

**Appendix III**  
Traffic Impact Assessment



**Proposed Temporary Concrete Batching Plant  
with Ancillary Facilities  
for a Period of 5 Years at Lots 573 RP and 1710  
in D.D. 114, Shek Kong, Yuen Long, NT**

**Traffic Impact Assessment  
Final Report  
21<sup>th</sup> January 2025**

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**Prepared for: Join Bright Warehousing Limited**

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<u>CHAPTER</u>	<u>CONTENTS</u>	<u>PAGE</u>
1.	INTRODUCTION Background Scope of Study Structure of Report	1
2.	EXISTING SITUATION The Subject Site The Road Network Historic Traffic Growth Public Transport Facilities Existing Traffic Flows Performance of the Surveyed Junctions Performance of the Surveyed Road Links	2
3.	THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT Development Schedule Vehicular Access Points Upgrading of Chun Yiu Road Proposed Haulage Route Operation of Proposed Temporary Concrete Batching Plant Internal Transport Facilities Swept Path Analysis	5
4.	TRAFFIC IMPACT Design Year Traffic Forecast 2030 Junction Capacity Analysis 2030 Road Link Capacity Analysis	8
5.	SUMMARY	11
	Figures Appendix A – Vehicle Composition of Existing Traffic Flows Appendix B – Capacity Analyses Appendix C – Swept Path Analysis	

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**TABLES**

**NUMBER**

- 2.1 AADT of ATC Stations Located near the Subject Site
- 2.2 Road-Based Public Transport Services Operating near the Subject Site
- 2.3 Existing Junction Performance
- 2.4 Existing Road Link Performance
- 3.1 Details of Vehicle Movements at Different Time Periods
- 3.2 Results of Traffic Generation Surveys at Other Similar Existing Concrete Batching Plants
- 3.2 Internal Transport Facilities
- 4.1 Details of Other Known Major Planned / Committed Development
- 4.2 Traffic Generation of the Proposed Temporary Concrete Batching Plant
- 4.3 2030 Junction Performance
- 4.4 2030 Road Link Performance

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**FIGURES**

**NUMBER**

- 1.1 Location of the Subject Site
- 2.1 Road-Based Public Transport Services operating near the Subject Site
- 2.2 Location of Surveyed Junctions and Area of Influence
- 2.3 Junction of Kam Tin Road / Fan Kam Road
- 2.4 Junction of Kam Tin Road / Chun Yiu Road
- 2.5 Junction of Kam Tin Road / Kam Sheung Road / Sheung Tsuen Bus Terminus
- 2.6 Junction of Kam Tin Road / Route Twisk
- 2.7 Existing Peak Hour Hour Traffic Flows
- 3.1 Proposed Upgrading of Chun Yiu Road
- 3.2 Proposed Haulage Routes
- 3.3 Layout of the Proposed Temporary Concrete Batching Plant
- 4.1 Year 2030 Peak Hour Traffic Flows without the Proposed Temporary Concrete Batching Plan
- 4.2 Year 2030 Peak Hour Traffic Flows with the Proposed Temporary Concrete Batching Plant

## 1.0 INTRODUCTION

### Background

- 1.1 The Applicant, Join Bright Warehousing Limited, is authorised by Glorious Concrete (Hong Kong) Limited, the affected business operator, to facilitate the relocation of their concrete batching plant (“the Existing Concrete Batching Plant”). The Existing Concrete Batching Plant is located in Yick Yuen which is within the planned Hung Shui Kiu / Ha Tsuen New Development Area (“HSK/HT NDA”). The captioned site will be acquired by the Government for construction of the planned HSK/HT NDA.
- 1.2 The Applicant is assisting the affected business operator with a proposal to relocate the Existing Concrete Batching Plant to a site located at Lots 573 RP and 1710 in D.D. 114, Shek Kong, Yuen Long (hereinafter “the Proposed Temporary Concrete Batching Plant”). **Figure 1.1** shows location of the Subject Site.
- 1.3 The Subject Site is currently zoned as “*Industrial (Group D)*” in the Approved Shek Kong Outline Zoning Plan No. S/YL-SK/9, and “*Concrete Batching Plant*” is categorized under Column 2 use. Hence, application for permission under Section 16 of the Town Planning Ordinance (Cap. 131), (“S16 Planning Application”) is required for the Proposed Temporary Concrete Batching Plant.
- 1.4 In connection, CKM Asia Limited, a traffic and transportation planning consultancy firm, was commissioned to carry out a Traffic Impact Assessment (“TIA”) in support of the S16 planning application for the Proposed Temporary Concrete Batching Plant. This TIA report has been updated in responses to the comments provided by Transport Department during the pre-submission stage.

### Scope of Study

- 1.5 The main objectives of this study are as follows:
- To assess the existing traffic condition in the vicinity of the Subject Site;
  - To present the provision of internal transport facilities;
  - To quantify the amount of traffic generated by the Proposed Temporary Concrete Batching Plant;
  - To examine the traffic impact on the local road network;
  - To identify any deficiencies in the road network in accommodating the expected traffic generation; and
  - To recommend traffic management proposal and improvement measures, if necessary.

### Structure of Report

- 1.6 After this introduction, the remaining chapters contain the following:
- Chapter Two - Describes the existing condition and surveys;
  - Chapter Three - Outlines the Proposed Temporary Concrete Batching Plant;
  - Chapter Four - Presents the traffic impact analyses;
  - Chapter Five - Summarises the overall conclusion.

## 2.0 EXISTING SITUATION

### The Subject Site

- 2.1 The Subject Site is located in Shek Kong to the east of Kam Tin Road. It has a site area of approximately 4,411m<sup>2</sup> and is currently occupied by an open storage. Access to the Subject Site is from an access road known as Chun Yiu Road, and is connected to Kam Tin Road.

### The Road Network

- 2.2 Kam Tin Road is a single carriageway 2-way rural road connecting Lam Kam Road with Tai Po to the east, and it is also connected to Tsuen Wan to the south via Route Twisk. To the west, Kam Tin Road connects Castle Peak Road – Yuen Long, Tsing Long Highway (Route 3) and Fan Kam Road.
- 2.3 Chun Yiu Road is a single track access road connecting Kam Tin Road. At present, Chun Yiu Road is some 3m to 4m wide, and a portion of Chun Yiu Road is often occupied by parked vehicles along the northern side.

### Historic Traffic Growth

- 2.4 Table 2.1 presents the historic annual average daily traffic (“AADT”) from the Annual Traffic Census (“ATC”) published by the Transport Department for roads located nearby for the latest 5 years, i.e. from 2019 to 2023.

TABLE 2.1 AADT OF ATC STATIONS LOCATED NEAR THE SUBJECT SITE

Station No.	5254	5463	6110	6207	6208	6212	OVERALL
Road	Kam Tin Road	Lam Kam Road	Kam Tin Bypass	Kam Tin Road	Kam Sheung Road	Fan Kam Road	
From	Fan Kam Road	Kam Sheung Road	Kam Tin Road	Fan Kam Road	Kam Tin Road	Kam Tin Road	
To	Kam Sheung Road E. Junction	Lam Kam Road	Kam Tin Road	Kam Sheung Road W. Junction	Kam Tin Road	Castle Peak Road	
Year	Annual Average Daily Traffic (vehicles / day)						
2019	18,510	19,580	14,990	21,300	8,080	11,660	94,120
2020	18,330	19,660	12,810	21,640	9,400	12,250	94,090
2021	19,040	20,420	12,450	20,490	8,960	12,450	93,810
2022	18,850	20,220	12,980	20,520	9,600	12,400	94,570
2023	15,740	20,900	14,490	21,510	10,460	13,890	96,990
Average Annual Growth (2019 – 2023) =							0.75%

- 2.5 Table 2.1 shows that there is increase in AADT in the past 5 years. The average annual growth between 2019 and 2023, is found to be +0.75% per annum.

### Public Transport Facilities

- 2.6 Public transport services are available along Kam Tin Road near the Subject Site, and details of the services are given in Table 2.2, and shown in Figure 2.1.

TABLE 2.2 ROAD-BASED PUBLIC TRANSPORT SERVICES OPERATING NEAR THE SUBJECT SITE

Route	Routing	Frequency (minutes)
KMB 51	Tsuen Wan (Nina Tower) ∪ Sheung Tsuen (Circular)	15 – 60
KMB 54	Yuen Long (West) ∪ Sheung Tsuen (Circular)	20 – 30
KMB 64K	Yuen Long (West) ↔ Tai Po Market Station	6 - 20
KMB 64S	Sheung Tsuen Playground → Kam Sheung Road Station	10 – 15 (4 trips) <sup>(A)(1)</sup>
KMB 251A	Kam Sheung Road Station ∪ Sheung Tsuen (Circular)	15 - 30
KMB 251B	Pat Heung Road ∪ Sheung Tsuen (Circular)	20 – 30
LWB E36P	Sheung Tsuen → Skycity	60 (2 trips) <sup>(A)(2)</sup>
	Skycity → Sheung Tsuen	20 (2 trips) <sup>(P)(2)</sup>
KMB 251M	Sheung Tsuen → Tsuen Wan Station	60 <sup>(A)(1)</sup>
GMB 72	Yuen Long Tai Hang Street ↔ Lui Kung Tin	10
RS NR917	Fan Kam Road, Yuen Long → Wan Chai	M-F: 5 - 15 (7 trips) <sup>(A)(1)</sup> Sat: 15 - 20 (3 trips) <sup>(A)(2)</sup>
	Wan Chai → Fan Kam Road, Yuen Long	25 – 30 (4 trips) <sup>(P)(1)</sup>
RS NR918	Lam Kam Road → Wan Chai	M-F: 5 - 25 (8 trips) <sup>(A)(1)</sup> Sat: 15 - 20 (3 trips) <sup>(A)(2)</sup>
	Wan Chai → Lam Kam Road	25 – 30 (3 trips) <sup>(P)(1)</sup>

Note: KMB – Kowloon Motor Bus LWB – Long Win Bus  
GMB – Green Minibus RS – Resident Services  
(A) AM Peak Services only.  
(P) Afternoon Peak Services only.  
(1) Monday to Friday. No services on Saturdays, Sundays and Public Holidays.  
(2) Monday to Saturday. No services on Sundays and Public Holidays

### Existing Traffic Flows

- 2.7 To quantify the existing traffic flows in the vicinity of the Subject Site, manual classified counts were conducted on Tuesday, 11<sup>th</sup> June 2024, and also on Friday, 4<sup>th</sup> October 2024 at the following junctions:  
J01 – Junction of Kam Tin Road / Fan Kam Road;  
J02 – Junction of Kam Tin Road / Chun Yiu Road;  
J03 – Junction of Kam Tin Road / Kam Sheung Road / Sheung Tsuen Bus Terminus; and  
J04 – Junction of Kam Tin Road / Lam Kam Road / Route Twist.
- 2.8 Locations of these surveyed junctions and the area of influence (“AOI”) are shown in Figure 2.2, and the existing junction layouts are found in Figures 2.3 – 2.6.
- 2.9 The traffic counts are classified by vehicle type to enable traffic flows in passenger car units (“pcu”) to be calculated. This TIA adopted the higher traffic flows observed in October 2024.
- 2.10 Based on the information of the ATC Core Stations 6207 and 6212 for Kam Tin Road and Fan Kam Road, the AM and PM peak hours in the vicinity of the Subject Site is from 0900 to 1000 hours, and from 1900 to 2000 hours. Whereas, the AM and PM peak hours identified from the surveys at the above junctions are found to be from 0800 to 0900 hours, and from 1700 to 1800 hours respectively.



- 2.11 With reference to the ATC, the traffic surveys conducted, and the expected operation of the Proposed Temporary Concrete Batching Plant, the peak hour considered in this TIA included the following:
- i) 0800 – 0900 hours (“AM-8 Peak Hour”)
  - ii) 0900 – 1000 hours (“AM-9 Peak Hour”)
  - iii) 1700 – 1800 hours (“PM Peak Hour”), and
  - iv) 1900 – 2000 hours (“Evening Peak Hour”).
- 2.12 **Figure 2.7** presents the observed peak hour traffic flows in pcu/hour, and the detail of vehicle composition is summarised in **Appendix A**.

### Performance of the Surveyed Junctions

- 2.13 Existing performance of the surveyed junctions are calculated based on the methods outlined in Volume 2 of the Transport Planning and Design Manual (“TPDM”), which is published by the Transport Department. The results of the performance of junctions are summarised in Table 2.3, and detailed calculations of junction performance are found in **Appendix B**.

TABLE 2.3 EXISTING JUNCTION PERFORMANCE

Ref.	Junction	Type of Junction	Parameter	Peak Hour			
				AM-8	AM-9	PM	Evening
J01	Kam Tin Road / Fan Kam Road	Roundabout	RFC	0.498	0.571	0.506	0.592
J02	Kam Tin Road / Chun Yiu Road	Priority	RFC	0.055	0.054	0.167	0.167
J03	Kam Tin Road / Kam Sheung Road / Sheung Tsuen Bus Terminus	Priority	RFC	0.81	0.76	0.71	0.73
J04	Kam Tin Road / Lam Kam Road / Route Twist	Roundabout	RFC	0.551	0.529	0.578	0.587

Note: RFC – Ratio of Flow to Capacity  
For priority and roundabout,  $RFC < 1$  indicates the junction operates within capacity, and  $RFC \geq 1$  indicates the junction operates at / over capacity.

- 2.14 The results in Table 2.3 shows that the junctions analysed operate with capacity.

### Performance of the Surveyed Road Links

- 2.15 The existing performance, in terms of Peak Hourly Flows / Design Flow Ratio (“P/Df”), of Kam Tin Road and Chun Yiu Road within the AOI are calculated based on the observed traffic flows and the analysis results are summarized in Table 2.4.

TABLE 2.4 EXISTING ROAD LINK PERFORMANCE

Road Link	Configuration	Design Flow (veh/hr)	Peak Hour 2-way Traffic Flows (veh/hr) [Peak Hour Flows / Design Flow Ratio (P/Df)]			
			AM-8	AM-9	PM	Evening
Kam Tin Road	Single-2 District Distributor	1,581 <sup>(1)</sup>	836 [0.529]	798 [0.505]	866 [0.548]	877 [0.555]
Chun Yiu Road	Single Track Access Road	100 <sup>(2)</sup>	49 [0.490]	48 [0.480]	80 [0.800]	80 [0.800]

- (1) Design flow in reference with TPDM for single 2-lane 7.3m carriageway, i.e. 1,700 veh/hr for **both** direction of flow, and reduced by 7% considering percentage of heavy vehicles is between 15% and 20%.  
(2) Design flow in reference with TPDM for single track access road, i.e. 100 veh/hr.

- 2.16 The results in Table 2.4 show that Kam Tin Road and Chun Yiu Road within the AOI operate with capacity.

### 3.0 THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT

#### Development Schedule

- 3.1 The Proposed Temporary Concrete Batching Plant has 2 production lines with maximum concrete production capacity of 100m<sup>3</sup>/hour/line. Sufficient loading / unloading facilities meeting the operational requirements are provided within the Proposed Temporary Concrete Batching Plant.

#### Vehicular Access Point

- 3.2 The Subject Site has an existing vehicular access point at Chun Yiu Road, which connects to Kam Tin Road. The Proposed Temporary Concrete Batching Plant will continue to access via the existing vehicular access point.

#### Upgrading of Chun Yiu Road

- 3.3 Chun Yiu Road will be upgraded and paved to allow 2-lane 2-way traffic with a minimum carriageway width of 6m between Kam Tin Road and the Subject Site. **Figures 3.1** shows the proposed upgrading of Chun Yiu Road, and location of the vehicular access point for the Subject Site.

#### Proposed Haulage Route

- 3.4 Haulage routes to and from the Subject Site are presented in **Figure 3.2**.

#### Operation of Proposed Temporary Concrete Batching Plant

- 3.5 The Proposed Temporary Concrete Batching Plant is expected to operate daily from 0700 to 2300 hours. Details of vehicle movements related to the concrete production and the delivery of raw materials are presented in Table 3.1.

TABLE 3.1 DETAILS OF VEHICLE MOVEMENTS AT DIFFERENT TIME PERIODS

Type of Vehicle Movement	Type of Vehicle	Typical Vehicle Dimension (Approx.)	Traffic Generation (veh/hour)		
			AM Peak Production (0700 – 0900)	Daytime Operation (0900 – 1900)	Evening Raw Material Delivery (1900 – 2300)
<b>Concrete Production</b>					
Concrete	Concrete Mixer	Heavy Goods Vehicles: 11m (L) x 2.5m (W)	20 <sup>(1)</sup>	Max. 20 <sup>(2)</sup>	4
<b>Raw Material Delivery</b>					
Aggregate / Sand	Aggregate/ Sand Truck	Heavy Goods Vehicles: 11m (L) x 2.5m (W)	0	10	11
Ice	Ice truck		2	2	0
Admixture	Admixture Truck		0	1	0
Waste	Waste Truck		0	1	0
Cement / PFA	Cement / PFA Tanker	Articulated Vehicles: 15.4m (L) x 2.5m (W)	0	4	1
<b>TOTAL</b>			<b>22</b>	<b>38</b>	<b>16 <sup>(3)</sup></b>

Note:

- (1) Maximum concrete production capacity = 100m<sup>3</sup> per production line x 2 production lines ÷ typical capacity of 10m<sup>3</sup> per concrete mixer truck = 20 nos.  
(2) Maximum 20 nos, may be less if hourly production demand does not reach the maximum production capacity.  
(3) Due to environmental concern, traffic generation may be limited to either 4 concrete mixers **or** 12 deliveries of raw material; but to be conservative, a combined number of 16 vehicles in total are assumed in the TIA.

3.6 Table 3.1 shows the following:

- During the **AM peak production**, i.e. 0700 to 0900 hours, the Proposed Temporary Concrete Batching Plant is expected to operate at its production capacity, and 20 concrete mixer trucks are generated. Raw materials will not be delivered during this time, except for ice which cannot be produced or stored on-site. Hence, a total of 22 vehicles are generated.
- During the **daytime operation**, which is from 0900 to 1900 hours, there are no more than 20 concrete mixers and 18 vehicles delivering raw materials per hour. Hence, a total of no more than 38 vehicles are generated.
- During the **evening raw material delivery period** which is from 1900 to 2300 hours, the production of concrete is expected to be reduced to only 4 concrete mixers per hour, or the delivery of raw materials is expected to be 12 vehicles per hour due to environmental constraints. To be conservative for traffic analysis, the total of 16 vehicles per hour are assumed.

3.7 To ensure traffic generation of the Proposed Temporary Concrete Batching Plant will match the estimation presented in Table 3.1 above, the Applicant will require the operator to keep record of all vehicles entering and leaving Proposed Temporary Concrete Batching Plant; and these records can be provided for review by the Authority upon request.

*Traffic Generation Surveys at Other Similar Existing Concrete Batching Plant*

3.8 To verify the estimated traffic generation presented in Table 3.1, traffic generation surveys were conducted at the following 2 existing concrete batching plants which are located in Tong Yan San Tsuen, Yuen Long:

- Site 1: Golik Concrete Limited
- Site 2: Redland Concrete Ltd

3.9 Similar to the Proposed Temporary Concrete Batching Plant, the 2 surveyed concrete batching plants have 2 production lines. Table 3.2 presents the survey results.

TABLE 3.2 RESULTS OF TRAFFIC GENERATION SURVEYS AT OTHER SIMILAR CONCRETE BATCHING PLANTS

Hours	Traffic Generation (veh/hour)					
	Site 1 - Golik Concrete Limited			Site 2 - Redland Concrete Ltd		
	Concrete Mixer	Raw Material Delivery	TOTAL	Concrete Mixer	Raw Material Delivery	TOTAL
0700 – 0800	11	2	13	4	2	6
0800 – 0900	18	13	31	8	3	11
0900 – 1000	20	12	32	10	6	16
1000 – 1100	20	18	38	11	4	15
1100 – 1200	19	15	34	19	9	28
1200 – 1300	20	13	33	15	3	18
1300 – 1400	19	16	35	12	5	17
1400 – 1500	19	14	33	16	6	22
1500 – 1600	20	9	29	11	7	18
1600 – 1700	15	1	16	16	5	21
1700 – 1800	14	2	16	13	7	20
1800 – 1900	5	1	6	14	4	18
1900 – 2000	2	0	2	13	2	15

- 3.10 Table 3.2 shows that Site 1 generates more traffic than Site 2, and the following are observed:
- i) The number of concrete mixers trucks generated peaked at 18 to 20 vehicles per hour between 0800 and 1600 hours;
  - ii) The number of raw material delivery vehicles was no more than 19 vehicles per hour between 0800 and 1600 hours; and
  - iii) The maximum number of vehicles generated was 38, including 20 concrete mixer trucks, and 18 raw material delivery vehicles.
- 3.11 Results of the above traffic generation surveys show that the estimated traffic generation for the Proposed Temporary Concrete Batching Plant found in Table 3.1 is of similar order.

#### Internal Transport Facilities

- 3.12 Internal transport facilities provided for the Proposed Temporary Concrete Batching Plant are presented in **Table 3.3**, and the master layout plan is shown in **Figures 3.3**

TABLE 3.3 INTERNAL TRANSPORT FACILITIES

Ref.	Type	Dimension	Quantity
<b>Car Parking Spaces</b>			
CP1 & CP2	Car Parking Spaces	5.0m (L) x 2.5m (W) x 2.4m (H)	2
<b>Goods Vehicle Loading / Unloading</b>			
LP1, LP6 & LP12	Raw Material Unloading and Waster Collection	11.0m(L) x 3.5m(W) x 4.7m(H)	3
LP2 – LP5, & LP7 – LP9	Concrete Mixer Waiting Spaces	11.0m(L) x 3.5m(W) x 4.7m(H)	7
LP10 & LP11	Mixer Loading Bays	11.0m(L) x 3.5m(W) x 4.7m(H)	2
LP13 & LP14	Raw Material Unloading	16.0m(L) x 3.5m(W) x 4.7m(H)	2
<b>TOTAL</b>			<b>2 + 14</b>

#### Swept Path Analysis

- 3.13 Swept path analyses using CAD-based program were carried out to ensure ease of vehicle manoeuvring within the Proposed Temporary Concrete Batching Plant. No manoeuvring issue is found.
- 3.14 In addition, in response to Transport Department comment, swept path of articulated vehicles travelling along the proposed haulage route within the AOI was also carried, and no manoeuvring issue is found also.
- 3.15 The swept path analysis drawings are found in the **Appendix C**

## 4.0 TRAFFIC IMPACT

### Design Year

- 4.1 Should the planning application for the Proposed Temporary Concrete Batching Plant be approved by the Town Planning Board in 2025, the planning permission will expire in 5 years, i.e. 2030. Hence, the traffic assessment year adopted is 2030.
- 4.2 The 2 scenarios for year 2030 assessed are:
- (i) Year 2030 peak hours without the Proposed Temporary Concrete Batching Plant;
  - (ii) Year 2030 peak hours with the Proposed Temporary Concrete Batching Plant

### Traffic Forecast

- 4.3 The design year traffic flows are estimated as follows:
- (i) Expected traffic growth from 2024 to 2030 with reference to the historic traffic growth from the ATC;
  - (ii) Traffic generated by other known planned / committed developments located in the vicinity, and
  - (iii) Traffic generation of the Proposed Temporary Concrete Batching Plant.
- 4.4 Details of the above are presented in below paragraphs.
- (i) Traffic Growth Rate
- 4.5 With reference to Table 2.1, a conservative growth rate of 1.0% per annum is adopted to produce the 2030 traffic flows from 2024.
- (ii) Other Known Planned / Committed Developments
- 4.6 A review of public domain, including the Town Planning Board's Statutory Planning Portal 3, etc., was undertaken to identify other known major planned / committed developments located in the vicinity. Only 1 development is found with expected completion on or before the design year, and details are presented in Table 4.1.

TABLE 4.1 DETAILS OF OTHER KNOWN MAJOR PLANNED / COMMITTED DEVELOPMENT WITHIN THE AOI

Location	Parameters
Proposed House Development at Lots No. 1691 RP (Part) and 1691 S.E in D.D.114 and Adjoining Government Land, East of Kam Tin Road, Pat Heung, Yuen Long	8 Houses

- 4.7 In addition, the Kam Tin South Public Housing Development located some 3.5km west of the Subject Site to the south of MTR Kam Sheung Road Station is also taken into consideration.
- (iii) Traffic Generation of the Proposed Temporary Concrete Batching Plant
- 4.8 With reference to Table 3.1, the estimated traffic generation of the Proposed Temporary Concrete Batching Plant is given in Table 4.2.

TABLE 4.2 TRAFFIC GENERATION OF THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT

Item	AM Peak Production (AM-8 Peak Hour)		Daytime Operation (AM-9 and PM Peak Hour)		Evening Raw Material Delivery (Evening Peak Hour)	
	Generation	Attraction	Generation	Attraction	Generation	Attraction
Total in veh/hr [From Table 3.1]	22	22	38	38	16	16
PCU Factor	2.5	2.5	2.5	2.5	2.5	2.5
<b>Total in PCU/Hour</b>	<b>55</b>	<b>55</b>	<b>95</b>	<b>95</b>	<b>40</b>	<b>40</b>
	<b>110 (2-way)</b>		<b>190 (2-way)</b>		<b>80 (2-way)</b>	

4.9 Table 4.2 shows that the Proposed Temporary Concrete Batching Plant is expected to generate 110 (2-way) pcu during the AM peak hour, 190 (2-way) pcu during the PM peak hour, and 80 (2-way) during the evening peak hour.

### 2030 Traffic Flows

4.10 Year 2030 traffic flows for the following cases are derived:

$$2030 \text{ Traffic Flows without the Proposed Temporary Concrete Batching Plant [A]} = 2024 \text{ Existing Traffic Flows} + \text{Traffic Growth from 2024 to 2030} + \text{Traffic Generated by Other Development}$$

$$2030 \text{ Traffic Flows with the Proposed Temporary Concrete Batching Plant} = [A] + \text{Traffic Generation of the Proposed Temporary Concrete Batching Plant}$$

4.11 Figures 4.1 and 4.2 show the year 2030 peak hour traffic flows for the cases without and with the Proposed Temporary Concrete Batching Plant.

### 2030 Junction Capacity Analysis

4.12 The 2030 junction capacity analyses for the cases without and with the Proposed Temporary Concrete Batching Plant are summarised in Table 4.3 and the detailed calculations are found in Appendix B.

TABLE 4.3 2030 JUNCTION PERFORMANCE

Ref.	Junction	Without the Proposed Temporary Concrete Batching Plant				With the Proposed Temporary Concrete Batching Plant			
		AM-8	AM-9	PM	Evening	AM-8	AM-9	PM	Evening
J01	Kam Tin Road / Fan Kam Road	0.545	0.622	0.552	0.646	0.570	0.669	0.597	0.666
J02	Kam Tin Road / Chun Yiu Road	0.060	0.058	0.189	0.189	0.314	0.549	0.749	0.378
J03	Kam Tin Road / Kam Sheung Road / Sheung Tsuen Bus Terminus	0.91	0.85	0.78	0.81	0.97	0.95	0.88	0.85
J04	Kam Tin Road / Lam Kam Road / Route Twist	0.594	0.571	0.622	0.633	0.637	0.646	0.697	0.665

Note: RFC – Ratio of Flow to Capacity  
For priority and roundabout, RFC < 1 indicates the junction operates within capacity, and RFC ≥ 1 indicates the junction operates at / over capacity.

4.13 Table 4.3 shows that the junctions analysed have capacity to accommodate the expected traffic growth to 2030 and the traffic generated by the Proposed Temporary Concrete Batching Plant.

### 2030 Road Link Capacity Analysis

- 4.14 Road link capacity analyses for 2030 without and with the Proposed Temporary Concrete Batching Plant are summarised in **Table 4.4**.

TABLE 4.4 2030 ROAD LINK PERFORMANCE

Road Link	Configuration	Design Flow (veh/hr)	Peak Hour 2-way Traffic Flows [Peak Hour Flows / Design Flow Ratio (P/Df)]			
			AM-8	AM-9	PM	Evening
<b>Without the Proposed Temporary Concrete Batching Plant</b>						
Kam Tin Road	Single-2 District Distributor	1,581 <sup>(1)</sup>	903 [0.571]	865 [0.547]	921 [0.583]	926 [0.586]
Chun Yiu Road	Single Track Access Road	100 <sup>(2)</sup>	53 [0.530]	52 [0.520]	84 [0.840]	84 [0.840]
<b>With the Proposed Temporary Concrete Batching Plant</b>						
Kam Tin Road	Single-2 District Distributor	1,581 <sup>(1)</sup>	999 [0.632]	1,031 [0.652]	1,087 [0.688]	995 [0.629]
Chun Yiu Road	Single-2 Local Road	720 <sup>(3)</sup>	171 <sup>(4)</sup> [0.238]	250 <sup>(4)</sup> [0.347]	287 <sup>(4)</sup> [0.399]	177 <sup>(4)</sup> [0.246]

(1) Design flow in reference with TPDM for single 2-lane 7.3m carriageway, i.e. 1,700 veh/hr for **both** direction of flow, and reduced by 7% considering percentage of heavy vehicles is between 15% and 20%

(2) Design flow in reference with TPDM for single track access road, i.e. 100 veh/hr.

(3) Design flow in reference with TPDM for single 2-lane local road, i.e. 800 veh/hr, 2-way, and reduced by 10% considering high percentage of heavy vehicles

(4) In view of very high percentage of heavy vehicles, traffic flows in passenger car unit is adopted.

- 4.15 Table 4.4 shows that both Kam Tin Road and the upgraded Chun Yiu Road have capacity to accommodate the expected traffic growth in 2030 and the traffic generated by the Proposed Temporary Concrete Batching Plant.

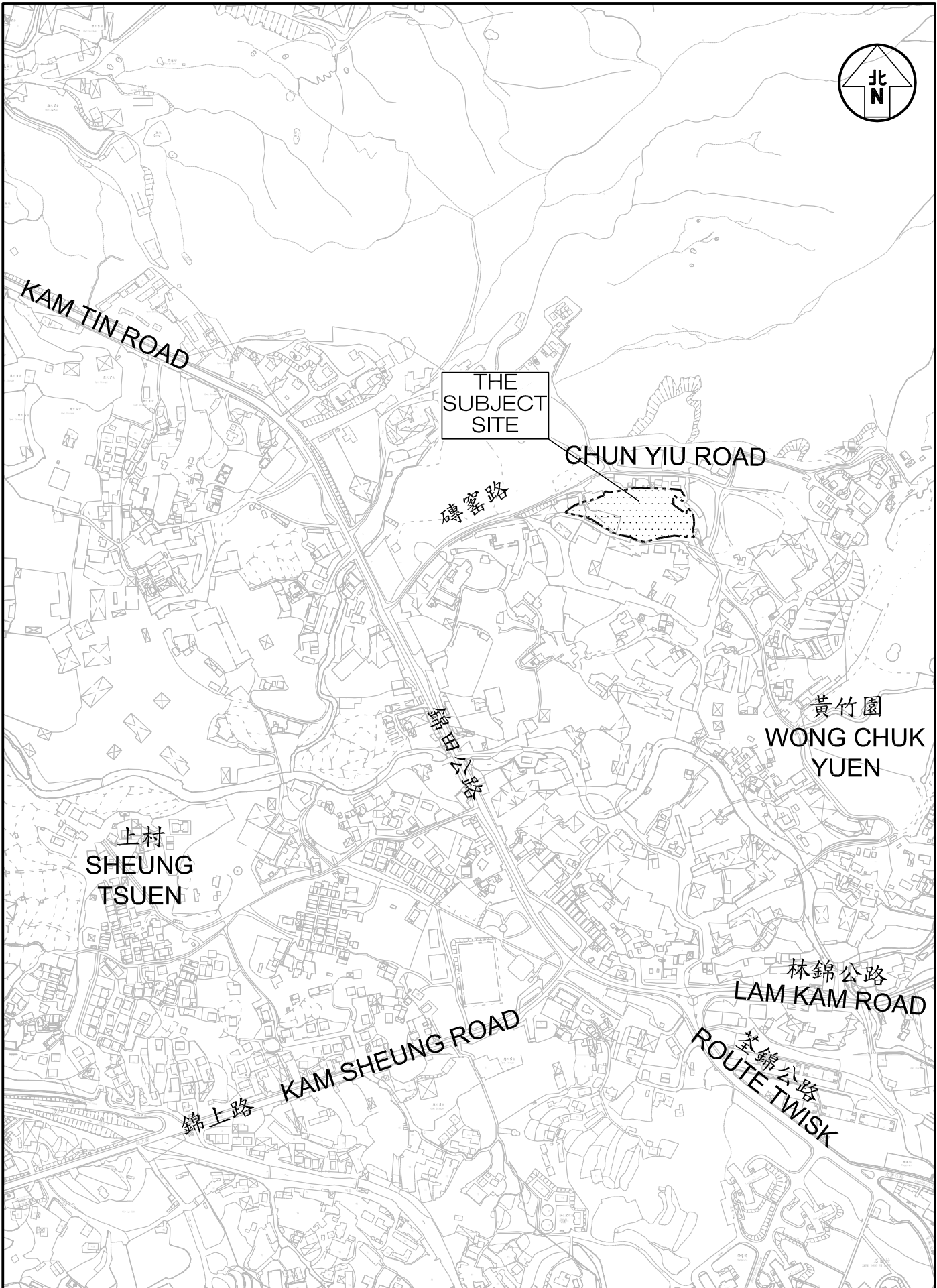
## 5.0 SUMMARY

- 5.1 The Applicant proposes to relocate the concrete batching plant from Yick Yuen, Hung Sui Kiu in Yuen Long to the Subject Site which is in Shek Kong due to land acquisition by the Government for construction of the planned HSK/HT NDA.
- 5.2 The Proposed Temporary Concrete Batching Plant will have 2 production lines, and provides sufficient internal transport facilities including concrete mixer truck waiting spaces and queuing area to ensure that vehicles will not queue back onto the public road. The existing vehicle access to the Subject Site, which is Chun Yiu Road is proposed to be upgraded to 2-lane with a minimum carriageway width of 6m to serve the Proposed Temporary Concrete Batching Plant.
- 5.3 Manual classified counts were conducted at junctions located in the vicinity of the Proposed Temporary Concrete Batching Plant in order to establish the peak hour traffic flows. Currently, the junctions operate with capacities during the AM, PM and evening PM peak hours.
- 5.4 The Proposed Temporary Concrete Batching Plant is expected to be completed by 2026, and the capacity analyses are undertaken for year 2030. All junctions and road link analysed have sufficient capacity to accommodate the expected traffic flow to 2030 and the traffic generated by the Proposed Temporary Concrete Batching Plant.
- 5.5 From traffic engineering viewpoint, the Proposed Temporary Concrete Batching Plant is considered acceptable.



**Figures**

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THE  
SUBJECT  
SITE

KAM TIN ROAD

CHUN YIU ROAD

磚窰路

黃竹園

WONG CHUK  
YUEN

上村  
SHEUNG  
TSUEN

錦田公路

林錦公路

LAM KAM ROAD

KAM SHEUNG ROAD

聖錦公路  
ROUTE TWISK

錦上路

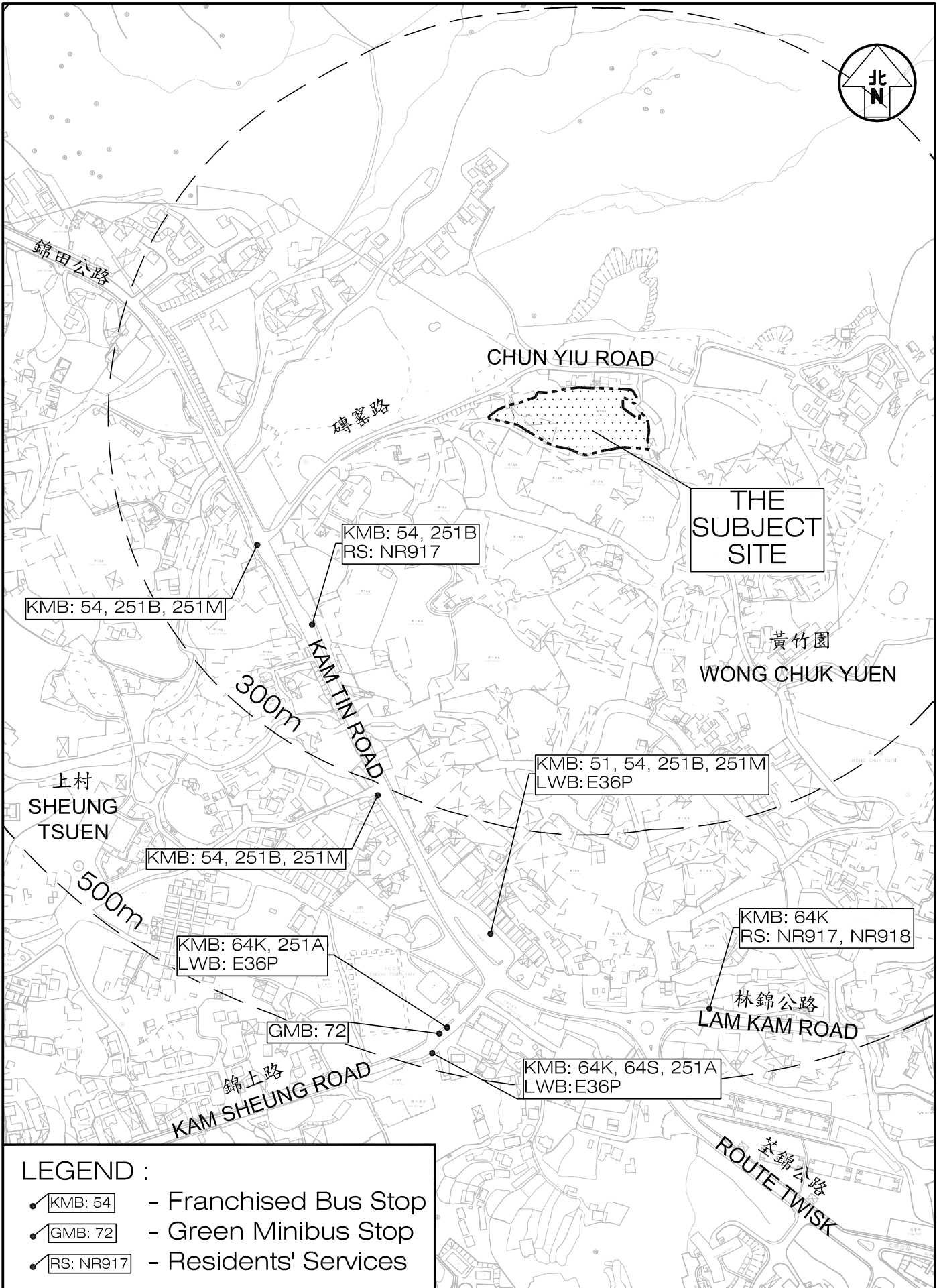
Project Title  
**PROPOSED TEMPORARY CONCRETE BATCHING PLANT  
WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS  
AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT**

Job No. J7342	Figure No. <b>1.1</b>	Scale in A4 <b>1 : 5,000</b>	
Designed by M C Y	Drawn by S C Y	Checked by K C	Revision A
		Date <b>13 JAN 2025</b>	

Figure Title  
**LOCATION OF THE SUBJECT SITE**

**CKM Asia Limited**  
Traffic and Transportation Planning Consultants  
21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong  
Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 1.1 RevA.dwg



**THE  
SUBJECT  
SITE**

KMB: 54, 251B  
RS: NR917

KMB: 54, 251B, 251M

KMB: 51, 54, 251B, 251M  
LWB: E36P

KMB: 54, 251B, 251M

KMB: 64K  
RS: NR917, NR918

KMB: 64K, 251A  
LWB: E36P

GMB: 72

KMB: 64K, 64S, 251A  
LWB: E36P

**LEGEND :**

-  - Franchised Bus Stop
-  - Green Minibus Stop
-  - Residents' Services

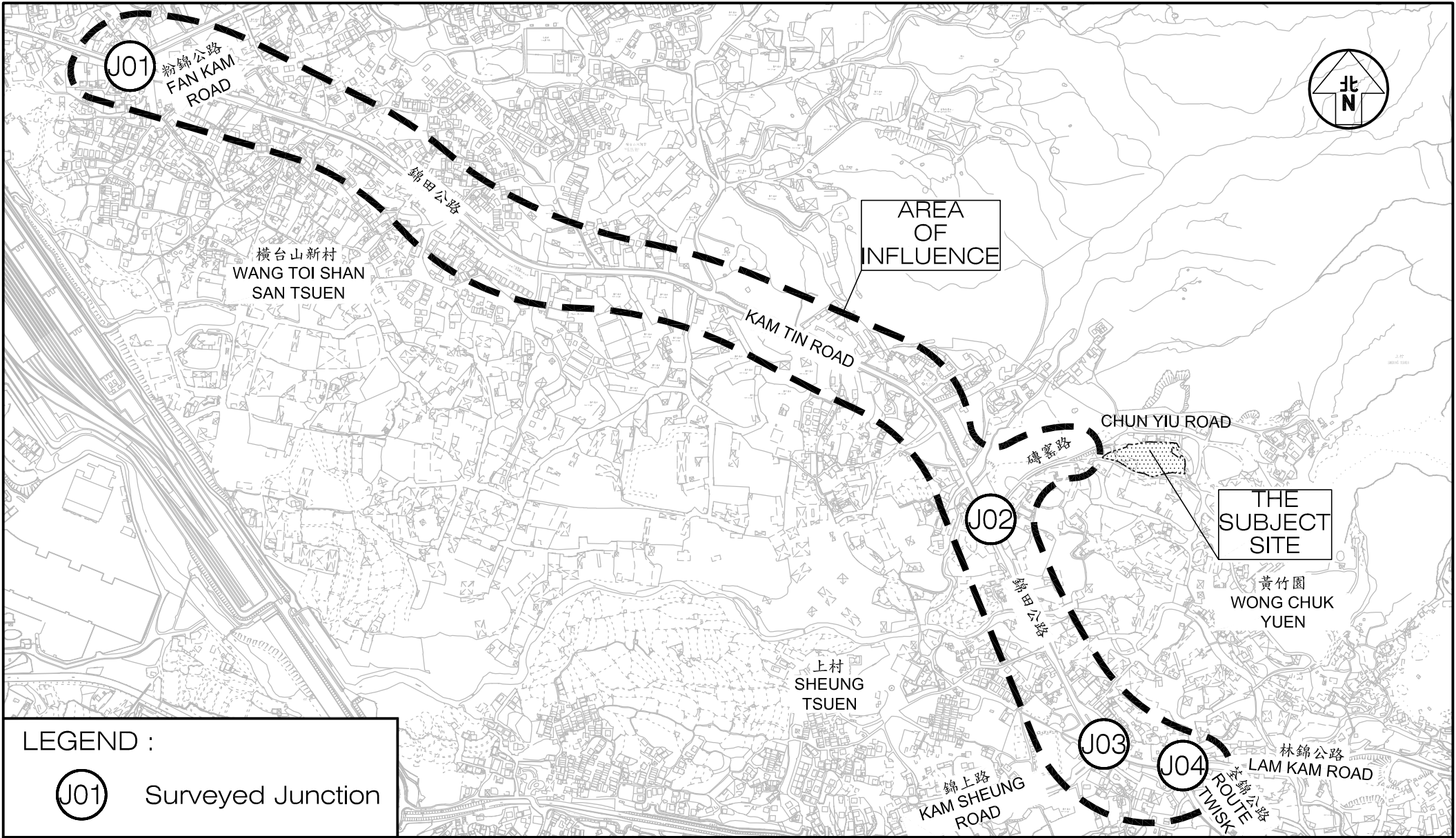
Project Title  
**PROPOSED TEMPORARY CONCRETE BATCHING PLANT  
WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS  
AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT**

Figure Title  
**ROAD-BASED PUBLIC TRANSPORT SERVICES  
OPERATING NEAR THE SUBJECT SITE**

Job No. J7342	Figure No. <b>2.1</b>	Scale in A4 1 : 4,000
Designed by M C Y	Drawn by S C Y	Checked by K C
	Revision A	Date 13 JAN 2025

**CKM Asia Limited**  
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**LEGEND :**

**(J01)** Surveyed Junction

Project Title **PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT** J7342

Figure No. **2.2** Revision **B**

**CKM Asia Limited**  
Traffic and Transportation Planning Consultants

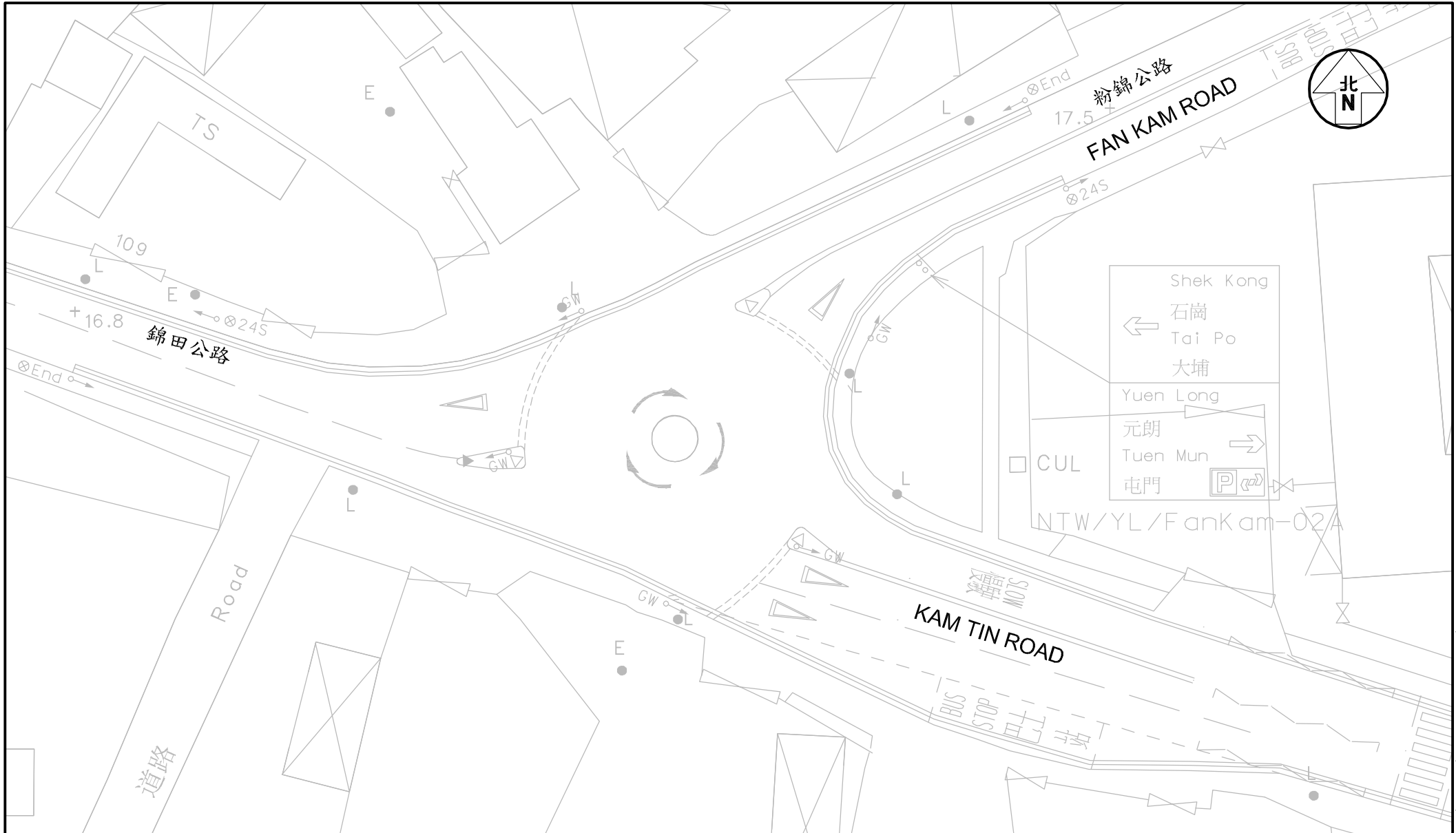
Figure Title **LOCATIONS OF SURVEYED JUNCTIONS AND AREA OF INFLUENCE**

Designed by **M C Y** Drawn by **S C Y** Checked by **K C**

Scale in A4 **1 : 8,000** Date **14 JAN 2025**

21st Floor, Methodist House, 36 Hennessy Road,  
Wan Chai, Hong Kong  
Tel : (852) 2520 5990 Fax : (852) 2528 6343  
Email : mail@ckmasia.com.hk

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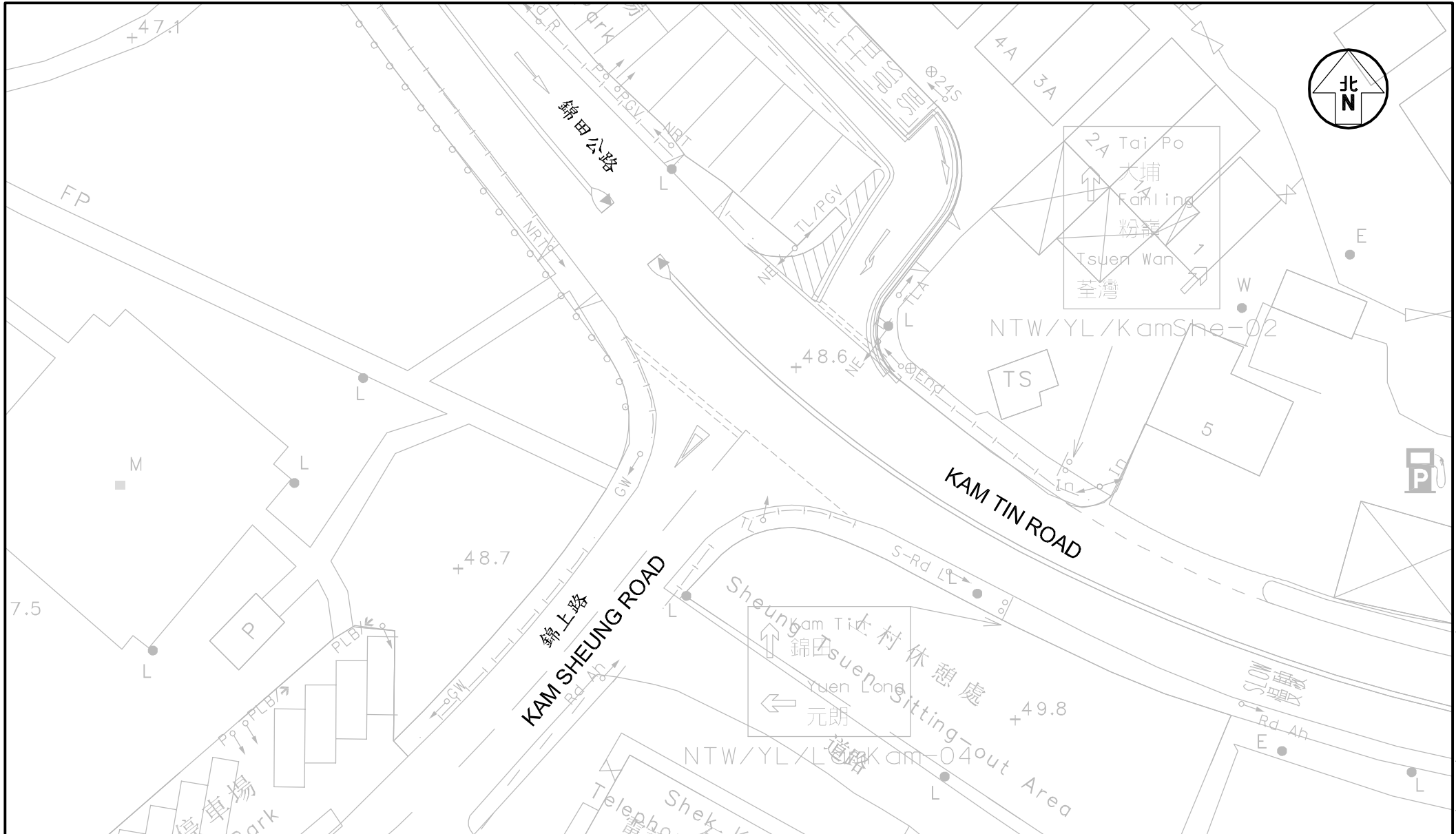


Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>2.3</b>	Revision <b>A</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	
Figure Title <b>JUNCTION OF KAM TIN ROAD / FAN KAM ROAD</b>	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>		Checked by <b>K C</b>
	Scale in A4 <b>1 : 400</b>	Date <b>14 JAN 2025</b>		

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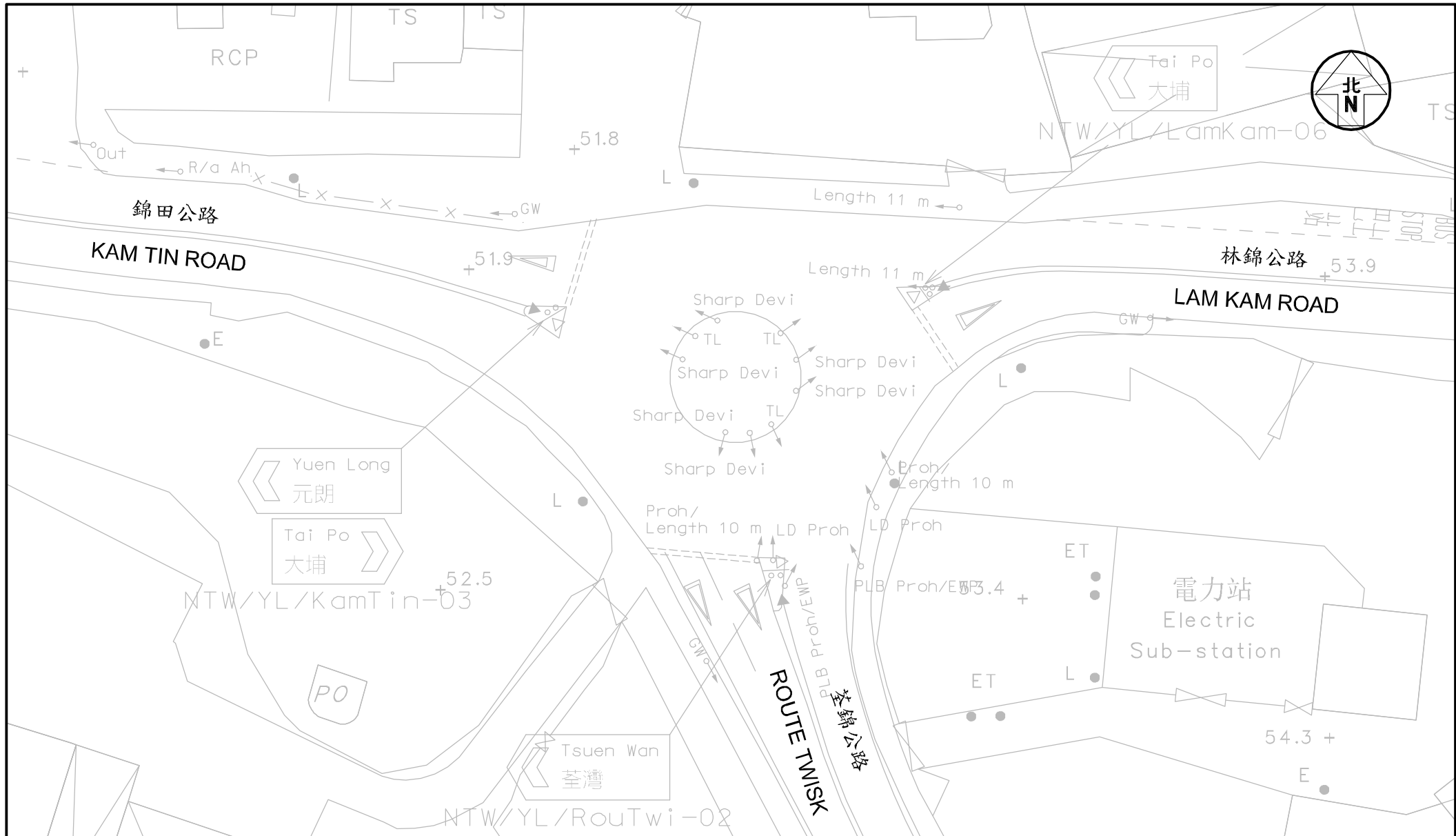


Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>2.4</b>	Revision <b>A</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	
Figure Title <b>JUNCTION OF KAM TIN ROAD / CHUN YIU ROAD</b>	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>		Checked by <b>K C</b>
	Scale in A4 <b>1 : 400</b>	Date <b>14 JAN 2025</b>		



Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>2.5</b>	Revision <b>A</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	
Figure Title <b>JUNCTION OF KAM TIN ROAD / KAM SHEUNG ROAD /          SHEUNG TSUEN BUS TERMINUS</b>	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>		Checked by <b>K C</b>
	Scale in A4 <b>1 : 400</b>	Date <b>14 JAN 2025</b>		

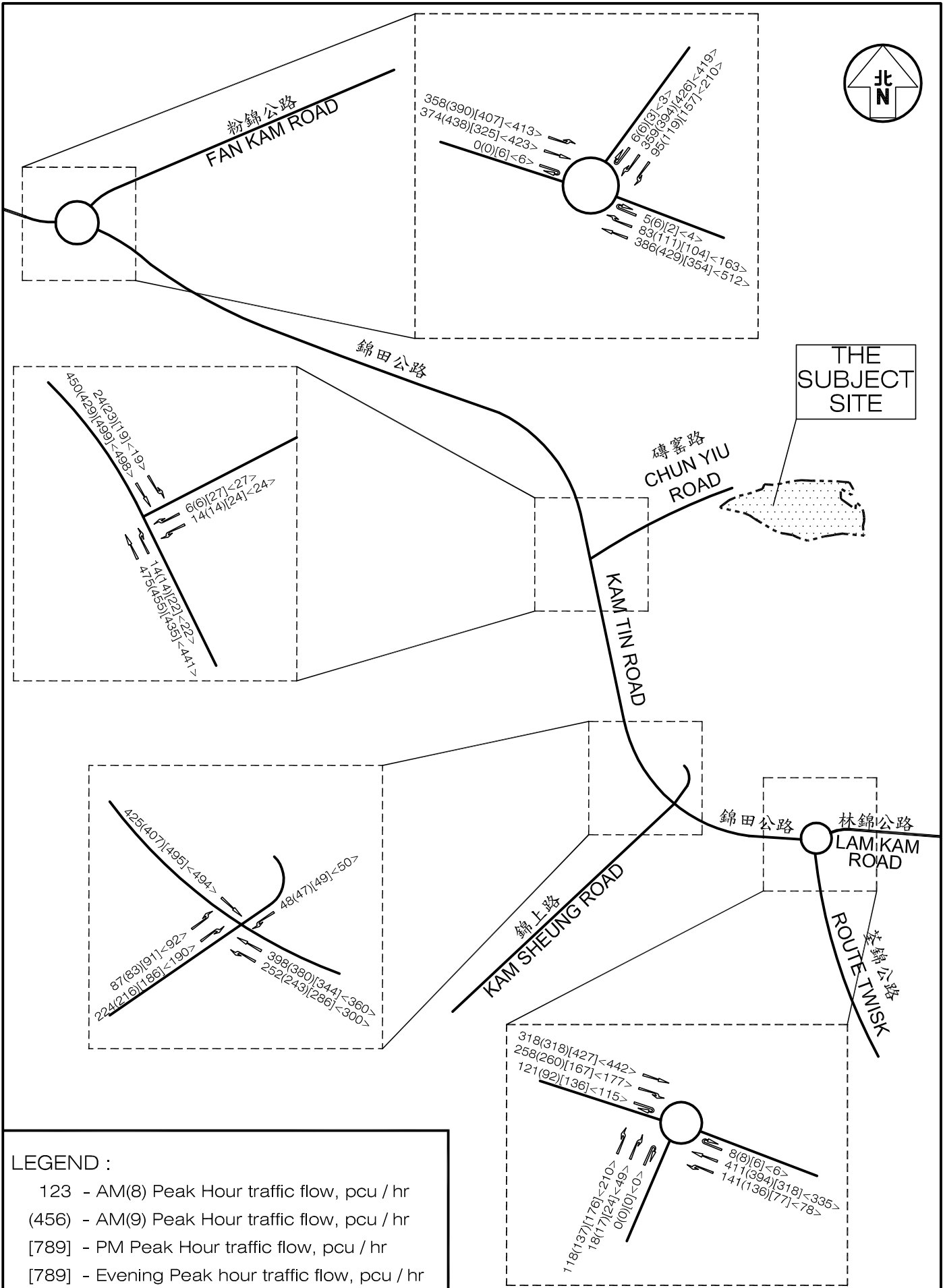
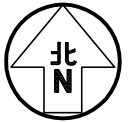
T:\JOB\J7300-J7349\J7342(2025 01) TIA\_F2\Fig 2.3-2.6 RevA.dwg



Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>2.6</b>	Revision <b>A</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	
Figure Title <b>JUNCTION OF KAM TIN ROAD / ROUTE TWISK</b>	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>		Checked by <b>K C</b>
Scale in A4 <b>1 : 400</b>		Date <b>14 JAN 2025</b>		

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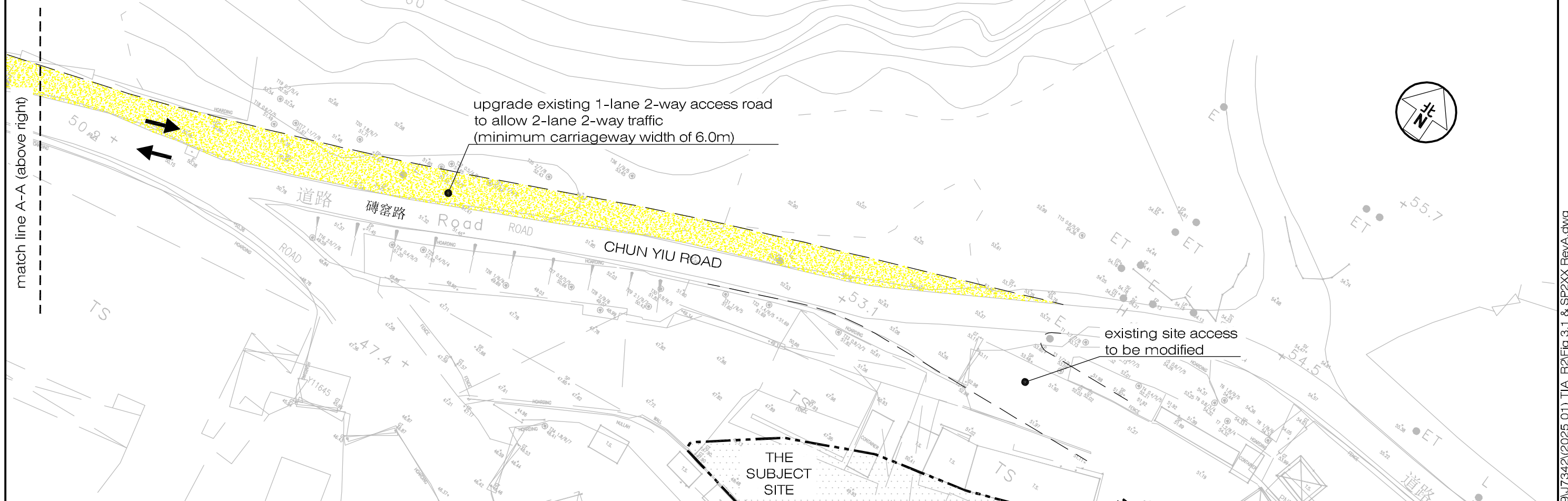
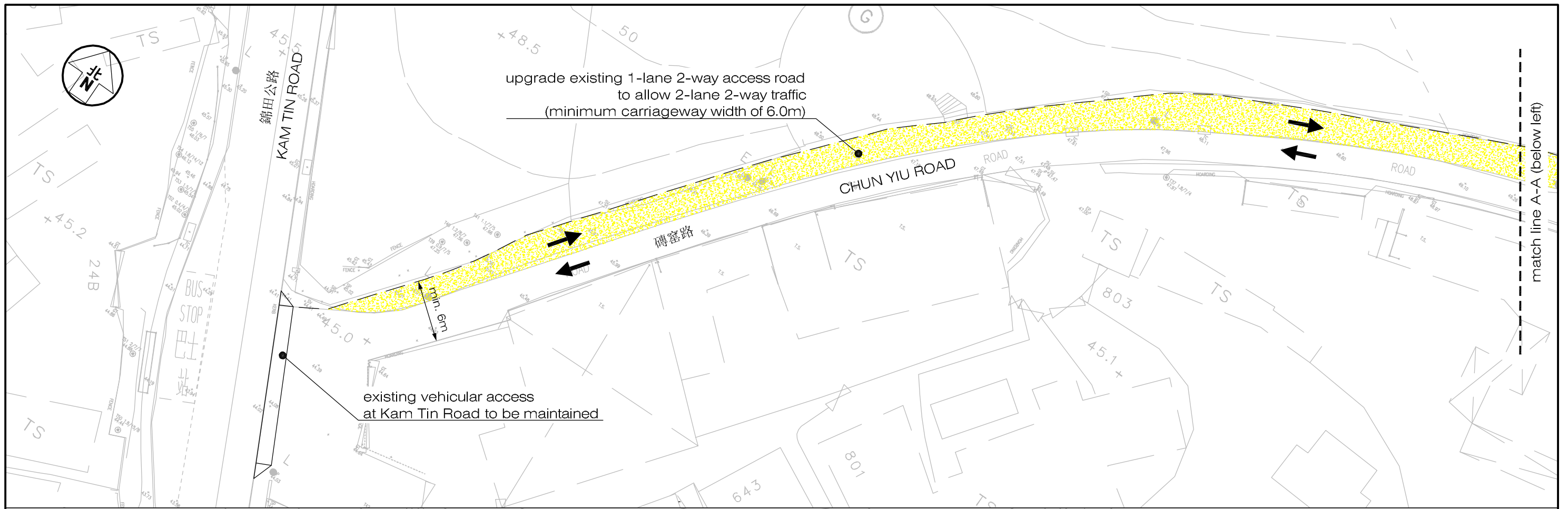
THE SUBJECT SITE

**LEGEND :**

- 123 - AM(8) Peak Hour traffic flow, pcu / hr
- (456) - AM(9) Peak Hour traffic flow, pcu / hr
- [789] - PM Peak Hour traffic flow, pcu / hr
- [789] - Evening Peak hour traffic flow, pcu / hr

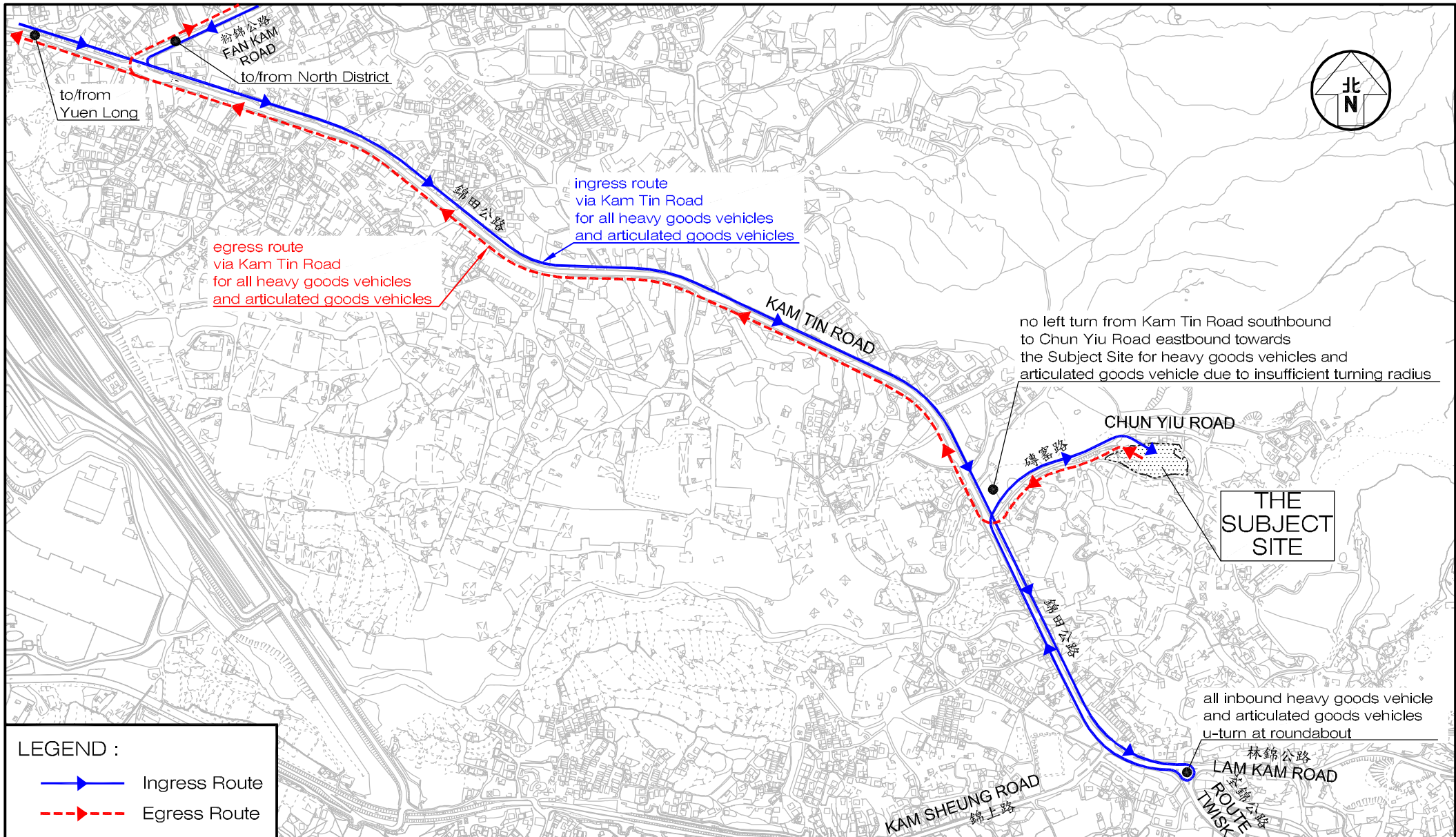
Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Job No. <b>J7342</b>	Figure No. <b>2.7</b>	Scale in A4 <b>N.T.S.</b>	
	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>	Checked by <b>K C</b>	Revision <b>A</b>
Figure Title <b>EXISTING PEAK HOUR TRAFFIC FLOWS</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk			

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Project Title	PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	Figure No. J7342 3.1	Revision A	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
Figure Title	PROPOSED UPGRADING OF CHUN YIU ROAD	Designed by W C H	Drawn by S C Y	
		Scale in A3 1 : 400	Date 13 JAN 2025	

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.1 & SP2XX RevA.dwg



Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT J7342

Figure No. 3.2

Revision B

**CKM Asia Limited**  
Traffic and Transportation Planning Consultants

Figure Title

**PROPOSED HAULAGE ROUTES**

Designed by M C Y

Drawn by S C Y

Checked by K C

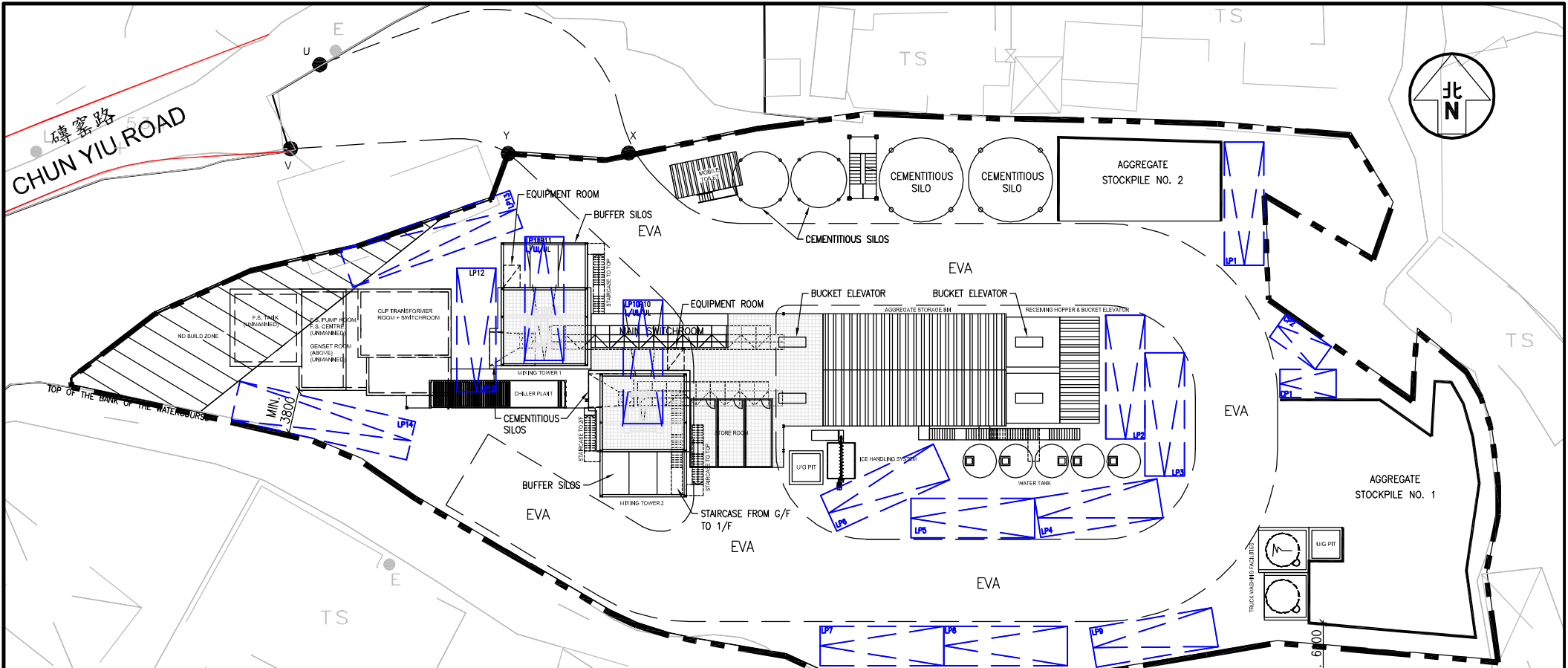
Scale in A4 1 : 8,000

Date 13 JAN 2025




21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong

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Email : mail@ckmasia.com.hk



**LEGEND :**

-  Car Parking Spaces [2 nos.]  
 @5.0m(L) X 2.5m(W) X Min.2.4m(H)
-  HGV Loading / Unloading Bays [11 nos.]  
 @11.0m(L) X 3.5m(W) X Min.4.7m(H)
-  Articulated Vehicle Loading / Unloading Bays [2 nos.]  
 @16.0m(L) X 3.5m(W) X Min.4.7m(H)

Project Title **PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT** J7342

Figure No. **3.3** Revision **A**

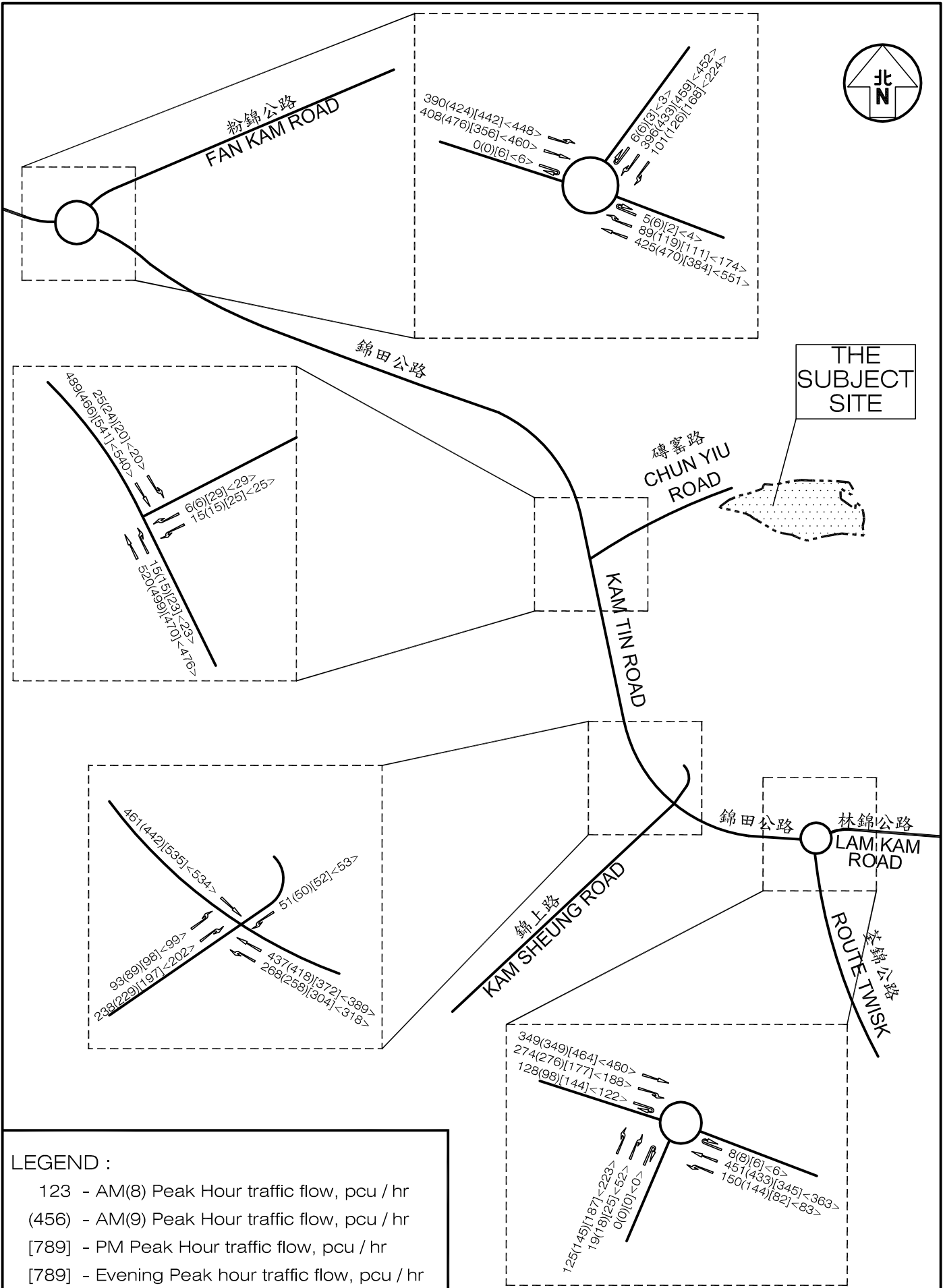
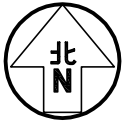
**CKM Asia Limited**  
 Traffic and Transportation Planning Consultants

Figure Title **LAYOUT OF THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT**

Designed by **M C Y** Drawn by **S C Y** Checked by **K C**  
 Scale in A4 **1 : 500** Date **14 JAN 2024**

21st Floor, Methodist House, 36 Hennessy Road,  
 Wan Chai, Hong Kong  
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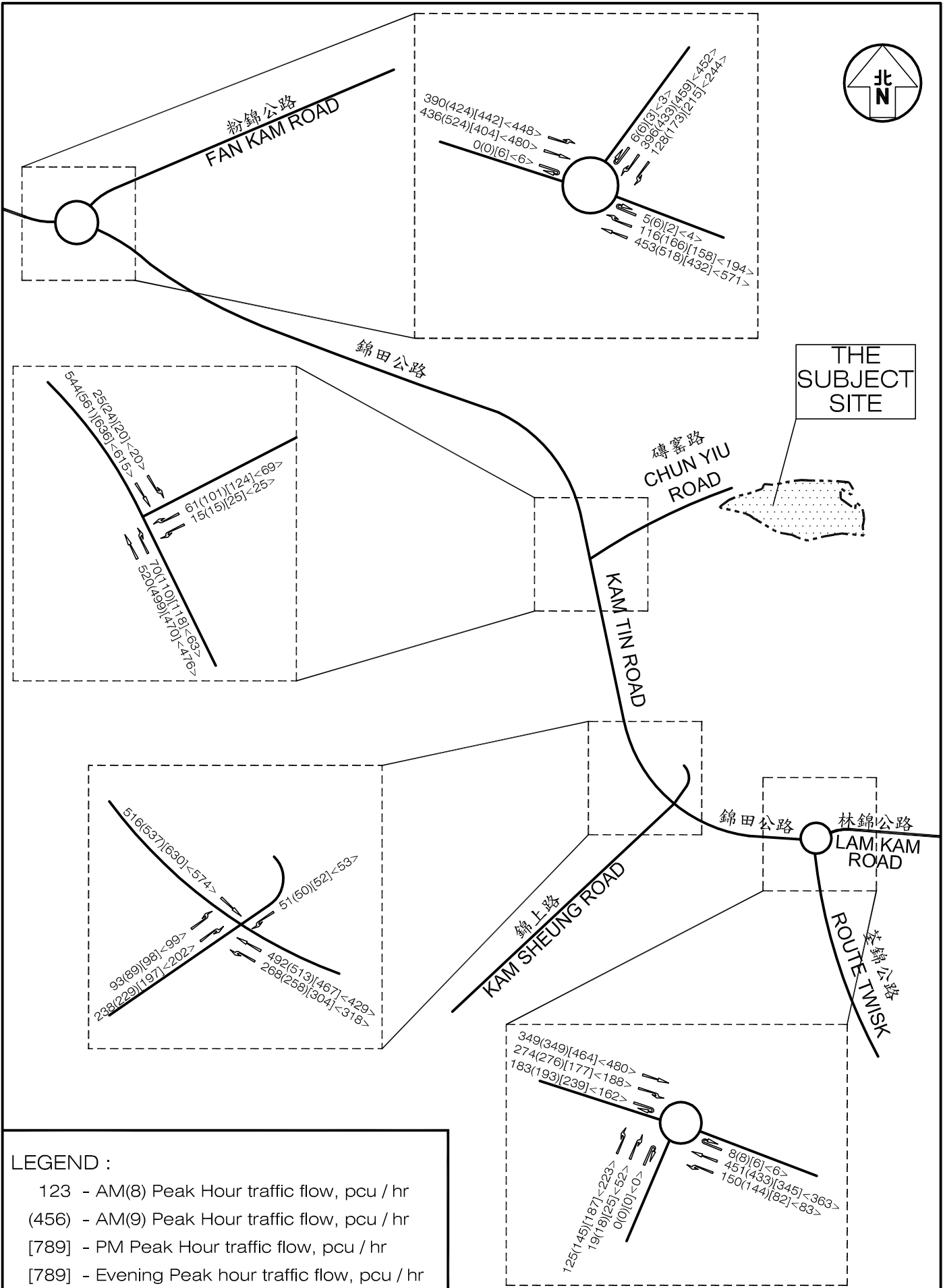
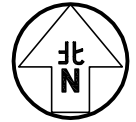
Project Title **PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT**

Job No. <b>J7342</b>	Figure No. <b>4.1</b>	Scale in A4 <b>N.T.S.</b>	
Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>	Checked by <b>K C</b>	Revision <b>A</b>
Date <b>14 JAN 2025</b>			

Figure Title **YEAR 2030 PEAK HOUR TRAFFIC FLOWS WITHOUT THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT**

**CKM Asia Limited**  
Traffic and Transportation Planning Consultants  
21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong  
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Project Title **PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT**

Job No. <b>J7342</b>	Figure No. <b>4.2</b>	Scale in A4 <b>N.T.S.</b>	
Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>	Checked by <b>K C</b>	Revision <b>A</b>
Date <b>14 JAN 2025</b>			

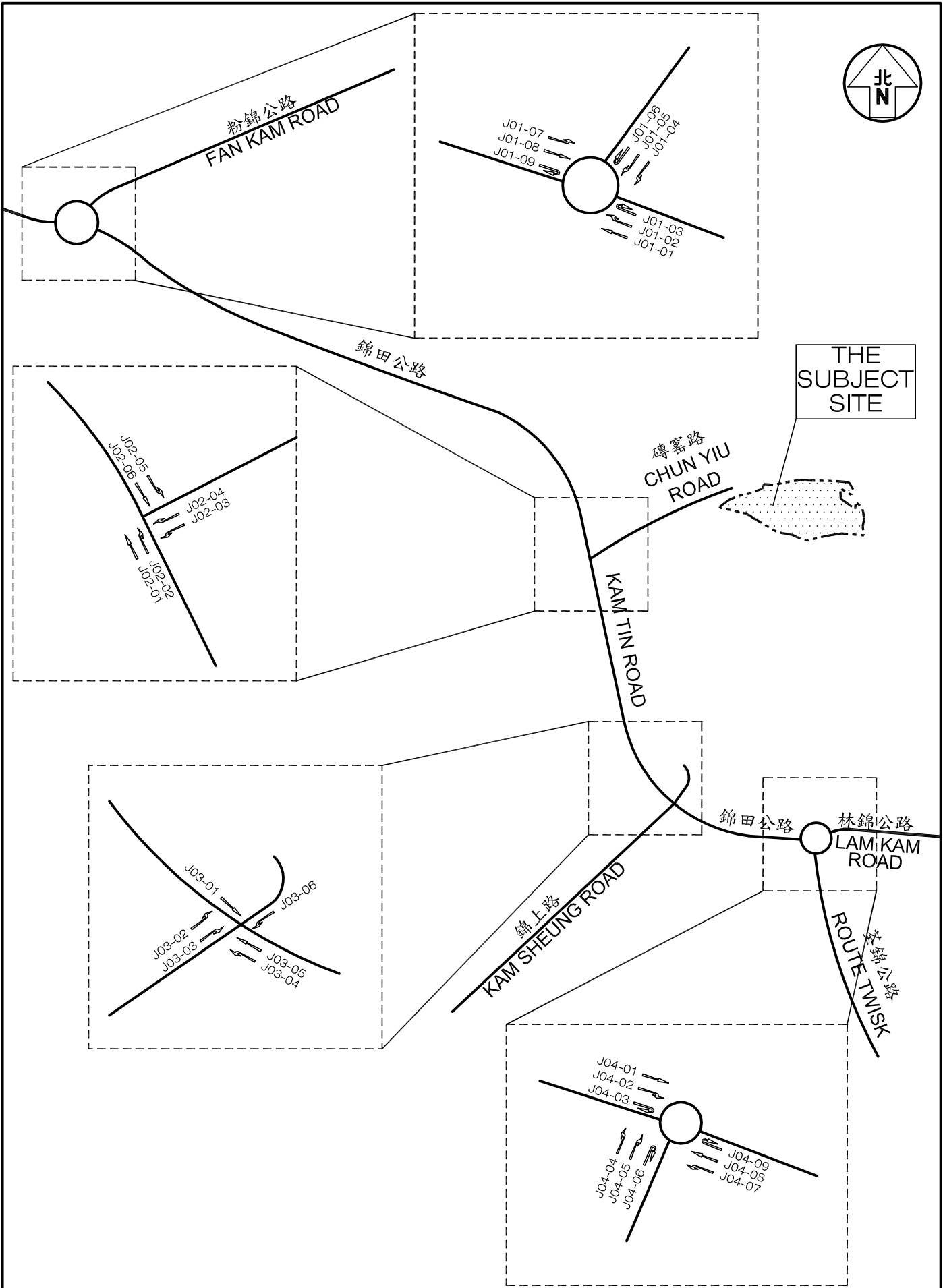
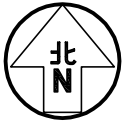
Figure Title **YEAR 2030 PEAK HOUR TRAFFIC FLOWS WITH THE PROPOSED TEMPORARY CONCRETE BATCHING PLANT**

**CKM Asia Limited**  
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21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong  
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**Appendix A –  
Vehicle Composition of  
Existing Traffic Flows**

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Project Title  
**PROPOSED TEMPORARY CONCRETE BATCHING PLANT  
 WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS  
 AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT**

Job No. <b>J7342</b>	Figure No. <b>APP-A1</b>	Scale in A4 <b>N.T.S.</b>	
Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>	Checked by <b>K C</b>	Revision <b>A</b>
		Date <b>14 JAN 2025</b>	

Figure Title  
**TURNING MOVEMENT INDEX**

**CKM Asia Limited**  
 Traffic and Transportation Planning Consultants  
 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong  
 Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

T:\JOB\7300-J7349\J7342(2025 01) TIA\_F2\Fig 2.7 4.1 4.2 RevA.dwg



TABLE A1 COMPOSITION FOR EXISTING TRAFFIC FLOW AT AM-8 PEAK HOUR

ID	MC	PC	Taxi	Van	LGV	M/HGV	PLB	PrLB	NFB	FBSD	FBDD	TOTAL (VEH)
J01-01	6	181	14	37	11	30	26	2	3	2	3	315
J01-02	1	44	6	9	7	4	0	2	0	0	0	73
J01-03	0	3	0	0	0	1	0	0	0	0	0	4
J01-04	2	61	3	11	5	4	0	0	0	0	0	86
J01-05	9	170	40	26	14	29	7	4	0	0	4	303
J01-06	0	1	0	0	0	2	0	0	0	0	0	3
J01-07	8	202	20	14	11	21	23	2	1	1	3	306
J01-08	10	201	14	29	18	23	9	1	1	1	7	314
J01-09	0	0	0	0	0	0	0	0	0	0	0	0
J02-01	14	269	15	64	22	18	7	1	4	3	3	420
J02-02	0	8	0	1	3	0	0	0	0	0	0	12
J02-03	0	5	0	1	2	2	0	0	0	0	0	10
J02-04	0	6	0	0	0	0	0	0	0	0	0	6
J02-05	0	13	1	2	5	0	0	0	0	0	0	21
J02-06	22	242	11	51	31	19	8	2	3	2	3	394
J03-01	22	230	10	48	31	21	8	2	3	0	0	375
J03-02	0	33	0	32	5	2	0	1	2	0	0	75
J03-03	5	116	9	21	14	8	8	0	0	0	8	189
J03-04	5	95	16	21	19	16	9	4	4	0	8	197
J03-05	14	241	15	32	20	16	7	0	2	3	3	353
J03-06	0	18	1	3	7	0	0	0	0	3	3	35
J04-01	8	182	15	26	19	15	10	0	0	0	4	279
J04-02	9	185	5	27	11	3	6	0	0	0	0	246
J04-03	0	37	2	6	6	13	0	3	3	2	8	80
J04-04	6	79	2	8	4	2	9	0	0	0	0	110
J04-05	1	11	0	2	0	2	0	0	0	0	0	16
J04-06	0	0	0	0	0	0	0	0	0	0	0	0
J04-07	4	121	0	6	0	5	0	0	0	0	0	136
J04-08	5	265	17	34	6	19	9	0	3	0	6	364
J04-09	0	0	0	0	0	3	0	0	0	0	0	3

TABLE A2 COMPOSITION FOR EXISTING TRAFFIC FLOW AT AM-9 PEAK HOUR

ID	MC	PC	Taxi	Van	LGV	M/HGV	PLB	PrLB	NFB	FBSD	FBDD	TOTAL (VEH)
J01-01	6	187	16	35	12	44	25	4	4	2	3	338
J01-02	1	53	9	14	10	5	0	4	0	0	0	96
J01-03	0	4	0	0	0	1	0	0	0	0	0	5
J01-04	3	64	5	16	9	7	0	0	0	0	0	104
J01-05	9	211	39	25	13	28	7	4	0	0	4	340
J01-06	0	1	0	0	0	2	0	0	0	0	0	3
J01-07	8	242	19	13	10	20	22	2	1	1	3	341
J01-08	13	208	20	47	26	30	9	2	1	1	7	364
J01-09	0	0	0	0	0	0	0	0	0	0	0	0
J02-01	13	256	14	60	21	18	7	1	4	3	3	400
J02-02	0	8	0	1	3	0	0	0	0	0	0	12
J02-03	0	5	0	1	2	2	0	0	0	0	0	10
J02-04	0	6	0	0	0	0	0	0	0	0	0	6
J02-05	0	12	1	2	5	0	0	0	0	0	0	20
J02-06	21	231	10	49	29	18	8	2	3	2	3	376
J03-01	21	220	9	47	29	20	8	2	3	0	0	359
J03-02	0	31	0	30	5	2	0	1	2	0	0	71
J03-03	5	111	9	20	13	8	8	0	0	0	8	182
J03-04	5	90	15	20	18	16	9	4	4	0	8	189
J03-05	13	229	14	30	19	16	7	0	2	3	3	336
J03-06	0	17	1	3	7	0	0	0	0	3	3	34
J04-01	9	186	17	22	15	17	9	0	0	0	4	279
J04-02	10	185	5	28	11	3	6	0	0	0	0	248
J04-03	0	1	2	7	7	15	0	3	3	2	8	48
J04-04	8	94	2	9	5	2	9	0	0	0	0	129
J04-05	1	10	0	2	0	2	0	0	0	0	0	15
J04-06	0	0	0	0	0	0	0	0	0	0	0	0
J04-07	4	116	0	6	0	5	0	0	0	0	0	131
J04-08	7	238	22	35	8	19	9	0	3	0	6	347
J04-09	0	0	0	0	0	3	0	0	0	0	0	3

TABLE A3 COMPOSITION FOR EXISTING TRAFFIC FLOW AT PM PEAK HOUR

ID	MC	PC	Taxi	Van	LGV	M/HGV	PLB	PrLB	NFB	FBSD	FBDD	TOTAL (VEH)
J01-01	13	210	7	26	9	10	28	0	3	2	3	311
J01-02	6	57	5	11	9	4	0	0	1	0	0	93
J01-03	0	2	0	0	0	0	0	0	0	0	0	2
J01-04	8	100	4	6	11	8	2	0	1	0	0	140
J01-05	3	290	29	27	24	9	5	0	1	0	3	391
J01-06	0	2	1	0	0	0	0	0	0	0	0	3
J01-07	5	254	33	27	8	15	21	0	0	0	4	367
J01-08	15	194	10	31	8	14	8	1	3	2	3	289
J01-09	0	5	1	0	0	0	0	0	0	0	0	6
J02-01	17	246	15	44	20	27	5	3	1	1	2	381
J02-02	0	12	0	2	4	1	0	0	0	0	0	19
J02-03	0	13	0	4	3	1	0	0	0	0	0	21
J02-04	0	13	0	2	5	2	0	0	0	0	0	22
J02-05	0	13	0	3	2	0	0	0	0	0	0	18
J02-06	26	280	19	56	25	21	7	4	2	2	3	445
J03-01	26	282	17	57	28	22	7	4	2	0	0	445
J03-02	1	40	7	14	4	9	0	2	0	0	0	77
J03-03	5	104	6	27	3	5	7	0	0	0	7	164
J03-04	11	149	13	20	20	8	9	3	0	0	11	244
J03-05	15	206	7	30	19	17	5	1	1	1	2	304
J03-06	0	29	1	5	1	1	0	0	0	1	3	41
J04-01	9	307	14	21	17	8	9	0	1	0	6	392
J04-02	8	120	6	8	8	0	8	0	0	1	0	159
J04-03	2	71	8	11	7	3	2	0	1	2	6	113
J04-04	6	129	2	19	2	2	7	0	0	1	0	168
J04-05	3	15	0	4	0	1	0	0	0	0	0	23
J04-06	0	0	0	0	0	0	0	0	0	0	0	0
J04-07	3	73	0	0	0	1	0	0	0	0	0	77
J04-08	8	212	9	18	7	10	12	2	0	0	7	285
J04-09	0	1	0	0	0	2	0	0	0	0	0	3

TABLE A4 COMPOSITION FOR EXISTING TRAFFIC FLOW AT EVENING PEAK HOUR

ID	MC	PC	Taxi	Van	LGV	M/HGV	PLB	PrLB	NFB	FBSD	FBDD	TOTAL (VEH)
J01-01	25	274	15	47	22	21	29	1	5	2	3	444
J01-02	13	63	10	26	21	7	0	0	2	0	0	142
J01-03	0	4	0	0	0	0	0	0	0	0	0	4
J01-04	13	131	8	8	16	10	2	0	1	0	0	189
J01-05	3	279	30	28	25	9	5	0	1	0	3	383
J01-06	0	2	1	0	0	0	0	0	0	0	0	3
J01-07	5	256	34	28	8	15	22	0	0	0	4	372
J01-08	24	251	20	42	10	18	8	1	3	2	3	382
J01-09	0	5	1	0	0	0	0	0	0	0	0	6
J02-01	16	259	14	44	21	24	5	3	1	1	2	390
J02-02	0	12	0	2	4	1	0	0	0	0	0	19
J02-03	0	13	0	4	3	1	0	0	0	0	0	21
J02-04	0	13	0	2	5	2	0	0	0	0	0	22
J02-05	0	13	0	3	2	0	0	0	0	0	0	18
J02-06	27	282	19	56	26	19	7	4	2	2	3	447
J03-01	27	285	16	57	29	20	7	4	2	0	0	447
J03-02	1	41	7	14	4	9	0	2	0	0	0	78
J03-03	5	107	6	28	3	5	7	0	0	0	7	168
J03-04	10	163	13	21	21	8	9	3	0	0	10	258
J03-05	15	222	7	31	20	16	5	1	1	1	2	321
J03-06	0	30	1	5	1	1	0	0	0	1	3	42
J04-01	9	315	15	23	19	8	9	0	1	0	6	405
J04-02	8	130	6	8	8	0	8	0	0	1	0	169
J04-03	2	51	8	10	7	3	2	0	1	2	6	92
J04-04	12	142	5	28	4	2	7	0	0	1	0	201
J04-05	3	40	0	4	0	1	0	0	0	0	0	48
J04-06	0	0	0	0	0	0	0	0	0	0	0	0
J04-07	3	74	0	0	0	1	0	0	0	0	0	78
J04-08	16	171	19	32	10	20	12	2	0	0	7	289
J04-09	0	1	0	0	0	2	0	0	0	0	0	3

**Appendix B –  
Capacity Analyses**

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# Roundabout Analysis

Junction:	Kam Tin Road / Fan Kam Road	Job Number: J7342
Scenario:	Existing Condition	J01 - P. 1
Design Year:	2024	Designed By: MCY      Checked By: WCH      Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	358	374						732	94
From B	359	6	95						460	379
From C	386	83	5						474	365
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>745</b>	<b>447</b>	<b>474</b>						<b>1666</b>	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	407	325						738	109
From B	426	3	157						586	333
From C	354	104	2						460	435
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>786</b>	<b>514</b>	<b>484</b>						<b>1784</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation Q<sub>E</sub> = K(F - f<sub>c</sub>q<sub>c</sub>)

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	5.112	0.030	1.485	0.986	1549	0.631	1469	1460	732	738	0.498	0.506
From B	5.029	0.030	1.485	0.984	1524	0.626	1266	1294	460	586	0.363	0.453
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1883	1831	474	460	0.252	0.251
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction:	Kam Tin Road / Fan Kam Road	Job Number: J7342
Scenario:	Existing Condition	J01 - P. 2
Design Year:	2024	Designed By: MCY      Checked By: WCH      Date: 21 January 2025

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	390	438						828	123
From B	394	6	119						519	444
From C	429	111	6						546	400
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>823</b>	<b>507</b>	<b>563</b>						<b>1893</b>	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	413	423						842	170
From B	419	3	210						632	433
From C	512	163	4						679	428
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>937</b>	<b>579</b>	<b>637</b>						<b>2153</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation Q<sub>E</sub> = K(F - f<sub>c</sub>q<sub>c</sub>)

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	5.112	0.030	1.485	0.986	1549	0.631	1451	1422	828	842	0.571	0.592
From B	5.029	0.030	1.485	0.984	1524	0.626	1226	1232	519	632	0.423	0.513
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1857	1836	546	679	0.294	0.370
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction:	Kam Tin Road / Fan Kam Road	Job Number: J7342
Scenario:	Without Proposed Temporary Concrete Batching Plant	J01 - P. 3
Design Year:	2030	Designed By: MCY      Checked By: WCH      Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	390	408						798	100
From B	396	6	101						503	413
From C	425	89	5						519	402
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>821</b>	<b>485</b>	<b>514</b>						<b>1820</b>	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	442	356						804	116
From B	459	3	168						630	364
From C	384	111	2						497	468
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>849</b>	<b>556</b>	<b>526</b>						<b>1931</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation Q<sub>E</sub> = K(F - f<sub>c</sub>q<sub>c</sub>)

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	5.112	0.030	1.485	0.986	1549	0.631	1465	1455	798	804	0.545	0.552
From B	5.029	0.030	1.485	0.984	1524	0.626	1245	1275	503	630	0.404	0.494
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1855	1807	519	497	0.280	0.275
From D												
From E												
From F												
From G												
From H												



# Roundabout Analysis

Junction:	Kam Tin Road / Fan Kam Road	Job Number: J7342
Scenario:	Without Proposed Temporary Concrete Batching Plant	J01 - P. 4
Design Year:	2030	Designed By: MCY      Checked By: WCH      Date: 21 January 2025

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	424	476						900	131
From B	433	6	126						565	482
From C	470	119	6						595	439
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>903</b>	<b>549</b>	<b>608</b>						<b>2060</b>	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	448	460						914	181
From B	452	3	224						679	470
From C	551	174	4						729	461
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>1009</b>	<b>625</b>	<b>688</b>						<b>2322</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	$= 1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	$= 303x_2$
f <sub>c</sub>	$= 0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	$= 1 + 0.5/(1 + M)$
M	$= \exp[(D - 60)/10]$
x <sub>2</sub>	$= v + (e - v)/(1 + 2S)$
S	$= 1.6(e - v)/L$

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	5.112	0.030	1.485	0.986	1549	0.631	1446	1415	900	914	0.622	0.646
From B	5.029	0.030	1.485	0.984	1524	0.626	1202	1210	565	679	0.470	0.561
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1828	1812	595	729	0.325	0.402
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction: Kam Tin Road / Fan Kam Road Job Number: J7342  
 Scenario: With Proposed Temporary Concrete Batching Plant J01 - P. 5  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	390	436						826	127
From B	396	6	128						530	441
From C	453	116	5						574	402
From D										
From E										
From F										
From G										
From H										
Total	849	512	569						1930	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	442	404						852	163
From B	459	3	215						677	412
From C	432	158	2						592	468
From D										
From E										
From F										
From G										
From H										
Total	897	603	621						2121	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	0
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation Q<sub>E</sub> = K(F - f<sub>c</sub>q<sub>c</sub>)

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	5.112	0.030	1.485	0.986	1549	0.631	1448	1426	826	852	0.570	0.597
From B	5.029	0.030	1.485	0.984	1524	0.626	1227	1245	530	677	0.432	0.544
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1855	1807	574	592	0.309	0.328
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction: Kam Tin Road / Fan Kam Road Job Number: J7342  
 Scenario: With Proposed Temporary Concrete Batching Plant J01 - P. 6  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	0	424	524						948	178
From B	433	6	173						612	530
From C	518	166	6						690	439
From D										
From E										
From F										
From G										
From H										
Total	951	596	703						2250	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	6	448	480						934	201
From B	452	3	244						699	490
From C	571	194	4						769	461
From D										
From E										
From F										
From G										
From H										
Total	1029	645	728						2402	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Fan Kam Road (SB)
C	Kam Tin Road (WB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	7.7	3.3	35.0	10.0	25	40	0.7
From B	7.7	2.9	15.0	12.5	25	30	0.6
From C	7.7	5.5	100.0	100.0	25	60	0.0
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= $1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	= $303x_2$
f <sub>c</sub>	= $0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	= $1 + 0.5/(1 + M)$
M	= $\exp[(D - 60)/10]$
x <sub>2</sub>	= $v + (e - v)/(1 + 2S)$
S	= $1.6(e - v)/L$

### Limitation

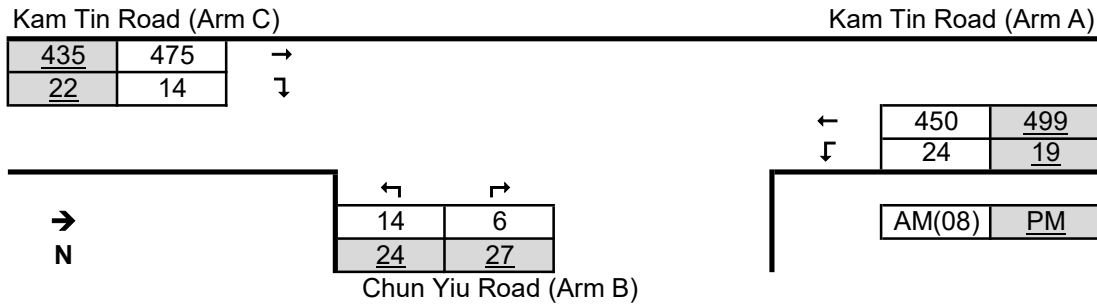
e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	5.112	0.030	1.485	0.986	1549	0.631	1417	1402	948	934	0.669	0.666
From B	5.029	0.030	1.485	0.984	1524	0.626	1173	1197	612	699	0.522	0.584
From C	7.591	0.030	1.485	0.935	2300.174	0.786	1828	1812	690	769	0.377	0.424
From D												
From E												
From F												
From G												
From H												

# Priority Junction Analysis

Junction:	Kam Tin Road / Chun Yiu Road	Job Number: J7342
Scenario:	Existing Condition	J2 - P. 1
Design Year:	2024	Designed By: NCL      Checked By: WCH      Date: 21 January 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :	Input		Input		Input		Calculated	
	W	7.30	V-rBA	13	w-BA	2.20	D	0.7250
	W-CR	0.00	V-IBA	31	w-BC	2.20	E	0.7807
			V-rBC	13	w-CB	4.10	F	0.9565
			V-rCB	29			Y	1.0000

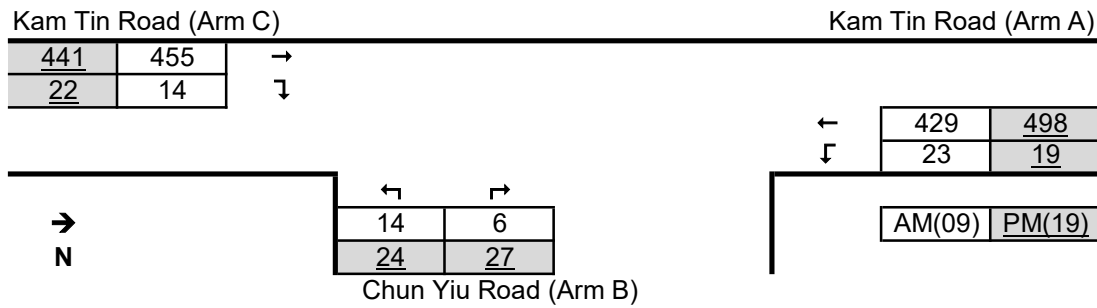
Analysis :

Traffic Flows, pcu/hr	AM(08)	PM	Capacity, pcu/hr	AM(08)	PM
q-CA	475	435	Q-BA	249	240
q-CB	14	22	Q-BC	451	438
q-AB	24	19	Q-CB	548	532
q-AC	450	499	Q-BAC	363	305
q-BA	6	27			
q-BC	14	24			
f	0.700	0.471			

Ratio-of-flow to Capacity	AM(08)	PM(17)
B-A	0.024	0.112
B-C	0.031	0.055
C-B	0.026	0.041
B-AC	0.055	0.167

# Priority Junction Analysis

Junction:	Kam Tin Road / Chun Yiu Road	Job Number: J7342
Scenario:	Existing Condition	J2 - P. 2
Design Year:	2024	Designed By: <u>MCY</u> Checked By: <u>WCH</u> Date: 21 January 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :

	Input		Input		Input		Calculated	
W	7.30	V-rBA	15	w-BA	2.20	D	0.7258	
W-CR	0.00	V-IBA	30	w-BC	2.20	E	0.7821	
		V-rBC	15	w-CB	4.10	F	0.9578	
		V-rCB	30	Y		1.0000		

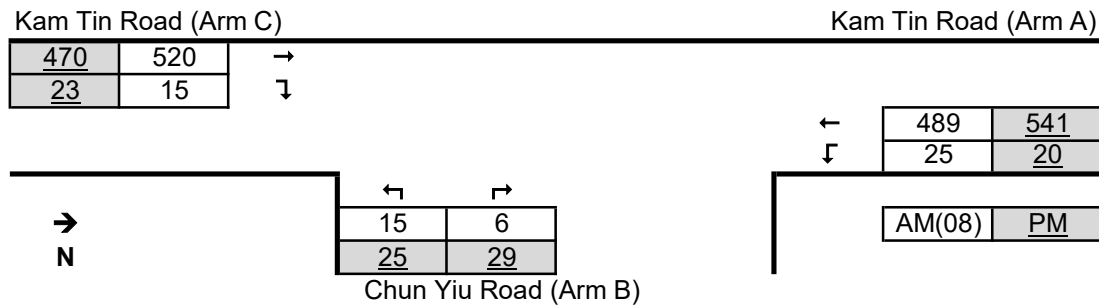
Analysis :

Traffic Flows, pcu/hr	AM(09)	PM(19)	Capacity, pcu/hr	AM(09)	PM(19)
q-CA	455	441	Q-BA	258	240
q-CB	14	22	Q-BC	458	439
q-AB	23	19	Q-CB	556	533
q-AC	429	498	Q-BAC	372	305
q-BA	6	27			
q-BC	14	24			
f	0.700	0.471			

Ratio-of-flow to Capacity	AM(09)	PM(19)
B-A	0.023	0.113
B-C	0.031	0.055
C-B	0.025	0.041
B-AC	0.054	0.167

# Priority Junction Analysis

Junction: Kam Tin Road / Chun Yiu Road Job Number: J7342  
 Scenario: Without Proposed Temporary Concrete Batching Plant J2 - P. 3  
 Design Year: 2030 Designed By: NCL Checked By: WCH Date: 21 January 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :

	Input		Input		Input		Calculated	
W	7.30	V-rBA	13	w-BA	2.20	D	0.7250	
W-CR	0.00	V-IBA	31	w-BC	2.20	E	0.7807	
		V-rBC	13	w-CB	4.10	F	0.9565	
		V-rCB	29			Y	1.0000	

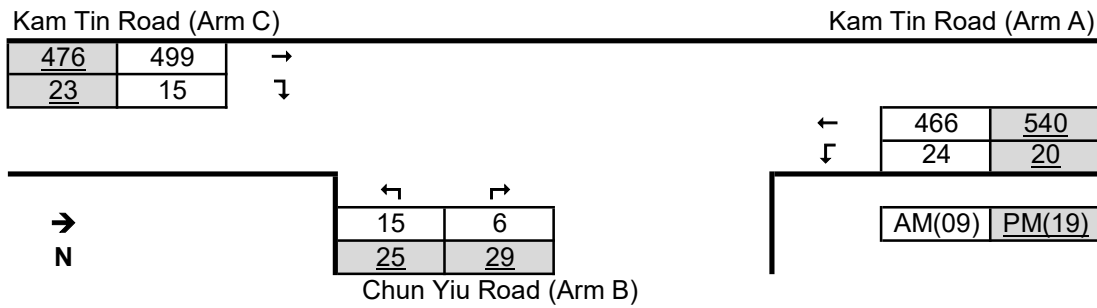
Analysis :

Traffic Flows, pcu/hr	AM(08)	PM	Capacity, pcu/hr	AM(08)	PM
q-CA	520	470	Q-BA	231	223
q-CB	15	23	Q-BC	440	426
q-AB	25	20	Q-CB	534	517
q-AC	489	541	Q-BAC	350	286
q-BA	6	29			
q-BC	15	25			
f	0.714	0.463			

Ratio-of-flow to Capacity	AM(08)	PM(17)
B-A	0.026	0.130
B-C	0.034	0.059
C-B	0.028	0.044
B-AC	0.060	0.189

# Priority Junction Analysis

Junction: Kam Tin Road / Chun Yiu Road Job Number: J7342  
 Scenario: Without Proposed Temporary Concrete Batching Plant J2 - P. 4  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :

	Input		Input		Input		Calculated	
W	7.30	V-rBA	15	w-BA	2.20	D	0.7258	
W-CR	0.00	V-IBA	30	w-BC	2.20	E	0.7821	
		V-rBC	15	w-CB	4.10	F	0.9578	
		V-rCB	30			Y	1.0000	

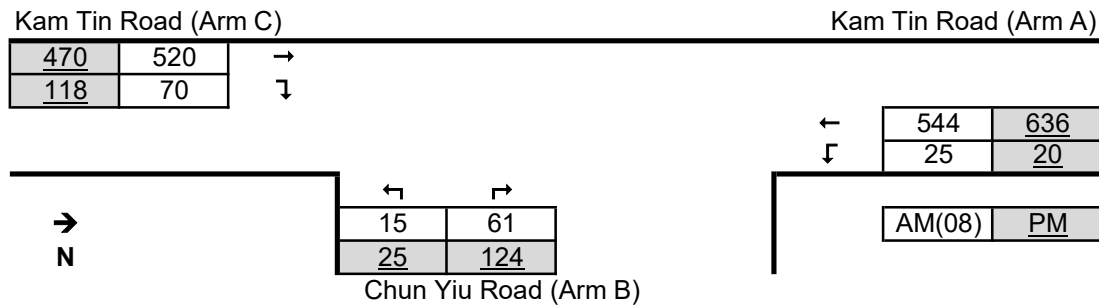
Analysis :

Traffic Flows, pcu/hr	AM(09)	PM(19)	Capacity, pcu/hr	AM(09)	PM(19)
q-CA	499	476	Q-BA	241	223
q-CB	15	23	Q-BC	447	427
q-AB	24	20	Q-CB	543	518
q-AC	466	540	Q-BAC	359	286
q-BA	6	29			
q-BC	15	25			
f	0.714	0.463			

Ratio-of-flow to Capacity	AM(09)	PM(19)
B-A	0.025	0.130
B-C	0.034	0.059
C-B	0.028	0.044
B-AC	0.058	0.189

# Priority Junction Analysis

Junction: Kam Tin Road / Chun Yiu Road Job Number: J7342  
 Scenario: With Proposed Temporary Concrete Batching Plant J2 - P. 5  
 Design Year: 2030 Designed By: NCL Checked By: WCH Date: 21 January 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :

	Input		Input		Input		Calculated	
W	7.30	V-rBA	30	w-BA	3.00	D	0.8007	
W-CR	0.00	V-IBA	30	w-BC	3.00	E	0.8628	
		V-rBC	30	w-CB	3.65	F	0.9190	
		V-rCB	30			Y	1.0000	

Analysis :

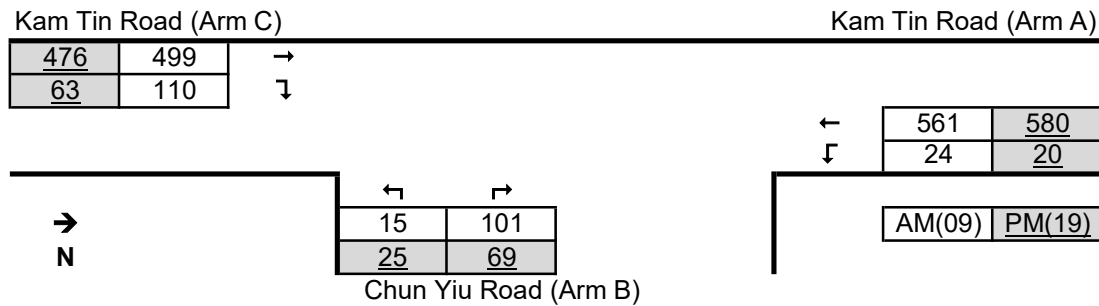
Traffic Flows, pcu/hr	AM(08)	PM	Capacity, pcu/hr	AM(08)	PM
q-CA	520	470	Q-BA	216	179
q-CB	70	118	Q-BC	469	441
q-AB	25	20	Q-CB	494	465
q-AC	544	636	Q-BAC	242	199
q-BA	61	124			
q-BC	15	25			
f	0.197	0.168			

Ratio-of-flow to Capacity	AM(08)	PM(17)
B-A	0.282	0.692
B-C	0.032	0.057
C-B	0.142	0.254
B-AC	0.314	0.749



# Priority Junction Analysis

Junction:	Kam Tin Road / Chun Yiu Road	Job Number: J7342
Scenario:	With Proposed Temporary Concrete Batching Plant	J2 - P. 6
Design Year:	2030	Designed By: MCY      Checked By: WCH      Date: 21 Jan 2025



The predictive equations of capacity of movement are:

$$Q-BA = D[627 + 14W-CR - Y(0.364q-AC + 0.144q-AB + 0.229q-CA + 0.52q-CB)]$$

$$Q-BC = E[745 - Y(0.364q-AC + 0.144q-AB)]$$

$$Q-CB = F[745 - 0.364Y(q-AC + q-AB)]$$

The geometric parameters represented by D, E, F are:

$$D = [1 + 0.094(w-BA - 3.65)][1 + 0.0009(V-rBA - 120)][1 + 0.0006(V-IBA - 150)]$$

$$E = [1 + 0.094(w-BC - 3.65)][1 + 0.0009(V-rBC - 120)]$$

$$F = [1 + 0.094(w-CB - 3.65)][1 + 0.0009(V-rCB - 120)]$$

where  $Y = 1 - 0.0345W$

q-AB, etc = the design flow of movement AB, etc

W = major road width

W-CR = central reserve width

w-BA, etc = lane width to vehicle

v-rBA, etc = visibility to the right for waiting vehicles in stream BA, etc

v-IBA, etc = visibility to the left for waiting vehicles in stream BA, etc

Geometry :	Input		Input		Input		Calculated	
	W	7.30	V-rBA	15	w-BA	3.00	D	0.7890
	W-CR	0.00	V-IBA	30	w-BC	3.00	E	0.8502
			V-rBC	15	w-CB	3.65	F	0.9190
			V-rCB	30			Y	1.0000

Analysis :

Traffic Flows, pcu/hr	AM(09)	PM(19)	Capacity, pcu/hr	AM(09)	PM(19)
q-CA	499	476	Q-BA	196	214
q-CB	110	63	Q-BC	457	451
q-AB	24	20	Q-CB	489	484
q-AC	561	580	Q-BAC	211	249
q-BA	101	69			
q-BC	15	25			
f	0.129	0.266			

Ratio-of-flow to Capacity	AM(09)	PM(19)
B-A	0.516	0.322
B-C	0.033	0.055
C-B	0.225	0.130
B-AC	0.549	0.378

Junctions 9
PICADY 9 - Priority Intersection Module
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Filename: J7342\_TIA\_R2.j9

Path: J:\ENG\Job\J73XX\J7342 Kam Tin - S16 for Proposed Concrete Batching Plant\working\2024 10) TIA\_R2\Junction9

Report generation date: 21/1/2025 17:59:09

- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, AM (08)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, AM (09)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, PM (17)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, PM (19)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, AM (08)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, AM (09)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, PM (17)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, PM (19)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, AM (08)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, AM (09)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, PM (17)
- »Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, PM (19)

**Summary of junction performance**

	AM (08)	AM (09)	PM (17)	PM (19)
	RFC	RFC	RFC	RFC
<b>Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT [Locked] - 2024 EXISTING</b>				
Stream B-ACD	0.81	0.76	0.71	0.73
Stream A-D	0.00	0.00	0.00	0.00
Stream D-ABC	0.08	0.08	0.09	0.09
Stream C-B	0.00	0.00	0.00	0.00
<b>Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT [Locked] - 2030 WITHOUT</b>				
Stream B-ACD	0.91	0.85	0.78	0.81
Stream A-D	0.00	0.00	0.00	0.00
Stream D-ABC	0.09	0.09	0.09	0.10
Stream C-B	0.00	0.00	0.00	0.00
<b>Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT [Locked] - 2030 WITH</b>				
Stream B-ACD	0.97	0.95	0.88	0.85
Stream A-D	0.00	0.00	0.00	0.00
Stream D-ABC	0.09	0.09	0.10	0.10
Stream C-B	0.00	0.00	0.00	0.00

*There are warnings associated with one or more model runs - see the 'Data Errors and Warnings' tables for each Analysis or Demand Set.*

*Values shown are the highest values encountered over all time segments. Delay is the maximum value of average delay per arriving vehicle.*

## File summary

### File Description

<b>Title</b>	Proposed Concrete Batching Plant
<b>Location</b>	Kam Tin
<b>Site number</b>	
<b>Date</b>	31/12/2024
<b>Version</b>	
<b>Status</b>	TIA_R2
<b>Identifier</b>	
<b>Client</b>	
<b>Jobnumber</b>	J7342
<b>Enumerator</b>	CKM
<b>Description</b>	

### 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

### Analysis Options

Calculate Queue Percentiles	Calculate residual capacity	RFC Threshold	Average Delay threshold (s)	Queue threshold (PCU)
		1.00	36.00	20.00

### Demand Set Summary

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DEX08	2024 EXISTING	AM (08)	ONE HOUR	08:00	09:30	15
DEX09	2024 EXISTING	AM (09)	ONE HOUR	09:00	10:30	15
DEX17	2024 EXISTING	PM (17)	ONE HOUR	17:00	18:30	15
DEX19	2024 EXISTING	PM (19)	ONE HOUR	19:00	20:30	15
DRF08	2030 WITHOUT	AM (08)	ONE HOUR	08:00	09:30	15
DRF09	2030 WITHOUT	AM (09)	ONE HOUR	09:00	10:30	15
DRF17	2030 WITHOUT	PM (17)	ONE HOUR	17:00	18:30	15
DRF21	2030 WITHOUT	PM (19)	ONE HOUR	19:00	20:30	15
DWT08	2030 WITH	AM (08)	ONE HOUR	08:00	09:30	15
DWT09	2030 WITH	AM (09)	ONE HOUR	09:00	10:30	15
DWT17	2030 WITH	PM (17)	ONE HOUR	17:00	18:30	15
DWT19	2030 WITH	PM (19)	ONE HOUR	19:00	20:30	15

### Analysis Set Details

ID	Name	Locked	Network flow scaling factor (%)
AJ03	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	✓	100.000

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, AM (08)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	9.59	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Arms

### Arms

Arm	Name	Description	Arm type
A	Kam Tin Road		Major
B	Kam Sheung Road (Arm B) Kam Sheung Road (Arm B) Kam Sheung Road (Arm B) v		Minor
C	Kam Tin Road		Major
D	Sheung Tsuen B/T		Minor

### Major Arm Geometry

Arm	Width of carriageway (m)	Has kerbed central reserve	Has right turn bay	Visibility for right turn (m)	Blocks?	Blocking queue (PCU)
A	7.80			100.0		-
C	7.80			65.0		-

*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)	Visibility to left (m)	Visibility to right (m)
B	One lane	5.00	35	30
D	One lane	5.00	15	20

## Slope / Intercept / Capacity

### Priority Intersection Slopes and Intercepts

Junction	Stream	Intercept (PCU/hr)	Slope for A-B	Slope for A-C	Slope for A-D	Slope for B-A	Slope for B-C	Slope for B-D	Slope for C-A	Slope for C-B	Slope for C-D	Slope for D-A	Slope for D-B	Slope for D-C
1	A-D	632	-	-	-	-	-	-	0.226	0.322	0.226	-	-	-
1	B-A	605	0.101	0.257	0.257	-	-	-	0.161	0.366	-	0.257	0.257	0.128
1	B-C	772	0.109	0.276	-	-	-	-	-	-	-	-	-	-
1	B-D, nearside lane	605	0.101	0.257	0.257	-	-	-	0.161	0.366	0.161	-	-	-
1	B-D, offside lane	605	0.101	0.257	0.257	-	-	-	0.161	0.366	0.161	-	-	-
1	C-B	612	0.218	0.218	0.312	-	-	-	-	-	-	-	-	-
1	D-A	764	-	-	-	-	-	-	0.273	-	0.108	-	-	-
1	D-B, nearside lane	591	0.158	0.158	0.358	-	-	-	0.251	0.251	0.099	-	-	-
1	D-B, offside lane	591	0.158	0.158	0.358	-	-	-	0.251	0.251	0.099	-	-	-
1	D-C	591	-	0.158	0.358	0.125	0.251	0.251	0.251	0.251	0.099	-	-	-

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 Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DEX08	2024 EXISTING	AM (08)	ONE HOUR	08:00	09:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	650	100.000
B		✓	311	100.000
C		✓	425	100.000
D		✓	48	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	252	398	0
	B	224	0	87	0
	C	425	0	0	0
	D	48	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
08:00-08:15	A	489	489
	B	234	234
	C	320	320
	D	36	36
08:15-08:30	A	584	584
	B	280	280
	C	382	382
	D	43	43
08:30-08:45	A	716	716
	B	342	342
	C	468	468
	D	53	53
08:45-09:00	A	716	716
	B	342	342
	C	468	468
	D	53	53
09:00-09:15	A	584	584
	B	280	280
	C	382	382
	D	43	43
09:15-09:30	A	489	489
	B	234	234
	C	320	320
	D	36	36

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.81	43.28	3.9	E
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.08	6.17	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, AM (09)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	7.74	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DEX09	2024 EXISTING	AM (09)	ONE HOUR	09:00	10:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	623	100.000
B		✓	299	100.000
C		✓	407	100.000
D		✓	47	100.000

## Origin-Destination Data

### Demand (PCU/hr)

	To				
	A	B	C	D	
From	A	0	243	380	0
	B	216	0	83	0
	C	407	0	0	0
	D	47	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
09:00-09:15	A	469	469
	B	225	225
	C	306	306
	D	35	35
09:15-09:30	A	560	560
	B	269	269
	C	366	366
	D	42	42
09:30-09:45	A	686	686
	B	329	329
	C	448	448
	D	52	52
09:45-10:00	A	686	686
	B	329	329
	C	448	448
	D	52	52
10:00-10:15	A	560	560
	B	269	269
	C	366	366
	D	42	42
10:15-10:30	A	469	469
	B	225	225
	C	306	306
	D	35	35

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.76	34.65	3.0	D
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.08	6.10	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A



# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, PM (17)

### Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	5.58	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DEX17	2024 EXISTING	PM (17)	ONE HOUR	17:00	18:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	630	100.000
B		✓	277	100.000
C		✓	495	100.000
D		✓	49	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	286	344	0
	B	186	0	91	0
	C	495	0	0	0
	D	49	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
17:00-17:15	A	474	474
	B	209	209
	C	373	373
	D	37	37
17:15-17:30	A	566	566
	B	249	249
	C	445	445
	D	44	44
17:30-17:45	A	694	694
	B	305	305
	C	545	545
	D	54	54
17:45-18:00	A	694	694
	B	305	305
	C	545	545
	D	54	54
18:00-18:15	A	566	566
	B	249	249
	C	445	445
	D	44	44
18:15-18:30	A	474	474
	B	209	209
	C	373	373
	D	37	37

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.71	28.11	2.3	D
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.41	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2024 EXISTING, PM (19)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	6.11	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DEX19	2024 EXISTING	PM (19)	ONE HOUR	19:00	20:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	660	100.000
B		✓	282	100.000
C		✓	494	100.000
D		✓	50	100.000

## Origin-Destination Data

### Demand (PCU/hr)

	To				
	A	B	C	D	
From	A	0	300	360	0
	B	190	0	92	0
	C	494	0	0	0
	D	50	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

	To				
	A	B	C	D	
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
19:00-19:15	A	497	497
	B	212	212
	C	372	372
	D	38	38
19:15-19:30	A	593	593
	B	254	254
	C	444	444
	D	45	45
19:30-19:45	A	727	727
	B	310	310
	C	544	544
	D	55	55
19:45-20:00	A	727	727
	B	310	310
	C	544	544
	D	55	55
20:00-20:15	A	593	593
	B	254	254
	C	444	444
	D	45	45
20:15-20:30	A	497	497
	B	212	212
	C	372	372
	D	38	38

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.73	31.06	2.6	D
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.42	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, AM (08)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	16.02	C

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DRF08	2030 WITHOUT	AM (08)	ONE HOUR	08:00	09:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	705	100.000
B		✓	331	100.000
C		✓	461	100.000
D		✓	51	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	268	437	0
	B	238	0	93	0
	C	461	0	0	0
	D	51	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
08:00-08:15	A	531	531
	B	249	249
	C	347	347
	D	38	38
08:15-08:30	A	634	634
	B	298	298
	C	414	414
	D	46	46
08:30-08:45	A	776	776
	B	364	364
	C	508	508
	D	56	56
08:45-09:00	A	776	776
	B	364	364
	C	508	508
	D	56	56
09:00-09:15	A	634	634
	B	298	298
	C	414	414
	D	46	46
09:15-09:30	A	531	531
	B	249	249
	C	347	347
	D	38	38

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.91	73.97	6.9	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.32	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, AM (09)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	11.59	B

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DRF09	2030 WITHOUT	AM (09)	ONE HOUR	09:00	10:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	676	100.000
B		✓	318	100.000
C		✓	442	100.000
D		✓	50	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	258	418	0
	B	229	0	89	0
	C	442	0	0	0
	D	50	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
09:00-09:15	A	509	509
	B	239	239
	C	333	333
	D	38	38
09:15-09:30	A	608	608
	B	286	286
	C	397	397
	D	45	45
09:30-09:45	A	744	744
	B	350	350
	C	487	487
	D	55	55
09:45-10:00	A	744	744
	B	350	350
	C	487	487
	D	55	55
10:00-10:15	A	608	608
	B	286	286
	C	397	397
	D	45	45
10:15-10:30	A	509	509
	B	239	239
	C	333	333
	D	38	38

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.85	53.17	4.8	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.25	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A



# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, PM (17)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	7.56	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DRF17	2030 WITHOUT	PM (17)	ONE HOUR	17:00	18:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	676	100.000
B		✓	295	100.000
C		✓	535	100.000
D		✓	52	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	304	372	0
	B	197	0	98	0
	C	535	0	0	0
	D	52	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
17:00-17:15	A	509	509
	B	222	222
	C	403	403
	D	39	39
17:15-17:30	A	608	608
	B	265	265
	C	481	481
	D	47	47
17:30-17:45	A	744	744
	B	325	325
	C	589	589
	D	57	57
17:45-18:00	A	744	744
	B	325	325
	C	589	589
	D	57	57
18:00-18:15	A	608	608
	B	265	265
	C	481	481
	D	47	47
18:15-18:30	A	509	509
	B	222	222
	C	403	403
	D	39	39

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.78	38.75	3.3	E
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.59	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITHOUT, PM (19)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	8.72	A

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DRF21	2030 WITHOUT	PM (19)	ONE HOUR	19:00	20:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	707	100.000
B		✓	301	100.000
C		✓	534	100.000
D		✓	53	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	318	389	0
	B	202	0	99	0
	C	534	0	0	0
	D	53	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

	To				
	A	B	C	D	
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
19:00-19:15	A	532	532
	B	227	227
	C	402	402
	D	40	40
19:15-19:30	A	636	636
	B	271	271
	C	480	480
	D	48	48
19:30-19:45	A	778	778
	B	331	331
	C	588	588
	D	58	58
19:45-20:00	A	778	778
	B	331	331
	C	588	588
	D	58	58
20:00-20:15	A	636	636
	B	271	271
	C	480	480
	D	48	48
20:15-20:30	A	532	532
	B	227	227
	C	402	402
	D	40	40

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.81	45.05	3.9	E
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.10	6.60	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, AM (08)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	22.25	C

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DWT08	2030 WITH	AM (08)	ONE HOUR	08:00	09:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	760	100.000
B		✓	331	100.000
C		✓	516	100.000
D		✓	51	100.000

## Origin-Destination Data

### Demand (PCU/hr)

	To				
	A	B	C	D	
From	A	0	268	492	0
	B	238	0	93	0
	C	516	0	0	0
	D	51	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
08:00-08:15	A	572	572
	B	249	249
	C	388	388
	D	38	38
08:15-08:30	A	683	683
	B	298	298
	C	464	464
	D	46	46
08:30-08:45	A	837	837
	B	364	364
	C	568	568
	D	56	56
08:45-09:00	A	837	837
	B	364	364
	C	568	568
	D	56	56
09:00-09:15	A	683	683
	B	298	298
	C	464	464
	D	46	46
09:15-09:30	A	572	572
	B	249	249
	C	388	388
	D	38	38

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.97	110.43	10.7	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.51	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, AM (09)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	19.51	C

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DWT09	2030 WITH	AM (09)	ONE HOUR	09:00	10:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	771	100.000
B		✓	318	100.000
C		✓	537	100.000
D		✓	50	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	258	513	0
	B	229	0	89	0
	C	537	0	0	0
	D	50	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
09:00-09:15	A	580	580
	B	239	239
	C	404	404
	D	38	38
09:15-09:30	A	693	693
	B	286	286
	C	483	483
	D	45	45
09:30-09:45	A	849	849
	B	350	350
	C	591	591
	D	55	55
09:45-10:00	A	849	849
	B	350	350
	C	591	591
	D	55	55
10:00-10:15	A	693	693
	B	286	286
	C	483	483
	D	45	45
10:15-10:30	A	580	580
	B	239	239
	C	404	404
	D	38	38

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.95	101.80	9.4	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.09	6.57	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A



# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, PM (17)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	11.48	B

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DWT17	2030 WITH	PM (17)	ONE HOUR	17:00	18:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	771	100.000
B		✓	295	100.000
C		✓	630	100.000
D		✓	52	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	304	467	0
	B	197	0	98	0
	C	630	0	0	0
	D	52	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
17:00-17:15	A	580	580
	B	222	222
	C	474	474
	D	39	39
17:15-17:30	A	693	693
	B	265	265
	C	566	566
	D	47	47
17:30-17:45	A	849	849
	B	325	325
	C	694	694
	D	57	57
17:45-18:00	A	849	849
	B	325	325
	C	694	694
	D	57	57
18:00-18:15	A	693	693
	B	265	265
	C	566	566
	D	47	47
18:15-18:30	A	580	580
	B	222	222
	C	474	474
	D	39	39

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.88	66.79	5.6	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.10	6.96	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A

# Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT - 2030 WITH, PM (19)

## Data Errors and Warnings

Severity	Area	Item	Description
Warning	Vehicle Mix		HV% is zero for all movements / time segments. Vehicle Mix matrix should be completed whether working in PCUs or Vehs.

## Junction Network

### Junctions

Junction	Name	Junction Type	Major road direction	Junction Delay (s)	Junction LOS
1	Kam Tin Rd / Kam Sheung Rd / Sheung Tsuen BT	Crossroads	Two-way	10.39	B

### Junction Network Options

Driving side	Lighting
Left	Normal/unknown

## Traffic Demand

### Demand Set Details

ID	Scenario name	Time Period name	Traffic profile type	Start time (HH:mm)	Finish time (HH:mm)	Time segment length (min)
DWT19	2030 WITH	PM (19)	ONE HOUR	19:00	20:30	15

Vehicle mix source	PCU Factor for a HV (PCU)
HV Percentages	2.00

### Demand overview (Traffic)

Arm	Linked arm	Use O-D data	Average Demand (PCU/hr)	Scaling Factor (%)
A		✓	747	100.000
B		✓	301	100.000
C		✓	574	100.000
D		✓	53	100.000

## Origin-Destination Data

### Demand (PCU/hr)

		To			
		A	B	C	D
From	A	0	318	429	0
	B	202	0	99	0
	C	574	0	0	0
	D	53	0	0	0

## Vehicle Mix

### Heavy Vehicle Percentages

		To			
		A	B	C	D
From	A	0	0	0	0
	B	0	0	0	0
	C	0	0	0	0
	D	0	0	0	0

## Detailed Demand Data

### Demand for each time segment

Time Segment	Arm	Demand (PCU/hr)	Demand in PCU (PCU/hr)
19:00-19:15	A	562	562
	B	227	227
	C	432	432
	D	40	40
19:15-19:30	A	672	672
	B	271	271
	C	516	516
	D	48	48
19:30-19:45	A	822	822
	B	331	331
	C	632	632
	D	58	58
19:45-20:00	A	822	822
	B	331	331
	C	632	632
	D	58	58
20:00-20:15	A	672	672
	B	271	271
	C	516	516
	D	48	48
20:15-20:30	A	562	562
	B	227	227
	C	432	432
	D	40	40

## Results

### Results Summary for whole modelled period

Stream	Max RFC	Max delay (s)	Max Queue (PCU)	Max LOS
B-ACD	0.85	56.64	4.8	F
A-B				
A-C				
A-D	0.00	0.00	0.0	A
D-ABC	0.10	6.75	0.1	A
C-D				
C-A				
C-B	0.00	0.00	0.0	A



# Roundabout Analysis

Junction: Kam Tin Road / Lam Kam Road / Route Twisk Job Number: J7342  
 Scenario: Existing Condition J04 - P. 1  
 Design Year: 2024 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	121	318	258						697	26
From B	411	8	141						560	379
From C	118	18	0						136	540
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>650</b>	<b>344</b>	<b>399</b>						<b>1393</b>	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	136	427	167						730	30
From B	318	6	77						401	303
From C	176	24	0						200	460
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>630</b>	<b>457</b>	<b>244</b>						<b>1331</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road WB)
C	Route Twisk (NB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	4.519	0.037	1.482	0.935	1369	0.593	1266	1264	697	730	0.551	0.578
From B	4.750	0.037	1.482	0.906	1439	0.607	1095	1137	560	401	0.511	0.353
From C	5.310	0.035	1.483	1.017	1609	0.642	1283	1335	136	200	0.106	0.150
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction:	Kam Tin Road / Lam Kam Road / Route TWIST	Job Number: J7342
Scenario:	Existing Condition	J04 - P. 2
Design Year:	2024	Date: 21 January 2025
Designed By:	MCY	Checked By: WCH

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	92	318	260						670	25
From B	394	8	136						538	352
From C	137	17	0						154	494
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>623</b>	<b>343</b>	<b>396</b>						<b>1362</b>	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	115	442	177						734	55
From B	335	6	78						419	292
From C	210	49	0						259	456
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>660</b>	<b>497</b>	<b>255</b>						<b>1412</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road WB)
C	Route Twisk (NB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	$= 1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	$= 303x_2$
f <sub>c</sub>	$= 0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	$= 1 + 0.5/(1 + M)$
M	$= \exp[(D - 60)/10]$
x <sub>2</sub>	$= v + (e - v)/(1 + 2S)$
S	$= 1.6(e - v)/L$

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	4.519	0.037	1.482	0.935	1369	0.593	1266	1250	670	734	0.529	0.587
From B	4.750	0.037	1.482	0.906	1439	0.607	1110	1143	538	419	0.485	0.367
From C	5.310	0.035	1.483	1.017	1609	0.642	1313	1338	154	259	0.117	0.194
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction:	Kam Tin Road / Lam Kam Road / Route Twisk	Job Number: J7342
Scenario:	Without Proposed Temporary Concrete Batching Plant	J04 - P. 3
Design Year:	2030	Designed By: MCY      Checked By: WCH      Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	128	349	274						751	27
From B	451	8	150						609	402
From C	125	19	0						144	587
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>704</b>	<b>376</b>	<b>424</b>						<b>1504</b>	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	144	464	177						785	31
From B	345	6	82						433	321
From C	187	25	0						212	495
From D										
From E										
From F										
From G										
From H										
<b>Total</b>	<b>676</b>	<b>495</b>	<b>259</b>						<b>1430</b>	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road (WB)
C	Route Twisk (NB)
D	0
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation Q<sub>E</sub> = K(F - f<sub>c</sub>q<sub>c</sub>)

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	= 1-0.00347(∅-30)-0.978[(1/r)-0.05]
F	= 303x <sub>2</sub>
f <sub>c</sub>	= 0.210t <sub>D</sub> (1+0.2x <sub>2</sub> )
t <sub>D</sub>	= 1+0.5/(1+M)
M	= exp[(D-60)/10]
x <sub>2</sub>	= v+(e-v)/(1+2S)
S	= 1.6(e-v)/L

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub> Entry Flow				RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	4.519	0.037	1.482	0.935	1369	0.593	1265	1263	751	785	0.594	0.622
From B	4.750	0.037	1.482	0.906	1439	0.607	1083	1127	609	433	0.563	0.384
From C	5.310	0.035	1.483	1.017	1609	0.642	1252	1312	144	212	0.115	0.162
From D												
From E												
From F												
From G												
From H												



# Roundabout Analysis

Junction: Kam Tin Road / Lam Kam Road / Route TWIST Job Number: J7342  
 Scenario: Without Proposed Temporary Concrete Batching Plant J04 - P. 4  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	98	349	276						723	26
From B	433	8	144						585	374
From C	145	18	0						163	539
From D										
From E										
From F										
From G										
From H										
Total	676	375	420						1471	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	122	480	188						790	58
From B	363	6	83						452	310
From C	223	52	0						275	491
From D										
From E										
From F										
From G										
From H										
Total	708	538	271						1517	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road (WB)
C	Route Twisk (NB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	$= 1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	$= 303x_2$
f <sub>c</sub>	$= 0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	$= 1 + 0.5/(1 + M)$
M	$= \exp[(D - 60)/10]$
x <sub>2</sub>	$= v + (e - v)/(1 + 2S)$
S	$= 1.6(e - v)/L$

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	4.519	0.037	1.482	0.935	1369	0.593	1266	1248	723	790	0.571	0.633
From B	4.750	0.037	1.482	0.906	1439	0.607	1098	1133	585	452	0.533	0.399
From C	5.310	0.035	1.483	1.017	1609	0.642	1284	1315	163	275	0.127	0.209
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction: Kam Tin Road / Lam Kam Road / Route Twisk Job Number: J7342  
 Scenario: With Proposed Temporary Concrete Batching Plant J04 - P. 5  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM(08) PEAK

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	183	349	274						806	27
From B	451	8	150						609	457
From C	125	19	0						144	642
From D										
From E										
From F										
From G										
From H										
Total	759	376	424						1559	

### PM (17) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	239	464	177						880	31
From B	345	6	82						433	416
From C	187	25	0						212	590
From D										
From E										
From F										
From G										
From H										
Total	771	495	259						1525	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road (WB)
C	Route Twisk (NB)
D	0
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	$= 1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	$= 303x_2$
f <sub>c</sub>	$= 0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	$= 1 + 0.5/(1 + M)$
M	$= \exp[(D - 60)/10]$
x <sub>2</sub>	$= v + (e - v)/(1 + 2S)$
S	$= 1.6(e - v)/L$

### Limitation

e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub> Entry Flow				RFC	
							AM(08)	PM (17)	AM(08)	PM (17)	AM(08)	PM (17)
From A	4.519	0.037	1.482	0.935	1369	0.593	1265	1263	806	880	0.637	0.697
From B	4.750	0.037	1.482	0.906	1439	0.607	1052	1075	609	433	0.579	0.403
From C	5.310	0.035	1.483	1.017	1609	0.642	1216	1250	144	212	0.118	0.170
From D												
From E												
From F												
From G												
From H												

# Roundabout Analysis

Junction: Kam Tin Road / Lam Kam Road / Route TWIST Job Number: J7342  
 Scenario: With Proposed Temporary Concrete Batching Plant J04 - P. 6  
 Design Year: 2030 Designed By: MCY Checked By: WCH Date: 21 January 2025

### AM (09) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	193	349	276						818	26
From B	433	8	144						585	469
From C	145	18	0						163	634
From D										
From E										
From F										
From G										
From H										
Total	771	375	420						1566	

### PM (19) Peak

Arm	To A	To B	To C	To D	To E	To F	To G	To H	Total	q <sub>c</sub>
From A	162	480	188						830	58
From B	363	6	83						452	350
From C	223	52	0						275	531
From D										
From E										
From F										
From G										
From H										
Total	748	538	271						1557	

### Legend

Arm	Road (in clockwise order)
A	Kam Tin Road (EB)
B	Lam Kam Road (WB)
C	Route Twisk (NB)
D	
E	
F	
G	
H	

### Geometric Parameters

Arm	e (m)	v (m)	r (m)	L (m)	D (m)	∅ (°)	S
From A	6.0	3.5	100.0	5.5	27	60	0.7
From B	6.0	3.5	25.0	8.0	27	60	0.5
From C	7.0	3.5	65.0	12.0	27	35	0.5
From D							
From E							
From F							
From G							
From H							

### Predictive Equation $Q_E = K(F - f_c q_c)$

Q <sub>E</sub>	Entry Capacity
q <sub>c</sub>	Circulating Flow across the Entry
K	$= 1 - 0.00347(\varnothing - 30) - 0.978[(1/r) - 0.05]$
F	$= 303x_2$
f <sub>c</sub>	$= 0.210t_D(1 + 0.2x_2)$
t <sub>D</sub>	$= 1 + 0.5/(1 + M)$
M	$= \exp[(D - 60)/10]$
x <sub>2</sub>	$= v + (e - v)/(1 + 2S)$
S	$= 1.6(e - v)/L$

### Limitation

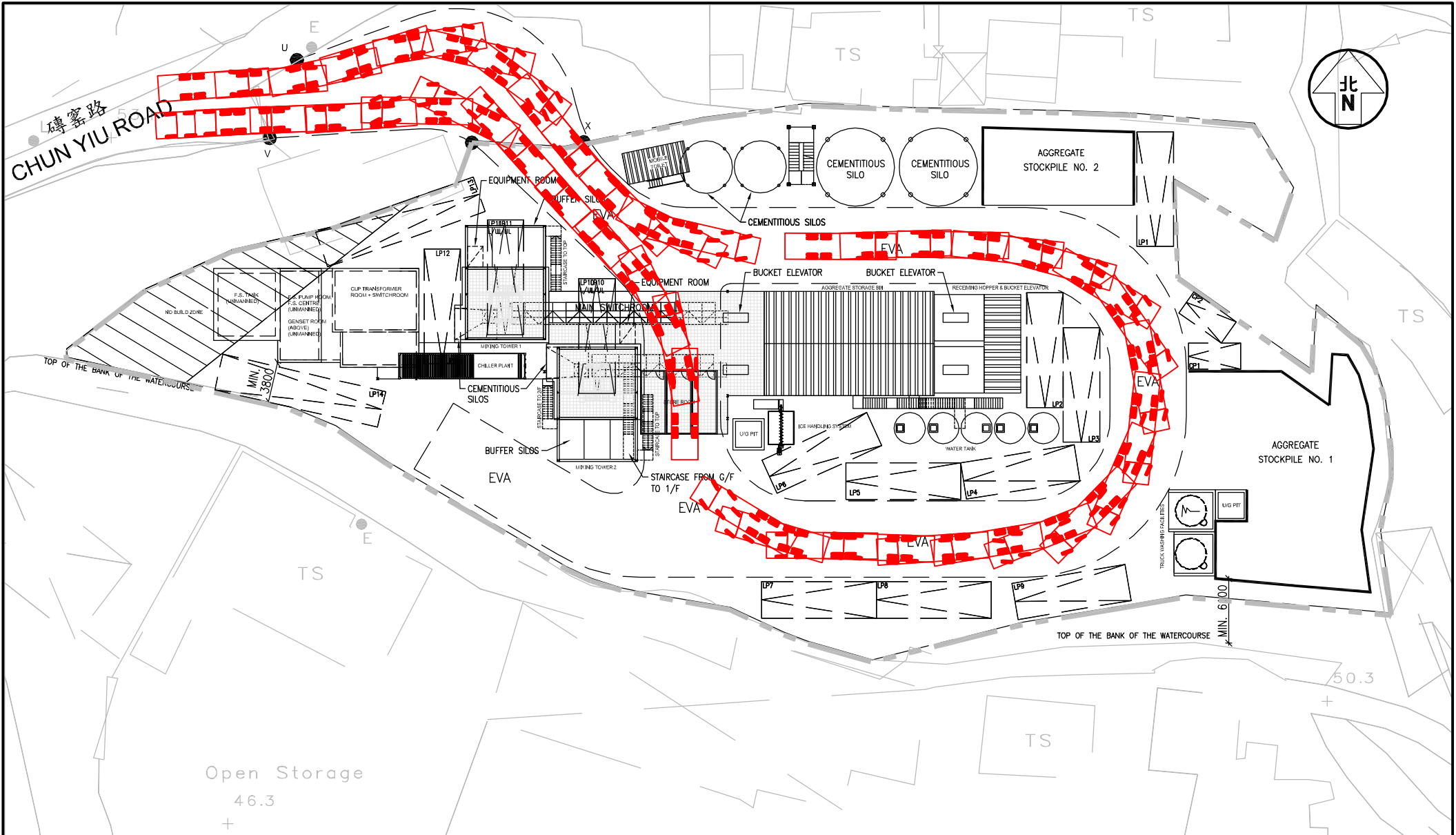
e	Entry Width	4.0 - 15.0 m
v	Approach Half Width	2.0 - 7.3 m
r	Entry Radius	6.0 - 100.0 m
L	Effective Length of Flare	1.0 - 100.0 m
D	Inscribed Circle Diameter	15 - 100 m
∅	Entry Angle	10° - 60°
S	Sharpness of Flare	0.0 - 3.0

### Ratio-of-Flow to Capacity (RFC)

Arm	x <sub>2</sub>	M	t <sub>D</sub>	K	F	f <sub>c</sub>	Q <sub>E</sub>		Entry Flow		RFC	
							AM(09)	PM(19)	AM(09)	PM(19)	AM(09)	PM(19)
From A	4.519	0.037	1.482	0.935	1369	0.593	1266	1248	818	830	0.646	0.665
From B	4.750	0.037	1.482	0.906	1439	0.607	1046	1111	585	452	0.559	0.407
From C	5.310	0.035	1.483	1.017	1609	0.642	1222	1289	163	275	0.133	0.213
From D												
From E												
From F												
From G												
From H												

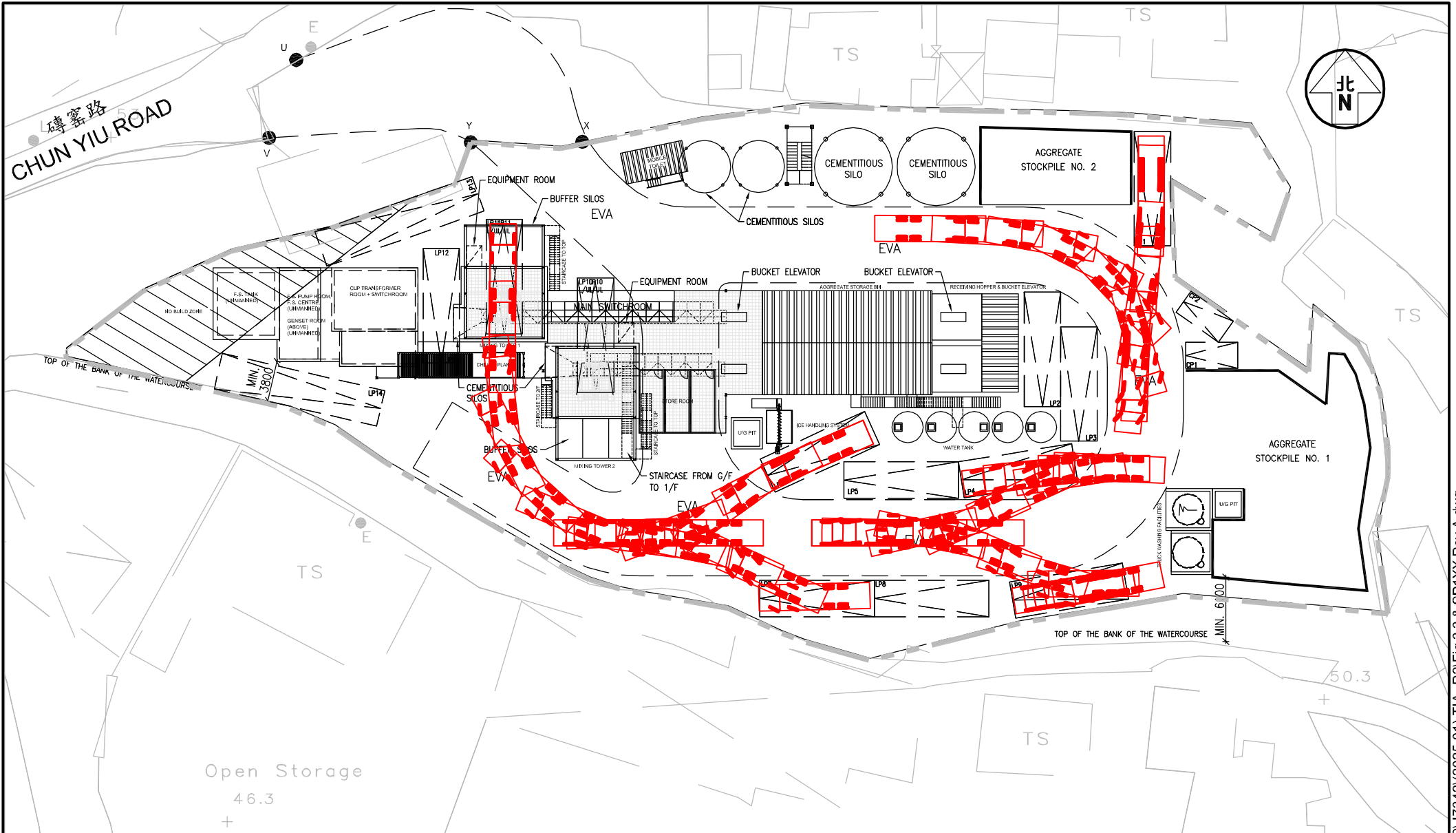
## Appendix C – Swept Path Analyses

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Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>SP-101</b>	Revision <b>A</b>
Figure Title <b>LAYOUT OF THE PROPOSED CONCRETE BATCHING PLANT</b>	Designed by <b>M C Y</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
Drawn by <b>S C Y</b>	Checked by <b>K C</b>	Scale in A4 <b>1 : 500</b>
Date <b>14 JAN 2025</b>		

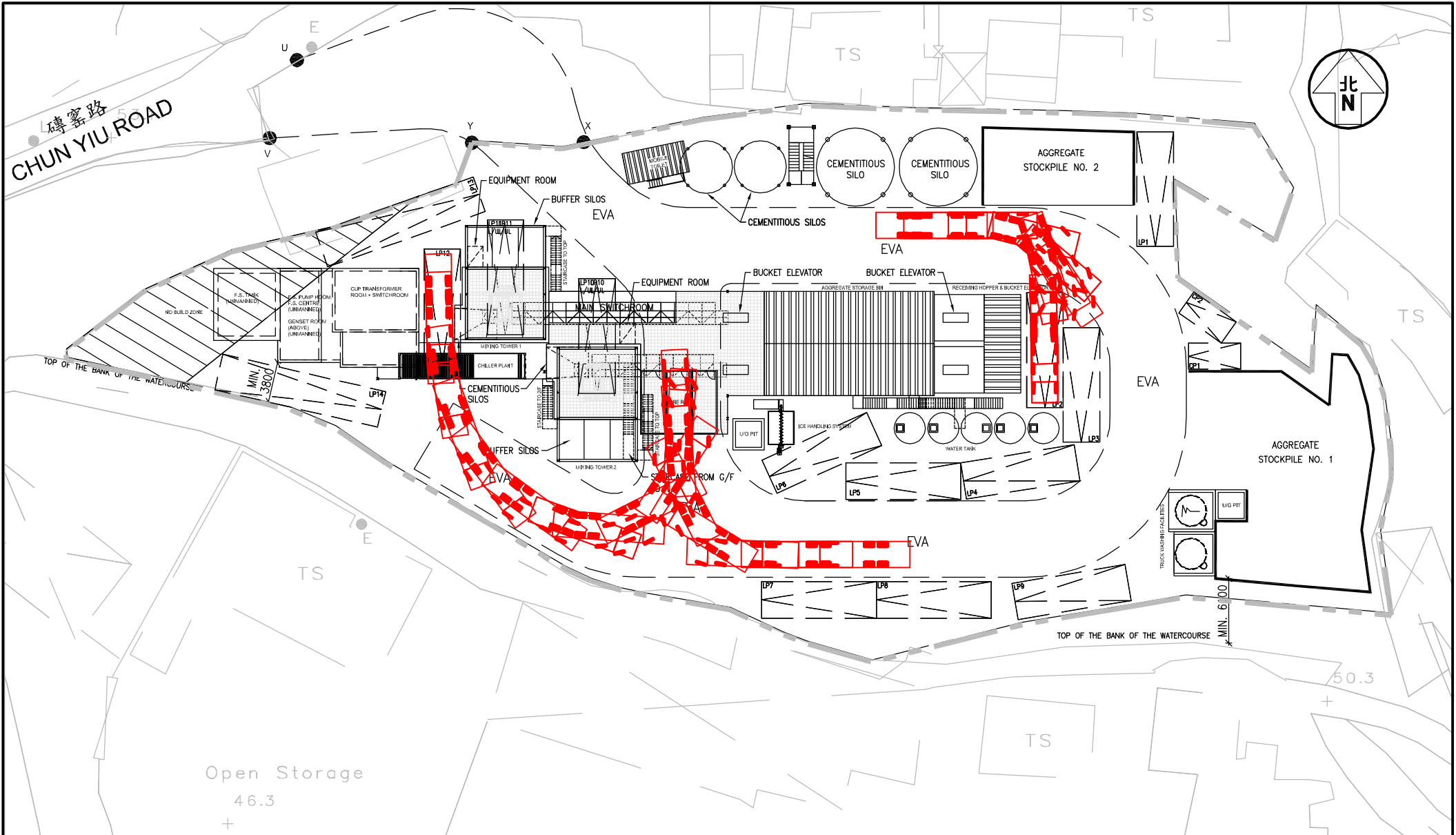
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Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>SP-102</b>	Revision <b>A</b>
Figure Title <b>SWEPT PATH OF HEAVY GOODS VEHICLES          (ENTERING LOADING / UNLOADING BAYS)</b>	Designed by <b>M C Y</b>	Checked by <b>K C</b>
J7342	Drawn by <b>S C Y</b>	Date <b>14 JAN 2025</b>
Scale in A4 <b>1 : 500</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	

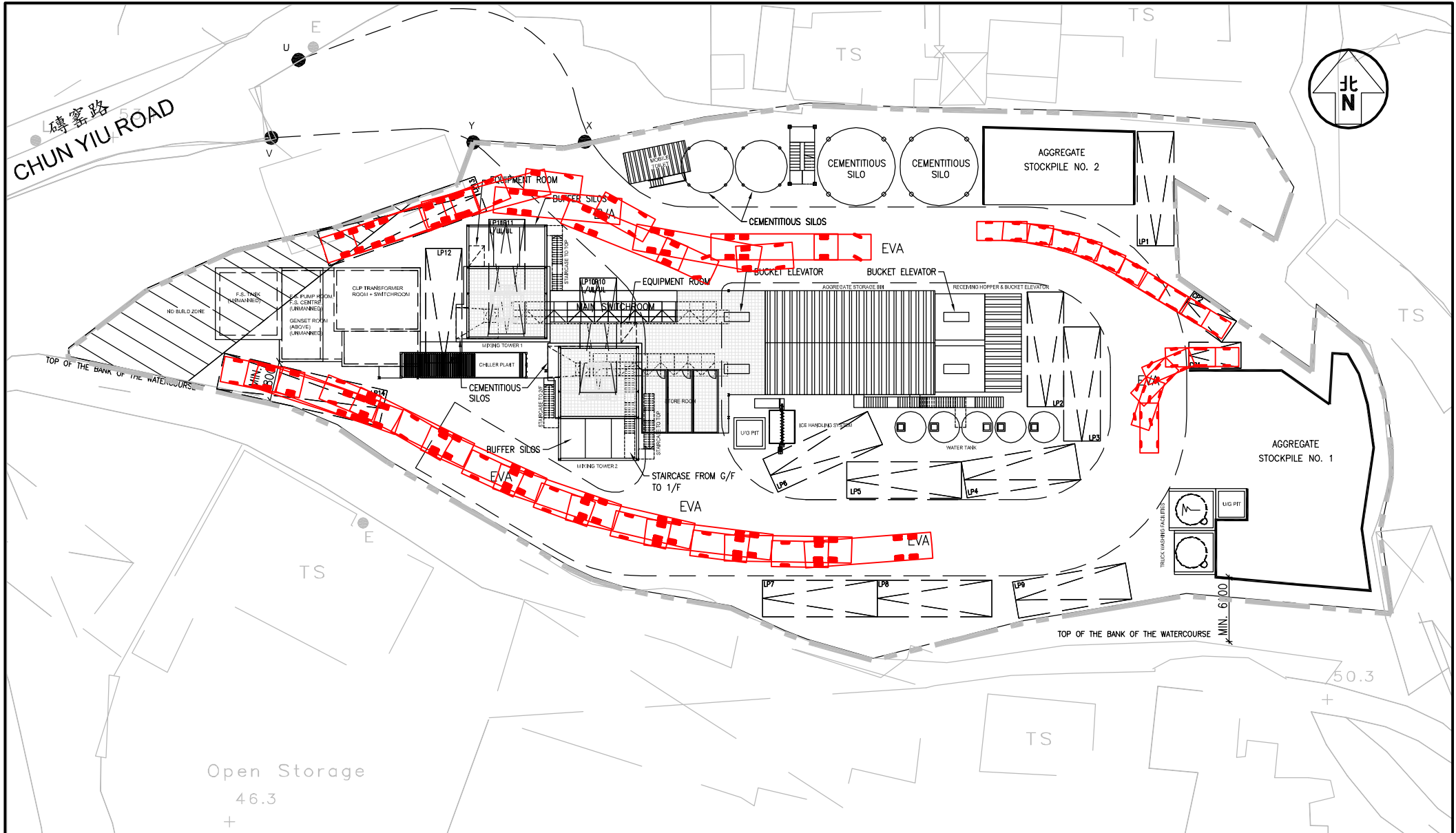
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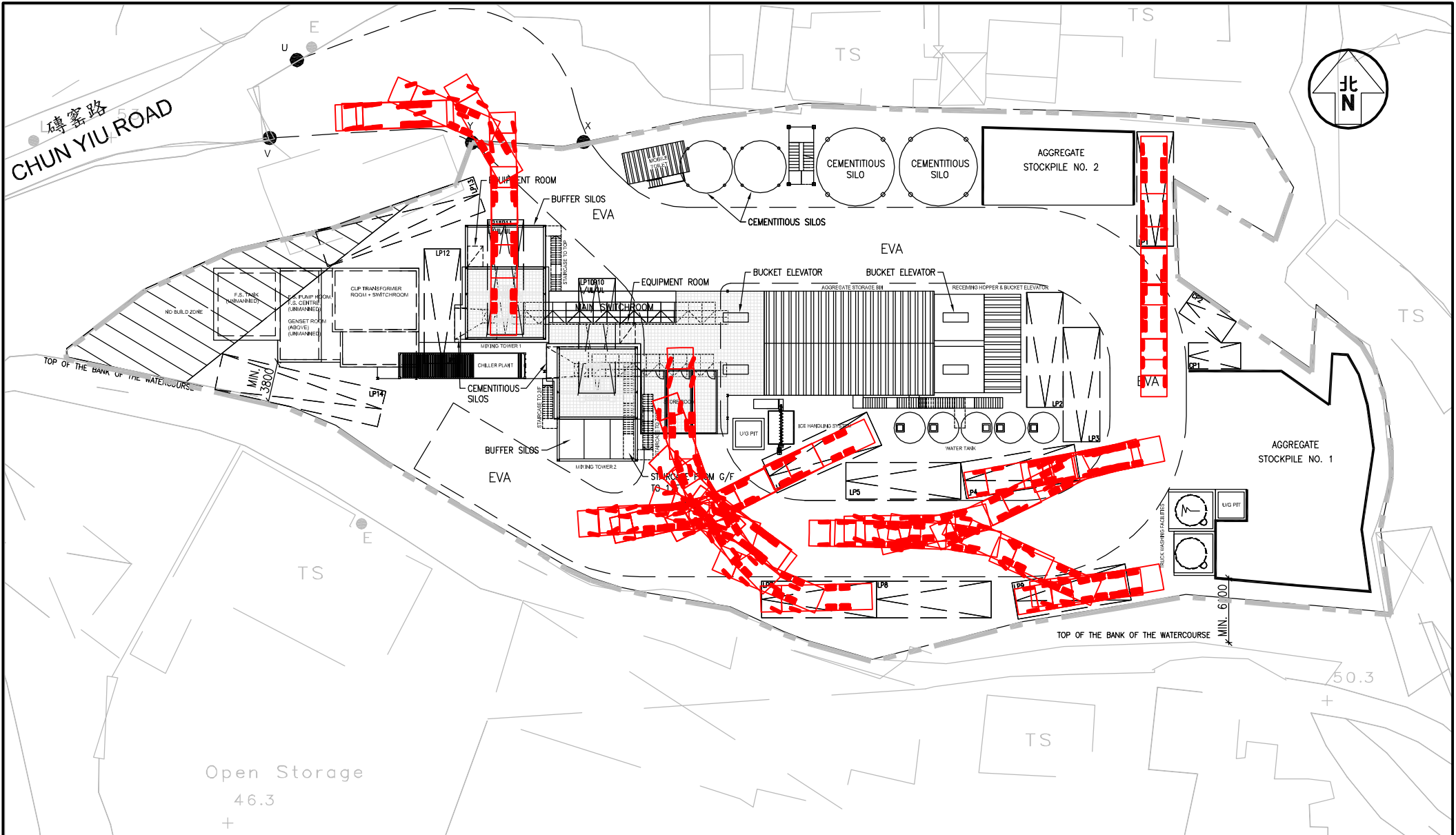
<b>Project Title</b> PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	<b>Figure No.</b> SP-104	<b>Revision</b> A
<b>Figure Title</b> SWEEP PATH OF HEAVY GOODS VEHICLES (ENTERING LOADING / UNLOADING BAYS)	<b>Designed by</b> M C Y	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
<b>Drawn by</b> S C Y	<b>Checked by</b> K C	<b>Scale in A4</b> 1 : 500
<b>Date</b> 14 JAN 2025	<b>Figure No.</b> J7342	T:\JOB\J7300-J7349\J7342(2025 01) TIA_R2\Fig 3.3 & SP-104 Rev A.dwg





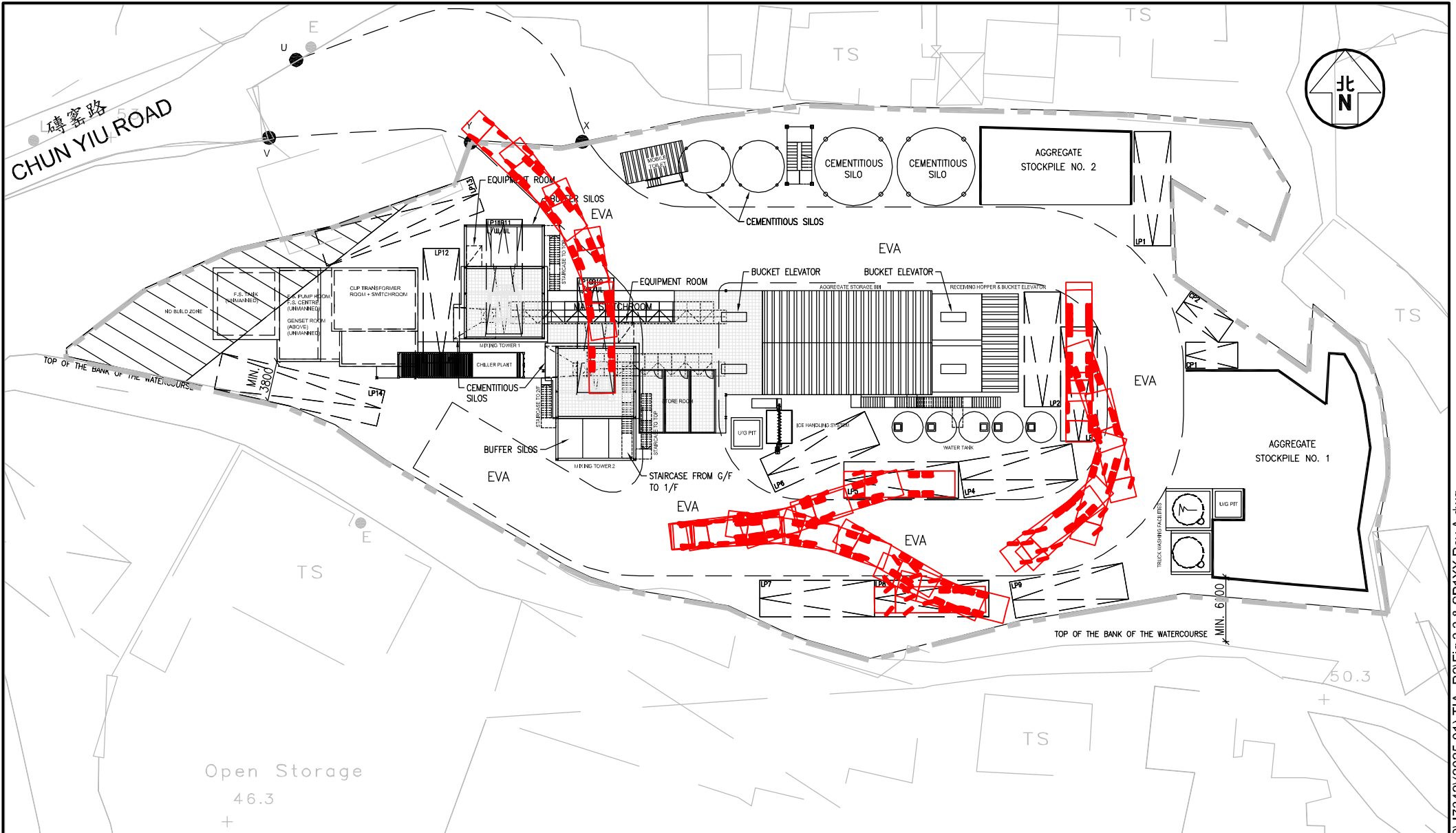
<b>Project Title</b> PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	<b>Figure No.</b> SP-105	<b>Revision</b> A	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk	
<b>Figure Title</b> SWEEP PATH OF PRIVATE CARS AND ARTICULATED GOODS VEHICLES (ENTERING PARKING SPACES AND LOADING / UNLOADING BAYS)	<b>Designed by</b> M C Y	<b>Drawn by</b> S C Y		<b>Checked by</b> K C
	<b>Scale in A4</b> 1 : 500	<b>Date</b> 14 JAN 2025		

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.3 & SP1XX Rev A.dwg



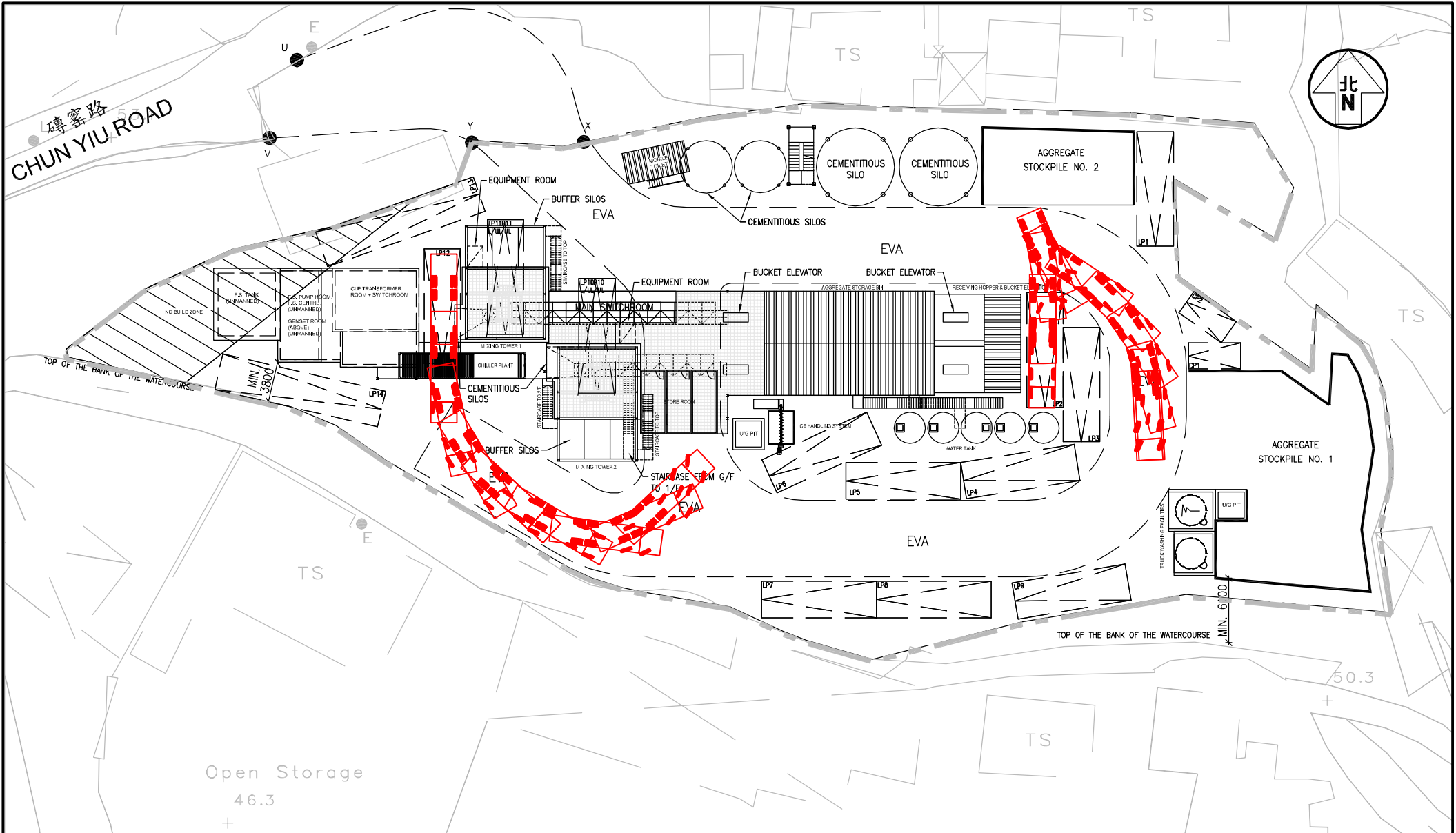
<p>Project Title  <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b></p>	<p>Figure No.  <b>SP-106</b></p>	<p>Revision  <b>A</b></p>
<p>Figure Title  <b>SWEPT PATH OF HEAVY GOODS VEHICLES          (EXITING FROM LOADING / UNLOADING BAYS)</b></p>	<p>Designed by  <b>M C Y</b></p> <p>Drawn by  <b>S C Y</b></p> <p>Scale in A4  <b>1 : 500</b></p>	<p>Checked by  <b>K C</b></p> <p>Date  <b>14 JAN 2025</b></p>

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.3 & SP-1XX Rev A.dwg



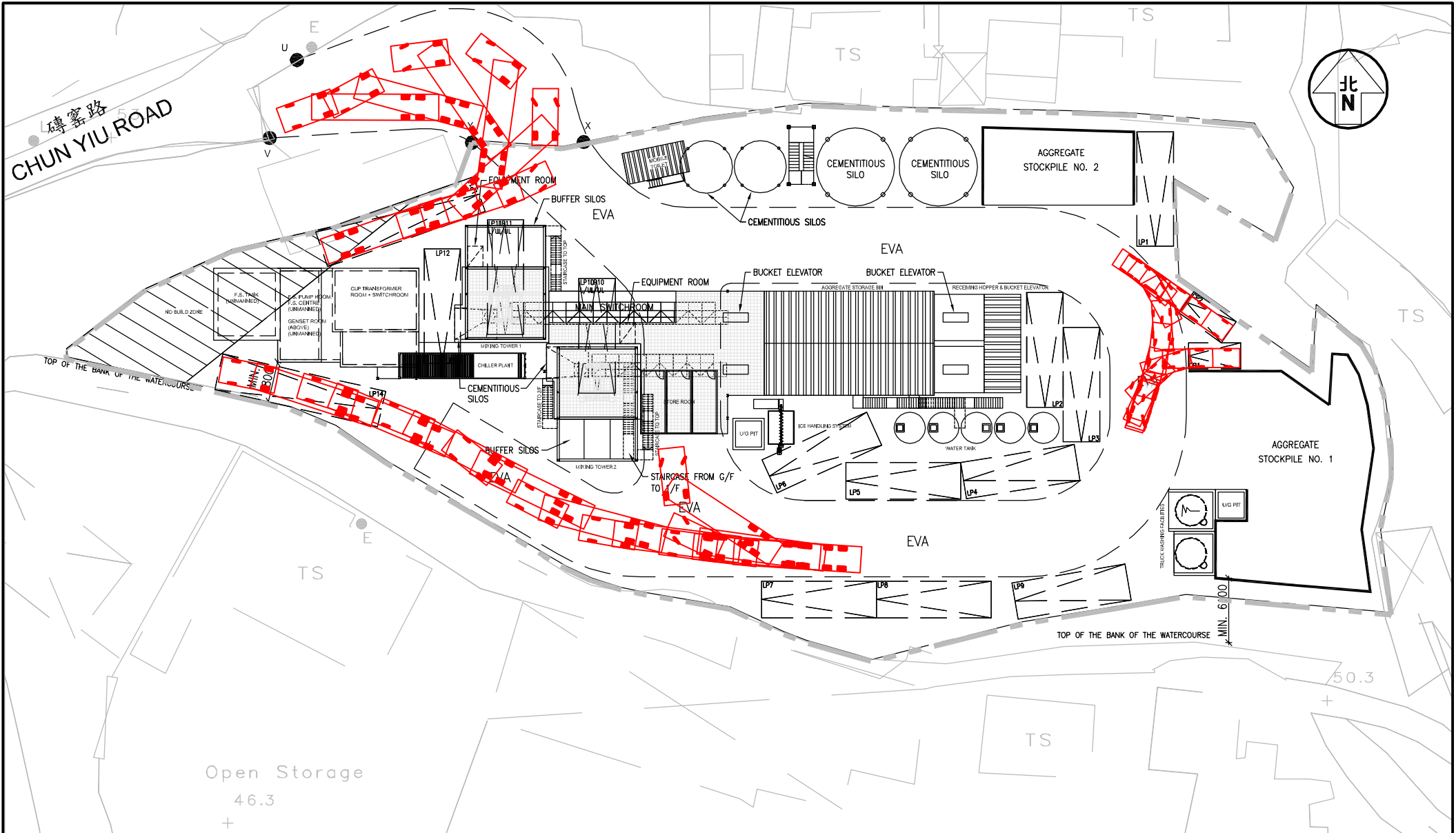
Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>SP-107</b>	Revision <b>A</b>
Figure Title <b>SWEPT PATH OF HEAVY GOODS VEHICLES          (EXITING FROM LOADING / UNLOADING BAYS)</b>	J7342 Designed by <b>M C Y</b> Drawn by <b>S C Y</b> Checked by <b>K C</b> Scale in A4 <b>1 : 500</b> Date <b>14 JAN 2025</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.3 & SP1XX Rev A.dwg



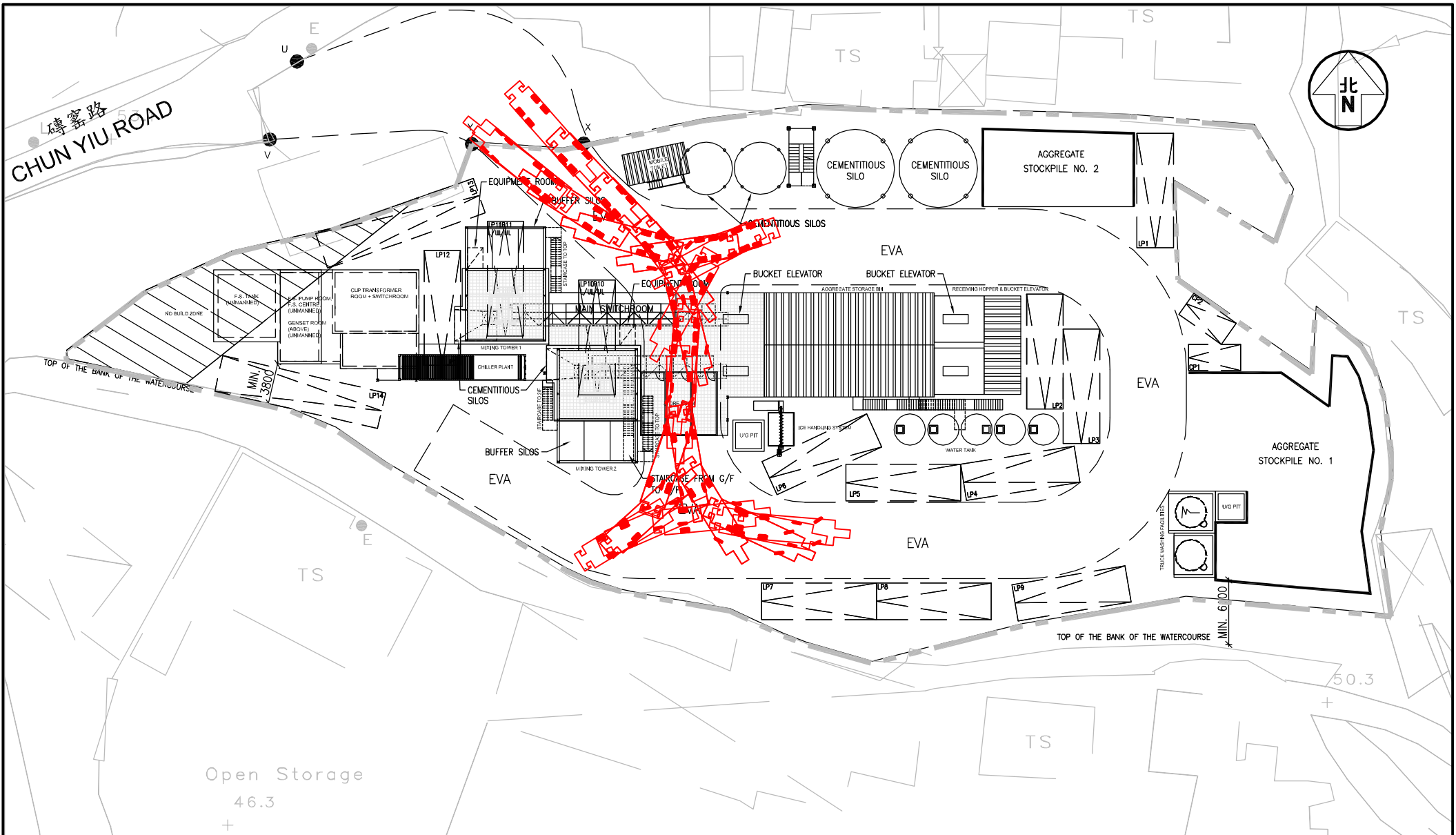
Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>SP-108</b>	Revision <b>A</b>
Figure Title <b>SWEPT PATH OF HEAVY GOODS VEHICLES          (EXITING FROM LOADING / UNLOADING BAYS)</b>	Designed by <b>M C Y</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.3 & SP1XX Rev A.dwg



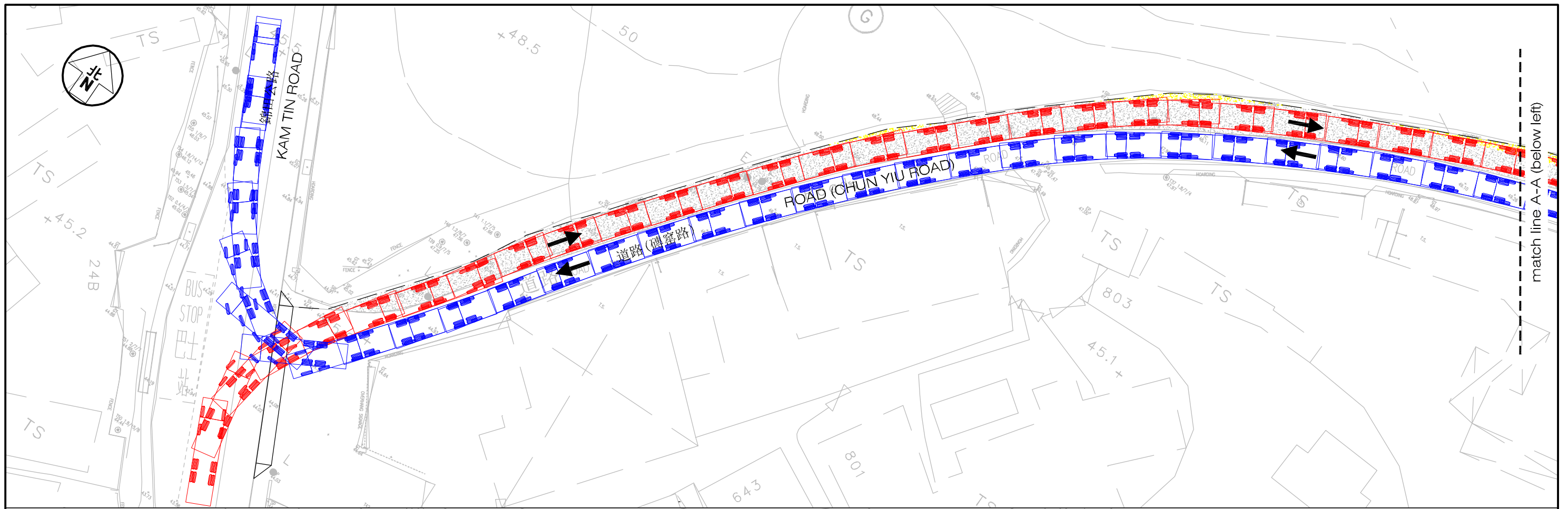
<b>Project Title</b> PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	<b>Figure No.</b> SP-109	<b>Revision</b> A
<b>Figure Title</b> SWEEP PATH OF PRIVATE CARS AND ARTICULATED GOODS VEHICLES (EXITING FROM PARKING SPACES AND LOADING / UNLOADING BAYS)	<b>Designed by</b> M C Y	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
<b>Drawn by</b> S C Y	<b>Checked by</b> K C	<b>Scale in A4</b> 1 : 500
<b>Date</b> 14 JAN 2025		

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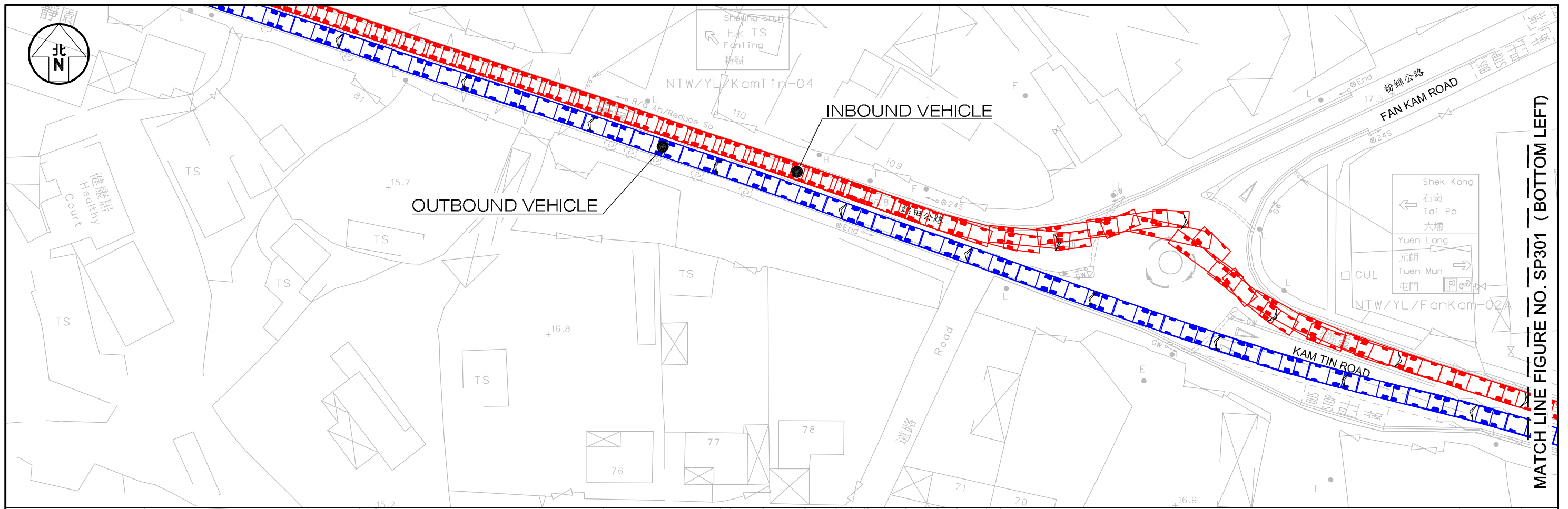
Project Title <b>PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES          FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT</b>	Figure No. <b>SP-110</b>	Revision <b>A</b>	
Figure Title <b>SWEPT PATH OF FIRE APPLIANCES</b>	Designed by <b>M C Y</b>	Drawn by <b>S C Y</b>	Checked by <b>K C</b>
	Scale in A4 <b>1 : 500</b>	Date <b>14 JAN 2025</b>	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road, Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

T:\JOB\J7300-J7349\J7342(2025 01) TIA\_R2\Fig 3.3 & SP1XX Rev A.dwg

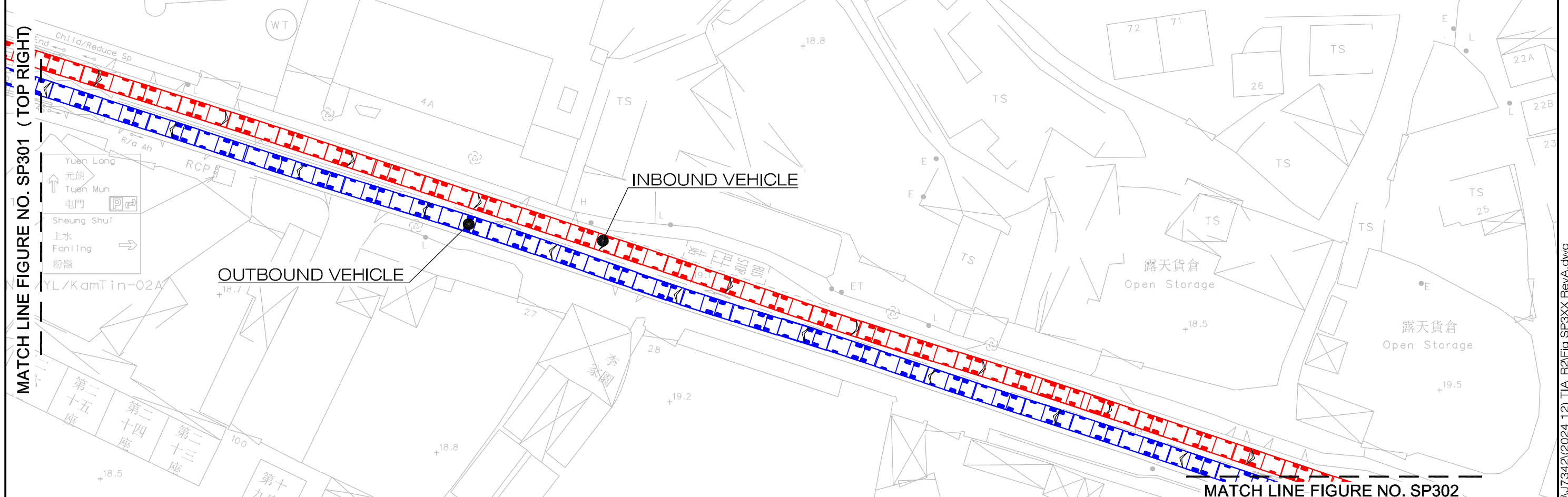


Project Title	PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	Figure No. J7342 SP-201	Revision A	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
Figure Title	SWEPT PATH OF HEAVY GOODS VEHICLES ALONG CHUN YIU ROAD WITH PROPOSED UPGRADING	Designed by W C H	Drawn by S C Y	
		Scale in A3 1 : 400	Date 13 JAN 2025	

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MATCH LINE FIGURE NO. SP301 (TOP RIGHT)

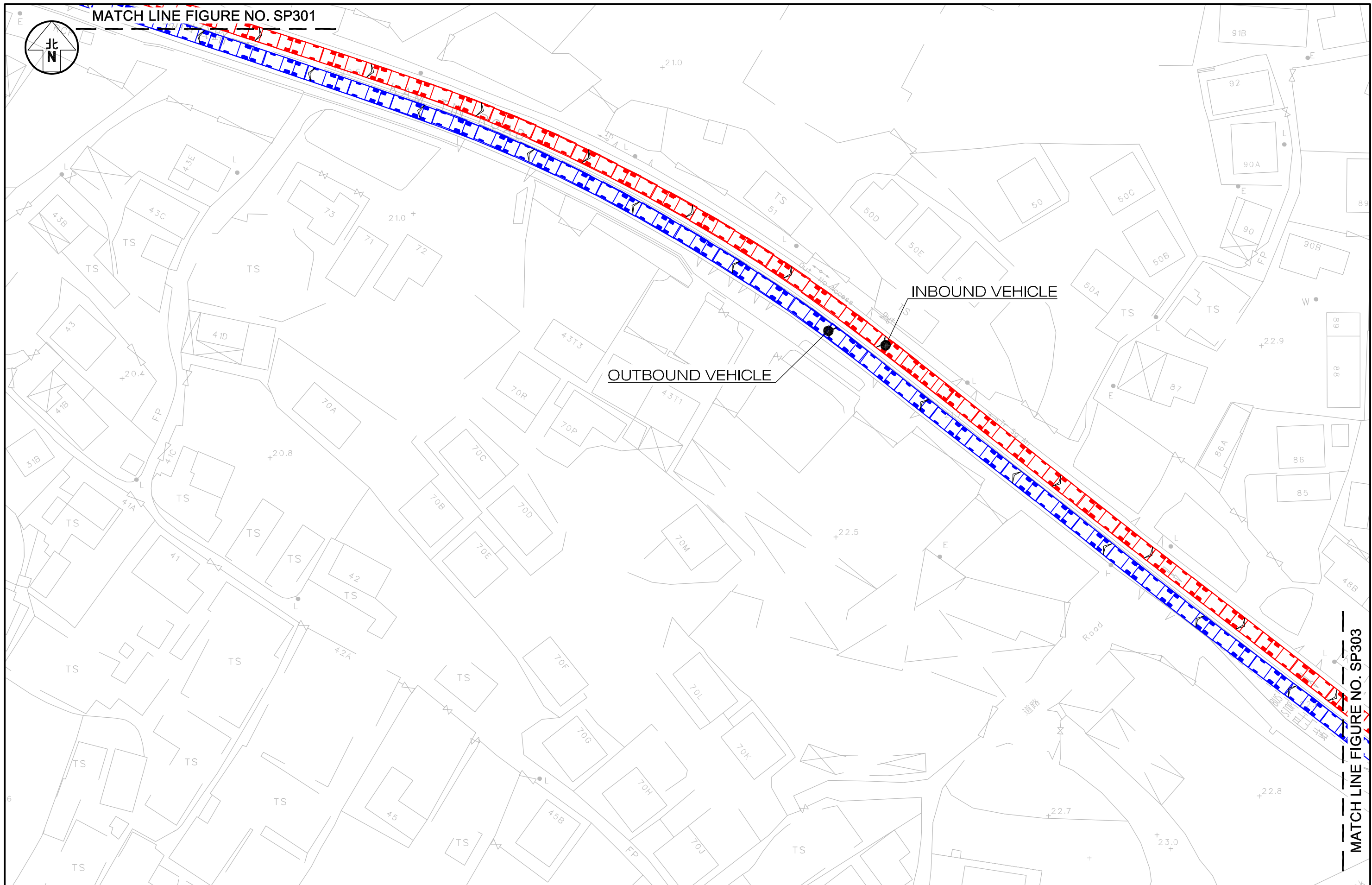
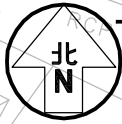
MATCH LINE FIGURE NO. SP302

Project Title	PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	Figure No. J7342 SP301	Revision A CKM Asia Limited Traffic and Transportation Planning Consultants
Figure Title	SWEPT PATH OF ARTICULATED GOODS VEHICLES INBOUND AND OUTBOUND VIA KAM TIN ROAD	Designed by W C H	Drawn by S C Y
		Checked by K C	21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
		Scale in A3 1 : 500	Date 03 JAN 2025

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MATCH LINE FIGURE NO. SP301



MATCH LINE FIGURE NO. SP303

Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES  
 FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT

J7342

Figure No. SP302

Revision A

**CKM Asia Limited**

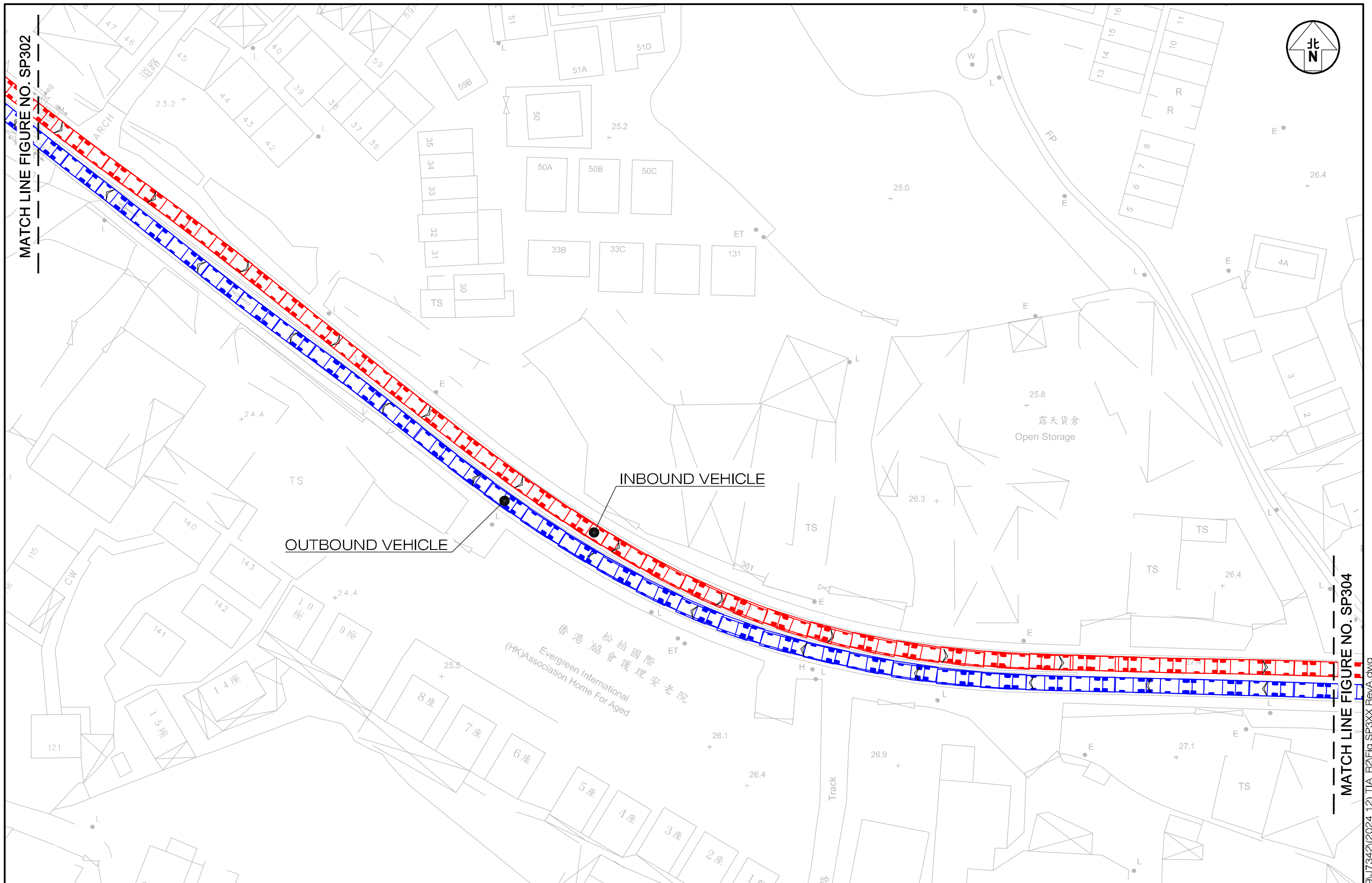
Figure Title SWEPT PATH OF ARTICULATED GOODS VEHICLES  
 INBOUND AND OUTBOUND VIA KAM TIN ROAD

Designed by W C H  
 Drawn by S C Y  
 Checked by K C

Traffic and Transportation Planning Consultants  
 21st Floor, Methodist House, 36 Hennessy Road  
 Wan Chai, Hong Kong  
 Tel : (852) 2520 5990 Fax : (852) 2528 6343  
 Email : mail@ckmasia.com.hk

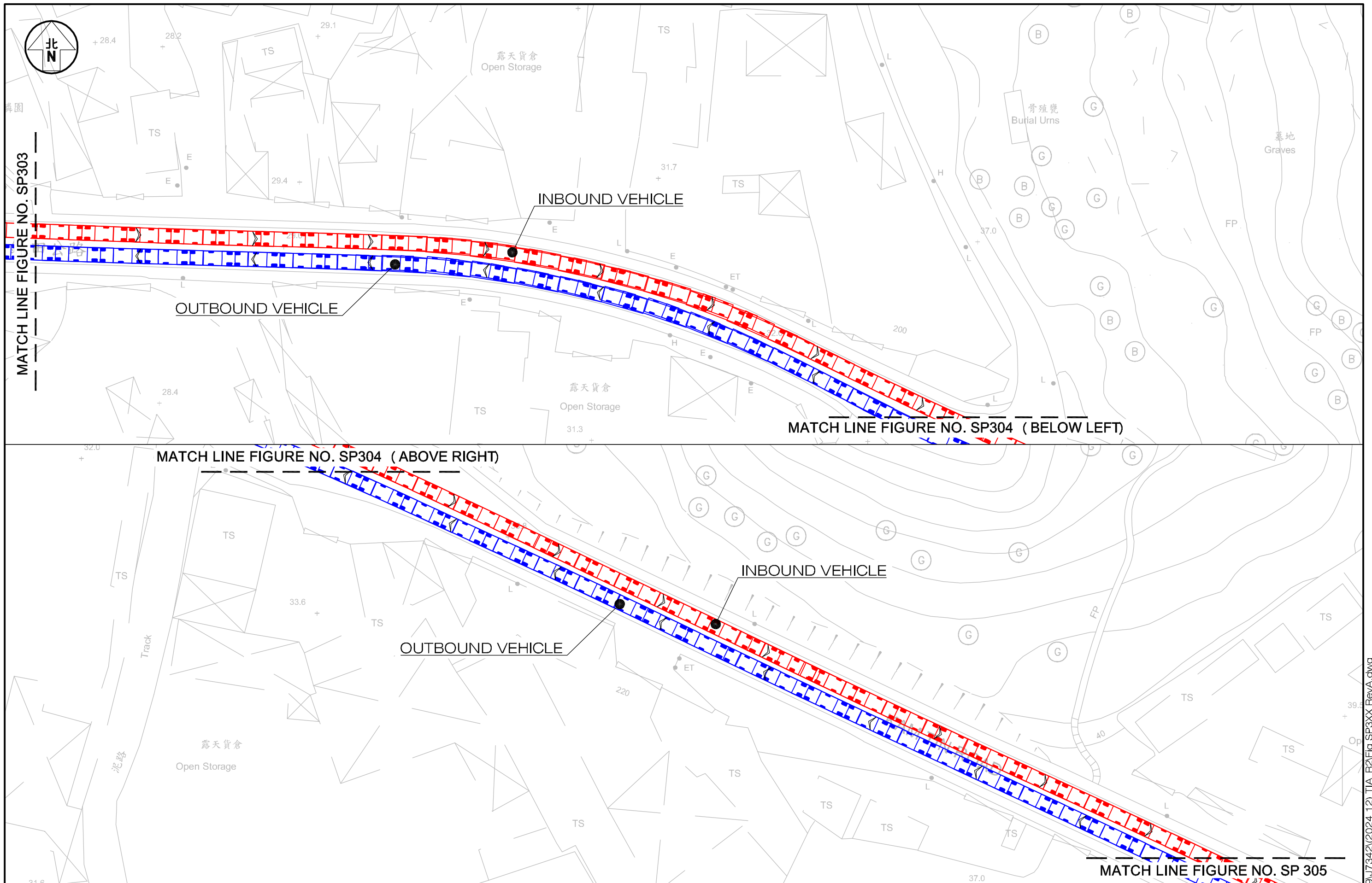
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 Date 03 JAN 2025

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Project Title	PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	Figure No. J7342 SP303	Revision A	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
Figure Title	SWEPT PATH OF ARTICULATED GOODS VEHICLES INBOUND AND OUTBOUND VIA KAM TIN ROAD	Designed by W C H	Drawn by S C Y	
		Scale in A3 1 : 500	Date 03 JAN 2025	

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Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES  
FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT

Figure Title SWEPT PATH OF ARTICULATED GOODS VEHICLES  
INBOUND AND OUTBOUND VIA KAM TIN ROAD

J7342

Figure No. SP304  
Revision A

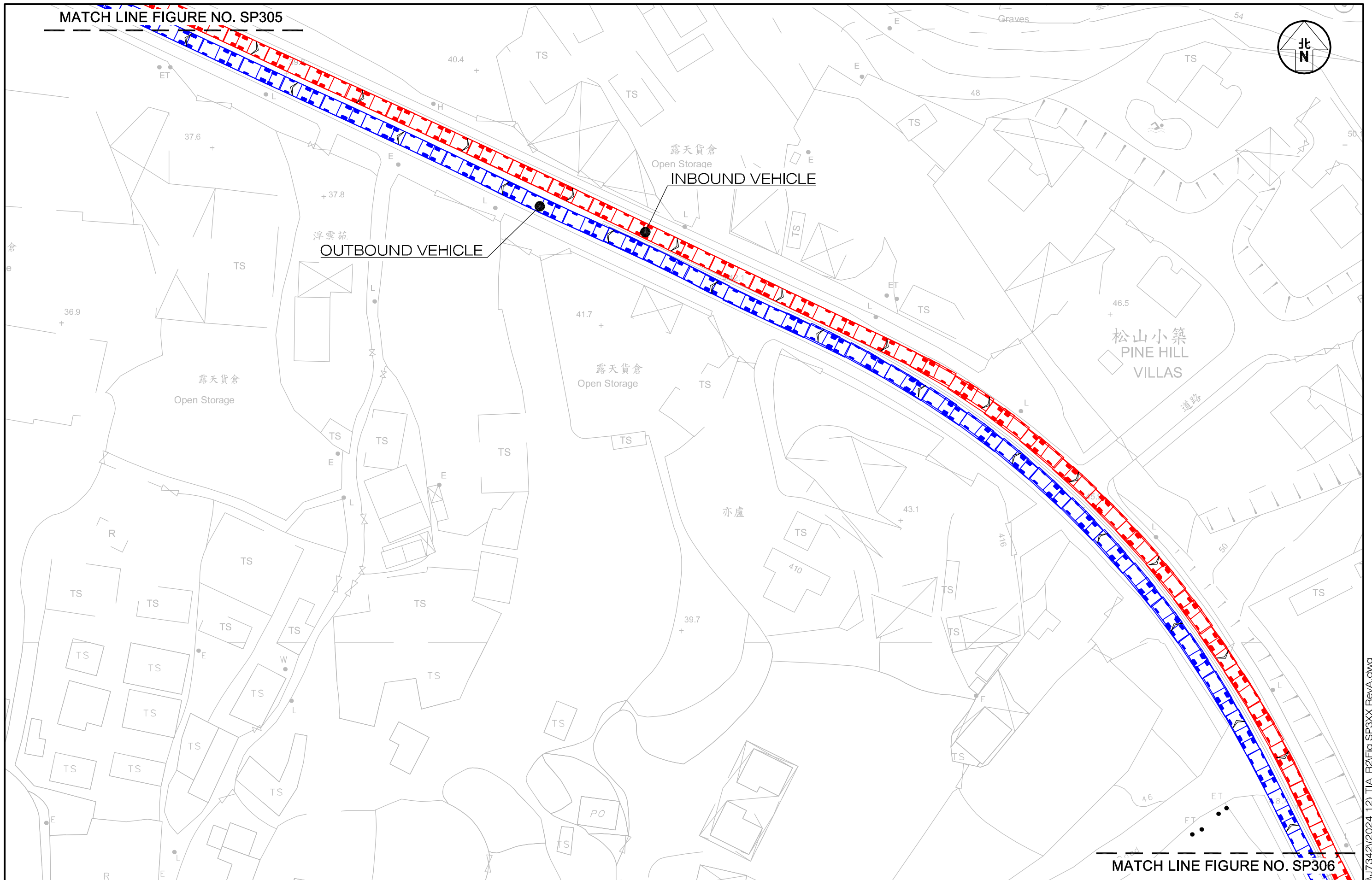
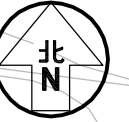
Designed by W C H  
Drawn by S C Y  
Checked by K C

Scale in A3 1 : 500  
Date 03 JAN 2025

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MATCH LINE FIGURE NO. SP305



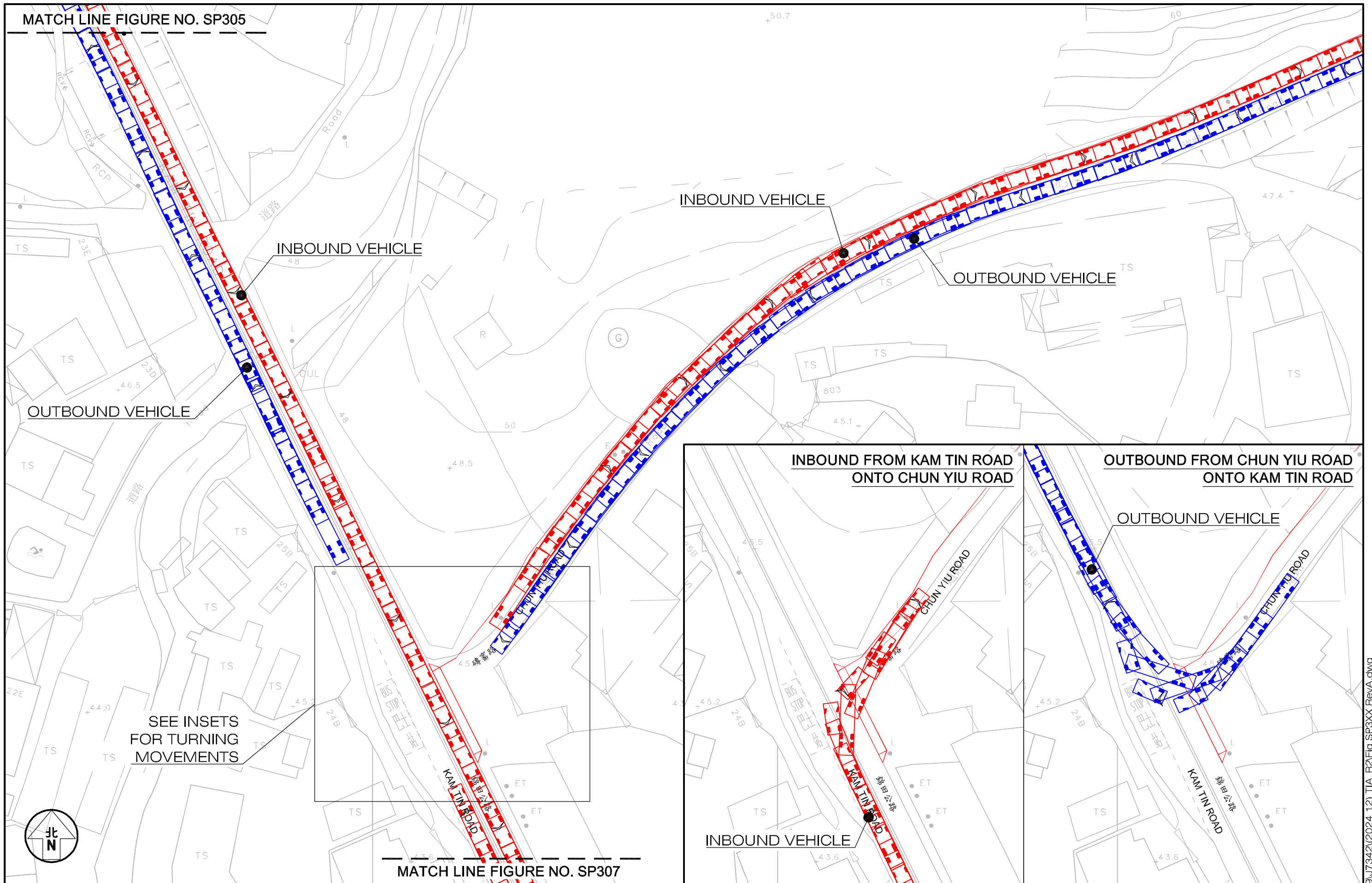
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Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES  
 FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT

Figure Title SWEPT PATH OF ARTICULATED GOODS VEHICLES  
 INBOUND AND OUTBOUND VIA KAM TIN ROAD

Figure No. J7342 SP305		Revision A	<b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants 21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk
Designed by W C H	Drawn by S C Y	Checked by K C	
Scale in A3 1 : 500	Date 03 JAN 2025		

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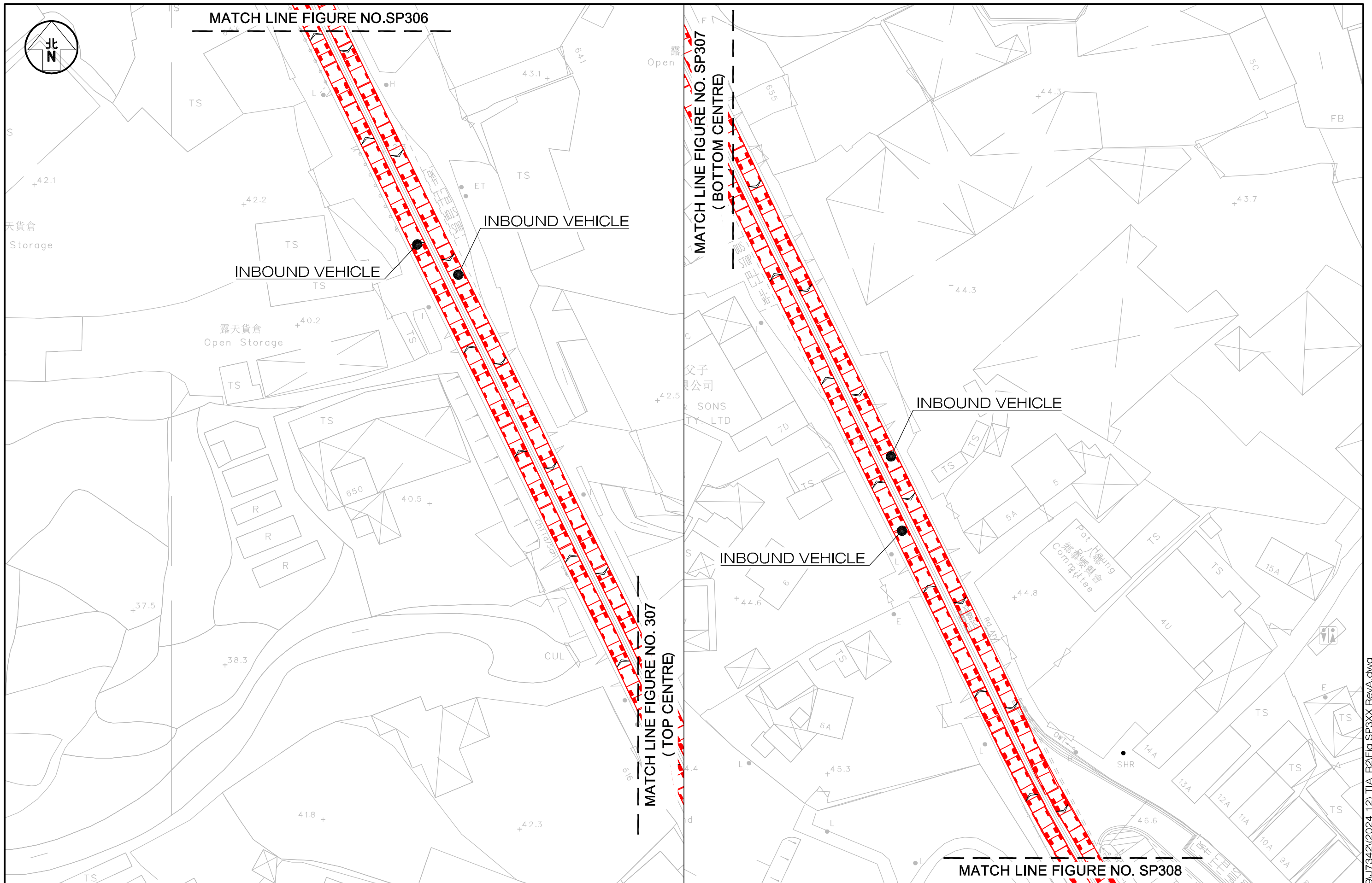
Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT

Figure Title SWEPT PATH OF ARTICULATED GOODS VEHICLES INBOUND AND OUTBOUND VIA KAM TIN ROAD

Figure No.	SP306	Revision	A
Designed by	W C H	Drawn by	S C Y
Checked by	K C	Date	03 JAN 2025
Scale in A3	1 : 500		

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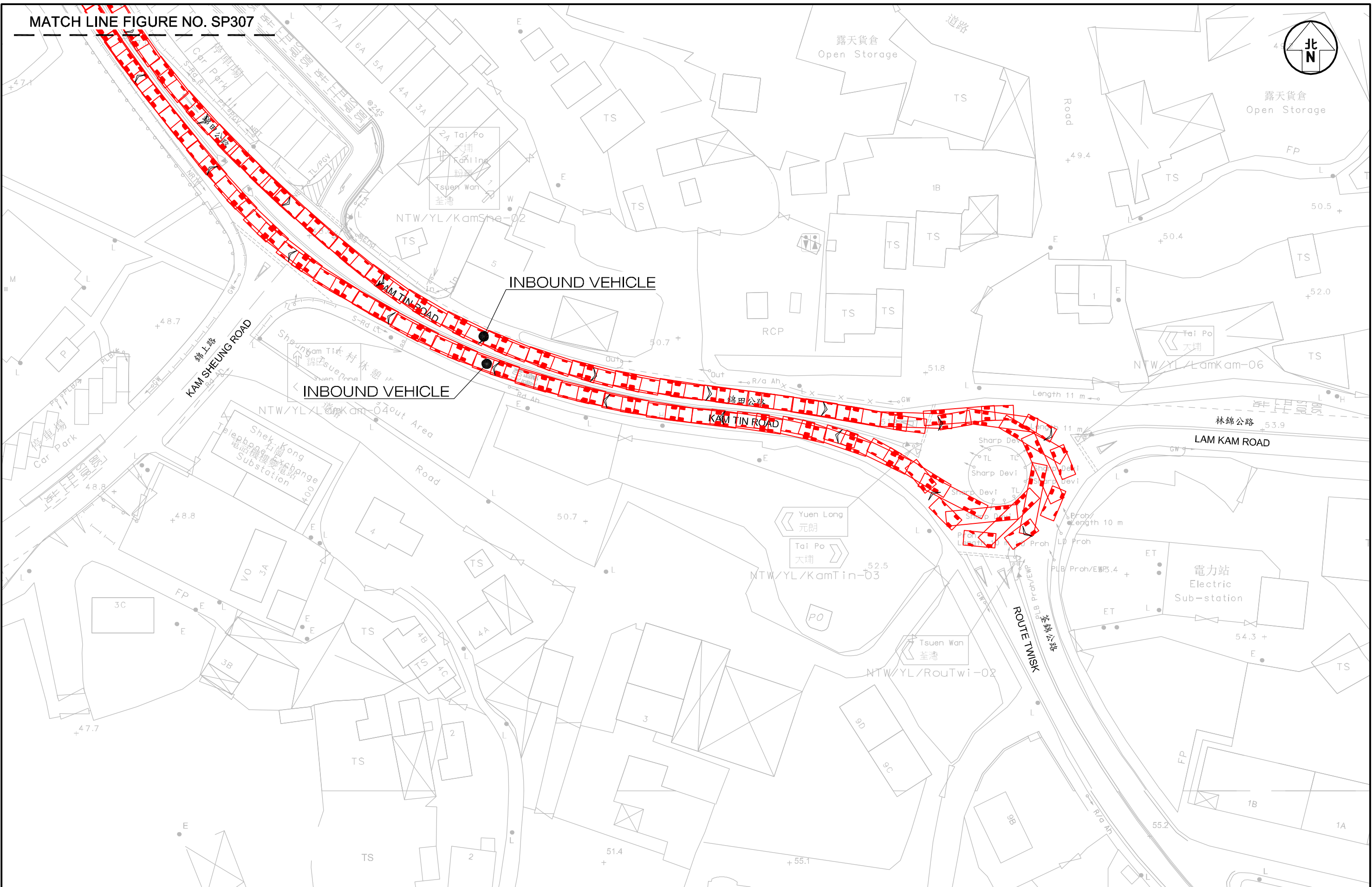
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Project Title	PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT	Figure No. J7342 SP307	Revision A <b>CKM Asia Limited</b> Traffic and Transportation Planning Consultants
Figure Title	SWEPT PATH OF ARTICULATED GOODS VEHICLES INBOUND AND OUTBOUND VIA KAM TIN ROAD	Designed by W C H Scale in A3 1 : 500	Checked by K C Date 03 JAN 2025 21st Floor, Methodist House, 36 Hennessy Road Wan Chai, Hong Kong Tel : (852) 2520 5990 Fax : (852) 2528 6343 Email : mail@ckmasia.com.hk

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MATCH LINE FIGURE NO. SP307



Project Title PROPOSED TEMPORARY CONCRETE BATCHING PLANT WITH ANCILLARY FACILITIES FOR A PERIOD OF 5 YEARS AT LOTS 573 RP AND 1710 IN D.D. 114, SHEK KONG, YUEN LONG, NT

Figure No. SP308  
J7342

Revision A  
CKM Asia Limited  
Traffic and Transportation Planning Consultants

Figure Title SWEPT PATH OF ARTICULATED GOODS VEHICLES INBOUND VIA KAM TIN ROAD AND SHEUNG TSUEN ROUNDABOUT

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Drawn by S C Y  
Checked by K C  
Scale in A3 1 : 500  
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