Vol. 2 of 5

FEP-01/457/2013/C

Central Kowloon Route

Kai Tak West

Contract No. HY/2014/07

&

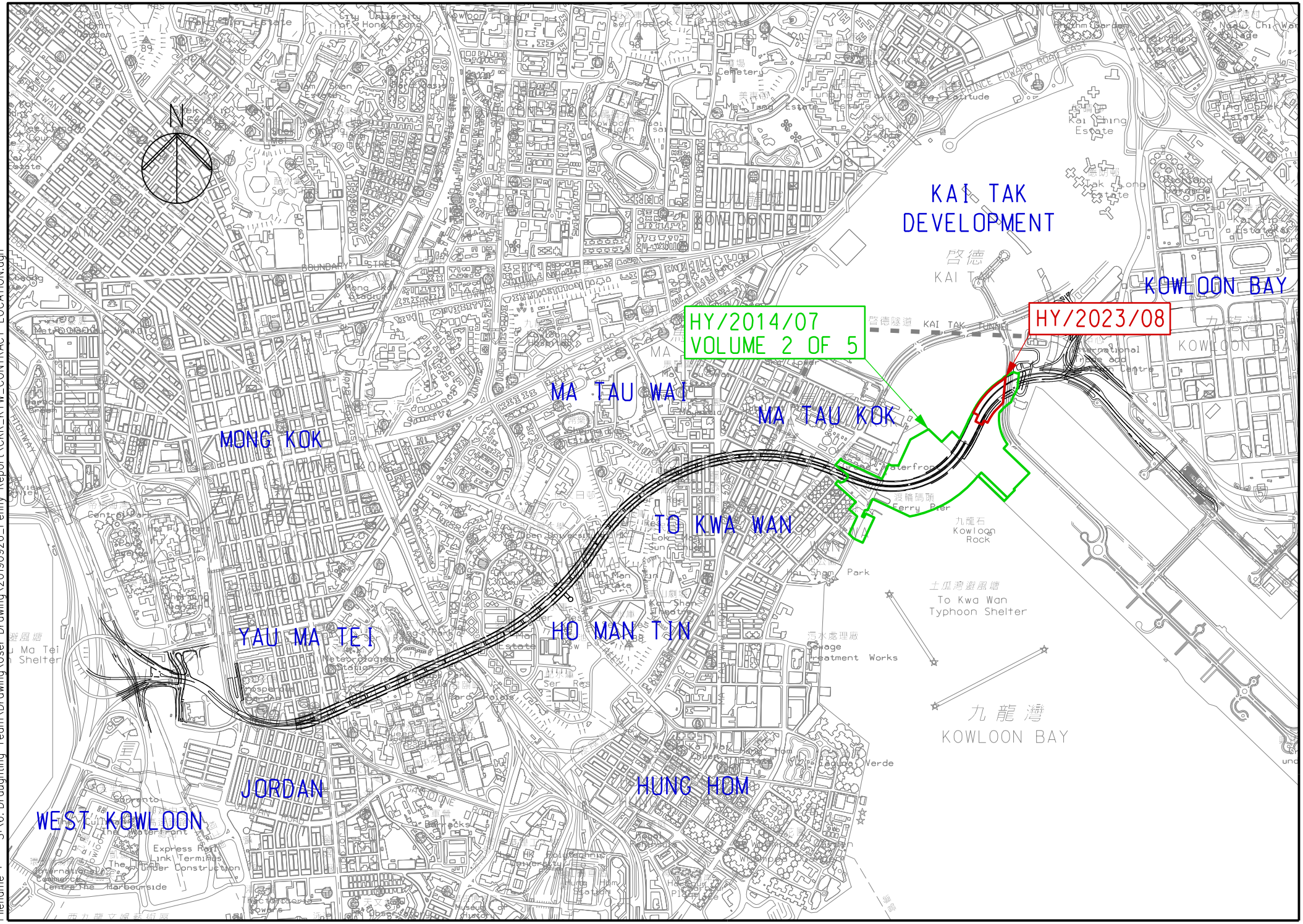
EP-457/2013/D

Remaining Works

Contract No. HY/2023/08

(Kai Tak West Area)

December 2025



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Central Kowloon Route

Kai Tak West

Contract No. HY/2014/07

Gammon Construction Limited

Central Kowloon Route

Works Contract HY/2014/07 – Central Kowloon Route – Kai Tak West

Monthly EM&A Report for December 2025

[January 2026]

	Name	Signature
Prepared & Checked:	Ho Pui Yin Kevin	
Reviewed, Approved & Certified:	Y. W. Fung	

Version: 0	Date: 08 January 2026

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路政署
HIGHWAYS DEPARTMENT
主要工程管理處
MAJOR WORKS PROJECT MANAGEMENT OFFICE

ERM

Environmental Permit No. EP-457/2013/D

Central Kowloon Route

Independent Environmental Checker Verification

Works Contract:	**Kai Tak West (HY/2014/07)**

Reference Document/Plan

Document/~~Plan~~ to be ~~Certified~~/ Verified:	Monthly EM&A Report No.93 (December 2025)
Date of Report:	08 January 2026
Date received by IEC:	08 January 2026

Reference EP Condition

Environmental Permit Condition: 3.4

Submission of Monthly EM&A Report of the Project

3.4 Four hard copies and one electronic copy of monthly EM&A Report shall be submitted to the Director within 2 weeks after the end of each reporting month throughout the entire construction period. The EM&A Reports shall include a summary of all non-compliance. The submissions shall be certified by the ET Leader and verified by the IEC as complying with the requirements as set out in the EM&A Manual before submission to the Director. Additional copies of the submission shall be provided to the Director upon request by the Director.

IEC Verification

I hereby verify that the above referenced document/~~plan~~ complies with the above referenced condition of EP-457/2013/D and FEP-01/457/2013/C.

Ms Mandy To Date: 09 January 2026

Independent Environmental Checker

Our ref: 0436942_IEC Verification Cert_KTW_Monthly EM&A Rpt No.93.docx

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EXECUTIVE SUMMARY

Central Kowloon Route – Kai Tak West (CKR-KTW; Contract No. HY/2014/07) (hereafter called "the Project") covers part of the construction of the Central Kowloon Route (CKR).

The Project comprises the follow works:

- 50x30m access shaft with noise enclosure at Ma Tau Kok (MTK);
- 100m long cut-and-cover (C&C) tunnel at MTK;
- Demolition and re-provisioning of MTK Public Pier;
- 160m long underwater tunnel (UWT) (Stage 1);
- 210m long UWT (Stage 2);
- 60m long C&C tunnel at Kai Tak;
- 130m long depressed road and 200m long underpass at Kai Tak;
- 390m long underground tunnel ventilation audit at Kai Tak;
- Seawall demolition and construction of new landing steps; and
- Barging Point enclosure and conveyor system.

The EM&A programme commenced on 4 April 2018.The impact EM&A for the Project includes air quality and noise monitoring. The EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) and construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025.

All construction works of Contract No. HY/2014/07 Central Kowloon Route – Kai Tak West (FEP-01/457/2013/C) are substantially completed in September 2025. The proposal of termination of the EM&A Programme under FEP-01/457/2013/C was submitted on 28 November 2025.

EPD has approved the submission of the proposal for termination of EM&A programme for construction stage of the captioned Project covered under the EP No. FEP-01/457/2013/C issued on 23 December 2025. This Monthly EM&A Report (December 2025) would be the last Monthly EM&A Report of Contract No. HY/2014/07.

This is the 93rd monthly EM&A Report presenting the EM&A works carried out during the period between 1 and 31 December 2025. As informed by the Contractor, major activities in the reporting period were:

Locations	**Site Activities**
Kai Tak	- Defect rectification works at depressed road;
Ma Tau Kok	- Defect rectification works at Public Transport Interchange
Kowloon Bay	- Nil

Breaches of Action and Limit Levels for Air Quality

The EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring results, and wind data, could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Breaches of Action and Limit Levels for Noise

Regular Noise Monitoring

The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring results could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

No exceedance of Action and Limit level of noise was recorded in the reporting month.

Complaint, Notification of Summons and Successful Prosecution

No environmental related complaints, notification of summons and successful prosecution were received in the reporting month.

Reporting Changes

No report changes in the reporting period**.**

Future Key Issues

All construction works of Contract No. HY/2014/07 Central Kowloon Route – Kai Tak West (FEP-01/457/2013/C) are substantially completed in September 2025. The proposal of termination of the EM&A Programme under FEP-01/457/2013/C was submitted on 28 November 2025.

EPD has approved the submission of the proposal for termination of EM&A programme for construction stage of the captioned Project covered under the EP No. FEP-01/457/2013/C issued on 23 December 2025. This Monthly EM&A Report (December 2025) would be the last Monthly EM&A Report of Contract No. HY/2014/07.

Key issues to be considered in the next month included:

Locations	Site Activities
Kai Tak	- Defect rectification works at depressed road;
Ma Tau Kok	- Defect rectification works at Public Transport Interchange
Kowloon Bay	- Nil.

Potential environmental impacts arising from the above construction activities are mainly associated with construction dust, construction noise, water pollution control, and waste management.

1 INTRODUCTION

Gammon Construction Limited was commissioned by the Highways Department as the Civil Contractor for Works Contract HY/2014/07. AECOM Asia Company Limited (AECOM) was appointed by Gammon Construction Limited as the Environmental Team (ET) to undertake the Environmental Monitoring and Audit (EM&A) programme during construction phase of the Project.

1.1 Purpose of the Report

1.1.1 This is the 93rd monthly EM&A Report which summaries the impact monitoring results and audit findings for the Project during the reporting period between 1 and 31 December 2025.

1.2 Report Structure

1.2.1 This monthly EM&A Report is organized as follows:

- Section 1: Introduction
- Section 2: Project Information
- Section 3: Environmental Monitoring Requirement
- Section 4: Implementation Status of Environmental Mitigation Measures
- Section 5: Monitoring Results
- Section 6: Environmental Site Inspection and Audit
- Section 7: Environmental Non-conformance
- Section 8: Future Key Issues
- Section 9: Conclusions and Recommendations

2 PROJECT INFORMATION

2.1 Background

2.1.1 CKR is a dual 3-lane trunk road across central Kowloon linking the West Kowloon in the west and the Kai Tak Development (KTD) in the east. The CKR will be about 4.7 km long with an underground tunnel section of about 3.9 km long, in particular, there will be an underwater tunnel of about 370 m long in Kowloon Bay to the north of the To Kwa Wan Typhoon Shelter. It will connect the West Kowloon Highway at Yau Ma Tei Interchange with the road network at Kowloon Bay and the future Trunk Road T2 at KTD which will connect to the future Tseung Kwan O – Lam Tin Tunnel (TKO-LTT) and Cross Bay Link (CBL). CKR, Trunk Road T2 and TKO-LTT will form a strategic highway link, namely Route 6, connecting West Kowloon and Tseung Kwan O. In addition, 3 ventilation buildings, which will be located in Ya Ma Tei, Ho Man Tin and ex-Kai Tak airport area, are proposed to ensure acceptable air quality within the tunnel.

2.1.2 The Environmental Impact Assessment (EIA) Report for Central Kowloon Route (Register No.: AEIAR-171/2013) was approved on 11 July 2013 under the Environmental Impact Assessment Ordinance (EIAO). Following the approval of the EIA Report, an Environmental Permit (EP) for CKR was granted on 9 August 2013 (EP No.: EP- 457/2013) for the construction and operation. Variation of EP (VEP) was subsequently applied and the latest EP (EP No. EP-457/2013/D) was issued by the Director of Environmental Protection (DEP) on 15 June 2021. Further Environmental Permit (EP No. FEP-01/457/2013/C) for CKR – Kai Tak West was issued on 28 February 2018.

2.1.3 The construction of the CKR had been divided into different sections. This Work Contract HY/2014/07 – Kai Tak West (KTW) ("The Project") will include a road which is a trunk road, including new roads, and major extensions or improvements to existing roads; a road fully enclosed by decking above and by structure on the sides for more than 100 m; and reclamation works (including associated dredging works) more than 1 ha in size and a boundary of which is less than 100 m from an existing residential area.

2.1.4 The site layout plan of the Project is shown in **Figure 1.1**.

2.2 Site Description

2.2.1 The major construction activities under this Project include:

(a) construction of approximately 160m long cut-and-cover tunnel and 370m long underwater tunnel between the tunnel section at Ma Tau Kok and the depressed road of the CKR within Kai Tak Development;
(b) reconstruction of the seawall at Ma Tau Kok public pier, and the sloping seawall at the Former Kai Tak Airport Runway;
(c) construction of approximately 125m long depressed road and 200m long underpass of the CKR within Kai Tak Development;
(d) construction of approximately 360m long underground tunnel ventilation adit of the CKR;
(e) reconstruction of Kowloon City Ferry Pier Public Transport Interchange; and
(f) other associated works.

2.3 Construction Programme and Activities

2.3.1 The major construction activities undertaken in the reporting month are summarized in **Table 2.1**.

Table 2.1 Construction Activities in the reporting month

Locations	Site Activities
Kai Tak	- Defect rectification works at depressed road;
Ma Tau Kok	- Defect rectification works at Public Transport Interchange
Kowloon Bay	- Nil

2.3.2 The construction programme is presented in **Appendix A**.

2.4 Project Organization

2.4.1 The project organization structure is shown in **Appendix B**. The key personnel contact names and numbers for the Project are summarized in **Table 2.2**.

Table 2.2 Contact Information of Key Personnel

Party	Role	Position	Name	Telephone	Fax
Arup-Mott MacDonald Joint Venture	Residential Engineer (ER)	Engineer's Representative	Mr. Patrick Lo	36195901	2268 3954
ERM	Independent Environmental Checker (IEC)	Independent Environmental Checker	Ms. Mandy To	2271 3113	3015 8052
Gammon	Contractor	Contracts Manager	Mr. Kin Fai Tam	2516 8823	2516 6260
		Environmental Manager	Ms. Michelle Tang	9267 8866	2516 6260
AECOM	Contractor's Environmental Team (ET)	ET Leader	Mr. Y. W. Fung	3856 5681	2317 7609

2.5 Status of Environmental Licences, Notification and Permits

2.5.1 Relevant environmental licenses, permits and/or notifications on environmental protection for this Project and valid in the reporting month are summarized in **Table 2.3**.

Table 2.3 Status of Environmental Licenses, Notifications and Permits

Permit / License No. / Notification/ Reference No.	Valid Period		Status	Remarks
	From	To		
Further Environmental Permit				
FEP-01/457/2013/C	28 Feb 2018	End of Project	Valid	--
Wastewater Discharge License				
WT00043692-2023	1 Apr 2023	31 Mar 2028	Valid	Ma Tau Kok
WT00043881-2023	30 Jun 2023	30 Jun 2028	Valid	Underwater Tunnel Stage 2
WT00044013-2023	7 May 2025	30 Apr 2028	Valid	Kai Tak and Underwater Tunnel Stage 1
Construction Noise Permit				
GW-RE0157-25	7 Mar 2025	6 Sep 2025	No further renewal by KTW	General Works at Ma Tau Kok
GW-RE0631-25	15 Jun 2025	14 Dec 2025	No further renewal by KTW	General Works at Kai Tak
GW-RE0418-25	30 Apr 2025	29 Oct 2025	No further renewal by KTW	General Works at Stage 1 Underwater Tunnel
GW-RE0581-25	7 Jun 2025	6 Nov 2025	No further renewal by KTW	General Works at Stage 2 Underwater Tunnel
GW-RE0233-25	19 Mar 2025	18 Sep 2025	No further renewal by KTW	Kai Tak Access Road
Chemical Waste Producer Registration				
5118-247-G2347-47	30 Jan 2018	End of Project	Valid	--
5118-247-G2347-48	30 Jan 2018	End of Project	Valid	--
Marine Dumping Permit				
--	--	--	--	--
Billing Account for Construction Waste Disposal				
7029909	22 Jan 2018	End of Project	Account Active	--
Notification Under Air Pollution Control (Construction Dust) Regulation				
429442	5 Jan 2018	End of Project	Notified	--

3 ENVIRONMENTAL MONITORING REQUIREMENTS

3.1 Construction Dust Monitoring

Monitoring Requirements

3.1.1 In accordance with the approved EM&A Manual, measurement of 24-hour and 1-hour Total Suspended Particulates (TSP) level at the designated air quality monitoring station is required. Impact 24-hour TSP monitoring should be carried out for at least once every 6 days, and 1-hour TSP monitoring should be done at least 3 times every 6 days while the highest dust impact is expected. The Action and Limit Levels of the air quality monitoring is provided in **Appendix D**.

Monitoring Equipment

3.1.2 The EM&A monitoring, construction dust monitoring (monitoring station E-A14a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring equipment could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Monitoring Locations

3.1.3 The monitoring station for construction dust monitoring pertinent to the Project has been identified based on the approved EM&A Manual for the Project. The location of the construction dust monitoring station is summarized in **Table 3.1** and shown in **Figure 3.1**.

Table 3.1 Location of Construction Dust Monitoring Station

Location	Monitoring Station	Description
E-A14a [1]	Block B of Merit Industrial Centre	Rooftop (13/F)

Note:
[1] The air monitoring station proposed in the EM&A Manual (i.e. Wyler Gardens with ID: E-A14) was not available for impact dust monitoring, therefore impact monitoring was conducted at E-A14a as an alternative which was agreed by the ER, IEC and EPD.

Monitoring Methodology

3.1.4 The EM&A monitoring, construction dust monitoring (monitoring station E-A14a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring methodology could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Monitoring Schedule for the Reporting Month

3.1.5 The EM&A monitoring, construction dust monitoring (monitoring station E-A14a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring schedule could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

3.2 Construction Noise Monitoring

Monitoring Requirements

3.2.1 In accordance with the EM&A Manual, impact noise monitoring should be conducted for at least once a week during the construction phase of the Project. **Table 3.2** summarizes the monitoring parameters, frequency and duration of impact noise monitoring. The Action and Limit Levels of the noise monitoring is provided in **Appendix D**.

Table 3.2 Noise Monitoring Parameters, Frequency and Duration

Parameter and Duration	Frequency
30-mins measurement at each monitoring station between 0700 and 1900 on normal weekdays. L_{eq}, L_{10} and L_{90} would be recorded.	At least once per week

Monitoring Equipment

3.2.2 The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding equipment could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Monitoring Locations

3.2.3 The monitoring stations for construction noise monitoring pertinent to the Project have been identified based on the approved EM&A Manual for the Project. Locations of the noise monitoring stations are summarized in **Table 3.3** and shown in **Figure 3.2**.

Table 3.3 Noise Monitoring Stations during Construction Phase

Location	Monitoring Station	Description	Measurement
E-N12a [1]	19 Hing Yan Street	Rooftop (9/F)	Façade
E-N21a [1]	Block B of Merit Industrial Centre	Rooftop (13/F)	Free field[2]

Notes:
[1] The noise monitoring stations proposed in the EM&A Manual (i.e. Grand Waterfront Tower 3 with ID: E-N12 and Hang Chien Court Block J with ID: E-N21) were not available for impact noise monitoring, therefore impact monitoring was conducted at E-N12a and E-N21a as an alternative which was agreed by the ER, IEC and EPD.
[2] A correction of +3 dB(A) was made to the free field measurements.

Monitoring Parameters, Frequency and Duration

3.2.4 The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring parameters, frequency and duration could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Monitoring Methodology

3.2.5 The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring methodology could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

Monitoring Schedule for the Reporting Month

3.2.6 The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring schedule could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

3.3 Landscape and Visual

3.3.1 As per the EM&A Manuals, the landscape and visual mitigation measures shall be implemented and site inspections should be undertaken once every two weeks during the construction period. A summary of the implementation status is presented in **Section 6.**

4 IMPLEMENTATION STATUS OF ENVIRONMENTAL MITIGATION MEASURES

4.1.1 The Contractor has implemented environmental mitigation measures and requirements as stated in the EIA Reports, the EP and EM&A Manuals. The implementation status of the environmental mitigation measures during the reporting period is summarized in **Appendix C.** Status of required submissions under the EP during the reporting period is summarised in **Table 4.1**.

Table 4.1 Status of Required Submission under Environmental Permit

EP Condition	Submission	Submission Date
Condition 3.4 of EP-457/2013/D and Condition 3.4 of FEP-01/457/2013/C	Monthly EM&A Report for November 2025	12 December 2025

5 MONITORING RESULTS

5.1 Construction Dust Monitoring

5.1.1 The EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring results, and wind data, could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

5.1.2 The event and action plan are annexed in **Appendix E**.

5.1.3 Major dust sources during the monitoring included construction dust and nearby traffic emission.

5.2 Regular Construction Noise Monitoring

5.2.1 The EM&A monitoring, construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring results could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

5.2.2 No exceedance of Action and Limit level of noise was recorded in the reporting month.

5.2.3 The event and action plan are annexed in **Appendix E**.

5.2.4 Major noise sources during the monitoring included construction noise from the Project site and nearby traffic noise.

5.3 Waste Management

5.3.1 C&D materials and wastes sorting were carried out on site. Receptacles were available for C&D wastes and general refuse collection.

5.3.2 As advised by the Contractor, 27 m^3 of C&D material were generated and 27 m^3 C&D material was disposed to public fill. No inert C&D were reused in the contract in the reporting month. 40,760 kg of general refuse was generated and sent to NENT Landfill in the reporting month. No metal, no paper/cardboard packaging and no plastics were collected by recycle contractor in the reporting month. No chemical waste was collected by licensed contractor in the reporting month. No Type 1, Type 2 and Type 3 Marine sediment were disposed at Confined Marine Disposal Facility to the East of Sha Chau. The waste flow table is annexed in **Appendix G**.

5.3.3 The Contractor is advised to properly maintain on site C&D materials and wastes collection, sorting and recording system and maximize reuse / recycle of C&D materials and wastes. The Contractor is reminded to properly maintain the site tidiness and dispose of the wastes accumulated on site regularly and properly.

5.3.4 The Contractor is reminded that chemical waste containers should be properly treated and stored temporarily in designated chemical waste storage area on site in accordance with the Code of Practice on the Packaging, Labelling and Storage of Chemical Wastes.

5.4 Landscape and Visual

5.4.1 Bi-weekly inspection of the implementation of landscape and visual mitigation measures was conducted on 10 and 24 December 2025. A summary of the site inspection is provided in **Appendix C**. The observations and recommendations made during the site inspections are presented in **Table 6.1**.

6 ENVIRONMENTAL SITE INSPECTION AND AUDIT

6.1.1 Site inspections were carried out on a weekly basis to monitor the implementation of proper environmental pollution control and mitigation measures for the Project. A summary of the mitigation measures implementation schedule is provided in **Appendix C**.

6.1.2 In the reporting month, 4 site inspections were carried out on 3, 10, 17 and 24 December 2025. Joint inspections with the IEC, ER, the Contractor and ET were conducted on 24 December 2025. No non-compliance was recorded during the site inspection. Details of observations recorded during the site inspections are presented in **Table 6.1**.

Table 6.1 Observations and Recommendations of Site Audit

Parameters	Date	Observations and Recommendations	Follow-up
Air Quality	17 December 2025	Reminder: The contractor was reminded to provide sandbags at the boundary of breaking area, to prevent surface runoff by watering at MTK site.	The item was rectified by the Contractor on 24 December 2025.
Noise	Nil	Nil	Nil
Water Quality	Nil	Nil	Nil
Waste/ Chemical Management	10 December 2025	Reminder: The contractor was reminded to provide sandbag to prevent the soil and concrete into the drainages.	The item was rectified by the Contractor on 17 December 2025.
Landscape & Visual	Nil	Nil	Nil
Permits/ Licenses	Nil	Nil	Nil

*The item was under rectification on last reporting month.

6.1.3 All follow-up actions requested by Contractor's ET during the site inspection were undertaken as reported by the Contractor and confirmed in the following weekly site inspection conducted during the reporting period.

7 ENVIRONMENTAL NON-CONFORMANCE

7.1 Summary of Monitoring Exceedances

7.1.1 The The EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) and construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring parameters, equipment, methodology, monitoring schedule wind data, results and the established Action and Limit Levels could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

7.1.2 No exceedance of Action and Limit level of noise was recorded in the reporting month.

7.2 Summary of Environmental Non-Compliance

7.2.1 No environmental non-compliance was recorded in the reporting month.

7.3 Summary of Environmental Complaints

7.3.1 No environmental related complaints, notification of summons and successful prosecution were received in the reporting month. Cumulative statistics on environmental complaint is provided in **Appendix F.**

7.4 Summary of Environmental Summon and Successful Prosecutions

7.4.1 No environmental related prosecution or notification of summons was received in the reporting month. Cumulative statistics on notification of summons and successful prosecutions is provided in **Appendix F**.

8 FUTURE KEY ISSUES

8.1 Construction Programme for the Next Three Months

8.1.1 The major construction works in January 2026 is provided in **Table 8.1**.

8.1.2 All construction works of Contract No. HY/2014/07 Central Kowloon Route – Kai Tak West (FEP-01/457/2013/C) are substantially completed in September 2025. The proposal of termination of the EM&A Programme under FEP-01/457/2013/C was submitted on 28 November 2025.

8.1.3 EPD has approved the submission of the proposal for termination of EM&A programme for construction stage of the captioned Project covered under the EP No. FEP-01/457/2013/C issued on 23 December 2025. This Monthly EM&A Report (December 2025) would be the last Monthly EM&A Report of Contract No. HY/2014/07.

Table 8.1 Construction Activities in the coming month

Locations	Site Activities
Kai Tak	- Defect rectification works at depressed road;
Ma Tau Kok	- Defect rectification works at Public Transport Interchange
Kowloon Bay	- Nil.

8.2 Key Issues for the Coming Month

8.2.1 Potential environmental impacts arising from the above construction activities are mainly associated with construction dust, construction noise, and waste management.

8.3 Monitoring Schedule for the Coming Month

8.3.1 EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) and construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025.

9 CONCLUSIONS AND RECOMMENDATIONS

9.1 Conclusions

9.1.1 The EM&A monitoring, including both construction dust monitoring (monitoring station E-A14a) and construction noise monitoring (monitoring station E-N12a and E-N21a) will be conducted by Contract No. HY/2023/08 Central Kowloon Route – Remaining Works under EP-457/2013/D from 1 October 2025. Details of the corresponding monitoring parameters, equipment, methodology, monitoring schedule wind data, results and the established Action and Limit Levels could be referred to Sections 3 of the corresponding Monthly EM&A Report for Contract No. HY/2023/08.

9.1.2 No exceedance of Action and Limit level of noise was recorded in the reporting month.

9.1.3 4 nos. of environmental site inspections were carried out in December 2025. Recommendations on remedial actions were given by ET and IEC to the Contractor for the deficiencies identified during the site audit.

9.1.4 No environmental related complaints, notification of summons and successful prosecution were received in the reporting month.

9.1.5 No environmental related notification of summons and successful prosecution were received in the reporting month.

9.1.6 All construction works of Contract No. HY/2014/07 Central Kowloon Route – Kai Tak West (FEP-01/457/2013/C) are substantially completed in September 2025. The proposal of termination of the EM&A Programme under FEP-01/457/2013/C was submitted on 28 November 2025.

9.1.7 EPD has approved the submission of the proposal for termination of EM&A programme for construction stage of the captioned Project covered under the EP No. FEP-01/457/2013/C issued on 23 December 2025. This Monthly EM&A Report (December 2025) would be the last Monthly EM&A Report of Contract No. HY/2014/07.

9.2 Recommendations

9.2.1 According to the environmental site inspections performed in the reporting month, the following recommendations were provided:

Air Quality Impact

- The contractor was reminded to provide sandbags at the boundary of breaking area, to prevent surface runoff by watering at MTK site.

Construction Noise Impact

- No specific observation was identified in the reporting month.

Water Quality Impact

- No specific observation was identified in the reporting month.

Chemical and Waste Management

- The contractor was reminded to provide sandbag to prevent the soil and concrete into the drainages.

Landscape & Visual Impact

- No specific observation was identified in the reporting month.

Permits/licenses

- No specific observation was identified in the reporting month.

FIGURES

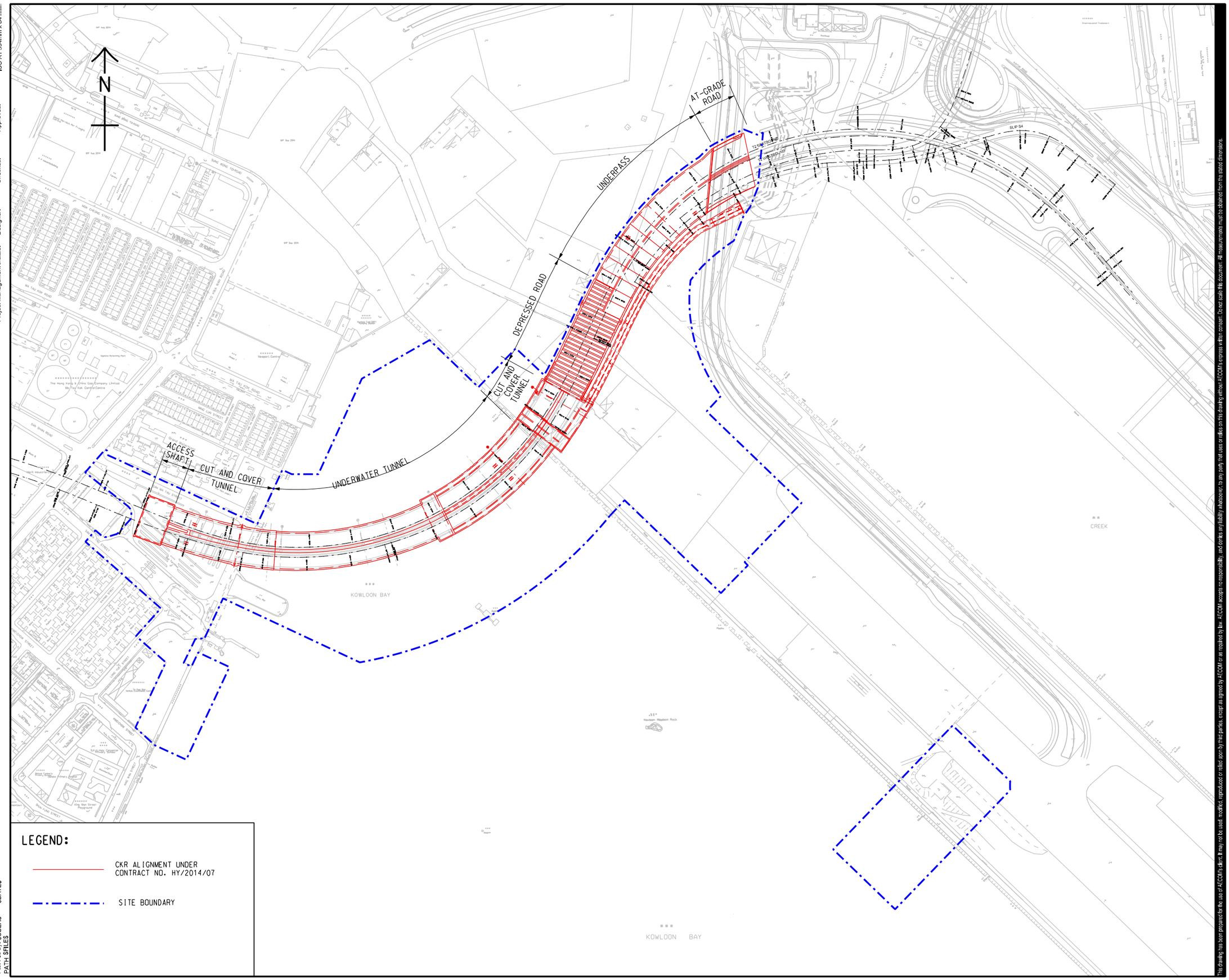
ISO A1 594mm x 841mm

Approved:

Checked:

Designer:

Project Management Initials:



LEGEND:

CKR ALIGNMENT UNDER CONTRACT NO. HY/2014/07

SITE BOUNDARY

Plot File by: $USER$
PATH $FILE$

$DATE$

AECOM

PROJECT

CONTRACT NO.
HY/2014/07
CENTRAL KOWLOON ROUTE -
KAI TAK WEST

CLIENT

GAMMON CONSTRUCTION LIMITED

CONSULTANT

AECOM Asia Company Ltd.
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ISSUE/REVISION

I/R	DATE	DESCRIPTION	CHK.

STATUS

SCALE

A3 1 : 4000

DIMENSION UNIT

METRES

KEY PLAN

PROJECT NO.

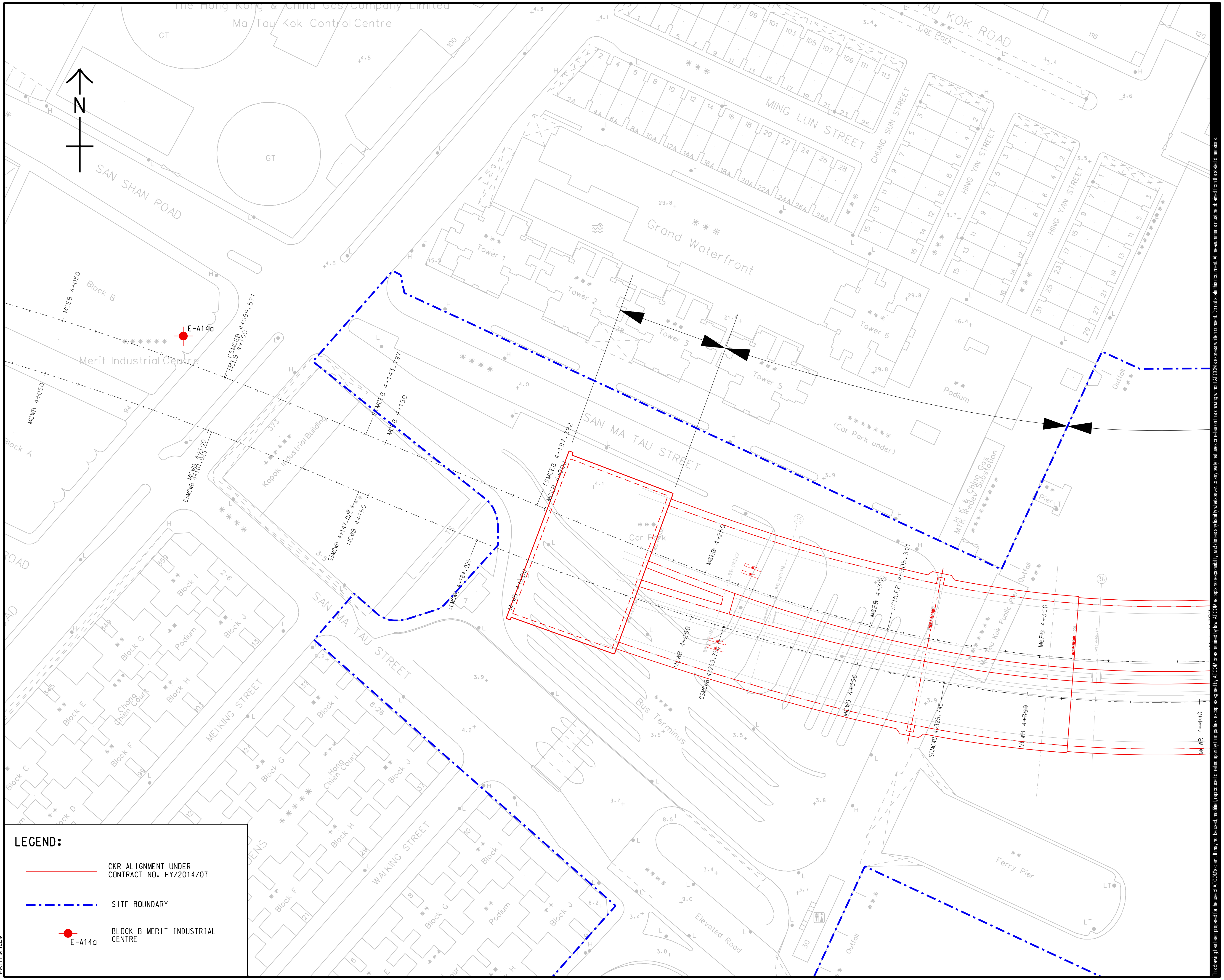
AGREEMENT NO.

SHEET TITLE

SITE LAYOUT PLAN

SHEET NUMBER

FIGURE 1.1



N
SAN SHAN ROAD
Ma Tau Kok Control Centre
Merit Industrial Centre
Block B
Block A
E-A14a
Kapok Industrial Building
Grand Waterfront
Tower 1
Tower 2
Tower 3
Tower 5
Tower 6
MING LUN STREET
CHUNG SUN STREET
HING YIN STREET
HING YUNG STREET
MA TAU KOK ROAD
SAN MA TAU STREET
MEI KING STREET
WALKING STREET
Chong Chien Court
Hong Chien Court
Car Park
(Car Park under)
Podium
Bus Terminus
Ferry Pier
Elevated Road
Outfall
Ma Tau Kok Public Pier
MCEB 4+050
MCWB 4+050
CSMCEB 4+099.571
MCEB 4+100
MCWB 4+100
CSMCWB 4+101.025
MCEB 4+143.797
MCWB 4+150
SSMCWB 4+147.025
MCWB 4+150
TSMCEB 4+197.392
SCMCWB 4+184.025
MCEB 4+250
MCWB 4+250
CSMCWB 4+259.750
MCEB 4+300
SCMCEB 4+305.31
MCWB 4+300
MCEB 4+350
MCWB 4+350
SCMCWB 4+325.745
MCWB 4+400
LEGEND:
CKR ALIGNMENT UNDER CONTRACT NO. HY/2014/07
SITE BOUNDARY
E-A14a BLOCK B MERIT INDUSTRIAL CENTRE

AECOM

PROJECT

CONTRACT NO. HY/2014/07 CENTRAL KOWLOON ROUTE - KAI TAK WEST

CLIENT

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ISSUE/REVISION

I/R	DATE	DESCRIPTION	CHK.

STATUS

SCALE A3 1 : 1000

DIMENSION UNIT METRES

KEY PLAN

PROJECT NO.

AGREEMENT NO.

SHEET TITLE

LOCATION OF AIR QUALITY MONITORING STATION

SHEET NUMBER

FIGURE 3.1

ISO A1 594mm x 841mm
Approved:
Checked:
Designer:
Project Management Initials:
Plot File by: $USERS PATH $FILES $DATES

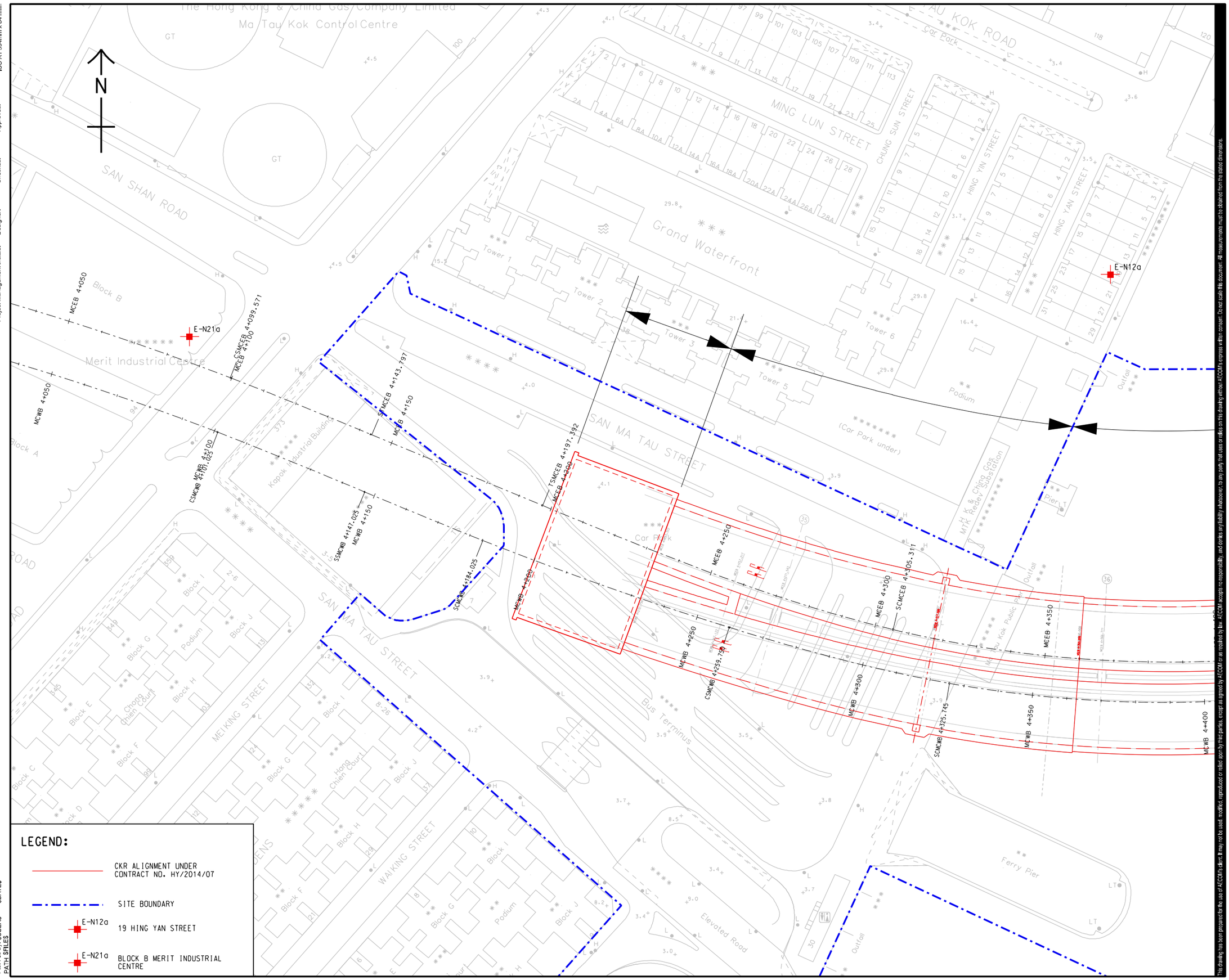
ISO A1 594mm x 841mm

Approved:

Checked:

Designer:

Project Management Initials:



LEGEND:

- CKR ALIGNMENT UNDER CONTRACT NO. HY/2014/07
- SITE BOUNDARY
- E-N12a — 19 HING YAN STREET
- E-N21a — BLOCK B MERIT INDUSTRIAL CENTRE

Plot file by: $USER$
PATH: $FILE$
$DATE$

AECOM

PROJECT

CONTRACT NO. HY/2014/07
CENTRAL KOWLOON ROUTE - KAI TAK WEST

CLIENT

GAMMON CONSTRUCTION LIMITED

CONSULTANT

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ISSUE/REVISION

I/R	DATE	DESCRIPTION	CHK.

STATUS

SCALE A3 1 : 1000

DIMENSION UNIT METRES

KEY PLAN

PROJECT NO.

AGREEMENT NO.

SHEET TITLE

LOCATION OF NOISE MONITORING STATION

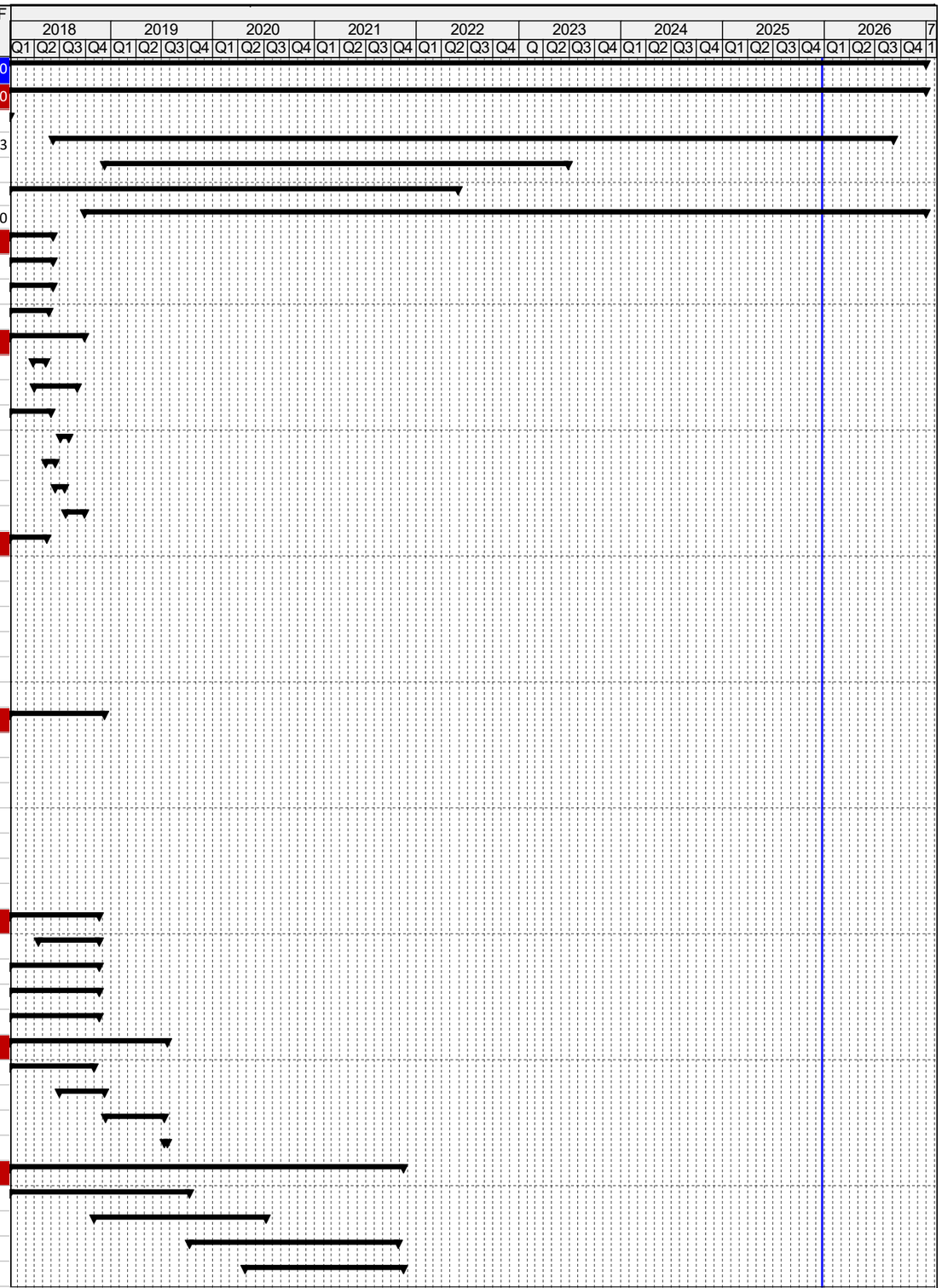
SHEET NUMBER

FIGURE 3.2

APPENDIX A

Construction Programme

ID	Activity	Duration	Start	Finish	TF
Kai Tak West Works Programme - Recovery Programme - with CNP - 25/12/25 - MPR		3290	29-Dec-17 A	31-Dec-26	0
CONTRACT DATES		3290	29-Dec-17 A	31-Dec-26	0
Commencement of the Works		7	29-Dec-17 A	05-Jan-18 A	
Key Dates		3014	06-Jun-18 A	06-Sep-26	-413
Critical Dates (For Indication Only)		1689	08-Dec-18 A	27-Jun-23 A	
Site Possession		1693	05-Jan-18 A	30-May-22 A	
Site Handover		3012	29-Sep-18 A	31-Dec-26	0
All Landside and Marine Side Geotechnical Investigation (KD4A)		153	05-Jan-18 A	06-Jun-18 A	
Marine		122	05-Jan-18 A	06-Jun-18 A	
Mau Tau Kok Side		153	05-Jan-18 A	06-Jun-18 A	
Kai Tak Side		112	05-Jan-18 A	25-May-18 A	
Demolition of Landside Structures of KCFP and Carpark Reprovisioning (KD01)		268	05-Jan-18 A	29-Sep-18 A	
TTM Stage 1		43	29-Mar-18 A	10-May-18 A	
Works After Portion 1B Possession		154	02-Apr-18 A	03-Sep-18 A	
Preparation Works Prior to Portion 1B Possession		118	05-Jan-18 A	01-Jun-18 A	
Watermain Diversion		24	05-Jul-18 A	01-Aug-18 A	
TTM Stage 2		37	11-May-18 A	16-Jun-18 A	
TTM Stage 3		32	17-Jun-18 A	20-Jul-18 A	
TTM Stage 4		71	21-Jul-18 A	29-Sep-18 A	
Trees Felling and Protection in Portion 1B (San Ma Tau St) (KD12)		133	05-Jan-18 A	17-May-18 A	
12-1010	Prepare & Submit Trees Proposal	36	05-Jan-18 A	15-Feb-18 A	
12-1011	Approval for Trees Proposal	23	16-Feb-18 A	17-Mar-18 A	
12-1012	Preparation Works	31	18-Mar-18 A	27-Apr-18 A	
12-1020	Tree Felling, T483-T485, T532-T533 (5 no)	16	28-Apr-18 A	17-May-18 A	
12-1030	Tree Protection, T486	10	06-May-18 A	17-May-18 A	
12-1040	KD 12	0		17-May-18 A	
Vertical Wall in Portion 3B CH 4759-CH 5085 (KD7A)		338	05-Jan-18 A	08-Dec-18 A	
7A-1010	Submission	61	05-Jan-18 A	20-Mar-18 A	
7A-1013	Approval	18	21-Mar-18 A	14-Apr-18 A	
7A-1016	Preparation Works	6	16-Apr-18 A	21-Apr-18 A	
7A-1020	Pipe Piles along North Wall (372 no, 2P/D), 4WF	186	23-Apr-18 A	03-Dec-18 A	
7A-1030	Type IV Sheetpile (52mx32.5m, 25m2/D), 1WF	39	03-Apr-18 A	20-May-18 A	
7A-1040	Demobilisation	17	20-Nov-18 A	08-Dec-18 A	
7A-1070	KD 7A	0		08-Dec-18 A	
Dumping Permit, Barging Point, Structural Assessment of Marine Side KCFP (KD4B)		319	05-Jan-18 A	19-Nov-18 A	
Operational Proposal for Ferry Services		180	16-Apr-18 A	19-Nov-18 A	
Dumping Permit		259	05-Jan-18 A	19-Nov-18 A	
Structural Assessment of KCFP		259	05-Jan-18 A	19-Nov-18 A	
Barging Point		319	05-Jan-18 A	19-Nov-18 A	
Ventilation Adit at Eastern Interface CH 5015-5082 (KD4C)		566	05-Jan-18 A	24-Jul-19 A	
Piling		243	05-Jan-18 A	31-Oct-18 A	
ELS		164	01-Jul-18 A	11-Dec-18 A	
Adit Structure (6 Bays) - 1 Work Front		167	12-Dec-18 A	10-Jul-19 A	
Backfilling		14	11-Jul-19 A	24-Jul-19 A	
Depressed Rd, Underpass, KT C&C at Kai Tak Side (KD7B)		1462	05-Jan-18 A	15-Nov-21 A	
Piling		645	05-Jan-18 A	11-Oct-19 A	
ELS		618	01-Nov-18 A	11-Jul-20 A	
Underpass Structure CH 4890-5085 (19 Bays)		794	10-Oct-19 A	29-Oct-21 A	
Depressed Road Structure CH 4759-CH 4890 (10 Bays)		545	28-Apr-20 A	15-Nov-21 A	

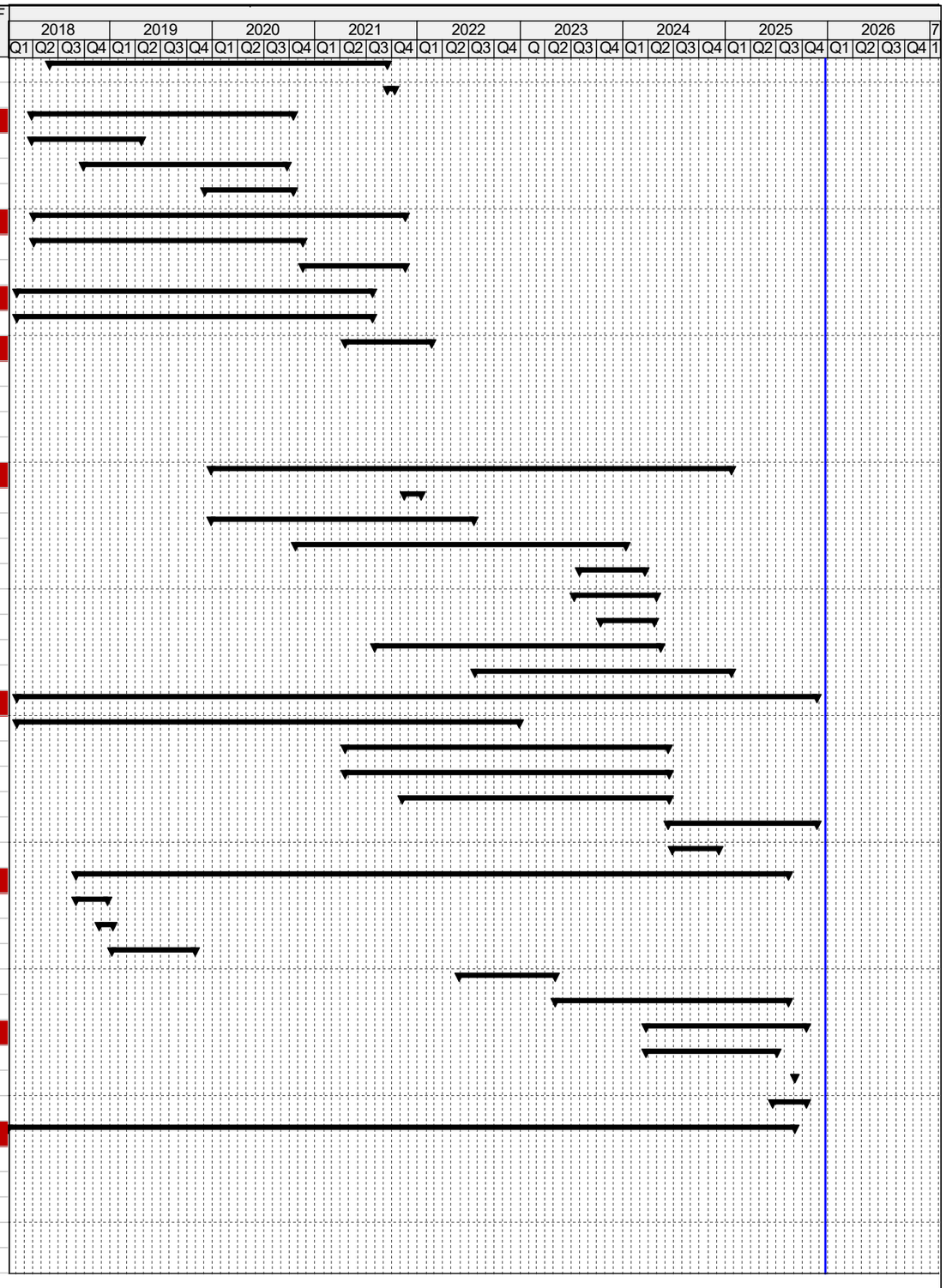


Summary

CONTRACT NO. HY2014/07
CENTRAL KOWLOON ROUTE - KAI TAK WEST
EXECUTIVE SUMMARY PROGRAMME - DEC 2025

Date Date : 25-Dec-25

ID	Activity	Duration	Start	Finish	TF
	Kai Tak Cut & Cover Tunnel - 60m (KD7B)	1294	01-Jun-18 A	15-Sep-21 A	
	Remaining Work for KD7B	33	16-Sep-21 A	11-Oct-21 A	
	Cofferdam 2.1 - Access Shaft (KD03)	951	29-Mar-18 A	15-Oct-20 A	
	Piling	315	29-Mar-18 A	24-Apr-19 A	
	ELS	727	27-Sep-18 A	22-Sep-20 A	
	Access Shaft (33m)	334	06-Dec-19 A	15-Oct-20 A	
	Landing Steps and Covered Walkway at Ma Tau Kok Side (KD02 & KD10)	1332	03-Apr-18 A	19-Nov-21 A	
	Landing Steps and Covered Walkway	784	03-Apr-18 A	20-Nov-20 A	
	Establishment Works	370	20-Nov-20 A	19-Nov-21 A	
	Cofferdam 1.2 - Marine Tunnel Stage 1 (159m) + Kai Tak C&C Tunnel (60m)	1311	05-Feb-18 A	24-Jul-21 A	
	Stage 1 Marine Tunnel (159m) - KD05	1311	05-Feb-18 A	24-Jul-21 A	
	Remaining Works for KD05	120	18-Apr-21 A	19-Feb-22 A	
05-2645	Remove S1, S2 and ELS	99	18-Apr-21 A	08-Sep-21 A	
05-2655	Remove temporary reclamation and seawall reconstruction	99	05-Sep-21 A	19-Feb-22 A	
05-2657	Reinstatement of the remaining seabed within Portion 2A1	4	18-Apr-21 A	19-Feb-22 A	
05-2660	Completion of Outstanding Works for KD 05	0		19-Feb-22 A	
	Cofferdam 2.2 - Ma Tau Kok C&C Tunnel (95m) (KD6A)	1856	27-Dec-19 A	24-Jan-25 A	
	Preparation Works	30	14-Nov-21 A	15-Jan-22 A	
	Piling	905	27-Dec-19 A	21-Jul-22 A	
	ELS	1209	24-Oct-20 A	13-Jan-24 A	
	Tunnel Structure - Bays MTK-C-B1 to B2 - 1st Work Front	139	01-Aug-23 A	21-Mar-24 A	
	Tunnel Structure - Bays MTK-C-B5 to B3 - 2rd Work Front	252	13-Jul-23 A	03-May-24 A	
	Tunnel Structure - Bays MTK-C-B8 to B6 - 3rd Work Front	145	14-Oct-23 A	24-Apr-24 A	
	Roadwork Inside Tunnel CH 4233-5122	942	01-Aug-21 A	16-May-24 A	
	Remaining Works for KD6A	884	25-Jul-22 A	24-Jan-25 A	
	Cofferdam 2.3 - Marine Tunnel Stage 2 (212m) (KD06)	2850	05-Feb-18 A	24-Nov-25 A	
	Preparation Works (not under KD06)	1703	05-Feb-18 A	30-Dec-22 A	
	Section 5,6 - Non-Modular Strut	937	18-Apr-21 A	11-Jun-24 A	
	Section 7,8,9 - Modular Strut	1067	18-Apr-21 A	17-Jun-24 A	
	Section 10 - Modular Strut (Navigation)	943	09-Nov-21 A	17-Jun-24 A	
	Remaining Works for KD06	398	13-Jun-24 A	24-Nov-25 A	
	Bioremediation Treatment at To Kwa Wan Typoon Shelter	232	26-Jun-24 A	09-Dec-24 A	
	U Trough Structures and At-Grade Road Area (KD07)	2550	01-Sep-18 A	15-Aug-25 A	
	Piling	115	01-Sep-18 A	24-Dec-18 A	
	ELS	39	26-Nov-18 A	12-Jan-19 A	
	U Trough Structure (7 Bays) - 1 Work Front - Stage 1	242	07-Jan-19 A	31-Oct-19 A	
	Remaining Works after Completion of Works by D3	280	30-May-22 A	05-May-23 A	
	Remaining Works for KD07	683	06-May-23 A	15-Aug-25 A	
	Kowloon City Ferry Pier Public Transport Interchange Reinstatement (KD09)	549	25-Mar-24 A	18-Oct-25 A	
	Backfilling for Ma Tau Kok C&C Tunnel	463	25-Mar-24 A	05-Jul-25 A	
	Key Date Achievement	0	06-Sep-25 A	06-Sep-25 A	
	Remaining Works for KD09	103	20-Jun-25 A	18-Oct-25 A	
	Preservation and Protection of Trees (KD13)	2820	05-Jan-18 A	06-Sep-25 A	
13-1010	Trees Survey	49	05-Jan-18 A	06-Mar-18 A	
13-1011	Prepare & Submit Proposal	19	07-Mar-18 A	28-Mar-18 A	
13-1012	Approval of Proposal	22	29-Mar-18 A	27-Apr-18 A	
13-1020	Implement measures for Trees Protection	1834	28-Apr-18 A	06-Sep-25 A	
13-1021	Implement measures for Trees Preservation	1834	28-Apr-18 A	06-Sep-25 A	

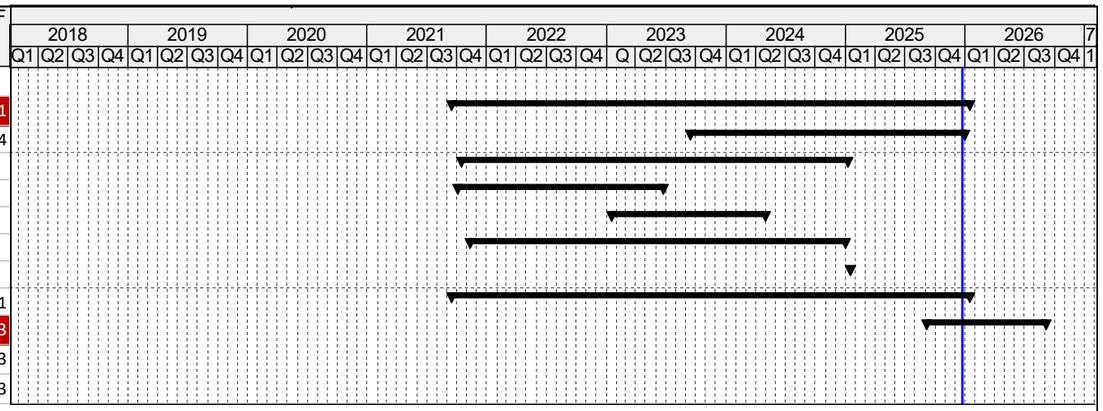


Summary

CONTRACT NO. HY2014/07
CENTRAL KOWLOON ROUTE - KAI TAK WEST
EXECUTIVE SUMMARY PROGRAMME - DEC 2025

Date Date : 25-Dec-25

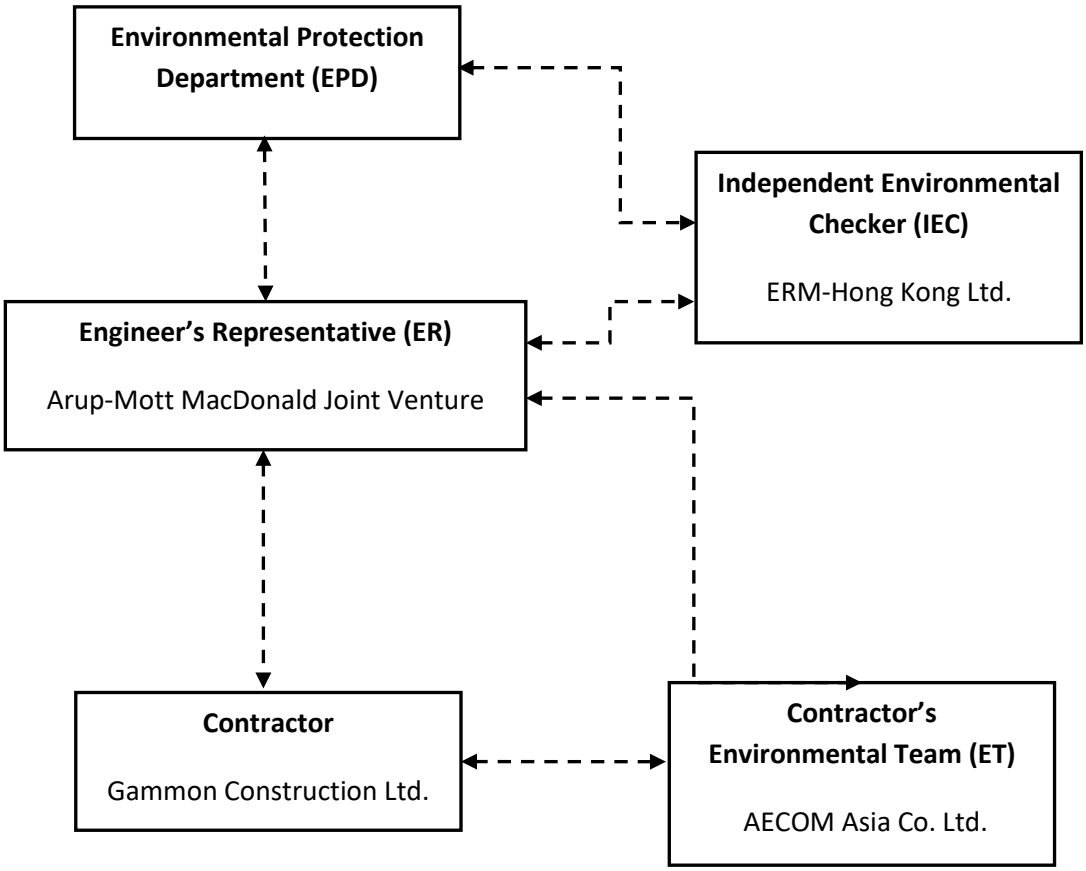
ID	Activity	Duration	Start	Finish	TF
13-1030	KD 13	0		06-Sep-25 A	
All Remaining Works and Roadwork for Opening to the Public (KD08)		1522	16-Sep-21 A	14-Jan-26	-161
Promenade Construction		855	15-Sep-23 A	31-Dec-25	-164
Backfilling for Depressed Road and Underpass		941	15-Oct-21 A	09-Jan-25 A	
Backfill for Kai Tak C&C Tunnel		637	04-Oct-21 A	23-Jun-23 A	
Backfilling for At-grade Road		72	17-Jan-23 A	30-Apr-24 A	
Other Works		1058	10-Nov-21 A	31-Dec-24 A	
Key Date Achievement		0	17-Jan-25 A	17-Jan-25 A	
Remaining Works for KD08		1055	16-Sep-21 A	14-Jan-26	-161
Establishment Works (KD11)		409	07-Sep-25 A	06-Sep-26	-413
11-1010	Establishment Works (Except in Portion 1E) Period	365	07-Sep-25 A	06-Sep-26	-413
11-1020	KD 11	0		06-Sep-26	-413



APPENDIX B

Project Organization Structure

Appendix B Project Organization Structure



APPENDIX C

Implementation Schedule of Environmental Mitigation Measures

Appendix C – Environmental Mitigation Implementation Schedule

	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Air Quality (Construction Phase)							
S4.3.10	D1	The contractor shall follow the procedures and requirements given in the Air Pollution Control (Construction Dust) Regulation	Minimize dust impact at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	V
S4.3.10	D2	● Mitigation measures in form of regular watering under a good site practice should be adopted. Watering once per hour on exposed worksites and haul road should be conducted to achieve dust removal efficiencies of 91.7%. While the above watering frequencies are to be followed, the extent of watering may vary depending on actual site conditions but should be sufficient to maintain an equivalent intensity of no less than 1.3 L/m^2 to achieve the dust removal efficiency.	Minimize dust impact at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	V
S4.3.10	D3	● Proper watering of exposed spoil should be undertaken throughout the construction phase: ● Any excavated or stockpile of dusty material should be covered entirely by impervious sheeting or sprayed with water to maintain the entire surface wet and then removed or backfilled or reinstated where practicable within 24 hours of the excavation or unloading; ● Any dusty materials remaining after a stockpile is removed should be wetted with water and cleared from the surface of roads; ● A stockpile of dusty material should not be extend beyond the pedestrian barriers, fencing or traffic cones. ● The load of dusty materials on a vehicle leaving a construction site should be covered entirely by impervious sheeting to ensure that the dusty materials do not leak from the vehicle; ● Where practicable, vehicle washing facilities with high pressure water jet should be provided at every discernible or designated vehicle exit point. The area where vehicle washing takes place and the road section between the washing facilities and the exit	Minimize dust impact at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	V V V V V V

	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		point should be paved with concrete, bituminous materials or hardcores; ● When there are open excavation and reinstatement works, hoarding of not less than 2.4m high should be provided and properly maintained as far as practicable along the site boundary with provision for public crossing; Good site practice shall also be adopted by the Contractor to ensure the conditions of the hoardings are properly maintained throughout the construction period; ● The portion of any road leading only to construction site that is within 30m of a vehicle entrance or exit should be kept clear of dusty materials; ● Surfaces where any pneumatic or power-driven drilling, cutting, polishing or other mechanical breaking operation takes place should be sprayed with water or a dust suppression chemical continuously; ● Any area that involves demolition activities should be sprayed with water or a dust suppression chemical immediately prior to, during and immediately after the activities so as to maintain the entire surface wet; ● Where a scaffolding is erected around the perimeter of a building under construction, effective dust screens, sheeting or netting should be provided to enclose the scaffolding from the ground floor level of the building, or a canopy should be provided from the first floor level up to the highest level of the scaffolding; ● Any skip hoist for material transport should be totally enclosed by impervious sheeting; ● Every stock of more than 20 bags of cement or dry pulverised fuel ash (PFA) should be covered entirely by impervious sheeting or placed in an area sheltered on the top and the 3 sides; ● Cement or dry PFA delivered in bulk should be stored in a closed silo fitted with an audible high level alarm which is interlocked with the material filling line and no overfilling is allowed; ● Loading, unloading, transfer, handling or storage of bulk cement or dry PFA should be carried out in a totally enclosed system or facility, and any vent or exhaust should be fitted with an effective fabric filter or equivalent air pollution control system; and ● Exposed earth should be properly treated by compaction, turfing, hydroseeding, vegetation planting or sealing with latex, vinyl, bitumen, shotcrete or other suitable surface stabiliser within six months after the last construction activity on the construction site or part of the construction site where the exposed earth lies.					V V V V V V V V V V

	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
S4.3.10	D5	Implement regular dust monitoring under EM&A programme during the construction stage.	Monitoring of dust impact	Contractor	Selected representative dust monitoring station	Construction stage	@
Construction Noise (Airborne)							
S5.4.1	N1	Implement the following good site practices: ● only well-maintained plant should be operated on-site and plant should be serviced regularly during the construction programme; ● machines and plant (such as trucks, cranes) that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum; ● plant known to emit noise strongly in one direction, where possible, be orientated so that the noise is directed away from nearby NSRs; ● silencers or mufflers on construction equipment should be properly fitted and maintained during the construction works; ● mobile plant should be sited as far away from NSRs as possible and practicable; ● material stockpiles, mobile container site office and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	Control construction airborne noise	Contractor	All construction sites	Construction stage	V V V V V V
S5.4.1	N2	Install temporary hoarding located on the site boundaries between noisy construction activities and NSRs. The conditions of the hoardings shall be properly maintained throughout the construction period.	Reduce the construction noise levels at low-level zone of NSRs through partial screening.	Contractor	All construction sites	Construction stage	V
S5.4.1	N3	Install movable noise barriers (typical design is wooden framed barrier with a small-cantilevered on a skid footing with 25mm thick internal sound absorptive lining), acoustic mat or full enclosure, screen the noisy plants including air compressors, generators and handheld breakers etc..	Screen the noisy plant items to be used at all construction sites	Contractor	All construction sites where practicable	Construction stage	V
S5.4.1	N4	Use “Quiet plants”	Reduce the noise levels of plant items	Contractor	All construction sites where practicable	Construction stage	V
S5.4.1	N5	Loading/unloading activities should be carried out inside the full enclosure of mucking out	Reduce the noise	Contractor	Mucking out	Construction	V

	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		points	levels of loading/unloading activities		locations	stage	
S5.4.1	N6	Sequencing operation of construction plants where practicable.	Operate sequentially within the same work site to reduce the construction airborne noise	Contractor	All construction sites where practicable	Construction stage	V
S5.4.1	N7	Implement a noise monitoring under EM&A programme.	Monitor the construction noise levels at the selected representative locations	Contractor	Selected representative noise monitoring station	Construction stage	V
S5.5.2	N8	Install temporary noise barriers along the works area at temporary Kowloon City Ferry Pier Public Transport Interchange	Reduce temporary PTI noise	Contractor	Kowloon City Ferry Pier	Different construction stages	V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Water Quality (Construction Phase)							
S6.9.1.1	W1	In accordance with the Practice Note for Professional Persons on Construction Site Drainage, Environmental Protection Department, 1994 (ProPECC PN1/94), construction phase mitigation measures shall include the following: *Construction Runoff* ● At the start of site establishment (including the barging facilities), perimeter cut-off drains to direct off-site water around the site should be constructed with internal drainage works and erosion and sedimentation control facilities implemented. Channels (both temporary and permanent drainage pipes and culverts), earth bunds or sand bag barriers should be provided on site to direct stormwater to silt removal facilities. The design of the temporary on-site drainage system will be undertaken by the contractor prior to the commencement of construction. ● The dikes or embankments for flood protection should be implemented around the boundaries of earthwork areas. Temporary ditches should be provided to facilitate the runoff discharge into an appropriate watercourse, through a site/sediment trap. The sediment/silt traps should be incorporated in the permanent drainage channels to enhance deposition rates. ● The design of efficient silt removal facilities should be based on the guidelines in Appendix A1 of ProPECC PN 1/94, which states that the retention time for silt/sand traps should be 5 minutes under maximum flow conditions. Sizes may vary depending upon the flow rate, but for a flow rate of 0.1 m^3/s a sedimentation basin of 30m^3 would be required and for a flow rate of 0.5 m^3/s the basin would be 150 m^3. The detailed design of the sand/silt traps shall be undertaken by the contractor prior to the commencement of construction. ● All exposed earth areas should be completed and vegetated as soon as possible after earthworks have been completed, or alternatively, within 14 days of the cessation of earthworks where practicable. Exposed slope surfaces should be covered by tarpaulin or other means. ● The overall slope of the site should be kept to a minimum to reduce the erosive potential of surface water flows, and all traffic areas and access roads protected by coarse stone ballast. An additional advantage accruing from the use of crushed stone is the positive traction gained during prolonged periods of inclement weather	To minimize water quality impact from construction site runoff and general construction activities	Contractor	All construction sites where practicable	Construction stage	V V V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		and the reduction of surface sheet flows.					
		• All drainage facilities and erosion and sediment control structures should be regularly inspected and maintained to ensure proper and efficient operation at all times and particularly following rainstorms. Deposited silt and grit should be removed regularly and disposed of by spreading evenly over stable, vegetated areas.					V
		• Measures should be taken to minimize the ingress of site drainage into excavations. If the excavation of trenches in wet periods is necessary, they should be dug and backfilled in short sections wherever practicable. Water pumped out from trenches or foundation excavations should be discharged into storm drains via silt removal facilities.					V
		• Open stockpiles of construction materials (for example, aggregates, sand and fill material) of more than $50m^3$ should be covered with tarpaulin or similar fabric during rainstorms. Measures should be taken to prevent the washing away of construction materials, soil, silt or debris into any drainage system.					V
		• Manholes (including newly constructed ones) should always be adequately covered and temporarily sealed so as to prevent silt, construction materials or debris being washed into the drainage system and storm runoff being directed into foul sewers.					V
		• Precautions be taken at any time of year when rainstorms are likely, actions to be taken when a rainstorm is imminent or forecasted, and actions to be taken during or after rainstorms are funneling in Appendix A2 of ProPECC PN 1/94. Particular attention should be paid to the control of silty surface runoff during storm events, especially for areas located near steep slopes.					V
		• All vehicles and plant should be cleaned before leaving a construction site to ensure no earth, mud, debris and the like is deposited by them on roads. An adequately designed and sited wheel washing facilities should be provided at every construction site exit where practicable. Wash-water should have sand and silt settled out and removed at least on a weekly basis to ensure the continued efficiency of the process. The section of access road leading to, and exiting from, the wheel-wash bay to the public road should be paved with sufficient backfall toward the wheel-wash bay to prevent vehicle tracking of soil and silty water to public roads and drains.					V
		• Oil interceptors should be provided in the drainage system downstream of any					V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		oil/fuel pollution sources. The oil interceptors should be emptied and cleaned regularly to prevent the release of oil and grease into the storm water drainage system after accidental spillage. A bypass should be provided for the oil interceptors to prevent flushing during heavy rain. ● Construction solid waste, debris and rubbish on site should be collected, handled and disposed of properly to avoid water quality impacts. ● All fuel tanks and storage areas should be provided with locks and sited on sealed areas, within bunds of a capacity equal to 110% of the storage capacity of the largest tank to prevent spilled fuel oils from reaching water sensitive receivers nearby. ● Adopt best management practices. ● All the earth works involving should be conducted sequentially to limit the amount of construction runoff generated from exposed areas during the wet season (April to September) as far as practicable.					V V V V
S6.9.1.2	W2	*Tunnelling Works and Underground Works* ● Cut-&-cover tunneling work should be conducted sequentially to limit the amount of construction runoff generated from exposed areas during the wet season (April to September) as far as practicable. ● Uncontaminated discharge should pass through sedimentation tanks prior to off-site discharge ● The wastewater with a high concentration of SS should be treated (e.g. by sedimentation tanks with sufficient retention time) before discharge. Oil interceptors would also be required to remove the oil, lubricants and grease from the wastewater. ● Direct discharge of the bentonite slurry (as a result of D-wall and bored tunneling construction) is not allowed. It should be reconditioned and reused wherever practicable. Temporary storage locations (typically a properly closed warehouse) should be provided on site for any unused bentonite that needs to be transported away after all the related construction activities are completed. The requirements in ProPECC PN 1/94 should be adhered to in the handling and disposal of bentonite slurries.	To minimize construction water quality impact from tunneling works	Contractor	All tunneling portion	Construction stage	V V V V
S6.9.1.3	W3	*Sewage Effluent* ● Portable chemical toilets and sewage holding tanks are recommended for handling the construction sewage generated by the workforce. A licensed contractor should	To minimize water quality from sewage	Contractor	All construction sites where practicable	Construction stage	V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		be employed to provide appropriate and adequate portable toilets and be responsible for appropriate disposal and maintenance.	effluent				
S6.9.1.5	W4	*Groundwater from Potential Contaminated Area:* ● No direct discharge of groundwater from contaminated areas should be adopted. ● A discharge license under the WPCO through the Regional Office of EPD for groundwater results indicated that the groundwater to be generated from the excavation discharge should be applied. Prior to the excavation works within these potentially contaminated areas, the groundwater quality should be reviewed during the process of discharge license application. The compliance to the Technical Memorandum on Standards for Effluents Discharged into Drainage on Sewerage Systems, Inland and Coastal Waters (TM-DSS) and the existence of prohibited substance should be confirmed. If the review works would be contaminated, the contaminated groundwater should be either properly treated in compliance with the requirements of the TM-DSS or properly recharged into the ground. ● If wastewater treatment is deployed, the wastewater treatment unit shall deploy suitable treatment process (e.g. oil interceptor / activated carbon) to reduce the pollution level to an acceptable standard and remove any prohibited substances (e.g. TPH) to undetectable range. All treated effluent from wastewater treatment plant shall meet the requirements as stated in TM-DSS and should be discharged into the foul sewers. ● If groundwater recharging wells are deployed, recharging wells should be installed as appropriate for recharging the contaminated groundwater back into the ground. The recharging wells should be selected at places where the groundwater quality will not be affected by the recharge operation as indicated in the Section 2.3 of TM-DSS. The baseline groundwater quality shall be determined prior to the selection of the recharge wells, and submit a working plan (including the laboratory analytical results showing the quality of groundwater at the proposed recharge location(s) as well as the pollutant levels of groundwater to be recharged) to EPD for agreement. Pollution levels of groundwater to be recharged shall not be higher than pollutant levels of ambient groundwater at the recharge well. Prior to recharge, any prohibited substances such as TPH products should be removed as necessary by installing the petrol interceptor.	To minimize groundwater quality impact from contaminated area	Contractor	Excavation areas where contamination is found.	Construction stage	V V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
S6.7.2.1	W5	*Temporary Reclamation* ● During temporary reclamation, regular litter / rubbish clearance and avoidance of illegal discharges within the embayed marine water should be undertaken. ● During temporary reclamation, the perimeter silt curtain should be deployed.	To minimize water quality impact from temporary reclamation	Contractor	Temporary Reclamation	Construction stage	V V
S6.9.1.6	W6	*Accidental spillage* In order to prevent accidental spillage of chemicals, the following is recommended: ● All the tanks, containers, storage area should be bunded and the locations should be locked as far as possible from the sensitive watercourse and stormwater drains. ● The Contractor should register as a chemical waste producer if chemical wastes would be generated. Storage of chemical waste arising from the construction activities should be stored with suitable labels and warnings. ● Disposal of chemical wastes should be conducted in compliance with the requirements as stated in the Waste disposal (Chemical Waste) (General) Regulation.	To minimize water quality impact from accidental spillage	Contractor	All construction sites where practicable	Construction stage	V V V
S6.9.2.2	W7	*Dredging Works* The following good practice shall apply for the dredging works: ● Install efficient silt curtains, i.e. at least 75% SS reduction, at the point of seawall dredging to control the dispersion of SS; ● Implement water quality monitoring to ensure effective control of water pollution and recommend additional mitigation measures required; ● The decent speed of grabs should be controlled to minimize the seabed impact and to reduce the volume of over-dredging; ● All vessels should be sized so that adequate clearance is maintained between vessels and the seabed in all tide conditions, to ensure that undue turbidity is not generated by turbulence from vessel movement or propeller wash; ● The dredging rates by closed grab dredgers for temporary marine channel outside pipepile wall shall be less than 1,500 m^3/day and 125 m^3/hour (without concurrent dredging with T2 in dry season only) or 750 m^3/day and 62.5 m^3/hour for other	To minimize sediment suspension during dredging	Contractor	Kai Tak Barging Point during dredging works	Dredging period	N/A N/A N/A N/A N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		conditions respectively. ● Dredging works shall be only for the provision marine channel. No dredging work is required for temporary reclamation; and ● The workfront of temporary reclamation shall be surrounded by cofferdams and the associated excavation and backfilling works for temporary reclamation shall have no contact with seawater.					N/A N/A
S6.9.2.2	W8	● While WSR 2 (Planned Kai Tak Cooling Water Intake). is a planned receiver, the project proponent shall liaise with the project proponent of District Cooling System (DCS) for Kai Tak Development on the implementation programme prior to wet season dredging. In case the DCS would be operated during the dredging period of CKR, additional silt screen to the cooling water intake shall be provided to WSR 2. The following specific mitigation measures shall apply for the dredging works: ● In dry season, the dredging rate shall be less than 1500m^3/day if no concurrent projects. ● In all other scenario, the dredging rate shall be less than 750m^3/day ● Dredging works shall be only for the provision marine channel. No dredging work is required for temporary reclamation. ● The workfront of temporary reclamation shall be surrounded by cofferdams and the associated excavation and backfilling works for temporary reclamation shall have no contact with seawater. ● In case the DCS would be operated during the dredging period of CKR, silt screen shall be provided for WSR2.	To minimize sediment suspension during dredging if the District Cooling System for Kai Tak Development would be operated in the same period	Contractor	Kai Tak Barging Point during dredging works	Dredging period	N/A V V V N/A N/A
S6.9.2	W9	Handling of Dredged Sediment / Barging Operation: ● All barges should be fitted with tight bottom seals to prevent leakage of materials during transport; ● Barges or hoppers should not be filled to a level that will cause overflow of materials or polluted water during loading or transportation; ● All vessels should be sized so that adequate clearance is maintained between vessels and the seabed in all tide conditions, to ensure that undue turbidity is not generated by turbulence from vessel movement or propeller wash; and ● Loading of barges and hoppers should be controlled to prevent splashing of material into the surrounding water.	To minimize and mitigate the water disturbance during dredged sediment handling/barging operation	Contractor	All land- based site and proposed Kwai Chung barging point	Construction stage	N/A V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		• Mitigation measures for land-based activities as outlined above should be applied to minimise water quality impacts from site runoff and open stockpile spoils at the proposed barging facilities where appropriate.					N/A
S6.9	W10	Implement a marine water quality monitoring programme	Monitor marine water quality prior to and during dredging period	Contractor	At identified monitoring location	Prior to and during dredging period	N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Waste Management (Construction Waste)							
S7.4.1	WM1	*On-site sorting of C&D material* ● Geological assessment should be carried out by competent persons on site during excavation to identify materials which are not suitable to use as aggregate in structural concrete (e.g. volcanic rock, Aplite dyke rock, etc). Volcanic rock and Aplite dyke rock should be separated at the source sites as far as practicable and stored at designated stockpile areas preventing them from delivering to crushing facilities. The crushing plant operator should also be reminded to set up measures to prevent unsuitable rock from ended up at concrete batching plants and be turned into concrete for structural use. Details regarding control measures at source site and crushing facilities should be submitted by the Contractors for the Engineer to review and agree. In addition, site records should also be kept for the types of rock materials excavated and the traceability of delivery will be ensured with the implementation of Trip Ticket System and enforced by site supervisory staff as stipulated under DEVB TC(W) No. 6/2010 for tracking of the correct delivery to the rock crushing facilities for processing into aggregates. Alternative disposal option for the reuse of volcanic rock and Aplite Dyke rock, etc should also be explored.	Separation of unsuitable rock from ending up at concrete batching plants and be turned into concrete for structural use	Contractor	All construction sites	Construction stage	V
S7.5.1	WM2	*Construction and Demolition Material* ● Maintain temporary stockpiles and reuse excavated fill material for backfilling and reinstatement; ● Carry out on-site sorting; ● Make provisions in the Contract documents to allow and promote the use of recycled aggregates where appropriate; ● Adopt 'Selective Demolition' technique to demolish the existing structures and facilities with a view to recovering broken concrete effectively for recycling purpose, where possible; ● Implement a trip-ticket system for each works contract to ensure that the disposal of C&D materials are properly documented and verified; and ● Implement an enhanced Waste Management Plan similar to ETWBTC (Works) No. 19/2005 – "Environmental Management on Construction Sites" to encourage on-site sorting of C&D materials and to minimize their generation during the course of construction.	Good site practice to minimize the waste generation and recycle the C&D materials as far as practicable so as to reduce the amount for final disposal	Contractor	All construction sites	Construction stage	V V V V V V
S7.5.1	WM3	*C&D Waste* ● Standard formwork or pre-fabrication should be used as far as practicable in order to	Good site practice to minimize the waste	Contractor	All construction	Construction stage	V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		minimise the arising of C&D materials. The use of more durable formwork or plastic facing for the construction works should be considered. Use of wooden hoardings should not be used, as in other projects. Metal hoarding should be used to enhance the possibility of recycling. The purchasing of construction materials will be carefully planned in order to avoid over ordering and wastage. ● The Contractor should recycle as much of the C&D materials as possible on-site. Public fill and C&D waste should be segregated and stored in different containers or skips to enhance reuse or recycling of materials and their proper disposal. Where practicable, concrete and masonry can be crushed and used as fill. Steel reinforcement bar can be used by scrap steel mills. Different areas of the sites should be considered for such segregation and storage.	generation and recycle the C&D materials as far as practicable so as to reduce the amount for final disposal		sites		V
S7.5.1	WM5	*Land-based and Marine-based Sediment* ● All construction plant and equipment shall be designed and maintained to minimize the risk of silt, sediments, contaminants or other pollutants being released into the water column or deposited in the locations other than designated location; ● All vessels shall be sized such that adequate draft is maintained between vessels and the sea bed at all states of the tide to ensure that undue turbidity is not generated by turbulence from vessel movement or propeller wash; ● Before moving the vessels which are used for transporting dredged material, excess material shall be cleaned from the decks and exposed fittings of vessels and the excess materials shall never be dumped into the sea except at the approved locations; ● Adequate freeboard shall be maintained on barges to ensure that decks are not washed by wave action. ● The Contractors shall monitor all vessels transporting material to ensure that no dumping outside the approved location takes place. The Contractor shall keep and produce logs and other records to demonstrate compliance and that journeys are consistent with designated locations and copies of such records shall be submitted to the engineers; ● The Contractors shall comply with the conditions in the dumping licence. ● All bottom dumping vessels (Hopper barges) shall be fitted with tight fittings seals to their bottom openings to prevent leakage of material; ● The material shall be placed into the disposal pit by bottom dumping; ● Contaminated marine mud shall be transported by spit barge of not less than 750m^3 capacity and capable of rapid opening and discharge at the disposal site;	To control pollution due to marine sediment	Contractor	Along CKR alignment	Construction Stage	N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		● Discharge shall be undertaken rapidly and the hoppers shall be closed immediately. Material adhering to the sides of the hopper shall not be washed out of the hopper and the hopper shall remain closed until the barge returns to the disposal site. ● For Type 3 special disposal treatment, sealing of contaminant with geosynthetic containment before dropping into designated mud pit would be a possible arrangement. A geosynthetic containment method is a method whereby the sediments are sealed in geosynthetic containers and, the containers would be dropped into the designated contaminated mud pit where they would be covered by further mud disposal and later by the mud pit capping at the disposal site, thereby fulfilling the requirements for fully confined mud disposal.					
S7.5.1	WM6	*Chemical Waste* ● Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in accordance with the Code of Practice on the Packaging, Labelling and Storage of Chemical Wastes. ● Containers used for the storage of chemical wastes should be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed; have a capacity of less than 450 liters unless the specification has been approved by the EPD; and display a label in English and Chinese in accordance with instructions prescribed in Schedule 2 of the regulation. ● The storage area for chemical wastes should be clearly labelled and used solely for the storage of chemical waste; enclosed on at least 3 sides; have an impermeable floor and bunding of sufficient capacity to accommodate 110% of the volume of the largest container or 20 % of the total volume of waste stored in that area, whichever is the greatest; have adequate ventilation; covered to prevent rainfall entering; and arranged so that incompatible materials are adequately separated. ● Disposal of chemical waste should be via a licensed waste collector; be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Centre which also offers a chemical waste collection service and can supply the necessary storage containers; or be to a reuser of the waste, under approval from the EPD.	Control the chemical waste and ensure proper storage, handling and disposal.	Contractor	All construction sites	Construction stage	V V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
S7.5.1	WM7	*General Refuse* ● General refuse generated on-site should be stored in enclosed bins or compaction units separately from construction and chemical wastes. ● A reputable waste collector should be employed by the Contractor to remove general refuse from the site, separately from construction and chemical wastes, on a daily basis to minimize odour, pest and litter impacts. Burning of refuse on construction sites is prohibited by law. ● Aluminium cans are often recovered from the waste stream by individual collectors if they are segregated and made easily accessible. Separate labelled bins for their deposit should be provided if feasible. ● Office wastes can be reduced through the recycling of paper if volumes are large enough to warrant collection. Participation in a local collection scheme should be considered by the Contractor.	Minimize production of the general refuse and avoid odour, pest and litter impacts	Contractor	All construction sites	Construction stage	V V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Land Contamination							
S8.10, S8.12 & Appendix 8.4	LC1	Land contamination investigation works (including field works and laboratory testing at the Kowloon City Ferry Pier Public Transport Interchange (KCFP-PTI) and the To Kwa Wan Vehicle Examination Centre (TKW-VEC) were carried out from 14 April 2018 to 2 January 2019. In order to minimise the potentially adverse environmental impacts arising from the handling of potentially contaminated materials, the following environmental mitigation measures are proposed during the course of soil excavation, stockpiling and backfilling works: ● Excavation profiles must be properly designed and executed. ● Stockpiling site(s) shall be lined with impermeable sheeting and bunded. Stockpiles shall be fully covered by impermeable sheeting to reduce dust emission. ● Excavation and stockpiling should be carried out during dry season as far as possible to minimise potentially contaminated runoffs from the Concerned Soil. ● The truck transferring Concerned Soil shall be covered entirely by impervious sheeting to ensure that the dusty materials do not leak from the truck. ● Temporary fencing or warning ribbons will be provided to the boundary of excavation, slope crest and temporarily stockpiled areas. Where necessary, the exposed areas should be temporarily covered with impermeable sheeting during heavy rainstorm.	Minimize the potentially adverse environmental impacts arising from the handling of potentially contaminated materials	Contractor	EBH1, EBH2 and EBH3	Commencement of construction works at the Kowloon City Ferry Pier Public Transport Interchange (PTI) (for EBH1 & EBH2) and the works area adjacent to the To Kwa Wan Vehicle Examination Centre (for EBH3)	V V V V V

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Landscape & Visual							
S10.10.1 Table 10.11	LV3	● Good Site Management Large temporary stockpiles of excavated material shall be covered with unobtrusive sheeting to prevent dust and dirt spreading to adjacent landscape areas and vegetation, and to create a neat and tidy visual appearance. Construction plant and building material shall be orderly and carefully stored in order to create a neat and tidy visual appearance.	Minimize visual impact	Contractor	Within Project Site	Construction Phase	V
S10.10.1 Table 10.11	LV4	● Screen Hoarding Decorative screen hoarding should be erected to screen the public from the construction area. It should be designed to be compatible with the existing urban context.	Minimize visual impact	Contractor	Within Project Site	Construction Phase	V
S10.10.1 Table 10.11	LV5	● Lighting Control during Construction All lighting in the construction site shall be carefully controlled to minimize light pollution and night-time glare to nearby residencies and GIC. The contractor shall consider other security measures, which shall minimize the visual impacts.	Minimize visual impact	Contractor	Within Project Site	Construction Phase	V
S10.10.1 Table 10.11	LV6	● Erosion Control The potential for soil erosion shall be reduced by minimizing the extent of vegetation disturbance on site and by providing a protective cover over newly exposed soil.	Minimize landscape impact	Contractor	Within Project Site	Construction Phase	V
S10.10.1 Table 10.11	LV7	● Tree Protection & Preservation Carefully protected during construction. Tree protection measures will be detailed at the Tree Removal Application stage and plans submitted to the relevant Government Department for approval in due course in accordance with ETWB TC no. 3/2006.	Minimize landscape and visual impact	Contractor	Within Project Site	Design and Construction Phase	V
S10.10.1 Table 10.11	LV9	● Compensatory Planting For trees unavoidably affected by the Project that have to be removed, where practical transplantation will be chosen as the top priority method of removal but if this is not possible or practical compensatory planting will be provided for trees unavoidably felled. All felled trees shall be compensated for by planting trees to the satisfaction of relevant Government departments. Required numbers and locations of compensatory trees shall be determined and agreed separately with Government during the Tree Felling Application process under ETWBTC 3/2006. Compensatory tree planting may be incorporated into public open spaces and along roadside amenity areas affected by the construction works and therefore be part of the bigger wider planting plans. Onsite compensation planting is preferred but if necessary,	Minimize landscape and visual impact	Contractor	Within Project Site and designated off-site locations	Construction Phase	N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		additional receptor sites outside the Works Area shall be agreed separately with Government during the Tree Felling Application process.					
S10.10.1 Table 10.11	LV10	● Screen Planting Tall screen/buffer trees, shrubs and climbers should be planted, in so far as is possible, to soften and screen proposed structures such as roads and central strip, vertical edges and buildings and to enhance streetscape greening effect where appropriate. Indiscriminate use of trees for screening must be avoided and the principle of 'right tree for the right place' must be followed. This detail will be provided at the Detailed Design stage. This measure may additionally form part of the compensatory planting and will improve and create a pleasant pedestrian environment.	Minimize visual impact and also enhance landscape.	Contractor	Within Project Site	Construction Phase	N/A
S10.10.1 Table 10.11	LV11	● Green Roof Roof greening will be established on ventilation and administration buildings to reduce exposure to untreated concrete surfaces and particularly mitigate visual impact to VSRs at high levels.	Minimize landscape and visual impact	Contractor	Within Project Site	Construction Phase	N/A
S10.10.1 Table 10.11	LV12	● Reinstatement All works areas, excavated areas and disturbed areas for tunnel construction and temporary road diversion or any other proposed works shall be reinstated to former conditions or better, with reasonable landscape treatment and to the satisfaction of the relevant Government departments. (Specific mitigation for disturbance to public open space is detailed separately under LV14)	Minimize landscape impact	Contractor	Within Project Site	Construction Phase	N/A
S10.10.1 Table 10.11	LV14	● Landscape enhancement Implement a comprehensive landscape plan to maximize the greening opportunity and create a unique landscape for the project to blend in with the surrounding, including in re-provisioned areas. In particular: - landscape enhancement of re-provisioned Public Transport Interchange; - landscape deck on tunnel portals; - viaduct planters for trailer planting; - vertical greening of piers and walls with climbers or trailer planting; - roadside planting i.e. planting along central dividers and on road islands e.g. in the middle of roundabouts. (Roadside planting i.e. at the road edge and not in the central divider or road island, and vertical greening may be considered part of Screen Planting). - Purpose-built maintenance access without temporary traffic arrangement must be	Minimize landscape and visual impact	Contractor	Along tunnel alignment	Construction phase	N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
		provided and detailed design of landscape decks and planting, including details of maintenance access locations, will be sent to maintenance and management parties for endorsement and ensures these mitigation measures are feasible.					

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
Cultural Heritage Impact (Construction and Operational Phase)							
S11.4.4	CH1	● The contractor should be alerted during the construction on the possibility of locating archaeological remains and as a precautionary measure, AMO shall be informed immediately in case of discovery of antiquities or supposed antiquities in the subject sites.	To preserve any cultural heritage items which may be removed and damaged by the excavation.	Contractor	During construction works for cut and cover tunnels	During the construction phase	N/A
S11.6 para 3	CH2	● The dredging contractor should be alerted during the construction on the possibility of locating archaeological remains, such as cannon and AMO shall be informed immediately in case of discovery of antiquities or supposed antiquities in the subject areas.	To preserve any cultural heritage items which may be removed and damaged by the dredging.	Contractor	During construction of underwater tunnel (north of To Kwa Wan Typhoon Shelter)	During the construction phase	N/A
S12.6.1, Table 12.2	CH8	● A monitoring system for settlement, vibration and tilting will be determined and implemented pending determination of the future grading. A monitoring proposal will be submitted to AMO before commencement of work if a historic building grade is accorded.	Protect the structure from damage from construction works	Contractor	Kowloon City Ferry Pier (CKR-13)	During the construction phase	N/A
S12.6.1, Table 12.2	CH9	● No mitigation is required at present. If the public pier is granted Grade 1, Grade 2 or Grade 3 status, the mitigation will be revised to adhere to the requirements for protective measures for Graded Historic Buildings	To be determined	Contractor	Ma Tau Kok Public Pier (CKR-16)	During the construction phase	N/A
S12.6.1, Table 12.2	CH10	● A monitoring system for settlement, vibration and tilting will be determined and implemented pending determination of the future grading. A monitoring proposal will be submitted to AMO before commencement of work if a historic building grade is accorded.	Protect the structure from damage from construction works	Contractor	The Kowloon City Vehicular Ferry Pier (CKR-17)	During the construction phase	N/A

EIA Ref.	EM&A Log Ref	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concern to Address	Who to implement the measures?	Location of the measure	When to implement the measures?	Implementation Status
EM&A Project							
S13.2	EM1	An Independent Environmental Checker needs to be employed as per the EM&A Manual.	Control EM&A Performance	Highways Department	All construction sites	Construction stage	V
S13.2 –13.4	EM2	1) An Environmental Team needs to be employed as per the EM&A Manual. 2) Prepare a systematic Environmental Management Plan to ensure effective implementation of the mitigation measures. 3) An environmental impact monitoring needs to be implementing by the Environmental Team to ensure all the requirements given in the EM&A Manual are fully complied with.	Perform environmental monitoring & auditing	Highways Department / Contractor	All construction sites	Construction stage	V V V

Legends:

V = implemented;

X = not implemented;

@ = partially implemented;

N/A = not applicable

APPENDIX D

Summary of Action and Limit Levels

Appendix D – Summary of Action and Limit Levels

Table 1 Action and Limit Levels for 24-hour TSP

ID	Location	Action Level	Limit Level
E-A14a	Block B of Merit Industrial Centre	197.3 $\mu g/m^3$	260 $\mu g/m^3$

Table 2 Action and Limit Levels for 1-hour TSP

ID	Location	Action Level	Limit Level
E-A14a	Block B of Merit Industrial Centre	302.4 $\mu g/m^3$	500 $\mu g/m^3$

Table 3 Action and Limit Levels for Construction Noise (0700 – 1900 hrs of normal weekdays)

ID	Location	Action Level	Limit Level
E-N12a	19 Hing Yan Street	When one documented complaint is received	75 dB(A)
E-N21a	Block B of Merit Industrial Centre	When one documented complaint is received	75 dB(A)

Table 4 Derived Action and Limit Levels for Water Quality

Parameters	Action Level	Limit Level
Dissolved Oxygen (DO) in mg/L(1)	Surface & Middle: **4.03** (5th percentile of baseline data for surface and middle layer) Bottom: **3.94** (5th percentile of baseline data for bottom layer)	Surface & Middle: **3.88** (1st percentile of baseline data for surface and middle layer) Bottom: **2.00**
Suspended Solids (SS) in mg/L(2)	**13.80** (95th percentile of baseline data) or 120% of upstream control station's SS at the same tide of the same day	**18.70** (99th percentile of baseline data) or 130% of upstream control station's SS at the same tide of the same day
Turbidity in NTU(2)	**7.00** (95th percentile of baseline data) or 120% of upstream control station's Turbidity at the same tide of the same day	**8.40** (99th percentile of baseline data or 130% of upstream control station's Turbidity at the same tide of the same day
Copper in µg/L(2)	**2.00** (95th percentile of baseline data) or 120% of upstream control station's nutrient level at the same tide of the same day	**3.00** (99th percentile of baseline data) or 130% of upstream control station's nutrient level at the same tide of the same day or whichever is the less
Total PAH in µg/L(2)	**1.60** (95th percentile of baseline data) or 120% of upstream control station's nutrient level at the same tide of the same day	**1.60** (99th percentile of baseline data) or 130% of upstream control station's nutrient level at the same tide of the same day or whichever is the less

Note: 1. For DO, non-compliance of the water quality limits occurs when monitoring result is lower than the limits.

2. For turbidity, SS, Copper and Total PAH, non-compliance of the water quality limits occurs when monitoring result is higher than the limits.

APPENDIX E

Event and Action Plan

Appendix E Event Action Plan

Event / Action Plan for Construction Dust Monitoring

EVENT	ACTION			
	ET	**IEC**	**ER**	**Contractor**
ACTION LEVEL				
Exceedance for one sample	1. Inform the Contractor, IEC and ER; 2. Discuss with the Contractor and IEC on the remedial measures required; 3. Repeat measurement to confirm findings; 4. Increase monitoring frequency	1. Check monitoring data submitted by the ET; 2. Check Contractor's working method; 3. Review and advise the ET and ER on the effectiveness of the proposed remedial measures.	1. Confirm receipt of notification of exceedance in writing.	1. Identify source(s), investigate the causes of exceedance and propose remedial measures; 2. Implement remedial measures; 3. Amend working methods agreed with the ER as appropriate.
Exceedance for two or more consecutive samples	1. Inform the Contractor, IEC and ER; 2. Discuss with the ER, IEC and Contractor on the remedial measures required; 3. Repeat measurements to confirm findings; 4. Increase monitoring frequency to daily; 5. If exceedance continues, arrange meeting with the IEC, ER and Contractor; 6. If exceedance stops, cease additional monitoring.	1. Check monitoring data submitted by the ET; 2. Check Contractor's working method; 3. Review and advise the ET and ER on the effectiveness of the proposed remedial measures.	1. Confirm receipt of notification of exceedance in writing; 2. Review and agree on the remedial measures proposed by the Contractor; 3. Supervise Implementation of remedial measures.	1. Identify source and investigate the causes of exceedance; 2. Submit proposals for remedial measures to the ER with a copy to ET and IEC within three working days of notification; 3. Implement the agreed proposals; 4. Amend proposal as appropriate.

Appendix E Event Action Plan

EVENT	ACTION			
	ET	**IEC**	**ER**	**Contractor**
LIMIT LEVEL				
Exceedance for one sample	1. Inform the Contractor, IEC, EPD and ER; 2. Repeat measurement to confirm findings; 3. Increase monitoring frequency to daily; 4. Discuss with the ER, IEC and contractor on the remedial measures and assess the effectiveness.	1. Check monitoring data submitted by the ET; 2. Check the Contractor's working method; 3. Discuss with the ET, ER and Contractor on possible remedial measures; 4. Review and advise the ER and ET on the effectiveness of Contractor's remedial measures.	1. Confirm receipt of notification of exceedance in writing; 2. Review and agree on the remedial measures proposed by the Contractor; 3. Supervise implementation of remedial measures.	1. Identify source(s) and investigate the causes of exceedance; 2. Take immediate action to avoid further exceedance; 3. Submit proposals for remedial measures to ER with a copy to ET and IEC within three working days of notification; 4. Implement the agreed proposals; 5. Amend proposal if appropriate.
Exceedance for two or more consecutive samples	1. Notify Contractor, IEC, EPD and ER ; 2. Repeat measurement to confirm findings; 3. Increase monitoring frequency to daily; 4. Carry out analysis of the Contractor's working procedures with the ER to determine possible mitigation to be implemented; 5. Arrange meeting with the IEC and ER to discuss the remedial measures to be taken; 6. Review the effectiveness of the Contractor's remedial measures and keep IEC, EPD and ER informed of the results; 7. If exceedance stops, cease additional monitoring.	1. Check monitoring data submitted by the ET; 2. Check the Contractor's working method; 3. Discuss with ET, ER, and Contractor on the potential remedial measures; 4. Review and advise the ER and ET on the effectiveness of Contractor's remedial measures.	1. Confirm receipt of notification of exceedance in writing; 2. In consultation with the ET and IEC, agree with the Contractor on the remedial measures to be implemented; 3. Supervise the implementation of remedial measures; 4. If exceedance continues, consider what portion of the work is responsible and instruct the Contractor to stop that portion of work until the exceedance is abated.	1. Identify source(s) and investigate the causes of exceedance; 2. Take immediate action to avoid further exceedance; 3. Submit proposals for remedial measures to the ER with a copy to the IEC and ET within three working days of notification; 4. Implement the agreed proposals; 5. Revise and resubmit proposals if problem still not under control; 6. Stop the relevant portion of works as determined by the ER until the exceedance is abated.

Appendix E Event Action Plan

Event and Action Plan for Construction Noise Monitoring

EVENT	ACTION			
	ET	IEC	ER	Contractor
Exceedance of Action Level	1. Notify the Contractor, IEC and ER; 2. Discuss with the ER, IEC and Contractor on the remedial measures required; and 3. Increase monitoring frequency to check mitigation effectiveness.	1. Review the investigation results submitted by the contractor; and 2. Review and advise the ET and ER on the effectiveness of the remedial measures proposed by the Contractor.	1. Confirm receipt of notification of complaint in writing; 2. Review and agree on the remedial measures proposed by the Contractor; and 3. Supervise implementation of remedial measures.	1. Investigate the complaint and propose remedial measures; 2. Report the results of investigation to the IEC, ET and ER; 3. Submit noise mitigation proposals to the ER with copy to the IEC and ET within 3 working days of notification; and 4. Implement noise mitigation proposals.
Exceedance of Limit Level	1. Notify the Contractor, IEC, EPD and ER ; 2. Repeat measurement to confirm findings; 3. Increase monitoring frequency; 4. Carry out analysis of Contractor's working procedures to determine possible mitigation to be implemented; 5. Arrange meeting with the IEC and ER to discuss the remedial measures to be taken; 6. Inform IEC, ER and EPD the causes and actions taken for the exceedances; 7. Review the effectiveness of Contractor's remedial measures and keep IEC, EPD and ER informed of the results; and 8. If exceedance stops, cease additional monitoring.	1. Check monitoring data submitted by the ET; 2. Check the Contractor's working method; 3. Discuss with the ER, ET and Contractor on the potential remedial measures; and 4. Review and advise the ET and ER on the effectiveness of the remedial measures proposed by the Contractor.	1. Confirm receipt of notification of exceedance in writing; 2. In consultation with the ET and IEC, agree with the Contractor on the remedial measures to be implemented; 3. Supervise the implementation of remedial measures; and 4. If exceedance continues, consider what portion of the work is responsible and instruct the Contractor to stop that portion of work until the exceedance is abated.	1. Identify source and investigate the causes of exceedance; 2. Take immediate action to avoid further exceedance; 3. Submit proposals for remedial measures to the ER with copy to the IEC and ET within 3 working days of notification; 4. Implement the agreed proposals; 5. Revise and resubmit proposals if problem still not under control; and 6. Stop the relevant portion of works as determined by the ER until the exceedance is abated.

Appendix E Event Action Plan

Event and Action Plan for Continuous Noise Monitoring

EVENT	ACTION			
	ET	**IEC**	**ER**	**CONTRACTOR**
Action/Limit Level	1. Identify source ; 2. Repeat measurement. If two consecutive measurements exceed Action/Limit Level, the exceedance is then confirmed; 3. If exceedance is confirmed, notify IEC, ER and Contractor; 4. Investigate the cause of exceedance and ckeck Contractor's working procedures to determine possible mitigation to be implemented; 5. Discuss jointly with the IEC, ER and Contractor and formulate remedial measures; and 6. Assess effectiveness of Contractor's remedial actions and keep IEC and ER informed of the results.	1. Check monitoring data submitted by the Works Contract 1123 ET; 2. Check the Contractor's working method; 3. Discuss with the ER, Works Contract 1123 ET and Contractor on the potential remedial measures; and 4. Review and advise the Works Contract 1123 ET and ER on the effectiveness of the remedial measures proposed by the Contractor.	1. Confirm receipt of notification of exceedance in writing; 2. In consultation with the Works Contract 1123 ET and IEC, agree with the Contractor on the remedial measures to be implemented; 3. Ensure the proper implementation of remedial measures; and 4. If exceedance continues, consider what portion of the work is responsible and instruct the Contractor to stop that portion of work until the exceedance is abated.	1. Identify source with the Works Contract 1123 ET; 2. If exceedance is confirmed, investigation the cause of exceedance and take immediate action to avoid further exceedance; 3. Submit proposals for remedial measures to the ER with copy to the IEC and ET of notification; 4. Implement the agreed proposals; 5. Liaise with ER to optimize the effectiveness of the agreed mitigation; 6. Revise and resubmit proposals if problem still not under control; and 7. Stop the relevant portion of works as determined by the ER until the exceedance is abated.

APPENDIX F

Cumulative Statistics on Complaints, Notification of Summons and Successful Prosecutions

Appendix F

Cumulative Statistics on Complaints, Notification of Summons and Successful Prosecutions

	Date received	Subject	Status	Total no. received in this month	Total no. received since project commencement
Environmental complaints	--	--	--	0	80
Notification of summons	--	--	--	0	0
Successful prosecutions	--	--	--	0	0

APPENDIX G

Monthly Summary Waste Flow Table

Contract No. : HY/2014/07 Central Kowloon Route - Kai Tak West
Gammon Construction Limited

Monthly Summary Waste Flow Table for 2025 (Year)

Month	Actual Quantities of Inert C&D Materials Generated Monthly (Note 1)												Actual Quantities of Non-inert C&D Materials (i.e. C&D Wastes) Generated Monthly					Actual Quantities of Contaminated Soil Monthly		Actual Quantities of Land-based Sediment Monthly		Actual Quantities of Marine-based sediment Monthly		
	Generated					Disposed				Reused			Recycled			Disposed		Reused	Reused	Disposed		Disposed		
	Fill Material	Artificial Material			Total Quantity Generated	Disposed as Public Fills at TKO137	Disposed as Public Fills at TM38	Disposed as Capping at East Sha Chau (Alluvium)	Total Quantity Disposal	Reused in the Contract	Reused in Other Projects	Total Quantity Reused	Metals	Paper/ cardboard packaging (Note 3)	Plastics	Chemical Waste	General Refuse (Note 2)	Reused in the Contract	Reused in the Contract	Disposed at Designated Site		Disposed at Designated Site		
	Soil and Rock	Broken Concrete	Asphalt	Building Derbis															Type 1 (Cat. L)	Type 1 (Cat. M_p)	Type 2 (Cat. M_f, Cat. H)	Type 1 (Cat. L, Cat. M_p)	Type 2 (Cat. M_f, Cat. H, Cat. H_p)	Type 3 (Cat. H_f)
Unit	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000Kg)	('000Kg)	('000Kg)	('000kg)	('000Kg)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)	('000m^3)
Jan	0.266	0.000	0.000	0.000	0.266	0.000	0.000	0.000	0.000	0.000	0.266	0.266	1083.070	0.000	0.000	0.000	138.110	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Feb	0.705	0.000	0.000	0.000	0.705	0.535	0.000	0.000	0.535	0.170	0.000	0.170	1157.430	0.368	2.855	0.000	108.820	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Mar	13.330	0.000	0.000	0.000	13.330	0.127	10.960	0.000	11.087	2.243	0.000	2.243	1680.400	0.307	1.980	0.000	93.680	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Apr	14.507	0.000	0.000	0.000	14.507	0.000	14.507	0.000	14.507	0.000	0.000	0.000	1129.930	0.000	0.000	0.000	78.820	0.000	0.000	0.000	0.000	0.000	0.000	0.000
May	12.782	0.000	0.000	0.000	12.782	0.000	12.782	0.000	12.782	0.000	0.000	0.000	1355.680	0.000	0.000	0.000	63.700	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Jun	6.706	0.000	0.000	0.000	6.706	0.108	6.598	0.000	6.706	0.000	0.000	0.000	1023.680	0.000	0.000	0.000	46.030	0.000	0.000	0.000	0.000	0.000	0.000	0.000
SUB-TOTAL	48.297	0.000	0.000	0.000	48.297	0.769	44.848	0.000	45.617	2.414	0.266	2.679	7430.190	0.675	4.835	0.000	529.160	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Jul	4.055	0.000	0.000	0.000	4.055	0.090	3.965	0.000	4.055	0.000	0.000	0.000	845.670	0.175	0.000	0.000	124.120	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Aug	3.485	0.000	0.000	0.000	3.485	0.844	2.641	0.000	3.485	0.000	0.000	0.000	717.910	0.000	0.000	0.000	31.720	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Sep	12.143	0.000	0.000	0.000	12.143	12.143	0.000	0.000	12.143	0.000	0.000	0.000	361.950	0.000	3.795	0.000	87.980	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Oct	2.783	0.580	0.000	0.000	3.363	3.363	0.000	0.000	3.363	0.000	0.000	0.000	0.000	0.107	0.000	0.000	92.290	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Nov	0.029	0.154	0.000	0.000	0.183	0.183	0.000	0.000	0.183	0.000	0.000	0.000	0.000	0.000	0.000	0.000	67.650	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Dec	0.004	0.023	0.000	0.000	0.027	0.027	0.000	0.000	0.027	0.000	0.000	0.000	0.000	0.000	0.000	0.000	40.760	0.000	0.000	0.000	0.000	0.000	0.000	0.000
TOTAL	70.795	0.757	0.000	0.000	71.552	17.419	51.454	0.000	68.873	2.414	0.266	2.679	9355.720	0.957	8.630	0.000	973.680	0.000	0.000	0.000	0.000	0.000	0.000	0.000

Note:

1. Assume the density of fill is 2 ton/m3.
2. Refuse disposed to NENT landfill.
3. The latest update shall prevail.

Central Kowloon Route
Remaining Works
Contract No. HY/2023/08

路政署
HIGHWAYS DEPARTMENT
主要工程管理處
MAJOR WORKS PROJECT MANAGEMENT OFFICE

ERM

Environmental Permit No. EP-457/2013/D

Central Kowloon Route

Independent Environmental Checker Verification

Works Contract:	**Remaining Works (HY/2023/08)**

Reference Document/Plan

Document/~~Plan~~ to be ~~Certified~~/ Verified:	Monthly EM&A Report No.14 (Kai Tak Phase 2B Landscaped Deck)
Date of Report:	08 January 2026
Date received by IEC:	08 January 2026

Reference EP Condition

Environmental Permit Condition: 3.4

Submission of Monthly EM&A Report of the Project

3.4 Four hard copies and one electronic copy of monthly EM&A Report shall be submitted to the Director within 2 weeks after the end of each reporting month throughout the entire construction period. The EM&A Reports shall include a summary of all non-compliance. The submissions shall be certified by the ET Leader and verified by the IEC as complying with the requirements as set out in the EM&A Manual before submission to the Director. Additional copies of the submission shall be provided to the Director upon request by the Director.

IEC Verification

I hereby verify that the above referenced document/~~plan~~ complies with the above referenced condition of EP-457/2013/D.

Ms Mandy To Date: 9 January 2026

Independent Environmental Checker

Our ref: 0436942_IEC Verification Cert_RMW_Monthly EM&A Rpt No.14(KT)_20260109.docx

Contract No.: HY/2023/08 Central Kowloon Route – Remaining Works

Monthly Environmental Monitoring and Audit – Kai Tak Phase 2B Landscaped Deck – Report No. 14 (Period from 1st to 31st December 2025)

Build King – Tung Lee Joint Venture

Reference: P528199

Revision: 0

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Approval			
Author signature		Approver signature	
Name	Kisten Ma	Name	F.C. Tsang
Title	Senior Consultant	Title	Environmental Team Leader

Contents

Appendices

Executive Summary

1.1.1 Build King - Tung Lee Joint Venture ("Contractor") commenced the construction works of Highway Department (HyD) Central Kowloon Route Contract No. HY/2023/08 – Central Kowloon Route – Remaining Works at Kai Tak West Area ("The Project") on 11 November 2024. This is the 14th monthly Environmental Monitoring and Audit (EM&A) report presenting the EM&A works carried out in the Kai Tak West Area during the period from 1 December 2025 to 31 December 2025.

1.1.2 A summary of major construction activities informed by the Contractor for the Project during the reporting period is presented below.

Construction Activities Undertaken in Kai Tak West Area
• Finishes (floor & wall) installation at Kai Tak Phase 2B Landscaped Deck • Staircase construction at Kai Tak Phase 2B Landscaped Deck

Environmental Monitoring and Audit Works

1.1.3 Regular construction air quality monitoring (24-hour TSP and 1-hour TSP) and noise monitoring activities in the reporting month is summarised in below:

- Construction Air Quality Monitoring (24-hour TSP and 1-hour TSP x 3 times)
  - At Monitoring Station E-A14a on 4, 10, 16, 22 and 27 December 2025
- Construction Noise Monitoring during normal working hours
  - At Monitoring Station E-N12a and EN-21a on 4, 10, 16, 22 and 27 December 2025

1.1.4 Joint weekly site inspections were conducted by representatives of the Environmental team (ET), the Contractor and the Engineer on 3, 12, 19 and 24 December 2025. A joint site inspection with the Independent Environmental Checker (IEC) was undertaken on 12 December 2025. Bi-weekly inspection of the implementation of landscape and visual mitigation measures was conducted by the ET on 3 and 19 December 2025. Details of the audit findings and implementation status are presented in **Section 7**. Details of waste management are presented in **Section 4**.

1.1.5 A summary of the non-compliance (exceedance) during the reporting period is provided below.

- Air quality Monitoring
  - No Action / Limit Level exceedance for 1-hour TSP was recorded.
  - No Action / Limit Level exceedance for 24-hour TSP was recorded.

- Noise Monitoring
  - No Action / Limit Level exceedance for construction noise was recorded.

Complaints, Notification of Summons and Successful Prosecution

1.1.6 No environmental related complaints, notification of summons and successful prosecution were received in the reporting period.

Reporting Changes

1.1.7 There were no reporting changes during the reporting period.

Future Key Issues

1.1.8 A summary of construction activities informed by the Contractor for the next reporting period are listed below:

Construction Activities To be Undertaken in Kai Tak West Area
• Finishes (floor & wall) installation at Kai Tak Phase 2B Landscaped Deck • Finishes installation on Ramp at Kai Tak Phase 2B Landscaped Deck • E&M works at Kai Tak Phase 2B Landscaped Deck • Staircase Construction at Kai Tak Phase 2B Landscaped Deck

1 Introduction

1.1 Basic Project Information

1.1.1 Central Kowloon Route (CKR) is a 4.7 km long dual 3-lane trunk road in Central Kowloon linking Yau Ma Tei Interchange in West Kowloon with the road network on Kai Tak Development and Kowloon Bay in East Kowloon.

1.1.2 The Central Kowloon Route – Design and Construction Environmental Impact Assessment Report (Register No.: AEIAR-171/2013) was approved with conditions by the Environmental Protection Department (EPD) on 11 July 2013. An Environmental Permit (EP-457/2013) was issued on 9 August 2013. Variations of EP (VEP) was subsequently applied for and the latest EP (EP-457/2013/D) was issued by EPD on 15 June 2021.

1.1.3 The construction of the CKR had been divided into different sections. Contract No. HY/2023/08 – Central Kowloon Route – Remaining Works covers part of the construction activities located at Kai Tak West Area and Yau Ma Tei Area under the EP, including:

- design and construction of landscaping works at Yau Ma Tei Landscaped Deck, Yau Ma Tei Rest Gardens, North Tree Park and Kai Tak Phase 2B Landscaped Deck;
- improvement of a section of Kai Fuk Road of approximately 300 metres in length;
- planting of compensatory trees; and
- associated civil works, electrical and mechanical works, road and drainage works, lighting works and establishment works.

1.1.4 The works site at Kai Tak West Area for the Contract No. HY/2023/08 are shown in **Appendix A**.

1.2 Purpose of the Report

1.2.1 This is the 14th monthly Environmental Monitoring and Audit (EM&A) report presenting the EM&A works carried out for the Project in the Kai Tak West Area during the period from 1 December 2025 to 31 December 2025.

1.3 Construction Activities Undertaken During the Reporting Period

1.3.1 A summary of major construction activities carried out during the reporting period are presented in **Table 1.1**. The construction programme is presented in **Appendix B**.

Table 1.1 Summary of Construction Activities during the Reporting Period

Construction Activities Undertaken in Kai Tak West Area	Progress
• Finishes (floor & wall) at Kai Tak Phase 2B Landscaped Deck	95%
• Staircase Construction at Kai Tak Phase 2B Landscaped Deck	40%

1.4 Project Organisation

1.4.1 The project organization structure is shown in **Appendix C**. The key personnel contact names and numbers for the Project are summarized in **Table 1.2**.

Table 1.2 Contact Information of Key Personnel

Party	Role	Position	Name	Contact No.
Arup – Mott MacDonald Joint Venture	Engineer's Representative ("ER")	Resident Engineer (Environmental)	Ms. Jim Li	9120 1157
ERM – Hong Kong Limited	Independent Environmental Checker ("IEC")	IEC	Ms. Mandy To	2271 3313
Aurecon Hong Kong Limited	Environmental Team ("ET")	ET Leader	Mr. F.C. Tsang	3664 6801
Build King – Tung Lee Joint Venture	Contractor	Environmental Officer	Mr. Tony Tsoi	9689 8956

1.5 Status of Environmental Licences, Notification and Permit

1.5.1 A summary of the valid permits, licences, and/ or notifications on environmental protection for this Project is presented in **Table 1.3**.

Table 1.3 Summary of the Environmental Licence, Notification, Permit and Documentations

Permit/ License/ Notification / Reference No.	Valid Period		Status	Remark
	From	To		
Environmental Permit				
EP-457/2013/D	15 June 2021	--	Valid	--
Wastewater Discharge License				
WT00046473-2025	9 May 2025	End of Project	Valid	--
Notification of Construction Works Under the Air Pollution Control (Construction Dust Regulation)				
10007346	25 July 2024	End of Project	Notified	--
Chemical Waste Producer Registration				
5213-286-B2767-02	19 March 2025	--	Valid	--
Billing Account for Disposal of Construction Waste				
7051793	6 August 2024	--	Valid	--
Y-Park Membership				
C0280	12 August 2024	--	Valid	--
Construction Noise Permit				
GW-RE1157-25	25 September 2025	21 March 2026	Valid	General Activities at Kai Tak Phase 2B Landscaped Deck
Collection of Public Fill at Public Fill Reception Facility				
TKO137-HY/2023/08-02	1 July 2025	31 December 2025	Valid	--

2 Environmental Status

2.1 Environmental Permit (EP) Submission Status

2.1.1 Environmental permit (EP) conditions under the EIAO, submission status under the EP and implementation status of mitigation measures had been reviewed and implemented on schedule. The status of required submissions under the EP (EP-457/2013/D) during the reporting period for the Project are summarised in **Table 2.1**.

Table 2.1 Summary of Status of Required Submission for EP-457/2013/D for the Project

EP Condition (EP–457/2013/D)	Submission	Submission Date
3.4	Monthly EM&A Report – Kai Tak Phase 2B Landscape Deck (November 2025)	12 December 2025

3 Air Quality and Noise Monitoring

3.1 Air Quality

Monitoring Requirements

3.1.1 In accordance with the approved EM&A Manual, measurement of 24-hour and 1-hour Total Suspended Particulates (TSP) level at the designated air quality monitoring station is required. Impact 24-hour TSP monitoring should be carried out for at least once every 6 days, and 1-hour TSP monitoring should be done at least 3 times every 6 days while the highest dust impact is expected.

Monitoring Equipment

3.1.2 24-hour TSP air quality monitoring was performed using High Volume Sampler (HVS) located at the designated monitoring station. The HVS meets all the requirements of the EM&A Manual. A portable direct reading dust meter was used to carry out the 1-hour TSP monitoring.

3.1.3 A summary of the equipment that was deployed for the air quality monitoring is shown in **Table** 3.1.

Table 3.1 Air Quality Monitoring Equipment

Monitoring Parameter	Monitoring Equipment	Serial Number	Date of Calibration
24-hour TSP	High Volume Sampler (Model No. TE-5170X)	1087	28 November 2025
	Calibration Kit (Model No. TE-5025A)	4166	8 May 2025
1-hour TSP	Digital Dust Indicator (Model: Sibata LD-5R)	467361	15 August 2025

Monitoring Locations

3.1.4 The monitoring station for air quality monitoring pertinent to the Project has been identified based on the approved EM&A Manual for the Project. The location of the air quality monitoring station is summarized in **Table 3.2** and shown in **Appendix G**.

Table 3.2 Air Quality Monitoring Station

Location I.D.	Monitoring Station	Description
E-A14a (1)	Block B of Merit Industrial Centre	Rooftop (13/F)

Note:

(1) The air monitoring station proposed in the EM&A Manual (i.e. Wyler Gardens with ID: E-A14) was not available for impact dust monitoring, therefore impact monitoring was conducted at E-A14a as an alternative which was agreed by the ER, IEC and EPD.

Monitoring Methodology and QA/QC

3.1.5 24-hour TSP Monitoring

- The HVS was installed in the vicinity of the air sensitive receivers. The following criteria were considered in the installation of the HVS as far as practicable: -
  - A horizontal platform with appropriate support to secure the sampler against gusty wind was provided.
  - Two samplers should not be placed less than 2m apart from each other.
  - The distance between the HVS and any obstacles, such as buildings, was at least twice the height that the obstacle protrudes above the HVS.
  - A minimum of 2 meters separation from walls, parapets and penthouse for rooftop sampler.
  - A minimum of 2 meters separation from any supporting structure, measured horizontally is required.
  - No furnace or incinerator flues nearby.
  - Airflow around the sampler was unrestricted.
  - The sampler was located more than 20 meters from any dripline.
  - Any wire fence and gate, required to protect the sampler, did not obstruct the monitoring process.
  - Permission was obtained to set up the samplers and access to the monitoring station.
  - A secured supply of electricity was obtained to operate the sampler.
- Preparation of Filter Paper
  - Glass fibre filters, G810 were labelled and sufficient filters that were clean and without pinholes were selected.
  - All filters were equilibrated in the conditioning environment for 24 hours before weighing. The conditioning environment temperature was around 25 °C and not variable by more than ±3 °C; the relative humidity (RH)

was < 50% and not variable by more than ±5%. A convenient working RH was 40%.

- All filter papers were prepared and analysed by Acumen Laboratory and Testing Limited, which is a HOKLAS accredited laboratory and has comprehensive quality assurance and quality control programmes.

- Field Monitoring
  - The power supply was checked to ensure the HVS works properly.
  - The filter holder and the area surrounding the filter were cleaned.
  - The filter holder was removed by loosening the four bolts and a new filter, with stamped number upward, on a supporting screen was aligned carefully.
  - The filter was properly aligned on the screen so that the gasket formed an airtight seal on the outer edges of the filter.
  - The swing bolts were fastened to hold the filter holder down to the frame. The pressure applied was sufficient to avoid air leakage at the edges.
  - Then the shelter lid was closed and was secured with the aluminium strip.
  - The HVS was warmed-up for about 5 minutes to establish run-temperature conditions.
  - A new flow rate record sheet was set into the flow recorder.
  - On site temperature and atmospheric pressure readings were taken and the flow rate of the HVS was checked and adjusted at around 1.3 m3/min, and complied with the range specified in the EM&A Manual (i.e. 0.6-1.7 m3/min).
  - The programmable digital timer was set for a sampling period of 24 hrs, and the starting time, weather condition and the filter number were recorded.
  - The initial elapsed time was recorded.
  - At the end of sampling, on site temperature and atmospheric pressure readings were taken and the final flow rate of the HVS was checked and recorded.
  - The final elapsed time was recorded.
  - The sampled filter was removed carefully and folded in half length so that only surfaces with collected particulate matter were in contact.
  - It was then placed in a clean envelope and sealed.
  - All monitoring information was recorded on a standard data sheet.
  - Filters were then sent to Acumen Laboratory and Testing Limited for analysis.

- Maintenance and Calibration

- The HVS and its accessories were maintained in good working condition, such as replacing motor brushes routinely and checking electrical wiring to ensure a continuous power supply.
- HVSs were calibrated using TE-5025A Calibration Kit upon installation and thereafter at bi-monthly intervals.
- Calibration certificate of the TE-5025A Calibration Kit and the HVSs are provided in **Appendix I**.

- Wind Data Monitoring
  - The wind speed has been recorded from Hong Kong Observatory- King's Park meteorological station, along with portable wind speed meter stand by as back up when the information is not available from HKO.

3.1.6 1-hour TSP Monitoring

- The measuring procedures of the 1-hour dust meter are in accordance with the Manufacturer's Instruction Manual as follows:
  - Turn the power on.
  - Close the air collecting opening cover.
  - Push the "TIME SETTING" switch to [BG]
  - Push "START/STOP" switch to perform background measurement for 6 seconds.
  - Turn the knob at SENSI ADJ position to insert the light scattering plate.
  - Leave the equipment for 1 minute upon "SPAN CHECK" is indicated in the display.
  - Push "START/STOP" switch to perform automatic sensitivity adjustment. This measurement takes 1 minute.
  - Pull out the knob and return it to MEASURE position.
  - Push the "TIME SETTING" switch the time set in the display to 3 hours.
  - Lower down the air collection opening cover.
  - Push "START/STOP" switch to start measurement.
- Maintenance and Calibration
  - The 1-hour TSP meter was calibrated at 1-year intervals against a High Volume Sampler. Calibration certificates of the Laser Dust Monitors are provided in **Appendix I**.

Monitoring Schedule for the Reporting Month

3.1.7 The schedule for impact air quality monitoring in November 2025 is provided in **Appendix H**.

Monitoring Results

3.1.8 The monitoring results for 24-hour TSP and 1-hour TSP are summarized in **Table 3.3** and **Table** 3.4 respectively. Detailed air quality monitoring results and daily extract of meteorological observations are presented in **Appendix J**.

Table 3.3 Summary of 24-hour TSP Monitoring Result in the Reporting Period

Location I.D.	Range ($\mu g/m^3$)	Action Level ($\mu g/m^3$)	Limit Level ($\mu g/m^3$)
E-A14a	43 – 73	197.3	260

Table 3.4 Summary of 1-hour TSP Monitoring Result in the Reporting Period

Location I.D.	Range ($\mu g/m^3$)	Action Level ($\mu g/m^3$)	Limit Level ($\mu g/m^3$)
E-A14a	32 – 72	302.4	500

3.1.9 Major dust sources during the monitoring included construction dust and nearby traffic emission.

Observations

3.1.10 No Action/ Limit Level exceedance was recorded for all 1-hour TSP and 24-hour TSP monitoring at the monitoring location in the reporting period.

3.1.11 The event and action plan are annexed in **Appendix D**.

3.1.12 Site audits were carried out on a weekly basis to monitor and audit the timely implementation of air quality mitigation measures within the site boundaries of this Project. A summary of observation during the site audits is shown in **Table 7.1** of this report.

3.2 Noise

Monitoring Requirements

3.2.1 In accordance with the EM&A Manual, impact noise monitoring should be conducted for at least once a week during the construction phase of the Project. **Table 3.5** summaries the monitoring parameters, frequency and duration of impact noise monitoring.

Table 3.5 Noise Monitoring Parameter, Frequency and Duration

Parameter and Duration	Frequency
30-mins measurement at each monitoring station between 0700 and 1900 on normal weekdays. L_{eq}, L_{10} and L_{90} would be recorded.	At least once per week

Monitoring Equipment

3.2.2 Noise monitoring was performed using sound level meter at each designated monitoring station. The sound level meters deployed comply with the International Electrotechnical Commission Publications (IEC) 651:1979 (Type 1) and 804:1985 (Type 1) specifications. Acoustic calibrator was deployed to check the sound level meters at a known sound pressure level. A summary of equipment is given in **Table 3.6**.

Table 3.6 Summary of Noise Monitoring Equipment

Equipment	Manufacturer and Model	Serial Number	Date of Calibration
Sound Level Meter	NTi XL3	A3A-01229-F0	24 July 2025
Acoustic Calibrator	RION NC-75	34724244	11 July 2025

Monitoring Locations

3.2.3 The monitoring stations for construction noise monitoring pertinent to the Project have been identified based on the approved EM&A Manual for the Project. Locations of the noise monitoring stations are summarized in **Table** 3.7 and shown in **Appendix G**.

Table 3.7 Noise Monitoring Station for Construction Phase

Location I.D.	Monitoring Station	Description	Measurement
E-N12a (1)	19 Hing Yan Street	Rooftop (9/F)	Façade
E-N21a	Block B of Merit Industrial Centre	Rooftop (13/F)	Free-field (2)

Note:

(1) The noise monitoring stations proposed in the EM&A Manual (i.e. Grand Waterfront Tower 3 with ID: E-N12 and Hang Chien Court Block J with ID: E-N21) were not available for impact noise monitoring, therefore impact monitoring was conducted at E-N12a and E-N21a as an alternative which was agreed by the ER, IEC and EPD.

(2) A correction of +3 dB(A) was made to the free-field measurements.

Monitoring Methodology and QA/QC

- Monitoring Procedures
  - The sound level meter was set on a tripod at a height of 1.2 m above the ground.
  - Façade measurement was made at E-N12a.
  - Free field measurements was made at monitoring location E-N21a. A correction of +3 dB(A) shall be made to the free field measurements.
  - The battery condition was checked to ensure the correct functioning of the meter.
  - Parameters such as frequency weighting, the time weighting and the measurement time were set as follows:
    - frequency weighting
    - time weighting: Fast
    - time measurement: $L_{eq(30\text{-}minutes)}$ during non-restricted hours i.e. 0700 – 1900 on normal weekdays.
  - Prior to and after each noise measurement, the meter was calibrated using the acoustic calibrator for 94 dB(A) at 1000 Hz. If the difference in the calibration level before and after measurement was more than 1 dB(A), the measurement would be considered invalid and repeat of noise measurement would be required after re-calibration or repair of the equipment.
  - During the monitoring period, the L_{eq}, L_{10} and L_{90} were recorded. In addition, site conditions and noise sources were recorded on a standard record sheet.
  - Noise measurement was paused during periods of high intrusive noise (e.g. dog barking, helicopter noise) if possible. Observations were recorded when intrusive noise was unavoidable.

- Noise monitoring was cancelled in the presence of fog, rain, wind with a steady speed exceeding 5m/s, or wind with gusts exceeding 10m/s.

- Maintenance and Calibration
  - The microphone head of the sound level meter was cleaned with soft cloth at regular intervals.
  - The meter and calibrator were sent to the supplier or HOKLAS laboratory to check and calibrate at yearly intervals.
  - Calibration certificates of the sound level meters and acoustic calibrators are provided in **Appendix K**.

Monitoring Schedule for the Reporting Month

3.2.4 The schedule for impact air quality monitoring in November 2025 is provided in **Appendix H**.

Monitoring Results

3.2.5 The monitoring results for noise are summarized in **Table** 3.8 and the monitoring data is provided in **Appendix L**.

Table 3.8 Summary of Construction Noise Monitoring Results in the Reporting Period

Location I.D.	Range, dB(A), $L_{eq\ (30\ mins)}$	Limit Level, $L_{eq\ (30\ mins)}$
E-N12a	54.7 – 62.6	75.0
E-N21a	60.9 – 70.7 (1)	75.0

Note:

(1) A correction of +3 dB(A) was made to the free-field measurements.

3.2.6 Major noise sources during the monitoring included construction noise from the nearby construction and nearby traffic noise.

Observations

3.2.7 No Action/ Limit Level exceedance was recorded for construction noise monitoring in the reporting period.

3.2.8 Site audits were carried out on a weekly basis to monitor and audit the timely implementation of noise mitigation measures within the site boundaries of this Project. A summary of observations during the site audits is shown in **Table 7.1** of this report.

4 Waste Management

4.1.1 Waste generated from this Project includes inert C&D materials and non-inert C&D materials. Non-inert C&D materials are made up of general refuse, vegetative wastes and recyclable wastes such as plastics and paper/ cardboard packaging waste. Steel materials generated from the project are also grouped into non-inert C&D materials as the materials were not disposed of with other inert C&D materials. As advised by the Contractor, only general refuse was generated and disposed of during this reporting period.

4.1.2 With reference to relevant handling records and trip tickets of this Project, the quantities of different types of waste generated in the reporting period are summarised in **Table 4.1**. Details of cumulative waste management data are presented as a waste flow table in **Appendix M**.

Table 4.1 Quantities of Waste Generated from the Project in the Reporting Period

Reporting period	Quantity					
	Inert C&D Materials (in '000 kg)	Chemical Waste (in 'kg)	Non-inert C&D Materials			
			Others, e.g. General Refuse disposed of at Landfill (in '000kg)	Recycled materials		
				Paper/ cardboard (in '000kg)	Plastics (in '000 kg)	Metals (in '000 kg)
December 2025	0.00	0.00	15.27	0.00	0.00	0.00

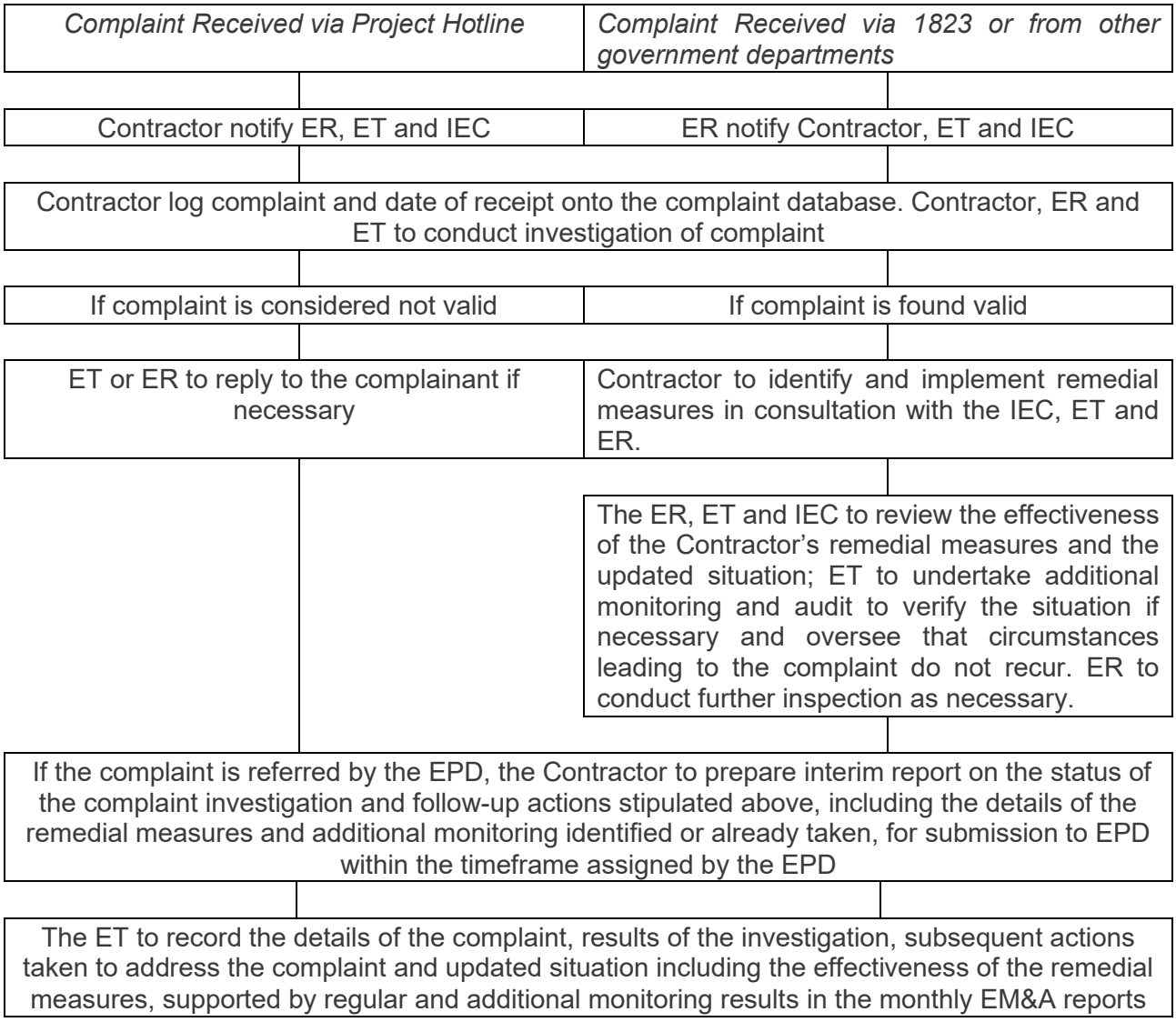
5 Landscape and Visual

5.1.1 As per the EM&A Manuals, the landscape and visual mitigation measures shall be implemented, and site inspections should be undertaken once every two weeks during the construction period.

5.1.2 Bi-weekly inspection of the implementation of landscape and visual mitigation measures was conducted on 3 and 19 December 2025. The observations and recommendations made during the site inspections are presented in **Table 7.1**. A summary of the implementation status is presented in **Appendix F**.

6 Summary of Complaints, Notification of Summons and Prosecutions

6.1.1 The environmental Complaints Handling Procedures is shown below.



6.1.2 Should non-compliance of the criteria occur, action in accordance with the Event and Action Plan in **Appendix D** and **Appendix E** shall be carried out.

6.1.3 No exceedance of the Action and Limit Levels of air quality (1-hour TSP and 24-hour TSP) monitoring and noise monitoring was recorded in the reporting period.

6.1.4 No complaint was received in the reporting period.

6.1.5 No non-compliance was received in the reporting period.

6.1.6 No notification of summons and successful prosecution was received in the reporting period.

6.1.7 Statistics on complaints, notifications of summons and successful prosecutions are summarized in **Appendix N.**

7 EM&A Site Inspection

7.1.1 Site inspections were carried out on a weekly basis to monitor the implementation of proper environmental pollution control and mitigation measures under the Contract. In the reporting period, 4 site inspections were carried out by the representative of ET, Contractor and Engineer on 3, 12, 19 and 24 December 2025, along with bi-weekly inspection of the implementation of landscape and visual mitigation measures conducted on 3 and 19 December 2025.

7.1.2 One joint site inspection with the IEC was also undertaken on 12 December 2025. Minor deficiencies were observed during weekly site inspection. Key observations during the site inspections are summarized in **Table 7.1**.

Table 7.1 Summary of Site Observation

Date	Environmental Observations	Follow-up Status
3 December 2025	1. Chemical containers were observed without drip tray(s), drip tray(s) should be provided to chemicals to avoid leakage.	1. Chemical containers were relocated and place inside the drip tray. (Rectified on 9 December 2025)
12 December 2025	Nil.	Nil.
19 December 2025	1. A chemical container was without drip tray, chemical container should be kept on drip tray to avoid leakage.	1. The concerned chemical container was removed. (Rectified on 23 December 2025)
24 December 2025	1. Drip tray should be provided to chemical tank at landscape deck to avoid leakage.	1. The concerned chemical container was removed. (Rectified on 31 December 2025)

7.1.3 The Contractor has rectified all observation identified during environmental site inspection.

7.1.4 According to the EIA Study Report, Environmental Permit, contract documents and EM&A Manual, the mitigation measures detailed in the documents had been implemented as much as practical during the reporting period. An updated Implementation Status of Environmental Mitigation Measures (EMIS) is provided in **Appendix F**.

8 Future Key Issues

8.1.1 The construction activities to be undertaken in the next reporting period are listed below:

Construction Activities To be Undertaken in Kai Tak West Area
• Finishes (floor & wall) installation at Kai Tak Phase 2B Landscaped Deck • Finishes installation on Ramp at Kai Tak Phase 2B Landscaped Deck • E&M works at Kai Tak Phase 2B Landscaped Deck • Staircase Construction at Kai Tak Phase 2B Landscaped Deck

8.1.2 Potential environmental impacts arising from the above construction activities are mainly associated with dust and waste management.

8.1.3 The tentative schedule of air quality (1-hour TSP and 24-hour TSP) monitoring and noise monitoring in the next reporting period is presented in **Appendix H.**

8.1.4 The construction programme for the Project for the next reporting period is presented in **Appendix B**.

9 Conclusion and Recommendations

9.1.1 This is the 14th monthly EM&A Report presenting the EM&A works undertaken in Kai Tak West Area during the period from 1 December 2025 to 31 December 2025 in accordance with the EM&A Manual and the requirement under EP-457/2013/D.

9.1.2 Air quality monitoring (including 1-hour TSP and 24-hour TSP) and noise monitoring were carried out in the reporting period. No exceedance of the Action or Limit Level was recorded for air quality monitoring and noise during the reporting period.

9.1.3 Weekly environmental site inspections by representatives of the ET, the Contractor and the Engineer were conducted during the reporting period. One joint site inspection with the IEC was carried out on 12 December 2025. Minor deficiencies were observed during site inspection and was rectified within specified deadlines. The environmental performance of the Project was therefore considered satisfactory.

9.1.4 No complaint was received in the reporting period.

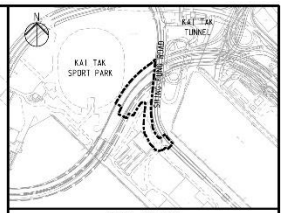
9.1.5 No non-compliance situation was received in the reporting period.

9.1.6 No notification of summons or prosecution was received since commencement of the Contract.

9.1.7 The ET will keep track on the construction works to confirm compliance of environmental requirements and the proper implementation of all necessary mitigation measures.

Appendix A
Alignment and Works Site in Kai Tak West Area for Contract No. HY/2023/08

PART PLAN



KEY PLAN

NOTES

1. FOR NOTES AND LEGEND, REFER TO DRAWING NO. CKR/RMW/10/0011.

Rev. 修訂	Description 內容修訂	By 由	Date 日期
00	ISSUE FOR TENDER	LFM	02/24

ARUP M MOTT MACDONALD
Arup-Mott MacDonald Joint Venture

Project title 工程名稱
Contract No. HY/2023/08
Central Kowloon Route - Remaining Works

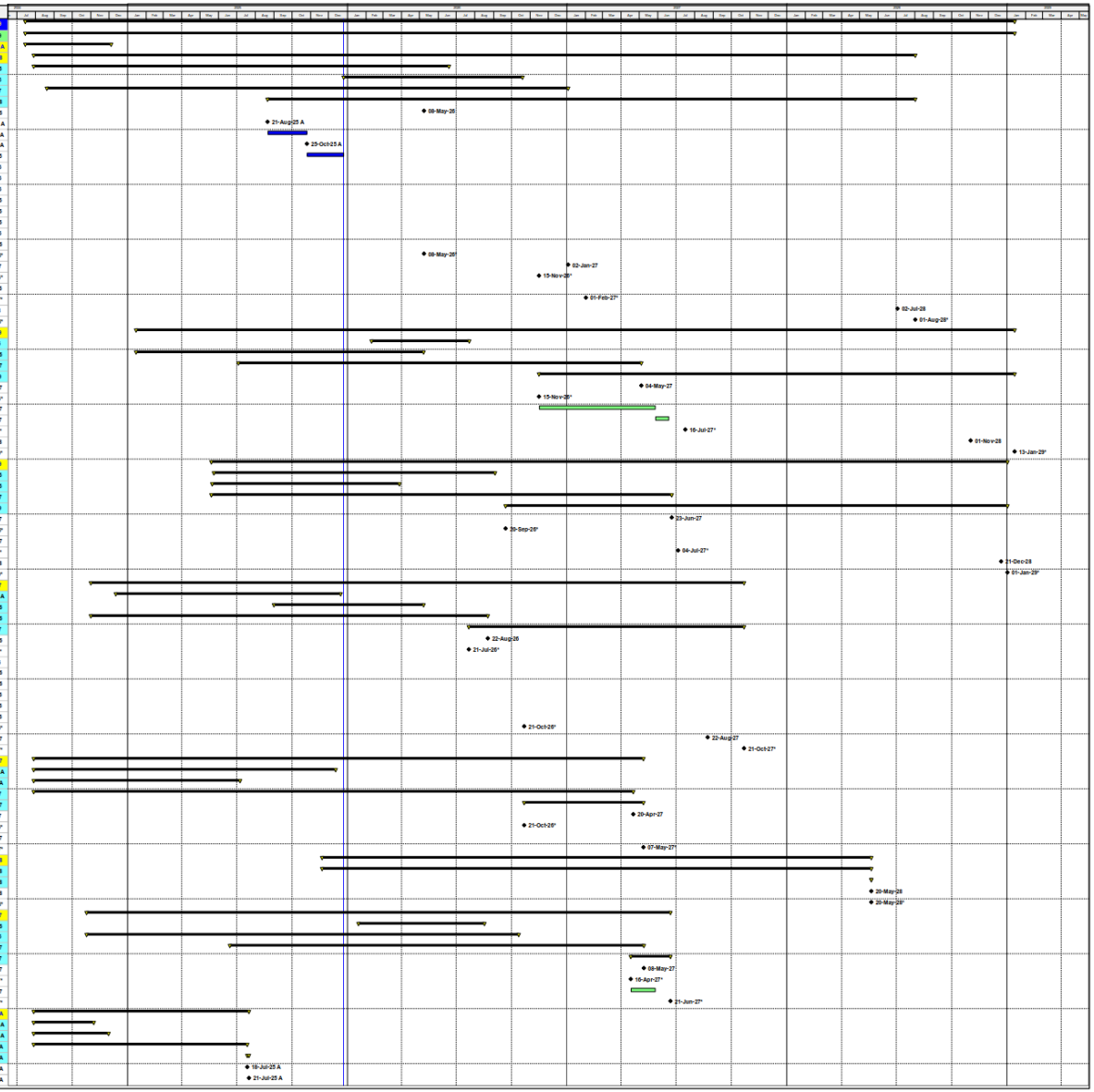
Drawing title 圖則名稱
Kai Tak Phase 2B Landscaped Deck

Drawing no. 圖則編號	CKR/RMW/10/0014	Rev. 修訂	00
Drawn By 繪圖	RY	Checked By 核對	KKC
Approved By 批准人	FW		
Scale 比例	1:500 @ A1	Status 狀態	TENDER

路政署 HIGHWAYS DEPARTMENT
主要工程管理處 MAJOR WORKS PROJECT MANAGEMENT OFFICE

Appendix B
Construction Programme

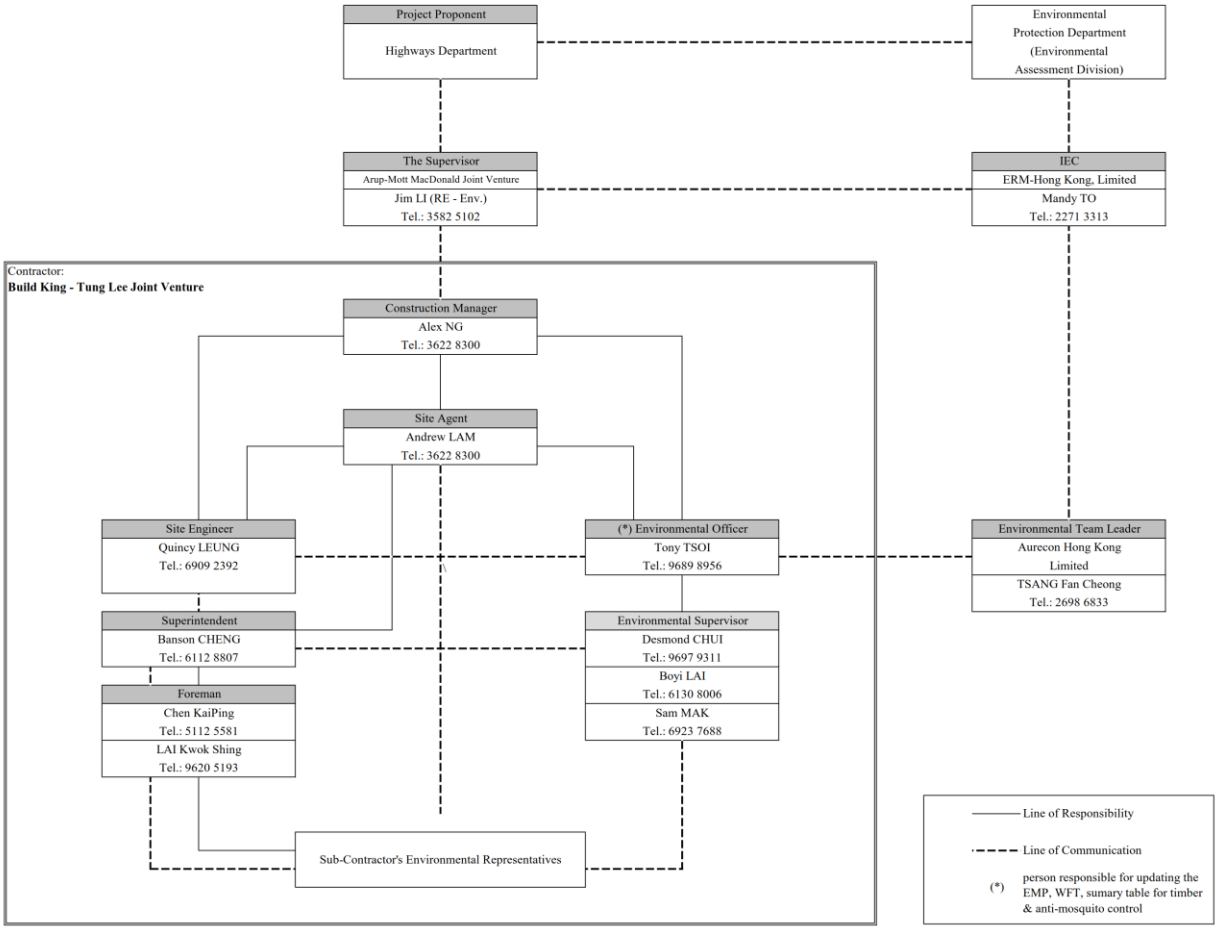
Activity ID	Activity Name	Original Duration	Early Start	Early Finish
Central Kowloon Route - Remaining Works		**1644**	**15-Jul-24 A**	**13-Jan-29**
Construction Works		1644	15-Jul-24 A	13-Jan-29
Preliminary Submissions		148	15-Jul-24 A	04-Dec-24 A
Key Date A and Section 1 - Yau Ma Tei Landscaped Deck		1465	29-Jul-24 A	01-Aug-28
Preliminaries		690	29-Jul-24 A	18-Jun-26
TTA Application and Implementation		297	26-Dec-25	19-Oct-26
Site Works		866	20-Aug-24 A	02-Jan-27
Completion and Establishment Works		1078	21-Aug-25 A	01-Aug-28
S1.YMTLD.9000	Planned Completion for Key Date A	0		08-May-26
S1.YMTLD.9010aa	Original Contract Completion for Key Date A	0		21-Aug-25 A
S1.YMTLD.9010ab	CE-007: Revised Design Requirements for YMTLD (Approved 65 calendar days)	65	22-Aug-25 A	25-Oct-25 A
S1.YMTLD.9010ax	Approved Revised Contract Completion for Key Date A	0		25-Oct-25 A
S1.YMTLD.9010ba	PMI-040: Additional Planter Wall along Jogging Track & Walking Track - 67 calendar days	67	26-Oct-25 A	31-Dec-25
S1.YMTLD.9010bb	CE-032: Inclement Weather for March 2025 - 2 working days	2	02-Jan-26	03-Jan-26
S1.YMTLD.9010bc	CE-038: Inclement Weather for April 2025 - 4 working days	4	05-Jan-26	09-Jan-26
S1.YMTLD.9010bd	CE-039: Inclement Weather for May 2025 - 8 working days	8	09-Jan-26	17-Jan-26
S1.YMTLD.9010be	Potential CE: Inclement Weather for June 2025 - 17 working days	17	19-Jan-26	06-Feb-26
S1.YMTLD.9010bf	Potential CE: Inclement Weather for July 2025 - 16 working days	16	07-Feb-26	28-Feb-26
S1.YMTLD.9010bg	Potential CE: Inclement Weather for August 2025 - 14 working days	14	02-Mar-26	17-Mar-26
S1.YMTLD.9010bh	Potential CE: Additional Planter Wall along MJ - 18 working days	18	18-Mar-26	11-Apr-26
S1.YMTLD.9010bi	Potential CE: Additional Drainage, E&M and Finishes due to Additional Planter Wall - 22 working days	22	13-Apr-26	08-May-26
S1.YMTLD.9010bx	Revised Contract Completion for Key Date A (Tentative for Approval)	0		08-May-26*
S1.YMTLD.9020	Planned Completion for Section 1 of the Works	0		02-Jan-27
S1.YMTLD.9030aa	Original Contract Completion for Section 1 of the Works	0		15-Nov-26*
S1.YMTLD.9030ab	Potential CE: Additional Planter Wall based on Updated Soft Landscaped Plan at Portion 1D	27	16-Nov-26	16-Dec-26
S1.YMTLD.9030ax	Revised Contract Completion for Section 1 of the Works (Tentative for Approval)	0		01-Feb-27*
S1.YMTLD.9040	Planned Completion for Section 1A of the Works	0		02-Jul-28
S1.YMTLD.9050	Contract Completion for Section 1A of the Works (547 days - Establishment Works of Section 1)	0		01-Aug-28*
Section 2 - Yau Ma Tei Rest Gardens		1460	15-Jan-25 A	13-Jan-29
Preliminaries		163	10-Feb-26	22-Jul-26
TTA Application and Implementation		478	15-Jan-25 A	07-May-26
Site Works		670	04-Jul-25 A	04-May-27
Completion and Establishment Works		790	15-Nov-26	13-Jan-29
S2.YMTRG.9000	Planned Completion for Section 2 of the Works	0		04-May-27
S2.YMTRG.9010aa	Original Contract Completion for Section 2 of the Works	0		15-Nov-26*
S2.YMTRG.9010ab	Knock on Effect from CE-040: Temporary Design Suspension as Instructed by PMR - 193 calendar days	193	16-Nov-26	27-May-27
S2.YMTRG.9010ac	Knock on Effect from Potential CE: Changed in Design Scope - 22 calendar days	22	28-May-27	18-Jun-27
S2.YMTRG.9010ax	Revised Contract Completion for Section 2 of the Works (Tentative for Approval)	0		16-Jul-27*
S2.YMTRG.9020	Planned Completion for Section 2A of the Works	0		01-Nov-28
S2.YMTRG.9030	Contract Completion for Section 2A of the Works (547 days - Establishment Works of Section 2)	0		13-Jan-29*
Section 3 - North Tree Park		1323	28-May-25 A	01-Jan-29
Preliminaries		468	28-May-25 A	03-Sep-26
TTA Application and Implementation		312	21-May-25 A	28-Mar-26
Site Works		765	20-May-25 A	23-Jun-27
Completion and Establishment Works		834	20-Sep-26	01-Jan-29
S3.NTP.9000	Planned Completion for Section 3 of the Works	0		23-Jun-27
S3.NTP.9010aa	Original Contract Completion for Section 3 of the Works	0		20-Sep-26*
S3.NTP.9010ab	Potential CE: Additional Design Requirement from DSD	240	21-Sep-26	18-May-27
S3.NTP.9010b	Revised Contract Completion for Section 3 of the Works (Tentative for Approval)	0		04-Jul-27*
S3.NTP.9020	Planned Completion for Section 3A of the Works	0		21-Dec-28
S3.NTP.9030	Contract Completion for Section 3A of the Works (547 days - Establishment Works of Section 3)	0		01-Jan-29*
Section 4 - Kai Tak Phase 2B Landscaped Deck		1085	01-Nov-24 A	21-Oct-27
Preliminaries		414	12-Dec-24 A	20-Dec-25 A
TTA Application and Implementation		240	01-Sep-25 A	07-May-26
Site Works		660	01-Nov-24 A	22-Aug-26
Completion and Establishment Works		457	21-Jul-26	21-Oct-27
S4.KTLD.9000	Planned Completion for Section 4 of the Works	0		22-Aug-26
S4.KTLD.9010aa	Original Contract Completion for Section 4 of the Works	0		21-Jul-26*
S4.KTLD.9010ab	CE-038: Inclement Weather for April 2025 - 4 working days	4	22-Jul-26	25-Jul-26
S4.KTLD.9010ac	CE-039: Inclement Weather for May 2025 - 8 working days	8	27-Jul-26	04-Aug-26
S4.KTLD.9010ad	Potential CE: Inclement Weather for June 2025 - 17 working days	17	05-Aug-26	24-Aug-26
S4.KTLD.9010ae	Potential CE: Inclement Weather for July 2025 - 16 working days	16	25-Aug-26	11-Sep-26
S4.KTLD.9010af	Potential CE: Inclement Weather for August 2025 - 14 working days	14	12-Sep-26	29-Sep-26
S4.KTLD.9010ag	Potential PMI: Lighting, Facade and FS System for Storage Area Under Staircase and Ramp - 60 working days	60	22-Jul-26	30-Sep-26
S4.KTLD.9010ax	Revised Contract Completion for Section 4 of the Works (Tentative for Approval)	0		21-Oct-26*
S4.KTLD.9020	Planned Completion for Section 4A of the Works	0		22-Aug-27
S4.KTLD.9030	Contract Completion for Section 4A of the Works (365 days - Establishment Works of Section 4)	0		21-Oct-27*
Section 5 - Off Site Tree Compensation		1013	29-Jul-24 A	07-May-27
Preliminaries		502	29-Jul-24 A	12-Dec-25 A
TTA Application and Implementation		343	29-Jul-24 A	06-Jul-25 A
Site Works		996	29-Jul-24 A	20-Apr-27
Completion		198	21-Oct-26	07-May-27
S5.OSTC.9000	Planned Completion for Section 5	0		20-Apr-27
S5.OSTC.9010aa	Original Contract Completion for Section 5 of the Works	0		21-Oct-26*
S5.OSTC.9010ab	CE-051: Additional Tree Preservation & Removal Proposal for Off-Site Slope Relocation within Part 5A	198	22-Oct-26	07-May-27
S5.OSTC.9010ax	Revised Contract Completion for Section 5 of the Works (Tentative for Approval)	0		07-May-27*
Section 6 - Maintenance Services of Yaumatei Maternal and Child Health Centre		913	20-Nov-25 A	20-May-28
Maintenance Services		913	20-Nov-25 A	20-May-28
Completion		0	20-May-28	20-May-28
S6.YMCHC.9000	Planned Completion for Section 6 of the Works	0		20-May-28
S6.YMCHC.9010	Contract Completion for Section 6 of the Works (912 days after access date of Parts 6)	0		20-May-28*
Section 7 - Yau Ma Tei Jade Hawker Bazaar		970	25-Oct-24 A	21-Jun-27
Preliminaries		210	19-Jan-26	16-Aug-26
TTA Application and Implementation		718	25-Oct-24 A	12-Oct-26
Site Works		688	20-Jun-25 A	08-May-27
Completion		66	16-Apr-27	21-Jun-27
S7.YMTJHB.9000	Planned Completion for Section 7	0		08-May-27
S7.YMTJHB.9010aa	Original Contract Completion for Section 7 of the Works	0		16-Apr-27*
S7.YMTJHB.9010ab	CE-057: Delay Access Date for Area B	33	17-Apr-27	27-May-27
S7.YMTJHB.9010ax	Revised Contract Completion for Section 7 of the Works (Tentative for Approval)	0		21-Jun-27*
Section 8 - Kai Tak Road Downstream Traffic Improvement Works		355	29-Jul-24 A	21-Jul-25 A
Preliminaries		110	29-Jul-24 A	05-Nov-24 A
TTA Application and Implementation		118	29-Jul-24 A	30-Nov-24 A
Site Works		355	29-Jul-24 A	18-Jul-25 A
Completion		0	18-Jul-25 A	21-Jul-25 A
S8.KFR.9000	Actual Completion for Section 8	0		18-Jul-25 A
S8.KFR.9010	Revised Contract Completion for Section 8 of the Works (CE-009, 018 and CE-023)	0		21-Jul-25 A



Appendix C
Project Organisation Chart

Contract No.: HY/2023/08
Central Kowloon Route - Remaining Works
Environmental Organization Chart

Last Upate: ***02 Dec 2025***



Appendix D

Event and Action Plan (EAP) (Air Quality Monitoring)

EVENT	ACTION ENVIRONMENTAL TEAM (ET)	INDEPENDENT ENVIRONMENTAL CHECKER (IEC)	ENGINEER'S REPRESENTATIVE (ER)	CONTRACTOR
ACTION LEVEL				
Exceedance for one sample	1. Identify source, investigate the causes of exceedance and propose remedial measures; 2. Inform IEC and ER; 3. Repeat measurement to confirm finding; 4. Increase monitoring frequency to daily.	1. Check monitoring data submitted by ET; 2. Check Contractor's working method.	1. Notify Contractor.	1. Rectify any unacceptable practice; 2. Amend working methods if appropriate.
Exceedance for two or more consecutive samples	1. Identify source; 2. Inform IEC and ER; 3. Advise the ER on the effectiveness of the proposed remedial measures; 4. Repeat measurements to confirm findings; 5. Increase monitoring frequency to daily; 6. Discuss with IEC and Contractor on remedial actions required; 7. If exceedance continues, arrange meeting with IEC and ER; 8. If exceedance stops, cease additional monitoring.	1. Check monitoring data submitted by ET; 2. Check Contractor's working method; 3. Discuss with ET and Contractor on possible remedial measures; 4. Advise the ET on the effectiveness of the proposed remedial measures; 5. Supervise implementation of remedial measures.	1. Confirm receipt of notification of failure in writing; 2. Notify Contractor; 3. Ensure remedial measures properly implemented.	1. Submit proposals for remedial actions to ER within 3 working days of notification; 2. Implement the agreed proposals; 3. Amend proposal if appropriate.

EVENT	ACTION ENVIRONMENTAL TEAM (ET)	INDEPENDENT ENVIRONMENTAL CHECKER (IEC)	ENGINEER'S REPRESENTATIVE (ER)	CONTRACTOR
LIMIT LEVEL				
Exceedance for one sample	1. Identify source, investigate the causes of exceedance and propose remedial measures; 2. Inform ER, Contractor and EPD; 3. Repeat measurement to confirm finding; 4. Increase monitoring frequency to daily; 5. Assess effectiveness of Contractor's remedial actions and keep IEC, EPD and ER informed of the results.	1. Check monitoring data submitted by ET; 2. Check Contractor's working method; 3. Discuss with ET and Contractor on possible remedial measures; 4. Advise the ER on the effectiveness of the proposed remedial measures; 5. Supervise implementation of remedial measures.	1. Confirm receipt of notification of failure in writing; 2. Notify Contractor; 3. Ensure remedial measures properly implemented.	1. Take immediate action to avoid further exceedance; 2. Submit proposals for remedial actions to IEC within 3 working days of notification; 3. Implement the agreed proposals; 4. Amend proposal if appropriate.
Exceedance for two or more consecutive samples	1. Notify IEC, ER, Contractor and EPD; 2. Identify source; 3. Repeat measurement to confirm findings; 4. Increase monitoring frequency to daily; 5. Carry out analysis of Contractor's working procedures to determine possible mitigation to be implemented; 6. Arrange meeting with IEC and ER to discuss the remedial actions to be taken; 7. Assess effectiveness of Contractor's remedial actions and keep IEC, EPD and ER informed of the results; 8. If exceedance stops, cease additional monitoring.	1. Discuss amongst ER, ET, and Contractor on the potential remedial actions; 2. Review Contractor's remedial actions whenever necessary to assure their effectiveness and advise the ER accordingly; 3. Supervise the implementation of remedial measures.	1. Confirm receipt of notification of failure in writing; 2. Notify Contractor; 3. In consultation with the IEC, agree with the Contractor on the remedial measures to be implemented; 4. Ensure remedial measures properly implemented; 5. If exceedance continues, consider what portion of the work is responsible and instruct the Contractor to stop that portion of work until the exceedance is abated.	1. Take immediate action to avoid further exceedance; 2. Submit proposals for remedial actions to IEC within 3 working days of notification; 3. Implement the agreed proposals; 4. Resubmit proposals if problem still not under control; 5. Stop the relevant portion of works as determined by the ER until the exceedance is abated.

Appendix E
Event and Action Plan (EAP) (Noise Monitoring)

EVENT	ACTION			
	ENVIRONMENTAL TEAM (ET)	INDEPENDENT ENVIRONMENTAL CHECKER (IEC)	ENGINEER'S REPRESENTATIVE ER	CONTRACTOR
Action Level	1. Identify source, investigate the causes of exceedance and propose remedial measures; 2. Notify IEC and Contractor; 3. Report the results of investigation to the IEC, ER and Contractor; 4. Discuss with the Contractor and formulate remedial measures; 5. Increase monitoring frequency to check mitigation effectiveness.	1. Review the analysed results submitted by the ET; 2. Review the proposed remedial measures by the Contractor and advise the ER accordingly; 3. Supervise the implementation of remedial measures.	1. Confirm receipt of notification of failure in writing; 2. Notify Contractor; 3. Require Contractor to propose remedial measures for the analysed noise problem; 4. Ensure remedial measures are properly implemented	1. Submit noise mitigation proposals to IEC; 2. Implement noise mitigation proposals.

Appendix F
Environmental Mitigation Implementation Schedule (EMIS)

Environmental Mitigation Implementation Schedule

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
Construction Dust Impact								
S4.3.10	D1	The contractor shall follow the procedures and requirements given in the Air Pollution Control (Construction Dust) Regulation and Air Pollution Control (Non-road Mobile Machinery) (Emission) Regulation.	Minimize dust impact and adverse health effects at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	• APCO • To control the dust impact to meet HKAQO and TM-EIA criteria	Implemented.
S4.3.10	D2	• Mitigation measures in form of regular watering under a good site practice should be adopted. Watering once per hour on exposed worksites and haul road should be conducted to achieve dust removal efficiencies of 91.7%. While the above watering frequencies are to be followed, the extent of watering may vary depending on actual site conditions but should be sufficient to maintain an equivalent intensity of no less than 1.3 L/m^2 to achieve the dust removal efficiency.	Minimize dust impact at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	• APCO • To control the dust impact to meet HKAQO and TM-EIA criteria	Implemented.
S4.3.10	D3	• Proper watering at exposed spoil should be undertaken throughout the construction phase; • Any excavated or stockpile of dusty material should be covered entirely by impervious sheeting or sprayed with water to maintain the entire surface wet and then removed or backfilled or reinstated where practicable within 24 hours of the excavation or unloading; • Any dusty materials remaining after a stockpile is removed should be wetted with water and cleared from the surface of roads; • A stockpile of dusty material should not be extended beyond the pedestrian barriers, fencing or traffic cones; • The load of dusty materials on a vehicle leaving a construction site should be covered entirely by impervious sheeting to ensure that the dusty materials do not leak from the vehicle. • Where practicable, vehicle washing facilities with high pressure water jet should be provided at every discernible or designated vehicle exit	Minimize dust impact at the nearby sensitive receivers	Contractor	All construction sites	Construction stage	• APCO • To control the dust impact to meet HKAQO and TM-EIA criteria	Implemented, rectified after reminder for 1st bullet. Implemented for the 2nd to 6th bullet. N/A for other bullets.

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		point. The area where vehicle washing takes place and the road section between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores; • When there are open excavation and reinstatement works, hoarding of not less than 2.4m high should be provided and properly maintained as far as practicable along the site boundary with provision for public crossing. Good site practice shall also be adopted by the Contractor to ensure the conditions of the hoardings are properly maintained throughout the construction period; • The portion of any road leading only to construction site that is within 30m of a vehicle entrance or exit should be kept clear of dusty materials; • Surfaces where any pneumatic or power-driven drilling, cutting, polishing or other mechanical breaking operation takes place should be sprayed with water or a dust suppression chemical continuously; • Any area that involves demolition activities should be sprayed with water or a dust suppression chemical immediately prior to, during and immediately after the activities so as to maintain the entire surface wet; • Any skip hoist for material transport should be totally enclosed by impervious sheeting; • Every stock of more than 20 bags of cement or dry-pulverised fuel ash (PFA) should be covered entirely by impervious sheeting or placed in an area sheltered on the top and the 3 sides; • Loading, unloading, transfer, handling or storage of bulk cement or dry PFA should be carried out in a totally enclosed system or facility, and any vent or exhaust should be fitted with an effective fabric filter or equivalent air pollution control system						

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• Exposed earth should be properly treated by compaction, turfing, hydroseeding, vegetation planting or sealing with latex, vinyl, bitumen, shotcrete or other suitable surface stabilizer within six months after the last construction activity on the construction site or part of the construction site where the exposed earth lies.						
S4.3.10	D6	Implement regular dust monitoring under EM&A programme during the construction stage.	Monitoring of dust impact	Contractor	Selected rep. dust monitoring station	Construction stage	• TM-EIA	Implemented
Construction Noise (Airborne)								
S5.4.1	N1	Implement the following good site practices: • Only well-maintained plant should be operated on-site, and plant should be serviced regularly during the construction programme; • Machines and plant (such as trucks, cranes) that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum; • Plant known to emit noise strongly in one direction, where possible, be orientated so that the noise is directed away from nearby NSRs; • Silencers or mufflers on construction equipment should be properly fitted and maintained during the construction works; • Mobile plant should be sited as far away from NSRs as possible and practicable; • Material stockpiles, mobile container site office and other structures should be effectively utilized, where practicable, to screen noise from on-site construction activities.	Control construction airborne noise	Contractor	All construction sites	Construction stage	• Annex 5, TM-EIAO	Implemented for the 1st, 2nd, 5th bullets, N/A for other bullets
S5.4.1	N2	Install temporary hoarding located on the site boundaries between noisy construction activities and NSRs. The conditions of hoardings shall be properly maintained throughout the construction period.	Reduce the construction noise levels at low-level zone of NSRs	Contractor	All construction sites	Construction stage	• Annex 5, TM-EIAO	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
			through partial screening					
S5.4.1	N3	Install movable noise barriers (typical design is wooden framed barrier with a small-cantilevered on a skid footing with 25mm thick internal sound absorptive lining), acoustic mat or full enclosure, screen the noisy plants including air compressors, generators and handheld breakers, etc.	Screen the noisy plant items to be used at all construction sites	Contractor	All construction sites where practicable	Construction stage	• Annex 5, TM-EIAO	N/A
S5.4.1	N4	Use 'Quiet plant'	Reduce the noise levels of plant items	Contractor	All construction sites where practicable	Construction stage	• Annex 5, TM-EIAO	Implemented
S5.4.1	N5	Loading/ unloading activities should be carried out inside the full enclosure of mucking out points.	Reduce the noise levels of loading/ unloading activities	Contractor	Mucking out locations	Construction stage	• Annex 5, TM-EIAO	N/A
S5.4.1	N6	Sequencing operation of construction plants where practicable.	Operate sequentially within the same work site to reduce the construction airborne noise	Contractor	All construction sites where practicable	Construction stage	• Annex 5, TM-EIAO	N/A
S5.4.1	N7	Implement a noise monitoring programme under EM&A programme.	Monitor the construction noise levels at the selected representative locations	Contractor	Selected rep. noise monitoring station	Construction stage	• TM-EIAO	Implemented
Water Quality (Construction Phase)								
S6.9.1.1	W1	In accordance with the Practice Note for Professional Persons on Construction Site Drainage, Environmental Protection Department, 2023 (ProPECC PN 2/23), construction phase mitigation measures shall include the following:	To minimize water quality impact from the construction site runoff and general	Contractor	All construction sites where practicable	Construction stage	• Water Pollution Control Ordinance • ProPECC PN 2/23	Implemented, rectified after observation for 14th bullet.

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		<u>Construction Runoff</u> • At the start of site establishment, perimeter cut-off drains to direct off-site water around the site should be constructed with internal drainage works and erosion and sedimentation control facilities implemented. Channels (both temporary and permanent drainage pipes and culverts), earth bunds or sandbag barriers should be provided on site to direct stormwater to silt removal facilities. The design of the temporary on-site drainage system will be undertaken by the contractor prior to the commencement of construction; • The dikes or embankments for flood protection should be implemented around the boundaries of earthwork areas. Temporary ditches should be provided to facilitate the runoff discharge into an appropriate watercourse, through a silt/ sediment trap. The sediment/ silt traps should be incorporated in the permanent drainage channels to enhance deposition rates; • The design of efficient silt removal facilities should be based on the guidelines in Appendix A1 of ProPECC PN 2/23, which states that the retention time for silt/ sand traps should be 5 minutes under maximum flow conditions. Sizes may vary depending upon the flow rate, but for a flow rate of 0.1 m^3/s a sedimentation basin of 30 m^3 would be required and for a flow rate of 0.5 m^3/s the basin would be 150 m^3. The detailed design of the sand/ silt traps shall be undertaken by the contractor prior to the commencement of construction; • All exposed earth areas should be completed and vegetated as soon as possible after earthworks have been completed, or alternatively, within 14 days of the cessation of earthworks where practicable. Exposed slope surfaces should be covered by tarpaulin or other means;	construction activities				• TM-EIAO • TM-DSS	Implemented for the 1st, 3rd, 7th to 11th, 13th, 14th to 16th bullets N/A for other bullets

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• The overall slope of the site should be kept to a minimum to reduce the erosive potential of surface water flows, and all traffic areas and access roads protected by coarse stone ballast. An additional advantage accruing from the use of crushed stone is the positive traction gained during prolonged periods of inclement weather and the reduction of surface sheet flows; • All drainage facilities and erosion and sediment control structures should be regularly inspected and maintained to ensure proper and efficient operation at all times and particularly following rainstorms. Deposited silt and grit should be removed regularly and disposed of by spreading evenly over stable, vegetated areas; • Measures should be taken to minimize the ingress of site drainage into excavations. If the excavation of trenches in wet periods is necessary, they should be dug and backfilled in short sections wherever practicable. Water pumped out from trenches or foundation excavations should be discharged into storm drains via silt removal facilities; • Open stockpiles of construction materials (for example, aggregates, sand and fill material) of more than $50m^3$ should be covered with tarpaulin or similar fabric during rainstorms. Measures should be taken to prevent the washing away of construction materials, soil, silt or debris into any drainage system; • Manholes should always be adequately covered and temporarily sealed so as to prevent silt, construction materials or debris being washed into the drainage system and storm runoff being directed into foul sewers; • Precautions be taken at any time of year when rainstorms are likely, actions to be taken when a rainstorm is imminent or forecasted, and actions to be taken during or after rainstorms are summarized in Appendix A2 of ProPECC PN						

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		2/23. Particular attention should be paid to the control of silty surface runoff during storm events, especially for areas located near steep slopes; • All vehicles and plant should be cleaned before leaving a construction site to ensure no earth, mud, debris and the like is deposited by them on roads. An adequately designed and site wheel washing facilities should be provided at every construction site exit where practicable. Wash-water should have sand and silt settled out and removed at least on a weekly basis to ensure the continued efficiency of the process. The section of access road leading to, and exiting from, the wheel wash bay to the public road should be paved with sufficient backfall toward the wheel wash bay to prevent vehicle tracking of soil and silty water to public roads and drains; • Oil interceptors should be provided in the drainage system downstream of any oil/ fuel pollution sources. The oil interceptors should be emptied and cleaned regularly to prevent the release of oil and grease into the storm water drainage system after accidental spillage. A bypass should be provided for the oil interceptors to prevent flushing during heavy rain; • Construction solid waste, debris and rubbish on site should be collected, handled and disposed of properly to avoid water quality impacts; • All fuel tanks and storage areas should be provided with locks and sited on sealed areas, within bunds of a capacity equal to 110% of the storage capacity of the largest tank to prevent spilled fuel oils from reaching water sensitive receivers nearby; • Adopt best management practices; • All earth works should be conducted sequentially to limit the amount of construction runoff generated from exposed areas during the wet season (April to September) as far as practicable.						

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
S6.9.1.2	W2	<u>Tunnelling Works and Underground Works</u> • Cut-&-cover tunnelling work should be conducted sequentially to limit the amount of construction runoff generated from exposed areas during the wet season (April to September) as far as practicable. • Uncontaminated discharge should pass through sedimentation tanks prior to off-site discharge; • The wastewater with a high concentration of SS should be treated (e.g. by sedimentation tanks with sufficient retention time) before discharge. Oil interceptors would also be required to remove oil, lubricants and grease from the wastewater; • Direct discharge of the bentonite slurry (as a result of D-wall) is not allowed. It should be reconditioned and reused wherever practicable. Temporary storage locations (typically a properly closed warehouse) should be provided on site for any unused bentonite that needs to be transported away after all the related construction activities area completed. The requirements in ProPECC PN 2/23 should be adhered to in the handling and disposal of bentonite slurries.	To minimize construction water quality impact from tunnelling works	Contractor	All tunnelling portion	Construction stage	• Water Pollution Control Ordinance • ProPECC PN 2/23 • TM-DSS • TM-EIAO	N/A
S6.9.1.3	W3	<u>Sewage Effluent</u> • Portable chemical toilets and sewage holding tanks are recommended for handling the construction sewage generated by the workforce. A licensed contractor should be employed to provide appropriate and adequate portable toilets and be responsible for appropriate disposal and maintenance.	To minimize water quality from sewage effluent	Contractor	All construction sites where practicable	Construction stage	• Water Pollution Control Ordinance • TM-DSS	Implemented
S6.9.1.5	W4	<u>Groundwater from Potential Contaminated Area:</u> • No direct discharge of groundwater from contaminated areas should be adopted.	To minimize groundwater quality impact from contaminated area	Contractor	Excavation areas where contamination is found	Construction stage	• Water Pollution Control Ordinance • TM-DSS	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• A discharge license under the WPCO through the Regional Office of EPD for groundwater discharge should be applied. Prior to the excavation works within these potentially contaminated areas, the groundwater quality should be reviewed during the process of discharge license application. The compliance to the Technical Memorandum on Standards for Effluents Discharged into Drainage on Sewerage Systems, Inland and Coastal Waters (TM-DSS) and the existence of prohibited substance should be confirmed. If the review results indicated that the groundwater to be generated from the excavation works would be contaminated, the contaminated groundwater should be either properly treated in compliance with the requirements of the TM-DSS or properly recharged into the ground. • If wastewater treatment is deployed, the wastewater treatment unit shall deploy suitable treatment process (e.g. oil interceptor / activated carbon) to reduce the pollution level to an acceptable standard and remove any prohibited substances (e.g. TPH) to undetectable range. All treated effluent from wastewater treatment plant shall meet the requirements as stated in TM-DSS and should be discharged into the foul sewers. • If groundwater recharging wells are deployed, recharging wells should be installed as appropriate for recharging the contaminated groundwater back into the ground. The recharging wells should be selected at places where the groundwater quality will not be affected by the recharge operation as indicated in the Section 2.3 of TM-DSS. The baseline groundwater quality shall be determined prior to the selection of the recharge wells, and submit a working plan (including the laboratory analytical results showing the quality of groundwater at the proposed recharge location(s) as well as the					• TM-EIAO	

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		pollutant levels of groundwater to be recharged) to EPD for agreement. Pollution levels of groundwater to be recharged shall not be higher than pollutant levels of ambient groundwater at the recharge well. Prior to recharge, any prohibited substances such as TPH products should be removed as necessary by installing the petrol interceptor.						
S6.9.1.6	W6	<u>Accidental Spillage</u> In order to prevent accidental spillage of chemicals, the following is recommended: • All the tanks, containers, storage area should be bunded and the locations should be locked as far as possible from the sensitive watercourse and stormwater drains; • The Contractor should register as a chemical waste producer if chemical wastes would be generated. Storage of chemical waste arising from the construction activities should be stored with suitable labels and warnings. Disposal of chemical wastes should be conducted in compliance with the requirements as stated in the Waste Disposal (Chemical Waste) (General) Regulation.	To minimize water quality impact from accidental spillage	Contractor	All construction site where practicable	Construction stage	• Water Pollution Control Ordinance • ProPECC PN 2/23 • TM-EIAO • TM-DSS	Implemented, rectified after observation for 1st bullet. Implemented for others bullet.
Waste Management (Construction Waste)								
S7.4.1	WM1	<u>On-site sorting of C&D material</u> • Geological assessment should be carried out by competent persons on site during excavation to identify materials which are not suitable to use as aggregate in structural concrete (e.g. volcanic rock, Aplite dyke rock, etc.). Volcanic rock and Aplite dyke rock should be separated at the source sites as far as practicable and stored at designated stockpile area preventing them from delivering to crushing facilities. The crushing plant operator should also be reminded to set up	Separation of unsuitable rock from ending up at concrete batching plants and be turned into concrete for structural use	Contractor	All construction sites	Construction stage	• DEVB (W) No. 6/2010	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		measures to prevent unsuitable rock from ending up at concrete batching plants and be turned into concrete for structural use. Details regarding control measures at source site and crushing facilities should be submitted by the Contractor for the Engineer to review and agree. In addition, site records should also be kept for the types of rock materials excavated and the traceability of delivery will be ensured with the implementation of Trip Ticket System and enforced by site supervisory staff as stipulated under DEVB TC(W) No. 6/2010 for tracking of the correct delivery to the rock crushing facilities for processing into aggregates. Alternative disposal option for the reuse of volcanic rock and Aplite Dyke rock, etc. should be explored.						
S7.5.1	WM2	<u>Construction and Demolition Material</u> • Maintain temporary stockpiles and reuse excavated fill material for backfilling and reinstatement; • Carry out on-site sorting; • Make provisions in the Contract documents to allow and promote the use of recycled aggregates where appropriate; • Adopt 'selective demolition' technique to demolish the existing structures and facilities with a view to recovering broken concrete effectively for recycling purpose, where possible; • Implement a trip-ticket system for each works contract to ensure that the disposal of C&D materials is properly documented and verified; and • Implement an enhanced Waste Management Plan similar to ETWBTC (Works) No. 19/2005 – "Environmental Management on Construction Sites" to encourage on-site sorting of C&D materials and to minimize their generation during the course of construction.	Good site practice to minimize the waste generation and recycle the C&D materials as far as practicable so as to reduce the amount for final disposal	Contractor	All construction sites	Construction stage	• Land (Miscellaneous Provisions) Ordinance • Waste Disposal Ordinance • ETWB TCW No. 19/2005	Implemented for the 1st, 2nd, 3rd, 5th, 6th bullets N/A for other bullets

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
S7.5.1	WM3	<u>C&D Waste</u> • Standard formwork or pre-fabrication should be used as far as practicable in order to minimize the arising of C&D materials. The use of more durable formwork or plastic facing for the construction works should be considered. Use of wooden hoardings should not be used, as in other projects. Metal hoarding should be used to enhance the possibility of recycling. The purchasing of construction materials will be carefully planned in order to avoid over ordering and wastage; • The Contractor should recycle as much of the C&D materials as possible on-site. Public fill and C&D waste should be segregated and stored in different containers or skips to enhance reuse or recycling of materials and their proper disposal. Where practicable, concrete and masonry can be crushed and used as fill. Steel reinforcement bar can be used by scrap steel mills. Different areas of the sites should be considered for such segregation and storage.	Good site practice to minimize the waste generation and recycle the C&D materials as far as practicable so as to reduce the amount for final disposal	Contractor	All construction sites	Construction stage	• Land (Miscellaneous Provisions) Ordinance • Waste Disposal Ordinance • ETWB TCW No. 19/2005	N/A
S7.5.1	WM4	<u>Excavated Contaminated Soils</u> • Details of the mitigation measures on handling of the contaminated soil shall be referred to Section on Land Contamination below.	The contaminated soil will be excavated for on-site reuse	Contractor	PBH4	Prior to commencement of construction works within the contaminated area	• Practice Guide (PG) for Investigation and Remediation of Contaminated Land • GN/GM for land contamination	N/A
S7.5.1	WM5	<u>Land-based Sediment</u> • All construction plant and equipment shall be designed and maintained to minimize the risk of silt, sediments, contaminants or other pollutants being released into the water column or deposited in the locations other than designated location;	To control pollution due to marine sediment	Contractor	Along CKR alignment	Construction stage	• ETWB TCW No. 34/2002	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• All vessels shall be sized such that adequate draft is maintained between vessels and the sea bed at all states of the tide to ensure that undue turbidity is not generated by turbulence from vessel movement or propeller wash; • Before moving the vessels which are used for transporting dredged material, excess material shall be cleaned from the decks and exposed fittings of vessels and the excess materials shall never be dumped into the sea except at the approved locations; • Adequate freeboard shall be maintained on barges to ensure that decks are not washed by wave action. • The Contractors shall monitor all vessels transporting material to ensure that no dumping outside the approved location takes place. The Contractor shall keep and produce logs and other records to demonstrate compliance and that journeys are consistent with designated locations and copies of such records shall be submitted to the engineers; • The Contractors shall comply with the conditions in the dumping license. • All bottom dumping vessels (Hopper barges) shall be fitted with tight fittings seals to their bottom openings to prevent leakage of material; • The material shall be placed into the disposal pit by bottom dumping; • Contaminated marine mud shall be transported by spit barge of not less than 750m^3 capacity and capable of rapid opening and discharge at the disposal site; • Discharge shall be undertaken rapidly, and the hoppers shall be closed immediately. Material adhering to the sides of the hopper shall not be washed out of the hopper and the hopper shall remain closed until the barge returns to the disposal site.						

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• For Type 3 special disposal treatment, sealing of contaminant with geosynthetic containment before dropping designated mud pit would be a possible arrangement. A geosynthetic containment method is a method whereby the sediments are sealed in geosynthetic containers and, the containers would be dropped into the designated contaminated mud pit where they would be covered by further mud disposal and later by the mud pit capping at the disposal site, thereby fulfilling the requirements for fully confined mud disposal.						
S7.5.1	WM6	<u>Chemical Waste</u> • Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in accordance with the Code of Practice on the Packaging, Labelling and Storage of Chemical Wastes; • Containers used for the storage of chemical wastes should be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed, have a capacity of less than 450 L unless the specification has been approved by EPD, and display a label in English and Chinese in accordance with instructions prescribed in Schedule 2 of the regulation; • The storage area for chemical wastes should be clearly labelled and used solely for the storage of chemical waste, enclosed on at least 3 sides, have an impermeable floor and bunding of sufficient capacity to accommodate 110% of the volume of the largest container or 20% of the total volume of waste stored in that area, whichever is the greatest, have adequate ventilation, covered to prevent rainfall entering, and arranged so that incompatible materials are adequately separated;	Control the chemical waste and ensure proper storage, handling and disposal	Contractor	All construction sites	Construction stage	• Waste Disposal (Chemical Waste) (General) Regulation • Code of Practice on the Packaging, Labelling and Storage of Chemical Waste	Implemented for the 2nd and 3rd bullet. N/A for other bullet.

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		• Disposal of chemical waste should be via a licensed waste collector, be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Centre which also offers a chemical waste collection service and can supply the necessary storage containers, or be to a reuser of the waste, under approval from EPD.						
S7.5.1	WM7	<u>General Refuse</u> • General refuse generated on-site should be stored in enclosed bins or compaction units separately from construction and chemical wastes; • A reputable waste collector should be employed by the Contractor to remove general refuse from the site, separately from construction and chemical wastes, on a daily basis to minimize odour, pest and litter impacts. Burning of refuse on construction sites is prohibited by law. • Aluminium cans are often recovered from the waste stream by individual collectors if they are segregated and made easily accessible. Separate labelled bins for their deposit should be provided if feasible; • Office wastes can be reduced through the recycling of paper if volumes are large enough to warrant collection. Participation in a local collection scheme should be considered by the Contractor.	Minimize production of the general refuse and avoid odour, pest and litter impacts	Contractor	All construction sites	Construction stage	• Waste Disposal Ordinance	Implemented.
Hazard to Life								
S9.18	H8	The driver and his assistant should be physically healthy, experienced and have good safe driving records. The driver should hold a proper driving licence for the approved transport truck. Dedicated training programme and regular road safety briefing sessions/ workshops should be provided to enhance their safe driving attitude and practice. Smoking should be strictly prohibited.	To reduce the risk during explosives transport	Contractor	Works areas at which explosives would be used	Construction stage	-	N/A
S9.18	H9	Emergency response plans in case of road accident should be prepared and implemented.	To reduce the risk during	Contractor	Works areas at which	Construction stage	-	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		The driver and his assistant should be familiar with the emergency procedures including evacuation, and proper communication/ fire-fighting equipment should be provided to the driver and his assistant.	explosives transport		explosives would be used			
Landscape & Visual								
S10.10.1 Table 10.11	LV3	Good Site Management • Large temporary stockpiles of excavated material shall be covered with unobtrusive sheeting to prevent dust and dirt spreading to adjacent landscape areas and vegetation, and to create a neat and tidy visual appearance. • Construction plant and building material shall be orderly and carefully stored in order to create a neat and tidy visual appearance.	Minimize visual impact	Contractor	Within Project site	Construction stage	-	Implemented for the 2nd bullet N/A for another bullet
S10.10.1 Table 10.11	LV4	Screen Hoarding • Decorative screen hoarding should be erected to screen the public from the construction area. It should be designed to be compatible with the existing urban context.	Minimize visual impact	Contractor	Within Project site	Construction stage	-	N/A
S10.10.1 Table 10.11	LV5	Lighting Control during Construction • All lighting in the construction site shall be carefully controlled to minimize light pollution and night-time glare to nearby residencies and GIC. The Contractor shall consider other security measures, which shall minimize the visual impacts.	Minimize visual impact	Contractor	Within Project site	Construction stage	-	N/A
S10.10.1 Table 10.11	LV6	Erosion Control • The potential for soil erosion shall be reduced by minimizing the extent of vegetation disturbance on site and by providing a protective cover over newly exposed soil.	Minimize landscape impact	Contractor	Within Project site	Construction stage	-	N/A
S10.10.1 Table 10.11	LV7	Tree Protection & Preservation • Carefully protected during construction. Tree protection measures will be detailed at the Tree Removal Application stage and plans submitted to the relevant Government Department for approval in due course in accordance with ETWB TC No. 3/2006.	Minimize landscape and visual impact	Contractor	Within Project site	Construction stage	• 'Guidelines for Tree Risk Management and Assessment Arrangement on an Area	N/A

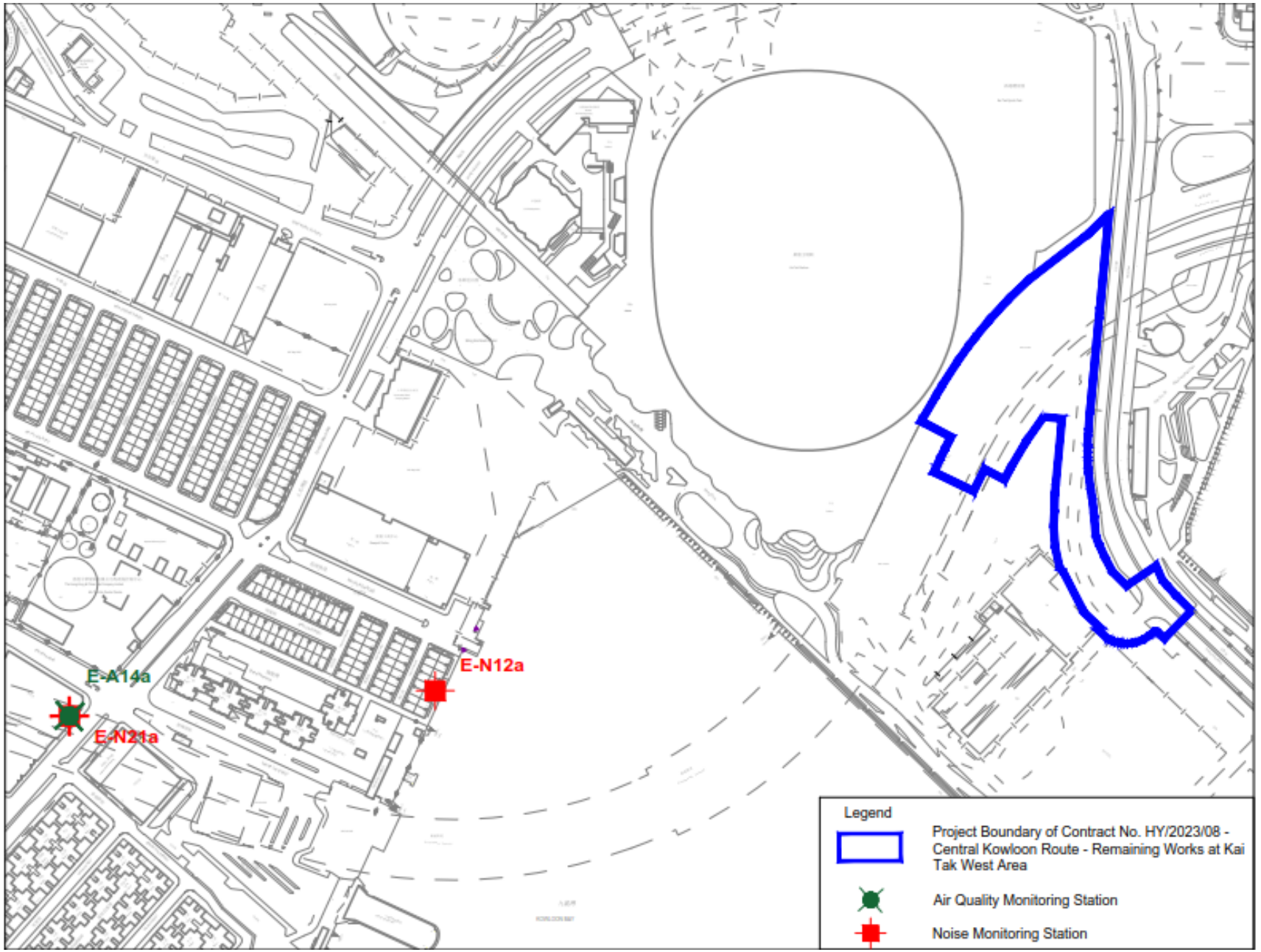
EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
							Basis and on a Tree Basis', Greening, Landscape and Tree Management (GLTM) Section, DEVB • Latest recommended horticultural practices from GLTM Section, DEVB	
S10.10.1 Table 10.11	LV8	<u>Tree Transplantation</u> • For trees unavoidably affected by the Project that have to be removed, where practical transplantation will be chosen as the top priority method of removal. If this is not possible or practical compensatory planting will be provided for trees unavoidably felled (See LV10). For trees unavoidably affected by the Project works that are transplanted, transplantation must be carried out in accordance with ETWB TCW 2/2004 and 3/2006.	Minimize landscape and visual impact	Contractor	Within Project site and designated off-site locations	Prior to Construction stage	• ETWB TCW 3/2006 • Latest recommended horticultural practices from Greening, Landscape and Tree Management (GLTM) Section, DEVB • ETWB TCW 2/2004	N/A
S10.10.1 Table 10.11	LV9	<u>Compensatory Planting</u> • For trees unavoidably affected by the Project that have to be removed, where practical transportation will be chosen as the top priority method of removal but if this is not possible or practical compensatory planting will be provided for trees unavoidably felled. All felled trees shall be compensated for by planting trees to the satisfaction of relevant Government projects. Required numbers and locations of compensatory trees shall be determined and agreed separately with Government during the	Minimize visual impact and also enhance landscape	Contractor	Within Project site	Construction stage	• ETWB TCW 3/2006 • Latest recommended horticultural practices from Greening, Landscape and Tree Management (GLTM) Section, DEVB	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
		Tree Felling Application process under ETWB TC 3/2006. • Compensatory tree planting may be incorporated into public open spaces and along roadside amenity areas affected by the construction works and therefore be part of the bigger wider planting plans. Onsite compensation planting is preferred but, if necessary, additional receptor sites outside the Works Area shall be agreed separately with the Government during the Tree Felling Application process.					• ETWB TCW 2/2004	
S10.10.1 Table 10.11	LV10	<u>Screen Planting</u> • Tall screen/buffer trees, shrubs and climbers should be planted, in so far as is possible, to soften and screen proposed structures such as roads and central strip, vertical edges and buildings and to enhance streetscape greening effect where appropriate. Indiscriminate use of trees for screening must be avoided and the principle of 'right tree for the right place' must be followed. This detail will be provided at the Detailed Design stage. This measure may additionally form part of the compensatory planting and will improve and create a pleasant pedestrian environment.	Minimize visual impact and also enhance landscape.	Contractor	Within Project Site	Construction Phase	• Guidelines on Greening of Noise Barriers, issued April 2012, GLTMS, DevB • ETWB TCW 2/2004	N/A
S10.10.1 Table 10.11	LV12	<u>Reinstatement</u> • All works areas, excavated areas and disturbed areas for tunnel construction and temporary road diversion or any other proposed works shall be reinstated to former conditions or better, with reasonable landscape treatment and to the satisfaction of the relevant Government departments. (Specific mitigation for disturbance to public open space is detailed separately under LV14.)	Minimize landscape impact	Contractor	Within Project Site	Construction Phase	• N/A	N/A

EIA Ref.	EM&A Log Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Agent	Location / Timing	Implementation Stage	Requirements and/ or standards to be achieved	Implementation Status
Cultural Heritage Impact (Construction Phase)								
S11.4.4	CH1	The contractor should be alerted during the construction on the possibility of locating archaeological remains and as a precautionary measure, AMO shall be informed immediately in case of discovery of antiquities or supposed antiquities in the subject sites.	To preserve any cultural heritage items which may be removed and damaged by the excavation	Contractor	During construction works for cut and cover tunnels	Construction stage	• AMOs requirements	N/A
EM&A Project								
S13.2	EM1	An Independent Environmental Checker needs to be employed as per the EM&A Manual	Control EM&A Performance	Highways Department	All construction sites	Construction stage	• EIAO Guidance Note No. 4/2010 • TM-EIAO	Implemented
S13.2-13.4	EM2	• An Environmental Team needs to be employed as per the EM&A Manual; • Prepare a systematic Environmental Management Plan to ensure effective implementation of the mitigation measures; • An environmental impact monitoring needs to be implemented by the Environmental Team to ensure all the requirements given in the EM&A Manual are fully complied with.	Perform environmental monitoring & auditing	Highways Department/ Contractor	All construction sites	Construction stage	• EIAO Guidance Note No. 4/2010 • TM-EIAO	Implemented

Appendix G

Location Plan of Air Quality and Noise Monitoring Station


E-A14a
E-N21a
E-N12a
Legend
Project Boundary of Contract No. HY/2023/08 - Central Kowloon Route - Remaining Works at Kai Tak West Area
Air Quality Monitoring Station
Noise Monitoring Station

Appendix H

Monitoring Schedule for the Reporting Month and Coming Month

Monitoring Schedule for the Reporting Month (December 2025)

Impact Monitoring Schedule for CKR RMW						
December-2025						
Sun	**Mon**	**Tue**	**Wed**	**Thur**	**Fri**	**Sat**
	1	**2**	**3**	**4**	**5**	**6**
				Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a		
7	**8**	**9**	**10**	**11**	**12**	**13**
			Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a			
14	**15**	**16**	**17**	**18**	**19**	**20**
		Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a				
21	**22**	**23**	**24**	**25**	**26**	**27**
	Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a					Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a
28	**29**	**30**	**31**			

Monitoring Schedule for the Coming Month (January 2026)

Impact Monitoring Schedule for CKR RMW						
January-2026						
Sun	**Mon**	**Tue**	**Wed**	**Thur**	**Fri**	**Sat**
				1	2	3
					Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a	
4	5	6	7	8	9	10
			Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a			
11	12	13	14	15	16	17
		Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a				
18	19	20	21	22	23	24
	Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a					Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a
25	26	27	28	29	30	31
					Impact Dust Monitoring for E-A14a Impact Noise Monitoring for E-N12a, E-N21a	

Appendix I

Calibration Certificates for Air Quality Monitoring Equipment

HIVOL SAMPLER CALIBRATION DATA SHEET (TSP)

Site Information

Location:	Merit Industrial Centre (Block B)	Site ID:	CKR RMW E-A14a	Cal Date:	28-Nov-2025
Serial No:	1087	Model:	TE-5170X	Operator:	Joe Ho

Ambient Condition

Actual Pressure during Calibration (P_a) (mm Hg):	763.5	Actual Temperature during Calibration (T_a) (deg K):	295.8

Calibration Orifice

Model:	TE-5025A	Slope (m_c):	2.07841
Serial No.:	4166	Intercept (b_c):	-0.01551
Calibration Due Date:	8-May-26	Corr. Coeff:	0.99992

Calibration Data

Plate or Test #	ΔH_2O (in)	Qa, X-Axis (m^3/min)	I, CFM (chart)	IC, Y-Axis (corrected)
18	13.60	1.792	53.0	53.32
13	10.80	1.598	47.0	47.28
10	8.10	1.385	41.0	41.25
7	5.00	1.090	30.0	30.18
5	3.20	0.873	28.0	28.17

Sampler Calibtation Relationship (Qa on x-axis, IC on y-axis)

m= 28.7978 b= 1.2269 Corr. Coeff= 0.9900

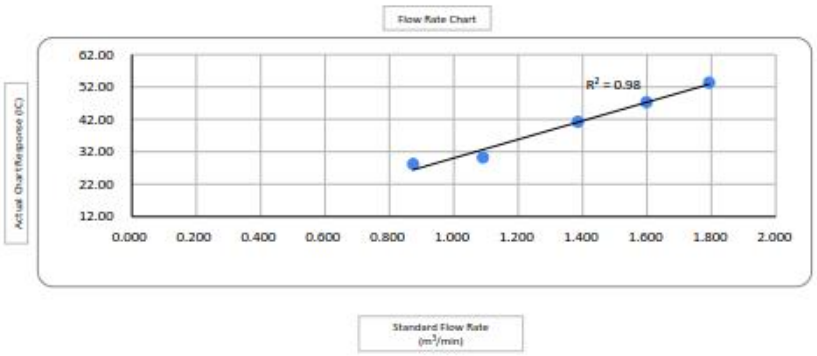
Calculations

$Qa = 1/m_c * [Sqrt (\Delta H_2O * (P_a/P_{Std}) * (T_{Std}/T_a)) - b_c]$

$IC = I * (Sqrt (P_a/P_{Std}) * (T_{Std}/T_a))$

Qa = actual flow rate
IC = corrected chart response
I = actual chart response
m_c = calibrator slope
b_c = calibrator intercept

m = sampler slope
b = sampler intercept
T_{Std} = 298 deg K
P_{Std} = 760 mm Hg
T_a = actual temperature during calibration (deg K)
P_a = actual pressure during calibration (mm Hg)



Checked by: Joe Ho
Lead Consultant

Date: 28-Nov-2025

TISCH Environmental

RECALIBRATION DUE DATE:
May 8, 2026

Certificate of Calibration

Calibration Certification Information					
Cal. Date:	May 8, 2025	**Rootsmeter S/N:** 438320	**Ta:** 294	°K	
Operator:	Jim Tisch		**Pa:** 750.8	mm Hg	
Calibration Model #:	TE-5025A	**Calibrator S/N:** **4166**			

Run	Vol. Init (m3)	Vol. Final (m3)	ΔVol. (m3)	ΔTime (min)	ΔP (mm Hg)	ΔH (in H2O)
1	1	2	1	1.4520	3.2	2.00
2	3	4	1	1.0200	6.4	4.00
3	5	6	1	0.9110	8.0	5.00
4	7	8	1	0.8740	8.8	5.50
5	9	10	1	0.7190	12.9	8.00

Data Tabulation

Vstd (m3)	Qstd (x-axis)	$\sqrt{\Delta H\left(\frac{Pa}{Pstd}\right)\left(\frac{Tstd}{Ta}\right)}$ (y-axis)	Va	Qa (x-axis)	$\sqrt{\Delta H\left(Ta/Pa\right)}$ (y-axis)
0.9971	0.6867	1.4152	0.9957	0.6858	0.8850
0.9928	0.9734	2.0014	0.9915	0.9720	1.2515
0.9907	1.0875	2.2376	0.9893	1.0860	1.3992
0.9896	1.1323	2.3468	0.9883	1.1308	1.4675
0.9842	1.3688	2.8304	0.9828	1.3669	1.7699
QSTD	**m=**	**2.07841**	**QA**	**m=**	**1.30146**
	b=	**-0.01551**		**b=**	**-0.00970**
	r=	**0.99992**		**r=**	**0.99992**

Calculations

Vstd=	ΔVol((Pa-ΔP)/Pstd)(Tstd/Ta)	**Va=**	ΔVol((Pa-ΔP)/Pa)
Qstd=	Vstd/ΔTime	**Qa=**	Va/ΔTime

For subsequent flow rate calculations:

Qstd= $1/m\left(\left(\sqrt{\Delta H\left(\frac{Pa}{Pstd}\right)\left(\frac{Tstd}{Ta}\right)}\right)-b\right)$

Qa= $1/m\left(\left(\sqrt{\Delta H\left(Ta/Pa\right)}\right)-b\right)$

Standard Conditions	
Tstd:	298.15 °K
Pstd:	760 mm Hg

Key
ΔH: calibrator manometer reading (in H2O)
ΔP: rootsmeter manometer reading (mm Hg)
Ta: actual absolute temperature (°K)
Pa: actual barometric pressure (mm Hg)
b: intercept
m: slope

RECALIBRATION
US EPA recommends annual recalibration per 1998 40 Code of Federal Regulations Part 50 to 51, Appendix B to Part 50, Reference Method for the Determination of Suspended Particulate Matter in the Atmosphere, 9.2.17, page 30

Tisch Environmental, Inc.
145 South Miami Avenue
Village of Cleves, OH 45002

www.tisch-env.com
TOLL FREE: (877)263-7610
FAX: (513)467-9009

Aurecon Hong Kong Limited
Unit 1608, 16/F, Tower B, Manulife Financial Centre,
223 – 231 Wai Yip Street, Kwun Tong,
Kowloon Hong Kong S. A. R

Certification of Calibration

Information of Unit-under-test (UUT)

Date of Calibration:	**15-Aug-2025 and 21-Aug-2025**	Next Calibration Date:	**15-Aug-26**
UUT Manufacturer:	Sibata	UUT Model No.:	LD-5R
UUT Serial No.:	467361	Report Reference No.:	RPT-25-HVS-0162
Calibration Location:	Tung Chung East		

Information of Reference Equipment

Reference Equipment Manufacturer:	Tisch Environmental	Tisch Environmental
Reference Equipment Model No.:	TE-5170X	TE-5025A
Reference Equipment Serial No.:	1086	3465
Last Calibration Date:	15-Aug-25	2-Dec-24
Next Calibration Date:	15-Oct-25	2-Dec-25

Calibration of 1-Hour TSP Result

Calibration Point	Results from UUT	Results from Standard Equipment
	Mass Concentration (µg/m³) X-axis	Reference Concentration (µg/m³) Y-axis
1	108	106
2	130	128
3	118	117
4	152	150
5	138	139
6	119	115
Average	128	126

Linear Regression of Y on X

Slope, mv: **1.0402** Intercept: **-6.5889** *Correlation Coefficient: **0.9952**

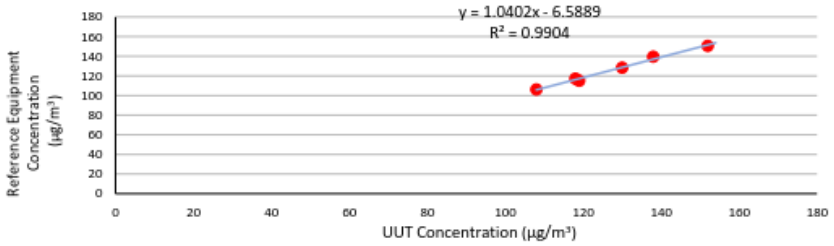
Verification Test Result: Strong Correlation, Results were accepted.

* If the Correlation Coefficient < 0.90, check and recalibrate.

Set Calibration Factor

Particulate Concentration by Reference Equipment (µg/m³):	126
Particulate Concentration by UUT (µg/m³):	128
Measuring Time, (min):	60
K Factor = High Volume Sampler / UUT, (µg/m³):	0.99

Correlation Curve



Operated By: Andy Li
Project Technician, Environmental
Signature:
Date: 28-08-2025

Checked By: Joe Ho
Lead Consultant, Environmental
Signature:
Date: 28-08-2025

Appendix J

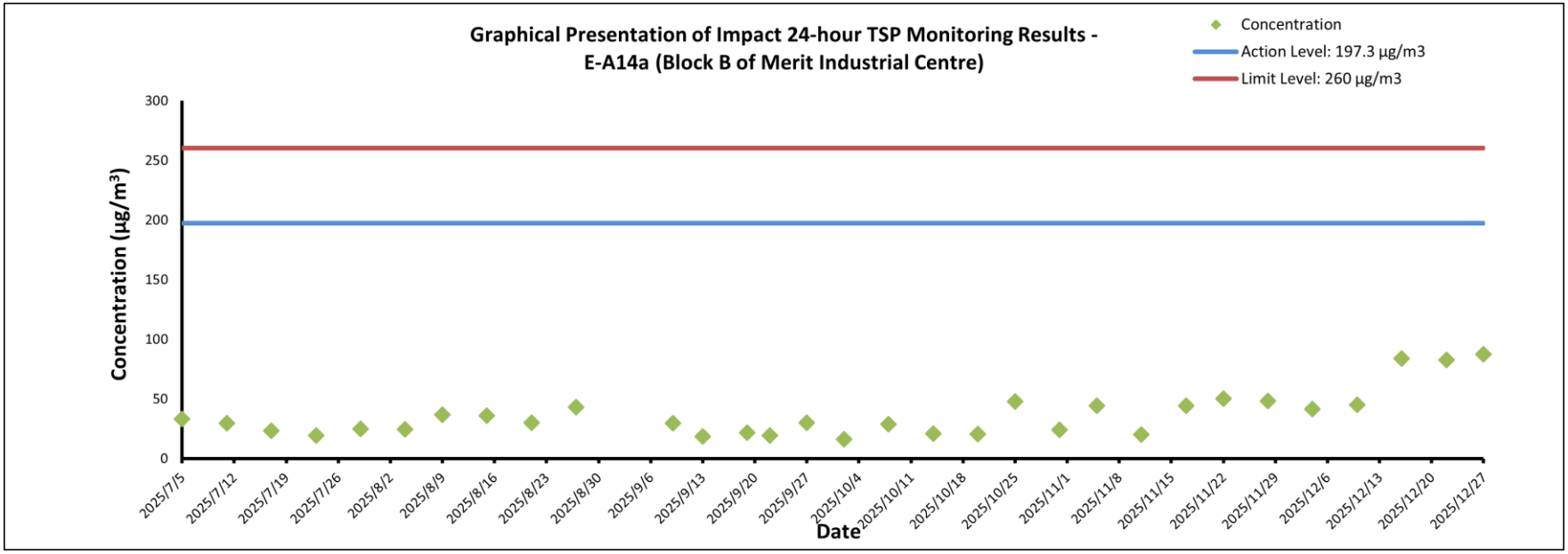
Air Quality Monitoring Results and their Graphical Presentations

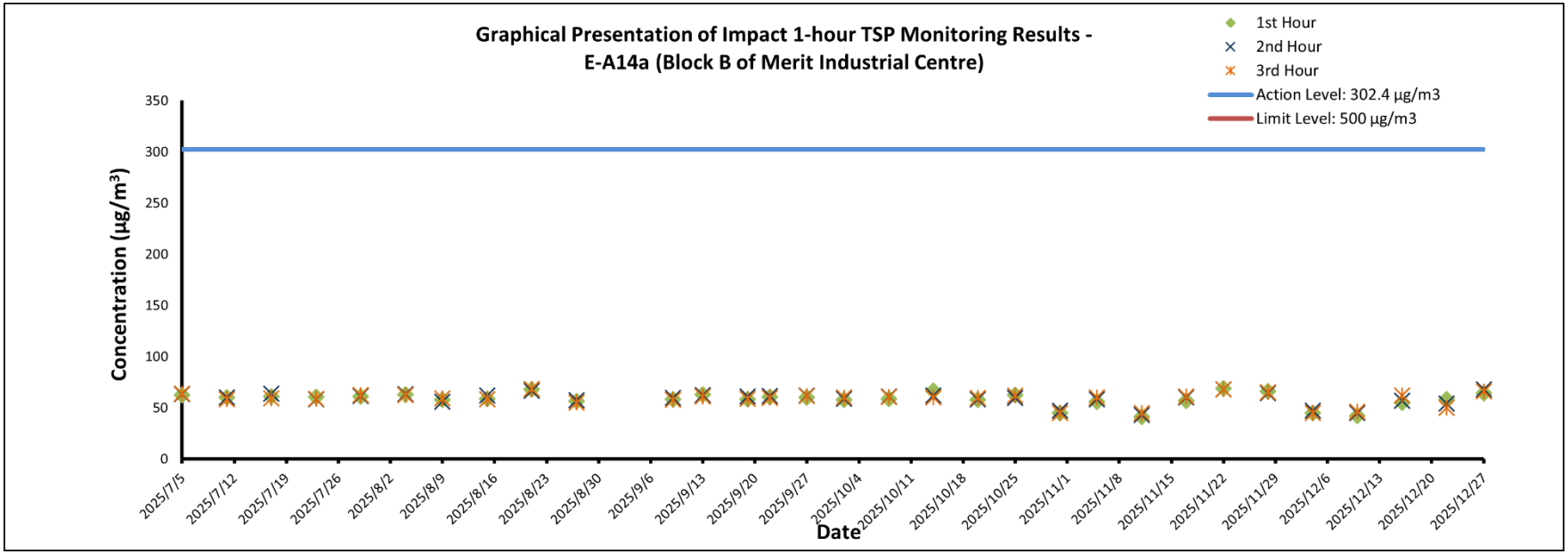
Summary of 24-hour TSP Monitoring Results at Location E-A14a (Block B of Merit Industrial Centre)

Start Date	Weather Condition	Elapse Time			Chart Reading			Avg Air Temp	Avg Atmospheric Pressure	Flow Rate	Standard Air Volume	Filter Weight (g)		Particulate weight	Conc.
		Initial	Final	Actual (min)	Min	Max	Avg	(°C)	(hPa)	(m^3/min)	(m^3)	Initial	Final	(g)	(µg/m^3)
2025-12-04	Sunny	6319.23	6343.23	1440.0	36	36	36.0	19.8	1021.4	1.27	1830	2.7234	2.8579	0.1345	73
2025-12-10	Cloudy	6345.04	6369.04	1440.0	36	38	37.0	20.8	1018.8	1.29	1865	2.7426	2.8551	0.1125	60
2025-12-16	Fine	6370.15	6394.15	1440.0	36	38	37.0	20.1	1019.7	1.30	1868	2.7290	2.8611	0.1321	71
2025-12-22	Cloudy	6395.50	6419.50	1440.0	36	38	37.0	19.7	1018.9	1.30	1868	2.7205	2.8016	0.0811	43
2025-12-27	Fine	6420.96	6444.96	1440.0	38	38	38.0	16.8	1020.1	1.33	1919	2.7229	2.8395	0.1166	61
										Maximum:	73	µg/m^3	Minimum:	43	µg/m^3

Summary of 1-hour TSP Monitoring Results at Location E-A14a (Block B of Merit Industrial Centre)

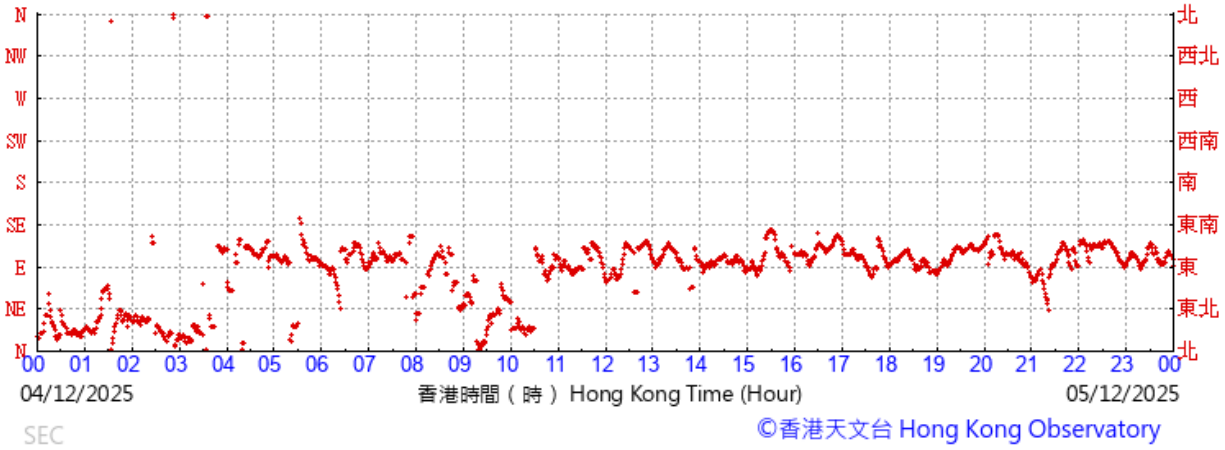
Date	Weather	1st Hour Sampling Time	2nd Hour Sampling Time	3rd Hour Sampling Time	1st Hour Conc. (µg/m^3)	2nd Hour Conc. (µg/m^3)	3rd Hour Conc. (µg/m^3)
2025-12-04	Sunny	8:58	9:58	10:58	69	62	56
2025-12-10	Fine	9:38	10:38	11:38	48	32	49
2025-12-16	Sunny	8:02	9:02	10:02	37	41	47
2025-12-22	Cloudy	8:36	9:36	10:36	66	72	70
2025-12-27	Fine	10:18	11:18	12:18	57	51	56
					Maximum	72	µg/m^3
					Minimum	32	µg/m^3


Graphical Presentation of Impact 24-hour TSP Monitoring Results -
E-A14a (Block B of Merit Industrial Centre)
Concentration
Action Level: 197.3 µg/m3
Limit Level: 260 µg/m3
Concentration (µg/m³)
300
250
200
150
100
50
0
2025/7/5
2025/7/12
2025/7/19
2025/7/26
2025/8/2
2025/8/9
2025/8/16
2025/8/23
2025/8/30
2025/9/6
2025/9/13
2025/9/20
2025/9/27
2025/10/4
2025/10/11
2025/10/18
2025/10/25
2025/11/1
2025/11/8
2025/11/15
2025/11/22
2025/11/29
2025/12/6
2025/12/13
2025/12/20
2025/12/27
Date

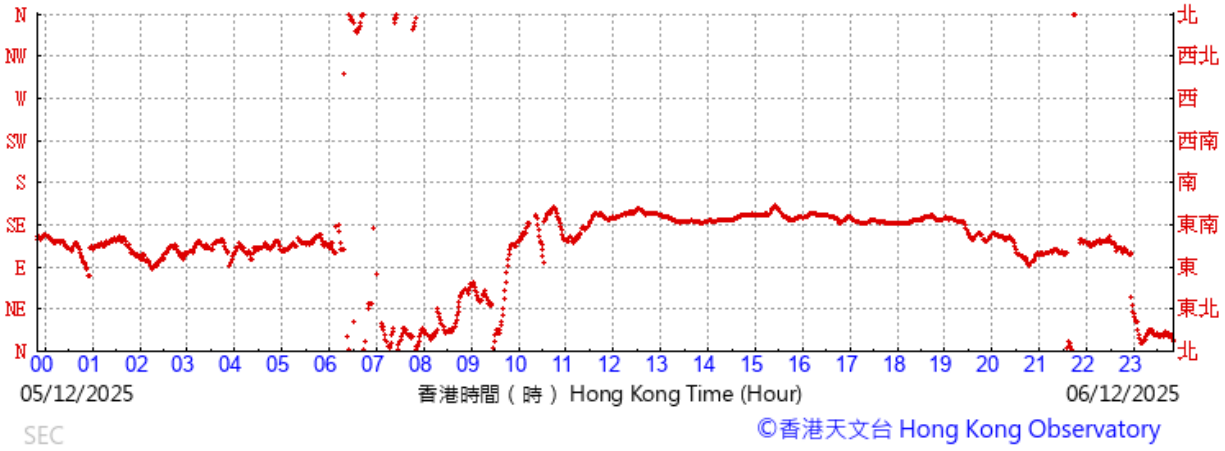

Graphical Presentation of Impact 1-hour TSP Monitoring Results -
E-A14a (Block B of Merit Industrial Centre)
1st Hour
2nd Hour
3rd Hour
Action Level: 302.4 µg/m3
Limit Level: 500 µg/m3
Concentration (µg/m³)
350
300
250
200
150
100
50
0
2025/7/5
2025/7/12
2025/7/19
2025/7/26
2025/8/2
2025/8/9
2025/8/16
2025/8/23
2025/8/30
2025/9/6
2025/9/13
2025/9/20
2025/9/27
2025/10/4
2025/10/11
2025/10/18
2025/10/25
2025/11/1
2025/11/8
2025/11/15
2025/11/22
2025/11/29
2025/12/6
2025/12/13
2025/12/20
2025/12/27
Date

Data of Wind Direction Extracted from Kai Tak Wind Station of the Hong Kong Observatory

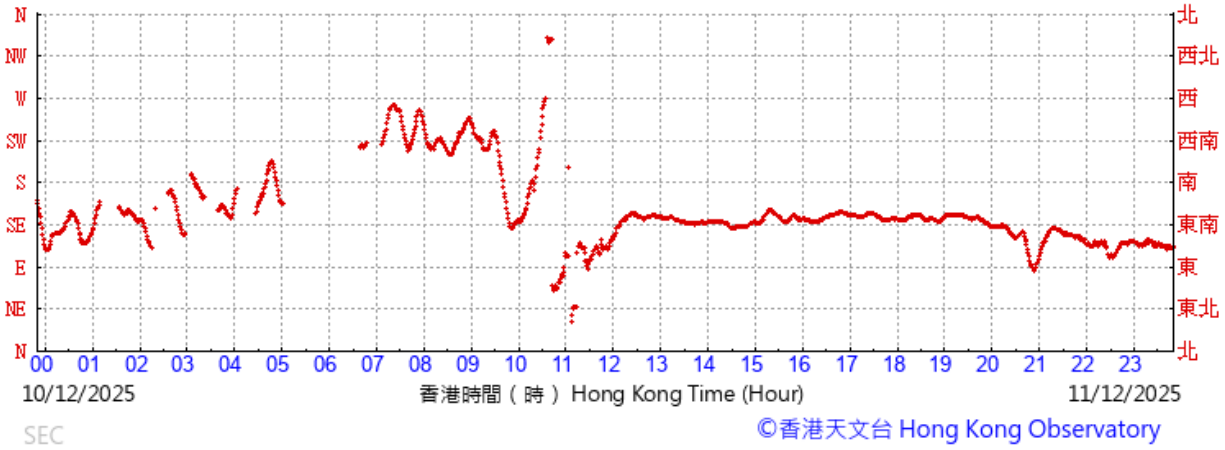
(於香港時間05/12/2025 00 時 00 分更新) (Updated at 00:00H on 05/12/2025)



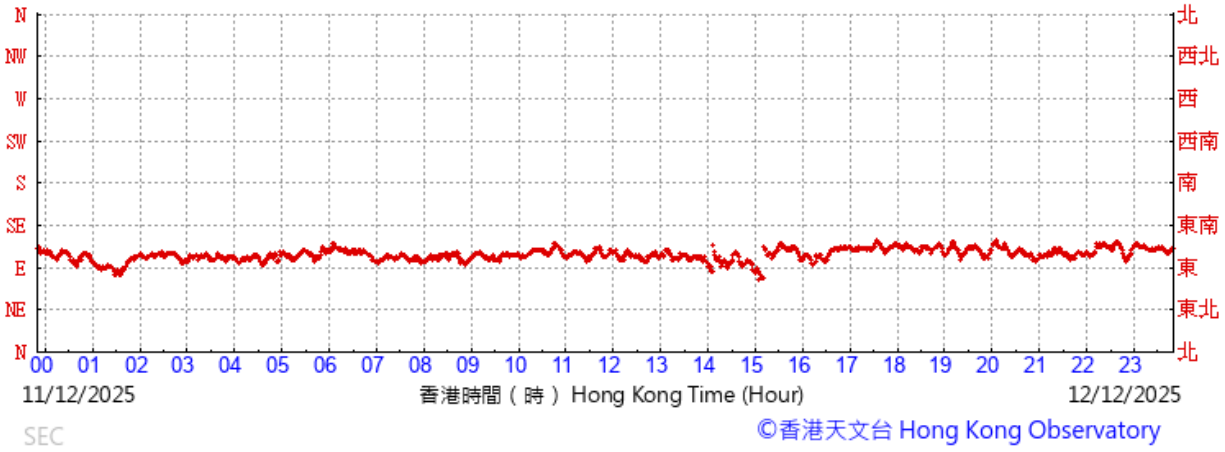
(於香港時間06/12/2025 23 時 50 分更新) (Updated at 23:50H on 06/12/2025)



(於香港時間11/12/2025 23 時 50 分更新) (Updated at 23:50H on 11/12/2025)



(於香港時間12/12/2025 23 時 50 分更新) (Updated at 23:50H on 12/12/2025)



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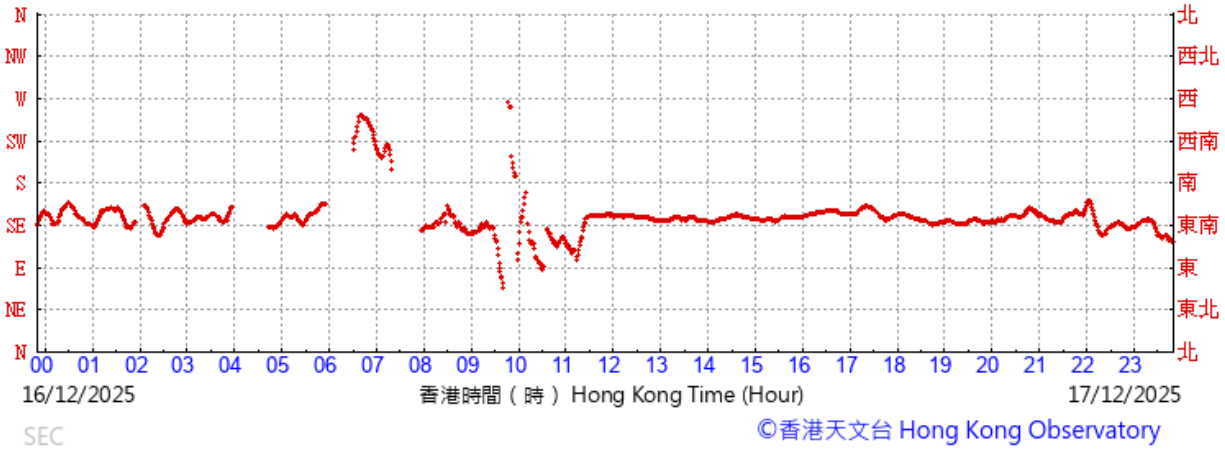

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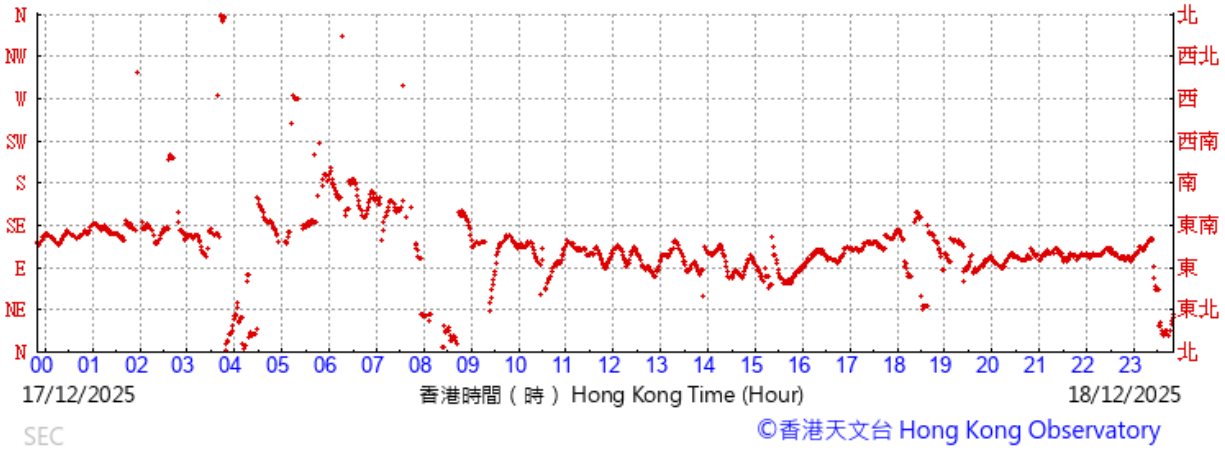

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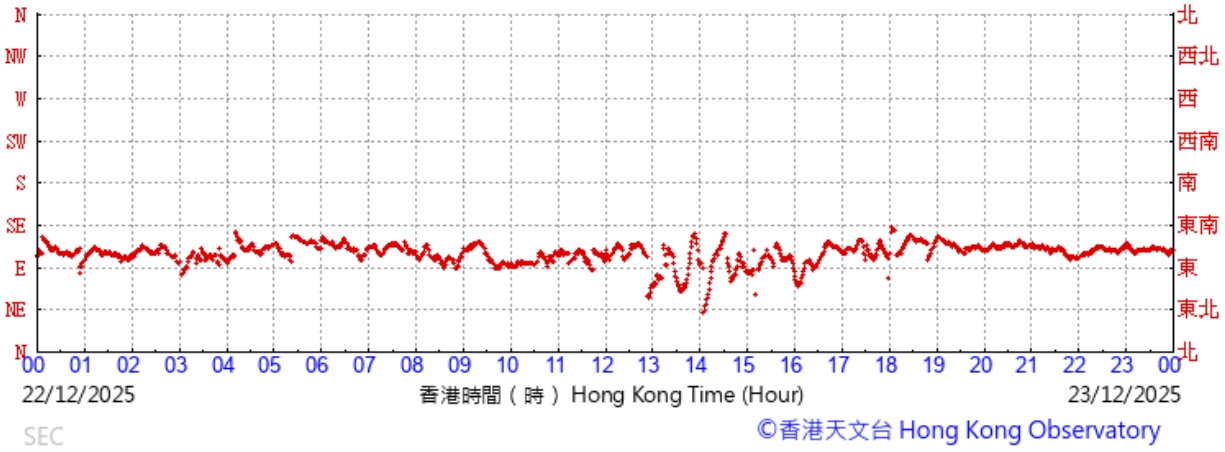
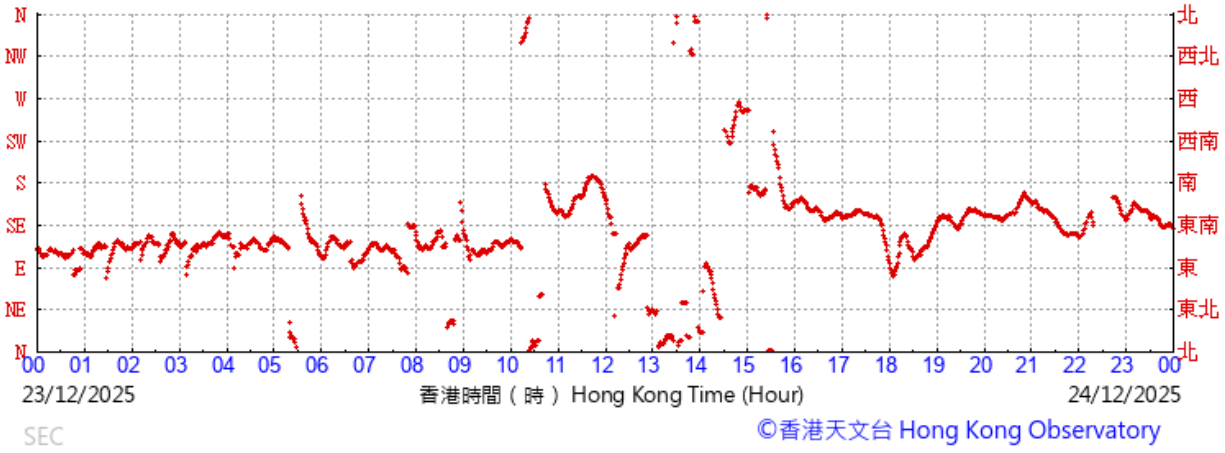


SEC

(於香港時間24/12/2025 00 時 00 分更新) (Updated at 00:00H on 24/12/2025)



SEC

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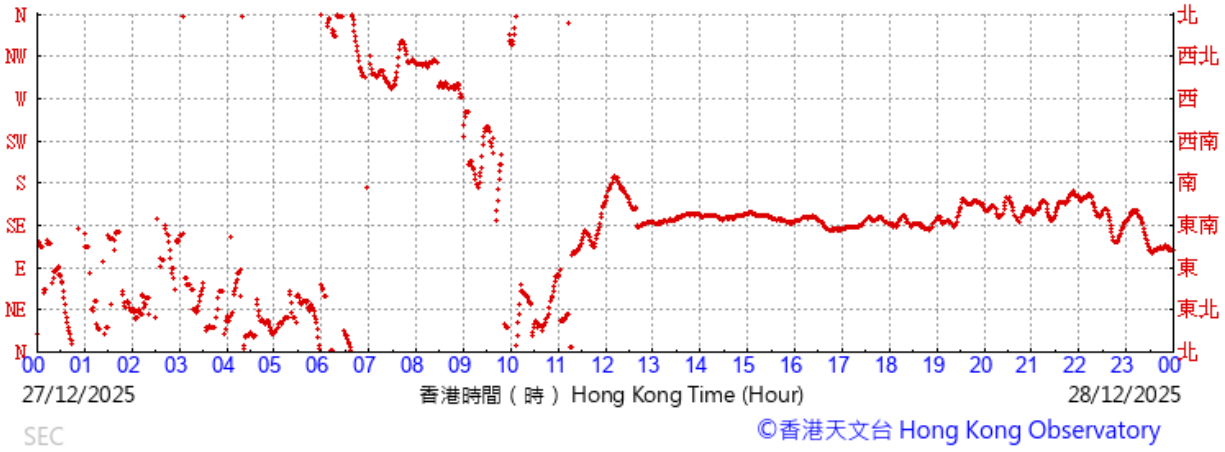

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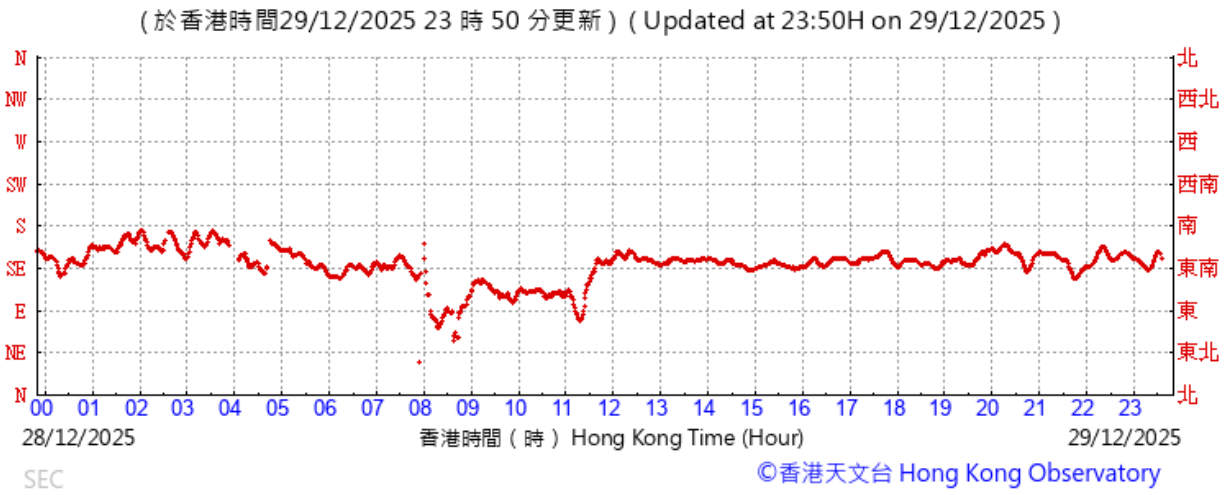
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N
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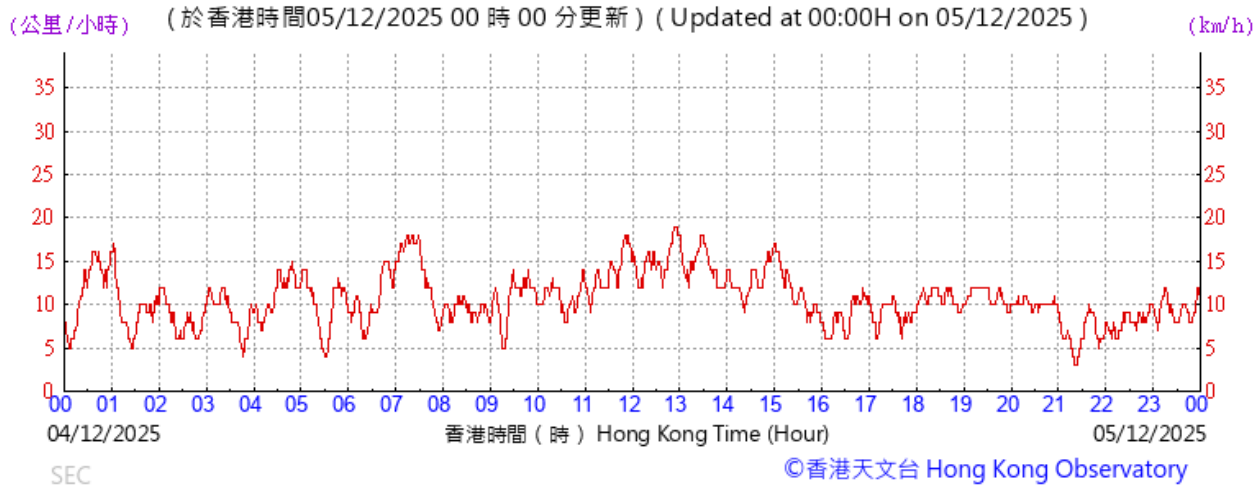
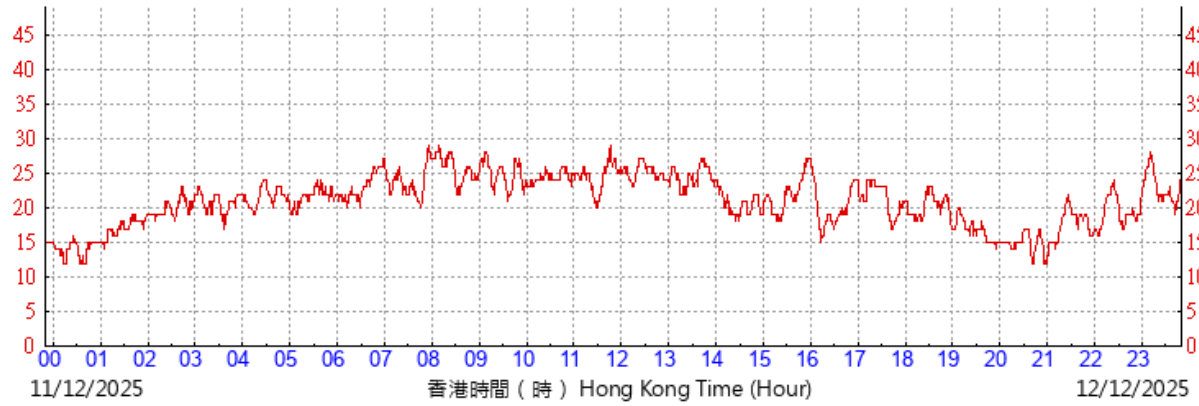
00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 20 21 22 23
28/12/2025
香港時間 (時) Hong Kong Time (Hour)
29/12/2025
SEC
©香港天文台 Hong Kong Observatory

Data of Wind Speed Extracted from Kai Tak Wind Station of the Hong Kong Observatory



(公里/小時) (於香港時間12/12/2025 23 時 50 分更新) (Updated at 23:50H on 12/12/2025) (km/h)



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(公里/小時) (於香港時間17/12/2025 23 時 50 分更新) (Updated at 23:50H on 17/12/2025) (km/h)

SEC

(公里/小時) (於香港時間18/12/2025 23 時 50 分更新) (Updated at 23:50H on 18/12/2025) (km/h)

SEC


(公里/小時)
(於香港時間23/12/2025 00 時 00 分更新) (Updated at 00:00H on 23/12/2025)
(km/h)
50
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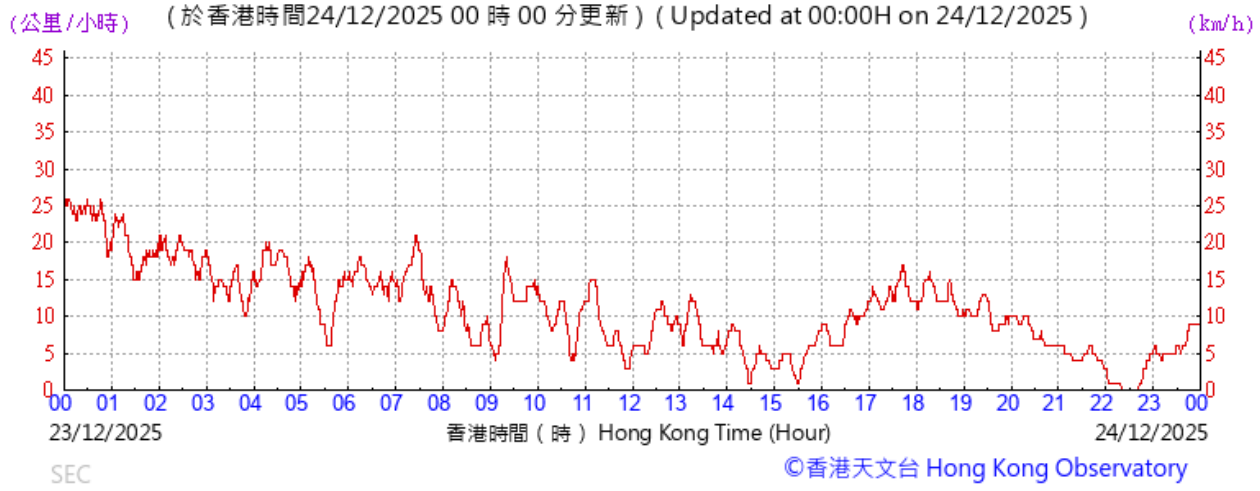
00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 20 21 22 23 00
22/12/2025
香港時間 (時) Hong Kong Time (Hour)
23/12/2025
SEC
©香港天文台 Hong Kong Observatory


(公里/小時)
(於香港時間24/12/2025 00 時 00 分更新) (Updated at 00:00H on 24/12/2025)
(km/h)
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23/12/2025
香港時間 (時) Hong Kong Time (Hour)
24/12/2025
SEC
©香港天文台 Hong Kong Observatory


(公里/小時)
(於香港時間28/12/2025 23 時 50 分更新) (Updated at 23:50H on 28/12/2025)
(km/h)
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27/12/2025
香港時間 (時) Hong Kong Time (Hour)
28/12/2025
SEC
©香港天文台 Hong Kong Observatory


(公里/小時)
(於香港時間29/12/2025 23 時 50 分更新) (Updated at 23:50H on 29/12/2025)
(km/h)
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30
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00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 20 21 22 23
28/12/2025
香港時間 (時) Hong Kong Time (Hour)
29/12/2025
SEC
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Appendix K

Calibration Certificates for Noise Monitoring Equipment

(A+A)*L Acoustics and Air Testing Laboratory Co. Ltd.
聲學及空氣測試實驗室有限公司

Certificate of Calibration

for

Description:	***Sound Level Meter***
Manufacturer:	***NTi***
Type No.:	***XL3 (Serial No.: A3A-01229-F0)***
Microphone:	***MC230A (Serial No.: A28290)***
Preamplifier:	***MA230 (Serial No.:1794)***

Submitted by:

Customer:	*Aurecon Hong Kong Limited*
Address:	*Unit 1608, 16/F, Tower B,*
	Manulife Financial Centre,
	223-231 Wai Yip Street, Kwun Tong,
	Kowloon, Hong Kong

Upon receipt for calibration, the instrument was found to be:

☑ **Within (31.5Hz – 8kHz)**
☐ **Outside**

the allowable tolerance.

The test equipment used for calibration are traceable to National Standards via:
- The Government of The Hong Kong Special Administrative Region Standard & Calibration Laboratory

Date of receipt: 23 July 2025

Date of calibration: 24 July 2025

Date of NEXT calibration: 23 July 2026

Calibrated by: _____
Calibration Technician

Certified by: _____
Mr. Ng Yan Wa
Laboratory Manager

Date of issue: 24 July 2025

Certificate No.: APJ25-046-CC001

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

1. *Calibration Precaution:*

- The unit-under-test (UUT) was allowed to stabilize in the laboratory for over 24 hours, and switched on to warm up for over 10 minutes before the commencement of the test.
- The results presented are the mean of 3 measurements at each calibration point.

2. *Calibration Conditions:*

Air Temperature:	24.6 °C
Air Pressure:	1006 hPa
Relative Humidity:	57.8 %

3. *Calibration Equipment:*

	Type	Serial No.	Calibration Report Number	Traceable to
Multifunction Calibrator	B&K 4226	2288467	AV240081	HOKLAS

4. *Calibration Results*

Sound Pressure Level

Reference Sound Pressure Level

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dBA SPL	Fast	94	1000	94.0	±0.4

Linearity

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dBA SPL	Fast	94	1000	94.0	Ref
			104		104.0	±0.3
			114		114.0	±0.3

Time Weighting

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dBA SPL	Fast	94	1000	94.0	Ref
		Slow			94.0	±0.3

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

Frequency Response

Linear Response

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dB SPL	Fast	94	31.5	94.3	±2.0
				63	94.2	±1.5
				125	94.2	±1.5
				250	94.1	±1.4
				500	94.1	±1.4
				1000	94.0	Ref
				2000	94.0	±1.6
				4000	93.9	±1.6
				8000	91.7	+2.1; -3.1

A-weighting

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dBA SPL	Fast	94	31.5	54.9	-39.4 ±2.0
				63	68.0	-26.2 ±1.5
				125	78.1	-16.1 ±1.5
				250	85.5	-8.6 ±1.4
				500	90.9	-3.2 ±1.4
				1000	94.0	Ref
				2000	95.2	+1.2 ±1.6
				4000	94.9	+1.0 ±1.6
				8000	90.5	-1.1+2.1; -3.1

C-weighting

Setting of Unit-under-test (UUT)			Applied value		UUT Reading,	IEC 61672 Class 1
Range, dB	Freq. Weighting	Time Weighting	Level, dB	Frequency, Hz	dB	Specification, dB
20-120	dBC SPL	Fast	94	31.5	91.3	-3.0 ±2.0
				63	93.4	-0.8 ±1.5
				125	94.0	-0.2 ±1.5
				250	94.1	-0.0 ±1.4
				500	94.2	-0.0 ±1.4
				1000	94.0	Ref
				2000	93.9	-0.2 ±1.6
				4000	93.1	-0.8 ±1.6
				8000	88.6	–3.0 +2.1: –3.1

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

5. *Calibration Results Applied*

The results apply to the particular unit-under-test only. All calibration points are within manufacture's specification as IEC 61672 Class 1.

Uncertainties of Applied Value:

94 dB	31.5 Hz	± 0.05
	63 Hz	± 0.05
	125 Hz	± 0.05
	250 Hz	± 0.05
	500 Hz	± 0.05
	1000 Hz	± 0.05
	2000 Hz	± 0.05
	4000 Hz	± 0.05
	8000 Hz	± 0.10
104 dB	1000 Hz	± 0.05
114 dB	1000 Hz	± 0.05

The uncertainties are evaluated for a 95% confidence level.

Note:
The values given in this certification only related to the values measured at the time of the calibration and any uncertainties quoted will not allow for the equipment long-term drift, variations with environmental changes, vibration and shock during transportation, overloading, mis-handling, or the capability of any other laboratory to repeat the calibration. (A+A)*L shall not be liable for any loss or damage resulting from the use of the equipment.

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

(A+A)*L Acoustics and Air Testing Laboratory Co. Ltd.
聲學及空氣測試實驗室有限公司

Certificate of Calibration

for

Description:	***Sound Level Calibrator***
Manufacturer:	***RION***
Type No.:	***NC-75***
Serial No.:	***34724244***

Submitted by:

Customer:	*Aurecon Hong Kong Limited*
Address:	*Unit 1608, 16/F, Tower B,*
	Manulife Financial Centre,
	223-231 Wai Yip Street, Kwun Tong,
	Kowloon, Hong Kong

Upon receipt for calibration, the instrument was found to be:

☑ **Within**
☐ **Outside**

the allowable tolerance.

The test equipments used for calibration are traceable to National Standards via:
- The Government of The Hong Kong Special Administrative Region Standard & Calibration Laboratory

Date of receipt: 10 July 2025

Date of calibration: 11 July 2025

Date of NEXT calibration: 10 July 2026

Calibrated by: _____
Calibration Technician

Certified by: _____
Mr. Ng Yan Wa
Laboratory Manager

Date of issue: 11 July 2025

Certificate No.: APJ25-045-CC001

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

1. *Calibration Precautions:*

- The unit-under-test (UUT) was allowed to stabilize in the laboratory for over 24 hours, and switched on to warm up for over 10 minutes before the commencement of the test.
- The results presented are the mean of 3 measurements at each calibration point.

2. *Calibration Specifications:*

Calibration check

3. *Calibration Conditions:*

Air Temperature:	24.6 **°C**
Air Pressure:	1006 **hPa**
Relative Humidity:	57.5 **%**

4. *Calibration Equipment:*

Test Equipment	Type	Serial No.	Calibration Report Number	Traceable to
Multifunction Calibrator	B&K 4226	2288467	AV240081	HOKLAS
Sound Level Meter	RION NA-28	30721812	AV240109	HOKLAS

5. *Calibration Results*

5.1 Sound Pressure Level

Nominal value dB	Accept lower level dB	Accept upper level dB	Measured value dB
94.0	93.6	94.4	94.0

Note:
The values given in this certification only related to the values measured at the time of the calibration.

Room 422,Leader Industrial Centre,57-59 Au Pui Wan Street ,Fo Tan, Shatin,N.T.,Hong Kong
Tel: (852) 2668 3423 Fax:(852) 2668 6946
Homepage: http://www.aa-lab.com E-mail : inquiry@aa-lab.com

Appendix L

Noise Monitoring Results and their Graphical Presentations

Daytime Nosie Monitoring Results at Location E-N12a (Hing Yan Street No.19)

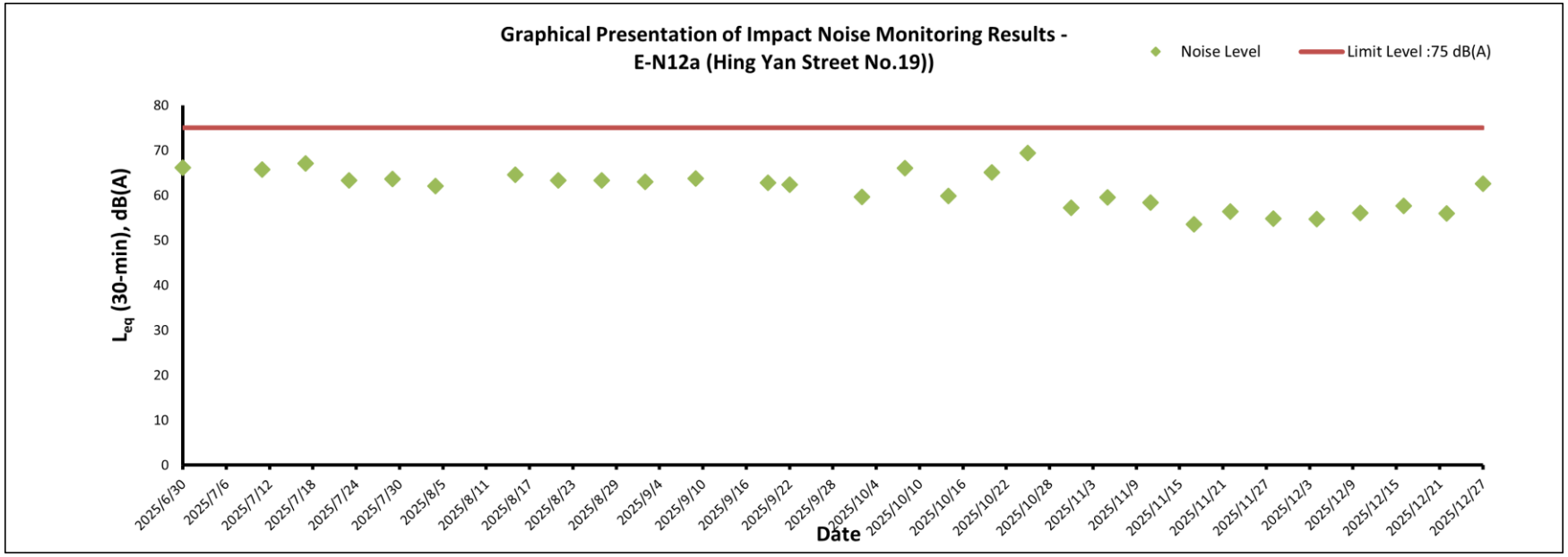
Date	Time			Weather	Noise Level for 30-min, dB(A) [1]			Limit Level, dB(A)
					L_{eq}	L_{10}	L_{90}	
2025-12-04	9:57	-	10:27	Sunny	54.7	55.6	50.9	75.0
2025-12-10	10:33	-	11:03	Fine	56.1	56.2	54.2	75.0
2025-12-16	8:57	-	9:27	Sunny	57.6	59.7	54.2	75.0
2025-12-22	9:39	-	10:09	Cloudy	55.9	57.2	52.0	75.0
2025-12-27	11:12	-	11:42	Fine	62.6	66.1	53.6	75.0

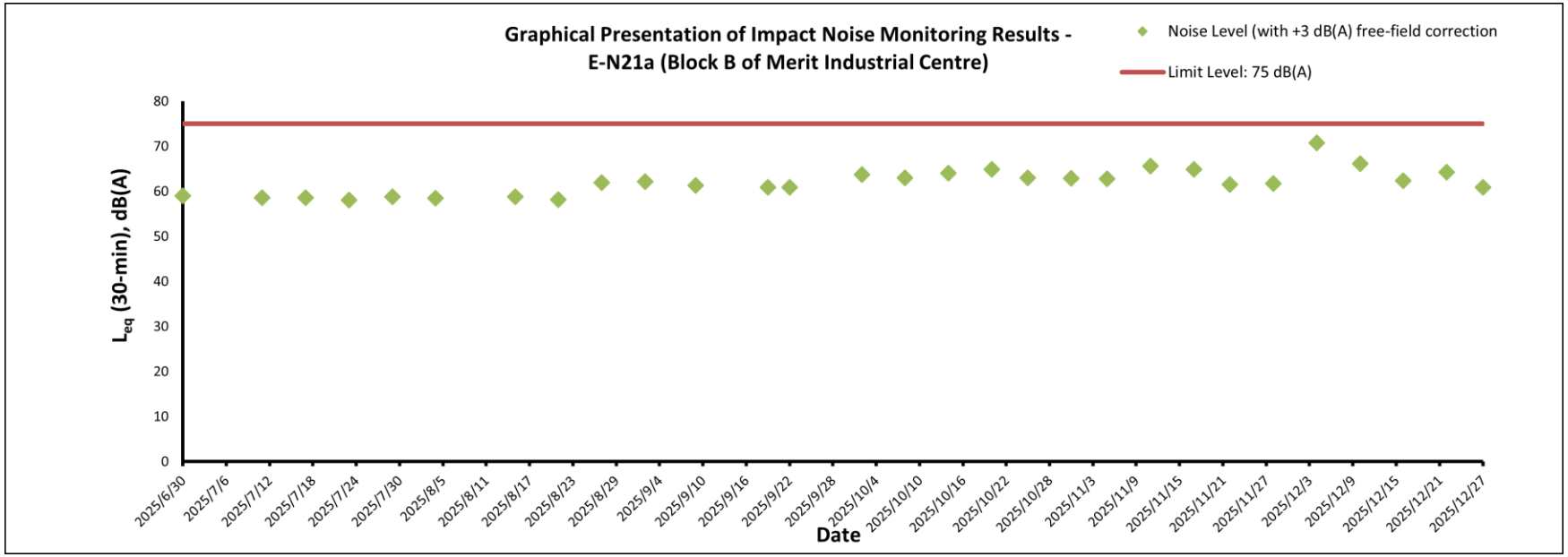
Remark:
1) Type of measurement: Façade measrement
2) Major noise source: Traffic noise and construction noise from near by construction

Daytime Nosie Monitoring Results at Location E-N21a (Block B of Merit Industrial Centre)

Date	Time			Weather	Noise Level for 30-min, dB(A) [1]			Limit Level, dB(A)
					L_{eq}	L_{10}	L_{90}	
2025-12-04	8:53	-	9:23	Sunny	70.7	73.0	66.4	75.0
2025-12-10	9:42	-	10:12	Cloudy	66.1	64.7	61.0	75.0
2025-12-16	8:07	-	8:37	Fine	62.3	63.7	60.0	75.0
2025-12-22	8:38	-	9:08	Cloudy	64.2	66.6	61.1	75.0
2025-12-27	10:21	-	10:51	Fine	60.9	62.7	55.7	75.0

Remark:
1) A correction of +3.0 dB(A) was made to the free-field measurement.
2) Major noise source: Traffic noise and construction noise from near by construction


Graphical Presentation of Impact Noise Monitoring Results -
E-N12a (Hing Yan Street No.19))
Noise Level
Limit Level :75 dB(A)
L_{eq} (30-min), dB(A)
Date


Graphical Presentation of Impact Noise Monitoring Results -
E-N21a (Block B of Merit Industrial Centre)
Noise Level (with +3 dB(A) free-field correction
Limit Level: 75 dB(A)
L_{eq} (30-min), dB(A)
Date

Appendix M

Waste Flow Table

Contract No: HY/2023/08

Central Kowloon Route - Remaining Works

Name of Department : Highways Department

Contract No./ Work Order No. : HY/2023/08
Contract Name: Central Kowloon Route - Remaining Works
Contractor: Build King - Tung Lee Joint Venture
Trip Ticket Account (Main Account): 7051793

Monthly Summary Waste Flow Table for 2025 (in Weight) - Kai Tak Area

updated on: 08-Jan-2026
record as at: 31-Dec-2025

(All quantities shall be rounded off to 3 decimal places)

Month	Actual Quantities of Inert C&D Materials Generated / Imported (in '000 kg)						Actual Quantities of Other C&D Materials / Wastes Generated				
	Total Quantities Generated [a+b+c+d+e+f+g+h+i)	Broken Concrete (including rock for recycling into aggregates) (a)	Reused in the Contract (b)	Reused in Other Projects (c)	Disposed as Public Fill (d)	Imported C&D Material	Metal (e) (in '000kg)	Paper/ Cardboard Packaging (f) (in '000kg)	Plastic (g) (bottles/containers, plastic sheets/ foams from package material) (in '000kg)	Chemical Waste (h) (in '000kg)	Others (i) (e.g. General Refuse etc.) (in '000kg)
Jan-2025	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Feb-2025	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Mar-2025	450.0400	0.0000	0.0000	0.0000	450.0400	205.5100	0.0000	0.0000	0.0000	0.0000	0.0000
Apr-2025	0.0000	0.0000	0.0000	0.0000	0.0000	481.3200	0.0000	0.0000	0.0000	0.0000	0.0000
May-2025	86.8900	0.0000	0.0000	0.0000	86.8900	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Jun-2025	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Half-year total	536.9300	0.0000	0.0000	0.0000	536.9300	686.8300	0.0000	0.0000	0.0000	0.0000	0.0000
Jul-2025	134.3700	0.0000	0.0000	0.0000	134.3700	114.2000	0.0000	0.0000	0.0000	0.0000	0.0000
Aug-2025	18.8400	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	18.8400
Sep-2025	43.6000	0.0000	0.0000	0.0000	7.2100	0.0000	0.0000	0.0000	0.0000	0.0000	36.3900
Oct-2025	149.3700	0.0000	0.0000	0.0000	119.5500	0.0000	0.0000	0.0000	0.0000	0.0000	29.8200
Nov-2025	384.6200	0.0000	0.0000	0.0000	365.6100	0.0000	0.0000	0.0000	0.0000	0.0000	19.0100
Dec-2025	15.2700	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	15.2700
Yearly Total	1283.0000	0.0000	0.0000	0.0000	1163.6700	801.0300	0.0000	0.0000	0.0000	0.0000	119.3300

(All quantities shall be rounded off to 3 decimal places)

Year	Actual Quantities of Inert C&D Materials Generated / Imported (in '000 kg)						Actual Quantities of Other C&D Materials / Wastes Generated				
	Total Quantities Generated [a+b+c+d+e+f+g+h+i)	Broken Concrete (including rock for recycling into aggregates) (a)	Reused in the Contract (b)	Reused in Other Projects (c)	Disposed as Public Fill (d)	Imported C&D Material	Metal (in '000kg)	Paper/ Cardboard Packaging (in '000kg)	Plastic (bottles/containers, plastic sheets/ foams from package material) (in '000kg)	Chemical Waste (in '000kg)	Others (e.g. General Refuse etc.) (in '000kg)
2024	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
2025	1283.0000	0.0000	0.0000	0.0000	1163.6700	801.0300	0.0000	0.0000	0.0000	0.0000	119.3300
2026	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
2027	0.0000										
2028	0.0000										
2029	0.0000										
2030	0.0000										
Total	1283.0000	0.0000	0.0000	0.0000	1163.6700	801.0300	0.0000	0.0000	0.0000	0.0000	119.3300

Remark:

1) Density of C&D material to be 2 metric ton/m3
2) Density of General Refuse to be 1.6 metric ton/m3
3) Density of Chemical Waste to be 0.88 metric ton/m3

Notes:

(1) *The waste flow table shall also include C&D materials that are specified in the Contract to be imported for use at the Sites.*
(2) *Plastics refer to plastic bottles/containers, plastic sheets/foam from packaging material.*
(3) *The summary table shall be submitted to the Project Manager monthly together with the Waste Flow Table for review and monitoring in accordance with the PS Clause 25.20(8)*
(4) *The figure for the dispsoal as public fill and imported fill might require minor adjustments due to the availability of late records*

Appendix N
Statistics on Complaint, Notifications of Summons and Successful Prosecution

Statistical Summary of Environmental Complaints

Reporting Period	Environmental Complaint Statistics		
	Frequency	Cumulative	Complaint Nature
1 December 2025 - 31 December 2025	0	0	N/A

Statistical Summary of Environmental Non-compliance

Reporting Period	Environmental Non-compliance Statistics		
	Frequency	Cumulative	Details
1 December 2025 - 31 December 2025	0	0	N/A

Statistical Summary of Environmental Summons

Reporting Period	Environmental Summons Statistics		
	Frequency	Cumulative	Details
1 December 2025 - 31 December 2025	0	0	N/A

Statistical Summary of Environmental Prosecution

Reporting Period	Environmental Prosecution Statistics		
	Frequency	Cumulative	Details
1 December 2025 - 31 December 2025	0	0	N/A

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