利，因為只有公務員才能購買根據該計劃建造的建築物中的房屋，而業主必須加入合作社並接受所有相關的章程和協議。該福利不僅涵蓋 CBS 計劃的公務員，還通過繼承權擴展至其後代。

7.2 除了附帶在樓契的繼承利益外，他們應該享有一些隱含的利益 Implied Benefits，包括：

7.2.1 公務員及其後代根據土地地契享有重建權。當建築物破舊，公務員或其後代可能會投入財務和專業資源，以在重建後與現有總樓面積相同的情況下，重新開發 50 年代授予合作社的土地。

7.2.2 公務員樓當日興建及購買較大面積的單位，而且各個合作社的公務員都在其樓契內清楚標明可享用的呎數；無論他/她一人居住，還是與子子孫孫共同居住，屋主就是享有樓契標明的呎數的樓面積，如何居住是由屋主一家所決定，亦是他們家人的合理期望，即如本文起初所措出，公務員的權益由中英聯合聲明及基本法保障。因此，如果執行市建局一般的賠償政策，相信難以買到一樣大的樓宇單位，因此無法共住而家庭被逼拆散。這樣上述《基本法》所提供的利益和權利的合理期望便喪失了。

7.2.3 另一個考慮的因素，則是隨著沙中線的通車，土地價格可能上升，根據公務員樓的樓契，雖然戶主並不完全享有所有樓價價值，但正常情況下樓價上升

則其部份亦有所增加。不過，市場波動是一個變數，市場是可高可低的，以往亦曾經有因市場波動而令後來的收購價較低。

8 樓換樓原區安置或鄰近地區安置

8.1 以往多有討論，惟並不是每一個項目都有樓換樓原區安置，或鄰近地區安置的安排。合作社的樓契中，似沒有安置條款；不過，較良好的重建政策，是應該能提供樓換樓原區安置，或鄰近地區安置的選項。以前的個別項目亦曾有提供，近期文件亦顯示房協會預留部分單位作安排。

8.2 政府找地的困難是可以理解的，但本區地塊長條形，似能分期發展，讓有意出售的先搬走，然後空出部分土地分期興建，以作安置，之後市建局再售出多出來的單位，該是一個探討的方向。

9 其他重建問題：

9.1 以下引用 2 份立法會公開文件，都是民間關注的資料，他們都是針對重建提出多項政策問題：

9.1.1 https://www.legco.gov.hk/yr17-18/chinese/panels/dev/papers/dev20171031cb1-153-3-c.pdf

9.1.2 https://www.legco.gov.hk/yr17-18/chinese/panels/dev/papers/dev20171031cb1-153-2-c.pdf

9.2 以下是市建局的文件，供大眾參考。

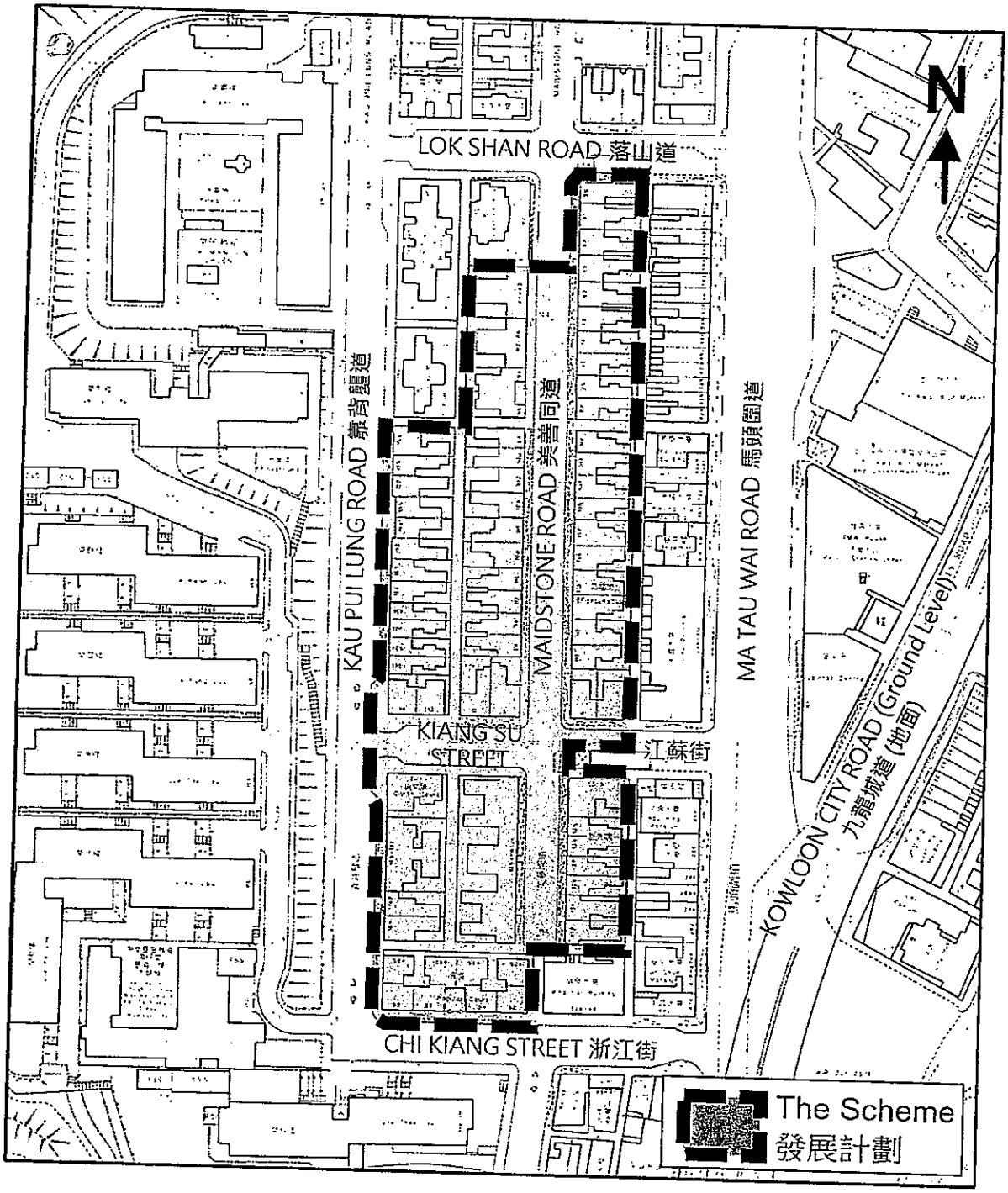
9.2.1 https://www.ura.org.hk/tc/project/redevelopment/kau-pui-lung-road-chi-kiang-street-development-scheme-cbs-2-kc

10 結論：

10.1 考慮初步的社會影響評估，看不到重建區有急迫的地區問題和重建需要。本項目的提出，是因政府需要土地，而要市建局進行收樓。綜合以上初步分析，如市建局仍進行項目，宜優化現金補償及提供樓換樓安置機會，以吸引居民參加。

10.2 受限於時間資源，本初步意見多有不足。如社會有更多資源投入重建政策研究分析，及改善方案，當有利於社會之長遠發展。

《完・2020年6月18日》



吳永輝 城市規劃師及測量師團隊

致：城市規劃委員會秘書 By Hand

市建局擬重建項目意見書

靠背壟道/浙江街 (CBS—2:KC)

個別受影響之公務員合作社社員、業主及家屬聯署信:

1) 江蘇街 12 - 14 號
2) 江蘇街 7 -9 號
3) 江蘇街 8 -10 號
4) 美善同道 106-108 號
5) 美善同道 106-108 號
6) 美善同道 107-109 號
7) 美善同道 115-117 號
8) 美善同道 110-116 號
9) 美善同道 110-116 號
10) 美善同道 118-128 號
11) 美善同道 127-129 號
12) 靠背壟道 165 - 167 號
13) 靠背壟道 169 - 171 號
14) 靠背壟道 173 -175 號
15) 靠背壟道 181 -185 號

聯絡人: 李小姐[redacted]

2020 年 6 月 19 日

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

本人反對是次重建，理由如下：

1) 公務員合作社非一般樓宇，但市建局只沿用以往的補償方式，沒有考慮合作社的獨特性。
根據資料，多於90%業主未補地價，現有方法令居民不可能買到原區的同等單位，令居民無法接受。
2) 根據空氣流通評估，對比方法似乎只在140mPD和120mPD作比較，得出140mPD方案較好，
但沒有作重建前後的比較，不能達到重建不影響空氣流通的結論。
3) 興建地鐵時不方便及惡劣環境，居民能忍受多年，只認為是享受成果的代價，但如最後享受不到應
有的成果，並非金錢能補償。
4) 樓宇現況不差，亦有維修，無需重建。
如要重建，建議重建後給予合作社社員同區尺換尺，並在過渡期給予合作社社員搬遷及租金津貼。

「提意見人」姓名／名稱 Name of person/company making this comment 勞穗學
簽署 Signature 勞穗學 日期 Date 13/6/2020

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
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有關的規劃申請編號 The application no. to which the comment relates A/S-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

Please see attached pages.

「提意見人」姓名／名稱 Name of person/company making this comment 楊子華

簽署 Signature [signature] 日期 Date 12-6-2020

RECEIVED
Town Planning Board

我，楊子華，Yeung Tsz Wa Edward 為靠背壟道[redacted]業主的授權代表.

本人堅決反對是次市區重建局提出的重建計劃.

這次市區重建局打算重建的地區，全是公務員合作社樓宇. 沒錯這些樓宇全部超過 50 年，但請不要忘記，它們有委員會負責管理，定期有做維修保養，因此，不要常用”樓齡大”，“日久失修” 等情況來形容此等樓宇誤導公眾及傳媒. 印象中數年前才通過屋宇署的驗樓/驗窗等程序，而面向浙江街現時淺藍色外牆的一座及靠背壟道 161，163 號那邊都在這兩年間進行過外牆維修. 因此這些樓宇現在仍然很”實淨” . 很安全，根本沒有任何影響住戶及公眾的危險. 所以不可與那些業權分散，無定期維修的舊樓/唐樓等相提並論.

樓宇內外的公眾地方，如天井，後巷，樓梯等等，絕對沒有垃圾堆積，漬水等情況，間中見電視台來取影拍攝後巷鏡頭就可証明衛生情況都相當好.

樓宇治安方面亦沒有問題. 近年已安裝閉路電視及密碼鎖，沒有生面口人士可以隨便進來.

而本人[redacted]的單位，仍然相當”企理”，內部沒有任何損壞，即使打風或是黑雨情況，窗戶滴水不漏. 質數可以比美任何樓齡少一半的樓宇.

至於另一個問題 - “沒有升降機”. - 當年好像有條例限制，層數高違某一個層數，才可以安裝升降機. 而九龍區近機場一帶大部份樓宇都不能起高，所以都沒有升降機. 這根本是一個常見情況. 而當年直到現時住戶在購入單位時已經明白此情況並且接受. 所以，用“沒有升降機”來加多一條”死罪”給這些樓宇，是絕對不公平的.

管理費用方面，現時所交的每用每呎管理費計十分低，即使已經退休及收入少的住戶仍然可以負擔得來. 如果搬遷後，根本很難找到管理費相約的住宅，住戶可能要多負出 2-3 倍管理費，未必人人都可以負擔得來.

至於賠償方面，亦是一個大問題. 大部分單位仍然未進行”分契” / “補地價” 等手續. 如果現金賠償，一定要先扣除補地價的一部份，所餘下的一部分根本無法在同區買到相近面積的單位. 這次是政府要收樓，不是住戶要求賣樓. 如果這樣計算對住戶絕不公平. 再加上搬運家具等費用也不輕，此等支出也是政府所引致. 因此我認為賠償額一定要計算到在扣除補地價開支後仍然足夠在同區購到相約面積單位及有合理搬遷津貼才可接受.

另一方面，就是心理影響，試想想當正在工作時，收到家人來電通知話新聞指政府突然要收樓重建，或是在家午飯時，有市建局職員拍門進行登記，一切來得太突然，之前毫無心理準備，感受會如何? 5 月 22 日當晚本人與一眾上下住

戶都徹夜難眠. 而至今幾星期也因此重建問題而遺失眠. 每次返家在大閘開門時看見貼在牆上的收樓通告, 都有一種彷彿是在倒數的感覺, 極不愉快之餘亦有很大壓力. 政府宣佈重建當日至今, 單是看市建局送來的文件, 或是上網搜集資料, 都花去很多糊神時間, 對日常生活很大影響.

這些樓宇大部份仍然有人居住, 生活安穩, 樓上樓下大多認識, 出入見面也打招呼問好. 這種鄰里關係也是現時少見. 政府為何要迫走住戶收樓重建? 這簡直就是強搶財產的野蠻行為.

政府要重建公務員合作社, 為何不去選擇一些空置率高, 少人居住的, 反而偏要向仍然有大量住戶的合作社落手?

由此可見, 這個重建計劃為現有住戶帶來不少麻煩. 本來安穩的生活, 忽然來個晴天霹靂, 簡直是勞民傷財.

我再重申 - 我堅決反對是次收樓重建項目.

(28)

致城市規劃委員會秘書：
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有關的規劃申請編號 The application no. to which the comment relates CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

① 重建計劃並沒有安置原居民的考慮。
② 合作社是有居主權和繼承權，現在市建局的做法，等同抹殺這兩個權利?!
③ 我父母(同住)為長者，年事已高，要求留下原區醫療網絡及醫診需要，不能適應新社區。
④ 現在合作社，是有定期維修樓宇，並沒有失修或僭建，而且狀況良好，沒有重建的必要。
基於以上，本人反對重建。
⑤ 位於未來港鐵站出口旁，這是合作社居民一直渴望擁有的福利。但係港鐵一起好，就要為住屋據憂??
本人因此反對重建!!!

「提意見人」姓名／名稱 Name of person/company making this comment 方偉生
簽署 Signature 方偉生 日期 Date 13 JUNE 2020

(3J)

致城市規劃委員會秘書：
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意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

Please see attached.

「提意見人」姓名／名稱 Name of person/company making this comment John Luke
簽署 Signature John Luke 日期 Date 18/6/2020.

392

本人強烈反對 CBS-2:KC 的發展計劃，以及計劃中向城規會提出的計劃草圖，意見如下：

住戶年事已高，居住此區地下單位 40 年以上，加上患有長期病患：柏金遜、腦退化、血壓高、糖尿病、行動不便，出入倚賴輪椅並需要特別照顧。一生服務政府至退休，只想以此居安老，試想如搬遷，要重新認識新社區新環境，難道要 80 幾歲長者返屋企時迷路？非人道！

1. 以一般重建私人樓宇的計算模式計算賠償並以「土地收回條例」為最終逼遷理由。又因 COVID-19 疫情關係，欠缺清晰透明的簡介會和補地價資訊，嚴重剝削原有公務員和退休公務員合作社的住屋福利，以及剝削業權承繼的人權，有違反「基本法」中市民享有保持原有生活方式以及保護私有財產權利的原則。從社會評估報告中內只有 10%的公務員住戶已補地價（可作轉讓或出租），可反映現有業主 9 成以上均是用來自住解決基本生活需要，並不是跟一般私人樓宇般買回來投資炒賣的！

2. 重建計劃把原來樓宇狀況良好，業主出錢出力定期翻新保養，以符合樓宇安全條例的公務員小社區徹底破壞，違反市建局「以人為本」的宗旨！

3. 土瓜灣區近期已有大量中型至大型重建項目，將來人口必更增加多倍, 在交通上本來屬於到紅磡海底隧道，九龍西、東九龍，香港島的中途站， 如在計劃項目上興建 4 倍以上的人口房屋和將美善同道變成步行街，在交通方面無論地面或沙中線的擠塞程度更加嚴重。

4. 社區歷史特色末落：美善同道及靠背壟道一帶居住的公務員居民質素有一定教育水平，因些大廈和街道整潔，有秩序。一向成為很多電視劇及電影取景的拍攝場地，重建後有再有一社區歷史特色消失！

5. 規劃中興建地下街連接土瓜灣港鐵站，根據現時各區的地下街，沒有一個是成功的，只會影響地面上商舖生意。加上眾所周知土瓜灣港鐵站興建時的工程已導致馬頭圍道附近一帶的樓宇出現沉降，如再加深地基，亦可能影響附近一帶的樓宇結構安全。

Best regards,
John Luke

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

請參照附件

「提意見人」姓名／名稱 Name of person/company making this comment HO TIN YAU
簽署 Signature Patrick Ho 日期 Date 8-6-2020

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19 JUN 2020
Town Planning Board

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本人及家人對政府市區重建靠背壟道/ 浙江街發展計劃有很大保留及憂慮，我們極不願意， 政府強行逼我們出售現有的物業。

本人及家人很滿意現在的居所，尤其是土瓜灣地鐵站將近通車， 終於可享受更便利的交通。最主要現居所結構亦保養良好，沒有老化滲水問題，並已通過政府的強制驗樓計劃。

我們特別因為要補回 2/3 之地價而煩惱。 餘下的賠償金額是絕對不足夠購買同區相約呎數的樓宇。（ 現居所實用面積大約 800 呎）。

我們的居所被強行收購後，請問政府如何協助我們在同區另置相約呎數的地方安置我們居住。

本人有以下提議：

1） 我們非常憂慮補地價的問題，因這計劃是政府強行收樓，而不是本人自願出售物業，所以不應該強行要業主補回地價。

2） 如政府強行要業主補回地價 也應補回當年（1962）政府賣地給我的公務員建屋合作社的地價，而不是現在昂貴的地價。

補回 1962 建屋時的地價。這個建議，合情合理，有下列原因：

(a) 政府已收回當初批地給合作社的成本損失。

(b) 讓被迫遷者得到他們長期居住單位期間，地價升值的合理賠償。這是配合政府的居者有其屋，及買賣二手居屋的優惠政策。

(c) 政府顯示良好僱主承擔的責任，讓無私服務香港市民數十年的公務員工或其家屬，安居終老。

3) 如強行被迫售樓， 因補償金額肯定不足夠購買同區相約呎數的私樓，政府應考慮樓換樓和呎換呎的方案， 在原區重建後安排業主住在同等面積的新樓（私樓或居屋），並在建築期間 提供租屋津貼。

在拆卸樓宇的時候應安排鄰近居屋或私樓供給合作社的業主暫住。 直至等候原區重建完成，業主回到原址重新安置，並獲得同等面積的新單位。

4) 如將來樂民新邨居民可遷移在現合作社的拆卸土地上享用原區重置福利，我們這班給政府強迫犧牲自己家園的合作社居民，政府更應該先為我們提供原地同等面積新單位安置。

5) 政府可考慮在樂民新邨建築一座新的樓宇，作為安置前合作社業主的樓宇，以安排樓換樓（呎換呎）同等面積的單位，供給合作社業主。

6) 補償中沒有提及因遷入新單位時受影響的必要開支：裝修，重設合適傢具，水、電、煤註冊登記費/按金等等。所以於搬遷的時候，應該資助業主搬遷，裝修及以上有關費用。

7) 地鐵站對樓價和地價起很大影響，我們的單位有兩個近在咫尺的地鐵出入口，開通前樓的價值已升，開通後更會加倍增值。我們捱了多年而不能受惠近在咫尺的地鐵設施 (2 分鐘步程)，可說是雙重剝削。

我們在這裡居住超過五十多年，一向安居樂業，希望政府憐憫前公務員及其家人忠心耿耿為政府效力，推行寬仁的德政，使我們可繼續安居樂業。我們強列要求，不要強搶我們的家！

附錄互聯網上的一個宝貴意見，分析補地價的合理性，以供参考。

公務員樓是政府以土地底價批地給公務員，這些公務員除要付給政府土地底價外，還要自行出錢建築樓宇，公務員一旦加入合作社成為合作社社員就會失去所有公務員的房屋福利，實際上這些社員的房屋福利只是享有取得土地底價的批地，如果政府當年將合作社土地以公開拍地形式拍賣，並以底成交，則等於合作社已付出全部地價，意味著政府完全沒有給予合作社一分錢的優惠，為何今日要社員補回三分之二的地價呢？如政府要社員償還地價後才可出售單位，變相政府取回了甚至收多了已給予合作社公務員的房屋福利。再者，政府給予現職公務員的十年現金房屋津貼，無論任何情況下都永遠無需向政府償還，同屬公務員為何有不同的對待，對於這些合作社公務員是否公平呢？再者，有部份公務員後來加入合作社，他們要比高於市價的價格去取得會籍，入社後又失去所有公務員應享有的房屋福利，因加入合作社

後，政府就視這些公務員已享有房屋福利，即是說政府已當底價批地視為已給予公務員的房屋福利，既然是房屋福利，又為何要這些合作社公務員在出售單位時向政府補回三分之二嘅土地價值，為何政府又說合作社公務員欠政府三分之二土地價值，這三分之二的土地價值又是如何計算的

(65)

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
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To: Secretary, Town Planning Board
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有關的規劃申請編號 The application no. to which the comment relates CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

- Please see attached -

「提意見人」姓名／名稱 Name of person/company making this comment Sydney Cunningham

簽署 Signature _____ 日期 Date 15 June 2020

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19 JUN 2020
Town Planning Board

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15 June 2020

To : Secretary : Town Planning Board

The application no. to which the comment relates **CBS-2 : KC**

Details of the Comment

I am a retiree, having worked with the Immigration Department of The Hong Kong Government for over 27 years. I retired in Year 1997 and became a member of the Sinclair Co-operative Building Society Ltd. in the same year after my retirement, occupying the unit on [redacted] Floor, No.112 Maidstone Road, Kowloon (the "**Property**") since February 1997. Over the 27 years of service with the Immigration Department, I have been staying at the staff quarters as provided, but sadly, as it has been happening to most civil servants, at the time of retirement, my quarter had to be surrendered. Due to the high market price in 1997 and under the high land premium (高地價政策), most (probably the vast majority of civil servants) could not afford to buying residential properties with their income albeit lump sum retirement fund. Not to mention, over those sky high peaks of Year 1997, and over the past 10 years, beyond the control of all our members, and of course the general public. I considered myself fortunate to have a "home", upon my retirement, to house my family and living a stable & quiet life for the past 23 years.

It was until the morning of 22nd May 2020, upon receipt of your posting a notice right at the Building entrance of No.112 Maidstone Road, and those affected under the captioned Project CBS-2 : KC, we were then told that a "population freeze" survey had to be conducted instantly. Without any fair warning, everybody including my neighbours, young ones or seniors, have been having so many sleepless nights, wondering what would happen to our "retired life" and, only "home".

Other than myself, most (if not all) people affected have worked or are still working for the Hong Kong Government. I am (we are) of the view that houses provided under the Co-operative Housing Scheme have been one of the housing benefits which shouldn't be taken away because the city is in demand of land for its population growth. In fact, it should be treated as a "retiree housing" after the civil servant has retired.

The quality of the Property and those under the captioned application are still in good condition, well maintained, nicely set out, conveniently located and has served as our "habitat" for all these years. I do not see the urge or immediate need to a redevelopment or the need for relocating the residents. Qualities of the Property and those under the captioned application are nothing to compare with other URA sites or lands earmarked to be resumed under the relevant Land Resumption Ordinance.

Having tolerated the nuisance by constructions of the Mass Transit Railway ("MTR") for over 15 years; not to mention noise pollution and vibration in the piling stage; poor air quality; dust & fumes all over the place; windows couldn't be opened; suspension of water, electricity & gas periodically over site works; bus stops moved to hundreds of meters away; roads blocked with extra miles to pick up groceries and necessities, and NOW, with the MTR Tokwawan Station coming to light, the URA is lodging this application to kick us out? Where is justice? Where is fairness? What is the rationale to treat your "fellow civil servants" who has helped contribute the success of Hong Kong?

Knowing that the land premium is an issue especially, we could not envisage how URA are going to benchmark the 7-yr building market price as compensation as I can assure you, there are NONE of the like in the locality!! Unless the URA would redevelop, units to a similar size and footage, in the same location, but into high rises, after compensating us temporary rental over the redevelopment period, with relocation costs and other relevant costs to move out and return to the new development, under same ownership. We could not convince ourselves that what URA / the Government is doing any justice!

Otherwise, I would have hoped that, considering that the conditions of the Property are still rock solid and in sound condition, leave us alone, enjoying our peaceful well-deserved life as a "retired civil servant" as you, one day would become!

By : Sydney & Viola Cunningham
Member of Sinclair Co-operative Building Society
Occupants of [redacted] 112 Maidstone Road

本人對市區重建局開展靠背壟道/浙江街發展計劃(CBS-2:KC) ，意見如下：

1. 現時居住的合作社單位面積寬敞，可與子女兒孫同住。香港樓價高企，相信將來補償的金額只夠購買一個現時面積一半或三分一的單位，面積細小不能與子女兒孫同住，日常未能幫忙子女照顧孫子或弄孫為樂，遇上緊急事情或身體不適，不同住不能獲得子女即時支援；

2. 數十年前各社員群策群力合力建成合作社，除了地價要一次付款，建築費向銀行貸款，之後分 20 年從月薪扣除償還。各社員肩負各職，由申請土地、興建樓宇、監督進度，最終建成合作社入住。合作社之後運作、日常保養、安排及監督數年一度大維修，全是各社員義務付出。各社員盡心盡力，所以合作社雖經歷數十載仍然質數良好，全是各社員共同努力的心血成績，現在要拆樓逼遷，心有不甘；

3. 建築鐵路及土瓜灣站期間承受封閉道路、交通改路、車站搬遷、樓宇沉降、空氣污染、噪音等等種種不便，臨近開通鐵路便要被逼遷；補地價從前是數十萬元，多年來其他交通配套及社區設施沒有大改進及提升，現時隣近地鐵站，補地價估計要數百萬元，未享受通車的便利就要付出高昂代價；

4. 大部分社員已在此處居住數十年，交通、起居習慣、生活模式、購買餸菜及日常必需品、睇醫生及醫療需要等等已有固定模式，如遷往其他地區，社員適應會有困難，對有腦退化的朋友尤其混亂；

5. 各社每月管理費只是每户數百元，但現在大廈管理費普遍是以面積計算，將來這支出比現時倍增，對長俸不多的退休公務員肯定是沉重負擔；

6. 合作社的居民大多已在此處居住數十年，鄰里街坊大多認識而關係融洽，重建搬遷令鄰里間沒了照應。

基於以上種種原因，強烈要求考慮以下意見：

1. 要求原區安置受影響的土瓜灣居民；

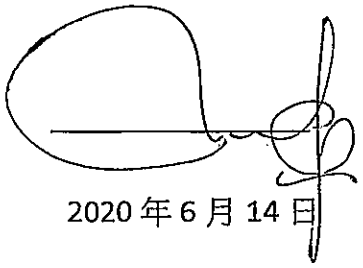
2. 要以樓換樓，以呎換呎；

3. 在樓宇重建期間，提供租金津貼給予居民；

4. 如居民接受現金賠償，要求政府取消 2/3 的地價扣除；

5. 要求市建局，在計算面積時，要包括地下住户的天井位。

强烈要求市建局原址重置居所或補償足以在附近購買相若單位，以減低各樣家庭及環境適應問題。



2020 年 6 月 14 日

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200719-121753-23405
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	19/07/2020 12:17:53
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	林漢偉

意見詳情
Details of the Comment :

其實這一帶的住宅已有超過五十年歷史，之前看過報道，有些單位缺乏保養，漏水情況非常嚴重，卻沒有足夠資金去進行維修，只可等待重建，因為要打理這麼舊的樓宇，是需要龐大的維修費，不是家家戶戶都能負擔到的。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200719-162338-50821
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	19/07/2020 16:23:38
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Lam Yi Man

意見詳情
Details of the Comment :

我認為重建項目有急切性，所以我是絕對支持的。這個區的治安不太好，本人住在美善同道，我發現這兒入夜後有點危險，因為這些樓宇都不是屋苑形式的，沒有完善的管理和保安，陌生人都可自己出出入入，又沒有CCTV，希望重建後會有改善。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200719-214757-97030
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	19/07/2020 21:47:57
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Cheng Chi Ying

意見詳情
Details of the Comment :

堅決反對靠背壟道/浙江街發展計劃 (CBS-2:KC) 反對原有環境受到負面影響 *- 低密度的公務員合作社樓宇只有五六層高，與高層的樂民新村依循山勢的建築群形成和諧配搭，給樂民新村帶來光明和十分通風的開揚居住環境。一帶的低密度矮樓層公務員合作社的樓宇發揮了健康緩衝寧靜地帶，隔離了馬頭圍道的繁雜環境。 *- 市建局報告說改善本區環境，重建不會影響空氣流通，是不實的。 簡單常識一般人都知道，有物件擋在前面，不可能空氣流通會比沒有障礙物的好。某些地方或會因為隧道效應（tunnel effect），風力會加強， 整體來說，無可置疑，空氣流通定必比現在情況差劣的。 *- 從以下照片合成圖，看得出重建後建築群的體積，必然會產生熱島效應，阻擋光線和空氣自然流通。不單大範圍遮擋著樂民新村的視野，且令區內的空氣環境質素定會下降變差。 *- 重建項目會把原來的橫向發展改為豎向發展，除了空氣流通問題外，樓宇密度形成屏風效應。 *- 根據計劃書的重建總平面，前面擋著樂民新村的景觀視野，只留著塔樓與塔樓之間的空隙，緊靠著七喜大廈那邊，留下一個不舒服的距離，若這段的馬頭圍道私樓重建，屏風效應會更加明顯 *- 市建局沒有把落山道與美善同里一段的合作社房屋一併納入本計劃中，以整區規劃來看，排除一小段的合作社樓宇令人感覺很奇怪的。有合理的推斷，這一段的重建會嚴重影響"半山壹號"豪宅的環境及視野，勢必引來"半山壹號"居民的強烈反對。樂民新村的低收入住戶，在社會上發出的聲音相對會薄弱很多，即使重建對他們環境帶來負面的影響，反對聲音也不容易給重視。這樣更特顯那兩份「第一階段社會影響評估」和 「規劃報告書」是帶有刻意美化、企圖誤導和欺騙性，蒙蔽城規會批核計劃，蒙混過關 *- 規劃中說明有地下連通地鐵站，設立步行街，這計劃是很不適合。土瓜灣區的傳統購物區都是集中在馬頭圍道以東，內裡有著各式各樣的商店是與日常民生息息相關的，物價相宜，吸引區外人前來購買日用食材和用品。計劃把原來純住宅區改為步行街的商業區，環境一定會受到很大的影響，令整個土瓜灣區都是人流混雜。 *- 反對本計劃對本區居住環境有著負面影響及計劃書的失實分析。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200722-134723-90216
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	22/07/2020 13:47:23
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Li Huanglian

意見詳情
Details of the Comment :

我們反對這試點計劃。 看過城規會公開的意見書和市建局的「第二階段社會影響評估」(評估報告書)，我們仍然反對這試點計劃。 1. 反對計劃的人數普遍多了 1.1 評估報告書 (第5頁) 說，成功調查的住戶總數是428戶，對此計劃，有207個住戶表示強烈支持或支持，55個住戶表示強烈反對或反對，餘下的114個住戶表示意見或沒有回應。這是在5月22日首天突然奇來的凍結人口調查登記、電話問卷調查和限於7天內呈交意見問卷所收集到的數據，如市建局所說是初步意見。由於發報計劃時沒有簡介會和交流提問，街坊之間的討論和理解多了，反對計劃的人數普遍多了，這可從7月6日和7日的簡介會中的氣氛和提問客觀地反映出來。有理由地相信現時反對的人多了。 2. 對長者的衝擊影響 2.1 評估報告書 (第7、8、23頁) 指出，受影響區內65歲或以上的長者比例較高，長者的百分比達30%是高於全港16%的水平。若包括45至64歲的人口群組，中老年人口是佔區內高比例。2.2 這群年長的居民長久以來安居於斯，適應和習慣了這區的生活模式細節，經年建立的區內人際網絡，是精神和起居的支柱，區內的相宜消費物價和長年的醫療網絡 (公私形診所)，對這收入能力有限的群組，帶來基本生活的平衡。若被遷離此區，重新適應新環境，談何容易，若有認知障礙者尤甚，並非評估報告書中輕描淡寫的建議跟進方式可以解決問題。大群的低收入長者若被迫遷到新環境，形同是被放逐，是創傷性的打擊。 2.3 從城規會的公開意見書中見到，有居住在高層的長者說，沒有升降機是有不便，多年的上落樓梯運動已習慣了，長年生活在這裡，整體感覺是良好的，樓宇結構良好，沒有拆卸和遷徙的必要，也不想承受因轉變帶來的人際網絡和經濟衝擊。 3. 對幾代同堂的衝擊影響 3.1 評估報告書 (第8頁) 指出，6人或以上的住戶在此區約佔12%，高於全港的3%。有64個住戶 (約15%) 為三代同堂的家庭居於同住宅單位，更有一個住戶為四代同堂。 3.2 公務員樓宇單位無花巧設計，間隔是盡用面積空間的實用設計，房間四正，現時新式樓宇間隔無以比美。這些實用設計容許幾代同堂於一住宅單位，在高租金和高樓價的物業市場情況下，是迫不得已，藉此長幼相扶，也為政府面對房屋供求起點舒緩壓力。 3.3 本區位於優良校網內，大部份學校是在步行範圍內，上學時毋須用上交通工具和繳付任何交通費用，節省開支。遷離本區對學生肯定帶來不便，也會影響小學及幼稚園學生的校網，打亂了父母為子女的教育計劃。 3.4 幾代同堂除了經濟上互相扶持外，家庭倫理上特別是有長期病患的長者，得到家人每日的悉心照顧，長者的心理質素，比住在安老院鬱鬱寡歡理想得多。 3.5 這計劃不單止把相當數目的幾代同堂的家庭打散，帶來的衝擊影響是家庭的生存能力和生活質素、長者的精神打擊、長者的家庭依靠、長者的住宿問題，因此增加政府的支援壓力。 3.6 這種拆散家庭的迫遷，除了帶來家庭和社會衝擊，也帶來短時間的物業市場的衝擊，市場因應突然的需求大增而引致物業價格上漲，產生不良的物

業市場壓力。 4. 公務員房屋福利 4.1 評估報告書 (第11頁) 指出85% 共363戶居於斯已有21至50年以上，若被迫遷，(第13、14頁) 超過一半以上的住戶意願在本區繼續居住，單位大小與現有相若甚至較大 (相信是幾代同堂的家庭) 的較新單位。 4.2 今次的試點計劃，牽涉附帶房屋福利的公務員樓宇，有別於一般私樓收購。遺憾地市建局顯然沒有與公務員事務局溝通，如何處理受影響的公務員，包括在職的、退休的以及遺屬。計劃書中沒有安排原址安置方案的選擇，只是不斷重複「樓換樓」計劃，更加沒有在過度期提供無縫無償的住屋安排。不假思索地僅沿用既定的、推展重建項目的形式推行這個試點計劃，是套路模式的做法，不是以新的思維去處理新的試點計劃，為未來的類似收購起良好的示範作用。另一方面，政府作為全港最大的僱主，因市建局安排的疏漏，使員工房屋福利受損和安排不周，大僱主政府也蒙上了污點。 4.3 此區的公務員樓宇大致分未散社 (舊契) 和已經散了社 (分契)，舊契上顯示一次性優惠價批地與合作社建屋，沒有欠補地價條文；另一方面，分契卻附加了須要補地價條文。 4.4 街坊們普遍地理解舊契上寫明是一次性以優惠價批地給合作社建屋，是當時政府的公務員房屋政策，並無說欠了多少地價，日後須要補回。這好像普遍的市場的折扣買賣，不會日後向顧客取回優惠金額。舊契上有按揭和轉讓有關條文，是由時任港督亦即現時特首在行政上的演繹和應用，遺憾地在分契時附加了市場也不會做的收回已出的折扣條文，反映出兩代政府既食言且搬石頭打砸自己的腳。今次是市建局作主導收購，縱然改契上有補地價條文，責不在安居於斯的居民，若政府說成以公帑作出地價補貼，是不盡不實的混淆視聽。 4.5 今次是市建局主導計劃，市建局是主動的買家。現在是被迫遷出的業主要繳補地價出讓其單位物業，卻不是由主動收購的市建局承擔補地價，變相是業主補地價成全政府(市建局)收樓和獲取非常優質的地段地權去發展。市建局說成在賠償金額幫手扣減補地價手續，是有誤導概念和混淆視聽。換句話說，不是業主的意圖出售，責不在安居於斯的居民。按市場交易原則道理，主動買方要承擔和補償賣方的一切損失。受影響居民是被剝削公務員房屋福利，但沒有有關的福利賠償，更無給與提出收購價和條件的權利和機會，於理不合。評估報告書 (第14頁，第5.5段)指出，由於該計劃並非由合作社社員 / 前社員主導的重建項目，將按照「現有用途土地價值」計算土地補價。在7月6日和7日的簡介會中，在回應提問為何市建局主導計劃要居民補地價時，才說出改為這計算土地補價，遺憾地未能回應街坊提問的核心，街坊們得不到切題回應，很是氣憤。 5 原址原大安置 5.1 上文4.1說過，85% 共363戶安居於本區已有21至50年以上，若被迫遷，超過一半以上的住戶意願在本區繼續居住，單位大小與現有相若甚至較大 (相信是幾代同堂的家庭) 的較新單位。評估報告書只是輕輕說出，但沒有就這些收集回來的數據建議可行的以人為本的原址安置方案。 5.2 在簡介會中，有街坊提出原址原大安置的方案說法。由於大部分本區街坊居民是極不願意離開這個生活了幾十年有街坊感情的社區，提議的方案給予街坊居民多一個選擇。既然是試點計劃，應該以新思維新方法去突破處理。重建首要重建本區居民的家園，讓原居民能在原址原大地方居住，這是居民對"重建"的概念。所以如果政府真的有誠意推行這個試點重建計劃，要優先認真照顧原有居民的權益，最大程度能維持及保障原來的生活方式不變，這才符合"重建"的真正意義。如果強迫大家離開本址，改建發展為另類的房屋給外來人士，只不過是"迫遷"。街坊建議在計劃藍圖中的公營房屋部分，應改為起回兩座面積原大的單位樓宇，安置原居民，並且在過度期提供無縫無償的暫住安排，實現「以人為先」、「地區為本」。席間響起熱烈的附和掌聲。 5.3 根據以往資料，市建局從未為影響居民起過樓房安置，今次計劃也是欠奉。評估報告書 (第29頁的12.17段) 提到，"視乎住戶的實際需要，如受影響住戶的住戶人數較多而希望全新單位與現時單位面積相約，市建局會進一步研究「樓換樓」選擇的安排，盡可能回應住戶遷置的需要"。市建局若能以新思維："如受影響住戶較多希望全新單位與現時單位面積相約，市建局會進一步研究「原址原大安置方案」選擇的安排，盡可能回應住戶遷置的需要"，將會是好的正確發展方向。 6 賠償方面 6.1 今次的建議收購有別於以往的私人樓宇，一來沒有地舖，二來是公務員的福利房屋。但市建局不假思索地按照市建局沿用的推展項目方式，重建合作社地段，是因循和粗疏地推行計劃。 6.2 市建局樓價的賠償是沿用多年的計算，社會的人口和市場已是變化了不少，是脫了節。加上本計劃房屋福利問題和補地價的爭議，在過度期並無提供無縫無償的暫住安排，不透明和不明朗因素使受影響居民無所適從和無安全感，在職和退休政府員工有被遺棄的感覺。 6.3 若計劃得到通行許可，在固定的時間框架下，市建局沿用的處理是單向的出價，賣方沒有出條件和出價的權利和機會，有違市場規則，加上引用土地收回條例，抗拒和反感更大。 7 規劃的衝擊影響 7.1 城規會的公開意見書反映出普遍是反對的聲音較多，當中不乏有影響區外的人士。支持的，僅說有五十年樓齡、沒有升降機、會倒塌、可增加樓宇供應量等等；相反那些有深度理據看法的反對者顯得有份量和實在。 7.2 在簡介會中，解說者在介紹計劃和解答提問時也承認本區的公務員樓宇狀況是良好的，計劃是因應行政長官於2018及2019年《施政報告》

中，宣佈邀請市建局物色一至兩個適合作高密度發展的公務員建屋合作社（合作社）地段作為重建試點。 7.3 眾多意見書中，包括區內外人士都指出，試點以外的土瓜灣區有許多樓宇狀況非常差的，為何不積極重建；難得五十年樓齡的樓宇保持新鮮面貌和狀況良好的公務員樓，無理由要把它拆丟。有意見更質疑為何同一地段的落山道至美善同里的一段公務員樓宇不納入重建範圍，該段的樓宇外貌和狀況反而不及試點，環境灰暗，行人道衛生狀況不佳。原因怕且是有兩個新地鐵出入口，有可觀利潤發展。更有諷刺性的質疑，是否重建後的高樓，嚴重影響長江實業李嘉誠名下的半山一號，不可作為。 7.4 居民普遍認同試點一帶的公務員樓是靠山而建的高厦(如樂民新村、半山一號)前的景觀和空氣流通的呼吸地帶，是繁忙馬頭圍道後靜中帶旺的緩衝內街小區，延伸至附近的高山公園和劇場，是一個有氣息的健康地帶。 7.5 事實上有不少在試點鄰近屋宇的居民就規劃帶來的衝擊影響，有不同層面各方面的反對，我們也十分認同，免長贅論，列點如下： (1) 受影響家庭日後要承擔沉重經濟負擔，對低收入者和長者尤甚，生活質素嚴重受損； (2) 破壞有特式、有文化和藝術氣息的良好樓宇和街道，是電影不時取景勝地； (3) 規劃擾亂原來的街道通道，窒礙疏導交通作用； (4) 多幢三十多層的高厦，製造屏風樓、熱島效應，有礙觀瞻和阻礙其他現有樓宇的景觀； (5) 規劃會增加大量人口，增加交通擠迫，人車嘈雜，空氣污濁； (6) 附近的所謂商場如翔龍灣，偉恆昌新村，陽光廣場，嘉景花園等不受歡迎，只有帶來滋擾性的遊客，產生各種民生上的矛盾；計劃中的短短的一段由浙江街至落山道的所謂步行街是多此一舉，摧毀寧靜內街，製造滋擾，是無必要的，是計劃的包裝； (7) 人口的變化帶來區內物價和物業價的不健康上漲； (8) 不即時善用兩個新地鐵出入口，便利區內居民出入，解除幾十年來居民忍受交通擠塞之苦； (9) 過去十年的地鐵工程帶來居民和街舖生意滋擾，還未享受地鐵之便，又要可能面對另外十年過外的翻天覆地的大建築地盤工程，為何兩個新地鐵出入口變了開向工程地盤，是規劃的失誤； (10) 除了拆卸狀況良好樓宇，製造不必要的建築廢料，有違環保外；更為了建造所謂的地下街，工程要深挖，產生噪音和沙塵，觸及地下各舊設施，蛇蟲鼠蟻四竄，影響鄰近屋宇的環境衛生。 8 反對計劃 8.1 基於上述不良影響和沒有無實質賠償的資料可供考慮，簡介會主要是重複介紹計劃，未能回應提問的核心，在無可選擇情況下，我們唯一的選擇回應，是反對這計劃。 8.2 彼此都是公務員，明白落實和推行政策和計劃的重要性和難度，希望計劃的主管當局能安排交流會，坦誠交流意見，增進了解。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200725-201734-15988
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	25/07/2020 20:17:34
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	陳志成

意見詳情
Details of the Comment :

反對！馬頭圍道巧興大廈居民強烈反對！我們已經在商討如何索償在起地鐵時出現的裂紋。如再在在旁邊打樁起樓，巧興大廈好有機會變為危樓！

就市區重建局發展計劃草圖提出意見 **Making Comment on Draft Urban Renewal Authority Development Scheme Plan**	
參考編號 **Reference Number:**	200725-205919-25728
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	25/07/2020 20:59:19
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Lam Wun
意見詳情 **Details of the Comment :**	
強烈反對！浙江街明發大廈居民強烈反對在旁起樓擾民！	

就市區重建局發展計劃草圖提出意見 **Making Comment on Draft Urban Renewal Authority Development Scheme Plan**	
參考編號 **Reference Number:**	200725-232049-96426
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	25/07/2020 23:20:49
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	周潔瑜

意見詳情
Details of the Comment :

本人住在靠背壟道的公務員合作社，這些舊樓已超過五十年歷史，要維修都要好多錢，再過幾年，要用更多錢去做保養，不是每戶人家都願意不斷夾錢做維修，所以我希望市建局能盡快啟動重建，拆卸這些舊樓。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200728-092430-25269
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	28/07/2020 09:24:30
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Lo Cheuk Chun

意見詳情
Details of the Comment :

1. 不得不強烈反對CBS-2:KC重建發展項目計劃！ 繼6 月19 日後，至7 月8 日市建局公佈第二份評估報告，之間也舉行過三場市建局舉辦的公眾簡介 會，邀請有關部門官員來解答街坊問題，到目前得到的回答內容，仍然是不清不楚，模棱兩可，更 令街坊居民失望，也開始明白重建計劃帶給大家的負面影響有多大。 所以，在市建局沒有無實質有關賠償的資料及沒有調整修改原有計劃方案下，且很多後繼相關部分 的回覆及報告，如給馬議員的回覆信，內裡充滿著詭譎的細節，極高風險把眾街坊的應有權益完全 給剝奪。我們不得不強烈反對這個CBS-2:KC重建項目！ 2. 市建局不盡不實的第二份報告，充滿詭譎的細節 2.1 合作社的樓宇基本上沒問題，市建局選址本區 是純粹為了本址的優厚發展空間，市建局的宗旨是處理日久失修的樓宇，並非以爭奪土地發展圖利 的，這在證明選址本區為試點重建項目，是有違市建局的宗旨。 2.2 現時本區還有9 個未解散的合作社，據聞到目 前絕大部分沒有意圖進行任何散社安排，根據未散社的原有舊契約，當年批出的優惠地價已經付清， 沒有任何欠款，社員是沒有必要進行報告中的補地價。況且啟動今次的收購行動主角是市建局，一 切有關補地價的費用合理地由市建局完全負責。 2.3 這在證明可以適合本區供合作社安置房屋是明 顯不足的，報告中的東九龍範圍可以很大，隨時有可能給放逐到很遠的區域。並且這些東九龍的新 建房屋基本沒法找到原大相若的單位，這樣情形真要發生時，就是強迫大家要找私人樓宇，但以市 建局現有的方法賠償，基本買不到合適的單位，原居民給遷徙後生活素質幾乎肯定是大幅度下降。 這些華麗推廣包裝背後，現實卻是充滿著無限的骨感。 2.4 8.1 清楚告知，這個重建計劃的的確確在製造 社會問題，包括長者適應問題，長者出入問題，小孩校網問題，家庭倫理問題，財政壓力問題等等。 這重建計劃正在為462 受影響的住戶泡製他們自家內部的問題，同時醞釀著讓他們成為將來的社會 問題！那些有限社工團隊根本不容易去應付，究竟這個計劃是解決社會問題，還是在製造社會問題 呢？所以如果不能原址安置，所衍生出來是會不少的。 2.5 這校 網問題是父母最頭疼問題，天下父母心，誰不想自己兒女能有一片美好的將來呢？好的教育是不可 或缺的。不少市民放棄居住自己的房屋，特意租住本區附近的單位，為了的就是讓子女能進入這優 良的校網區。如果給逼遷到別區，市建局及社工團隊能幫到些什麼，不都是在空談、在開空頭支票 嗎？可以說些實質的解決方法嗎？ 2.6 強烈反對這12.5 的敘述, 三場的簡介會，眾街 坊都是期望而來，憤怒而去，市建局根本上是沒有對應問題作回答，千篇一律的看著手上資料稿子 重複讀念一遍，問非所答！是mostly were not addressed at the meeting. 以前街坊們的問題仍然懸著 未解決，眾街坊還在等待確實的回覆。 2.7 市建 局15 位工作人員，似乎在推銷市建局的方案遠多於解決街坊居民的疑問，都是站在市建局利益遠多 於原居民的全部或部分利益，有時候是適得

其反。 宣傳單張仍然沒法解決居民的疑惑，因為市建局 一直都在避開核心問題，再多漂亮的單張都解決不了問題。 2.8 從以往傳媒及網上記錄，看到市建局的劣評是 佔絕大部分，非常卑劣的批評也非常多，但網上好評到目前只見到一個，最正面的消息只有市建局 自己發佈的官方消息。這樣如何能令街坊居民相信市建局可以舒緩這次計劃的衝擊？大家反而祈求 市建局停止項目，不要來擾亂我們這個安寧的社區，才是市建局最大的善行了！ 2.9 上述 5.8 已經說明原區原大樓宇供應很少，市建局策劃時，相信根本沒有很大意願照顧原居民留在原址， 甚至原區，一心只是想把原居民公務員及家屬驅離本區，不要阻礙他們大發地產財。12.10 更從之前 5.8 東九龍擴大到現在整個九龍區。市建局好像已經不在乎我們街坊要到哪裡了，只要趕快離開就是 了。 首六個月有社工為有需要人士特別是長者支援適應新生活，六個月後就自生自滅了？這個社會支援 有明顯的期限，長者身體頭腦一直在老化，不單需要更長時間，突如其來的環境變化，令他們精神 情緒受更大的打擊，很有可能是從此一沉不起！市建局既然跑來破壞我們這個社區，無緣無故製造 眾多社會問題 ，市建局安排六年的支援是遠不足夠的，更需要支援長者到終老，沒有期限，才勉強 說得過去。這是一個多涼薄，沒仁義的市建局計劃。 2.10 合作社原有契約沒有再補什麼地價條款，沒 有註明有任何欠款。地價按合約上的價錢批出，合作社就可以在上邊蓋建房屋了。 2.11 估價參考用同區七年樓，中低層，沒海景， 一般方向， 這是一個伏筆預示，市建局已經在排除鄰近眾多的優質物業作為估價參考，只剩下沒景 觀，坐向一般的低層老舊單位，再把最高及最低的估價排除，嚴重壓低估價，由此已經知道出來的 估價一定與原居民落差非常大。難怪市建局需要原居民先同意接受收購後，才肯告知正式收購價， 希望造成米已成炊，就算原居民反對也為時已晚的局面。這是市建局企圖用極低廉的方法清除原居 民的障礙，方便市建局將來大發地產財，早已忘記市建局的原有精神宗旨了。 這種手法，連以往聲名不好的私人發展商都不會用的！ 2.12 大部分原居民都要求得到賠償單位與原來的相若，市建局何曾有項目會有與合作社相若的單位呢？還說 會在本區，這個是百分百的空談！ 這段也得承認了同區樓換樓，是給原居民各方面最低的衝擊，之前列出各樣的衝擊影響問題，卻沒 有實質的解決方法，都是虛幻及詭譎的建議！整個報告都出現不少自相矛盾的地方，也證明事前市 建局是完全沒有審慎考慮各方面因素，一個草率的重建計劃，主動製造社會問題，折磨本區各年齡 階層的街坊，特別是老人家，讓他們往後不能得到善待終老！ 2.13 整份報告的矛盾，懸著一大堆未能解決的原居民問題，明顯地在證明，CBS-2:KC重建項目，是 市建局一個選址嚴重錯誤的試點！ 3. 斷章取義的調查結果，未能全面反映原居民的真實意願 3.1 評估報告書 (第5頁) 說，成功調查的住戶總數是428戶，對此計劃，有207個住戶表示強烈支 持或支持，55 個住戶表示強烈反對或反對，餘下的114 個住戶表示意見或沒有回應。這是在5 月22日首天突如其來的凍結人口調查登記、電話問卷調查和限於7 天內呈交意見問卷所收集到的數據， 市建局這個初步意見調查，不可能反映原居民的真實意願。市建局根本不想知道原居民的真實意願。 3.2 由於發報計劃時沒有簡介會和交流提問，街坊之間的討論和理解多了，反對計劃的人數普遍多了， 這可從7月6日和7日的簡介會中的氣氛和提問客觀地反映出來。有理由地相信現時反對的人多了 3.2 報告說有超過一半人贊成是取巧的說法，首七天大部分的街坊還不知發生什麼事，甚至在全沒有 任何資料下，在凍結人口調查當天，就要接受電話問卷調查，回答的準確度成大問號，這是很不負 責任的所謂調查。 3.3 很多街坊表示，不反對絕不代表同意，因為沒有資料，根本沒法決定，需要知道更多的收購細則 及賠償條件，才能決定。所以如果市建局以沒有反對當作同意，是嚴重扭曲實情，是非常不負責任 的調查結果。 3.4 市建局的三場簡介會，在在反映出街坊居民的疑惑，憂慮，無奈，不滿及憤怒。居民的疑惑得不 到合理的回答，大家對這個重建計劃的失望表於臉上，有些街坊也質問市建局對原居民強調這個計 劃重建後有多好多美，究竟對原居民街坊有著什麼關係，是企圖讓大家心生悔恨將會痛失家園？為 了滿足這個市建局所謂的美好計劃，我們的得到的就是被逼遷去啟德住公營房屋，或自行外邊找， 完全沒有考慮我們可以留在原址，見證重建後的成果。 3.5 市建局及有關政府機構，應該明白落實和推行政策和計劃是需要多與受影響人士溝通，了解實情， 不是憑空一兩個問卷或一兩下電話問答，隨便編寫一些數據就能解決的，希望計劃的主管當局能再 多安排交流會，坦誠交流意見，增進了解。 3.6 城規會辦公室展示本CBS-2:KC 市建局第一份評估報告的市民意見，區內區外反對人士佔大部分， 且發現大部分除了反對計劃的對周遭環境的衝擊，很多都是不滿市建局的不公義處理方法，資料嚴 重不足及不清楚，當中不滿及投訴市建局報告歪曲實際情況亦不少，譬如樓宇及環境狀況，即使有 些不持反對意見的，也強調要看賠償方案而定；市建局第二份報告不單忽略了這些，且更沒有列出 居民的有哪些反對意見，有哪些重大疑問，如何跟進或解決，都一律躲避；只單憑對本身有利的數 據來說明大部分支持這重建計劃，完全有欠公允。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200731-000453-68278
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	31/07/2020 00:04:53
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Ng

意見詳情
Details of the Comment :

城規會是主要著重規劃設計部份，對受影響的居民的家庭、經濟、社區網絡的衝擊的審理是不能勝任的，不能穩妥地全盤作出通情達理的考慮和判決的。 市建局在「第一階段社會影響評估」，更加在「第二階段社會影響評估」裡，就發現的問題止於 "評" 和 "估"，只是輕描淡寫地說出什麼什麼的影響，沒有真誠地說出帶來即時的衝擊和深遠影響，也沒有因應問題而作出切實可行的解決方案，只借著問題引回和重彈舊調。是搗壞這小社區，制造不近人情的拆散家庭和迫遷。市建局選擇這小區裡狀況良好的樓宇拆卸重建，是否有違《市區重建局條例》原旨，是否有違《市區重建策略》的以人為先，地區為本，與民共議? 策略裡的第6和第7項，可有做到? 做了多少? 好肯定地說，到此刻為止，未有與民共議過，只流於簡介會的計劃介紹，在短短的簡介會時間不著邊際的稿子回應，不是對提問切實回應。 公務員事務局也沒有把歷史遺留下來的公務員樓宇，負責任地維護員工和家屬的權益，以及施以援手和幫助。更糟在回應時只重述舊文，但文中提及的This scheme is to provide local officers with an opportunity of purchasing their own house on a long-term basis 是擦身而過不理，不說也不關心半點。未顯示曾與發展局和市建局溝通，只回應是市建局的計劃，由有關方面跟進。公務員事務局和和發展局作為政府代表，以及半官方的市建局，程序上不及一般人發展商的溝通和商議，可有為政府整體形象出一點力? 懇請城規會在審理計劃的設計規劃時，不要被不盡不實的第一和第二階段社會影響評估蒙騙，也要肯定市建局和有關當局有與居民溝通，不讓這不公義的計劃帶來不近人情和破壞性的衝擊。懇請城規會不要通過此計劃。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200731-142353-79487
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	31/07/2020 14:23:53
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	Ho Kei Wai

意見詳情
Details of the Comment :

本人非常關注評估報告內容中的第5項「住屋意願」，意見如下： 1.收購公務員合作社樓宇不同於收購一般私人物業。政府必須賠償業主因收購而被剝削的公務員房屋福利。 2.要求原址安置或原區「樓換樓」安置，所安置新單位面積須與現住單位相若。 3.此重建項目是由市建局主導，因此要求免補地價或提供比按照「現有用途價值」計算土地補償的更大優惠，以免賠償金額扣除補地價金額後不足以購買與原住單位面積相若的新物業。 4.要求於搬遷另一居所前，業主可以免租暫居於原有單位。 5.計算樓價估價賠償應以原址地段附近7年或以下樓齡樓宇作參考，而不是距離頗遠樓宇。 6.要求安排於簽署買賣確認書時即發放賠償金，以便業主可盡快選購新物業。 本人對上述評估報告內容沒有其他意見。若有合理賠償方案，本人不反對是次試點重建項目。最後，要求市建局盡快提供詳細賠償方案資料。

就市區重建局發展計劃草圖提出意見
Making Comment on Draft Urban Renewal Authority Development Scheme Plan

參考編號 **Reference Number:**	200731-220842-77895
提交限期 **Deadline for submission:**	31/07/2020
提交日期及時間 **Date and time of submission:**	31/07/2020 22:08:42
發展計劃草圖名稱 **Name of Draft Development Scheme Plan:**	靠背壟道／浙江街: 就第二階段社會影響評估報告提出意見 Kau Pui Lung Road / Chi Kiang Street: Making Comments on Stage 2 Social Impact Assessment Report
「提意見人」姓名/名稱 **Name of person making this comment:**	周希雯

意見詳情
Details of the Comment :

100%支持計劃！我認為透過重新的建設和規劃，有望活化社區，改善居民的生活素質，也可以在當中加建公眾休憩用地及社區設施，滿足居民在生活上的不同需要。透過重新的規劃能完善整個社區的規劃，改善各種因社區配套不足所引致的問題。

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Absolute Objection to Kau Pui Lung Road/Chi Kiang Street Development Scheme Plan (CBS:2-KC) of Urban Renewal Council

30/07/2020 12:08

From: Cecilia Li [redacted]

To: tpbpd <tpbpd@pland.gov.hk>, "inquiry@mail1.ura.org.hk" <inquiry@mail1.ura.org.hk>

Cc: "ceo@ceo.gov.hk" <ceo@ceo.gov.hk>, "csbcomp@csb.gov.hk" <csbcomp@csb.gov.hk>, "csbcshs@csb.gov.hk" <csbcshs@csb.gov.hk>, "scsoffice@csb.gov.hk" <scsoffice@csb.gov.hk>, "enquire@pland.gov.hk" <enquire@pland.gov.hk>, "tspd@pland.gov.hk" <tspd@pland.gov.hk>, "rkwlee@pland.gov.hk" <rkwlee@pland.gov.hk>, "plbenq@devb.gov.hk" <plbenq@devb.gov.hk>, "devbenq@devb.gov.hk" <devbenq@devb.gov.hk>, "URUNIT@devb.gov.hk" <URUNIT@devb.gov.hk>, "dokc@had.gov.hk" <dokc@had.gov.hk>

FileRef:

Dear Sirs/Madams,

I write to object to the scheme plan. After reviewing the Stage 2 SIA and the draft proposed development scheme, I would like to express my absolute objection to the proposed development scheme plan.

Of the 428 households affected, 66% comprises mainly elderly residents representing over 30% of the total number of people affected by the proposed scheme. The report also found that 61% of the affected population are not in employment. The SIA acknowledges a genuine concern on the negative impact of this proposed development on this relatively high proportion of retired elderly residents.

Some of the main concerns include the inability to adapt to a new environment, loss of social support by neighbours, children and friends and fear of not being able to afford to remain in close proximity to their existing locality. The proposal has not offered any detailed, concrete resolution to address the concerns of the existing residents who are feeling anxious, despondent, disappointed and helpless. The compensation package is unclear and so is the actual figure of the premium demanded by the government, leaving the residents stressed and doubtful of their future, not knowing whether they are able to remain within the area they have called home. In fact, the URA has already indicated the compensation after deducting the land premium to be repaid to the government, will only be sufficient to acquire government flats of comparable size outside Tokwawan. Rental accommodation in the immediate location is not a feasible option since most of the residents are retired and landlords will not rent to retirees.

An overwhelming 94% of the households are owner occupiers, 85% of which have resided here for over 20 years. Most of them have dedicated their entire working life as civil servants or currently employed by the government, diligently serving the people of Hong Kong. What have they done to deserve being kicked out of their homes after a life time of service to their society and their beloved government?

Adding to the stress of their homes being destroyed, this whole fiasco takes place during an unprecedented pandemic when households are being forced into isolation, social contacts being severed. Large scale public briefing, consultation and discussion forums are unable to be facilitated at a time when social distancing rules apply. Information is being cut off. How anxious, desperate, worried and helpless would an 80-year-old retired public servant feel,

sitting at home, not knowing when someone will come in with a bull dozer to level their humble abode?

This is how my parents and the other elderly neighbours and myself are feeling every single day since this proposal has been revealed on 22 May 2020.

Fine ladies and gentlemen, please hear the plea of the people. Please listen to their voices. We have done our part. It is now your decision. Please put a halt to this plan. Thank you!

Regards,
Cecilia Li

☐ Urgent ☐ Return receipt ☐ Sign ☐ Encrypt ☐ Mark Subject Restricted ☐ Expand personal&public groups

Opposed to (CBS-2:KC): 遞交市建局靠背壟道/浙江街發展計劃(CBS-2:KC) 反對意見 (第二階段)
30/07/2020 13:44

From: Wong Raymond [redacted]
To: tpbpd@pland.gov.hk, inquiry@mail1.ura.org.hk, sdev@devb.gov.hk, rkwlee@pland.gov.hk
Cc: Wong Raymond [redacted]
FileRef:

1 attachment

PDF
2

CBS-2KC 重建發展計劃，反對理由 ii.pdf

見附件

強烈反對：市建局靠背壟道/浙江街發展計劃(CBS-2:KC)

致城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓
tpbpd@pland.gov.hk

敬啓者：
有關：市建局靠背壟道/浙江街發展計劃(CBS-2:KC)

1. 有關第二階段社會影響評估報告的回應：

		附圖
a)	按凍結人口調查報告，街坊在不清不楚的情況下，(CBS-2:KC) 計劃亦只有 55%(207÷376)贊成重建，遠較盛德街項目(CBS-1:KC)的 72% (89÷123)為低；	*i,ii*
b)	至 2020 年 6 月 19 日截止，城規會收到(CBS-2:KC) 的意見共 445 份，贊成不到 100 份，只佔約 23%；	
c)	(CBS-2:KC) 的住戶收入水平，較整體香港社會為高，亦遠較(CBS-1:KC) 為高；	*iii*
d)	(CBS-2:KC) 的居民，絕大部份為香港居民，67%居住超過 30 年以上；	*iv*
e)	2020 年 6 月 28 日摯誠.志成（網誌）的節錄： *i. "此外，住戶的查詢數字亦相當高，兩個項目合共有大約接近一半的住戶，向市建局提出查詢，較一般項目高出超過一倍，反映他們十分關注這項重建計劃，希望加深了解。"* *ii. "按我們的初步評估，自住業主在扣除土地補價後收到的補償，足夠用作購買由香港房屋協會發展和提供的專用安置屋邨的資助出售單位，作為重置居所的選擇之一。"*	

2. 小結：

a) 無論用人口凍結調查或城規會對第一階段該計劃的收集意見，均達不到八成居民贊成的強拍門檻標準，其中盛德街能達到八成同意被收購門檻這標準機會較高；

b) 靠背壟道計劃住客收入一般較高，不但較香港嘅整體標準為高，且較盛德街高很多。在整體住客不太急需錢的情況下，能收購/重建靠背壟道(CBS-2:KC)的機會較低！

c) 靠背壟道項目居民一般住超過 30 年，且絕大部份屬本港居民，流動性相當低；

d) 市建局行政總監韋志成的網誌有誤導成份，兩個項目的查詢係比正常項目多一倍？實際上第一階段靠背壟道收集意見渠道主要是城規會，居民咨詢亦然。因此，如按正常單一途經向市建局查詢絕不止一倍！

e) 靠背壟道居民對韋志成網誌的講話相當反感："足夠用作購買專用安置屋邨的資助出售單位，作為重置居所的選擇之一"，為何我們要由住四房的私樓，改為購買專用安置屋邨的資助出售單位？能購買單位的大小又沒說清楚，隨時可能說是購買開放式或一房單位！！

f) 基於上述種種，無論在居民收入，以至住客嘅受歡迎程度，重建盛德街項目會較受居民歡迎，收購難度亦相對較小，作為一個先導項目，建議市建局應先以盛德街作為其標竿/先導項目，作為其他公務員樓重建的參考。靠背壟道計劃(CBS-2:KC)先擱置一旁，不要打攪我們這個近地鐵、靚校網、居民關係融洽、冶安良好，少新移民，只有 30%的居

民認為居住環境有問題的小區(盛德街是50%)！除非這是需要動用尚方寶劍的國家級任務？ (見第 10 點)

其它反對理據！

3. 土瓜灣是九龍少有的純住宅地區，區內沒有大型購物商場，以馬頭圍道為分界，東面有較多商業活動，由於租金便宜，進駐了很多專門招待國內遊客的商鋪，特別在翔龍灣、偉恒昌、炮仗街、九龍城碼頭一帶，太多內地低價團旅客已對本區居民造成嚴重滋擾，很多的商鋪、食肆、酒樓根本就不是以服務本區居民為目的，旅客的不文明行為，包括大聲喧譁，抽煙，橫衝直撞，小朋友在花叢小便等，已多次在傳媒報導，一提到土瓜灣就會聯想到國內遊客喧譁，與民爭路，旅遊巴與車爭路、泊位等問題，四川街已發生過旅遊巴撞死街坊事件(立法局於 2019 年 5 月 22 日亦有專題討論)，成為土瓜灣區的一大垢病；

4. 本計劃 CBS-2:KC 坐落於馬頭圍道以西，主要為公營房屋(樂民新村)，公務員樓，半山壹號，原本沒什麼商業活動，只有零星小店，一旦改為步行街、地下購物中心，停車場等，務必又引進一大批自由行及低價團旅行，將原本寧靜，純住宅的土瓜灣西區變為另一個喧嘩吵鬧的非民生購物區，打破原本寧靜、治安好的環境，對原本在馬頭圍道以西啲居民滋擾相當大；

5. 市建局的首要工作是協助環境惡劣，殘破失修的樓宇進行重建，計劃中在土瓜灣西重建的公務員樓，並非危樓，沒有結構危險。在文件 CBS-2KC_SIA1 (第一階段社會影響評估中 P.18, 5.1) ，亦列明“維修及保養尚可”。事實上，這一帶的公務員建屋合作社，每隔一段時間均會做定期維護和翻新，在 NOW TV 節目，[樓市每日睇 2013] ，稱美善同道一帶的公務員樓，充滿歐洲風情法式元素，有巴黎 13-14 區精品酒店的建築風格，雖未達到需要保育歷史建築的程度，但將它與一般結構有危險，如馬頭圍道和黃埔街的冚樓唐樓相比而需要清拆重建，實在可惜；

6. 馬頭圍道以西一帶的居民，一直抱著“忍一時”的心態去承受興建沙中線帶來嘅震盪、噪音、交通擠塞、改路、灰塵、甚至大廈出現的裂紋，終於守得雲開看見落山道、江蘇街的地鐵站出口之際，以為終於可以享用等了十多年的土瓜灣地鐵站，換來的卻是收到市建局有關重建的通知，大部分居民均感到愕然和憂慮！亦有違市建局以人為本的信念；

7. 商鋪亦言，受長年興建地鐵，噪音、改道、灰塵等影響，人流已大幅減少，大部份馬頭圍道的商鋪早已經營不下去，在看見曙光之際，卻又要面對另一個大型地盤影響人流及營商環境，對這些小商戶的經營者來說，亦太不公平；

8. 對於馬頭圍道的住宅大廈的住戶，興建沙中線時已為他們大廈帶來裂紋、石屎剝落等問題已有傳媒廣泛報導，如再在他們身后的美善同道再興建高樓大廈，不排除為他們的大廈結構帶來二次傷害，帶來另一個十年浩劫，亦為住客的生活帶來再次的不便，實在殘忍；

9. 房協曾經推出重建「公務員建屋合作社」樓宇先導計劃，然而反應並不理想，證明公務

員根本沒有太大出售其單位的意慾。在市建局馬頭圍道辦事處的同事應很清楚，同一面地產代理鋪的公務員樓廣告，標題都是“已補地價”/“只限公務員” 等字眼，但過馬路另一面的地產鋪的廣告很多都提會及 “具重建價值”/“具收購概念” 等字眼，證明馬頭圍道東面的市場，更期待市建局來收購，市建局在馬頭圍道東面搞拆遷重建，更市場主導，更合邏輯；

10. 政策 3600 度的改變令人摸不著頭腦：

	附圖
a) 2014 年 6 月：在整份“九龍城市區更新計畫規劃研究最終報告”，158 頁的報告從沒有提及美善同道及靠背壟道的的名字，更不用說這一帶的公務員樓需要重建或復修；	*A*
b) 2016 年 7 月 29 日：房協推重建「公務員建屋合作社」，合作社須齊集相關地段 100%業主的參與；	*B*
c) 2018 年 9 月 25 日：重建公務員建屋合作社計劃轉交市建局；	*C*
d) 2019 年 9 月 11 日：政黨強烈要求政府引用土地收回條例；	*D*
e) 2019 年 10 月 16 日：林鄭月娥施政報告：《收回土地條例》是把“尚方寶劍”	*E*
f) 2020 年 5 月 20 日：大公報獨家，重建公務員樓業主可買房協資助房屋，	*F*
g) 2020 年 5 月 22 日：公佈重建土瓜灣兩個公務員建築合作社計畫：市建局總監（收購及遷置）黃偉權：*如業主不同意收購，市建局會尋求政府使用《收回土地條例》收回買不到的業權。*	*G*
小結：	
h) 按 2014 年九龍城市區更新計畫研究最終報告，收購公務員樓完全沒有迫切性；重建優先範圍應是土瓜灣五街 13 街一帶，以及九龍城道與落山道一帶；	*A*
i) 市建局的信念到底是以人為本，還是以盈利為本？看中美善同道、靠背壟道地鐵出口這塊寶地，超強校網，非要用尚方寶劍搶奪回來？	
j) 不到五年時間，政策為何有如此 3600 度的轉變？2016 年 7 月，說的是需要集齊 100%的業權，公務員樓才能申請重建。至 2020 年 5 月，市建局竟然說如果業主唔同意收購，可以引用土地回收條例收回買不到的業權，由 100%業主主導變為 100%政府主導！是否市建局被區議員/立法局議員的民意/大數據誤導，市建局好心做了壞事？還是兩項目具戰略上意義，一個在工聯會對面，另一個在土瓜灣出口而成為內房公司的囊中物？？	*H*

11. 被誤導的民意：按九龍城區議員楊永傑接受星島日報訪問時表示，與區內街坊進行初步調查，發現約八成半支持重建合作社(附圖 G) 。如果以此數據提供給市建局，作為應先拿美善同道和靠背壟道的公務員樓作重建試點，意見會有很大的誤導性。美善同道和靠背壟道的單位，在保養水準、交通便利、校網、購物，治安、管理費、少閒雜人等，其它唐樓根本是無可比擬的。按市建局的收購經驗，即使那些條件更差，如大門鐵閘鎖屢遭破壞、偷電、蛇蟲鼠蟻、品流複雜、日久失修的唐樓，要八成業權同意也不容易。如市建局早前想收購的土瓜灣道項目，及深水埗東京街項目等，均達不到八成，更何況是八成半，數據令人懷疑；

12. 地鐵是近期香港社會事件被針對的目標，建築地盤內的所有用具、設施、建築材料均容易被人作為堵路的工具，擾亂社會秩序嘅武器。土瓜灣地鐵站及馬頭圍道正正處於進入東九龍的咽喉地帶，一旦發生社會事件，容易堵住整個東九龍地區，減少在市區地鐵站

附近的地盤面積及數量亦應作為社會風險評估的一個考慮；

13. 當年入職做公務員很多都是追求安穩定的生活，買公務員樓除了因為有折扣外，更因為它面積較大可以，可以與父母一起同住，又可以安心生兒育女，不用擔心生活空間，公務員樓可以世代相傳，有安穩的生活直至終老。由於公務員樓售賣有轉讓限制，如以投資的角度購買，是不合適的；

14. 公務員收入穩定，子女又有津貼到英國讀書，所以公務員二代一般受教育水平亦都較高，生活亦較安穩，因此整個社區嘅鄰居鄰裏關係都較好，治安亦佳，鮮有發生如搶劫、自殺、被追數、被淋紅油、家裡吵吵鬧鬧的場面，由於公務員樓都是以自住為主，居民流動率亦較低，如此價質的小社區及鄰居實在其它社區很難找到；

15. 由於沒有追求更大居住空間的必要性，因此很多公務員業主及他們的家屬，均未有在外邊再置業作投資或細屋搬大屋的打算。以我 90 年代大學畢業為例，當時大學畢業生一個月的工資是可以買三英呎樓，現在的大學畢業生，普遍一個月的工資是買不到一英呎樓。如現在要根據土地收回條例，強迫這批公務員或他們的家眷，臨老才要到自由市場去爭房協安置屋，或搬到中轉房屋等待原區重置住面積小很多的單位，也太殘忍，太折騰這班公務員及其家屬吧！亦有違了當初加入公務員團隊想安安穩穩過日子的原意；

16. 如果因為公務員樓是因為當年政府以優惠價賣給公務員，現在就有較大理由可以引用“收回土地條例”收回這私有財產。那其它政府以優惠價賣給市民的項目，例如居屋，港人港地等，將來會否又有較大機會被政府以“土地收回條例” 這把尚方寶劍收回呢？

17. 補地價根本就是機會成本：以家父是紀律部隊督察為例，當年他是每月拿房屋租金津貼的。當年的津貼，是足夠讓我們一家四口在市區租一個新樓三房連車位的單位，該單位目前已有 39 年樓齡，現市值月租是 HKD 2.5 萬，一年就是 30 萬，20 年就是 600 萬。假如目前政府提供同樣的條件，給你可以用折扣價購買一個大單位，條件是你需要放棄未來 20 年的 600 萬房津，而且單位將來有機會被政府按所謂同區 7 年樓齡的市價徵回，政府徵回時你還要補回當年的折扣百分比，我相信沒有一個人會願意購買，除非你是“麥齊光”，拿租金津貼租回自己的單位。因此補地價完全是一個“機會成本”(Opportunity Cost)，所謂 1/3 or 2/3 未補地價我們早已付了，是家父犧牲他的租金津貼兌換回來，政府徵回單位時不可能要家屬補回。否則，當年的租金津貼就白白犧牲了；

18. 最後，我居住在美善同道這單位 30 多年，三代均居住在這裡，對這單位、鄰居、社區有深厚感情，多年來已投資過百萬裝修這單位。目前兩位小朋友亦在本區上學，均可步行往返學校，當他們看見家門外、美善同道、靠背壟道一帶貼滿市區重建局的文件，誤以為是拆遷通知，異口同聲的大表反對、大表憤怒；

19. 在立法會發展事務委員會，公務員建屋合作社樓宇重建事宜小組委員會，第二次會議 (2016 年 1 月 25 日)，第一項議程： 促進公務員建屋合作社的重建的最新進展，發展局副局長發言要點；

a) 各位委員，今天我聯同發展局、公務員事務局和地政總署的同事，向小組委員會匯報政府就有關推動重建公務員建屋合作社(合作社)的建議方案的最新進展。 在邀請同事介紹有關詳細建議前，我想強調，在整個研究過程當中，我們是抱着合情合理、符合公眾利益和公帑運用得宜的大原則，探討審視各方面的意見和建議，務求於切實回應合作社業主的訴求和確保社會資源有效運用之間取得平衡。

b) 合作社樓宇普遍位於市區交通便利的地段，而且樓宇層數較少，看似具備重建潛質。我和我的同事就此作出研究，卻發現事實並非如此。根據我們的案頭研究(desktop study)，就已解散但未進行重建的 174 個公務員合作社(涉及 179 個地盤)而言，很 CB(1)494/15-16(01)2 多地盤現已充分利用其可建樓面面積。如單從增加地積比率考慮，我們的粗略估算是大概只有少於半數的地盤具備重建潛質，而這些地盤重建後可增加的整體樓面面積最多約二十多萬多平方米，不如外界想像般高。因此，從善用公帑的角度而言，我們認為似乎未有充分理據動用公帑(如減免補地價)去介入合作社的重建。若因重建合作社而需調整政府一貫政策以協助，基於公平原則，我們對其他提出同樣要求的樓宇業主是否亦應一視同仁處理?

c) 我們也探討過從市區更新的角度，是否有充分理據優先重建合作社樓宇。我們理解合作社樓宇樓齡一般較高，亦有個別樓宇缺乏如電梯等設施，對年長的住戶而言甚為不便。但事實上，現時全港共有 6,200 幢樓齡超過 50 年的樓宇，而其中那些涉及劏房戶，環境更為惡劣。相比之下，合作社樓宇顯得保養得宜，空間亦較寬敞，重建需要相對較低迫切性。在有限的公共資源下，我們理應先重建居住環境最惡劣的舊樓。況且，現時已有機制讓合作社樓宇業主出售其單位，而亦有不少業主已選擇這個做法。一直以來，合作社地盤的重建都是由私人發展商主導，至今已有 12 個合作社進行私人重建。因此，我們看不到有充分理據動用公帑優先重建合作社樓宇。

d) 我們亦知悉目前約有 500 名在職公務員居於合作社樓宇內。得以繼續享有在合作社樓宇居住的權利是他們應有的房屋福利。因此，要求他們遷離有關的合作社單位及放棄他們的房屋福利，以促成重建有關的合作社樓宇，可能並不公平。此外，重建合作社樓宇已有成功先例，因此要求取得 100%業主同意參與，對重建合作社樓宇而言似非無法解決的障礙。

20. 市建局周松崗主席稱自己土瓜灣老街坊，此項目是"contribute to his old neighborhood" (見圖 i)，我相信如果他真的要對老街坊好，應該從保留、美化的角度出發，而不是要拆毀狀況完好的公務員樓，然后安置老街坊去賃素出名差的新居屋！

21. 最后，按文件 CBS-2KC_SIA1 第一階段社會影響評估，P.28 結論 9.1: '由於合作社樓宇並沒有電梯或其他無障礙設施，一些居民特別是長者期望搬遷至設有現代化設施的樓宇單位，可能會歡迎透過金錢補償或安置(如適用)而改善他們的居住環境，但其他的受影響人士則可能不願意受到打擾，只想維持現狀。' 及上述 2016 年 1 月 25 日立法會發展事務委員會，公務員建屋合作社樓宇重建事宜小組委員會，第二次會議的立論。我的立場亦很簡單、很清晰，只想維持現狀，什麼補償安排亦沒有興趣！市建局要接管公務員樓重建項目，請移玉步到盛德街會較受歡迎。

此致

受靠背壟道/浙江街重建項目影響公務員暨家屬

Raymond Wong

[redacted]

2020 年 7 月 30 日

Cc:
市區重建局
地址:香港皇后大道中 183 號中遠大廈 26 樓
inquiry@mail1.ura.org.hk

--完—

附圖 i

對重建計劃的意見

2.5 在 376 個成功進行凍結人口調查及社會影響評估問卷的受訪住戶中，有 207 個住戶表示強烈支持或支持建議的重建計劃而 55 個住戶表示強烈反對或反對建議的重建計劃。餘下的 114 個住戶表示無意見或沒有回應該問題。所收集的意見只反映受訪住戶對重建計劃的初步意見，與業主出售或不出售其物業無關。

對單位內的狀況及居住環境的意見

2.6 大約 30%的受訪住戶表示其單位出現或間中出現噪音、室外空氣污染 / 差及石屎剝落的問題。而在居住環境方面，受訪住戶一般表示沒有問題。

附圖 ii

對重建項目的意見

2.5 在 123 個成功進行凍結人口調查問卷及社會影響評估問卷的受訪住戶中，有 89 個住戶表示強烈支持或支持建議的重建項目，而 3 個住戶表示強烈反對或反對建議的重建項目。餘下的 31 個住戶表示無意見或沒有回應該問題。所收集的意見只反映受訪住戶對重建項目的意見，與業主出售或不出售其單位無關。

對單位內的狀況及居住環境的意見

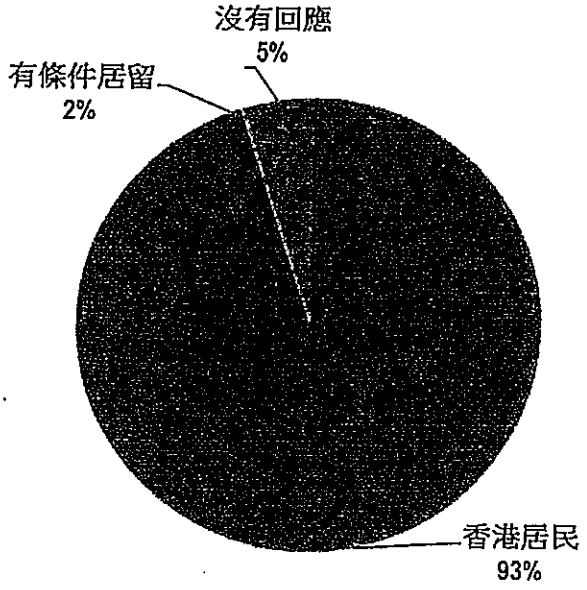
2.6 多於 50%的受訪住戶表示其單位出現或間中出現噪音、無食水、無水沖廁及室外空氣污染的問題。而在居住環境方面，受訪住戶一般表示沒有問題。

附圖 iii

	該計劃範圍內的受訪住戶	全港 (按第 3.1 段)	評估
住戶每月收入低於港幣 10,000 元	6%	19%	較低
住戶每月收入低於港幣 4,000 元	2%	6%	較低
現正接受綜合社會保障援助 (綜援)	1% (4 個住戶)	約 4% (2020 年 5 月份水平)[2]	較低

附圖 iv

圖 4.2　香港特別行政區居留身份 (截至 2020 年 6 月 12 日合共 428 個受訪住戶中 1,424 位居民)



附圖 A

2.1.1　本章旨在匯報九龍城區基線資料更新的主要重點及分析結論。更新後的基線資料有助讀者了解九龍城區各方面的最新情況，並作為討論該區市區更新課題的起點。有關更新工作於2012年中旬進行，資料更新至2012年6月，主要以兩份研究文件作基礎，包括由九龍城區議會委託顧問進行並於2010年完成的《九龍城市區更新地區願景研究》以及由諮詢平台於2011年編製的《九龍城市區更新願景 - 回顧與前瞻》，並着重了解及分析初步方案所識別出市區更新焦點範圍的現況，當中包括龍塘分區的東南部、土瓜灣分區及紅磡分區，作為其後制訂更新計劃的基礎。初步方案的市區更新焦點範圍及其市區更新方向詳情如下：

Study on Urban Renewal Plan for
Kowloon City
九龍城市區更新計劃規劃研究
最終報告
2014年6月

重建優先範圍
- 土瓜灣五街及十三街一帶
- 土瓜灣九龍城道與落山道一帶
- 土瓜灣環字八街 / 銀漢街 / 崇安街一帶

復修及活化優先範圍
- 龍塘街前圍道一帶
- 紅磡溫思勞街 / 機利士南路一帶

重建及復修混合範圍
- 土瓜灣銀漢街 / 上鄉道 / 貴州街 / 旭日街一帶
- 紅磡庇利街 / 春田街 / 崇安街一帶
- 紅磡黃埔街 / 寶其利街 / 蕪湖街一帶

活化商貿範圍
- 紅磡鶴園街 / 鶴園東街 / 民裕街一帶

附圖 B

重建「公務員建屋合作社」樓宇先導計劃

香港房屋協會(房協)推出一項先導計劃，協助重建「公務員建屋合作社」(前稱「政府為公務員建樓宇計劃」)(合作社)的樓宇為「資助出售房屋」，為有關單位的業主提供多一個選擇以改善居住環境。該計劃將以「需求主導」形式推行，業主須自行成立合作社提出申請。

房協已為先導計劃訂立準則，包括提交提出申請的合作社須有最低限度100%業主的參與，並就合理時間內簽署具約束力的協議及完成買賣交易。此外，重建地盤面積合計不得少於1,400平方米，以便為「資助出售房屋」項目提供所需的發展空間。

2016 年 7 月 29 日，房協推重建「公務員建屋合作社」：房協早前已為先導計劃訂立準則，如提出申請的合作社須齊集相關地段 100%業主的參與，並於合理時間內簽署具約束力的協議及完成買賣交易；此外，重建地盤面積合計不應少於 1,400 平方米，以便為「資助出售房屋」項目提供所需的發展空間。

附圖 C

2018-09-25

附圖 D

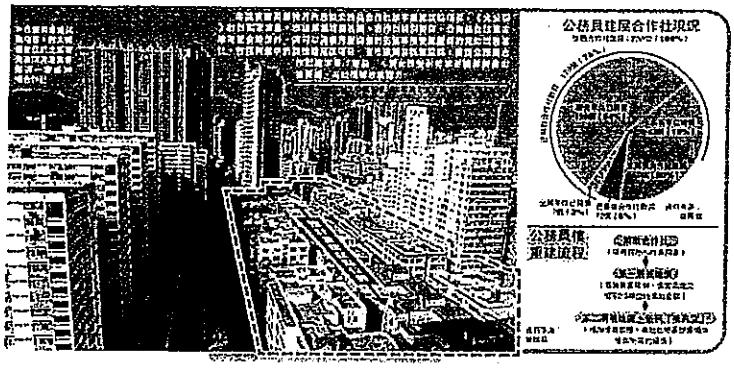
2019 年 9 月 11 日- 東方日報全版廣告

附圖 E

重建公務員樓 業主可買房協資助屋

時間：2020-05-20 04:23:19　來源：大公報

下一篇：林鄭：零星個案不影響復課



圖：市建局重建試點項目，較大機會是位於土瓜灣美善同道及靠背壟道一帶逾30幢合作社

市區重建局最快月內啟動公務員合作社樓宇重建試點項目。《大公報》收到獨家消息，市建局為理順收購會作出特別安排，合資格自住業主除獲現金賠償外，還可以選購房屋協會的市區專用安置屋邨的資助出售單位，包括興建中的啟德發展區項目。有市建局非執單認為，重建公務員合作社樓宇是「雙贏」，若允許受影響業主購買資產出售房屋，有助理順收樓阻力。

\大公報記者 曾敏瑤（文、圖）

市建局公布兩個土瓜灣公務員合作社重建試點項目

2020-05-22 HKT 12:32

建介 0　分享工具

市建局公布公務員合作社重建試點項目，預計重建後單位總數由目前約600個增至超過3千個。（郭志強攝）

00:00　02:04

陳曉雯報道

市建局公布兩個位於土瓜灣的公務員合作社重建試點項目，預計重建後單位總數，由目前約600個增至超過3千個；完成收購後，會無償撥出部份土地予政府，興建公營房屋。

市建局表示，由於有部份公務員合作社仍然未款社，要完成相關程序，但要令住戶接受收購，有一定難度，如最終有住戶不接受收購，市建局可能向政府提出引用《土地收回條例》收回業權。

附圖 H

2019 年 7 月 8 日頭條日報

即時新聞 日報新聞 頭頁版 專欄 Popnews 娛樂影視 財經網 Headlife 馬經網 Blogcity

則，會考慮預留部分合作社重建地段發展公營房屋。

消息指，因應土瓜灣區內的公務員合作社數量較多，兼且分布較為集中，位處美善同道及靠背壟道一帶的合作社，作為重建試點的呼聲較高。本報亦留意到，全港現時二百二十六個公務員合作社之中，剛好有三十七個位於該區內，雖然中間位置被部分私人發展項目分隔，但仍可分為南北兩部分，以高密度方式發展，或為盼合市建房早前提及的選址條件。

政府去年曾經公布，計劃將一幅敷德用地預留作重建房協的其美邨，再在其美邨原址重建樂民新村。據了解，由於樂民新村正好位於靠背壟道公務員合作社對面，推動該處的重建，或相可為日後提早重建樂民新村鋪路。消息人士出：「對不少長者而言，他們會擔心適應困難，故希望能夠做到原區安置，加上現時政府可利用該幅用地興建房屋、綠置居或置安心，可為居民帶來『可租可買』的選擇。」

當局更估計，只要能夠啟動重建土瓜灣區一帶的公務員合作社，可望整個地區以小社區方式逐步重建，補充當區社福設施不足，並將原有的街道經濟和小店經營模式復現。消息人士說：「希望以此帶來示範作用，作為重建其他地區合作社的藍本，故今次的經驗將會十分值得參考。」

可南北兩部分高密度發展

九龍城區議員楊永杰表示，早前與區內街坊進行初步調查，發現約有八成半支持重建合作社，主要原因為該批建築樓齡現時已普遍超過五十年，面對樓宇老化、頻繁維修等問題，加上沒有升降機，居民上落需行樓梯，對日漸年老的住客均甚為辛苦，因此有不少居民希望重建換取更舒適環境。

楊永杰續指，就鄰的樂民新村日後亦將清拆，區內居民普遍希望於原區安置，以保持區內的鄰里關係，因此亦希望在合作社重建時，撥出部分用地予房協興建資助房屋，讓樂民新村的居民選入，日後再於樂民新村原址撥出部分用地予市建局作交換。

原文刊於《星島日報》

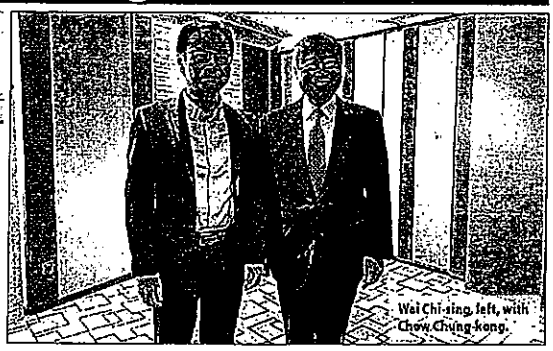
2020 年 7 月 27 日英文虎報

附圖 I

URA keeps things on the move

FAME AND FORTUNE

Siu Sai-wo



Wai Chi-sing, left, with Chow Chung-kong.

Private and public organizations alike have delayed planned work items due to the pandemic.

However, the Urban Renewal Authority still has a long line-up of projects, as can be seen from the new work schedule that it submitted to the government last month.

These include pilot redevelopment projects on Civil Servants' Co-operative Building Society Scheme sites, a planning study on Yau Tsim Mong, a district-based development in To Kwa Wan, as well as building rehabilitation.

With a general land shortage in the SAR, urban renewal is one way to increase building supply. Yet many potential redevelopment sites have already been snapped up by private developers.

Besides, the Yau Tsim Mong old buildings redevelopment could only yield aggregated floor area that represents just a few percentage points of new supply.

That is why the authority is piloting the redevelopment of Civil Servants' Co-operative Building Society Scheme sites.

For these sites to be redeveloped, the government needs to charge an additional land premium, which can be calculated in one of two ways, said URA managing director Wai Chi-sing.

One way is to base it on the redeveloped value, which has the potential of being higher, hence the premium amount to be topped up will be higher. The second method is to base it on the situation "as is," which is also workable for existing occupants as they may apply for subsidized replacement housing.

Redevelopment projects in To Kwa Wan, meanwhile, will be taking the district-based approach, which will be on a bigger scale than many of the authority's previous ventures.

Such an approach will yield better results and be more effective in enhancing the district's environment.

URA chairman Chow Chung-kong is said to have lived in the area when he was young, so redevelopment projects using the district-based approach could be seen as one way for him to contribute to his old neighborhood.

Siu Sai-wo is publisher of *Sing Tao Daily*

☐ Urgent ☐ Return receipt ☐ Sign ☐ Encrypt ☐ Mark Subject Restricted ☐ Expand personal&public groups

「靠背壟道 / 浙江街發展計劃 (CBS-2:KC)」意見書 (美善同道127號五樓住戶)
30/07/2020 15:26

From: yan [redacted]
To: "tpbpd@pland.gov.hk" <tpbpd@pland.gov.hk>
Cc: "inquiry@mail1.ura.org.hk" <inquiry@mail1.ura.org.hk>
FileRef:

2 attachments

重建意見書（美善同道127號[redacted]) OK.pdf 美善同道127號[redacted].pdf

致城市規劃委員會
各委員你好！
本人日前曾就「靠背壟道 / 浙江街發展計劃 (CBS-2:KC)」郵寄意見書至 貴辦事處，唯因疫情關係，郵政局現正實行有限度服務。為慎重起見，本人現以電郵再發放相同內容的意見書予 貴委員會（請參閱兩份附件），以確保本人之意見能在諮詢期限內送達 貴委員會。
盼能跟進，不勝感荷！
美善同道127號[redacted]住戶敬上
2020年7月30日
*此電郵副本同時寄送至市區重建局

致城市規劃委員會/市區重建局/政府各相關部門
（下簡稱「委員會」）

～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～

就「靠背壟道 / 浙江街發展計劃 (CBS-2:KC)」之意見書

～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～～

1/ 【資料不足】
由於委員會在現階段並未公佈各項收購詳情細節，在沒有足夠的資料下，計劃儼如一張空頭支票，本住戶實在無法接受這宗樓宇買賣，也難以同意這次收購計劃。

2/ 【以人為本】
在委員會既有的「以人為本」重建原則下，本住戶認為委員會須確保受影響住戶有住屋權及選擇權，包括確保受影響住戶在重建過程期間及重建後能享有原本的居住生活水平及質素，或原址賠償相同面積的單位及過渡期搬遷及居住費用，而每位受影響住戶均有權否決此次收購或提出收購條件等。

3/【強烈反對補地價】
反對要求未補地價之受影響住戶補地價。按合作社訂定的法定條文，只有住戶主動出售或租賃單位時才需要向政府補地價。

4/【78年入住。自住42年】
本住戶自1978年入住受影響單位至今，一直只作自住用途，所以根本毋須向政府補地價，而這本身也是當年政府為公務員提供的福利。

5/【2015年重本裝修。盼與單位終老一生】
2015年本住戶斥資約八十萬港幣翻新本單位（如有需要，本住戶可提供相關單據），以作更長遠自住之用。因此若要本住戶在此計劃下被迫遷出或出售單位，更要為補地價而額外付出金錢，均是極之不合理的。

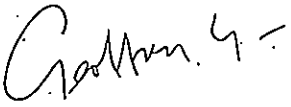
6/【均均真真呎換呎。樓換樓呀 NO！NO！NO！】
反對以樓換樓，只能接受同區呎換呎，或以收購時同區相若質素的樓宇市場樓價格作最基本的金錢賠償。

7/【無縫過渡。無償安排】
確保受影響住戶在重建期間，獲無縫及無償的過渡安排，例如不須額外付費繼續在原址居住。

8/【食碗面，反碗底？】
多年來，港鐵沙中線工程一直為本區帶來種種滋擾——厭煩的噪音、污濁的空氣、飛揚的塵土，還有掘路處處，令人寸步難行；不時改道，我們要兜路遷就。當年住戶們均甘願與港鐵共渡時艱，若在沙中線快將通車之時，委員會以不公平的計劃遷走住戶，令住戶無法得享成果，實在於理不合。

謝謝！
順祝工作愉快，身體健康！

提意見人：YAN CHE HING

簽署： 

日期: 24 JULY 2020

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Re: Urban Renewal Authority (URA) project: Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC) on the cooperative residents
31/07/2020 09:31

From: Annie Liu [redacted]
To: rkwlee@pland.gov.hk, tpbpd@pland.gov.hk, enquire@pland.gov.hk, inquiry@mail1.ura.org.hk
Cc: sdev@devb.gov.hk, devbenq@devb.gov.hk, plbenq@devb.gov.hk, wbenq@devb.gov.hk
FileRef:

4 attachments

20200709_1.jpg 20200726_2.jpg 20200726_3.jpg 20200707_4.jpg

To: Town Planning Board (TPB), Attention: Ms. Bernadette LINN, Chairperson; Mr. Lincoln Huang Ling-hang, Vice Chairman; Mr. Li Kai-Wing, Director of Planning

To: Urban Renewal Authority (URA), Attention: Mr. Chow Chung-kong, Chairman

CC: Development Bureau, Attention: Mr. Michael Wong Wai-lun, Secretary for Development

CC: Civil Service Bureau, Attention: Mr. Patrick Nip Tak-kuen, Secretary for Civil Service

Date: 30 Jul 2020 (revised)

Re: Urban Renewal Authority (URA) project: Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC) on the cooperative residents

Dear Sir,
With regard to TPB's pilot project (CBS-2:KC) for the demolition and reconstruction of civil servant cooperatives next to Lok Man Sun Chuen in To Kwa Wan (TKW) by URA, and the relevant changes application to the Town Planning Board within the plan, I strongly oppose to the action of demolishing the areas as this is a disturbing action and seems depriving the housing benefits of the retired old civil servants and the remaining family members.

The followings are the detrimental effects to existing cooperative residents:
1. Sites to be demolished on the list first: There are plenty of ugly old poorly maintained, non-sanitized buildings in many other streets in the old To Kwa Wan areas that are needed to be reconstructed such as 1 Lok Shan Road which has rats and water dripping broken pipes. Others are Tsut Hei Building, Morning Joy Building, old buildings along Ma Tau Wei Road, Ngan Hon Street, Ma Tau Kok Road, Maidstone Lane. These sites should rather be on the priority of the demolition reconstruction target lists. (Attachment 1)
2. Mental stress: According to the old Chinese saying: let the old people live in harmony.

However, noise pollution from MTR construction and the demolition and reconstruction ideas have been putting mental stress on the cooperative residents.

3. The Rights of cooperatives' civil servants: The demolition of the proposed site is in fact depriving the housing benefits of the cooperatives' civil servants and their families. According to the original circulars, title deeds, the cooperative owners and their descendants can keep on living in the cooperative buildings and have the rights to rebuild the buildings if necessary.

4. Cultural preservation: Maidstone Road, which is a frequent scenic site for many TV drama and movies, has high cultural conservation value. (Attachment 2,3,4)

5. Cost of living: Some existing cooperative family residents have no income source. They cannot afford to live in other more expensive government subsidized housings in which the rental and maintenance costs are higher.

6. Friends, education network: residents will lose existing well-established friends and connection networks. Family members will lose existing convenience and better education networks.

7. Adaptation difficulties: Family members may be depressed. Old residents may be unable to adapt to other areas.

8. Neighborhood security problem: It is estimated that higher urban density will increase noise, air pollution, and security problems after the disappearance of those serene memories.

9. Supply of Private units: The asking market price of private residential units over 1,000 sq ft range from $28,640 - $35,857 /sq ft in urban areas. Rental asking prices range from $36,000/765 sq ft to $60,000/1018 sq ft. However, there is not enough supply of over 1,000 sq ft private residential units to cater for the cooperative residents if they are being pushed to leave their rooted residential units.

10. Future estimated costs on purchase private units: It is estimated that the minimum budget price needed to buy back a private unit of 1,090 sq ft or above in the same neighborhood is $31,217,600. The rental budget for a similar size is estimated to be $432,000/year. Assume one needs to rent a unit for a minimum of 3 years before finding a suitable satisfied unit, the total budget for 3 years rental will be $1,296,000. In addition, assume buying private units, the following additional charges to be estimated as follows: Moving charge: $20,000/each move. Unwanted items discard charge: $20,000. Storage charge: $20000/year. New furniture charge: $40,000. Doctors fee: to be advised. Helpers fee: $60000/year. Stamp duty costs: 350,000. Lawyer fee: $6000. Agents fee: $80,000.

11. Land and building use calculation not transparent: It seems that the expected land and building use value and costs are to be borne by the cooperative owners and families. However, it is unfair that the expected profits or return from increasing the plot ratio after demolition and construction are not to be shared among the cooperative residents.

12. Factors to calculate Land value and Land premium: The Lands Department's computation of the land premium is not transparent since the rules always vary. The Lands Department frequently changes its mechanism to calculate the land value which has led to plenty of disputes among civil servants. Hong Kong annual inflation rate for 2019 was 2.86%; for 2018 was 2.41%; for 2017 was 1.48%; for 2016 was 2.41%.
However, the annual % increase in Land premium may be higher than the inflation rate. It is very unfair that Cooperative owners need to share 2/3 of land use value in premium calculation and they are asked to give up the units they are living in.

13. Survey representation: It is advisable to carry a very comprehensive survey of the wants

of the cooperative residents to avoid giving a misrepresentation statement of the desire of the whole 440 cooperative units. Changing places of residents may cause adaptation and transport difficulties. Some residents may not prefer any change in the existing living conditions. Some younger generations going to schools need to stay in the same living zones. Some residents would like to stay at the same residential site after future renovations are finished. Some residents would like to have sufficient compensation to relocate.

14. Unfair treatment: It should be noted that this redeveloping idea is the wish of the relevant departments to buy the "developing rights" including buildings and land, side streets and the surrounding streets from the existing owners. The original deeds stated that the civil servants and their family descendants could continue to inherit living there. The residents should not be forced to move out of the community if the majority objects to the idea.

The followings are suggested remedial solutions or options:

1). As this demolition plan is initiated from the Town Planning Board and to be implemented by Urban Renewal Authority, the Authority needs to devise a comprehensive compensation plan, properly coordinated to provide a good practical proposal to the cooperative owners and families. It is advisable to introduce a special one-off uniform discount to the Land premium if cooperative owners prefer net monetary compensation. It would be highly appreciated if the Lands Department or the relevant Departments could give a special discount to the Land premium for the old retired civil servants and families if it is necessary to solve the Land premium disputes and civil servants housing benefits etc.

2). Monetary compensation should be sufficient to cover the future accommodation, resettlement expenses (residents/owners may move more than 2 times to rent units) before the final satisfactory settlement.

3). Monetary compensation should be sufficient to cover all relocation expenses and costs.

4). Monetary compensation should be sufficient to cooperative owners for the forfeit or the deprivation of rights to rebuild the cooperative in the same land later.

5). It would be kind of the Authority to provide sufficient monetary compensation to the cooperative owners to purchase private residential units if the owners prefer not to be worried about the land premium debt in the future.

6). Sufficient information and advance time: As this can be considered as a land deal (not buying and selling vegetables), residents should be given transparent information on land use calculation, land premium calculation (prefer uniform setting on each block), and be given enough time (accurate information or estimation given 1 year in advance) for consideration.

7). Heritage preservation: After demolition, cooperative owners may be allowed to resettle with units of similar original size or equivalent units of total original size in the reconstructed site so that residents can keep their cultural ties to the community.

8). Resettlement option at the reconstructed original site: This arrangement can minimize the disputes in the land premium debt as it is the same site of the same size or equivalent original size, unit exchange for unit. Owners can be allowed to select and resettle with new units of equivalent original size or units equivalent to original size free of land premium debt. As an illustration, an equivalent size of 1,090 sq ft = 1,090 sq ft (1 unit); or 545 sq ft (2 units) etc.

As cooperative owners are giving up their living and reconstruction rights, they should be

given the privilege to be entitled to a free new equivalent size unit per previous unit at the reconstructed original site. The new resettled housing units are private housing units and owners do not need to worry about land premium.

9). Cooperative development idea: Some retired civil servants are professionals. To enhance the redevelopment process, Cooperative residents should be given a chance to present developing ideas on the new resettled housing units.

10) Redevelopment rights: The Authority is not just buying the buildings but also sharing the development rights of the side streets and main street surrounding the existing buildings. If the developing rights are shared among Authorities and the Cooperative owner and residents, cooperative owners may be treated fairly to share the future return on investment, profit % sharing etc.

11). Car parking spaces, indoor size efficiency: In view of the increase in plot ratio, the number of car parking spaces should be quadruple or even septuple. The indoor size efficiency should be designed to be as high as possible. For example, the building shape should be square shape rather than triangular shape for better feng shui point of view.

12). Acquirer's responsibility: It should be nice that the acquirer pays for the land premium debts for the cooperative owners because the developer wants to capture the land to increase its plot ratio for a future positive return on investment.

13). Historical satisfactory acquisition compensation: The Pre-Belcher's previous Western District civil servants' cooperative's demolition reconstruction has served as a successful example of a well-structured acquisition plan. The property developer Sun Hung Kai gave a free new Belcher's private unit of about the same previous size to each previous cooperative unit owner in the reconstructed original site. In addition, each unit owner received a HKD3 million compensation.

In summary, the Kau Pui Lung Road/ Chi Kiang Street Development Scheme should be abandoned. Otherwise, net compensation amount (already after deducting land premium) for each unit should not be less than $26,000 per square feet based on the average original size of 1,090 square feet as an indication. In view of potential costs, mental suffering, and expenses to incur, the estimated total costs to acquire an equivalent private residential unit may not be less than $39,084,130 per unit as per 30 July 2010.

Best regards,

Annie Liu
107 Maidstone Road,
[redacted]

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URA - Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
31/07/2020 03:33

From: [redacted]
To: tpbpd <tpbpd@pland.gov.hk>
FileRef:

URA - Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC)
Location 59-77, 99-117, 123-133 Maidstone Road (odd nos.), 82-128 Maidstone Road (even nos.), 153-175, 181-189 Kau Pui Lung Road (odd nos.), 1-3, 7-9 Kiang Su Street (odd nos.), 4-14 Kiang Su Street (even nos.), and 52-58, 52A-58A Chi Kiang Street (even nos.)
Total GFA : About 134,495 sq.m.
Residential GFA : About 122,263 sq.m. (about 45,200 sq.m. for public housing)
Non-Domestic GFA : About 12,232 sq.m.
Not less than 2,150 sq.m. GFA will be reserved for GIC facilities to meet the community needs.
Not less than 400 sq.m. of open space for public use at reasonable hours will be provided.

Dear TPB Members,

Strong objections that GIC and OS will be limited to 30% of the non residential GFA of the development.

I would remind members that the shortfall in both facilities in the district was discussed at the Ma Tau Kok OZP meeting 3 June 2020.

Provision of Open Space and Major Government, Institution and Community Facilities in Ma Tau Kok OZP Area
Community Care Services (CCS) facilities (including **Day Care Centres/Unit for the Elderly** and Integrated Home Care Services) - 17.2 subsidised places per 1,000 elderly persons aged 65 or above
Requirement - 742
Existing Provision - 165
Planned Provision - 169
Shortfall – 573 (minus 77%)

The lack of elderly care facilities in the district is compounded by the fact that nearby Lok Sing Tong, on the 23 approved OZP, **was rezoned under false pretences.**

The increase in height to 60mPD was justified as it would provide **Welfare Facilities** - Nursing Home and Care and **Attention Home for the Elderly with about 400 beds** (1/F to 6/F)
- Day Care Centre for the Elderly
- Early Education and Training Centre

- Primary Health Care Centre
- Ethnic Minority Supporting Service Centre

It was subsequently announced that it will now be used for transitional housing for five years at least, but could be indefinitely.

The response of PlanD to members questions with regard to this issue is that going forward private developers will be obliged under lease conditions to provide GIC facilities in their new developments. This is putting the onus on the private sector to provide services that are the responsibility of the government. There is no guarantee with regard to the time line for private developments. A recent land sale in the district fell through partially because the private sector was not happy with such lease conditions.

Local Open Space 10 ha per 100,000 persons
Requirement – 13.29ha
Existing Provision – 4.97ha (63% shortfall)
Planned Provision – 6.68ha
Shortfall – -6.61 ha (50% shortfall)

400sqmts will make little difference.

Members cannot continue to ignore the shortfall of LOS in this district. Even when some is provided it is usually of a passive nature, like the OS in front of the new MTR station. This is nothing more than some seating, trees and paving. The active recreational needs of the community are being ignored. This development will have 2,500 homes so there could eventually be as many as 10,000 residents. It should have its own basketball court, elderly exercise area and a children's playground. No information is provided with regard to the quality and quantity of the Private OS in the development and interface, if any, with the POS.

I would remind members that a 2018 rezoning deprived the community of GIC intended for recreational use at the junction of Ko Shan Road and Shansi Street nearby.

The administration in response to community protests has promised to listen to the people and address long standing social needs. The shortfall in GIC facilities, particularly for the elderly, is of major concern so we would expect it to be addressed via proposed public development in the district.

The current health crisis has underlined the importance of having local open space in proximity to residential areas with large populations living in small homes in order to provide some space for exercise and to defuse social pressures.

URA is essentially part of the government, funded by the community, so it should be on the front line with regard to compliance with policy decisions.

Members must question why shortfalls in community services are not being resolved via the many URA developments in the district. URA instead of providing solutions is bringing in more residents and putting a further burden on existing services.

Mary Mulvihill

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** CBS-2:KC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

見附件.

「提意見人」姓名／名稱 Name of person/company making this comment 李瑞光

簽署 Signature _____ 日期 Date 29/7/2020

RECEIVED
31 JUL 2020
Town Planning Board

(這部分不會公開予公眾查閱)

(This part will not be made available for public inspection)

「提意見人」詳細資料

Particulars of "Commenter"

通訊地址 Postal Address [redacted]

電話號碼 Tel No. _____

傳真號碼 Fax No. _____

電郵地址 E-mail address [redacted]

個人資料的聲明 Statement on Personal Data

1. The personal data submitted to the Board in this comment will be used by the Secretary of the Board and Government departments for the following purpose:
   (a) the processing of this application which includes making available the name of the "commenter" for public inspection when making available this comment for public inspection; and
   (b) facilitating communication between the "commenter" and the Secretary of the Board/Government departments

   in accordance with the provisions of the Town Planning Ordinance and the relevant Town Planning Board Guidelines.

   委員會就這份意見所收到的個人資料會交給委員會秘書及政府部門，以根據《城市規劃條例》及相關的城市規劃委員會規劃指引的規定作以下用途：
   (a) 處理這宗申請，包括公布這份意見供公眾查閱，同時公布「提意見人」的姓名供公眾查閱；以及
   (b) 方便「提意見人」與委員會秘書及政府部門之間進行聯絡。

2. The personal data provided by the "commenter" in this comment may also be disclosed to other persons for the purposes mentioned in paragraph 1 above.
   「提意見人」就這份意見提供的個人資料，或亦會向其他人士披露，以作上述第 1 段提及的用途。

3. A "commenter" has a right of access and correction with respect to his/her personal data as provided under the Personal Data (Privacy) Ordinance (Cap. 486). Request for personal data access and correction should be addressed to the Secretary of the Board at 15/F., North Point Government Offices, 333 Java Road, North Point, Hong Kong.
   根據《個人資料（私穩）條例》（第 486 章）的規定，「提意見人」有權查閱及更正其個人資料。如欲查閱及更正個人資料，應向委員會秘書提出有關要求，其地址爲香港北角渣華道 333 號北角政府合署 15 樓。

我們反對這試點計劃。

看過城規會公開的意見書和市建局的「第二階段社會影響評估」(評估報告書)，我們仍然反對這試點計劃。

1. 反對計劃的人數普遍多了

1.1 評估報告書 (第 5 頁) 說，成功調查的住戶總數是 428 戶，對此計劃，有 207 個住戶表示強烈支持或支持，55 個住戶表示強烈反對或反對，餘下的 114 個住戶表示意見或沒有回應。這是在 5 月 22 日首天突然奇來的凍結人口調查登記、電話問卷調查和限於 7 天內呈交意見問卷所收集到的數據，如市建局所說是初步意見。由於發報計劃時沒有簡介會和交流提問，街坊之間的討論和理解多了，反對計劃的人數普遍多了，這可從 7 月 6 日和 7 日的簡介會中的氣氛和提問客觀地反映出來。有理由地相信現時反對的人多了。

2. 對長者的衝擊影響

2.1 評估報告書 (第 7、8、23 頁) 指出，受影響區內 65 歲或以上的長者比例較高，長者的百分比達 30%是高於全港 16%的水平。若包括 45 至 64 歲的人口群組，中老年人口是佔區內高比例。

2.2 這群年長的居民長久以來安居於斯，適應和習慣了這區的生活模式細節，經年建立的區內人際網絡，是精神和起居的支柱，區內的相宜消費物價和長年的醫療網絡 (公私形診所)，對這收入能力有限的群組，帶來基本生活的平衡。若被遷離此區，重新適應新環境，談何容易，若有認知障礙者尤甚，並非評估報告書中輕描淡寫的建議跟進方式可以解決問題。大群的低收入長者若被迫遷到新環境，形同是被放逐，是創傷性的打擊。

2.3 從城規會的公開意見書中見到，有居住在高層的長者說，沒有升降機是有不便，多年的上落樓梯運動已習慣了，長年生活在這裡，整體感覺是良好的，樓宇結構良好，沒有拆卸和遷徙的必要，也不想承受因轉變帶來的人際網絡和經濟衝擊。

3. 對幾代同堂的衝擊影響

3.1 評估報告書 (第 8 頁) 指出，6 人或以上的住戶在此區約佔 12%，高於全港的 3%。有 64 個住戶 (約 15%) 為三代同堂的家庭居於同住宅單位，更有一個住戶為四代同堂。

3.2 公務員樓宇單位無花巧設計，間隔是盡用面積空間的實用設計，房間四正，現時新式樓宇間隔無以比美。這些實用設計容許幾代同堂於一住宅單位，在高租金和高樓價的物業市場情況下，是迫不得以，藉此長幼相扶，也為政府面對房屋供求起點舒緩壓力。

3.3 本區位於優良校網內，大部份學校是在步行範圍內，上學時毋須用上交通工具和繳付任何交通費用，節省開支。遷離本區對學生肯定帶來不便，也會影響小學及幼稚園學生的校網，打亂了父母為子女的教育計劃。

3.4 幾代同堂除了經濟上互相扶持外，家庭倫理上特別是有長期病患的長者，得到家人每日的悉心照顧，長者的心理質素，比住在安老院鬱鬱寡歡理想得多。

3.5 這計劃不單止把相當數目的幾代同堂的家庭打散，帶來的衝擊影響是家庭的生存能力和生活質素、長者的精神打擊、長者的家庭依靠、長者的住宿問題，因此增加政府的支援壓力。

3.6 這種拆散家庭的迫遷，除了帶來家庭和社會衝擊，也帶來短時間的物業市場的衝擊，市場因應突然的需求大增而引致物業價格上漲，產生不良的物業市場壓力。

4. 公務員房屋福利

4.1 評估報告書 (第 11 頁) 指出 85% 共 363 戶居於斯已有 21 至 50 年以上，若被迫遷，(第 13、14 頁) 超過一半以上的住戶意願在本區繼續居住，單位大小與現有相若甚至較大 (相信是幾代同堂的家庭) 的較新單位。

4.2 今次的試點計劃，牽涉附帶房屋福利的公務員樓宇，有別於一般私樓收購。遺憾地市建局顯然沒有與公務員事務局溝通，如何處理受影響的公務員，包括在職的、退休的以及遺屬。計劃書中沒有安排原址安置方案的選擇，只是不斷重複「樓換樓」計劃，更加沒有在過度期提供無縫無償的住屋安排。不假思索地僅沿用既定的、推展重建項目的形式推行這個試點計劃，是套路模式的做法，不是以新的思維去處理新的試點計劃，為未來的類似收購起良好的示範

作用。另一方面，政府作為全港最大的僱主，因市建局安排的疏漏，使員工房屋福利受損和安排不周，大僱主政府也蒙上了污點。

4.3 此區的公務員樓宇大致分未散社 (舊契) 和已經散了社 (分契)，舊契上顯示一次性優惠價批地與合作社建屋，沒有欠補地價條文；另一方面，分契卻附加了須要補地價條文。

4.4 街坊們普遍地理解舊契上寫明是一次性以優惠價批地給合作社建屋，是當時政府的公務員房屋政策，並無說欠了多少地價，日後須要補回。這好像普遍的市場的折扣買賣，不會日後向顧客取回優惠金額。舊契上有按揭和轉讓有關條文，是由時任港督亦即現時特首在行政上的演繹和應用，遺憾地在分契時附加了市場也不會做的收回已出的折扣條文，反映出兩代政府既食言且搬石頭打砸自己的腳。今次是市建局作主導收購，縱然改契上有補地價條文，責不在安居於斯的居民，若政府說成以公帑作出地價補貼，是不盡不實的混淆視聽。

4.5 今次是市建局主導計劃，市建局是主動的買家。現在是被迫遷出的業主要繳補地價出讓其單位物業，卻不是由主動收購的市建局承擔補地價，變相是業主補地價成全政府(市建局)收樓和獲取非常優質的地段地權去發展。市建局說成在賠償金額幫手扣減補地價手續，是有誤導概念和混淆視聽。換句話說，不是業主的意圖出售，責不在安居於斯的居民。按市場交易原則道理，主動買方要承擔和補償賣方的一切損失。受影響居民是被剝削公務員房屋福利，但沒有有關的福利賠償，更無給與提出收購價和條件的權利和機會，於理不合。評估報告書 (第 14 頁，第 5.5 段)指出，由於該計劃並非由合作社社員 / 前社員主導的重建項目，將按照「現有用途土地價值」計算土地補價。在 7 月 6 日和 7 日的簡介會中，在回應提問為何市建局主導計劃要居民補地價時，才說出改為這計算土地補價，遺憾地未能回應街坊提問的核心，街坊們得不到切題回應，很是氣憤。

5 原址原大安置

5.1 上文 4.1 說過，85% 共 363 戶安居於本區已有 21 至 50 年以上，若被迫遷，超過一半以上的住戶意願在本區繼續居住，單位大小與現有相若甚至較大 (相信是幾代同堂的家庭) 的較新單位。評估報告書只是輕輕說出，但沒有就這些收集回來的數據建議可行的以人為本的原址安置方案。

5.2 在簡介會中，有街坊提出原址原大安置的方案說法。由於大部分本區街坊居民是極不願意離開這個生活了幾十年有街坊感情的社區，提議的方案給予街坊居民多一個選擇。既然是試點計劃，應該以新思維新方法去突破處理。重建

首要重建本區居民的家園，讓原居民能在原址原大地方居住，這是居民對"重建"的概念。所以如果政府真的有誠意推行這個試點重建計劃，要優先認真照顧原有居民的權益，最大程度能維持及保障原來的生活方式不變，這才符合"重建"的真正意義。如果強迫大家離開本址，改建發展為另類的房屋給外來人士，只不過是"迫遷"。街坊建議在計劃藍圖中的公營房屋部分，應改為起回兩座面積原大的單位樓宇，安置原居民，並且在過度期提供無縫無償的暫住安排，實現「以人為先」、「地區為本」。席間響起熱烈的附和掌聲。

5.3 根據以往資料，市建局從未為影響居民起過樓房安置，今次計劃也是欠奉。評估報告書 (第 29 頁的 12.17 段) 提到，"視乎住戶的實際需要，如受影響住戶的住戶人數較多而希望全新單位與現時單位面積相約，市建局會進一步研究「樓換樓」選擇的安排，盡可能回應住戶遷置的需要"。市建局若能以新思維："如受影響住戶較多希望全新單位與現時單位面積相約，市建局會進一步研究「原址原大安置方案」選擇的安排，盡可能回應住戶遷置的需要"，將會是好的正確發展方向。

6 賠償方面

6.1 今次的建議收購有別於以往的私人樓宇，一來沒有地舖，二來是公務員的福利房屋。但市建局不假思索地按照市建局沿用的推展項目方式，重建合作社地段，是因循和粗疏地推行計劃。

6.2 市建局樓價的賠償是沿用多年的計算，社會的人口和市場已是變化了不少，是脫了節。加上本計劃房屋福利問題和補地價的爭議，在過度期並無提供無縫無償的暫住安排，不透明和不明朗因素使受影響居民無所適從和無安全感，在職和退休政府員工有被遺棄的感覺。

6.3 若計劃得到通行許可，在固定的時間框架下，市建局沿用的處理是單向的出價，賣方沒有出條件和出價的權利和機會，有違市場規則，加上引用土地收回條例，抗拒和反感更大。

7 規劃的衝擊影響

7.1 城規會的公開意見書反映出普遍是反對的聲音較多，當中不乏有影響區外的人士。支持的，僅說有五十年樓齡、沒有升降機、會倒塌、可增加樓宇供應量等等；相反那些有深度理據看法的反對者顯得有份量和實在。

7.2 在簡介會中，解說者在介紹計劃和解答提問時也承認本區的公務員樓宇狀況是良好的，計劃是因應行政長官於 2018 及 2019 年《施政報告》中，宣佈邀請市建局物色一至兩個適合作高密度發展的公務員建屋合作社（合作社）地段作為重建試點。

7.3 眾多意見書中，包括區內外人士都指出，試點以外的土瓜灣區有許多樓宇狀況非常差的，為何不積極重建；難得五十年樓齡的樓宇保持新鮮面貌和狀況良好的公務員樓，無理由要把它拆丟。有意見更質疑為何同一地段的落山道至美善同里的一段公務員樓宇不納入重建範圍，該段的樓宇外貌和狀況反而不及試點，環境灰暗，行人道衛生狀況不佳。原因怕且是有兩個新地鐵出入口，有可觀利潤發展。更有諷刺性的質疑，是否重建後的高樓，嚴重影響長江實業李嘉誠名下的半山一號，不可作為。

7.4 居民普遍認同試點一帶的公務員樓是靠山而建的高厦(如樂民新村、半山一號)前的景觀和空氣流通的呼吸地帶，是繁忙馬頭圍道後靜中帶旺的緩衝內街小區，延伸至附近的高山公園和劇場，是一個有氣息的健康地帶。

7.5 事實上有不少在試點鄰近屋宇的居民就規劃帶來的衝擊影響，有不同層面各方面的反對，我們也十分認同，免長贅論，列點如下：

(1) 受影響家庭日後要承擔沉重經濟負擔，對低收入者和長者尤甚，生活質素嚴重受損；
(2) 破壞有特式、有文化和藝術氣息的良好樓宇和街道，是電影不時取景勝地；
(3) 規劃擾亂原來的街道通道，窒礙疏導交通作用；
(4) 多幢三十多層的高厦，製造屏風樓、熱島效應，有礙觀瞻和阻礙其他現有樓宇的景觀；
(5) 規劃會增加大量人口，增加交通擠迫，人車嘈雜，空氣污濁；
(6) 附近的所謂商場如翔龍灣，偉恆昌新村，陽光廣場，嘉景花園等不受歡迎，只有帶來滋擾性的遊客，產生各種民生上的矛盾；計劃中的短短的一段由浙江街至落山道的所謂步行街是多此一舉，摧毀寧靜內街，製造滋擾，是無必要的，是計劃的包裝；
(7) 人口的變化帶來區內物價和物業價的不健康上漲；
(8) 不即時善用兩個新地鐵出入口，便利區內居民出入，解除幾十年來居民忍受交通擠塞之苦；
(9) 過去十年的地鐵工程帶來居民和街舖生意滋擾，還未享受地鐵之便，又要可能面對另外十年過外的翻天覆地的大建築地盤工程，為何兩個新地鐵出入口變了開向工程地盤，是規劃的失誤；

(10) 除了拆卸樓宇外，為了建造所謂的地下街，工程要深挖，產生噪音和沙塵，觸及地下各舊設施，蛇蟲鼠蟻四竄，影響鄰近屋宇的環境衛生。

8 街坊的普遍訴求

(1) 安居於斯的居民本無意出售，因市建局主動收購，應免補地價；
(2) 有原址安置的選擇和安排；
(3) 有無縫和無償的過渡安排，例如原居所免租暫住；
(4) 有被剝削房屋福利的賠償；
(5) 以現實鄰近相若樓宇因素的市場樓價作估價賠償；
(6) 有提出收購價和條件的權利和機會，經協商後，城規會和有關當局才考慮批准計劃落實。

9 反對計劃

9.1 基於上述不良影響和沒有無實質賠償的資料可供考慮，簡介會主要是重複介紹計劃，未能回應提問的核心，在無可選擇情況下，我們唯一的選擇回應，是反對這計劃。

9.2 彼此都是公務員，明白落實和推行政策和計劃的重要性和難度，希望計劃的主管當局能安排交流會，坦誠交流意見，增進了解。

P2

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 **The application no. to which the comment relates** A/KC/B-2

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

Please refer to P3

「提意見人」姓名／名稱 Name of person/company making this comment 温惠芳

簽署 Signature [signature] 日期 Date 26 July 2020

RECEIVED
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Town Planning Board

790

以下是本人出席 2020 年 7 月 6 日至 7 日市建局簡報會後提出意見。

本人反對 CBf2:KC 市建局靠背壟道/浙江街發展計劃，原因如下:

1. CBf2 KC 計劃中樓換樓方案，未有安排收樓至新居入伙過渡期之住屋賠償及安置，居民要自己找地方居住，尤其長者，退休多年不能負擔昂貴租金，身心靈受損。樓換樓的單位也未保証與現居同等面積

2. CBf2 KC 中的啟德安置房屋方案，要 2025 年或之後才入伙，也未有安排過渡期的住屋及安置問題，其單位面積也只有 400 至 500 尺，比現居單位少一半。此方案是不對等,不公平和不合理。

3. 在 CBf2 KC 計劃內，業主是非自願，被迫出售單位給市建局，補地價金額應全數由買家負責。現計劃建議被迫的業主負責是不公平，不合理。非常反對。

4. CBf2 KC 計劃未能保証業主收到的總賠償金額可買到同區同面積的房屋，不公平，不合理。

CBf2 KC 發展計劃非令居民得享安居樂業，所以本人是反對的。

本人見議

- 重新檢討，重新提出原址原大方案。 即賠償原址同等面積單位另加過渡期住屋賠償，新屋裝修補償及市建負責全部補地價金額。

-否則,擱置 CB-2 KC 計劃。令區內维持現有狀態。

致 城市規劃委員會

[redacted]

溫惠芳

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反對重建靠背壟道 / 浙江街發展計劃
21/07/2020 14:26

From: lam，meiseemazy[redacted]
To: "tpbpd@pland.gov.hk" <tpbpd@pland.gov.hk>
Cc: "urunit@bevb.gov.hk" <urunit@bevb.gov.hk>
FileRef:

反對重建靠背壟道 / 浙江街發展計劃

1. 我林美詩是美善同道90號[redacted]的無奈受害人-業主
2. 家園被搶
3. 公務員樓建築仍好, 不是危樓, 為何因是政府的利益, 所以要重建, 但重建後, 因不是原地安置, 重建後如何美好, 如何方便, 也與我們無關, 我們也享受不到.
4. 公務員樓是政府给公務員的福利, 保障的証明, 叫公務員安心居住, 現福利和保障被剝奪.
5. 本人是N代, 入住公務員樓, 是真金百銀, 以當時樓價買入, 没有任何優待, 唐樓也差不多價錢, 但仍購入, 因想為家人築一個環境好, 舒適的家園, 因念到會在此終老, 所以買[redacted], 也有天井, 一直都滿意.
6. 但重建真是晴天霹雳, 令老人家徬徨
7. 因一心想在此居所终老, 所以從無想到有朝一日要補地價, 公務員樓和其他唐樓不同, 因賣時要補地價, 所以以同一地區內收回單位面積相若的七年樓齡單位來計算是不適合的, 市建局未收過公務員樓, 其他物業不用補地價, 所有補償全歸業主, 但公務員樓就要補地價, 地價總是海鮮價, 而且不單是可以只收到的賠償便直接買回一間單位居住.
8. 红磡"昇御門"前是公務員樓, 是換回一新樓單位, 加上三百萬作未有新樓單位時的租金費用, 買賣雙方都滿意.
9. 今次重建公務員樓是試點, 是政府主動提出收購, 而受影響是賣方, 所以買方應承擔補地價問題, 而非將責任轉嫁到本來無意出售的居民家上. 今次市區重建土瓜灣靠背壟道/浙江街, 會重建

更改用途, 會建地下城, 會作住宅, 商業等發展, 已有2個地鐵出口, 賣家的地段是黃金地段, 所以不應以其他七年樓齡為基礎去壓價, 去剝削業主應有權益.

10. 只希望體諒賣家, 非自願賣樓, 仍要補地價, 賠償不是要合理, 而是要比較好, 比較吸引, 安置要合理, 否則, 我為何要將終老的居所賣去, 只因你們以美麗重建的藉口, 來搶公務員的家園
11. 家園大的可能比較會歡迎重建, 獲得賠償較多, 可考慮再買的單位也較多.
12. 我家建築面積有700呎, 實用面積只有557呎, 天井又不包在內. 本人和先生, 及2個兒子, 一起居住, 本是很舒適夠住, 如談判後, 只賠償實用面積, 賠償只益市建局, 漠視賣家, 賠償補地價後, 不足買傲雲峰等700呎建築面積的單位, 而現在700呎單位, 又是比唐樓細, 根本一家4人居住, 會比較迫.
13. 如我樓換樓, 為何只可換啓德的綠置居, 為何不能在其他居屋預留單位, 公屋人士換樓, 可選地區, 居屋, 綠置居或夾屋, 為何我們無得選擇?
14. 如我換居屋, 我2個兒子, 已是成人, 他們2人可否各安置一公屋, 或我購買居屋, 兒子2人, 各得購買居屋的資格, 一同各購買居屋
15. 我要求是合理, 我家4人住得方便, 舒適, 不是夫婦2人, 可隨意找居所, 所以要求安置他們, 這是母親的請求
16. 要求原址原大安置
17. 買賣是要起碼雙方滿意及願意, 不應只是壓榨他人, 還說不好意思, 幫不到你
18. 我是忠心為政府, 為人民服務了28年的退休公務員, 沒有房屋津貼, 只是可享受購買公務員樓的福利, 希望別有令我痛心的情況
19. 請考慮我們無奈的情況, 作出買賣雙方都滿意的方案
20. 我現在即時提出要求, 希望2年後, 別以馬頭涌公務員樓為相若作藉口, 應以居住人口等問題來安置, 賠償或商討, 希望以個別家庭情況, 再作考慮和安排, 希望政府政策可順利執行, 而作為小市民的我們也可安居樂業

從 Windows 10 的郵件傳送

市區重建局
URBAN RENEWAL AUTHORITY

本函檔號：PDD/CBS-2:KC/20072078

[redacted])
何國榮 先生

何先生：

市區重建局靠背壟道／浙江街發展計劃
(CBS-2:KC)

本局收悉閣下 2020 年 7 月 15 日給市區重建局的信件，內容是有關靠背壟道／浙江街發展計劃(CBS-2:KC) ("該計劃")。

由於該計劃是根據《市區重建局條例》第 25 條，以發展計劃形式進行，所以有關該計劃的意見及反對，均由城市規劃委員會（城規會）考慮。本局職員於 2020 年 7 月 22 日透過電話聯絡，得悉閣下希望市建局將閣下的信件轉交城規會跟進。

本局現在以副本抄送形式，把信件轉交城規會跟進。日後有關該計劃的反對或其他意見，請直接聯絡城規會秘書處（地址: 香港北角渣華道 333 號北角政府合署 15 樓）。

市區重建局
規劃及設計總經理
關以輝

2020 年 7 月 23 日

RECEIVED
31 JUL 2020
Town Planning Board

附件
副本抄送：城市規劃委員會（連附件）

81-2

家樂樓 (美善同道) 業主立案法團(Maidstone Road)
The Incorporated Owners of the The Galaxy Mansion (Maidstone Road)

有關市建局發展靠背壟道浙江街發展計劃(CBS-2:KC)

致市建局收購及遷置發展主管

我們認同本計劃是一個周全的建議，只可惜以我們的年齡將不能等到和享受多年後建成的美好生活環境。只希望市建局不要忘記我們讓出最優質、最有發展潛力的地盤給市建局進行發展計劃。我們要求市建局和我們分享從地積比率增長 7.5 倍所得到的金錢和利益後，應該拿出一部份替我們補交所欠政府的 2/3 地價。此外政府亦從計劃中獲得樓面面積擴大後的買賣印花稅和差餉收入的

＂金錢利益＂與及＂政治紅利＂例如：

1.增加公／私房屋供應
2.增加社區設施
3.改善交通／行人通道
4.美化地區環境
5.增加泊車位
6.興建地下商場
7.連接落山道與江蘇街地鐵出口

市建局不應以＂一貫沿用的＂市區重建條例（第 563 章）收購合作社／公務員業主之单位，因為不同的地區／地段有不同的發展條件，例如半山區、舊屋區和市區便有很大的分別，重建後所得利益差別也很大。

就 7 月 7 日晚的簡介會中有人建議＂先安置後發展＂的方式重建亦不失為另外的一個好建議。

家樂樓業主立案法團主席何國榮謹上

地址：[redacted]
電話：[redacted]

2020 年 7 月 15 日

致城市規劃委員會秘書：

本人反對市區重建局開展靠背壟道/浙江街發展計劃(CBS-2:KC)，意見如下：

1 規劃：

現時公務員樓宇羣是區內特色，是該年代樓宇的代表，雖經數十年但各社盡心維修保養，普遍質素良好。很多電影電視製作公司亦喜歡以這建築羣為背景，足見各界對這些樓宇的欣賞及肯定。拆除這些樓宇，取而代之是人工化規劃的建築物，景觀廊，興建廣場/步行街，做園景裝置，商業及零售活動。用美化市容做掩飾，將美好的破壞，代之是人工化的設計，本末倒置。

興建地下購物街/廣場/步行街，連鎖店/品牌商店進駐，與其他地區一式一樣，連接地鐵站有地利，除了讓市建局賺大筆，亦只讓香港多一個倒模社區，失去特式。

新規劃提供休憩空間，於合理時間給公眾使用，此舉限制居民合理使用與現時居民自由使用天壤之別。

2 房屋及樓宇狀況：

數十年前各社員群策群力合力建成合作社，除了地價要一次付款，建築費向銀行貸款，之後分 20 年從月薪扣除償還。各社員肩負各職，由申請土地、興建樓宇、監督進度，最終建成合作社入住。合作社之後運作、日常管理保養、安排及監督數年一度大維修，全是各社員義務付出。雖然沒有升降機設備，但現今科技進步，有各樣生活新產品及服務面世，可以解決了設備不足的問題。各社員盡心盡力，所以合作社雖經歷數十載仍然質數良好，全是各社員共同努力的心血成績。

今次計劃是跟據市區重建局公佈，沿用該局收購，補償，安置等做法，但我等樓宇質素及保養維護，豈可與失修舊區混為一談。

3 補地價：

公務員樓宇，是真金白銀付出，亦是公務員員工福利。幾十年後今天仍然是居住用途，補地價從前是數十萬元，現時隣近地鐵站，地價大幅上升，最新補地價已要六百多萬元，非常不公平。

今次重建不是居民提出，所以沒有理由要合作社社員向政府補 2/3 地價以撤銷地契的轉讓限制及出售物業業權予市建局；如最後市建局引用土地收回條例，社員被強行收購財產及逼遷，還要賠上大筆地價，何等荒謬。

4 鐵路交通：

六十年代附近非常荒蕪，生活及交通不太便利，公務員合作社社員正是開荒牛。後來逐漸發展形成小社區。最後把土瓜灣站放在公務員合作社旁，引來市建局覬覦此地，要趕走原居民。

公務員合作社鄰近土瓜灣站，建築鐵路及土瓜灣站期間承受封閉道路、交通改路、車站搬遷、樓宇沉降、空氣污染、噪音等等種種不便，臨近開通鐵路便要被逼遷。

5 拆散家庭：

現時居住的合作社單位面積寬敞，可與子女兒孫同住。補償的金額如要扣除 2/3 地價給政府，只夠購買一個現時面積一半或三分一的單位，未能與子孫同住。原本可以一家樂也融融，最後只能兩老互相扶持。遇上緊急事情或身體不適，更不能獲得同住子女即時支援。

6 社區網絡：

大部分社員已在此處居住數十年，交通、起居習慣、生活模式、購買餸菜及日常必需品、睇醫生及醫療需要等等已有固定模式，如遷往其他地區，要重建社區網絡談何容易，社員適應會有困難，對有腦退化的朋友尤其混亂。

7 <u>沉重開支：</u>

各社由社員義務管理，所以每月每户管理費只是數百元，但現在大廈管理費普遍是以面積計算，將來這支出比現時倍增，對長俸不多的退休公務員肯定是沉重負擔。

8 <u>街坊鄰里：</u>

合作社的居民大多已在此處居住數十年，附近聚居多是公務員及其兒孫，環境不複雜，治安良好，鄰里街坊大多認識而關係融洽，重建搬遷令鄰里間沒了照應。

9 <u>市建局：</u>

市建局宗旨是以人為先，透過進行市區更新，改善舊區居民生活環境，但這計劃的收購價要於 2022 年後才公佈，其他賠償，樓換樓等方案沒有清楚告知受影響住户，卻要社員做出被收購的決定。現時如社員作出出售物業業權予市建局後，之後家庭情況有改變、計算面積方法七除八扣、導致賠償額低等等，到時亦不能撤回買賣，對社員極不公平。

基於以上種種原因，強烈要求考慮以下意見：

1. 要求原區安置受影響的居民；
2. 要以樓換樓，以呎換呎；
3. 在原區原大安置居民期間，要有無縫安排，及提供租金津貼給予居民；
4. 要以現實相若樓宇因素的市場樓價作估價賠償。

(C.W. IP)

2020 年 7 月 23 日

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URA project:Kau Pui Lung Road/Chi Kiang Street Development scheme(CBS-2:KC) on the cooperative residents
31/07/2020 18:09

From: Jennifer Liu [redacted]

To: "rkwlee@pland.gov.hk" <rkwlee@pland.gov.hk>, "tpbpd@pland.gov.hk" <tpbpd@pland.gov.hk>, "enquire@pland.gov.hk" <enquire@pland.gov.hk>

Cc: "sdev@devb.gov.hk" <sdev@devb.gov.hk>, "devbeng@devb.gov.hk" <devbeng@devb.gov.hk>, "plbenq@devb.gov.hk" <plbenq@devb.gov.hk>, "wbenq@devb.gov.hk" <wbenq@devb.gov.hk>, "scsoffice@csb.gov.hk" <scsoffice@csb.gov.hk>, "csbcomp@csb.gov.hk" <csbcomp@csb.gov.hk>

FileRef:

Date: 30 July 2020

Dear Sir Madam,

Re: Urban Renewal Authority (URA) project: Kau Pui Lung Road/ Chi Kiang Street Development Scheme (CBS-2:KC) on the cooperative residents

The TPB has announced the launch of a pilot project (CBS-2:KC) for the reconstruction of civil servant cooperatives next to Lok Man Sun Chuen in To Kwa Wan (TKW) by Urban Renewal Authority (URA).

Many residents felt a sense of helplessness towards the URA redevelopment action recently. While recalling the historical development of the cooperatives, the residents at that time had been suffering from inconvenience to cooperate with the government to share with the difficulties regarding the startup development of the community. As the community facilities gradually improve after 40+ years, the government authorities want to abandon the pioneer community residents and want to drag the residents away from the convenience city community. It seems that it does not conform with the old saying: to suffer together and to prosper together. In this respect, the residents would like to demand for reasonable handling and compensation in the discussion of moving and the land premium arrangements.

In the late 1950s, while the government granted the land to build the cooperatives, the surrounding land was a piece of barren ground. During the 1960s, the HK Housing Society developed the Lok Man Sun Chuen, the relevant government department split the rocks on the hillside behind the cooperative residents' sites. Residents were compelled to live in sand, dirt, and dust during that period. Facing with the growing population after Lok Man Sun Chuen in operation in the 1970s, cooperative residents were constantly confronted with the dilemma of insufficient community and transportation facilities. In the 1960s, the Government had designed a planning blueprint to build the MTR passing through the TKW area so as to improve the traffic jam to the cross harbour tunnel which always caused traffic jam in Chatham Road North area.

The sad thing is that lot of residents have been expecting this but in vain. Some older pioneer cooperative residents have died without seeing the dream come true, waiting for 40+ years with regret. Since 2000s, the MTR projects finally started officially. Since then, the cooperative residents have been suffering from sand, dirt, and dust in their daily lives again. In addition, due to underground digging and construction close to the cooperative buildings which may affect the building concrete structures, the residents are faced with safety threats which can be seen by the cracks found on the wall of the cooperative buildings.

It is disappointed to see that the TKW MTR development project has been delayed for more than half a century. More than 40 years later, the Tuen Mun MOS Line passing through TKW is finally planned to operate in 2021. On the one hand, the cooperative residents are expecting that they can be able to enjoy the fruitful town planning: MTR line implementation results. On the other hand, the cooperative residents are feeling being abandoned and helplessness as they are suddenly being forced to leave their long-based homeland.

With regard to the URA mission to re-develop and reclaim the land for modern re-construction, the following criteria should be considered : 1) proper handling of the interests of affected residents; 2) proper land premium calculation; 3) proper accommodation or new units granted to cooperative residents. These are the important factors for the projects to go on further.
The original purpose of building the cooperatives is to provide proper housing accommodation benefits to the civil servants in a way to retain talented people for the government. It cannot be denied that the cooperative civil servants have spent their lifetime serving the public in their respective roles within the government.
Now, the government is planning to reclaim the land for re-development. But, without proper compensation arrangements, it seems that the civil servants and their families are being deprived of their housing accommodation benefits (the rights to continue to live) in the already developed sites.
In addition, some residents doubt the calculation of the land premium that is not specified on all land leases. Also, the calculation method of the land premium was not uniform during the original building period. Hence, there are many controversies in the land premium.
Accordingly, the cooperative residents generally believe that regarding this acquisition plan on the issues of land premium, the Authorities should have room to exercise discretion and the URA should firstly properly handle the appeals of the affected households to settle the problem of compensation before carrying out this task.
We strongly oppose to the current Urban Renewal Authority CBS-2:KC development plan, and the relevant changes application to the Town Planning Board within the plan.

Best regards,
Jennifer Liu
[redacted]
Tokwawan

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舊區街坊自主促進組就市建局九龍城靠背壟道／浙江街第二階段社會影響評估報告的申述及意見書

31/07/2020 21:53

From: 舊區街坊自主促進組Odaag [redacted]
To: tpbpd <tpbpd@pland.gov.hk>
FileRef:

1 attachment

就九龍城靠背壟道／浙江街第二階段社會影響評估報告的意見書.pdf

致城市規劃委員會秘書：

附件是本組就市建局九龍城靠背壟道／浙江街第二階段社會影響評估報告的申述及意見書。

如未來安排有關計劃的會議，亦煩請告知本組詳情。

舊區街坊自主促進組

--

舊區街坊自主促進組 (odaag)
電郵: [redacted]
網頁:
Facebo
聯絡電話:

舊區街坊自主促進組
就九龍城靠背壟道／浙江街第二階段社會影響評估報告的意見書

就市建局靠背壟道/浙江街發展計劃 (CBS-2:KC)及當局就計劃進行的第二階段社會影響評估（下稱評估報告），本組有以下回應，第一部份為本組對該評估報告的要點分析，第二部份為對報告所提及的現有政策及紓援措施不足的意見，第三部份為本組反對發展計劃的理由。

第一部. 就《市建局靠背壟道/浙江街發展計劃第二階段社會影響評估》的要點分析

1. 在居民未有了解重建政策的資訊下詢問是否支持發展計劃，有誤導偏頗之嫌

就對重建計劃的意見 (評估報告第5頁)，約55%住戶表示強烈支持或支持，約15%表示強烈反對或反對，約30%住戶未有意見或沒有回應。然而，當局突然宣佈重建項目，並於同日進行問卷調查，詢問居民是否支持發展計劃，居民面對突如其來的詢問，在沒有掌握到任何重建的資訊下，例如市建局的安置賠償政策，或政府要求居民自行貼錢補地價的安排，有關意願難以真實反映居民的需要及想法。

舉例說，若果有居民最初聽到重建，錯誤以為市建局會在原區先興建一棟大廈安置他們，故此在問卷表達支持，但後來發現市建局原來根本沒有任何相關的安置規劃，在重建下隨時要被迫遷離原區，故此由支持轉為反對，但卻沒有渠道反映，但在有關評估報告卻被當成支持發展計劃。

若要全面了解受影響住戶對發展計劃的意見，較為合理的做法理應是在居民獲悉足夠的資訊後（例如安排重建簡介會後），再次進行問卷調查徵詢居民是否支持或反對相關計劃，並就兩次調查數字作出比較，以反映居民的真實意願及需要。

2. 居民大多滿意大廈居住環境，未有急切重建需要

就對單位內的狀況及居住環境意見 (評估報告第5頁)，七成住戶表示沒有問題，只有約三成受訪住戶表示其單位有居住環境問題，如室外空氣污染或間中出現噪音，但這些問題，即是在市區新興建的樓宇，也是十分普遍。

關於樓宇狀況，第一階段的社會影響評估(第16頁) 有如下描述：「根據市建局2020年5月進行的樓宇勘察結果顯示，該計劃內大部份樓宇呈「維修及保養狀況尚可」的狀況，可見根本未有急切重建的需要。

3. 長者社群於土瓜灣區的社區網絡需要

發展計劃內65歲或以上的長者比例高達30%，遠高於全港16%的水平(評估報告第7-8頁)。而在428個受訪住戶家庭中，超過60%的住戶家庭是有長者居住，當中約20%是獨居或雙老家庭 (評估報告第23頁) 。

在現址居住年期，85%住戶居住了超過20年以上，超過40%住戶是居住了超過半個世紀，即50年以上 (評估報告第10頁)。

由此可見，發展計劃內居住了為數不少的長者，他們在土瓜灣區居住多年，除了對當區有深厚感情外，亦已建立穩定的社區網絡，日常生活亦甚為依賴當區的環境，例如購買生活所需、日常休憩和聚會地方、及鄰里之間互相支援網絡。一旦重建及被迫遷離原區，將很大可能毀掉他們的原有生活網絡，影響他們的安定生活。以前亦有例子是長者被遷離重建區後，因生活失去支持，健康情況急轉直下的案例。若然將這些長者遷離，屆時出現的醫療需要甚至人命損失，難道不是市建局沒有好好保存社區網絡之過？

4. 發展計劃拆散幾代同堂的家庭網絡，將嚴重影響生活質素

評估報告書 (第8頁) 指出，6人或以上的住戶在發展計劃內約佔12%，高於全港的3%。有64個住戶 (約15%) 為三代同堂的家庭居於同住宅單位，更有一個住戶為四代同堂。由此可見，幾代同堂共同居住是公務員合作社的特色，這可能是因為合作社單位的面積較大，同時可以間隔到多間房間。

幾代同堂共住，維繫著重要的家庭網絡，日常生活可以互相支援和分享，家庭成員可以共同分擔看顧小孩和照顧長者（特別是有長期病患）的責任，而長者亦較易得到同住家人的照顧與關懷。現時重建發展計劃隨時把這些幾代同堂的家庭拆散，帶來的負面影響可以甚大，一方面令家庭之間的支援網絡打散，降低生活質素，另一方面長者老來面對家庭分離，失去同住家人，是否能承受這種精神打擊，實在難以評估。

5. 原區重置的需要及意願

就若被迫遷下受影響住戶尋找新居所的地點意向 ，超過一半以上(54%)的住戶希望在原區繼續居住，而未有決定或沒有回應各佔約20%，僅有約2%住戶是選擇其他地區 (評估報告第13頁)。

就預期對社區網絡的影響 ，接近一半自住業主/合作社社員住戶(45%)認為重建對社區網絡有影響，26%住戶認為沒有影響，約30%住戶未有回應。而最多住戶憂慮對

社區網絡的影響的三項分別是「與子女/親戚有關網絡」、「與鄰居及朋友網絡」及「醫療支援」(評估報告第19頁及20頁)。

第二部. 對當局現有政策及報告紓援措施不足的回應

就以上各點，本組認為市建局要進行發展計劃，理應先有妥善的原區重置規劃，最起碼要：

1) 減少對受影響住戶的社區網絡所造成的破壞，特別是有需要的長者社群;
2) 不會降低受影響住戶及其家人的住屋居所質素;
3) 對於幾代同住的家庭，應確保重建不會造成他們的家庭分離，例如讓他們可以在同區重置面積相近的單位，或分拆為幾個毗鄰相近的單位，以減少對他們家庭生活的影響。

然而，本組認為評估報告所提及的紓援措施及現有政策，均不能做到以上幾點，原因如下：

1. 市建局主動重建，卻強迫合作社戶主須自行補地價，做法不公，亦違犯給予自住業主「同區七年樓齡」賠償的承諾

政府於2001年成立市建局時，爭議甚大，因賦予市建局可以申請動用《收回土地條例》強制收地，並沒有規定當局須先收購指定百分比的業權，嚴重危害業主權益，故此當時政府向立法會承諾將給予自住業主「同區七年樓齡」賠償的承諾，以作為補償。

然而，在公務員合作社的項目，戶主若要出售單位，須先向地政總署補地價[1]，有關金額可能動輒要數百萬元，以至千萬元，但市建局對此卻沒有任何額外補償，只聲稱會協助戶主簡化解散合作社的程序及相關行政費，而這些「協助」根本是不痛不癢。

換句話說，合作社戶主即使取得市建局原有的「同區七年樓齡」賠償，但卻要將當中一大部份（數百萬元）用作支付補地價，意味著根本無法在同區重置七年樓齡的單位，甚至可能只能買到相若面積的唐樓單位，質素更遠遠比不上現在合作社的居所。

本組必須指出，現時市建局倚仗《收回土地條例》的便利，往往脅迫業主接受一口價的賠償，拒絕作出協商，這種情況相信在公務員合作社的項目發展，戶主被當局

[1] 據悉在發展計劃開展後，地政總署及市建局一直未能向合作社住戶交待補地價的具體金額

強制重建，如不同意用市建局的法定補償金倒貼補地價，就會被強行收地迫遷，做法極為不公。

2. 「樓換樓」方案是欺世盜名，實情是貼錢預售樓花

市建局於2011年推出一個「樓換樓」方案供自住業主選擇，至今共適用於25個重建項目，但多年以來只有共31名自住業主選擇[2]，即平均每個項目只有約1.2個自住業主參與，不受歡迎的程度，可見一斑。

這個方案美其名叫「樓換樓」，實質上是「樓買樓」，即重建戶可以用當時的市價選擇優先購買市建局的新樓單位或買樓花（即預先購買尚未完成的地產發展項目），但他們本身的賠償金有限，根本無法支付市建局所出售的豪宅單位，所以用盡賠償金之餘，還要壓上自己的積蓄或者向銀行做長期按揭，貼錢向市建局買樓。自住業主其實亦只是小市民，有一些亦是住了幾十年的老人家，辛辛苦苦地供完現在的單位，但現在被重建迫遷，非但沒有得到合理重置，反而還要貼錢和市建局供樓，如此諷刺，自然亦甚少人參與！

再者，如上述所言，在公務員合作社的發展計劃戶主更要另外支付補地價的費用，法定賠償金如同被另類剋扣，更難以購買市建局「樓換樓」的單位。

3. 房協安置屋邨方案如空中樓閣，未有提供任何資訊

評估報告第28頁及29頁指政府就公務員合作社重建計劃作出支持，受影響的合作社住戶可選擇購買房協於啟德發展區內提供用作安置屋邨的資助出售單位作居所，然而其他具體資訊欠奉，包括可選擇的單位面積組合、價格定價、落成及入伙時間，一概未有提供，居民無從判斷有關安排是否適切，能否解決自身家庭的住屋需要。

再者，安置屋邨現時是否已經在興建中，能否趕及發展計劃開展時起好，讓被重建拆遷的合作社住戶「無縫交接」入伙，抑或是預計先趕走他們，讓他們在外流離失所數年，才能入住？這些問題，我們一概不知，因為現政府及市建局並沒有提供任何資訊。

政府及市建局推出發展計劃的同時，聲稱有新的安置屋邨方案，卻十劃未有一撇，如此行事，實屬失責。

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[2] 見政府當局就市區重建局的工作提交的文件(2020年6月23日)
https://www.legco.gov.hk/yr19-20/chinese/panels/dev/papers/dev20200623cb1-762-1-c.pdf

4. 幾代同住的家庭難以重置居所物業，當局具體措施支援欠奉

合作社單位的面積夠大，才能容許幾代同堂的共住空間，而在考慮發展計劃減低對同住家庭的生活影響時，能否提供相若大小的重置單位，就顯得甚為重要。但令人驚訝的是，整份報告竟然沒有提及過合作社單位的現有實用面積，是否刻意避而不談，實在不得而知。但據本組了解，合作社內不少單位的面積均是超過1000呎，而物業市場上是否有足夠的大單位，可以讓戶主重置物業，實在令人懷疑。

若無法在物業市場上重置相若面積的單位，幾代同住的大家庭被迫拆散，較能減低對他們家庭所造成的負面影響，就是協助他們在同區重置幾個相近的單位，讓家庭網絡得以延續，亦方便家人照顧家中長者。

但是，我們看不到有任何市建局有任何實質措施協助這些大家庭重置物業，而更令人憂慮的是，部份家庭成員在重建下可能會失去穩定居所，被迫要自行在外面租樓，增加他們的經濟負擔。

5. 社區服務隊無法取代原有社區網絡，亦無力處理原區重置單位的問題

評估報告著墨最多的紓援措施是社區服務隊（下稱社工隊），報告聲稱居民不能適應新社區可以社工隊、長者失去同住家人照料也可以找社工隊、甚至居民擔心能賠償金不足以原區置業，也是去找社工隊。但本組必須指出，社工隊並不是「萬能藥」，如果沒有妥善地處理居民原區重建單位的問題，所帶來的負面影響並非社工隊可以處理。

發展計劃裡有不少長者在土瓜灣區居住了超過50年，本來他們是在安享晚年，但現時市建局來重建，他們隨時無法在原區重置物業，被迫遷離至其他社區，市建局聲稱可以找社工隊協助他們在新區重新適應，但長者晚年經此奔波折騰，還能否安居？

而且部份幾代同住家庭的長者可能本身有認知障礙或長期病患的問題，本身極為倚靠同住家人的照顧，但重建下整個家庭被拆散，若將來無法同住或於附近居住，單靠社工隊尋找的長者中心或老人院舍，根本無法取代原有的家人照顧，這些長者的身心健康又會否因此進一步惡化？

總結

總括而言，本組認為市建局靠背壟道/浙江街發展計劃有以下主要問題：

(1) 市建局應該在提供重建政策的資訊及進行簡報會後，再次徵詢居民對發展計劃的意願，但市建局並未沒有這樣做，現時評估報告未能客觀反映居民在得到重建資訊後是否仍然支持/反對發展計劃；

(2) 市建局過去沿用的「七年樓齡」賠償方案，未有考慮合作社戶主須向地政總署補數百萬元地價的問題，將導致合作社戶主難以在同區重置面積相若的適切單位，重建後的住屋質素隨時更差；

(3) 市建局所謂的同區安置選項如「樓換樓」，實質是要被重建的住戶倒貼買樓，根本不能稱得上是安置，而不少受影響住戶亦難以負擔向市建局購買市值的物業單位；

(4) 政府及市建局未能提供房協安置屋邨方案的詳情，甚至有關方案仍然可能只是在構思之中，既然未有妥善的安置方案，就不應貿易推展有關計劃；

(5) 重建對計劃內的長者社群及幾代同住的家庭有甚大衝擊，而綜合以上數點，市建局未能確保他們能夠得到妥善的原區重置。

因此，本組反對市建局的靠背壟道/浙江街發展計劃。

同時，本組希望城規會不要輕率通過有關草圖，因為根據法定程序，城規會是有把關的責任，如若通過有關草圖，則特首之後就可以授權市建局開展項目及申請引用《收回土地條例》強制收地迫遷，而無須再徵詢受影響住戶的意願，故此城規會各委員的決定，將影響著是否會拆散數百個家庭，及令不少長者無法安享晚年。

舊區街坊自主促進組

2020年7月31日

With regard to the URA mission to re-develop and reclaim the land for modern re-construction, the following criteria should be considered : 1) proper handling of the interests of affected residents; 2) proper land premium calculation; 3) proper accommodation or new units granted to cooperative residents. These are the important factors for the projects to go on further.

The original purpose of building the cooperatives is to provide proper housing accommodation benefits to the civil servants in a way to retain talented people for the government. It cannot be denied that the cooperative civil servants have spent their lifetime serving the public in their respective roles within the government.

Now, the government is planning to reclaim the land for re-development. But, without proper compensation arrangements, it seems that the civil servants and their families are being deprived of their housing accommodation benefits (the rights to continue to live) in the already developed sites.

In addition, some residents doubt the calculation of the land premium that is not specified on all land leases. Also, the calculation method of the land premium was not uniform during the original building period. Hence, there are many controversies in the land premium.

Accordingly, the cooperative residents generally believe that regarding this acquisition plan on the issues of land premium, the Authorities should have room to exercise discretion and the URA should firstly properly handle the appeals of the affected households to settle the problem of compensation before carrying out this task.

Thank you for your attention.

Best regards,
Sandra Tam

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Objection to Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) of the Urban Renewal Authority

31/07/2020 13:00

From: Eric Tang <[redacted]>
To: tpbpd@pland.gov.hk, inquiry@mail1.ura.org.hk
FileRef:

I write to object to the Scheme. It should not be carried out if the following issues have not been satisfactorily addressed:

Many people are affected by the Scheme and I am one of the being affected, the "**Affected Party**".

It's mentioned in the Stage 1 Social Impact Assessment Report published by the URA that site inspection in May 2020 showed that there is no obvious environmental hygiene problem in the proposed redevelopment area. The buildings affected by the Scheme certainly do not lack basic sanitation facilities and this has never been an issue even decades ago when they were built. Also, according to the building condition survey (the "**BCS**") conducted by the URA in May 2020, the conditions of most of the buildings affected by the Scheme are, however, acceptable, none being described as dilapidated.

If redevelopment of buildings whose conditions are acceptable instead of dilapidated is to go ahead, I believe many low buildings in other areas of Hong Kong are in higher priority than the Scheme. For example, in To Kwa Wan, Mongkok, Yau Ma Tei, Shum Shui Po, Tsim Sha Tsui, even Causeway Bay etc. Some of them may even be dilapidated or in poor sanitary condition.

The buildings were built under Civil Servants' Co-operative Building Society ("**CBS**") Scheme, are affected by the Scheme. The Scheme has not been proposed initiated or requested by the Affected Parties. If it proceeds, the sale of CBS accommodation to the URA involved is actually forced upon the Affected Parties. In this connection, the URA has threatened initiating the procedures for resumption under the Land Resumption Ordinance in the event that the URA has difficulty in acquiring the affected CBS accommodation by agreement. It is very unreasonable for the Affected Parties to be required to pay 2/3 land premium for the purpose of removal of alienation restriction when the sale is forced upon them, irrespective of assessed by Existing Land Use Value or Redevelopment Value.

The CBS accommodation is a form of housing benefit provided to local officer working in the Government an opportunity of purchasing their own homes on a long term basis (see the 1st paragraph of Secretariat Standing Circular No. "G" 1 dated 16 January 1961). In order to be able to keep the CBS accommodation after retirement, the civil servants provided with this housing benefit have to work in the Government till retirement. The CBS accommodation arrangements allow succession to the CBS membership and the underlease with the CBS by family member. Why civil servants and retired civil servants who have the CBS accommodation affected by the Scheme as their housing benefit from employment in the Government are treated by having their housing benefit taken away, together with being asked to pay 2/3 land premium.

In the case of the CBS accommodation where I reside, like other affected CBS accommodation where the CBS concerned has not yet been dissolved, the Government lease actually does not have provisions regarding payment of 2/3 land premium (whether that as at the date of the grant of or the commencement date of the Government lease, not to mention that currently) to the Government in the event of sale of the CBS units. This was not contemplated at the time when the Government lease was granted otherwise such arrangements, which have significant financial implications, would have been expressly spelt out.

All in all, the buildings are not in dilapidated condition, no obvious environmental hygiene problem in the area, CBS accommodation is a form of housing benefit, issue/queston on land premium, what is the rationale behind for the redevelopment. And why are compensation arrangements the same to owner-occupiers of dilapidated private accommodation covered in the URA's other redevelopment projects ?

If for whatever reason, redevelopment of the buildings covered by the Scheme has to go ahead, what is the reason on CBS buildings on Kau Pui Lung Road and Maidstone Road between Lok Shan Road and Maidstone Lane and even the non CBS buildings on Maidstone Road currently not in the scope, why then this whole project was not done in one go when the Shatin to Central Link was constructed so as to minimize the disturbance nuisance and pollution to the residents in the area covered by the Scheme and its vicinity? Implementing the Scheme when the To Kwa Wan MTR Station is opened / about to open would subject the residents in the nearby area (e.g. residents in Lok Man Sun Chuen) to the nuisance pollution and disturbance brought about by construction works for several years again after they have suffered these arising from the construction of the Shatin to Central Link for around 10 years and worse still the residents in the affected CBS buildings to only negative impacts but not the opportunity to enjoy the fruit of the Shatin to Central Link construction.

I sincerely hope that given the numerous problems involved, the Scheme would not receive green light for going ahead.

Thank you for your kind attention.

Yours faithfully

TANG Kin Fan Eric

CBS member Affected by the Scheme
Tel No. [redacted]

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城規會第二階段意見書---市建局靠背壟道/浙江街發展計劃 (CBS-2:KC)
31/07/2020 12:48

From: KH LAU [redacted]
To: "tpbpd@pland.gov.hk" <tpbpd@pland.gov.hk>, 劉鑑洪1 [redacted]
FileRef:

1 attachment

2020年7月30日_給城市規劃委員會第二階段意見書.doc

城規會你好,
謝謝你的關注,
一群受影響的長者居民 上 2020年7月31日

致 城市規劃委員會秘書
香港北角渣華道 333 號北角政府合署 15 樓
2020 年 7 月 30 日

敬啟者：

市建局的靠背壟道/浙江街發展計劃（CBS-2：KC）

我們是一群 60 至 90 多歲的退休公務員，住在本區已有多年了，每天外出都要上落樓梯多次。現在身體狀況已經大不如前，想外出進行社交活動簡直是奢望，有病時迫不得已才下樓梯看病；最怕是患重病時要召喚救護車入院，對長者來說簡直是折騰。

同時，這一區的公務員樓宇樓齡普遍都接近 60 或 60 年以上，雖說都有定期的樓宇維修，總是有不大不小因樓宇老化而產生的問題，最困擾的是不同地方，不同程度的漏水以及石屎剝落。所以樓齡漸高，我們往往又要為準備昂貴的維修費而頭痛了。

所以，一知道政府及市建局提出有關本區的重建發展計劃，大家都拍手叫好，都支持這個計劃，希望它能成功。

因這次是首個公務員重建計劃，有別於一般私人樓宇的收購，沒有先例可援；而且我們單位的面積都是大單位，所以要面對很多問題要解決。

不過，只要各方面肯多溝通，互諒互讓，多為他人著想，一定能夠找到解決各項問題的辦法。以下是我們的少許建議：

1. 我們認為，一直困擾著大家的就是要補回 2/3 地價給政府的問題。

   市建局行政總監韋志誠先生在 2020 年 6 月 28 日發表的網誌，第 4 點：

   『----按我們的初步評估，自住業主在扣除土地補價後收到的補償，足夠用作購買由香港房屋協會發展和提供的專用安置屋邨的資助出售單位，作為重置居所的選擇之一。----』

   大家一看，便會發覺補了地價後，只可足夠購買以上的房屋單位，其他呢，就根本不可想了。

   所以，韋先生便不敢再說下去了。

   雖然政府說，自今年 6 月 1 日起便會使用新的補地價方法，收取的金額大約是舊制的一半。

   我們認為，新的金額仍然是高昂，政府可否再降低一些呢？

   這樣做法，庫房只是少收一點而已，但對於我們這一群人，確實有很大的幫助。

2. 政府及市建局在處理收購過程中要盡量人性化些，多些在受計劃影響的不同群組角度去考量。

   例如，在收到賠償金額後，我們除了考慮購買私人樓宇外，若想原地安置，可以『呎換呎』方式，不用補差價直接購買市建局在原區興建的單位，以滿足希望在原區繼續生活的人士。

   因為市建局供應的多數是小型單位，所以希望可以讓大家庭、原居大面積的人士(不用補差價)，以『呎換呎』方式多購置一個以便可以在原區照顧家人。

   我們可以優先選擇任何樓層及任何方向的單位。

3. 因為重建過程需要很長的時間，選擇原地安置者要等待一段頗長的時間才可入住。
   如果我們選擇購買由香港房屋協會發展和提供的專用安置屋邨的資助出售單位，是啟德發展區 1E1 地盤嗎？等候入住時間大約多少呢？
   希望房屋協會可以提供更優惠的地價及售價給我們，同時，我們亦可以優先選擇任何樓層及任何方向的單位。

4. 市建局可以少賺一些，考慮在賠償額，在各項津貼方面提高一些，以便各受影響者可以充裕一些，皆大歡喜。
   例如，或論我們選擇以上三種，哪一種購樓方式，在市建局收回樓宇至到我們遷出地盤會有一段頗長的交接期，希望市建局在這段期間可以免收任何費用讓我們在原址繼續居住。對於房協資助單位可能趕不及時間交樓，或選擇原地安置人士者需要先遷出，後收樓，需租住私人樓宇作過渡安排，希望市建局能適當安排有關的租金津貼，以解困境。

5. 除了市建局收購價，以及補地價金額可以在 2022 年提出外，我們希望政府及市建局可以在 2022 年之前與受影響者磋商，考慮所有與收購重建的資助，減免以及津貼安排，讓業主能清楚瞭解，大家關懷互諒，達成共識。
   那麼到 2022 年一切過程便會順利，自然水到渠成，皆大歡喜了。

我們都十分感恩政府及市建局多年來竭力為市民提供樓宇，安置受影響人士，以及改善居住環境質素等。請明白，我們並不是提出無理或巨額賠償要求，我們只不過希望能得到合理的，安排妥當的，處處為我們著想的，對原有生活影響盡量少的方案而已。

希望有關當局能再次竭盡所能，迎難而上，不能面對困難便急急打退堂鼓，邁向成功之路，為下一個收購公務員樓宇計劃提供良好的榜樣。

此致

一群受影響的長者居民 上　2020 年 7 月 30 日

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

[redacted]

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) TI-TT, 趙祥(美惹同)	林偉傑
2) C K POON	
3) T M LI	
4) LIU KAM SHING	
5) TIM TIN TEE SUSHANG	
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RECEIVED
31 JUL 2020
Town Planning Unit

街道及號碼：* ~~靠背壟道 / 浙江街~~ [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下[redacted]

861

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

[redacted]

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1)	
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街道及號碼：* ~~靠背壟道 / 浙~~[redacted]蘇街 *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱。

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) WONG KIM MING	
2) WONG ON LI ANNIE	Annie Wong
3) LUI LAI WAH	
4) LAU CHI KIN	
5) 梁黃蕙坤	梁黃蕙坤
6) MAK KWOK WING	
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街道及號碼：*~~靠背壟道~~ /~~浙江街~~ [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下[redacted]

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) LAM MEI SEE MAZY	Mazy Lam [redacted]
2) [redacted] 傅超麒	
3) [redacted] 何陽榮	
4) [redacted] 倫玉芬	
5) [redacted] 陳亮學	
6) [redacted] 葉德泰	
7) [redacted] 鄧婉芬	
8) [redacted] 鄧翠娣	
9) [redacted]	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ / [redacted] 刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱

靠背壟道/浙江街重建項目關注組

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 許驟生	
2) 周善釣	
3)	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱。

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 莫小菊	莫小菊 (業主)
2) 陳貴平	(業主)
3) 鄧煜輝	(業主)
4) 胡鎮海	(業主)
5) 吳景良	(業主)
6) 朱錫健	(代表)
7) 葉美霞	(業主)
8) 張嘉明	(代表)
9)	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下[redacted]

ACME 善美建屋有限責任合作社

THE ACME CO-OPERATIVE BUILDING SOCIETY, LIMITED,

106-108 MAIDSTONE ROAD, KOWLOON.

(CBS-2:KC)
原址原大安置
會員意向

本會會員的意願為：

1.	贊成 - 除啟德地區外，多一個選擇	80%
2.	不贊成 - 直接收取補償金，在他區置業	20%
3.	無意見	0%

8戶支持.

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

[redacted]

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 楊林煜華 [redacted]	
2) Cunningham Sydney T [redacted]	
3) YUEN PING TAT [redacted]	
4) Louisa Chow	Louisa Chow
5) HEUNH WAH LUN [redacted]	
6) CHENG Che Yey [redacted]	
7) FONG YAU FUN [redacted]	
8) LO KIN HOK POLLY [redacted]	
9) [redacted]	
10) YUEN WOON PING EVELYN [redacted]	
11) ~~HEUNH WATSON~~ YAU SHUI WAH [redacted]	
12) ~~DONH YEE~~ LAM HO YIN MICHAEL [redacted]	
13) ~~HEONH CHUN HO~~ SIU WUN LUT [redacted]	
14) NG SHUN KAI [redacted]	
15) KO KIT YEE [redacted]	

街道及號碼：* ~~靠背壟道 / 浙江街~~ / [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信[redacted]

（→ 見後頁）

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 伍國業 [redacted]	伍國業
2) 司徒珊仙	司徒珊仙
3) 曹志君	
4) 劉惠明	
5) 林麗芬	
6) WONG Mei Yeung	
7) 王秀明	
8) 郭妙娟	郭妙娟
9)	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ [redacted] ~~江蘇街~~ *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱。

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) [redacted]	温惠芳
2)	鄭玉美
3)	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ / [redacted] 道 / 汪蘇街 *刪除不適用者

請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱 [redacted]

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

假設閣下有此『原址原大的安置項目』給你選擇，你會否支持：

（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 霍翠瑩	霍翠瑩
2)	
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街道及號碼： * ~~靠背壟道~~ /~~浙江街~~ / [redacted] ~~旺蘇街~~ *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱。

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) POON CHERK WING	
2) 黃玉英	
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街道及號碼：* ~~靠背壟道 / 浙江街~~ [redacted] ~~蘇街~~ *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下[redacted]

靠背壟道/浙江街重建項目關注組

『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 劉惠中	
2) 余麗儀	
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街道及號碼：*~~靠背壟道~~ / ~~浙江街~~ [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱

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『原址原大安置項目建議意向調查回條』

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（支持請簽名，每戶一代表）

業主/合作社社員住戶 姓名	業主/代表簽名
1) 謝嘉恩	[redacted]
2) Tsang Wai Ling	[redacted]
3) Tam Lai Fong	[redacted]
4) 林旬男	[redacted]
5) Au Pak Sun	[redacted]
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街道及號碼： * 靠背壟道 /浙江街 [redacted] *刪除不適用者

煩請 2020 年 7 月 29 日或之前交回靠背壟道 175 號地下信箱

致城市規劃委員會秘書：
專人送遞或郵遞：香港北角渣華道 333 號北角政府合署 15 樓
傳真：2877 0245 或 2522 8426
電郵：tpbpd@pland.gov.hk

To: Secretary, Town Planning Board
By hand or post: 15/F, North Point Government Offices, 333 Java Road, North Point, Hong Kong
By Fax: 2877 0245 or 2522 8426
By e-mail: tpbpd@pland.gov.hk

有關的規劃申請編號 The application no. to which the comment relates CBS-2-EC

意見詳情（如有需要，請另頁說明）
Details of the Comment (use separate sheet if necessary)

See attached

Please supersede my submission of July 30, 2020

「提意見人」姓名／名稱 Name of person/company making this comment

簽署 Signature NG SHUN KAI 日期 Date 31/7/2020.

RECEIVED
31 JUL 2020
Town Planning Board

就規劃申請提出意見

Comments on Planning Application

請勿填寫此欄 For Official Use Only	檔案編號 Reference No.	
	收到日期 Date Received	

重要提示：

Important Notes:

(1) 意見必須於指定的法定期限屆滿前向城市規劃委員會（委員會）提出；
the comment should be made to the Town Planning Board (the Board) before the expiry of the specified statutory period;

(2) 委員會考慮申請的暫定會議日期已上載於委員會的網頁(www.info.gov.hk/tpb/)。考慮規劃申請而舉行的會議(進行商議的部分除外)，會向公眾開放。如欲觀看會議，請最遲在會議日期的一天前以電話(2231 5061)、傳真(2877 0245或2522 8426)或電郵(tpbpd@pland.gov.hk)向委員會秘書處預留座位。座位會按先到先得的原則分配；
the tentative date of the Board to consider the application has been uploaded to the Board's website (www.info.gov.hk/tpb/). The meeting for considering planning applications, except the deliberation parts, will be open to the public. For observation of the meeting, reservation of seat can be made with the Secretariat of the Board by telephone (2231 5061), fax (2877 0245 or 2522 8426) or e-mail (tpbpd@pland.gov.hk) at least one day before the meeting. Seats will be allocated on a first-come-first-served basis;

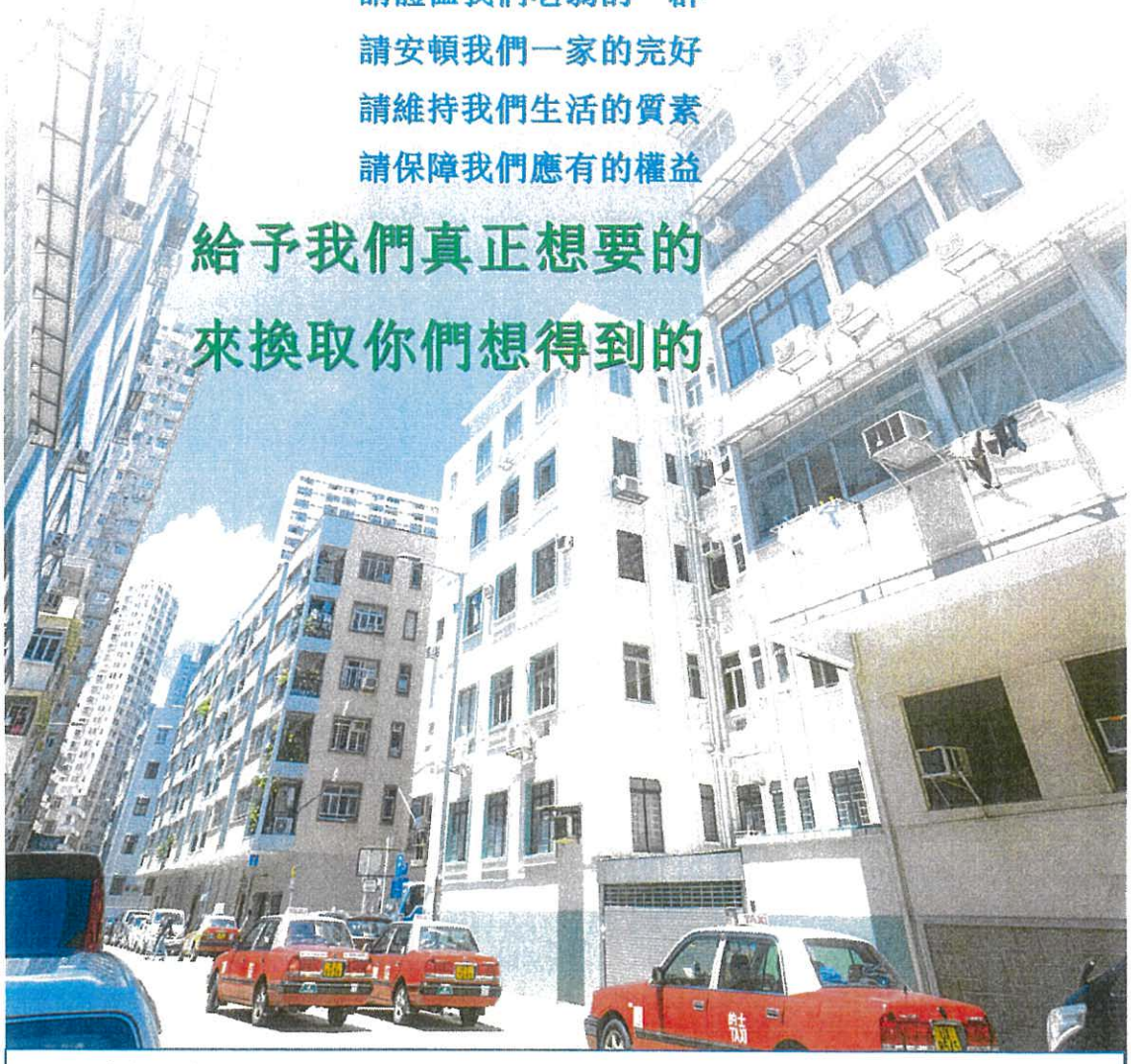
(3) 供委員會在考慮申請時參閱的文件，會在發送給委員會委員後存放於規劃署的規劃資料查詢處(查詢熱線 2231 5000)，以及在會議當日存放於會議轉播室，以供公眾查閱；及
the paper for consideration of the Board in relation to the application will be available for public inspection after issue to the Board Members at the Planning Enquiry Counters of the Planning Department (Hotline: 2231 5000) and at the Public Viewing Room on the day of meeting; and

(4) 在委員會考慮申請後，可致電2231 4810或2231 4835查詢有關決定，或是在會議結束後，在委員會的網頁上查閱決定摘要。
after the Board has considered the application, enquiry about the decision may be made at tel. no. 2231 4810 or 2231 4835 or the gist of the decision can be viewed at the Board's website after the meeting.

我們沒想要出賣安樂居
請不要強迫我們去出讓
請不要破壞我們好家園
請不要掠奪我們的財產
請不要剝削我們的福利
請不要犧牲我們的權益
如要我們讓出建屋空間
請尊重我們原來所擁有
請體恤我們老弱的一群
請安頓我們一家的完好
請維持我們生活的質素
請保障我們應有的權益

給予我們真正想要的

來換取你們想得到的



城規會- CBS-2:KC 重建發展項目，反對理由

城規會- CBS-2:KC 重建發展項目，反對理由

致城市規劃委員會秘書

香港北角渣華道 333 號北角政府合署 15 樓

敬啓者：

市建局的靠背壟道/浙江街發展計劃(CBS-2:KC)

1. 不得不強烈反對 CBS-2:KC 重建發展項目計劃！

繼 6 月 19 日後，至 7 月 8 日市建局公佈第二份評估報告，之間也舉行過三場市建局舉辦的公眾簡介會，邀請有關部門官員來解答街坊問題，到目前得到的回答內容，仍然是不清不楚，模棱兩可，更令街坊居民失望，也開始明白重建計劃帶給大家的負面影響有多大。

所以，在市建局沒有實質相關賠償的資料及沒有調整修改原有計劃方案下，且很多後繼相關部分的回覆及報告，如給馬議員的回覆信，內裡充滿著詭譎的細節，極高風險把眾街坊的應有權益完全給剝奪。我們不得不強烈反對這個 CBS-2:KC 重建項目！

2. 市建局不盡不實的第二份報告，充滿詭譎的細節

2.1

> 2.6 About 30% of the surveyed households indicated that the problems of noise nuisance, outdoor air pollution / poor air quality and concrete spalling happened or occasionally happened to their accommodation. Meanwhile, the surveyed households generally indicated that no problem in terms of the living environment.

合作社的樓宇基本上沒問題，市建局選址本區是純粹為了本址的優厚發展空間，市建局的宗旨是處理日久失修的樓宇，並非以爭奪土地發展圖利的，這在證明選址本區為試點重建項目，是有違市建局的宗旨。

2.2

> 5.5 Subject to the approval by the CE in C to implement the Scheme, the URA will offer an owner-occupier of domestic property the market value, plus an ex-gratia allowance (namely home purchase allowance). For the CBS members/ex-members not yet settled the outstanding land premium to the Government, they have to settle the premium to release the alienation restriction before they can assign legal titles of their flats to the URA. The Government has reviewed its basis for land premium

現時本區還有 9 個未解散的合作社，據聞到目前絕大部分沒有意圖進行任何散社安排，根據未散社的原有舊契約，當年批出的優惠地價已經付清，沒有任何欠款，社員是沒有必要進行報告中的補地價。況且啟動今次的收購行動主角是市建局，一切有關補地價的費用合理地由市建局完全負責。

2.3

> 5.8 According to the agreement made between the URA and the Hong Kong Housing Authority (HKHA) and HKHS, they will provide flats within their estates for rehousing eligible tenants. The URA will liaise with HKHA and HKHS to reserve flats in available estates to cater for the potential demand. Subject to the availability of rehousing flats, the URA will endeavour to arrange allocation of rehousing flats for the eligible tenants in East Kowloon as far as practicable.

這在證明可以適合本區供合作社安置房屋是明顯不足的，報告中的東九龍範圍可以很大，隨時有可能給放逐到很遠的區域。並且這些東九龍的新建房屋基本沒法找到原大相若的單位，這樣情形真要發生時，就是強迫大家要找私人樓宇，但以市建局現有的方法賠償，基本買不到合適的單位，原居民給遷徙後生活素質肯定是大幅度下降。這些華麗推廣包裝背後，現實卻是充滿著無限的骨感。

2.4

> 8.1 The likely impacts of the proposed redevelopment on the social network of owner/member-occupiers and others households are shown in **Table 8.1**. The percentage of households replied that the social network affected by redevelopment is relatively high (about 45% and 42%) comparing to the URA's past experience in the same district. It may be related to the long residence and the high dependency on the social network as mentioned in para. 4.4.

8.1 清楚告知，這個重建計劃的的確確在製造社會問題，包括長者適應問題，長者出入問題，小孩校網問題，家庭倫理問題，財政壓力問題等等。這重建計劃正在為 462 受影響的住戶泡製他們自家內部的問題，同時醞釀著讓他們成為將來的社會問題！那些有限社工團隊根本不容易去應付，究竟這個計劃是解決社會問題，還是在製造社會問題呢？所以如果不能原址安置，所衍生出來是會不少的。

2.5

> 9.4 Of the 140 students, 55 (39%) are studying in primary school or kindergarten. Impact of the Scheme on this group of students may be greater as these students may need to change to another school if their families chose to move to other areas. It is understandable that parents generally wish their children to continue in their present schools. Relocation away from this area may cause inconvenience, especially for primary and kindergarten students.
>
> 9.5 If the proposed Scheme is implemented, the URA will offer FFF option (in-situ or in the same district) or the Government will offer an alternative option of the DRE at Kai Tak Development Area for those eligible domestic owner-occupiers that may contribute to minimize the impacts due to relocation to different district. Among these options, opportunities to retain in the same secondary school or primary school will be given due to the same primary and/or secondary school net. The URA with the assistance of the SST will assist the affected families during the acquisition and rehousing stages to meet the educational needs of their children as much as possible. If necessary, appropriate assistance, resources and services from relevant Government departments will be sought.

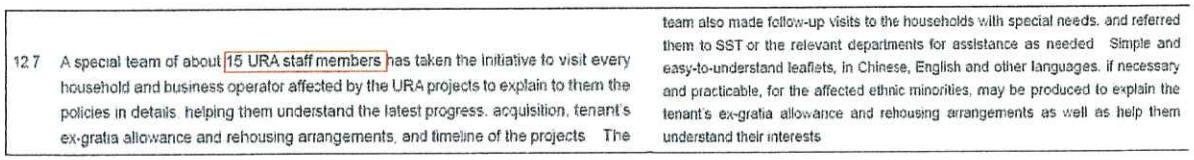
這校網問題是父母最頭疼問題，天下父母心，誰不想自己兒女能有一片美好的將來呢？好的教育是不可或缺的。不少市民放棄居住自己的房屋，特意租住本區附近的單位，為了的就是讓子女能進入這優良的校網區。如果給逼遷到別區，市建局及社工團隊能幫到些什麼，不都是在空談、在開空頭支票嗎？可以說些實質的解決方法嗎？

2.6

> 12.5 As the situation of pandemic and the government prohibition on group gathering for prevention and control of disease has gradually relieved in June and July, 3 public briefing sessions were organized by URA with government representatives from Civil Service Bureau, Development Bureau and Lands Department on 6 and 7 July 2020 to inform all the affected persons, the details of the Scheme and to obtain public views on the Scheme. Questions on Freezing Survey, planning, acquisition, tenant's ex-gratia allowance and rehousing, and CBS dissolution and outstanding land premium issues were addressed at the meeting.

強烈反對這 12.5 的敘述, 三場的簡介會，眾街坊都是期望而來，憤怒而去，市建局根本上是沒有對應問題作回答，千篇一律的看著手上資料稿子重複讀念一遍，答非所問！是 mostly were not addressed at the meeting. 以前街坊們的問題仍然懸著未解決，眾街坊還在等待確實的回覆。

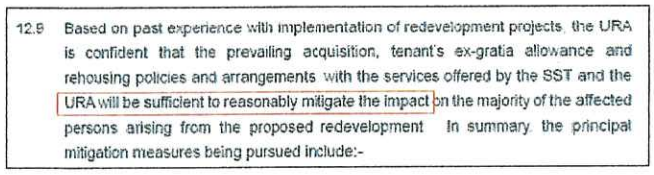
2.7



12.7 A special team of about 15 URA staff members has taken the initiative to visit every household and business operator affected by the URA projects to explain to them the policies in details, helping them understand the latest progress, acquisition, tenant's ex-gratia allowance and rehousing arrangements, and timeline of the projects. The team also made follow-up visits to the households with special needs, and referred them to SST or the relevant departments for assistance as needed. Simple and easy-to-understand leaflets, in Chinese, English and other languages, if necessary and practicable, for the affected ethnic minorities, may be produced to explain the tenant's ex-gratia allowance and rehousing arrangements as well as help them understand their interests

市建局 15 位工作人員，似乎在推銷市建局的方案遠多於解決街坊居民的疑問，都是推銷市建局自身利益如何可以在地產發展發大財，遠遠多於原居民的全部或部分利益。 宣傳單張仍然沒法解決居民的疑惑，因為市建局一直都在避開核心問題，再多再漂亮的單張都解決不了問題。

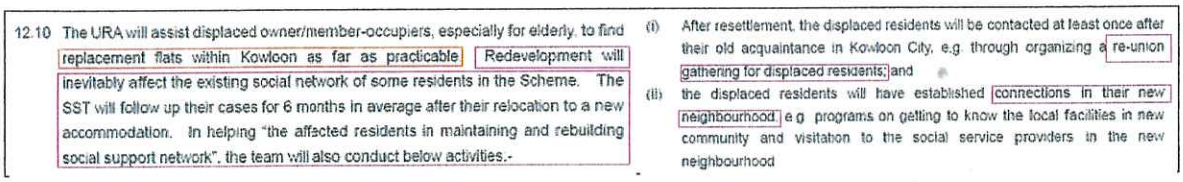
2.8



12.9 Based on past experience with implementation of redevelopment projects, the URA is confident that the prevailing acquisition, tenant's ex-gratia allowance and rehousing policies and arrangements with the services offered by the SST and the URA will be sufficient to reasonably mitigate the impact on the majority of the affected persons arising from the proposed redevelopment. In summary, the principal mitigation measures being pursued include:-

從以往傳媒及網上記錄，看到市建局的劣評是佔絕大部分，非常卑劣的批評也非常多，但網上好評到目前只見到一個，最正面的消息只有市建局自己發佈的官方消息。這樣怎能令街坊居民相信市建局可以解決這次計劃的衝擊？大家反而祈求市建局停止項目，不要來擾亂我們這個安寧的社區，才是市建局最大的善行了！ 下面各點會有詳細回應說明。

2.9



12.10 The URA will assist displaced owner/member-occupiers, especially for elderly, to find replacement flats within Kowloon as far as practicable. Redevelopment will inevitably affect the existing social network of some residents in the Scheme. The SST will follow up their cases for 6 months in average after their relocation to a new accommodation. In helping "the affected residents in maintaining and rebuilding social support network", the team will also conduct below activities:-

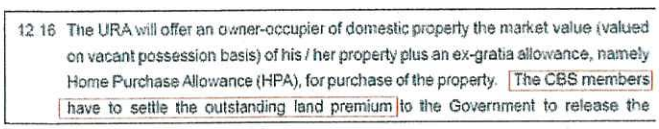
(i) After resettlement, the displaced residents will be contacted at least once after their old acquaintance in Kowloon City, e.g. through organizing a re-union gathering for displaced residents; and

(ii) the displaced residents will have established connections in their new neighbourhood, e.g. programs on getting to know the local facilities in new community and visitation to the social service providers in the new neighbourhood

從上述 5.8 已經說明原區原大樓宇供應很少，市建局策劃時，相信根本沒有很大意願照顧原居民留在原址，甚至原區，一心只是想把原居民公務員及家屬驅離本區，不要阻礙他們大發地產財。12.10 更從之前 5.8 東九龍擴大到現在整個九龍區。市建局好像已經不在乎我們街坊要到哪裡了，只要趕快離開就是了。

首六個月有社工為有需要人士特別是長者支援適應新生活，六個月後就自生自滅了？這個社會支援有明顯的期限，長者身體頭腦一直在老化，不單需要更長時間，突如其來的環境變化，令他們精神情緒受更大的打擊，很有可能是從此一沉不起！市建局既然跑來破壞我們這個社區，無緣無故製造眾多社會問題 ，就算市建局安排六年的支援還是遠不足夠的，是需要支援長者到終老，沒有期限，才勉強說得過去。這是一個多涼薄，沒仁義的市建局計劃。

2.10



12.16 The URA will offer an owner-occupier of domestic property the market value (valued on vacant possession basis) of his / her property plus an ex-gratia allowance, namely Home Purchase Allowance (HPA), for purchase of the property. The CBS members have to settle the outstanding land premium to the Government to release the

合作社原有契約沒有再補什麼地價條款，沒有註明有任何欠款。地價是按合約上的價錢批出，合作社就可以在上邊蓋建房屋了，合作社社員現在仍然透過合作社集體擁有地權及業權。

notional replacement flat and the market value of the property being acquired. The notional replacement flat, based on a seven-year-old flat of a size similar to the flat being acquired and in the same locality, is assumed to be in a comparable quality building, situated in a similar locality in terms of characteristics and accessibility. The notional replacement flat will be situated at the middle floor of a notional building with average orientation, i.e. not facing south or west, and without sea view. The

2.11 估價參考用同區七年樓，中低層，沒海景，一般方向， 這是一個伏筆預示，市建局已經在排除鄰近眾多的優質物業作為估價參考，只剩下沒景觀，坐向一般的低層老舊單位，再把最高及最低的估價排除，將嚴重壓低估價，由此已經知道出來的估價一定與原居民落差非常大。難怪市建局需要原居民先同意接受收購後，才肯告知正式收購價，希望能造成米已成炊，就算原居民反對也為時已晚的局面。這是市建局企圖用極低廉的方法清除原居民的障礙，方便市建局將來大發地產財，早已忘記市建局的原有精神宗旨了。這種手法，連以往聲名不好的私人發展商都不會用的！

12.17 According to the new URS, and as far as relevant legislation allows, the URA will offer FFF arrangement to eligible owner-occupiers of domestic properties. Under such arrangement, new flats will be made available in a URA new development in-situ or URA development(s) in the same district or at suitable site (s) at market value (subject to changes in the relevant legislation and regulations) (as the URA may select for the purpose provided that necessary approval / authorization has been obtained at the time of FFF offer), as an additional choice to cash offer to such owner-occupiers. According to para. 5.3 and 5.4, subject to the actual demand of the affected owner-occupiers of large household size to move to a new flat with a similar size of the present units, the URA will further explore possible ways at FFF option addressing this need as far as practicable. The FFF option offered in the same district can minimize the impacts on social network, educational and medical needs of owner/member-occupier households as identified in the survey and mentioned in the previous sections due to relocation to different district. Details of FFF option can be obtained from:

2.12 原居民的意願都要求得到賠償單位與原來的面積相若，市建局何曾有項目會有與合作社面積相若的單位呢？面積的差距很大，還說會在本區，這個是百分百的空談！

這段後部分的陳述也得承認了同區樓換樓，是給原居民各方面最低的衝擊，之前列出各樣的衝擊影響問題，卻沒有實質的解決方法，都是虛幻及詭譎的建議！整個報告都出現不少自相矛盾的地方，也證明事前市建局是完全沒有審慎考慮各方面因素，一個草率的重建計劃，主動製造社會問題，折磨本區各年齡階層的街坊，特別是老人家，讓他們往後不能得到善待終老！

2.13 整份報告很多自相矛盾地方，本來一個很適合居住的社區，一個重建計劃衝著來大肆破壞，卻懸著一大堆未能解決的原居民安置賠償問題；明顯地在證明，市建局的 CBS-2:KC 重建項目，是一個徹頭徹尾選址嚴重錯誤的試點！

3. 斷章取義的調查結果，未能全面反映原居民的真實意願

3.1 評估報告書 (第 5 頁) 說，成功調查的住戶總數是 428 戶，對此計劃，有 207 個住戶表示強烈支持或支持，55 個住戶表示強烈反對或反對，餘下的 114 個住戶表示無意見或沒有回應。這是在 5 月 22 日首天突如其來的凍結人口調查登記、電話問卷調查和限於 7 天內呈交意見問卷所收集到的數據，市建局這個初步意見調查，不可能反映原居民的真實意願。市建局根本不想知道原居民的真實意願。

3.2 由於發報計劃時沒有簡介會和交流提問，當街坊之間的討論和理解多了，反對計劃的人數增多了，這可從 7 月 6-7 日的簡介會中的氣氛和提問客觀地反映出來。有理由地相信現時反對的人在增多了。

3.3 報告說有超過一半人贊成是很取巧片面的說法，首七天大部分的街坊還不知發生什麼事，甚至在全沒有任何資料下，在凍結人口調查當天，就要接受電話問卷調查，回答的準確度成大問號，這是很不負責任的所謂調查。

3.4 很多街坊表示，不反對絕不代表同意，因為沒有資料，根本沒法決定，需要知道更多的收購細則及賠償條件，才能決定。所以如果市建局以沒有反對當作同意，是嚴重扭曲實情，是非常不負責任的調查結果。

3.5 市建局的三場簡介會，在在反映出街坊居民的疑惑，憂慮，無奈，不滿及憤怒。居民的疑惑得不到合理的回答，大家對這個重建計劃的失望表於臉上，有些街坊也質問市建局對原居民強調這個計劃重建後有多好多美，究竟對原居民街坊有著什麼關係，是企圖讓大家心生悔恨將會痛失家園？為了滿足這個市建局所謂的美好計劃，我們所得到的就是被逼遷去啟德或以外的公營房屋，或自行外邊找，完全沒有考慮我們可以留在原址，見證重建後的成果。

3.6 市建局及有關政府機構，應該明白落實和推行政策和計劃是需要多與受影響人士溝通，了解實情，不是憑空一兩個問卷或一兩下電話問答，隨便編寫一些數據就能解決的，希望計劃的主管當局能再多安排交流會，坦誠交流意見，增進了解。

3.7 城規會辦公室展示本 CBS-2:KC 市建局第一份評估報告的市民意見，區內區外反對人士佔大部分，且發現大部分除了反對計劃的對周遭環境的衝擊，很多都是不滿市建局的不公義處理方法，資料嚴重不足及不清楚，當中不滿及投訴市建局報告歪曲實際情況亦不少，譬如樓宇及環境狀況，即使有些不持反對意見的，也強調要看賠償方案而定；市建局第二份報告不單忽略了這些，且更沒有列出居民的有哪些反對意見，有哪些重大疑問，如何跟進或解決，都一律躲避；只單憑對本身有利的數據來說明大部分支持這重建計劃，完全有欠公允。

3.8 市建局的咨詢都是虛假的，居民提出的訴求，之前居民反映給城規會意見，市建局不可能不知情，但第二份報告卻選擇不理會，仍然是罔顧事實。**我們居民重申聲明，2020 年 6 月 19 日之前入城規會的第一份意見書所有的問題及意見仍然有效，市建局一直沒有解決，懇請城規會依然記錄在案。**

4 <u>市建局的重建計劃是在製造社會問題、家庭問題、個人精神情緒問題</u>

4.1 古人有說：老有所依，幼有所養。能幾代同堂是中華優良文化的傳承，除了經濟上可以互相扶持外，家庭倫理上特別是有長期病患的長者，得到家人每日的悉心照顧，長者的心理情緒質素，都會比長年鬱鬱寡歡在安老院理想得多，社會老人問題也得以舒緩。合作社的單位面積才有這個條件容納一家多口住在一起，現在的重建計劃把這些家庭拆散分開居住不同細小很多的單位，老人家被逼與同住的兒女子孫分開，談何提高本區原居民的生活質素呢？政府為了增加房屋供應，竟然不假思索地破壞原有美好的社會及家庭的結構，不予保留，飲鴆止渴！

4.2 成家了的年輕一代，除了可以照顧同住的父母方便外，自己兒女在本區的優良校網，大部份學校是在步行範圍內，上學時毋須用上交通工具，節省不少交通費用，老人家閒來也可有弄孫之樂，這

不本是政府希望社會可以有這樣的和諧氣氛嗎？被逼遷離本區對原居民子弟上學肯定帶來不便，嚴重影響他們選讀中小學及幼稚園學生的校網，完全打亂了父母為子女的教育計劃。

4.3 這重建計劃把相當數目的幾代同堂的家庭拆散，影響衝擊著家庭的生存能力和生活質素、長者的家庭生活、長者的住宿問題及長者的精神打擊，對社會及政府會造成潛在的隱憂。

4.4 市建局第二份報告的平均年齡是偏高，比不少社區還高，代表這一區的長者對居住環境適應力比較弱，突然的轉變對這群老人家的打擊最大，很多現在已經開始活在惶恐的未知數當中，很多街坊都認為這個重建計劃是在虐待折磨老人家。

4.5 這個重建計劃正在醞釀這一批批的社會問題，長年退休公務員的經濟問題，合作社員及家屬的住屋問題，家庭給拆散的問題。

4.6 不少街坊都說已經兩個月受著情緒的困擾，即使較年輕的也為了應對這個收購計劃的潛在問題，惶恐不得終日。這個重建計劃未見其利先見其害，跟市建局推廣說將來重建後有多美好成非常強烈的對比。

4.7 城規會的公開意見書反映出普遍是反對的聲音較多，當中不乏有影響區外的人士。支持的，僅說有五十年樓齡、沒有升降機、誤以為會倒塌、可增加樓宇供應量等等；相反那些有深度理據看法的反對者顯得有份量和實在。

4.8 在簡介會中，解說者在介紹計劃和解答提問時也承認本區的公務員樓宇狀況是良好的，計劃只是因應行政長官於 2018 及 2019 年《施政報告》中，宣佈邀請市建局物色一至兩個適合作高密度發展的公務員建屋合作社地段作為重建試點。試點計劃選址標準，市建局更說明是因為看中本地段的有優厚發展空間潛力，所以這才是重建的最重要理由，跟本區原居民的福祉沒有扯上任何關係的！。

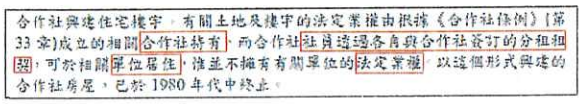
4.9 眾多城規會意見書中，包括區內外人士都指出，試點以外的土瓜灣區有許多樓宇狀況非常差的，為何不積極重建；難得五十年樓齡的樓宇保持新鮮面貌和狀況良好的公務員樓，無理由要把它拆丟。有意見更質疑為何同一地段的落山道至美善同里的一段公務員樓宇不納入重建範圍，該段的樓宇外貌和環境狀況反而不及本試點，但也同樣位於土瓜灣地鐵站出入口的旁側。以整體規劃設計以言，這一段更應該要納入本次試點計劃的範圍內，是市建局擔心會遮擋半山壹號景觀而受到強烈的反對？還是那一段的美善同道沒法改變為步行街，因而沒法大幅增加樓面面積而放棄？

5 <u>合作社公務員的房屋福利有受到基本的保障？</u>

<u>公務員事務局必須要面對的問題</u>

5.1 CBS-2:KC 是試點計劃，牽涉附帶房屋福利的公務員樓宇，有別於一般私樓收購。遺憾地市建局顯然沒有與公務員事務局好好溝通，如何處理受影響的公務員，包括在職的、退休的以及遺屬。計劃書中只沿用市建局以前的方法，都是應對一般私人舊樓，只是現金收購或「樓換樓」計劃方案，

更竟然沒有在過度期提供無縫無償的住屋安排，今次計劃更完全忽略原居民原有生活方式而沒有提供原址原大安置方案的選擇。

5.2 
合作社與建住宅樓宇，有關土地及樓宇的法定業權由根據《合作社條例》[第33章]成立的相關合作社擁有，而合作社社員透過各自與合作社簽訂的分租租契，可於相關單位居住，惟並不擁有有關單位的法定業權，以這個形式興建的合作社房屋，已於1980年代中終止。

公務員事務局書面回覆馬議員信件中，其中“...與合作社簽訂的分租租契，可於相關單位居住，惟並不擁有有關單位的法定業權。...” 是在用很取巧的說法避重就輕來傳達不全面的訊息，更企圖嚴重扭曲事實去誤導未散社分契的社員，說對該單位沒有法定業權 ，卻偏偏不清楚地說明原居民的社員，無可置疑地透過合作社集體擁有整塊地段及建築物的法定業權。

恰如一家 A 公司買了一塊地投資起樓，建成之後股東分別以租住形式享用相關單位， 這些股東於所居住單位雖沒有法定業權， 但切切實實地透過 A 公司集體擁有該塊土地及建築物的法定業權。

散社分契就彷如這家 A 公司要解散分家，清楚界定各股東自己所擁有的權益。

5.3 合作社員從來沒有交過任何租金給合作社的，只有把貸款還給政府，這根本與平時說的私人樓宇租客性質完全不同。原來單位的租客可以隨時搖身一變成單位業主，非常不可思議的。市建局的報告中一直都把未散社的社員稱為 owner 業主，證明這是政府的認知所有合作社的社員都是業主，並非租客；如果是租客，市建局為何要以樓宇的價值來作賠償呢？多麼的自相矛盾！

5.4 如公務員事務局所說從來沒有業權的話，那何來會經過分契就馬上有了法定業權？那業權的源頭是從哪裡來的呢？聽去非常不合邏輯。為何事務局不能直接說明是業權的形式不同而已，只是從本來集體透過合作社擁有整塊土地及整棟大樓的業權， 只是暫未有特定擁有哪一個單位業權， 經過分契手續轉為對該單位有著法定業權。不明白為何公務員事務局不能光明正大清楚地直接說出實情，這些不是不可告人之事，好像沒必要用拐彎抹角的方式來回答。

5.5 從公司分家的概念來看， 更覺得當年港英政府在散社分契時強行添加補回地價條款是不合理的，是不公義的。計劃中未散社的合作社中是佔三分之一，未散社的舊契約與散社分契後的有很大差別，原舊契沒有任何補地價條款，且清楚列明地價已經付清，沒有任何欠款。未散社的社員都很抗拒散社時被強迫加入補回三分之二地價的不公平條款。 已散社的社員現時得悉當年散社分契的時候，是糊里糊塗給強逼加入這不公平條款，現在很多感到後悔悲憤。（見 6.1）

5.6 街坊大家都一致認為要補回地價，就是把幾十年來的房屋福利，完全放棄，社員會樂意接受嗎？這仿似政府於幾十年前暗地裡在各公務員身上投資一筆錢，經過長年的滾動後，到了現在連本帶利收割回去，合作社公務員好像在這幾十年間只替政府暫時保管著這筆錢，什麼費用都沒有收取，現在被強迫把一切的本息都歸還給政府，同時要放棄原來的美好居住環境，被逼搬往住公營房屋。

5.7 當年建屋時批出優惠地價時，各合作社公務員都清楚明白是需要放棄其他房屋福利而換回來的，同時清楚明白這個優惠地價是一次性批出付清，並沒有未付款項的，在舊契約都非常清楚寫明的。聽父祖輩們於 1985 年前的 20 多年裡一直認為是地價已經付清，優惠地價是相等於合作社公務員的房屋福利，讓社員可以得到一個永久的居所。

5.8 直至 1985 年之後才陸續聽到父祖輩們失望說，政府或要社員補回之前優惠了的地價，彷如在商店買了一件特價優惠商品，店家過了一段時間跑來要求拿回之前優惠了的價錢，這不是在違反本來的買賣合約精神嗎？ 當年為了這件事情，社員跟當時港英政府有過不少的爭論，按常理來看，難道全港所有 200 多個合作社中 5000 多位的會員，在買地建屋時候都是同樣那麼不明不白、糊里糊塗地錯誤理解了，而不知道優惠了的地價在將來是需要原數連價值升幅一起歸還政府的？如果當時清楚知道也會願意一起簽下那份不公平的買賣合約？難道 5000 多名香港政府公務員的能力差劣到這個水平，所有懵然不知簽下了不平等條約？按常理似乎是不可能的。但礙於政府財雄勢大，在法律爭辯中社員被逼放棄爭取了，留下無奈的遺憾，深感給港英政府違背當年買賣合約的承諾。這個令眾街坊居民都一直耿耿於懷，認為補回地價相等於遞奪所有之前所有的房屋福利。

5.9 不知當年港英政府為何在 1985 年後突然有此動作，聽去是不合常理的。這個問題留給了現在的特區政府，現政府應該需要特事特辦來處理前朝留下的大問題，務求能圓滿解決，以緩和公僕的關係。如國家主席有引用古聖的話：苟利於民，不必法古；苟周於事，不必循俗。

5.10 1961 年的文件中有一段：“This scheme is to provide local officers with an opportunity of purchasing their own house on a long-term basis.” 公務員本著長住久安現時仍是狀況良好的樓宇。這計劃是涉及公務員房屋福利和家屬，公務員事務局是責無旁貸，不能如回應九龍城區議會提問時與市建局互相推卸責任，應該與發展局互相溝通協調梳理問題。公務員事務局聯同發展局應該與受影響居民舉行交流會，切實和坦誠地交流意見和解答疑問。

5.11 希望在上位的官員，眼見著一群屬下同袍正在給掠奪私人財產，正在受欺壓折磨及正在被侵犯法例賦予的權益，能撫心自問及設身處地想想，那些辛勞一生的公務員，幾十年應有的福利，一剎那連本帶利無情地被奪回去，覺得會是合情合理的嗎？還是袖手旁觀或甚至落井下石呢？

6 <u>補地價的不確定性</u>

6.1 地政署給馬議員的回覆中

> 公務員建屋合作社（合作社）計劃始於 1952 年，政府以優惠價格批出土地（一般是當時十足市值地價的三分之一），讓當時合資格的公務員以合作社形式建屋，並可獲政府貸款支付地價及建築費。回應合作社社員要求，政府在

，這是極具爭議性的問題，如 5.5 所說，補回優惠了的地價，在原有舊契約沒有出現；更沒有寫明這是優惠地價；原有契約，清楚說明地價已經完全付清，並無說明有任何欠款或未完成的手續。地政署的回覆當中說明的“一般是當時十足市值地價三分之一”，那是清楚說明：

a.優惠價沒有一個固定幅度（也有些合作社說他們的地段是當時優惠了二分之一），證明優惠多少並不是當時制定契約的重要條文，只是以一個優惠價達成當時的土地成交價格。

b.當年制定契約時，如果港英政府認為需要日後補回地價，不會不在契約條文說明，更不會不把契約中的地價註明是特別優惠價；從而合約原意已清楚表明，那個是一次性付清的地價，沒有任何欠款了。1985 之後的指引添加了條款要求補回優惠了的地價，都是違反了當年的合約精神。

6.2 如果合作社的優惠地價，需要日後補回的話，不知當年批出給“數碼港貝沙灣”的優惠地價，是何時需要補回？他們的契約有否條文明確說明？還是等日後政府覺得需要時單方面自行添加條件？

6.3 地政署那回覆中「現有用途土地價值」的補地價為土地價值的三分之二，並加上合作社現樓及新樓市值的折讓比例（假設新、舊樓宇為相若樓面面積的同區或鄰近單位）。請參照（附錄一）例子的計算方法。附錄這個計算方法包括重建價值或現有用途土地價值，有很多不確定性。如何取樣？如何評定？現樓與新樓是否以相同標準來評估？這些因素影響估價結果差距可以非常的大。地政署估算出來的地價，一般市民有否上訴機制？是地政說多少就是多少，公平與否，平民百姓是不能有異議？

（甲）以「重建價值」基礎計算作簡單說明	（乙）以「現有用途土地價值」基礎計算作簡單說明
$\frac{2}{3}$ x 樓面地價（$100,000/m²）	$\frac{2}{3}$ x 樓面地價（$100,000/m²）x $\frac{\text{合作社現樓價 \$90,000/m²}}{\text{新樓樓價 \$180,000/m²}}$
= $66,666/m²（樓面面積）	= $33,333/m²（樓面面積）

6.4 上述地政署 6.3 的附錄例子，不知地政署心目中這個例子離真實情況會是多遠，例子所反映出來的，不得不令我們原居民非常心寒。

例子中雖說以重建發展價值的三分二計算，但地政署選用非常高昂的$100000/平方米，把我們當成真正私人發展商一樣看待（但我們得不到發展後的得益！），

現樓價錢壓低為$90000/平方米（是為了替市建局的開價鋪路？），

新樓價錢更加不切實際地嚴重大幅壓低為$180000/平方米（企圖把比例分母大幅減少，令折扣率也大幅減少），

所以打了六折再加一個折讓比例後的補地價依然維持很高價錢，一來一回，要補的地價仍然要$33333/平方米。

現樓價的$90000 減除補地價的$33333 後，得到$56667/平方米，以一個 1000 呎的合作社單位，原居民只能得到約$610 萬的賠償！就算市建局說有什麼特惠賠償，但已說明這個特惠賠償是不可爭議的，市建局要賠多少就是多少。

從這個例子得出，最後原居民只得到幾百萬的賠償。本來居住在一個實用 1000 呎的單位，市建局只賠償幾百萬,如何能在同區買到 1000 呎的單位呢，也不知能在香港哪裡可以找到？連將來增加的種種費用如管理費，市建局也全然不理，一個重建計劃，如何提升我們生活質素？是實實在在掠奪我們的財產，企圖把原居民欺壓變成難民！

6.5 補地價爭議性及不確定性很高，也是絕大部分街坊居民所擔心，一生打拼的，祖上辛苦留下的，有可能被這個高昂的補回地價及市建局的低賤收購價頓時成為被遺忘的弱勢社群，恰如合作社難民。

7 市建局須正視是來收購整體發展權，絕非一般樓宇買賣交易

7.1 大部分舊契約都有註明發展的高度限制為 300 英呎 (樓高 80 米高度範圍內)，根據現時建築條例，我們的地段有很多剩餘發展空間的，現在市建局主動來收購改建，除了要購買我們原來已佔住的空間，再加上那些還沒發展的剩餘空間，包括高空及地面下的部分，這些剩餘空間才是整個計劃最核心及最有價值的部分。

7.2 再加上所有合作社地段都被收購後，計劃中的步行街實現了，所有地段融為一體時，那段美善同道及江蘇街連同相關的橫巷及後巷面積也被納入為項目地盤總面積，整體地段一起發展，大幅增加重建總樓宇面積跳升超過原有的三分之一，這些全都是原居民擁有的剩餘發展權益。

7.3 所以市建局不單收購我們的樓宇硬件單位，主要是收購我們的整個地段的原有及將來大幅增加空間的發展權，市建局需要認真正視，他們是來作地段發展權的收購，絕非單純樓宇單位買賣的交易，漠視原居民的應有權益！請不要再故意作糊塗，來欺騙我們原居民。

7.4 這些最有價值的剩餘空間，就算私人發展商來收購，根據原來舊地契所需要的補高空並不多，所以如果發展商主動收購，慣常願意替業主處理補回那極具爭議性的三分二地價。且更有部分發展商的慣用方法，把發展後的得益的其中部分與原居民分享的或以現金補償方式。

7.5 這個所謂三分二地價，都包括了那些剩餘未發展的空間。大部分的我們從沒想過要出賣自己的祖屋家園，今次的重建計劃，由市建局主導計劃，是主動的買家，卻無理要求原居民先補足地價，然後民把一大塊地段拱手給市建局發展獲取豐厚利潤，及後居民自己卻不能享用任何重建的成果，聽來會是合理嗎？

7.6 市建局既然要收購原居民的發展權，加上因步行街的產生所增加的大量樓宇面積，市建局責無旁貸實施適當的特別補償金來完全抵消那具爭議性的補地價。按市場交易原則道理，主動買方要承擔和補償賣方的一切損失。

7.7 市建局回覆馬議員的信中，計劃的特惠補償金額不可爭議，是極不公平，且當居民不接受，威脅可以用收回土地條例，那就是說市建局要給居民多少就多少，這個是極之強橫的手法。

7.8 CBS-2:KC 試點計劃絕對是發展權的交易，計算補償方法，絕不應該單用市建局說的沒景觀及低層的七年樓來估價，排除一切優質物業作參考，會嚴重低估該地段的應有價值。市建局只在一心想以用石頭換取我們手上的黃金，絕不是為民著想的政府應該做的事。

7.9 大部分居民沒想過要出賣自己祖屋，說如果市建局要得到用來發展，應該開出合理條件，給予我們真正想要的，來換取市建局所想得到的黃金地段，不要用市建局以往的所謂慣常方法，什麼多少年樓，一大堆街坊居民看去都不明不白的方法。簡單地說就是給予不差於現時的原址原大單位，期間及入伙後因計劃影響所產生的一切費用。很多街坊說他們想得到的只是原來的家園！（見 11）

8 賠償須要全面性考慮方面

8.1 市建局第二份報告指出原居民平均收入也是偏低的，主因是這裡住著不少退休已很久的公務員，都是靠多年前的發放原月薪的三分一退休金度日，生活本已經說不上寬裕，但住在原址卻可以解決香港最大的住屋問題，房屋及有關的支出是生活上的最大開支，現在的重建計劃偏偏就是衝著社員住屋問題而來，打擊層面之大超乎大家的想象。但市建局的賠償建議都是偏向吝嗇刻薄，眾街坊都不能接受!

8.2 計劃形容重建後究竟對我們這一群街坊有什麼好處呢？我們能分享重建後所謂的美好成果嗎？還是只能當作過客回來舊地重遊，緬懷一下，唏噓一番呢？ 這些都是政府的部屬及其家屬，市建局及政府難道不應該好好對待這一大批年長者嗎？有設身處地替他們想想，應該如何安排他們的住屋問題嗎？

9 如何運用全港合作社土地資源-發展局需要面對的問題

9.1 大部分合作社的地段，當年都是偏遠的農地，地段價值不高，當時港英政府用它來安置部分公務員，讓他們能自置物業，安居樂業，為香港發展作出貢獻。當年大家欣然接受計劃，甘願放棄一切其他的房屋福利。誰會想到是大家的計時炸彈，當地段發展成熟了，變成搶手的黃金地段，政府卻忘記那群公務員的基本合法權益了，只一心把他們趕離開原址後，賺取極豐厚的發展利潤。

9.2 近年政府為了增加土地，費煞思量，從收回棕地遇上發展商的巨大阻力、新界地原居民的強烈抗爭，本來不感興趣的公務員合作社地段，頓時成為奇貨可居的發展地盤，可以釋放出大量的市區住宅及商業用途發展空間，但礙於合作社有著一些港英政府時代留下來的束縛及問題，令重建發展舉步艱難。

9.3 大膽建議政府嘗試轉換一下思維，或許可以解決這個問題：

現時全港大約有 220 多個公務員建屋合作社項目，包含約 5100 個單位，總面積約為 30 公頃，即是相等於接近 45 個國際標準足球場，的確可以釋放出大量住屋及商業零售空間的。如果補三分之二地價以每戶 600 萬來算，5100 多戶合作社單位，總數約 300 多億；如果政府不堅持收取這個極具爭議性的補地價，賬面價是少收 300 多億，雖然這不是小數目，但對整體庫房也不是一個很龐大數目，且這並沒有真金白銀虧蝕出去的，無損原來儲備。古人有說：財聚則民散，財散則民聚；為政者對人民有惠德，民心自然歸向，反之則民心背向。

少收這一部分卻能有效率地、順利地釋放出來的大量樓宇發展空間，在發展後所得的補高空、印花稅及各種有關的收費，政府收入也仍然是非常龐大的。與此同時，因前朝港英政府留下來這房屋福利問題，一直困擾合作社公務員多年的心中鬱結也得以解決。

9.4 當中是會延伸一些問題，如之前已補地價的業主如何處理，這些佔全部的比例也相對小，可以用特事特辦來處理，只要政府不是單為了庫房收入，多為民著想下，方法總能想出來的。

9.5 私人發展商主動收購合作社慣例是會負責業主的補地價，更何況市建局的項目都是獲豁免補地價的，有著這個絕大優勢下，是最方便來處理這個極具爭議性的補地價問題，讓政府及公務員相方都能得到雙贏的結果。

10 街坊的普遍訴求

我們應該有提出收購價和條件的權利和機會，經協商後，城規會和有關當局才考慮批准計劃落實，這是符合公平原則。倘若計劃強行落實，安居在本區受影響的居民要面對本無必要的深遠經濟打擊，市建局以至政府有道義上的責任，承擔居民非意願的開支和損失，這是符合公義原則。訴求計有而不止限於：

(1) 安居於斯的居民本無意出售，因市建局主動收購，應負責全部的補地價；

(2) 必須有原址安置 (建回原大相若單位) 的選擇和安排；

(3) 有無縫和無償的過渡安排，例如暫住原居所免租直至搬入替代居所；

(4) 有被剝削房屋福利的賠償；

(5) 以現實鄰近相若樓宇因素的市場樓價作估價賠償；

(6) 賠償金額要在簽買賣確認時發放，以便有能力和及時購置代替物業。（避免周轉問題）

2018-2019 年施政報告，只是邀請市建局物色適合的合作社地段作為重建試點，並非試點去破壞一個本來美好的居住環境， 並非試點去如何虐待折磨老人家，並非試點去違背市建局的一貫宗旨， 並非試點去實施不公不義的收購程序，並非試點去強迫原居民賤賣自己的資產， 並非試點不顧原居民應享有的權益，原居民沒有意願要出讓， 我們所需要的是原來的家， 過著本來很安寧的生活，懇請市建局的食指離開我們這片土地， 這裡不是適合的地點作你們重建試點！

11 原址原大安置方案

11.1 評估報告書 (第 11 頁) 指出 85% 共 363 戶居於斯已有 21 至 50 年以上，若被迫遷，(第 13、14 頁) 超過一半以上的住戶意願在本區繼續居住，單位大小與現有相若甚至較大 (相信是幾代同堂的家庭) 的較新單位。但評估報告書只是輕輕說出，但沒有就這些收集回來的數據建議可行的以人為本的原址安置方案。

11.2 在簡介會中，有建議提出原址原大安置的方案說法。由於大部分本區街坊居民是極不願意離開這個生活了幾十年有街坊感情的社區，提議的方案給予街坊居民多一個選擇。既然是試點計劃，應該以新思維新方法去突破原有框架去應對處理。重建首要重建本區居民的家園，讓原居民能在原址原大地方居住，這是居民對“重建”的概念。所以如果政府真的有誠意推行這個試點重建計劃，須要優先認真照顧原居民的權益，最大程度能維持及保障原來的生活方式不變，這才符合“重建”的真正意義。如果強迫大家離開本址，改建發展為另類的房屋給外來人士，只不過是“迫遷”。該建議在計劃藍圖中的公營房屋部分，用作為蓋建兩座面積原大的單位樓宇，安置原居民，並且在過度期提供無縫無償的暫住安排，實現「以人為先」、「地區為本」。當時席間馬上響起熱烈的附和掌聲，這些掌聲在在說明街坊居民的真正意願

11.3 市建局的宗旨是以人為先，地區為本，與民共議，不知市建局計劃之前做了多少調查，有否真的了解計劃內的街坊居民需要些什麼，以什麼調查報告依據來準備這份重建計劃書？ 這個重建計劃偏偏是缺少原址安置的方案，這是很多街坊居民所渴望的，他們希望能留在原址，有著一樣大小的單位，維持原來的生活水平，社交，醫療及學校網絡。

11.4 街坊居民大部分極不想離開本址，不少只希望維持現狀，表示如果市建局真的要發展這一區，必須要優先照顧原居民的原址原大居住權益。

11.5 附上的原址原大方案建議，已經在街坊關注組流傳，得到不少街坊贊同，唯一疑問及擔心是市建局是否願意體恤原居民的心願意向，認真深入研究該方案的可行性。

11.6 原址原大方案概念，是我們所有社員一起擁有整大片不間斷的地段，也正因為這個原因造就市建局步行街的想法，而使地盤總面積增加超出三分一之多。然後把整大塊地分割，其中約三分之二歸市建局發展私人樓宇之用，餘下的三分之一，與所增加的地盤面積相若，留著給原居民原址蓋建原大安置房屋。

11.7 原址原大方案的兩棟安置之間的分隔距離，比市建局建議的公營房屋大，屏風效應會明顯降低。

11.8 安置屋的地盤面積本來是從合作社整體地段衍生出來的，這些是無本生利的部分，用來原址安置我們，取於斯，用於斯來安置原居民，維護我們原有權益，是很合理的，同時不會造成市建局在財政上的額外壓力，是最理想不過的。

市建局原來的地盤不變，絲毫沒有減少他們原來的收入。很粗略估計，以正常地產市場溫和升幅來算，將來市建局地盤商住部分建成及全部售出後，收入可有接近 300 億，之前媒體報道市建局預算給居民賠償總數為幾十億（這個賠償金額不可能令居民滿意的！），用幾十億換來近 300 億的收入，有著多麼豐厚利潤，市建局確實有很大的空間給原居民寬鬆很多的條件。

11.9 公營房屋用來安置外來人士，選址的靈活性本來可以很大，不是非要在我們這片地段上不可的。CBS-2:KC 地段本來是我們合作社街坊所擁有的，我們原居民的居住權及財產擁有權因重建計劃將會給嚴重剝奪，政府及市建局反而更應該最優先留給原居民蓋建原址安置房屋。有想到預留空間給公

營房屋安置外來人士，為何沒想到優先考慮原址安置受計劃影響及衝擊的原居民呢？那不是本末倒置嗎？

11.10 在方案計劃書當中的公營房屋位置，用作為合作社原址安置房屋，單位主要以 1000 呎實用面積為基本，建築面積約為 1200 呎，或大或小，以原計劃公營房屋地盤面積，足以容納原區所有 462 戶合作社單位。

11.11 很多街坊的原址原大安置房屋意願是，建屋標準只需要有房屋協會的建造水平，有適當的綠化地帶，室內外活動空間及適量康樂設施，不需要豪華裝修及設備，一切以實用為本。

11.12 這個方案可以有無縫交接的安排，粗略的計算，建築期的租住及有關的津貼費用、新屋入伙津貼、將來管理費增幅的補貼、再加上建議的市建局特別補償金來完全抵消原居民的補地價，市建局動用成本的總金額遠遠低於現金賠償所用的金額。

11.13 這是市建局稱為“試點”計劃，是因為市建局從沒有收購公務員合作社的經驗，很多情況與之前的項目不同，所以不能困在之前原有的框架套路方式，要有新思維去面對不同情況。過往有私人發展商參與合作社重建發展，雖然為數不多，但大部分都有很不錯的口碑，這些成功例子市建局是很值得參考的，加上市建局項目是獲豁免補地價的，更有寬裕條件處理一些具爭議性的問題，例如負責補回三分之二地價。

11.14 請市建局、公務員事務局及地政總署考慮此項目乃公務員合作社重建的試點，與私人樓宇不同，在於公務員房屋福利不能被剝削 。各相關部門應該平等對待合作社社員及家屬，這是公務員唯一的長期住所及有可長遠傳承給後代的條約,

此項目不應視為我們要主動賣樓, 應是市建局計劃要換取/收購我們安樂居的發展權益及其周遭相關公共地方的地權, 例如馬路, 後街小巷，繼而增加巨大發展空間。

11.15 如果能有這個安排，的確是以低成本就能做到”以人為先，地區為本，與民共議”

CBS-2:KC 重建發展項目計劃，並不受很多街坊居民歡迎，且覺得非常擾民，市建局應該認真聆聽原居民的真正需求。大部分居民是極不願意出讓單位，更不想搬離原居地。所以如果有原址原大安置方案，很多原居民願意作出考慮，希望市建局能認真考慮研究，作出利民的政策。

懇請市建局回歸原來創局精神，主要幫助市區真正有需要重建的項目，從而增加房屋供應；而不是為發展商作收地先鋒，用盡遠比發展商卑劣的手法，以求將來一起發地產大財！

在現階段，一切未確定的情況下，根據以上所陳述重建計劃那罄竹難書的弊端，更重要是市建局在沒有公佈確實的賠償方案數字及細節，卻要求街坊居民接受他們的計劃及收購，我們不得不強烈反對 CBS-2:KC 重建發展項目計劃！

懇請城規會否決這個不公不義的重建計劃，基於這計劃報告書充滿失實的陳述來誤導城規會，充滿著不公不義的程序及手法來欺壓及折磨本區的街坊居民，這計劃目前只是在破壞環境， 掠奪市民財產，劫貧濟富，剝削居民法例賦予的權益，主動製造更多的社會問題！

如果政府及市建局堅持用這地段作為重建試點的話，必須考慮包括上述的“原址原大安置方案”，重新提交城規會審批。

此致

受靠背壟道/浙江街重建項目影響公務員暨家屬

2020 年 7 月 28 日

副本致：

市區重建局　香港皇后大道中 183 號中遠大廈 26 樓

**--原址原大安置方案計劃書請見以下“附錄”

附錄

CBS-2:KC 重建發展項目計劃

原址原大安置方案

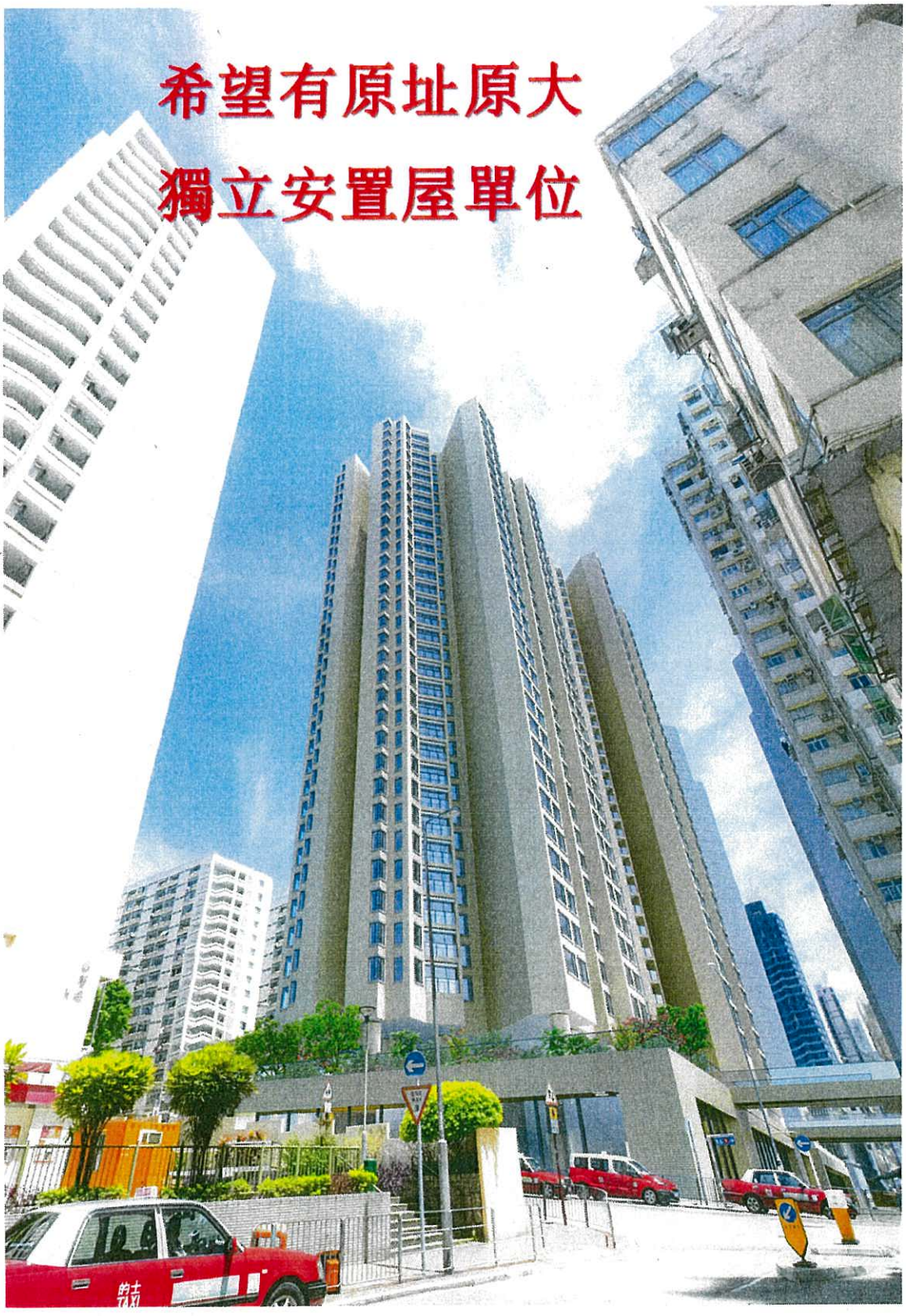
懇請市建局認真正視

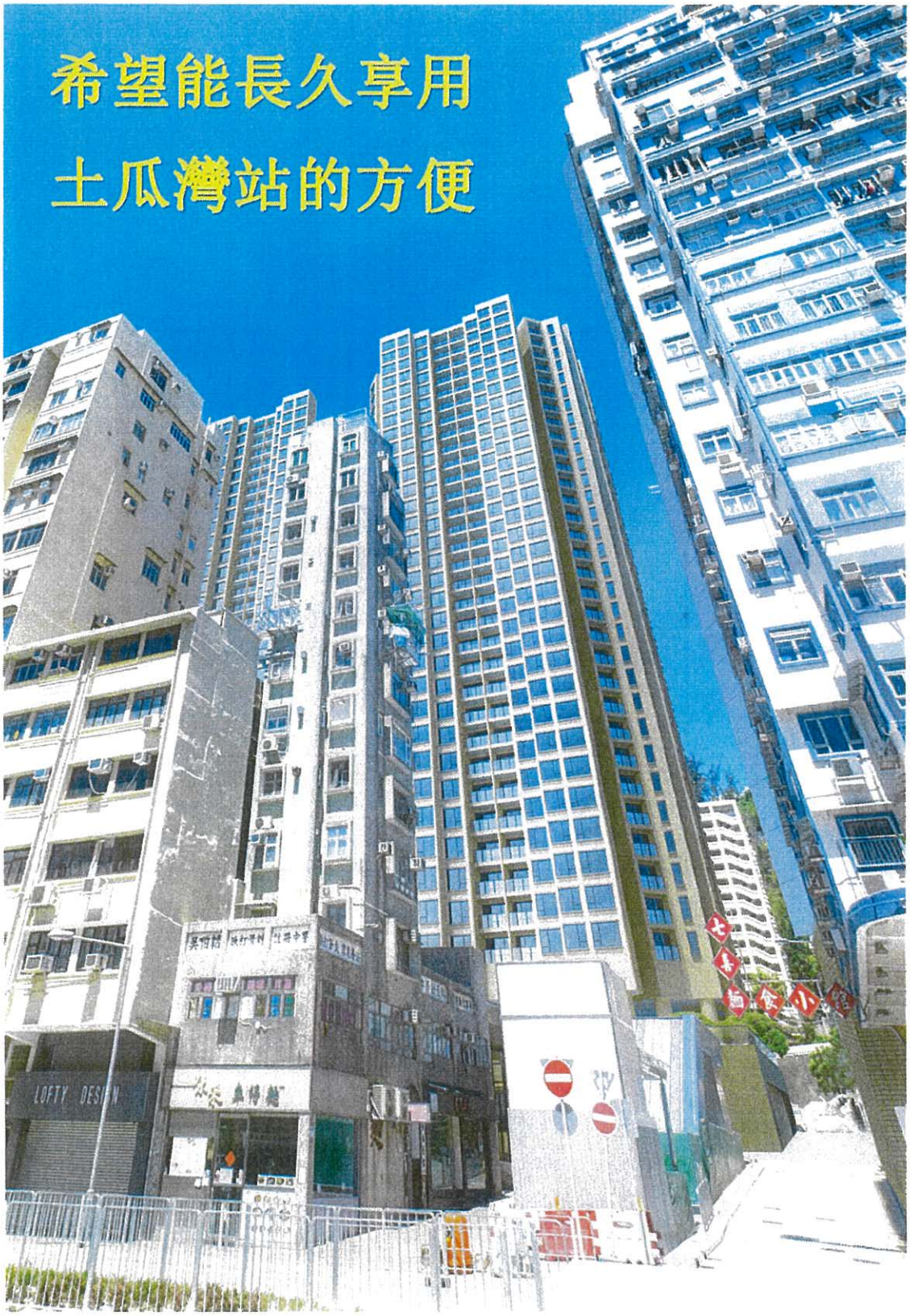
本重建計劃

是整體發展權的收購

絕非一般的個別樓宇買賣交易

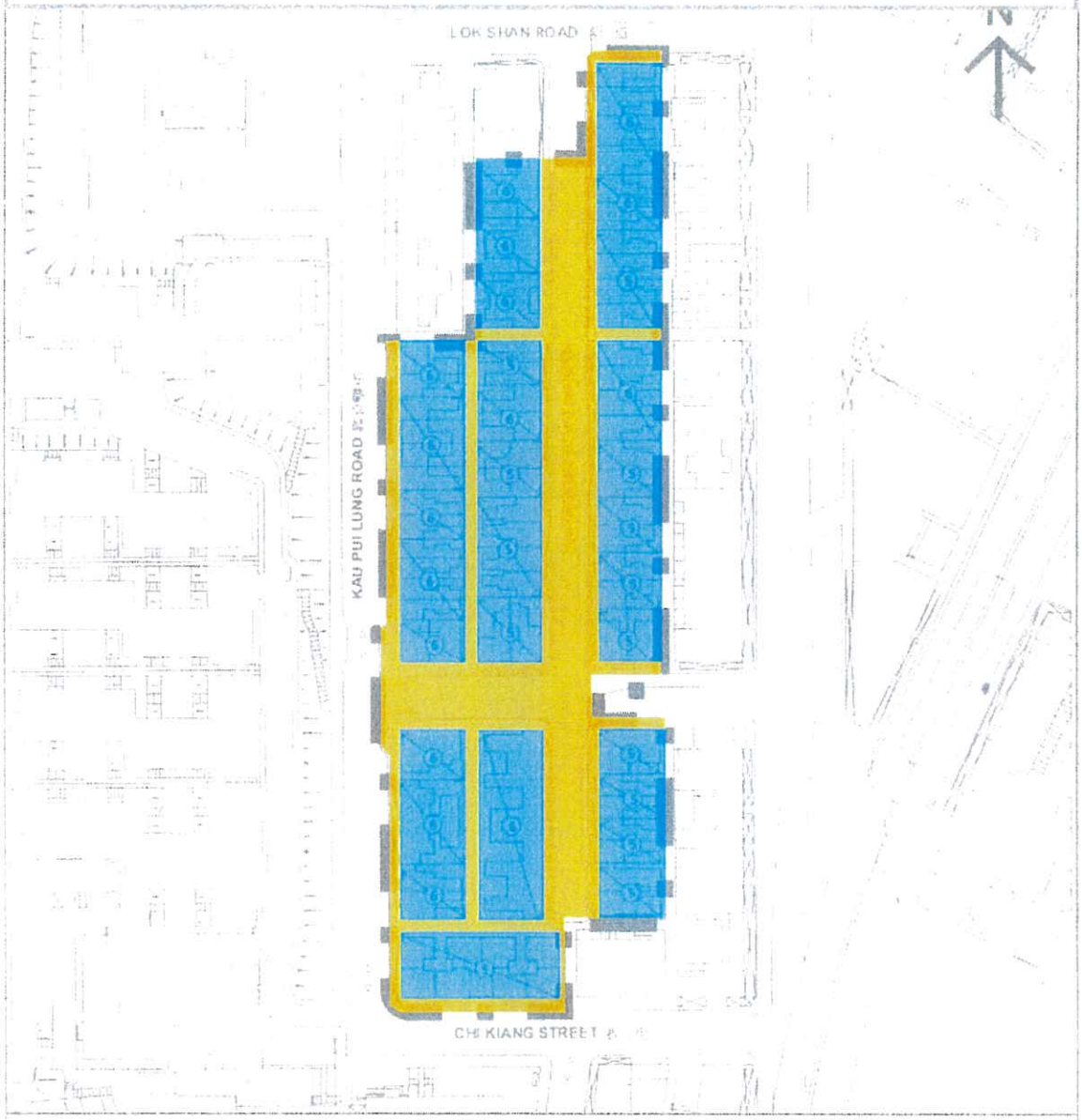
保障原居民的應有權益


希望有原址原大
獨立安置屋單位


希望能長久享用
土瓜灣站的方便
LOFTY DESIGN

希望可以分享
重建後的成果
原來有的方便

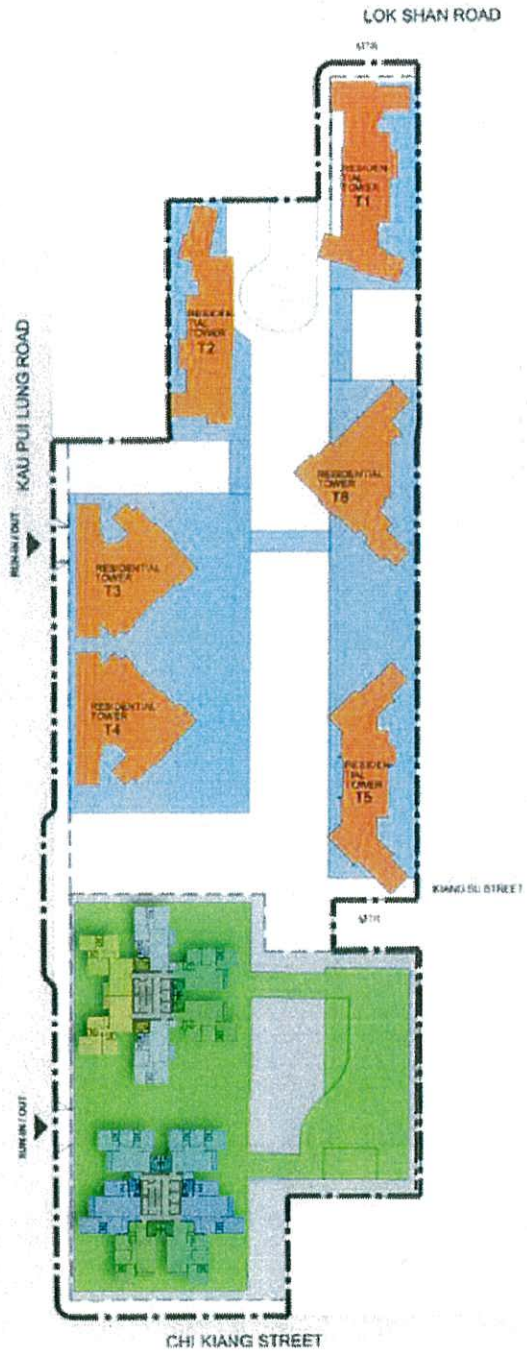
因原居民的全部地段而衍生出來的大量新增建屋土地，原居民理應有權分享重建後的利益。原址原大安置方案更是合情合理



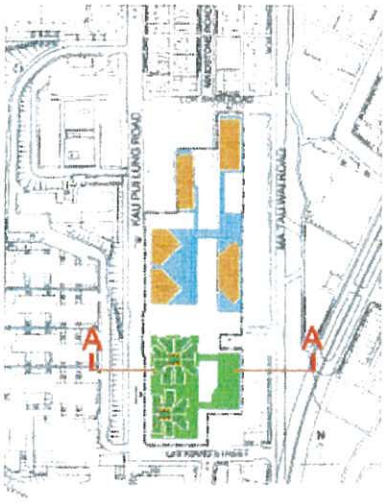
現有合作社地段面積範圍

收購全部合作社地段後，計劃地盤增加面積範圍，約現有1/3

收購後重建地盤總面積


LOK SHAN ROAD
KAU PUI LUNG ROAD
MA TAU WAI ROAD
CHI KIANG STREET
RESIDENTIAL TOWER T1
RESIDENTIAL TOWER T2
RESIDENTIAL TOWER T3
RESIDENTIAL TOWER T4
RESIDENTIAL TOWER T5
RESIDENTIAL TOWER T8

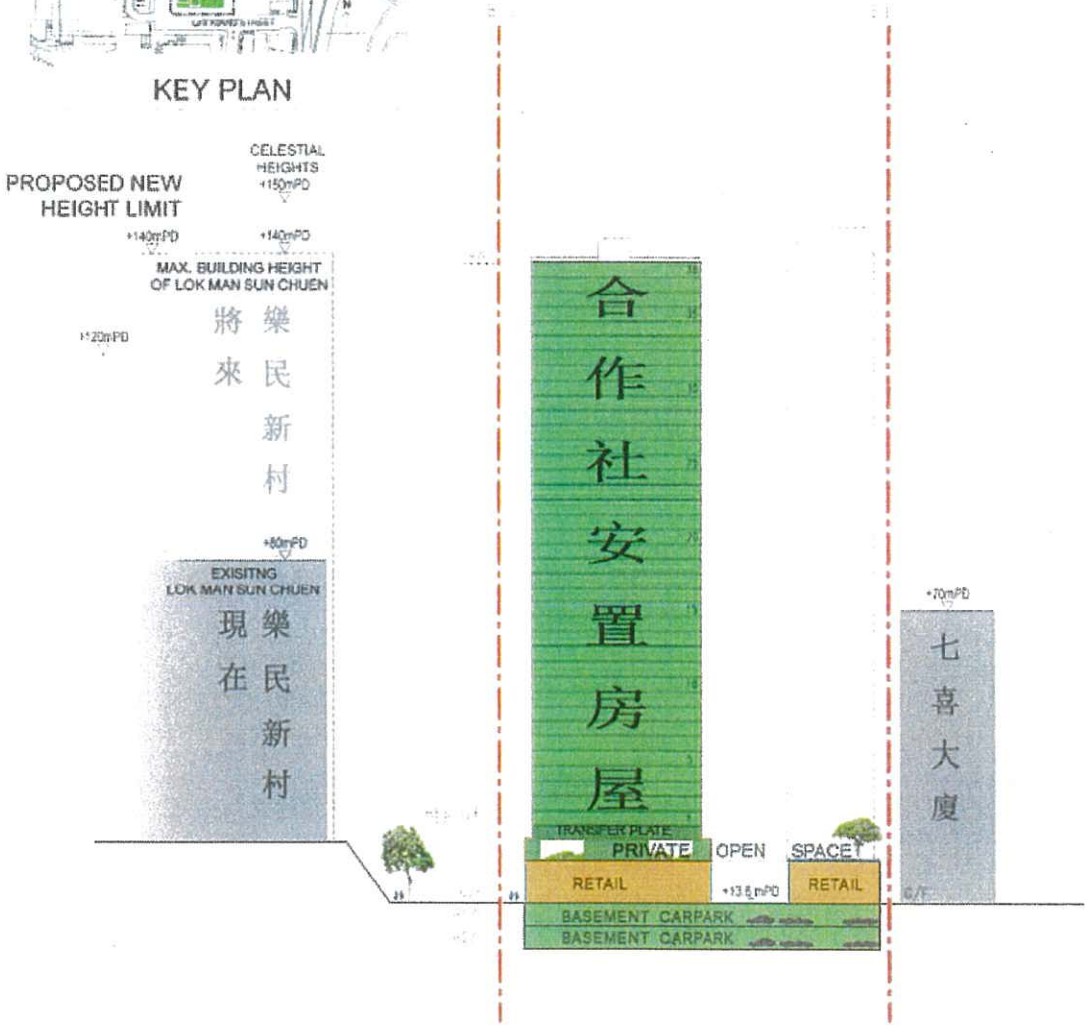
PLAN



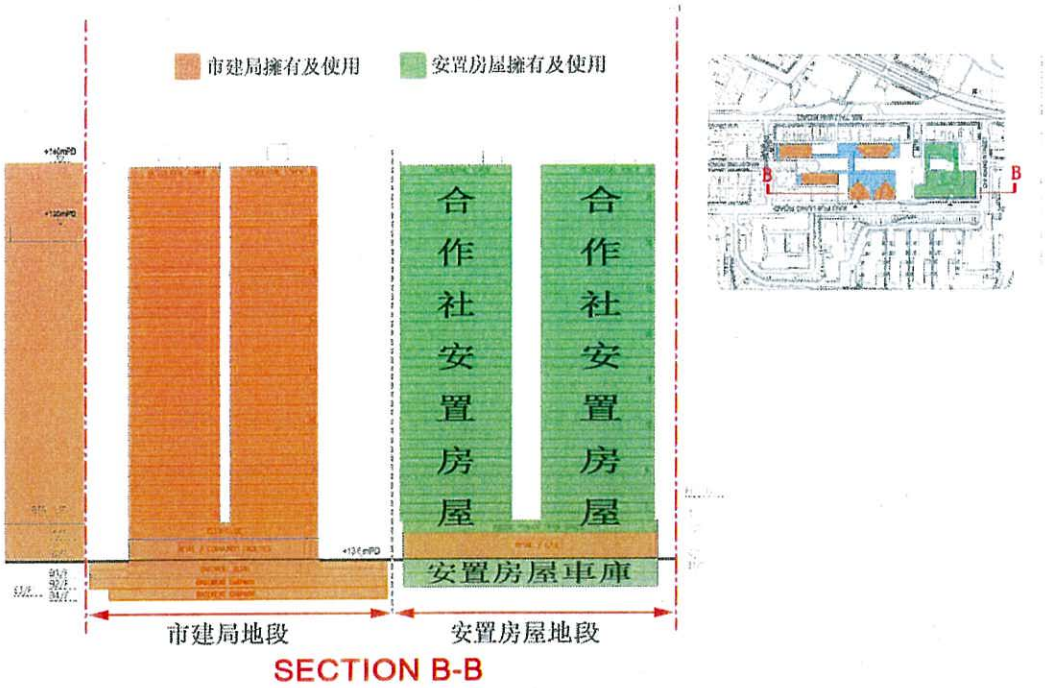
KEY PLAN

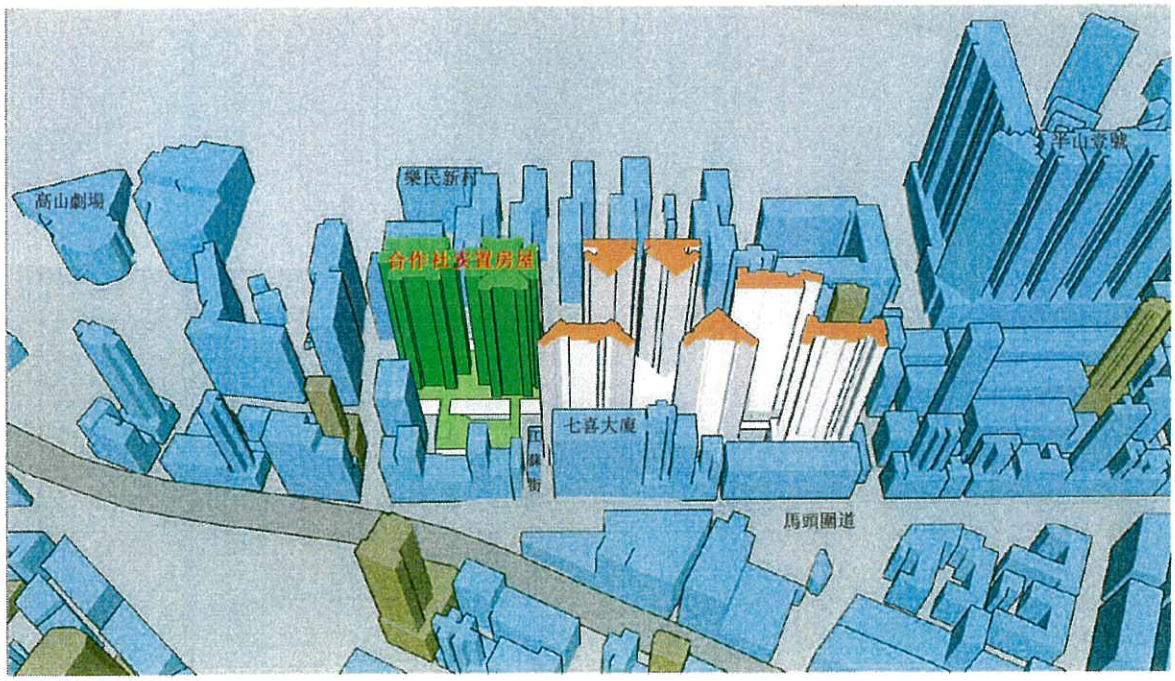
市建局擁有及使用

安置房屋擁有及使用

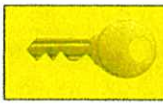


SECTION A-A


市建局擁有及使用
安置房屋擁有及使用
合作社安置房屋
合作社安置房屋
安置房屋車庫
市建局地段
安置房屋地段
SECTION B-B


高山劇場
樂民新村
合作社安置房屋
七喜大廈
馬頭圍道
平山豪庭

原址安置方案



建成取匙，收樓入伙

原址原大安置單位

不設轉讓限制

豁免印花稅及相關費用

+

5.5 年過渡期租金相關費用 = $2,640,000

+

搬遷回原址及新屋裝修津貼= $3,000,000

+

未來 35 年管理費增幅津貼 = $2,500,000

+

市建局直接付地政署

之前已補地價業主
直接收取特惠補償

市建局特惠補償，相等於補地價金額

市建局所需成本（每戶）--粗略估算分析

***兩棟 38 層高，一共有 462 個單位

*** 每戶單位平均建築面積 1200 呎（**實用面積 1000 呎** ）

*** 以房協單位標準（包括有地板，廚房及浴室設備）建築費=$2600

一個實用面積 1000 呎單位的建造價=1200x2600= **$3,120,000** （將來發展商會吸收）

*** 顧問費用（包括代表合作社的項目經理）=10 % of $3,120,000= **$312,000** （將來發展商會吸收）

*** 建築期間的暫租安置，一個月=$40,000 一年=40,000x12= $480,000

清場+建築期前後 5.5 年 租金津貼=5.5x480,000= **$2,640,000** （逾期入伙，另再增加補貼）

*** 其他搬遷、裝修及添置相關物品津貼大約= **$3,000,000**

*** 商鋪歸市建局擁有，以換取補貼將來 35 年管理費的增幅= **$2,500,000**

***該地段停車場歸安置屋居民擁有使用

*** 市建局額外補償，抵消業主的 2/3 補地價= 約 **$6,000,000** （新計算方法或會減少）

總數計算即是: 3,120,000 建築費

+ 312,000 顧問費

+ 2,640,000 暫住租金

+ 3,000,000 搬遷津貼

+ 2,500,000 未來 35 年管理費增幅補貼

+$6,000,000 2/3 補地價（新計算方法或會減少）

= $17,572,000 /每戶成本（其中建築費及顧問費 $3,432,000 將由未來發展商負責）

=**$14,140,000**

(A) 建議的 原址原大方案，市建局收購成本 = $14,140,000

(B) 原計劃的現金方案，市建局收購成本：

$23,000,000 以上，再加上 600 萬的 2/3 補地價 = $29,000,000

財務分析

市建局額外費用（-）	市建局可節省費用 (+)
原計劃的現金賠償方案	**原址原大安置單位+現金賠償方案**
市建局每戶的成本為 2900 萬 估計賠償總數 3000 萬 x 462 戶 = **133.98 億**	市建局每戶的成本為 1414 萬 估計賠償總數 1414 萬 x 462 戶= **65.33 億**
相對原址安置方案，額外支出的費用= **-68.65 億**	本金節省（133.98 億-65.33 億）= **+68.65 億**
5.5 年（本金和利息）多付，（年利率為 3%） -68.65 億*（1.03）^ 5.5 = **-80.77 億**	5.5 年（本金和利息）多省，（年利率為 3%） **+80.77 億**
額外費用總共 = - $80.77 億	**節省費用總共 = + $80.77 億**

總結

這一個原址原大安置方案，給予街坊居民多一個選擇，是基於大部分本區街坊居民是極不願意離開這個生於斯長於斯的地方，與社區街坊幾十年的關係，這種非物質的價值，絕非用金錢能夠替代的，甚至有街坊說也要死於斯，可想而知大家對這個地區的感情有多濃厚。除了出於情感方面，還有大家幾十年的生活圈習慣，等到年老才強迫他們適應一個全陌生的環境，這個絕不是為市民著想的政府應該做的。

重建計劃首要重建本區居民的家園，讓街坊居民能在原址原大地方居住，這是居民對“重建”的概念。所以如果政府真的要推行這個重建計劃，最優先需要認真照顧原有居民的權益，最大程度能維持及保障原來的生活方式不變，這才符合“重建”的真正意義。如果強逼大家離開本址，徹徹底底破壞原有的生活，改建發展為另類的房屋給外來人士，只不過是“逼遷”。

這原址獨立安置房屋方案，利弊各方面的分析如下：

好處：

1. 原址安置，以人為先，地區為本，街坊居民原有生活方式、鄰里關係、學校網絡及社區網絡得到最大程度的保障。單位3米淨高，有室內外休憩活動空間，不需要華麗設施，一切以實用為主。
2. 原址原大安置，是受街坊居民歡迎的方案，收購阻礙會是少，過程會是最順利，有效釋放土地。
3. 方案中的管理費補貼賠償，讓退休多年的公務員生活費負擔減少。
4. 三代同堂或一戶多人的家庭，會因這個原址原大方案，得到原有生活的最大保持，不用擔心家庭被逼拆散，難得可以維繫中華文化的家庭倫理。
5. 市建局重建計劃一直強調重建後環境如何的改善，生活質素如何的提升，只有這個原址原大的計劃，才能真正落實原居民確切分享到重建後的成果及原來有的方便。
6. 如果原居民願意犧牲出讓最寶貴的發展權，致使市建局同時得到本地最大量的新增建屋土地，超過原有的三分之一，市建局更有責任原址原大安置原居民，才是給大家最好的照顧。
7. 這方案不會令原居民生活下降，幫助樹立市建局的正面形象，不會給認為官商勾結，劫貧濟富。
8. 市建局的收購總成本會大幅降低，每戶成本比原有現金賠償減少超過50%。
9. 市建局可避免一次性支出大量賠償金額，營運的財政壓力會大幅減少，且節省下來的大數日，可以更靈活用在別的項目上。

10. 極具爭議性的補地價問題，在收購成本大幅降低而讓市建局有更大空間作出更大的補償來抵消這數目下，得以徹底解決，減少紛爭，免傷和氣。
11. 地政署仍然可以得到補地價的收入。
12. 街坊居民不需要承擔重建過程中樓價波動的風險，不用擔心失預算的額外開支。
13. 樓價波動影響對市建局收購成本也降到最低程度的。
14. 雙贏的方案，減少政府與市民的摩擦，收購過程氣氛會和諧，對整體社會有著正面的影響。
15. 雙贏的方案，市建局與政府的形象都能有很正面的作用。
16. 雖然市建局需要多一些行政工作安排，處理合作社安置屋事宜，如項目策劃之類。
    但額外工作量相對不大，額外時間也不多，全在可控制範圍內。 卻能同時省卻很多在前期收購過程中處理的遊說、投訴及糾紛的工作，這些時間及人力，事前非常難以估計的。
17. 雖然原計劃的公營房屋需要另覓選址，但公營房屋非一定要建在這個位置上，選址靈活性很大。
    在衡量輕重得失， 理應優先照顧多年辛勞的公務員權益，避免把原居民變成為弱勢社群，製造更多新增的老人及社會問題， 與重建計劃的原意背道而馳，得不償失。

弊處：

1. 街坊居民需要遷出在外等待五年，需要多一次搬遷回原址，之間生活會有一定的影響。
   街坊為了最心儀的原址原大安置方案，能在本區繼續長久住下去，這四五年時間會願意接受。
   折中解決方法：合作社獨立安置屋建築期縮短，大約 3.5 年時間完成，
   建成後，全部居民同時搬進去安置屋，餘下市建局地段部分繼續進行建造。

***基於上述的分析，原址原大方案可以大幅省卻市建局收購成本，原居民本來的權益得到最大程度的維護，大大彰顯市建局創局的精神及宗旨。懇請城規會及市建局慎重考慮，希望因此而達成一個皆大歡喜的結果！

免責聲明:

所有關於此收購項目及概念設計圖的資料，並非正式項目圖則，僅只適用於有意選擇原址安置的合作社業主或合法承繼人作參考，並以香港特區政府或市區重建局發佈為準。

本函檔號：CCD/CDD/KCDC_WGUR/20071328

九龍紅磡庇利街 42 號
九龍城政府合署 7 樓
九龍城區議會轄下
房屋及發展規劃委員會
關注市區重建工作小組秘書處
（經辦人：趙大偉先生）

郵寄及電郵
（電郵地址：david_tw_chiu@had.gov.hk）

趙先生：

關於：貴工作小組的 2020 年 7 月 9 日文件
（「要求市建局、地政總署及公務員事務局正面回應，
釋除居民疑慮」）

多謝　貴秘書處於 2020 年 7 月 9 日以電郵轉交標題文件予市區重建局（下稱：「本局」）。本局現謹回覆如下：

本局於 2020 年 5 月 22 日在憲報刊登公告，公布開展兩個由市建局主導的公務員建屋合作社（合作社）樓宇重建試點項目，包括盛德街／馬頭涌道發展項目(CBS-1:KC)及靠背壟道／浙江街發展計劃（CBS-2:KC)的項目內容。本局開展該兩個試點項目是回應 2018 年及 2019 年政府《施政報告》的邀請，物色一至兩個適合的合作社地段作為重建試點，按照《市區重建局條例》，沿用市建局推展重建項目的形式推行，以增加房屋供應，並在靠背壟道／浙江街發展計劃預留部分土地興建公營房屋。

本局於 2020 年 6 月 23 日已派員出席　貴房屋及發展規劃委員會，向議員介紹該兩個試點項目有關規劃發展及收購政策的事宜，並逐一解答議員的提問。本局亦於 7 月 6 日及 7 日的晚上在紅磡社區會堂舉行合共四場居民簡報會，並邀請政府部門包括發展局、公務員事務局及地政總署代表，出席回應居民的提問，而在居民簡報會嚴格進行防疫措施下，四場簡報會共有逾 500 名居民出席。同時，本局在簡報會後也跟進居民的查詢。本局冀該兩個試點項目的居民，透過不同途徑接收有關項目的資訊，減少疑慮。

就有關提問，現作詳細回覆：

（一）就早前 2020 年 6 月 19 日截止的城規會第一階段意見收集，市建局會何時給予回覆？因應城規會第二階段意見收集將於 7 月 17 日展開，並於 7 月 31 日結束。如市建局未能於第二階段及時回應第一階段的意見，將會嚴重影響意見收集程序。

答： 城市規劃委員會（城規會）於 2020 年 5 月 29 日至 6 月 19 日期間，就靠背壟道／浙江街發展計劃草圖及第一階段社會影響評估報告，共收集了超過 430 份公眾提交的意見，並透過規劃署於 2020 年 6 月底把所有意見轉交市建局。市建局現正審視有關的意見並草擬回應，計劃於 8 月初至 8 月中向城規會提交對這些意見的回應。城規會秘書處將根據一貫做法適時把市建局的回應供公眾查閱。

城規會將於 2020 年 7 月 17 日，把市建局的第二階段社會影響評估報告供公眾查閱，並由 7 月 17 日至 7 月 31 日為期兩星期，收集公眾對第二階段社會影響評估報告的意見。市建局會就有關意見內容，適時向城規會提交回應。

城規會在決定該發展計劃草圖是否適宜根據《城市規劃條例》（第 131 章）作展示時，會考慮政府部門及公眾對該發展計劃草圖的意見、以及市建局的回應。如城規會認為該發展計劃草圖適宜根據《城市規劃條例》公布，城規會會按照《城市規劃條例》第 5 條，展示該發展計劃草圖以供公眾查閱及收取意見，為期兩個月。屆時，公眾人士可對市建局早前的回應，再提交意見。

（二）就市建局於 2020 年 7 月 6 至 7 日舉辦的 4 場簡介會中，地政總署代表提及於 2020 年 6 月 1 日，因應現時計劃狀況會使用新的評估補地價方式，惟會議當中並沒有任何可視資料協助解說，純粹口述。現希望 地政總署能補上文件以茲說明補地價計算方式，以釋除居民疑慮。

答： 地政總署將另函回覆。

（三）整個重建計劃中，當中有約一成居民屬「特大家庭」，市建局會有何配套協助安置上述家庭？

答： 根據凍結人口調查記錄，CBS-2;KC 項目有 21 戶的家庭成員在七人或以上，約佔項目內家庭數目的5%。本局是以現金收購項目內的物業業權，根據本局的政策，收購價是根據單位的實用面積計算，與單位內的住戶人數並無

關係。業主如接受收購建議，須自行安排家庭住戶成員的搬遷並交吉有關單位予本局。本局會繼續聽取意見及研究可行的協助。

（四）就各個合作社的樓契內清楚標明可享用的呎數，無論一人居住，還是與子子孫孫共同居住，屋主就是享有樓契標明的呎數的樓面積。公務員的權益由中英聯合聲明及基本法保障。因此，按現時市建局一般的賠償政策，相信難以買到一樣大的單位，無法共住的家庭被逼折散。這樣基本法所提供的利益和權利的合理期望便完全喪失，希望市建局及公務員事務局能正面回應，上述重建計劃如何保障居民利益？

答：市建局會按照現行的收購及補償政策，為試點項目內受影響的合資格住戶提出收購建議和補償，合資格的自住業主將會獲得其住宅物業的市值交吉價，加上一筆特惠津貼（即自置居所津貼），作為收購價。自置居所津貼是以被收購單位市值與同一地區內與收回單位面積相若、位於中層及座向一般的七年樓齡假設重置單位價值的差價計算。收購價的計算方法，與一般重建項目相同。

前合作社自住社員在取得收購補償（扣除補地價的費用）後，可自由決定重置單位的類別、地區、面積等，並擁有該物業的業權。除選擇接受市建局的收購價外，前社員亦可選擇購買由市建局提供的「樓換樓」單位。另外，政府特別為受這項目影響的前合作社社員自住業主，提供多一項在私人市場以外購置重置單位的選擇，就是購買將由香港房屋協會在市區興建和管理的專用安置屋邨內的資助出售單位作居所。有關專用安置屋邨的詳情，政府於適當時候會另行公布。業主可按需要及情況決定是否購買「專用屋邨」的資助出售單位或私人市場的住宅單位。

而有關公務員的權益由公務員事務局另函回覆。

（五）發展局於2020年7月8日提交上立法會的文件顯示，在過去十年，市建局因應住宅物業人士自聘測量師所提估值報告而調整收購建議的單位數目為0。這是否代表受影響居民必須「硬食」收購價？

答：自住業主的住宅物業的收購價是市值交吉價，加上一筆特惠津貼(包括自置居所津貼及相關費用津貼)。自置居所津貼的計算，是指被收購單位市值與七年樓齡的假設重置單位價值的差額。

業主聘用的測量師可就物業的市場價值及其面積提供意見，但不包括任何特惠津貼，如自置居所津貼及補助津貼等。由於七年樓齡的假設重置單位呎價是用來計算特惠津貼，是不可爭議的，住宅自住業主的總收購價並不會因該物業的市場價值改變而有所調整，所以收購價是會維持不變。即使測量師估算的市值交吉價提高，自置居所津貼自然相對減少，所以住宅物業人士聘用測量師提供估值報告的比例相對非住宅物業少。

業主可聘用測量師就物業的市場價值、面積等提供意見及向市建局遞交有關估值報告。市建局收到有關估值報告後，會交由市建局委託的獨立測量師詳細考慮由業主測量師代表提出的理據。如有需要，業主連同雙方測量師會就報告提出的問題會面並交換意見。會面後，市建局委託的獨立測量師會書面回覆其考慮原因及結果。業主可於知悉結果後才考慮是否出售有關單位。市建局在處理住宅或非住宅物業的估值及面積事宜上是沒有分別的。

（六）承上題，如日後市建局公布了收購價後，部分受影響單位仍未散社。市建局會否動用土地收回條例以收回土地？

答：公務員建屋合作社重建試點項目現正根據所需的法定規劃程序推行。就發展項目而言，市建局會根據《市區重建局條例》第 24 條的規定，考慮所有意見和反對書後，將項目的資料及未撤回的反對意見呈交發展局局長(局長)考慮並決定是否授權市建局進行、修訂或拒絕授權市建局進行該項目。該項目若沒有反對人士提出上訴或上訴委員團不接納上訴及將其最後決定刊憲後，市建局才會向業主提出收購建議及補償安排。而發展計劃方面，市建局已向城市規劃委員會(城規會)提交項目的發展計劃草圖，若城規會決定該發展計劃草圖可呈交行政長官會同行政會議考慮，在得到核准及刊憲後才完成規劃程序，市建局才會向業主提出收購建議及補償安排。

如果在重建試點項目內有公務員建屋合作社還未散社，而該單位的社員未能取得業權與本局完成買賣，又或如過往的重建項目，有些業主因業權未清而未能完成買賣（如業主過身、遺產承辦手續尚未處理完成等），本局會根據《市區重建局條例》訂明的時限向政府提出收地申請，交由政府考慮是否引用《收回土地條例》收回所需的業權。

就發展項目而言，市建局必須在發展局局長授權進行有關項目後的 12 個月內，提出收回土地申請；就發展計劃而言，在市建局根據《城市規劃條例》(第 131 章)擬備的圖則獲得行政長官會同行政會

議根據同一條例第 9 條核准後的 12 個月內，市建局必須提出收回土地申請。設定申請時限的目的，是要確保市民在一定的時限內，知悉其物業會否被收回。市建局會根據上述條例的時限內提交收回土地的申請。

至於有關　貴秘書處邀請本局代表出席關注市區重建工作小組的會議，本局明白到因為疫情關係工作小組會議將會延期，待有關會期確定後，本局樂意派員出席及解答議員的提問。謝謝!

市區重建局

2020 年 7 月 21 日

副本抄送

發展局局長（經辦人:張建基先生)(傳真:2905 1002)

回應關注市區重建工作小組文件(01/20)
(於 17.7.2020 會議討論)

九龍城區議會房屋及發展規劃委員會
關注市區重建工作小組

二零二零年度第一次會議

『要求市建局、地政總署及公務員事務局正面回應，

釋除居民疑慮』

就馬希鵬議員文件 01/20 提問(二)有關評估補地價的方式，地政總署現回覆如下：

公務員建屋合作社(合作社)計劃始於 1952 年，政府以優惠價格批出土地(一般是當時十足市值地價的三分之一)，讓當時合資格的公務員以合作社形式建屋，並可獲政府貸款支付地價及建築費。因應合作社社員要求，政府在 1993 年發出指引，讓合作社在取得 75% 社員同意後可申請解散繼而進行分契手續，讓社員取得其樓宇和土地業權成為業主。社員成為單位的業主後，單位仍然受到轉讓限制。由於有關樓宇畢竟當年是以優惠地價支持下建成，如要撤銷轉讓限制，有關業主須繳付一筆由地政總署根據地契釐定的三分之二的地價補價差額。

地政總署過去會按地契採用「現有用途價值」或「重建價值」(以較高者為準)，作為評估合作社單位業主為撤銷轉讓限制而繳付土地補價的基礎。

發展局與地政總署最近檢視了有關的評估基礎，認為對於個別單位的業權人而言，除非所有業權人均同意重建，他並不擁有該土地的控制權而有重建的選擇，因此自 2020

年6月1日，若個別公務員合作社單位業主申請撤銷轉讓限制，除非有證據證明該建築物由單一業權人擁有，否則會以「現有用途土地價值」的基礎評估土地補價。此基礎適用於是次兩個市建局發展計劃 CBS-01:KC 及 CBS-02:KC。

「現有用途土地價值」的補地價為土地價值的三分之二，並加上合作社現樓及新樓市值的折讓比例(假設新、舊樓宇為相若樓面面積的同區或鄰近單位)。請參照〈附錄一〉例子的計算方法。

以 CBS-01:KC、CBS-02:KC 項目鄰近的公務員合作社樓宇在過去三年切題的土地補價個案為例，如果使用「現有用途土地價值」評估基礎計算，補地價金額大約是以往基礎(即「重建價值」評估基礎)估算的五至六成左右。由於每宗個案不同(例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同)，上述假設例子只用作參考。

地政總署
2020 年 7 月 15 日

附錄一

（甲）以「重建價值」基礎計算作簡單說明

$\frac{2}{3}$ x 樓面地價($100,000/m^2$)

= $66,666/m^2$（樓面面積）

（乙）以「現有用途土地價值」基礎計算作簡單說明

$\frac{2}{3}$ x 樓面地價($100,000/m^2$) x $\frac{\text{合作社現樓價 \$90,000/m}^2}{\text{新樓樓價 \$180,000/m}^2}$

= $33,333/m^2$（樓面面積）

在上述例子中，土地補價（乙）約為土地補價（甲）的百分之五十。

由於每宗個案不同（例如會因應地區及地段、單位座向、樓層及面積及可用地積比等因素不盡相同），上述假設例子只用作參考。

九龍城區議會轄下房屋及發展規劃委員會
關注市區重建工作小組會議

公務員事務局就馬希鵬議員相關提問的書面回應

問題：

就早前市建局於2020年5月22日，宣布開展靠背壟道/浙江街發展計劃(CBS-2:KC)，現有以下查詢：

(四) 就各個合作社的樓契內清楚標明可享用的呎數，無論一人居住，還是與子子孫孫共同居住，屋主就是享有樓契標明的呎數的樓面積。公務員的權益由中英聯合聲明及基本法保障。因此，按現時市建局一般的賠償政策，相信難以買到一樣大的單位，無法共住的家庭被逼拆散。這樣基本法所提供的利益和權利的合理期望便完全喪失，希望市建局及公務員事務局能正面回應，上述重建計劃如何保障居民利益？

答覆：

就馬議員的提問(四)關乎公務員的房屋福利政策和安排方面，公務員事務局的回應如下。

公務員的房屋福利，是按照有關人員的聘用條款，以及相關房屋福利計劃的條款和條件而提供。「公務員建屋合作社計劃」(簡稱「合作社計劃」)始於1952年，是舊形式的公務員房屋福利，目的是為合作社社員及其家屬提供居所。根據計劃，政府以優惠價批出土地，並提供貸款，讓合資格的公務員可透過成立合作社興建住宅樓宇。有關土地及樓宇的法定業權由根據《合作社條例》(第33章)成立的相關合作社持有，而合作社社員透過各自與合作社簽訂的分租租契，可於相關單位居住，惟並不擁有有關單位的法定業權。以這個形式興建的合作社房屋，已於1980年代中終止。

至1980年期間，由於部分建屋合作社社員的分租租契持有人已全數償還貸款，他們開始要求獲准出售建屋合作社計劃下的單位。為回應合作社社員的訴求，政府在1987年推出指引[1]，容許合作社在取得所有社員同意下解散，將樓宇及土地業權轉讓予個別社員，並准許社員其後在接受若干條件之情況下，把該等物業售賣、出租或以其他方式處理，而這是一項供社員選擇的安排。為便利

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1 1987年推出的指引名為《公務員建屋合作社及政府為公務員興建樓宇計劃單位的土地業權轉讓予個別社員及分契持有人指引》(即《交回及重批辦法指引》)。有關指引詳細列出轉讓法定業權予合作社社員的具體安排。

進行有關程序，政府在 1993 年發出現行的指引[2]取代舊指引，讓合作社在取得 75%社員同意後可申請解散繼而進行分契手續，讓個別社員取得其樓宇和土地業權成為業主，並於繳付由地政總署根據地契釐定的土地補償後把單位自由轉售。

合作社計劃是按資源酌情提供的房屋福利，並非公務員的服務條件。上文提及的合作社計劃的條款和條件，以及相關標準(包括合作社社籍的申請資格)，一直沿用至今。

至於合作社樓宇地段的重建事宜，過往一般由發展商與相關合作社接洽。《行政長官 2018 年施政報告》宣佈政府會邀請市區重建局(簡稱「市建局」)物色一至兩個適合作高密度發展的合作社地段，研究按照市建局的推展項目方式，重建該些合作社地段，盡用地段的地積比率，以期為社會帶來裨益。市建局會按照其現行的收購及補償政策，為試點項目內受影響的合資格住戶提出收購建議和補償，有關詳情和相關安排由市建局另函回覆。

2020 年 7 月

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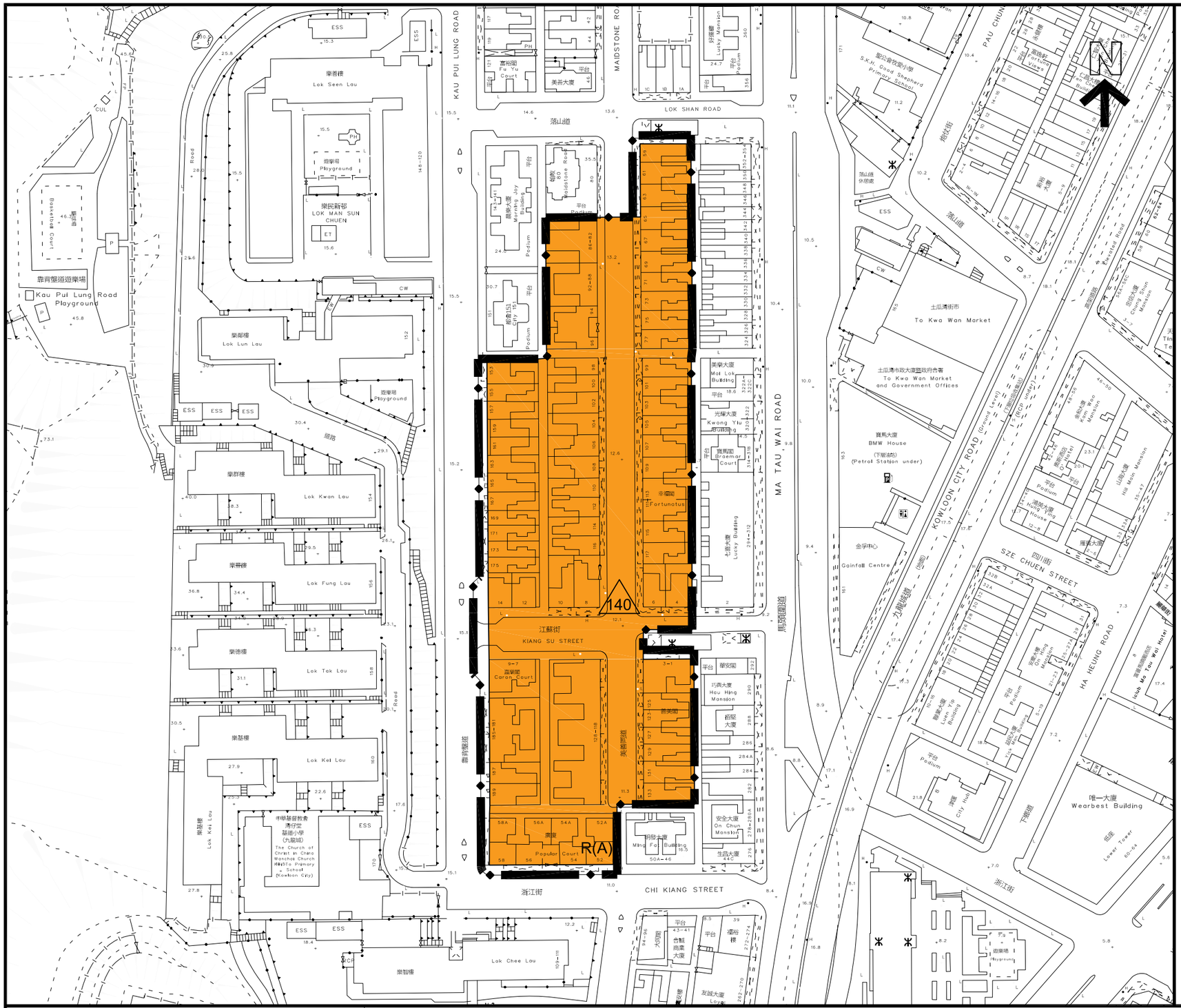
2 1993 年發出的指引為《公務員建屋合作社單位的土地業權轉讓予個別社員指引》(即《修訂官地租契辦法指引》)。



圖例
NOTATION

BOUNDARY OF DEVELOPMENT SCHEME ..... 發展計劃範圍界線

RESIDENTIAL (GROUP A) ..... R(A) ..... 住宅(甲類)

MAJOR ROAD AND JUNCTION ..... 主要道路及路口

MAXIMUM BUILDING HEIGHT (IN METRES ABOVE PRINCIPAL DATUM) ..... 140 ..... 最高建築物高度(在主水平基準上若干米)

夾附的<<註釋>>屬這份圖則的一部分

THE ATTACHED NOTES ALSO FORM PART OF THIS PLAN

2023年 月 日城市規劃委員會根據市區重建局條例第25(6)(a)條認為圖則適宜公布，並於2023年 月 日按照城市規劃條例第5條展示。

PLAN DEEMED SUITABLE BY THE TOWN PLANNING BOARD FOR PUBLICATION UNDER SECTION 25(6)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE ON 2023 AND EXHIBITED UNDER SECTION 5 OF THE TOWN PLANNING ORDINANCE ON 2023.

SECRETARY, TOWN PLANNING BOARD 城市規劃委員會秘書

香港城市規劃委員會依據城市規劃條例擬備的市區重建局靠背壟道/浙江街發展計劃圖則
TOWN PLANNING ORDINANCE, HONG KONG TOWN PLANNING BOARD URBAN RENEWAL AUTHORITY KAU PUI LUNG ROAD / CHI KIANG STREET DEVELOPMENT SCHEME PLAN

SCALE ~~1 : 1500~~ 比例尺

米METRES 10 0 10 20 30 40 50 METRES 米

依據市區重建局條例第25(3)(a)條擬備
PREPARED UNDER SECTION 25(3)(a) OF THE URBAN RENEWAL AUTHORITY ORDINANCE

圖則編號 PLAN No. S/K10/URA2/A

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

NOTES

(N.B. These form part of the Plan)

(1) These Notes show the uses or developments on land falling within the boundaries of the Plan which are always permitted and which may be permitted by the Town Planning Board, with or without conditions, on application. Where permission from the Town Planning Board for a use or development is required, the application for such permission should be made in a prescribed form. The application shall be addressed to the Secretary of the Town Planning Board, from whom the prescribed application form may be obtained.

(2) Any use or development which is always permitted or may be permitted in accordance with these Notes must also conform to any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, as may be applicable.

(3) (a) No action is required to make the existing use of any land or building conform to this Plan until there is a material change of use or the building is redeveloped.

(b) Any material change of use or any other development (except minor alteration and/or modification to the development of the land or building in respect of the existing use which is always permitted) or redevelopment must be always permitted in terms of the Plan or, if permission is required, in accordance with the permission granted by the Town Planning Board.

(c) For the purposes of subparagraph (a) above, "existing use of any land or building" means –

(i) before the publication in the Gazette of the notice of the first statutory plan covering the land or building (hereafter referred as 'the first plan'),

- a use in existence before the publication of the first plan which has continued since it came into existence; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building; and

(ii) after the publication of the first plan,

- a use permitted under a plan which was effected during the effective period of that plan and has continued since it was effected; or

- a use or a change of use approved under the Buildings Ordinance which relates to an existing building and permitted under a plan prevailing at the time when the use or change of use was approved.

(4) Except as otherwise specified by the Town Planning Board, when a use or material change of use is effected or a development or redevelopment is undertaken, as always permitted in terms of the Plan or in accordance with a permission granted by the Town Planning Board, all permissions granted by the Town Planning Board in respect of the site of the use or material change of use or development or redevelopment shall lapse.

(5) Road widths, road junctions and alignments of roads may be subject to minor adjustments as detailed planning proceeds.

(6) Temporary uses (expected to be 5 years or less) of any land or building are always permitted as long as they comply with any other relevant legislation, the conditions of the Government lease concerned, and any other Government requirements, and there is no need for these to conform to the zoned use or these Notes. For temporary uses expected to be over 5 years, the uses must conform to the zoned use or these Notes.

(7) The following uses or developments are always permitted on land falling within the boundaries of the Plan except where the uses or developments are specified in Column 2 of the Schedule of Uses:

(a) provision, maintenance or repair of plant nursery, amenity planting, open space, rain shelter, refreshment kiosk, road, bus/public light bus stop or lay-by, cycle track, Mass Transit Railway station entrance, Mass Transit Railway structure below ground level, taxi rank, nullah, public utility pipeline, electricity mast, lamp pole, telephone booth, telecommunications radio base station, automatic teller machine and shrine; and

(b) geotechnical works, local public works, road works, sewerage works, drainage works, environmental improvement works, marine related facilities, waterworks (excluding works on service reservoir) and such other public works co-ordinated or implemented by Government.

(8) In any area shown as 'Road', all uses or developments except those specified in paragraph (7) above and those specified below require permission from the Town Planning Board:

toll plaza, on-street vehicle park and railway track.

(9) Unless otherwise specified, all building, engineering and other operations incidental to and all uses directly related and ancillary to the permitted uses and developments within the same zone are always permitted and no separate permission is required.

(10) In these Notes, "existing building" means a building, including a structure, which is physically existing and is in compliance with any relevant legislation and the conditions of the Government lease concerned.

(11) Any development not compatible with the Urban Renewal Authority's Development Scheme for the area is prohibited by virtue of section 25(4) of the Urban Renewal Authority Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

Schedule of Uses

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RESIDENTIAL (GROUP A)	1

S/K10/URA2/A

RESIDENTIAL (GROUP A)

Column 1 Uses always permitted	Column 2 Uses that may be permitted with or without conditions on application to the Town Planning Board
Ambulance Depot Flat Government Use (not elsewhere specified) House Library Market Place of Recreation, Sports or Culture Public Clinic Public Transport Terminus or Station (excluding open-air terminus or station) Public Vehicle Park (excluding container vehicle) Residential Institution School (in free-standing purpose-designed building only) Social Welfare Facility Utility Installation for Private Project	Commercial Bathhouse/ Massage Establishment Eating Place Educational Institution Exhibition or Convention Hall Government Refuse Collection Point Hospital Hotel Institutional Use (not elsewhere specified) Mass Transit Railway Vent Shaft and/or Other Structure above Ground Level other than Entrances Office Petrol Filling Station Place of Entertainment Private Club Public Convenience Public Transport Terminus or Station (not elsewhere specified) Public Utility Installation Religious Institution School (not elsewhere specified) Shop and Services (not elsewhere specified) Training Centre

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

In addition, the following uses are always permitted (a) on the lowest three floors of a building, taken to include basements; or (b) in the purpose-designed non-residential portion of an existing building, both excluding floors containing wholly or mainly car parking, loading / unloading bay and / or plant room:	

Eating Place
Educational Institution
Institutional Use (not elsewhere specified)
Off-course Betting Centre
Office
Place of Entertainment
Private Club
Public Convenience
Recyclable Collection Centre
School
Shop and Services
Training Centre

Planning Intention

This zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, Government, institution or community facilities, at-grade pedestrianised avenue/event plaza and public open space. Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building.

(Please see next page)

RESIDENTIAL (GROUP A) (Cont'd)

Remarks

(1) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in the plot ratio for the building upon development and/or redevelopment in excess of 8.0 for a domestic building or 9.0 for a building that is partly domestic and partly non-domestic, or the plot ratio of the existing building, whichever is the greater. Except where the plot ratio is permitted to be exceeded under paragraphs ~~(7)~~***(8)*** and/or ~~(8)~~***(9)*** hereof, under no circumstances shall the plot ratio for the domestic part of any building, to which this paragraph applies, exceed 8.0.

(2) For a non-domestic building to be erected on the site, the maximum plot ratio shall not exceed 9.0 except where the plot ratio is permitted to be exceeded under paragraphs ~~(7)~~***(8)*** and/or ~~(8)~~***(9)*** hereof.

(3) For the purposes of paragraph (1) above, no addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the relevant maximum domestic and/or non-domestic plot ratio(s), or the domestic and/or non-domestic plot ratio(s) of the existing building, whichever is the greater, subject to, as applicable –

(i) the plot ratio(s) of the existing building shall apply only if any addition, alteration and/or modification to or redevelopment of an existing building is for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building; or

(ii) the maximum domestic and/or non-domestic plot ratio(s) stated in paragraph (1) above shall apply if any addition, alteration and/or modification to or redevelopment of an existing building is not for the same type of building as the existing building, i.e. domestic, non-domestic, or partly domestic and partly non-domestic building.

(4) Not less than 400m^2 of public open space for public use at reasonable hours shall be provided.

(5) An underground public vehicle park shall be provided. Any floor space that is constructed or intended for use solely as public vehicle park as required by the Government, may be disregarded.

(6) In determining the relevant maximum plot ratio for the purposes of paragraphs (1) and (2) above, any floor space that is constructed or intended for use solely as car park, loading/unloading bay, plant room and caretaker's office, or caretaker's quarters and recreational facilities for the use and benefit of all the owners or occupiers of the domestic building or domestic part of the building,

provided such uses and facilities are ancillary and directly related to the development or redevelopment, may be disregarded. Any floor space that is constructed or intended for use solely as Government, institution or community facilities, as required by the Government, may also be disregarded.

(7) No new development, or addition, alteration and/or modification to or redevelopment of an existing building shall result in a total development and/or redevelopment in excess of the maximum building height in terms of metres above Principal Datum as stipulated on the Plan, or the height of the existing building, whichever is the greater.

(8) Where the permitted plot ratio as defined in Building (Planning) Regulations is permitted to be exceeded in circumstances as set out in Regulation 22(1) or (2) of the said Regulations, the plot ratio for the building on land to which paragraph (1) or (2) above applies may be increased by the additional plot ratio by which the permitted plot ratio is permitted to be exceeded under and in accordance with the said Regulation 22(1) or (2), notwithstanding that the relevant maximum plot ratio specified in the paragraphs (1) and (2) above may thereby be exceeded.

(9) Based on the individual merits of a development or redevelopment proposal, minor relaxation of the plot ratio and building height restrictions as stated in paragraphs (1), (2) and (7) above may be considered by the Town Planning Board on application under section 16 of the Town Planning Ordinance.

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

EXPLANATORY STATEMENT

DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
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DRAFT URBAN RENEWAL AUTHORITY
KAU PUI LUNG ROAD / CHI KIANG STREET
DEVELOPMENT SCHEME PLAN NO. S/K10/URA2/A

(Being a Draft Plan for the Purposes of the Town Planning Ordinance prepared by the Urban Renewal Authority under section 25 of the Urban Renewal Authority Ordinance)

EXPLANATORY STATEMENT

Note: For the purposes of the Town Planning Ordinance (the Ordinance), this statement shall not be deemed to constitute a part of the Plan.

1. INTRODUCTION

This Explanatory Statement is intended to assist an understanding of the draft Urban Renewal Authority (URA) Kau Pui Lung Road / Chi Kiang Street Development Scheme Plan (DSP) No. S/K10/URA2/A. It reflects the planning intention and objectives of the Town Planning Board (the Board) for the area covered by the Plan.

2. AUTHORITY FOR THE PLAN AND PROCEDURES

2.1 In response to the Policy Address 2018 and 2019 (PAs) by the Chief Executive (CE), the URA was invited to identify one or two clusters of Civil Servants' Co-operative Building Society (CBS) Scheme sites suitable for high-density development as pilot sites (pilot CBS redevelopment project), and explore the redevelopment mode in accordance with the usual project implementation approach adopted by the URA. The Kau Pui Lung Road / Chi Kiang Street Development Scheme (CBS-2:KC) is one of the pilot CBS redevelopment projects.

2.2 On 11 May 2020, Kau Pui Lung Road / Chi Kiang Street Development Scheme was approved by the Financial Secretary to be commenced in 2020/21. The Development Scheme was proposed to be processed under section 25 of the URA Ordinance (URAO).

2.3 On 22 May 2020, pursuant to section 23(1) of the URAO, the URA notified in the Government Gazette the commencement of implementation of the Kau Pui Lung Road / Chi Kiang Street Development Scheme.

2.4 On the same day of commencement (i.e. 22 May 2020), the URA submitted the draft URA Kau Pui Lung Road / Chi Kiang Street DSP to the Board under section 25(5) of the URAO.

2.5 During the public consultation period of the Development Scheme, most of the comments and concerns were related to CBS issues, especially on the land matters of the undissolved CBS. The URA, after consultation with different Government bureaux / departments, has taken the opportunity to review the draft DSP to respond to the new policy directives entrusting the URA to provide more Starter Home (SH) units. Opportunity is also sought to enhance the Development Scheme to achieve wider planning gains to the community. On 3 November 2022, the URA has submitted a revised scheme of the draft DSP to the Board for consideration.

2.6 On XXXX, the Board, under section 25(6)(a) of the URAO, deemed the draft URA Kau Pui Lung Road / Chi Kiang Street DSP as being suitable for publication. Under section 25(7) of the URAO, the draft DSP, which the Board has deemed suitable for publication, is deemed to be a draft plan prepared by the Board for the purposes of the Ordinance.

2.7 On XXXX, the draft Kau Pui Lung Road / Chi Kiang Street DSP No. S/K10/URA2/1 (the Plan) was exhibited under section 5 of the Ordinance. By virtue of section 25(9) of the URAO, the Plan has from the date replaced the Ma Tau Kok Outline Zoning Plan (OZP) in respect of the area delineated and described herein.

3. OBJECT OF THE PLAN

The Plan illustrates that the Development Scheme Area (the Area) is designated as "Residential (Group A)" ("R(A)") and areas shown as 'Road'. It is planned to be developed by means of the Development Scheme prepared under section 25 of the URAO. The Development Scheme intends to be primarily for high-density residential developments with the provision of an underground public vehicle park, Government, institution or community (GIC) facilities, at-grade pedestrianised avenue/ event plaza and public open space (POS). Commercial uses are always permitted on the lowest three floors of a building or in the purpose-designed non-residential portion of an existing building. The Development Scheme will be developed for private housing and SH, providing not less than 950 SH units, subject to liaison and agreement with relevant Government bureaux / departments at implementation stage.

4. NOTES OF THE PLAN

4.1 Attached to the Plan is a set of Notes which shows the types of uses or developments which are always permitted within the Area in this zone and which may be permitted by the Board, with or without conditions, on application. The provision for application for planning permission under section 16 of the Ordinance allows greater flexibility in land use planning and control of development to meet changing needs.

4.2 For the guidance of the general public, a set of definitions that explains some of the terms used in the Notes may be obtained from the Technical Services Division of the Planning Department and can be downloaded from the Board's website at http://www.info.gov.hk/tpb.

5. AREA COVERED BY THE PLAN

5.1 The Development Scheme boundary which is shown in heavy broken line on the Plan, covers a total area of about 16,473m^2 (subject to site survey). The Development Scheme involves a cluster of 30 CBS sites which is broadly bounded by a row of buildings at Ma Tau Wai Road to

the east, Chi Kiang Street to the south, Kau Pui Lung Road to the west and Lok Shan Road to the north.

5.2 The Area includes all private lots, the government lanes, and portions of Maidstone Road and Kiang Su Street, and also includes public pavement at the periphery where affected buildings overhang within the Area.

5.3 Before the exhibition of the Plan, the Area was zoned "R(A)" and areas shown as 'Road' on the draft Ma Tau Kok OZP No. S/K10/29.

6. EXISTING CONDITIONS

6.1 The Development Scheme consists of buildings of 5 to 6 storeys high and they were built between 1959 and 1970 (i.e. all aged 50 or above). The buildings are all residential in nature and there is no retail shop within the Area. Most of the buildings are in "acceptable" conditions. All buildings are without lift or barrier-free access and the serviceability is poor.

6.2 The existing southern portion of Maidstone Road is a dead-end road, which is included in the Area for redevelopment. A portion of Kiang Su Street is also included in the Area for redevelopment.

7. PLANNING AND LAND USE PROPOSALS

7.1 On the Plan, the Area is zoned "R(A)" and areas shown as "Road". The Notes of the Plan indicated broadly the intended land uses within the Area. The area covered by the "R(A)" zone is about 15,475m^2, subject to site survey.

Uses

7.2 The "R(A)" zone is intended primarily for high-density residential developments with the provision of underground public vehicle park, GIC facilities, at-grade pedestrianised avenue/ event plaza and POS. Commercial uses are always permitted on the lowest three floors of a

building or in the purpose-designed non-residential portion of an existing building.

7.3 The maximum plot ratio within the "R(A)" zone is 9.0, or the plot ratio of the existing building(s), whichever is the greater. Except where the plot ratio is permitted to be exceeded under the Notes of the Plan or under Building (Planning) Regulations 22(1) or (2), under no circumstances shall the plot ratio for the domestic part of any development exceed 8.0. The "R(A)" zone is also subject to a maximum building height restriction of 140 metres above Principal Datum.

7.4 The plot ratio control under "R(A)" zone is regarded as being stipulated in a "new or amended statutory plan" according to the Joint Practice Note No. 4 "Development Control Parameters Plot Ratio/Gross Floor Area", and shall be subject to the streamlining arrangements stated therein.

7.5 To provide design flexibility, minor relaxation of the plot ratio and building height restrictions may be considered by the Board on application under section 16 of the Ordinance taking into account its individual planning and design merits.

Urban Design Concept

7.6 The design of the Development Scheme will adopt an integrated approach. The tower disposition, podium massing and open space are considered as one development to maximise the benefits of replanning and restructuring and to allow the provision of pedestrianised avenue / event plaza and POS.

7.7 The massing of podia is minimised to create a pedestrian-friendly environment through urban design including utilisation of underground space. The footprint of the podia is limited in order to provide two ventilation corridors in north-south and east-west and for pedestrianised avenue / event plaza and POS. Not less than 400m^2 of POS and not less than 2,400m^2 of covered and uncovered area of the pedestrianised avenue / event plaza for public use at reasonable hours would be provided.

Pedestrianised Avenue / Event Plaza and Public Open Space

7.8 To remove the existing dead-end condition for a better pedestrian environment, portions of Maidstone Road and Kiang Su Street have been included as part of the Area for the creation of a pedestrianised avenue / event plaza within the Area. The pedestrianised avenue / event plaza will connect Lok Shan Road at the north and Chi Kiang Street at the south. It will also link to the two entrances of the Mass Transit Railway (MTR) To Kwa Wan Station at Lok Shan Road and Kiang Su Street respectively.

7.9 The pedestrianised avenue / event plaza will include uncovered and covered area with hard and soft landscape, event space and sitting area for public enjoyment. Ground floor of retail shops will be provided along both sides of the pedestrianised avenue /event plaza to enrich pedestrian experience and enhance street vibrancy. The pedestrianised avenue / event plaza will be maintained and managed by the URA or its future joint partner(s), or its assignee. The management and maintenance arrangement of the POS will be determined with relevant Government departments at land grant stage.

7.10 The pedestrianised avenue / event plaza will also integrate with the proposed underground pedestrian passageway with retail shops, which will create an underground shopping street. The proposed underground pedestrian passageway will be opened for public use during the opening hours of the non-domestic portion. It will connect to the two entrances of the MTR To Kwa Wan Station at Lok Shan Road and Kiang Su Street at basement level, subject to technical feasibility and agreement with relevant government departments and the MTR Corporation Limited. The re-planned multi-level pedestrian network will enhance overall connectivity, walkability and provide a car-free environment.

Underground Public Vehicle Park

7.11 An underground public vehicle park will be provided to re-provision the original on-street parking spaces and to cater for the demand for parking in the district. Not less than 164 public car parking spaces shall be provided in the underground car park as required by the Government.

Management of the underground public vehicle park will be arranged at the development stage.

Government, Institution or Community (GIC) Facilities

7.12 To meet the need for community facilities in the vicinity and the increased population after redevelopment, GIC uses are proposed in the Development Scheme. Not less than 2,500m^2 non-domestic gross floor area would be proposed for GIC use in the GIC block or within the non-domestic portion of the development, subject to confirmation of usage and funding from relevant Government departments. In order to facilitate provision of GIC facilities, in determining the relevant maximum plot ratio of the development and / or redevelopment, any floor space that is constructed or intended for use solely as GIC facilities, as required by the Government, may be disregarded.

Landscaping and Greening

7.13 A cohesive landscaping, tree planting and greening will be provided in the pedestrianised avenue / event plaza and POS to meet the Sustainable Building Design (SBD) Guidelines to enhance the local streetscape and walking environment. According to SBD Guidelines, minimum site coverage of greening of 20% of the net site area will be provided.

Air Ventilation

7.14 According to the air ventilation assessment report (AVA 2022) for the proposed development, two major wind enhancement features will be provided, i.e. a minimum 15m-wide breezeway along the pedestrianised avenue for north-south wind flow; and a minimum 20m-wide podium separation along Kiang Su Street for east-west wind flow, with footbridges, canopies and architectural features provided in between the podia. Various building and podium separations are also provided where appropriate and practicable to enhance the local pedestrian wind environment. The two major wind enhancement features should be incorporated in the design and layout of the developments in the "R(A)"zone. In the event that the two proposed wind enhancement features are not adopted in the future design scheme, further AVA study

should be conducted by the project proponent in accordance with the joint HPLB-ETWB Technical Circular No. 1/06 on Air Ventilation Assessment (or its latest version) for demonstrating that the performance of any future development would not be worse than the proposed scheme adopted in the AVA 2022.

8. IMPLEMENTATION OF THE DEVELOPMENT SCHEME

8.1 The proposals set out in the Plan form an integral part of the Development Scheme for the Area.

8.2 The URA does not own or lease any land within the boundaries of the Development Scheme and intends to acquire the properties within the Area of the Development Scheme. With respect to any of such properties which cannot be acquired by purchase, the Secretary for Development would consider, upon the application of the URA, recommending to the CE in Council the resumption of properties under the Lands Resumption Ordinance, if necessary.

8.3 All eligible tenants will be offered an ex-gratia payment package in accordance with the URA's policy. The URA has already entered into agreement with the Hong Kong Housing Society (HKHS) and the Hong Kong Housing Authority (HKHA) for the purpose of making available rehousing units by HKHS or HKHA to rehouse affected tenants who satisfy the eligibility criteria of HKHS or HKHA.

8.4 Non-domestic tenants (if any) of properties acquired by the URA whose tenancies are terminated by the URA due to implementation of the Development Scheme may be offered an ex-gratia allowance to assist in their business relocation.

8.5 Details of the acquisition, compensation and rehousing policies are subject to the URA's prevailing policies at the time of acquisition. The URA may implement the Development Scheme on its own or in association with one or more partners.

TOWN PLANNING BOARD
MARCH 2023

A brief summary of the findings of URA's freezing survey

	Development Scheme Area	**Territorial Level[(i)]**
Population and Household Characteristics		
Total population (persons)	1,424	-
Average household size (persons per household)	3.3	2.8
Degree of sharing		
Total		
• households (428) / surveyed units (428)	1.0	1.0
Breakdown		
• households (427) / units for domestic use (427)	1.0	-
• household (1) / units for domestic and non-domestic use (mixed use)[(ii)] (1)	1.0	-
Age group		
• 0-14	6%	11%
• 15-24	5%	11%
• 25-64	54%	62%
• 65 & above	30%	16%
• No age information provided	5%	-
Household size		
• 0 (vacant)	1%	-
• 1	12%	18%
• 2	24%	27%
• 3	18%	24%
• 4	22%	20%
• 5	11%	8%
• 6 & above	12%	3%

	Development Scheme Area	Territorial Level[(i)]
Social-economic Characteristics		
Monthly income (per month/household) • Below HK$10,000 • Below HK$4,000 • Nil response / No questionnaire returned	 6% 2% 46%	 19% 6% -
Seeking job/unemployment	3%	5.9% (March 2020 to May 2020)
Retired	32%	-
% of households receiving comprehensive social security assistance (CSSA)	1% (4 households)	About 4% (as at May 2020)[(ii)]
Subject to conditional stay in Hong Kong	About 2% (23 residents)	-
Living within the DSP area continuously for over 20 years	85%	-
Household Types		
Owner-occupiers Other households Tenants (including tenants, principal tenants, sub-tenants, licensees / occupiers and others)	94% (404 households) 6% (24 households)	48.5% 51.5%
Groups with Special Needs		
Persons with disability	About 4% (50 residents)	-
No. of single-parent family	4 (with 7 children)	-
Ethnic minority households	About 1% (6 households)	8%

Notes:

(i) Based on the 2016 Population By-census.

(ii) Based on the press release by the Government of the Hong Kong Special Administrative Region on CSSA caseload for May 2020.

Detailed Departmental Comments on the draft Urban Renewal Authority (URA) Kau Pui Lung Road/Chi Kiang Street Development Scheme Plan (DSP)

I. Comments from Chief Estate Surveyor/Urban Renewal, Lands Department:

(a) Any proposed road works in relation to the development scheme including the closure of roads/lanes is subject to the Roads (Works, Use and Compensation) Ordinance (Cap. 370). URA is required to seek comments from relevant departments including TD and HyD concerning their proposed road works for proceeding with the relevant procedures under Cap. 370.

Provision of Open Space and Pedestrianised Avenue/Plaza for Public Use

(b) It is noted that not less than 400m^2 of open space will be provided for public use. The management and maintenance responsibilities of public facilities should not be passed onto the future individual flat owners.

(c) It is noted that the proposed open space and the pedestrianised avenue/plaza will be open for public use at "reasonable hours". In the event that it is required to impose such requirement in the proposed land grant, the exact opening hours will be specified in consultation with the Government to reflect the planning intention.

II. Comments from Chief Building Surveyor/Kowloon, Buildings Department

Extinguishment of Streets / Lanes

(a) For proposed development scheme involving extinguishment of existing streets/lanes and projections in, under, over and/or upon such, application for exemption from Section 31(1) of the BO might be considered subject to favourable comments from relevant government departments.

(b) Noting that existing streets/lanes would be included in the proposed development schemes, URA is required to ensure that the proposed development schemes should not result in contraventions of the BO and its allied regulations in the adjacent existing building in terms of site access, site classification, provision of natural lighting and ventilation (L&V), fire resisting construction (FRC), means of escape (MOE), emergency vehicular access (EVA) and drainage connection, etc.

(c) Noting that the drainage system along the existing streets/lanes within the subject site also serves the adjoining buildings, URA should consult DSD on this issue if necessary in order to maintain the drainage connection for the adjoining buildings.

(d) It appears that the scheme boundary of the proposed development would abut/encroach on the exit route of MTR To Kwa Wan Station, hence, adversely affecting the means of escape of the station. URA is advised to consult the MTR Corporation Limited, Fire Services Department, Railway Development Office of Highways Department, Electrical and Mechanical Services Department and Lands Department in this regard.

Site Area with Streets/Lanes

(e) Pursuant to regulation 23(2)(a) of Building (Planning) Regulations (B(P)R), street including lanes should be excluded from site area for the purpose of site coverage (SC) and plot ratio (PR) calculations unless exempted.

Underground Shopping Street (USS) outside site

(f) Please note that the land stratum under street (i.e. USS (underground shopping street) and possible underground connection to MTR To Kwa Wan Station (UC), etc.) outside individual site should not create a separate notional site or generate notional site areas to any individual site; and street and the land stratum outside site should be excluded from site areas for PR and SC calculations under B(P)R for each individual site. In addition, such USS/UC should be included in gross floor areas calculations and the resultant PR (based on the site area excluding USS/UC) should not exceed the limits under the B(P)R.

Covered Pedestrianised Avenue

(g) The covered pedestrianised avenue should be included in GFA and SC calculations under B(P)R. However, GFA exemption may be considered subject to compliance with the criteria stipulated in PNAP APP-108 and full justifications provided by AP at building plan submission stage.

Exemption of Government, Institution or Community (GIC) Facilities

(h) In general, the GIC facilities should be accountable for domestic/non-domestic PR/GFA calculations according to their respective use in accordance with B(P)R. However, under Joint Practice Note No. 4, for such GIC facilities that would become Government Accommodation (GA) (i.e. these provisions will be handed over to the Government as required under the lease), the Buildings Department

may consider exempting the GA from PR/GFA calculations if the GA will be exempted from GFA calculations under the new / amended Outline Zoning Plan and the provision of such GA is included in the corresponding leases.

Compliance with the BO

(i) All building works are subject to compliance with the BO. Detailed comments under the BO on individual sites for private developments such as permissible PR, SC, MoE, FRC, L&V, emergency vehicular access, private streets, and/or access roads, open space, barrier free access and facilities, compliance with the sustainable building design guidelines, etc. will be formulated at the building plan submission stage.

III. Comments from Director of Environmental Protection:

Noise

(a) The site is subject to traffic noise and fixed source noise impact. According to the Noise Impact Assessment (NIA), full compliance with the traffic noise planning standard of 70dB(A) cannot be achieved based on the notional design. Nevertheless, the URA and its consultant have not yet exhausted all practicable noise mitigation designs/measures to reduce the traffic noise impact. Measures including alternative building form to avoid orientation of noise sensitive facades directly facing nearby roads, construction of barrier / canopy on podium with projection beyond the site boundary, etc., are available and should be explored by the URA to further abate the noise impact. The URA should exhaust all practicable noise mitigation designs/measures to minimise the traffic noise

Sewerage

(b) The Sewerage Impact Assessment (SIA) report identified the required sewerage upgrading, construction and diversion works for the development. To ensure implementation of the required mitigation measures, a special condition on SIA is recommended to be imposed in the future land title document of the site.

Land Contamination

(c) The URA has not addressed the potential land contamination issue arising from the development and instead proposed to carry out land contamination assessments at a later stage. In this connection, a special condition should be imposed in the relevant land title document of the subject site to require the developer to conduct

land contamination assessments and carry out remediation (if needed) prior to the development of the site according to the prevailing guidelines.

Waste Management

(d) Since the proposed redevelopment would involve demolition of the existing buildings and would likely generate a large amount of construction and demolition (C&D) materials, the URA is advised to minimise the generation of C&D materials; reuse and recycle the C&D materials on-site as far as possible; and observe and comply with the legislative requirements and prevailing guidelines on proper waste management for the proposed development.

IV. Comments from Chief Engineer/Mainland South, Drainage Services Department:

Please note that the flooding situation at Kiang Hsi Street / Ma Tau Wai Road in the south of the site cannot be effectively improved due to site constraints. Given the vast area of the subject development, it is highly recommended to divert the surface runoff of the site northward to relieve the drainage burden at the southern bottleneck. Since the site will undergo redevelopment with site formation, this could be achieved through proper drainage design of the site without increasing the project's time and cost. As for the previously recommended flow reversal of the drainage in the east adjoining the site, the extent of works is, in fact, less than that of the committed works for improving the sewerage system. These matters are related to the benefits of the community including the future residents of the redeveloped site and shall be addressed properly in the next stage of the project.