



Maeda Corporation

MONTHLY REPORT (DECEMBER 2018)

MTRCL Contract C3840-13C

Tsim Sha Tsui Station Carnarvon Road Subway and Entrances Modification Works





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By Email and Post

MTR Corporation Limited Fo Tan Railway House No. 9, Lok King Street, Fo Tan Shatin, N.T., Hong Kong

Attn.: Mr. Alfa Liu

11 January 2019

Dear Sirs.

Consultancy Agreement A130-13 Independent Environmental Checker for CRS and LTS CRS - Verification for 58th Monthly Environmental Monitoring and Audit (EM&A) Report (December 2018) (Report No.: EB001340R0792)

We refer to the 58th Monthly EM&A Report (December 2018) received under cover of the email from the Environmental Team, Arcadis Design & Engineering Limited, dated on 10 January 2019.

Further to our comments provided on 10 January 2019 and subsequent revision of the Report by Arcadis Design & Engineering Limited on 10 January 2019, we have no further comment and have verified the captioned report (Report No.: EB001340R0792).

Should you have any queries, please feel free to contact the undersigned at 3922 9366.

Yours faithfully AECOM Consulting Services Ltd

Y.W. Fung Independent Environmental Checker

LLMC/wwsc

cc Arcadis Design & Engineering Limited (Attn.: Mr. F. N. Wong) via email Maeda Corporation (Attn.: Mr. Calvin Chan) via email

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EXECUTIVE SUMMARY Breaches of Action and Limit Levels

- ES01 As the environmental monitoring results registered no breaches of Action and Limit Levels of air quality and construction noise during the Reporting Period, neither Notice of Exceedance nor the associated investigation and follow-up actions were required.
- ES02 No major corrective actions were taken as the environmental audit during the Reporting Period observed:
 - 1) No deficiencies with major environmental significance of the required environmental mitigation measures;
 - 2) No non-compliance with the required waste management; and
 - No adverse environmental impacts on the sensitive receivers environed with the site of the Project.

Environmental Complaints

ES03 No environmental complaints were recorded during the Report Period.

Notification of Summons & Successful Prosecutions

ES04 No notification of summons and successful prosecutions were recorded during the Reporting Period.

Reporting Changes

ES05 Since 21 September 2018, due to outage of the HVS and damage of the HVS during the super typhoon Mangkhut who smashed into Hong Kong on 16 September 2018, the 24-Hr TSP monitoring has been replaced by 3 x 1-Hr TSP monitoring by hand-help dust meter when the highest dust impact occurs upon agreement with the IEC, MTRCL and Contractor.

Future Key Issues

- ES06 Construction under the Project has been substantially completed, including the road reinstatement work for Carnarvon Road and super-structures of Entrance D1 and D2, etc., and Carnarvon Road has been re-opened to public since 30 December 2018.
- ES07 Reinstatement of the north-side pedestrian footpath (Entrance D1 and D2 side) will be carried out from January 2019 and minor internal defect fixing works will also be conducted as necessary.
- ES08 With implementation of the environmental mitigation measures as recommended in the EP, PP and EM&A Plan, the air quality, noise and water quality impacts to be generated from the remaining works are anticipated to be insignificant. No particular corrective or remedial measures are required.

1 INTRODUCTION

1.1 The Reporting Period

- 1.1.1 This is the 58th monthly EM&A report (hereinafter referred as 'This Report') covering construction period from 1 to 31 December 2018 (hereinafter referred as 'the Reporting Period').
- 1.1.2 This Report has been written in accordance with the *Environmental Monitoring and Audit Plan* (hereinafter referred as 'the EM&A Plan') enclosed in the *Project Profile – MTR Tsim Sha Tsui Station Carnarvon Road Subway and Entrances Modification Works*, which is registered in the Environmental Permit No. EP-440/2012 (hereinafter referred as 'the EP') (Register No.: PP-462/2012).

1.2 Project Background

- 1.2.1 In order to improve the appearance of Carnarvon Road Entrance D1 and D2 of Tsim Sha Tsui (hereafter referred as 'TST') Station and to provide a more comfortable walking environment nearby, MTR Corporation Limited (hereafter referred as 'MTRC' or 'the Corporation') has commissioned Meada Corporation (hereinafter referred as 'MCC') the contract MTR Tsim Sha Tsui Station Carnarvon Road Subway and Entrances Modification Works (hereafter referred as 'the Project'). The Project is proposed to rebuild the existing Entrance D1 and D2 and construct a new Entrance D3 at the basement B2 level of the K11 Art Mall to connect to the TST station by a subway, which extends from the Entrance D1 and D2 and runs approximately 80m along Carnarvon Road and across the Bristol Avenue to the Entrance D3. The Project was commenced in March 2014 and is anticipated to be completed by the end of 2018.
- 1.2.2 The existing TST Station had been in operation before the *Environmental Impact Assessment Ordinance* (hereafter referred as 'EIAO') comes into effect on 1 April 1998. It constitutes an exempted Designated Project (hereinafter referred as 'DP') according to Section 9(2) (g) of the EIAO (Cap. 499). As the Project involves a material change to an exempted DP which may have potential environmental impacts, an environmental permit is required prior to the commencement of the modification works. The Project Profile has been developed to provide information for direct application of an environmental permit. The EP has been granted since 18 July 2012, after the Project Profile and the associated *EM&A Plan* were registered.
- 1.2.3 Site map, works area and locations of the environmental monitoring under the Project are illustrated in Figure 1.1 Site Location Plan of *Appendix A*.
- 1.2.4 Management structure of the Project, including organization chart, lines of communication and contact names and telephone numbers of key personnel, is demonstrated in *Appendix B*.
- 1.2.5 Construction programme is shown in *Appendix C*, whereas implementation schedule for the recommended environmental mitigation measures (hereinafter referred as 'the Implementation Schedule') are summarised in *Appendix D*, which fine tunes the construction activities and shows inter-relationships with the environmental protection/ mitigation measures for the construction period. It is being reviewed and will be updated soon upon availability of more solid information.

1.3 Environmental Status

1.3.1 As required in the EP, AECOM Consulting Services Limited has been appointed as the Independent Environmental Checker under the Project (hereinafter referred as 'the IEC'), whereas Arcadis Design and Engineering Limited (formerly known as Hyder Consulting Limited) has been appointed as the Environmental Team under the Project (hereinafter referred as 'the ET').

- 1.3.2 According to the EP Condition 3.2 (a) under Environmental Monitoring and Audit (EM&A) during the Construction Period, baseline monitoring has been completed and the required Baseline Monitoring Report has been submitted to EPD on 14 February 2014 prior to commencement of the works under the Project.
- 1.3.3 Status of relevant environmental permits, licences, and/or notifications on environmental protection for the Project is summarised in *Table 1-3-1* below. They are detailed in *Appendix E*.

ltem	Description	License/Permit Status
1	Air Pollution Control	Notification Ref. 403252, 421293 & 433242
	(Construction Dust)	acknowledged on 02 Jun 2016, 18 Sep 2017 & 07 May 2018 respectively
2	Water Pollution Control Ordinance (Discharge License)	The discharge license (Ref No. WT00019722-2014) was granted on 01 Sep 2014 superseding the previous license (Ref No. WT00018229-2014)
3	Billing Account for Disposal of Construction Waste	A/C Ref. 7018523 granted on 25 Oct 2013
4	Chemical Waste Producer Registration	Registration Ref. 5213-2214-M2446-16 granted on 4 Mar 2014
5	Construction Noise Permit	GW-RE0635-18 approved on 19 September 2018 for operation of 4 submersible water pump (electric) or 1 drill for 24-hr; 4 drill & 4 grinder for 07:00-23:00 from 1 October 2018 to 30 March 2019.

Table 1-3-1 Summary of Status of Environmental Licenses and Permits

1.4 Construction Activities

1.4.1 Construction activities undertaken during the Reporting Period and the following month are summarised in *Table 1-4-1*:

Table 1-4-1 Construction Activities

Item	Description		
	Construction Activities Undertaken during the Reporting Period		
1	BS and ABWF for Entrance D1		
2	Asphalt paving for road reinstatement and re-open of Carnarvon Road		
3	Southern Pedestrian footpath reinstatement		
	Construction Activities to be Undertaken in the Up-Coming Month		
1	Defective works for Entrance D1		
2	Northern Pedestrian footpath reinstatement		

2 EM&A REQUIREMENTS

2.1 Air Quality

Monitoring Parameters and Frequency

- 2.1.1 According to the EM&A Plan, 24-Hour Total Suspended Particulates (hereinafter referred as '24-Hr TSP') is required to be monitored once a week during construction period of the Project. 1-Hour Total Suspended Particulates (hereinafter referred as '1-Hr TSP') is required to be monitored when exceedances of 24-Hr TSP occur, following the Event and Action Plan presented in *Appendix F*.
- 2.1.2 On 4th September 2018, when collecting filter paper from the HVS, the HVS was found out of service due to continuing wet weather as indicated by zero hour elapsed time in the elapsed time recorder. Before the HVS was inspected and repaired by the HVS specialist, the HVS was blown down and seriously damaged by the super typhoon Mangkhut who smashed into Hong Kong on 16 September 2018. The two (2) rounds of the TSP monitoring for the weeks 2nd to 8th and 9th to 15th September 2018 were hence interrupted due to outage of the HVS, resulted missing of the associated 24-Hour TSP data.
- 2.1.3 Due to uncertainty of time for the HVS inspection and repair, the 24-Hr TSP monitoring has been replaced by 3 x 1-Hr TSP monitoring at K11 by hand-help dust meter when the highest dust impact occurs since 21 September 2018 upon agreement with the IEC and MTRC and MC.
- 2.1.4 Environmental monitoring schedules for air quality monitoring for the Reporting Period and the next month were prepared and submitted to MTRC, IEC and MC prior to implementation via e-mail and / or facsimile for ease of necessary inspection. If amendment is necessary under ad hoc conditions, including actual and broadcast adverse weather, accidental instrument failures, etc., notification will be given at least 24 hours prior to implementation or as practical as possible. The monitoring schedules are enclosed in *Appendix G*.

Monitoring Location

- 2.1.5 According to the EM&A Plan, Mirador Mansion was designated to be the air quality monitoring station of the Project. As the access to the air monitoring location designated in the EM&A Plan has been denied by the owner of the property, the ET proposes an alternative monitoring location on the roof-top above the 4/F of the commercial complex of K11 (hereinafter referred as 'K11'), which has been agreed among MTRC, IEC and MC, and the associated access to K11 has been granted by the management office of K11 prior to the commencement of the baseline monitoring in January 2014.
- 2.1.6 Air quality monitoring location is summarised in *Table 2-1-1* below and illustrated in *Appendix A*.

Table 2-1-1 Air Quality Monitoring Location

Location ID	Name of Premises	Description
K11	K11 Art Mall	Rooftop, 4/F

Monitoring Equipment

2.1.7 The air quality monitoring equipment to be used for construction air impact monitoring is shown in *Table 2-1-2* below:

Table 2-1-2 Air Quality Monitoring Equipment

Equipment Type	Model	Serial Number	Calibration Orifice Number
High Volume Air Sampler	TE5170 MFC	0462	1785
Sibata Digital Dust Monitor	SITEPAC AM520	5201707005	Not Applicable

2.1.8 Weather information including wind speeds and wind directions is obtained from King's Park Weather Station. The weather information is used as weather conditions during the Reporting Period. They are presented in *Appendix H*.

Calibration of Monitoring Equipment

- 2.1.9 The HVAS is calibrated before commencement of monitoring using standard orifice 5points calibration method with orifice calibrator to determine the actual flow rate of each HVAS. A calibration Kit (Model - TE5025A) is used for calibration of the HVAS. At least once every 12 months, recalibration of the calibration kit is carried out during its maintenance.
- 2.1.10 Calibration of the HVAS is conducted following the manufacturer's instruction manual. Initial calibration of the equipment is conducted upon installation and thereafter at bimonthly intervals throughout the period of impact monitoring. The transfer standard should be traceable to the internationally recognised primary standard and be calibrated annually.
- 2.1.11 The Sibata Digital Dust Monitor LD-3B for 1-hour TSP monitoring is calibrated annually and the calibration certificates of the equipment are shown in *Appendix I*.

Monitoring Methodology – 24-Hr TSP

2.1.12 Air quality monitoring (24-Hr TSP) will be conducted once a week under typical weather conditions (with no adverse weather such as typhoon signal or rain storm warning).

Installation of HVAS

- 2.1.13 When positioning the HVAS, the following points will be noted:
 - a) A horizontal platform with appropriate support to secure the samplers against gusty wind will be provided;
 - b) No two samplers will be placed less than 2 m apart;
 - c) The distance between the sampler and an obstacle, such as buildings, must be at least twice the height that the obstacle protrudes above the sampler where possible;
 - d) A minimum of 2 m of separation from walls, parapets and penthouses is required for rooftops samplers;
 - e) A minimum of 2 m of separation from any supporting structure, measured horizontally is required;
 - f) No furnace or incinerator flue or building vent is nearby;
 - g) Airflow around the sampler is unrestricted;
 - h) The sampler is more than 20 m from the drip line;
 - i) Any wire fence and gate, to protect the sampler, should not cause any obstruction during monitoring;
 - j) Permission must be obtained to set up the samplers and to obtain access to the monitoring stations; and
 - k) A secured supply of electricity is needed to operate the samplers.

Preparation of Filter Papers and Laboratory Analysis

2.1.14 Sufficient pieces of filter paper should be labelled before sampling. It should be a clean filter paper with no pinholes, and should be conditioned in a humidity-controlled chamber for over 24-hour and be pre-weighed before use for the sampling. The preferred room temperature is around 25 °C ±3 °C with relative humidity (hereinafter referred as 'the RH') less than 50% ± 5%, preferably 40%.

- 2.1.15 Preparation of filters and subsequent laboratory analysis of the collected 24-Hr TSP samples were performed by ALS Technetiem (HK) Pty Ltd (hereinafter referred as 'ALS'), a local laboratory which have been accredited under Hong Kong Laboratory Accreditation Scheme (HOKLAS).
- 2.1.16 All the collected samples should be kept by the ET in standard office conditions for 6 months before disposal.

Field Monitoring Procedures

- 2.1.17 Procedures for field monitoring are as follows:
 - a) Check power supply to ensure the HVAS works properly.
 - b) Clean the filter holder and the area surrounding the filter.
 - c) Remove the filter holder by loosening the four bolts and carefully align a new filter, with stamped number upward, on a supporting screen.
 - d) Align the filter properly on the screen so that the gasket forms an airtight seal on the outer edges of the filter.
 - e) Fasten the swing bolts to hold the filter holder down to the frame. The pressure applied should be sufficient to avoid air leakage at the edges.
 - f) Close the shelter lid and secure with the aluminium strip.
 - g) Warmed-up the HVAS for about 5 minutes to establish run-temperature conditions.
 - h) Set a new flow rate record sheet into the flow recorder.
 - i) Checked and adjust the flow rate of the HVAS at around 1.1 m³ per minute. (The range specified in the EM&A Plan is between 0.6-1.7 m³ per minute.)
 - j) Set the programmable timer for a sampling period of 24 hours, and record the starting time, weather condition and the filter number.
 - k) Record the initial elapsed time.
 - I) At the end of sampling, remove the sampled filter carefully and fold it in half-length so that only surfaces with collected particulate matter are in contact.
 - m) Place the sampled filter in a clean plastic envelope and seal.
 - n) Record all monitoring information on a Field Data Sheet as shown in Appendix J.
 - o) Send the filters to ALS for analysis.

Monitoring Methodology – 1-Hr TSP

Field Monitoring

- 2.1.18 The procedures for measurement of 1-Hr TSP follow Manufacturer's Instruction Manual, which is summarised as follows:
 - a) Turn on the power.
 - b) Close the air collecting opening cover.
 - c) Set the "TIME SETTING" switch to [BG].
 - d) Press "START/STOP" switch to perform background measurement.
 - e) Turn the knob at SENSI ADJ position.
 - f) Leave the equipment upon "SPAN CHECK" is indicated in the display.
 - g) Press "START/STOP" switch to perform automatic sensitivity adjustment.
 - h) Turn the knob at MEASURE position.
 - i) Set time period of 1 hour for the 1-hour TSP measurement.
 - j) Press "START/STOP" to start the 1-hour TSP measurement.
 - k) Check the time period to ensure monitoring time of 1 hour.
 - I) Record all monitoring information on a Field Data Sheet.

Maintenance and Calibration

- 2.1.19 The procedures for maintenance and calibration of 1-Hr TSP follow Manufacturer's Instruction Manual as follows:
 - a) The Sibata is checked at 3-month intervals and calibrated at 1-year intervals throughout the whole construction period.
 - b) Calibration records for the Sibata Digital Dust Monitor direct dust meters are shown in *Appendix I*.

Action and Limit Levels

2.1.20 The Action and Limit levels (hereinafter referred as 'the A/L Levels) at K11 have been established in the Baseline Monitoring Report in accordance with the derivation criteria specified in Section 3.7 of the EM&A Plan, which are summarised in **Table 2-1-3** as follows:

Table 2-1-3	Derivation of Action and Limit Levels for Air Quality at K11	, μg/m³
Parameter	Action Level	Limit Leve

Parameter	Action Level	Limit Level
24-Hr TSP	For baseline level ≤200 µg/m³, Action level = (130% of baseline level + Limit level)/2	260
1-Hr TSP	For baseline level ≤384 µg/m³, Action level = (130% of baseline level + Limit level)/2 For baseline level >384 µg/m³, Action level = Limit level	500

- 2.1.21 The Action and Limit levels for 24-Hr TSP established in the Baseline Monitoring Report were 221.6 and 260 respectively.
- 2.1.22 As the updated 1-Hr TSP baseline levels at the monitoring location are not available, the Action Level for 1-Hr TSP is calculated by adoption of the worst case approach as follows:

According to *Table 2-1-3* (1-Hr TSP):

1-Hr TSP Limit Level = 500

In adopting the worst case approach, let the 1-Hr TSP baseline levels be 0 (and of course \leq 384 !):

1-Hr TSP Action Level = (130% of Baseline Level + Limit Level) \div 2 = (0 + 500) \div 2 = 250

2.1.23 The established A/L Levels for 24-Hr and 1-Hr TSP are summarised in *Table 2-1-4* as follows:

Table 2-1-4 Action & Limit Levels for Air Quality at K11, µg/m³

Parameter	Action Level	Limit Level
24-Hr TSP	221.6	260
1-Hr TSP	250	500

Event and Action Plan

2.1.24 In case exceedances of Action and/or Limit levels for air quality occur, Event and Action Plan for Air Quality enclosed in *Appendix F* will be implemented.

Environmental Mitigation Measures for Air Quality

- 2.1.25 Although most of the construction works would be carried out underground, appropriate dust mitigation measures as stipulated in the EP, Project Profile, related environmental regulation including Air Pollution Control (Construction Dust) Regulation as well as those recommended in the Implementation Schedule should be implemented to control fugitive dust emission. The following key dust suppression measures are recommended:
 - a) Decking over the excavation areas;
 - b) Regular watering to reduce dust emissions from all exposed site surface, particularly during dry weather;
 - c) Frequent watering for particularly dusty construction areas and areas close to air sensitive receivers;
 - d) Provision of vehicle washing facilities at the exit points of the site; and
- 2.1.26 Provision of tarpaulin covering for any dusty materials on a vehicle leaving the site.Details of the implementation schedule for the required environmental mitigation measures are presented in *Appendix D*.

2.2 Construction Noise

Monitoring Parameters and Frequency

2.2.1 **Table 2-2-1** summarizes the monitoring parameters and frequency for construction noise:

Table 2-2-1 Noise Monitoring Parameters and Frequency

Parameters	Frequency
L _{eq} in 30 minutes	Once a week

2.2.2 Monitoring schedules for construction noise for the Reporting Period and the next Reporting Period are prepared and submitted to MTRC, IEC and MC prior to implementation via e-mail and / or facsimile for ease of necessary inspection. Where amendment is necessary under ad hoc conditions, including actual and broadcast adverse weather, accidental instrument failures, etc., advanced notification is given at least 24 hours prior to implementation or as practical as possible.

Monitoring Equipment

2.2.3 With reference to the Technical Memorandum (TM) issued under the Noise Control Ordinance (NCO), sound level meters in compliance with the International Electrotechnical Commission Publications 651: 1979 (Type 1) and 804: 1985 (Type 1) specifications (both publications have been withdrawn and replaced by 61672:2003) are used for carrying out the noise monitoring. The details of the calibration of the sound level meters and their respective calibrators are as shown in the following **Table 2-2-2**:

Table 2-2-2 Construction Noise Monitoring Equipment

Item	Equipment Name	Model
1	Sound Level Meter	B&K2238 (Serial No. 2448529)
2	Acoustic Calibrator	CAL200 (Serial No. 10929)

Monitoring Location

- 2.2.4 With the same rationale stated in previous **Section 2.1.5** for K11 to be used as the air quality monitoring location, it was agreed among MTRC, IEC and MC to perform the construction noise monitoring at exactly the same location, K11.
- 2.1.5 **Table 2-2-3** summarizes the recommended alternative noise monitoring location, which is illustrated in **Appendix A**.

Table 2-2-3 Noise Monitoring Location

Location ID	Name of Premises	Description
K11	K11 Art Mall	Rooftop, 4/F

Monitoring Methodology

Field Monitoring

2.1.6 Procedures for noise monitoring summarised as follows:

- a) The microphones of the Sound Level Meter are about 1 m from the exterior of the building façade.
- b) The battery condition is checked to ensure the correct functioning of the meter.
- c) Parameters such as frequency weighting, the time weighting, the measurement time and monitoring frequency are set as follows:
 - i. Frequency weighting: A
 - ii. Time weighting: Fast
 - iii. Time measurement: 30 minutes' intervals (between 0700-1900 on normal weekdays) iv. Monitoring frequency: one set of measurement on a weekly basis
- d) Prior to and after each noise measurement, the meter is calibrated using a Calibrator for 94 dB at 1 kHz. If the difference in the calibration level before and after measurement is

more than 1 dB, the measurement should be considered invalid and the measurement repeated after re-calibration or repair of the equipment.

- e) During the monitoring period, the Leq(30 min) are recorded.
- f) Record all monitoring information on a Field Data Sheet as shown in Appendix J.
- g) Maintenance and Calibration.
- h) The meter and calibrator are sent to the supplier or HOKLAS laboratory to check and calibrate prior to the monitoring. Calibration records are presented in *Appendix I.*

Weather Condition

2.1.7 The wind speeds and directions during the monitoring period are recorded and shown in *Appendix H.*

Action and Limit Levels

2.1.8 The Action and Limit levels (hereinafter referred as 'the A/L Levels) at K11 have been established in the Baseline Monitoring Report. They are summarised in *Table 2-2-4* as follows:

Table 2-2-4 Action and Limit Levels for Construction Noise

Time Period	Action Level	Limit Level
0700-1900 hours on normal weekdays	When one valid documented complaint is received.	75*

Note: If works are to be carried out during restricted hours, the conditions stipulated in the Construction Noise Permit (CNP) issued by the Noise Control Authority have to be followed.

Event and Action Plan

2.1.9 In case exceedances of Action and/or Limit levels for construction noise occur, the Event and Action Plan enclosed in *Appendix F* will be triggered.

Mitigation Measures for Construction Noise

- 2.1.10 Although no residual noise impact would be generated after the proposed mitigation measures are in place, the general construction noise control measures stipulated in the EP, Project Profile as well as those recommended in the Implementation Schedule should be fully implemented in order to minimise noise impacts during the construction phase. They are summarised as follows:
 - a) The Code of Practice on Good Management Practice to Prevent Violation of the Noise Control Ordinance (Chapter 400) (for Construction Industry) published by EPD shall be adopted;
 - b) The statutory and non-statutory requirements and guidelines shall be complied with;
 - c) Approval for the method of working, equipment and noise mitigation measures intended to be used at the site shall be granted from the Project Engineer before commencing any work;
 - Working methods to minimize the noise impact on the surrounding NSRs shall be formulated and executed, and the implementation of these methods shall be monitored by experienced personnel with suitable training;
 - e) Noisy equipment and noisy activities shall be located as far away from the NSRs as is practical;
 - f) Unused equipment shall be turned off;
 - g) PME should be kept to a minimum and the parallel use of noisy equipment / machinery should be avoided;
 - h) All plant and equipment shall be maintained regularly; and
 - i) Material stockpiles and other structures shall be effectively utilised as noise barriers, whenever practicable.
- 2.1.11 Details of the implementation schedule for the mitigation measures are presented in *Appendix D*.

3 MONITORING RESULTS

3.1 Air Quality

Monitoring Results

- 3.1.1 1-Hr TSP monitoring during the Reporting Period was conducted following the agreed monitoring schedule.
- 3.1.2 TSP results of the Reporting Period are summarised in the following **Table 3-1-1**. Graphical plots of the parameter are illustrated in **Appendix K**.

Monitoring Date		1-Hr TSP		Action	Limit
Monitoring Date	Test 1	Test 2	Test 3	Level	Level
04 December 2018 Average (Min – Max)	66 (62-156)	67 (63-164)	61 (54-228)		
11 December 2018 Average (Min – Max)	57 (52-190)	54 (46-137)	58 (49-379)	250	500
18 December 2018 Average (Min – Max)	61 (56-156)	62 (58-84)	62 (57-179)	250	500
27 December 2018 Average (Min – Max)	52 (50-57)	56 (50-269)	53 (49-191)		

Table 3-1-1 Summary of TSP Monitoring Results, µg/m³

Discussion

- 3.1.3 **Table 3-1-1** demonstrates that all 1-Hr TSP results of the Reporting Period fluctuated well below the A/L Levels of the parameter, i.e. neither Action Level nor Limit Level exceedances were recorded.
- 3.1.4 No Notice of Exceedances (thereinafter referred as 'NOE'). Therefore, the associated NOE Investigation as well as remedial actions were not required during the Reporting Period.

3.2 Construction Noise

Monitoring Results

- 3.2.1 Construction noise monitoring during the Reporting Period was conducted following the agreed monitoring schedule.
- 3.2.2 Construction noise monitoring results of the Reporting Period are summarised in the following *Table 3-2-1*. Graphical plots of the parameter are illustrated in *Appendix K*.

Table 3-2-1 Summary of Construction Noise Monitoring Results at K11, dB(A)

Monitoring Date	Leq (30 min)	Action Level	Limit Level
04 December 2018	71.3		
11 December 2018	70.5	Any documented	
18 December 2018	70.5	complaint against	75
27 December 2018	68.1	construction noise.	
Mean (Min – Max), <i>Leq</i> (30 min)	70.3 (68.1 – 71.3)		

Discussion

- 3.2.3 No environmental complaint against construction noise was registered during the Reporting Period, whereas Table 3-2-1 demonstrates that all construction noise results of the Reporting Period were fell below the Limit Level of the parameter. Neither exceedances of Action Level nor exceedances of Limit Level were recorded.
- 3.2.4 Neither NOE nor NOE investigation and the associated remedial actions were required during the Reporting Period.
- 3.2.5 The Contractor's attention is drawn to certain noisy construction activities, which were scheduled to be conducted during the coming month as listed in **Table 1-4-1** under **Section 1.4:** Construction Activities Undertaken during the Reporting Period and Up-Coming Month.
- 3.2.6 Attention is drawn to adequate mitigation measures to be implemented during the noisy construction activities in order to alleviate noise nuisance generated from the Project related construction activities.

Weather Conditions

- 3.2.7 No weather conditions or any other factors were identified to have significant effects on the air and noise monitoring results within the Reporting Period.
- 3.2.8 Weather information during the Reporting Period which is extracted from Hong Kong Observatory King's Park Weather Station and enclosed for reference in *Appendix H*.

3.3 **Conclusions and Recommendations**

Conclusions

- 3.3.1 No exceedances of A/L Levels of air quality and construction noise were registered during the Reporting Period.
- 3.3.2 No NOE and the associated NOE Investigation and corrected actions were required during the Reporting Period.

Recommendations

- 3.3.3 Full implementation of the environmental mitigation measures, which are required in the EM&A Plan and summarised in Implementation Schedule of *Appendix D*, is recommended. Where necessary, proper maintenance and improvement of the implemented mitigation measures are reminded.
- 3.3.4 Construction dust shall be suppressed during dusty construction activities under dry and windy conditions.
- 3.3.5 In addition, construction noise shall be eliminated to avoid adverse impacts on the nearby sensitive receivers.

4 ENVIRONMENTAL AUDIT

4.1 Site Inspection

- 4.1.1 Weekly site inspections during the Reporting Period were conducted by MTRC, MC and ET, whereas the monthly site inspection of the Reporting Period was jointly conducted by the IEC, MTRC, MC and ET. The site inspection follows strictly to the agreed Site Inspection Checklist, which covers all the site audit requirements stipulated in the EM&A Plan, PS and all relevant environmental laws.
- 4.1.2 The completed Site Inspection Checklists are distributed to relevant parties upon completion of the site inspection for agreement and signature of the relevant parties and, where appropriate, for implementation of the recommended corrected actions to promptly rectify the situation.
- 4.1.3 The site inspections during the Reporting Period were conducted on 04, 11, 18 and 27 December 2018. A joint site inspection was conducted by IEC, MTRC, MC and ET on 11 December 2018.
- 4.1.4 As the Air Pollution Control (Non-road Mobile Machinery) (Emission) Regulation has been enforced since December 2015, particular attention was paid to check EPD's Non-Road Mobile Machinery (NRMM) labels demonstrated on the regulated NRMM, except those which application is in progress. Deficiencies or findings of the site audit and the associated follow up actions are summarised in the following **Table 4-1-1**:

Date	Deficiencies or findings	Follow-Up Action
	Follow-up item(s)	
04 December 2018	No follow-up item.	Not required.
	Observation(s) on the day of inspection	
	No deficiency was observed on site.	Not required.
	Follow-up item(s)	
11 December 2018	No follow-up item.	Not required.
	Observation(s) on the day of inspection	
	No deficiency was observed on site.	Not required.
	Follow-up item(s)	
18 December 2018	No follow-up item.	Not required.
	Observation(s) on the day of inspection	
	No deficiency was observed on site.	Not required.
	Follow-up item(s)	
27 December 2018	No follow-up item.	Not required.
	Observation(s) on the day of inspection	
	No deficiency was observed on site.	Not required.

Table 4-1-1 Summary of Findings and Follow-Up Actions of the Site Inspection

4.1.1 As shown in *Table 4-1-1*, no major deficiencies or non-compliance of environmental mitigation measures or adverse environmental impacts were observed during the Reporting Period.

4.2 Compliance with Legal/Contractual Requirement

4.2.1 Construction activities under the Project must comply with all environmental protection and pollution control laws in Hong Kong, as well as the contractual requirements of the Project.
 Table 4-2-1 summarizes breaches of legal and contractual requirements.

Table 4-2-1 Summary of Breaches of Legal and Contractual Requirements

Month	No. of Breach(s)	Cumulative no. from March 2014 to the Reporting Period
December 2018	0	0

4.3 Environmental Complaints

- 4.3.1 Environmental complaints are handled following closely the flow chart of complaint response procedure which is enclosed in *Appendix L*.
- 4.3.2 Environmental complaints registered during the Reporting Period are summarised in *Table 4-3-1* below:

Table 4-3-1 Summary of Complaint

Month	No. of Complaint(s)	Cumulative no. from March 2014 to the Reporting Period
December 2018	0	6

4.4 Notification of Summons/Successful Prosecutions

4.4.1 Notification of summons and successful prosecutions registered during the Reporting Period are summarised in *Table 4-4-1* below:

Table 4-4-1 Summary of Summon and Successful Prosecutions

Month	No. of Breach(s)	Cumulative no. from March 2014 to the Reporting Period
December 2018	0	0

5 CONSTRUCTION WASTE

5.1 Waste Management

5.1.1 Waste management under the Project is performed in accordance with the Waste Management Plan, which has been prepared for implementation of the construction waste mitigation measures in compliance with the requirements stipulated in the EM&A Plan, PS, Waste Disposal Ordinance and the associated subsidiary regulations.

5.2 Waste Management Status and Record

- 5.2.1 Updated waste management status is detailed in *Appendix M*, where the 3-R status of the construction waste generated from construction of the Project during the Reporting Period is presented.
- 5.2.2 Despite small scale of the Project and the amount of C&D material that needs to be hauled off site and disposed of is anticipated not to be significant, 3-R waste management i.e. Reduce, Reuse and Recycle, is adopted in order to minimize adverse environmental impacts to be generated from construction of the Project.

6 FUTURE ENVIRONMENTAL ISSUES

6.1 Future Key Environmental Issues

- 6.1.1 Construction under the Project has been substantially completed, including the road reinstatement work for Carnarvon Road and super-structures of Entrance D1 and D2, etc., and Carnarvon Road has been re-opened to public since 30 December 2018.
- 6.1.2 Reinstatement of the north-side pedestrian footpath (Entrance D1 and D2 side) will be carried out from January 2019 and minor internal defect fixing works will also be conducted as necessary.
- 6.1.3 With implementation of the environmental mitigation measures as recommended in the EP, PP and EM&A Plan, the air quality, noise and water quality impacts to be generated from the remaining works are anticipated to be insignificant.

7 CONCLUSIONS AND RECOMMENDATIONS

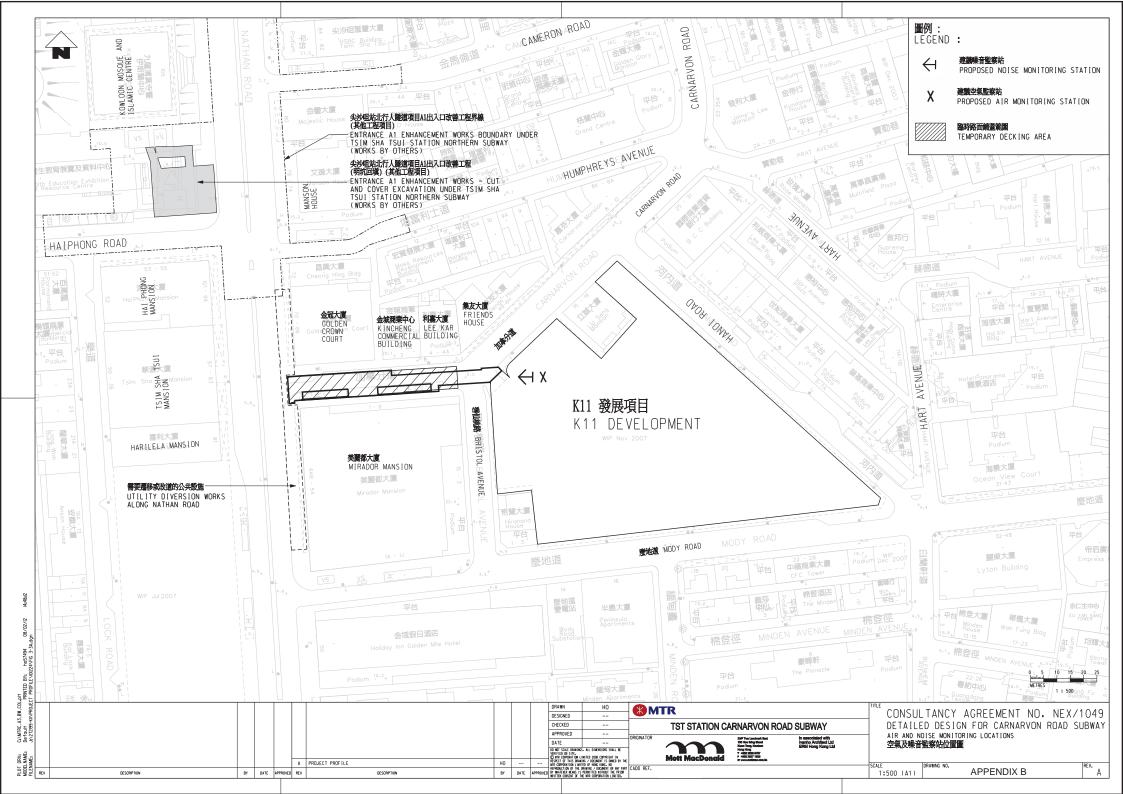
7.1 Conclusions

- 7.1.1 Since 21 September 2018, due to outage of the HVS and damage of the HVS during the super typhoon Mangkhut who smashed into Hong Kong on 16 September 2018, the 24-Hr TSP monitoring has been replaced by 3 x 1-Hr TSP monitoring by hend-help dust meter when the highest dust impact occurs upon agreement with the IEC, MTRC and MC.
- 7.1.2 EM&A results during the Reporting Period showed that adverse environmental impacts generated from construction activities under the Project was alleviated to acceptable levels via implementation of the environmental mitigation measures recommended in the EM&A Plan and summarised in the Implementation Schedule.
- 7.1.3 Neither NOE & the associated NOE investigation nor follow-up actions were required as the environmental monitoring results registered no exceedances of A/L Levels of air quality and construction noise during the Reporting Period.
- 7.1.4 No corrective actions were required as the environmental audit during the Reporting Period observed:
 - 1) No deficiencies with major environmental significance of the required environmental mitigation measures;
 - 2) No non-compliance with the required waste management; and
 - 3) No adverse environmental impacts on the sensitive receivers environed with the site of the Project.
- 7.1.5 In addition, no remedial actions were required as no notification of summons and successful prosecutions were reported during the Reporting Period.

7.2 Recommendations

- 7.2.1 Construction under the Project has been substantially completed and Carnarvon Road has been re-opened to public since 30 December 2018.
- 7.2.2 Remaining work include reinstatement of the north-side pedestrian footpath and minor internal defect fixing works as necessary.
- 7.2.3 With implementation of the environmental mitigation measures as recommended in the EP, PP and EM&A Plan, the air quality, noise and water quality impacts to be generated from the remaining works are anticipated to be insignificant. No particular corrective or remedial measures are required.

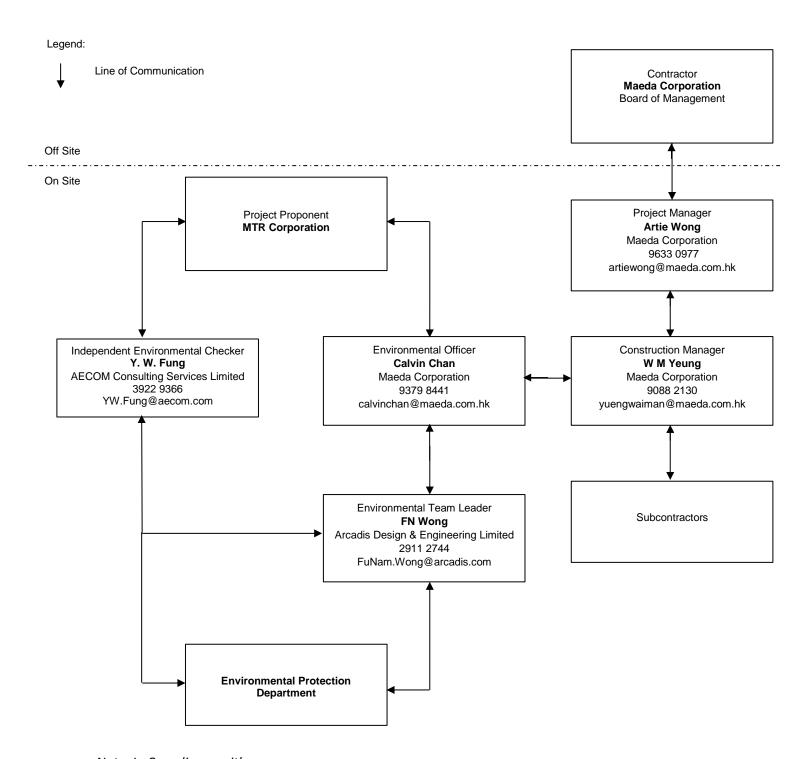
APPENDIX A SITE LOCATION PLAN



APPENDIX B

MANAGEMENT STRUCTURE

Project Organization Chart in Environmental Management (Rev.05)

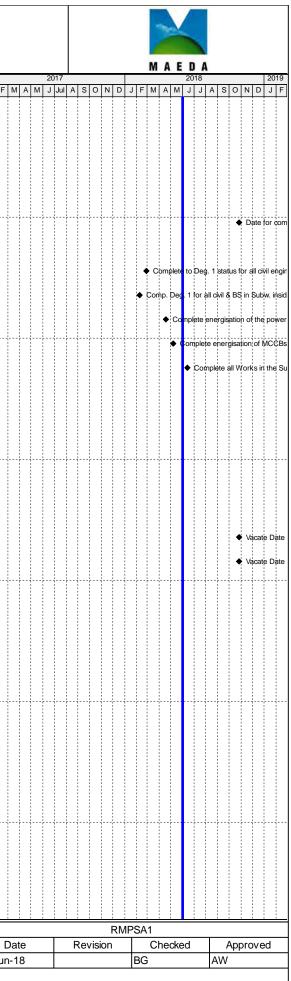


*Note: In Compliance with i) Clause.***1**.3 *of Environmental Monitoring and Audit Manual (Appendix VII of Project Profile PP462/2012)*

APPENDIX C

CONSTRUCTION PROGRAMME

	X MTR									Co	ontra	ct C	3840)-130	2								
							Ts	im S	ha Tsi	ui St	ation	, Ca	rnar	von	Roa	d Su	ıbway	у					
	Activity Name	Orig Dur	Rem Start Dur	Finish	% Complete	Total Float	OND	JFI	2 M A M .	2014 J Jul A	sol	N D	JF	MAN	2015 M J Ju		3 0 N	DJ	FM/		2016 J Jul A	so	
aster Programme R	Revision As Per SA1	1633d	175d 11-Oct-1	3 A 30-Dec-18		Od											+++						ŀ
Preliminaries		1633d	175d 11-Oct-1	3 A 30-Dec-18		Od																	
Contract Key Dates		1670d	0d 11-Oct-1	3 A 26-Oct-18		Od																	
C3840-CD-10	Date of Contract Award	0d	0d 11-Oct-1	3 A	100%	•	Date of	Contract	Award														
C3840-CD-20	Date of Commencement	0d	0d 14-Oct-1	13A	100%		 Date of 	Comme	ncement														
C3840-CD-30	Date for completion of the whole of the Works	0d	0d	26-Oct-18*	0%	0d																	
Specified Degrees of C	Completion	107d	0d 08-Feb-	18A 13-Jun-18		200d																	
C3840-CD-2A	Complete to Deg. 1 status for all civil engineering works and ABWF in Subway outside K11 Lot	0d	0d	26-Feb-18	A 100%																		
C3840-CD-2B	Boundary Comp. Deg. 1 for all civil & BS in Subw. inside K11, incl. works ass. with breakthro & make good	K11 0d	0d	08-Feb-18	A 100%																		
C3840-CD-2C	D. wall Complete energisation of the power isolator in the Telephone Equipment Rm	0d	0d	18-Apr-18 A	A 100%																		
C3840-CD-2D	Complete energisation of MCCBs CRS1 and CRS2 in the Electrical Rm	0d	0d	08-May-18	A 100%																		
C3840-CD-2E	Complete all Works in the Subway and New Entrances D2 and D3	0d	0d	13-Jun-18	0%	16d																	
	Area As PS Clause P8 & PS Appendix G	0d		I3A 31-Oct-13A																			
C3840-AD-20		Od	0d 31-Oct-		100%		A 0000	Doto f	or Works A	100 204	0.W/1 (c)	bioct to	SI C/TI										
	Access Date for Works Area 3840.W1 (subject to SLG/TMLG Approval)								or Works Ai														
C3840-AD-30	Access Date for Works Areas 3840.W2 (subject to SLG/TMLG Approval)	0d	0d 31-Oct-7		100%		Acces	S Date f	or Works Ai	reas 384	40.VV/2 (s	ubject t	o SLG/I	MLG A	pproval)								
Initial Site Survey		35d		13 A 10-Dec-13																			
C3840-SS-20	Validate the survey record and carry out any necessary additional survey at Works Areas 3840.W W2	/1 & 35d	0d 31-Oct-7	I3A 10-Dec-13	A 100%		– V	alidate t	he survey r	e¢ord ar	nd carry t	out any	necessa	ary addit	tional su	rveyat W	Vorks Ar	eas 384	0.W1&	W2			
Vacation of Works Area	as as PS Clause P8 and PS Appendix G	Od	0d 26-Oct-1	18 26-Oct-18		65d																	
C3840-VD-20	Vacate Date for Works Area 3840.W1 (subject to SLG/TMLG Approval)	0d	0d	26-Oct-18	0%	65d																	
C3840-VD-30	Vacate Date for Works Area 3840.W2 (subject to SLG/TMLG Approval)	0d	0d	26-Oct-18	0%	65d																	
Procurement of Subco	ntract Packages	1335d	6d 11-Oct-1	3 A 05-Oct-18		70d																	
Preliminaries and Utili	ities Diversion	60d	0d 11-Oct-1	3 A 13-Jan-14 A	A																		
C3840-PRC-100	Hoardings, Fencing and Associated Metalwork	40d	0d 15-Oct-1	13 A 13-Jan-14 A	A 100%			Hoar	dings, Fenc	cing and	Associa	ted Met	alwork										
C3840-PRC-110	Land Survey/Setting Out	5d	0d 15-Oct-7	I3A 19-Oct-13A	A 100%		Land \$	urvey/Se	etting Out														
C3840-PRC-120	Instrumentation and Monitoring	53d	0d 15-Oct-1	I3A 14-Dec-13	A 100%			nstrume	ntation and	I Monitoi	ring												
C3840-PRC-130	Advance Ground Works	28d	0d 15-Oct-	I3A 15-Nov-13	A 100%		📥 Adv	ance Gr	ound Work	s													
C3840-PRC-140	Temporary Traffic Diversion (Consultant)	4d	0d 11-Oct-1	3 A 18-Oct-13 A	A 100%		Tempor	ary Traf	fic Diversior	n (Cohsi	ultant)												
C3840-PRC-150	Obtain Eng's Approval for Temporary Traffic Diversion (Consultant)	6d	0d 19-Oct-1	I3A 31-Oct-13A	A 100%		📕 Obtair	Eng's A	Approval for	Tempo	rary Traf	fic Dive	rsion (Co	onsultan	nt)								
C3840-PRC-160	Site Security	48d	0d 15-Oct-1	I3A 24-Dec-13	A 100%			Site Se	curity														
C3840-PRC-200	Independent Checking Engineer (ICE)	6d	0d 18-Nov-	13 A 27-Nov-13	A 100%		Inc	epende	nt Checking	g Engine	er (ICE)												
C3840-PRC-210	Obtain Eng's Approval for ICE	6d	0d 27-Nov-	13A 13-Dec-13	A 100%				ng's Approv														-
C3840-PRC-220	Ground Investigation (Pre-drilling work)	60d		I3A 28-Dec-13					d Investigati			(ork)											
Temporary Works, ELS		512d		13A 17-Oct-15A					congut		g	,											
										000-10		ator											
C3840-PRC-240	Specialist Demolition Contractor			13 A 20-Feb-14	A 100%				Specialist D	ernolitior	Contrac	JOF											
Current Bar		te: 01-Jun	n-18				М	nato:	n Drac				vicio	n D'	<u>\</u> /D	DCA	.1						-
Actual Work	♦ ♦ Milestone Page	e 1 of 26					IVI	istel	r Prog	51 an	mie	re/	v 1510	пĸ	IVIT I	кэн	11						



	XMTR			Contract C3840-13C Tsim Sha Tsui Station, Carnarvon Road Subway		
	Activity Name	Orig Rem Start Dur Dur	Finish % Complete	Total 2014 2015 2016 Float O N D J F M A M J Jul A S O N D J F M A M J Jul A S		
C3840-PRC-250	Sheet Piling	40d 0d 29-Jan-1	14 A 27-Mar-14 A 100%	C N D S I W A W S Sul A S C N D S I W A W S Sul A S		
C3840-PRC-260	Pipe Piling & grouting	60d 0d 16-Nov-	13 A 27-Mar-14 A 100%	Pipe Piling & grouting		
C3840-PRC-270	Pipe Roofing & horizontal grouting	60d 0d 03-Oct-1	14A 31-Dec-14A 100%	Pipe Roofing & horizontal grouting		
C3840-PRC-280	Flood Barrier Wall	40d 0d 10-Dec-	13 A 28-Jan-14 A 100%	Flood Barriet Wall		
C3840-PRC-300	Earthworks including for Tunnel	443d 0d 07-Jul-1-	4 A 17-Oct-15 A 100%	Earthworks including for Tunnel		
Permanent Works		550d 0d 01-Feb-	14 A 18-Mar-17 A			
C3840-PRC-310	Rebar Supply		14A 28-Feb-14A 100%	Rebar Supply		
				Condreté Supply		
C3840-PRC-320	Concrete Supply	60d 0d 01-Feb-				
C3840-PRC-330	Structural S.S.Steelworks.	54d 0d 01-Mar-	16 A 18-Mar-17 A 100%		Structural S.S.S	Steelworks.
C3840-PRC-340	Subway, RC Work Package Contractor	90d 0d 02-Jan-1	15 A 30-Jun-15 A 100%	Subway, RC;Work Package Contractor		
External Works		789d 6d 02-Jan-1	14 A 05-Oct-18	бо		
C3840-PRC-360	Closed Circuit TV Inspection	24d 0d 02-Jan-1	14 A 16-Jan-14 A 100%	Cldsed Circuit TV Inspection		
C3840-PRC-370	Asphalt Surfacing	6d 6d 28-Sep-	18 05-Oct-18 0%	Od d		
ABWF & Building Servi	ices	625d 0d 01-Nov-	13A 18-Mar-17A			
C3840-PRC-380	BS Works	90d 0d 01-Nov-	13 A 30-Apr-14 A 100%	BŞ Works		
C3840-PRC-390	ABWF Works for TS	749d 0d 01-Nov-	13A 24-Oct-15A 100%	ABWF Works for TS		
C3840-PRC-395	ABWF Works for the Permanent Works	60d 0d 15-Feb-	16 A 18-Mar-17 A 100%		ABWF: Works fo	for the Permanent
Removal of Existing Es	scalator	190d 0d 21-Apr-1	15 A 11-Mar-16 A			
C3840-PRC-400	Specialist Contractor	190d 0d 21-Apr-1		Specialist Contractor		
te Establishment		120d 0d 14-Oct-1				
Apply Utilities		90d 0d 18-Oct-1	13 A 25-Apr-14 A			
C3840-AU-100	Temporary Water Supply (subject to approval from WSD)	90d 0d 25-Oct-1	13 A 25-Apr-14 A 100%	Temporary Water Supply (subject to approval from WSD)		
C3840-AU-110	Temporary CLP Power Supply (subject to approval from CLP)	90d 0d 18-Oct-1	13 A 25-Feb-14 A 100%	Temporary CLP Power Supply (subject to approval from CLP)		
Contractor's Site Office	e	30d 0d 14-Oct-1	13A 12-Nov-13A			
C3840-OS-100	Setup Project Office	30d 0d 14-Oct-1	13A 12-Nov-13A 100%	Setup Project Office		
ondition Survey		100d 0d 07-Jan-1	14 A 17-Feb-14 A			
C3840-CS-20	Propose the influence zone to the satisfaction of the Eng	60d 0d 28-Jan-1	14 A 17-Feb-14 A 100%	Propose the influence zone to the satisfaction of the Eng		
C3840-CS-35	Obtain condition report from MTR	0d 0d	07-Jan-14 A 100%	Øbt		
C3840-CS-40	Verify and accept the conditionsurvey report	28d 0d 28-Jan-1	14 A 17-Feb-14 A 100%	Verify and acept the conditions urvey report		
nvironmental Manager	ment Plan and Quality Plan	129d 0d 11-Oct-1	13 A 28-Apr-14 A			
C3840-EQ-100	EMP (G5.1.10) - Prepare and submit for Eng approval	28d 0d 11-Oct-1		EMP (G5.1.10) - Prepare and submit for Engapproval		
				EMP - Eng bomment and approve		
C3840-EQ-110	EMP - Eng comment and approve		13 A 06-Dec-13 A 100%			
C3840-EQ-150	Environmental Team Leader (ET) (P22.14) - Appoint and submit for Eng approve	al 30d 0d 14-Oct-1	13 A 14-Nov-13 A 100%	Environimeintal Teám Leader (ET) (P22.14) - Appoint and submit for Eng approval		
C3840-EQ-160	ET - Eng comment and approve	14d 0d 15-Nov-	13 A 22-Nov-13 A 100%	■ ET - Eng comiment and approve		
Current Bar	Critical Remaining Work	Data Date: 01-Jun-18				RMI
Actual Work	♦ Milestone	Page 2 of 26		Master Programme Revision RMPRSA1	Date 01-Jun-18	Revision

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	Activity Name	Orig Rem Start Dur Dur	Finish	% To Complete Fk		2014 J Jul A S	ONDJ		2015 J Jul A S	OND	JFI	20 M A M J	O N D	JFM	2017 A M J Ju		N D J	I F M A	2018 M J J	ASO	D N D
C3840-EQ-170	Confirm monitiroing location & setup noise monitoring deivices	30d 0d 17-Dec-1	3A 09-Jan-14A	100%	Confirm monitir	oing location &	setup noise m	nitoring deivic	es												
C3840-EQ-180	Baseline noise monitoring	14d 0d 10-Jan-1	4 A 24-Jan-14 A	100%	Baseline noise	e monitoring															
C3840-EQ-190	Prepare baseline noise monitoring report & submit to Eng, ICE and EPD	7d 0d 25-Jan-1	4 A 11-Feb-14 A	100%	Prepare ba	seline noise mo	nitoring report	& submit to Er	ng, ICE and E	PD			 								
C3840-EQ-200	Baseline noise monitoring report review and approved by Eng, ICE and EPD	14d 0d 14-Feb-1	4A 01-Apr-14A	100%	Baseli	ne noise monit	oring report re	view and appro	oved by Eng,	ICE and EF	2D										
C3840-EQ-210	Confirm monitoring location & setup air monitoring deivices	30d 0d 17-Dec-1	3A 09-Jan-14A	100%	Confirm monito	ing location &	setup air monit	oring deivices													
C3840-EQ-220	Baseline air monitoring	14d 0d 10-Jan-1	4 A 25-Jan-14 A	100%	Baseline air m	onitoring															
C3840-EQ-230	Prepare baseline air monitoring report & submit to Eng, ICE and EPD	7d 0d 27-Jan-1	4 A 11-Feb-14 A	100%	Prepare ba	seline air monit	oriba report &	submit to Eng	ICE and EPF	2											
C3840-EQ-240	Baseline air monitoring report review and approved by Eng, ICE and EPD	14d 0d 14-Feb-1		100%		ne air monitori				and EPD											
C3840-EQ-320	Quality Plan (G9.2.1) - Prepare and submit for Eng approval	28d 0d 14-Oct-1	3 A 30-Dec-13 A	100%	Quality Plan (G9	.2.1) - Prepare	and submit fo	Eng approval	I												
C3840-EQ-330	Quality Plan - Eng comment and approve	14d 0d 31-Dec-1	3A 28-Apr-14A	100%	Q	ıality P∣an - En	g comment and	approve													
Health & Safety Plan		74d 0d 11-Oct-1:	3 A 22-Jan-14 A																		
C3840-HS-100	Health and Safety Plan (G3.6.1) - Prepare and submit for Eng approval	60d 0d 11-Oct-1	3 A 13-Dec-13 A	100%	Health and Safety	Plan (G3.6.1)	Prepare and	ubmit for Eng	approval												
C3840-HS-110	Health and Safety Plan - Eng comment and approve	14d 0d 14-Dec-1	3A 22-Jan-14A	100%	Health and Sa	fety Plan - Eng	comment and	approve					 								
C3840-HS-130	System Assurance Plan as per App. K of PS - Prepare and submit for Eng approval	28d 0d 11-Oct-1	3 A 20-Dec-13 A	100%	System Assurance	Plan as per A	pp. K of P\$ - P	repare and su	bmit for Eng a	approval											
C3840-HS-140	System Assurance Plan - Eng comment and approve	14d 0d 21-Dec-1	3A 09-Jan-14A	100%	📮 Şystem Assurar	ce Plan - Eng	comment and a	pprove													
Programme Manager	ment	116d 0d 11-Oct-1	3 A 30-Mar-14 A																		
C3840-PM-100	Initial Three Month Rolling Programme (G4.8.1) - Prepare and submit for Eng review	14d 0d 11-Oct-1	3 A 28-Oct-13 A	100%	Initial Three Month Rolling	ng Prodramme	(G4 81) - Pre	nate and subm	nit for Engline	lew/											
C3840-PM-110	Preliminary Master Programme (G4.6.1) - Prepare and submit for Eng approval		3 A 12-Dec-13 A	100%	Preliminary Master				tor Eng appr	ovai											
C3840-PM-120	Preliminary Master Programme (G4.6.1) - Eng comment	28d 0d 13-Dec-1	3A 13-Jan-14A	100%	Preliminary Ma	ster Programm	ie (G4:6.1) - E	ng comment													
C3840-PM-130	Preliminary Master Programme (G4.6.1) - Re-submit for Eng approval	14d 0d 14-Jan-1	4 A 11-Feb-14 A	100%	Preliminary	Master Progra	mme (G4.6.1)	- Re-submit fo	or Eng approv	al											
C3840-PM-135	Preliminary Master Programme (G4.6.1) - Eng's further comment	14d 0d 12-Feb-1	4A 22-Feb-14A	100%	Preliminar	/ Master Progr	amme (G4.6.1) - Eng's furthe	er comment												
C3840-PM-136	Preliminary Master Programme (G4.6.1) - Further re-submission	14d 0d 23-Feb-1	4A 27-Feb-14A	100%	📕 🕻 Preliminar	y Master Prog	ramme (G4.6.) - Further re-	-submission												
C3840-PM-140	Preliminary Master Programme (G4.6.1) - Eng approval	14d 0d 28-Feb-1	4A 07-Mar-14A	100%	Prelimina	ary Master Pro	gramme (G4.6	1) - Ehg appro	oval				 								
C3840-PM-170	Submission Schedule (G12.11.1) - Prepare and submit for Eng approval	28d 0d 11-Oct-1	3 A 12-Nov-13 A	100%	Submission Schedule (G12.11.1) - Pr	epare and sub	nit for Eng app	proval												
C3840-PM-180	Submission Schedule - Eng comment and approve	28d 0d 13-Nov-1	3A 30-Mar-14A	100%	Subm	ission \$chedule	e - Eng comm	nt and approv	/e												
Temporary Works De	sign & Approval Process (Incl. Demolition)	1581d 175d 15-Oct-1	3A 30-Dec-18		Dd																
Hoarding Plan		84d 0d 15-Oct-1	3A 18-Mar-14A																		
C3840-TD-100	Prepare Hoarding Plan	27d 0d 15-Oct-1	3 A 11-Jan-14 A	100%	Preþaré Hóarð	ng Plah							 								
C3840-TD-110							andorao hu lO														
	Hoarding plan review & endorse by ICE		4 A 08-Mar-14 A	100%	Hoarding																
C3840-TD-120	Hoarding plan review & comment by Eng/MTRC	28d 0d 12-Jan-1	4 A 23-Jan-14 A	100%	Hoarding plan			TRC													
C3840-TD-140	Hoarding plan re-submission	11d 0d 24-Jan-1	4A 28-Feb-14A	100%	Hoarding	plan re-submis	siqn														
C3840-TD-150	Hoarding plan review & approve by Eng/MTRC	28d 0d 01-Mar-1	4A 18-Mar-14A	100%	Hoardir	ng plan review	& approve by E	ng/MTRC													
C3840-TD-160	Obtain Final Approval	0d 0d	18-Mar-14 A	100%	♦ Obtain	Final Approval							 								
Flood Protection Wa	all	89d 0d 01-Dec-1	3A 18-Mar-14A																		
Current Bar	Critical Remaining Work Data	Date: 01-Jun-18								<u></u>	<u></u>						RMP	PSA1	: []		<u> </u>
Actual Work					Master Pro	gramm	e Revis	ion RM	IPRSA	.1			F	Date	;	Revi			cked		prove
	Vork	Page 3 of 26				-							C)1-Jun-18				BG		AW	

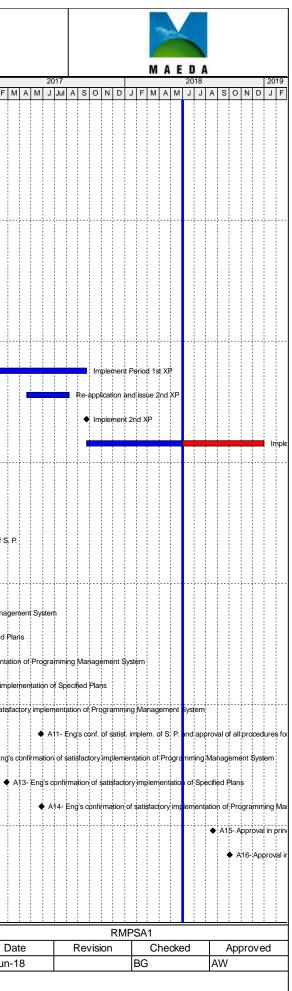
Current Bar		e: 01-Jun-18					RMPSA1	
C3840-ED-100 C3840-ED-110	Prepare Temporary Work Design Design review & endorse by ICE			A 12-Nov-13 A A 12-May-14 A		Preparé Témpbraty Work Design		
ELS Design for Tuni C3840-ED-100	Prepare Temporary Work Design			A 26-May-14 A				
C3840-DMD-450	Review & approve by Eng/MTRC			A 27-Jul-15 A	100%	Review & approve by Eng/MTRC		
				A 31-Oct-14 A				
C3840-DMD-430 C3840-DMD-440	Review & comment by Eng/MTRC Demolition Plan re-submission			A 23-Oct-14 A		Réview & comment by Eng/MTRC		
C3840-DMD-400				A 18-Sep-14 A		Develóp & submit Demoktion Plán		
	al for Demolition & Modification Works at Basement Wall of K11			A 27-Jul-15 A				
C3840-DMD-190	Final approval for demolition to commence granted		0d	18-Mar-14 A		◆ Final approvat for demolition to commence granted		
	Demolition plan review & approve by Eng/MTRC/ BD consultation					Demolition plan review & approve by Eng/MTRC/ BD consultation		
C3840-DMD-130				A 18-Mar-14 A				
C3840-DMD-120	Demolition plan re-submission			A 08-Mar-14 A		Demolition plan re-submission		
C3840-DMD-120	Demolition plan review & comment by Eng/MTRC/ BD consultation			A 13-Jan-14A		Demolition:plan review & comment by Eng/MTRC/BD consultation		
C3840-DMD-110	Demolition plan review & endorse by ICE			A 06-Mar-14 A		Demolition plan.review & endorse by ICE		
	Develop Demolition Plan, Temporary Works Design, Risk Assessment & Method Statement			A 24-Dec-13 A		Develop Demolition Plan, Temppraty Works Design, Risk Assessment & Method Statement		
	Existing D1, D2 and Subway			A 18-Mar-14 A				
C3840-TD-370	Obtain Final Approval	Od C	0d	23-Jun-14 A	100%			,
C3840-TD-360	Design review & approve by Eng/MTRC	28d 0	0d 27-Mar-14	A 23-Jun-14 A	100%	Design review & approve by Eng/MTRC		
C3840-TD-350	Design re-submission	18d 0	0d 01-Mar-14	A 26-Mar-14 A	100%	Design re-submission		
C3840-TD-340	Design review & comment by Eng/MTRC	28d 0	0d 10-Jan-14	A 14-Apr-14A	100%	Deşign; review & commont by;Eng/MITRC		
C3840-TD-330	Design review & endorse by ICE	24d 0	0d 27-Mar-14	A 11-Jun-14 A	100%	Design review & endorse by ICE		
C3840-TD-320	Prepare Temporary Work Design	24d 0	0d 16-Dec-13	A 09-Jan-14 A	100%	Prepare Temporary Work Design		
Temporary Work De	sign for Utilities Supports	118d 0	0d 16-Dec-13	A 23-Jun-14 A				
C3840-TD-310	Obtain Final Approval	Od 0	0d	23-Jun-14 A	100%	Obtain Final Approval		
C3840-TD-270	Design review and approve by Eng/MTRC	28d 0	0d 27-Mar-14	A 23-Jun-14 A	100%	Design review and approve by Eng/MTRC		
C3840-TD-260	Design re-submission	18d 0	0d 01-Mar-14	A 26-Mar-14 A	100%	Design re-submission		
C3840-TD-250	Design review and comment by Eng/MTRC	28d 0	0d 10-Jan-14	A 14-Apr-14 A	100%	Design review and comment by Eng/MTRC		
C3840-TD-240	Design review & endorse by ICE	40d 0	0d 27-Mar-14	A 11-Jun-14 A	100%	Design review & endotse by ICE		
C3840-TD-230	Prepare Temporary Work Design	24d 0	0d 18-Dec-13	A 09-Jan-14 A	100%	Prepare Temporaty Work Design		
Temporary Works De	esign for Temporary Traffic Decking	129d 0	0d 18-Dec-13	A 23-Jun-14 A				
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C3840-TD-210	Design review & approve by Eng/MTRC	28d 0	0d 05-Feb-14	A 18-Mar-14 A	100%	Design review & approve by Eng/MTRC		
C3840-TD-190	Design review & comment by Eng/MTRC	28d 0	0d 07-Jan-14	A 21-Jan-14 A	100%	Design review & contiment by Eng/MTRC		
C3840-TD-180	Design review & endorse by ICE	40d 0	0d 02-Jan-14	A 04-Feb-14 A	100%	Design revièw & eridorse by ICE		
C3840-TD-170	Prepare Temporary Work Design	24d 0	0d 01-Dec-13	A 06-Jan-14 A	100%	Prepare Temporary Work Design		
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	MTR					Tsim Sha Tsui Station, Carnarvon Road Subway	MAE	DA

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C3840-TTM-100 Appoint Traffic Consultant 0d 0d C3840-TTM-110 Pepare & submit review by Eng Outline TTM Schemes as per PS P20.4 6d 0d	d 16-Oct-13 A 13-Jun-14 A	A											
C3840-TTM-110 Pepare & submit review by Eng Outline TTM Schemes as per PS P20.4 6d 0d			Ann	point Traffic Consi	ultant								
	d 17-Oct-13A 23-Oct-13A			pare & submit;rev				P\$ P20 4					
							nes as per r	P3 P20.4					
	d 24-Oct-13 A 28-Oct-13 A			ng review Outline									
C3840-TTM-130 Prepare Detailed TTMS 5d 0d	d 24-Oct-13 A 30-Oct-13 A	3A 100%	Pr	repare Detailed T	TMS								
C3840-TTM-140 Discussion and agree in priniciple at TMLG Meeting 1d 0d		A 100%	f Di	iscussion and agr	ee in priniciple a	at TMLG Meeting	g						
Current Bar Critical Remaining Work Data Date: 01-Jun-18	d 30-Oct-13 A 30-Oct-13 A							D1 /=-					
Actual Work Milestone Page 5 of 26 Page 5 of 26			Ν	Master P	nogrom	n	vision]	RMPF	KSA1				

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ity ID		Activity Name	Orig Dur	Rem S Dur	Start	Finish	% Complete	Total Float	O N I	D J	FM	AM	2014 J Jul	AS	0 N	D J	FN	1 A N	2015 1 J Jul		SON		JFI	MAM	2016 J Jul	AS			FI
	C3840-TTM-150	Final TTMS Drawings	4d	Od 3	31-Oct-13 A	04-Nov-13 A	100%				MS Dra																		Ť
	C3840-TTM-160	Eng endorse TTMS Drawings	2d	0d (05-Nov-13 A	06-Nov-13 A	100%		l Er	nglen	lorse T	TMS D	rawings																
	C3840-TTM-170	TTMs endorse by HKP & TD and obtain road work addvice from RMO	18d	0d (07-Nov-13 A	24-Nov-13 A	100%			TTM	endors	e by H	KP & TD	and ob	tainro	adwo	kadd	vice fro	m RMO										
	C3840-TTM-180	Obtain Gazette Notice	18d	Od (07-Nov-13 A	14-Nov-13 A	100%			Obtain	Gazette	e Notic	9																
	C3840-TTM-190	Notification to Bus Company	28d	0d (07-Nov-13 A	04-Dec-13 A	100%			Noti	fication t	o Bus	Company	y															
	C3840-TTM-210	Relocate bus stop, trial run & TTMs implementation (road closure)	5d	Od (05-Dec-13 A	10-Dec-13 A	100%			Rel	ocate bu	is stop	trial run	& TTM	s imple	menta	tion (r	oad clo	sure)										
	C3840-TTM-220	Application & Approval of TTM Schemes for Piling work for TS and C&C	42d	0d 2	24-Jan-14 A	13-Jun-14 A	100%			1			🗖 Appli	ication 8	& Appr	oval of	ттм з	Scheme	es for Pilir	ng wc	ork for TS	S and (C&C						
	Excavation Permit (XP)		1581d	175d	15-Oct-13 A	30-Dec-18		0d																					
	 C3840-XP-100	XP in hand of MTR	0d	0d		15-Oct-13 A	100%	•	♦ XP ir	n hano	of MT	R																	
	C3840-XP-110	Transfer XP permit holder from MTR to Maeda & XP payment arrangement	15d	0d ·	15-Oct-13 A	31-Oct-13 A	100%		🗖 Tra	ansfer	XPper	mit hole	ler from	MTR to	Maed	a & XF	paym	ent arr	angemer	at									
	C3840-XP-130	Implement 1st XP	0d	0d (01-Nov-13 A		100%		♦ lm	pleme	nt 1st X	P																	
	C3840-XP-140	Implement Period 1st XP	1422d	Od (01-Nov-13 A	22-Sep-17 A	100%													—		<u> </u>				<u> </u>			-
	C3840-XP-150	Re-application and issue 2nd XP	180d	0d 2	20-Apr-17 A	09-Aug-17 A	100%																						
_	C3840-XP-160	Implement 2nd XP	0d	0d 2	23-Sep-17 A		100%																						
_	C3840-XP-170	Implement Period for 2nd XP	464d	213d 2	23-Sep-17 A	30-Dec-18	40.95%	0d																					
L	Milestones for Cost Ce	entre A- Preliminaries			29-Aug-14 A			88d																					
	C3840-MS-A01	A1-Approval of PMP, S. P., ICE, ELS design for Cofferdam & temp decking	0d			29-Aug-14 A	100%							▲ A1	Appro	valiof	PMP S	S P IC	E FISd	tesion	for Coff	erdam	a & terbr	p decking					
	C3840-MS-A02	A2-Approval of ELS design of mined tunnel & Eng's confirmation of satisfactory implem.of P. M.Syt.	0d			28-Oct-14 A	100%																	mation of		orvimol	em of P	M Svt	
	C3840-MS-A02	A3-Approval for mehod for demolition of K11 Diag. Wall & Eng's confirmation of satisfactory imperiment - MC9/c	0d 0d			13-Nov-14 A	100%																						
		Ρ.																						& Eng's c					э.г
	C3840-MS-A04	A4- Eng's confirmation of satisfactory implementation of Programming Management System	b0			30-Nov-14 A	100%									• A4- t								of Program				.em	
	C3840-MS-A05	A5- Eng's confirmation of satisfactory implementation of Specified Plans	0d			16-Mar-15 A	100%																	lementati					
	C3840-MS-A06	A6- Eng's confirmation of satisfactory implementation of Programming Management System	0d			19-May-15 A	100%											•						tory imple					
	C3840-MS-A07	A7- Eng's confirmation of satisfactory implementation of Specified Plans	Od	0d		12-Aug-15 A	100%													♠ A.	7- Eng's (of satisfac					
	C3840-MS-A08	A8- Eng's confirmation of satisfactory implementation of Programming Management System	0d	0d		04-Jan-16 A	100%															•	A8- En	ng's confi	mation o	f satisfa	ctory im	plemer	ntạti
	C3840-MS-A09	A9- Eng's confirmation of satisfactory implementation of Specified Plans	0d	0d		15-Mar-16 A	100%																•	♦ A9- En					
	C3840-MS-A10	A10- Eng's confirmation of satisfactory implementation of Programming Management System	0d	0d		29-May-16 A	100%																		♦ A10- E	ng's op	nfirmatic	n of sa	tişfa
	C3840-MS-A11	A11- Eng's conf. of satisf. implem. of S. P. and approval of all procedures for T&C of BS & ABWF works	0d	0d		26-May-17 A	100%																						
	C3840-MS-A12	A12- Eng's confirmation of satisfactory implementation of Programming Management System	0d	0d		27-Nov-16 A	100%																				• /	A12- Ei	ng's
	C3840-MS-A13	A13- Eng's confirmation of satisfactory implementation of Specified Plans	0d	0d		26-Feb-17 A	100%																						•
	C3840-MS-A14	A14- Eng's confirmation of satisfactory implementation of Programming Management System	0d	0d		28-May-17 A	100%																						
	C3840-MS-A15	A15- Approval in principle of draft O&M Manuals and draft As-built Drwgs. for Whole of the Works	0d	0d		19-Aug-18	0%	133d																					
	C3840-MS-A16	A16- Approval in principle of O&M Manuals and As-built Drwgs. for Whole of the Works	0d	0d		03-Oct-18	0%	88d																					
Car	rnarvon Road Sub	way and Entrances	1352d	122d ⁻	14-Oct-13 A	26-Oct-18		53d																					
In	strumentation		52d	0d ·	16-Dec-13 A	02-Apr-14 A																							
	Current Dor	Critical Remaining Work Data Date:	: 01-Ju	in-18														<u> </u>	<u> </u>	<u>. </u>	<u> </u>	<u> </u>	<u> </u>			<u> </u>		<u> </u>	<u> </u>
	Current BarActual Work	Critical Remaining Work Data Data Data Data Data Data							N	Aas	ster	Pro	ogra	mm	e R	evi	sioı	n R	MPF	RS/	\1						F		Da
	Remaining Work		5 01 20																								-	01-Ju	<u>in-</u>





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	Activity Name	Orig Rem Dur Dur	Start	Finish	% Complete	Total 2014 2015 Float O N D J F M M J Jul A S O N D J F M A M J Jul A S O N D J F M A M J Jul A S O N D J F M A M J Jul A S O N D J F M A M J Jul A S O N D J F M A M Jul A S O	2016 N D J F M A M J Jul A S O	N D J F M
C3840-INS-10	Prepare & submit instrumentation/monitoring plan for approval of Eng	28d 0d	16-Dec-13 A	28-Jan-14 A	100%	Prepare & submit instrumentation/monitoring plan for approval of Eng		
C3840-INS-20	Eng approve instrumentation/monitoring plan	7d 0d :	29-Jan-14 A	05-Feb-14 A	100%	Engapprove instrumentation/monitoring plan		
C3840-INS-30	Installation of instrumentations	12d 0d	07-Jan-14 A	25-Feb-14 A	100%	Installation of instrumentations		
C3840-INS-40	Initial reading and agreement with Eng	14d 0d 2	24-Feb-14 A	30-Mar-14 A	100%	Initial reading and agreement with Eng		
C3840-INS-50	Commence regular monitoring	Od Od	02-Apr-14 A		100%			
Utility Diversion		1292d 0d	14-Oct-13 A	12-Dec-15 A				
C3840-UTD-010	Utility Detection Survey incl. prepare survey report	12d 0d	02-Nov-13 A	11-Dec-13 A	100%	Utility Detection Survey incl. prepare survey report		
C3840-UTD-030	Notification to Utility Companies and 1st ULG meeting	46d 0d	14-Oct-13 A	28-Nov-13 A	100%	Notificatión tó Utility Companies and 1st ULG meeting		
C3840-UTD-040	Relocation of mail box			06-Dec-13 A	100%	Relocation of mail box:		
C3840-UTD-110	Relocation of Telephone Kiosk by PCCW	40d 0d :	23-Dec-13 A	08-Jan-14 A	100%	Reliocation of Telephone Kiosk by PCCW		
C3840-UTD-290	Diversion of Gasmain crossing tunnel shaft	57d 0d	13-Feb-14 A	26-Mar-14 A	100%	Diversion of Gasmain crossing tunnel shaft		
C3840-UTD-295	Exposure & temporary support to underground gasmain and cable duct at TS	64d 0d	11-Mar-15 A	30-Jun-15 A	100%	Exposure & I	emporary support to underground gasmain a	and cable duct at T
C3840-UTD-320	Exposure & slewing of underground utilities for driving pipe piles execept D2 a	irea 57d 0d	13-Feb-14 A	31-Oct-14 A	100%	Exposure & slewing of underground utilitie	s for driving pipe piles execept D2 area	
C3840-UTD-335	Temporary Diversion of existing watermain that clash with temp. staircase	40d 0d 2	28-May-15 A	17-Jul-15 A	100%	Temporary	Diversion of existing watermain that clash wi	ith temp. staircase
C3840-UTD-360	Removal of Street Lighting Post near D2	57d 0d	13-Feb-14 A	23-May-14 A	100%	Removal of Street Lighting Post near D2		
C3840-UTD-455	Exposure & slewing of underground utilities for driving pipe piles at D2 area	51d 0d	07-Oct-15 A	12-Dec-15 A	100%		Exposure & slewing of underground u	itilities for driving pi
Remove Existing Esca	alator by Specialist Contractor	109d 0d	01-Mar-16 A	05-Aug-16 A				
C3840-ESC-110	Appoint Specialist Contractor	0d 0d		11-Mar-16 A	100%		♦ Appoint Specialist Contracto	or
C3840-ESC-120	Prepare method statement & delivery route for removal of exist. Escalator	6d 0d	01-Mar-16 A	11-Mar-16 A	100%		Prepare method statement	t & delivery route fc
C3840-ESC-130	Eng review and approve method statement & delivery route for removal of exit			02-Jun-16 A	100%			approve method sta
C3840-ESC-140	Liaise with maintenance Contractor via. Eng and submit Form EL3 to EMSD		06-Apr-16 A		100%			aintenance Contra
C3840-ESC-150	EMSD/MTRC decommission exisiting escalator	3d 0d 0	06-Jul-16 A	06-Jul-16 A	100%		I EMSD/MTRC	C decommission ex
C3840-ESC-152	MTR's testing on Existing Escalator	2d 0d	07-Jul-16 A	08-Jul-16 A	100%		I MTR's testing	g on Existing Escala
C3840-ESC-160	Remove existing escalator	14d 0d	11-Jul-16 A	05-Aug-16 A	100%		📫 Remove	existing escalator
Open Cut Sequence 1	(Advance Ground Works & Piling Works)	778d 0d	13-Nov-13 A	30-Sep-16 A				
Advance Ground Wo	orks	113d Od	13-Nov-13 A	24-Jul-14 A				
C3840-AGW-010	Site dearance	24d 0d	13-Nov-13 A	10-Dec-13 A	100%	Site clearance		
C3840-AGW-020	Trial Pit/trench excavation	69d Od	14-Nov-13 A	31-Mar-14 A	100%	Trial Pittren¢h excavation		
C3840-AGW-030	Temporary Hoarding Erection	15d 0d	11-Dec-13 A	30-Dec-13 A	100%			
C3840-AGW-040	Pre-drilling works			24-Jan-14 A	100%	Pre-drilling works		
C3840-AGW-040	Permanent Hoarding Erection			08-Apr-14 A	100%			
						Permanent Hoarding Erection		
C3840-AGW-070	Joint Survey & Remove existing BS & ABWF Services			22-Feb-14 A	100%	Joint Survey & Rémove existing BS & ABW/F Services		
C3840-AGW-080	Close D1 & Construct Flood Barrier at D1	9d 0d :	23-Feb-14 A	27-Feb-14 A	100%	Close D1 & Construct Flood Barrier at D1		
C3840-AGW-100	Demolish D1 above GL	12d 0d	18-Mar-14 A	24-Apr-14 A	100%	Demolish D1 above GL		
Current Bar	Critical Remaining Work	Data Date: 01-Jun-18		1	<u> </u>		<u></u>	
Actual Work	 ♦ ♦ Milestone 	Page 7 of 26				Master Programme Revision RMPRSA1		Date
Remaining W	lork	1 490 7 01 20						01-Jun-18

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		Activity Name			Finish		Float				A M J	Jul A S	OND	D J F	MAN	2016 / J Jul	A S O	ND	JFMA			OND	JFM	20 A M J	JAS	O N
	3840-AGW-120	Install temporary steel deck platform in D1 opening	9d	0d 25-Apr-14 A	22-May-14 A	100%		install	emporary steel de	eck platform	in D1 ope	ening														
	3840-AGW-130	Relocate hoarding along south footpath	4d	0d 08-May-14 A	13-May-14 A	100%		Relocat	e hoarding along	south footpat	th															
Discretion Non-state Discretion Discretion <td>C3840-AGW-140</td> <td>Implement TTA stg 1 to expose utilities/left-in piles & slewing cables as necessary along south footpath</td> <td>ı 1d</td> <td>0d 23-May-14 A</td> <td>23-May-14 A</td> <td>100%</td> <td></td> <td>I Impler</td> <td>nent TTA stg 1 to</td> <td>expose utilitie</td> <td>es/left-in p</td> <td>viles & slev</td> <td>ing cables</td> <td>as nece</td> <td>ssary alon</td> <td>g south fo</td> <td>ootpath</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>	C3840-AGW-140	Implement TTA stg 1 to expose utilities/left-in piles & slewing cables as necessary along south footpath	ı 1d	0d 23-May-14 A	23-May-14 A	100%		I Impler	nent TTA stg 1 to	expose utilitie	es/left-in p	viles & slev	ing cables	as nece	ssary alon	g south fo	ootpath									
000000110 000000010 000000000 000000000000000000000000000000000000	3840-AGW-150	Complete expose utilities/left-in piles & cable slewing as necessary	0d	0d	21-Jul-14 A	100%		•	Complete expose	utilities/left-i	n piles & d	cable slew	ing as nece	essary												
	3840-AGW-160	Implement TTA stg 2 (diversion of pedestrain route)	1d	0d 22-Jul-14 A	22-Jul-14 A	100%		1	Implement TTAs	tg 2 (diversio	on of pede	estrain rou	te)													
	3840-AGW-170	Relocate hoarding to suit pipe piling	4d	0d 23-Jul-14 A	24-Jul-14 A	100%			Relocate hoardir	a to suit pipe	e piling															
Condition Notation Notation <t< td=""><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></t<>																										
GLBP5401 GLBP1401 GLBP14011 GLBP1	C3840-EVS-010	Mobilization for Piling Rig and Setup	4d	0d 08-Apr-14 A	28-Apr-14 A	100%		Mobilizati	on for Rilinġ Rig ai	ld Setup																
GRUE P10 00 Guide Course junctum Hit Bit 2 August A Formation For	C3840-EVS-015	1 no. test pile & 3 nos. performance piles	6d	0d 08-May-14 A	22-May-14 A	100%		🗖 1 no. t	est pile & 3 nos. p	erformance p	pilės															
Construction No.	C3840-EVS-020	39 nos. pipe piles	35d	0d 23-May-14 A	09-Aug-14 A	100%			39 nos. pipe pi	es																
close 475 200 Price, positional Color, que / Price Price, positional Color, que / Price Price Positional Color, que / Price P	C3840-EVS-040	Curtain Grouting at vertical shaft	18d	0d 25-Aug-14 A	18-Oct-14 A	100%			Curtai	n Grouting at	t vertical s	shaft														
C3X017563 Carab rule right C4. copy: Si Si JOPOH Non-Si Si Si JOPOH Non-Si Si	s & Grouting for Tem	porary Staricase & C&C Subway	685d	0d 14-Jun-14 A	24-Sep-16 A																					
CARCIPSON Cardination for the region for the regio	3840-ETS-020	79 nos. pipe piles along Grid Line A	47d	0d 15-Jul-14 A	05-Feb-15 A	100%				79 no:	s. pipe pil	es along C	Grid Line A													
CONNUMBRATION OR OR DOWNAND	3840-ETS-028	Curtain Grouting for C&C, stage 1	24d	0d 23-Dec-14 A	13-Mar-15 A	100%				c	urtain Gr	routing for	C&C, stage	e 1												
Call D12502 This pape partnerses Gal 127 Gol 10 D0-MA D50-MA D5	3840-ETS-029	Curtain Grouting for C&C. stage 2	30d	0d 09-Aug-16A	24-Sep-16 A	100%												urtain Gr	outing for C	&C. stage	2					
GNUETFOOD Det N4 40 (audualing fur relation and guing fur relation fur r									200	n pipo pilon	hatwaan	Gride 1.8	2													
Carrier Target Data to fact for data seed, Hr, HA 19 and stabilized to H14x1H Hold Of the Feb A A 54b 15 A Hold B to H1 To Expland seed, Hr, HA 19 and stabilized to H14x1H Hold Hold Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 15 Expland seed, Hr, HA 19 and W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and Handliged to H14x1H Hold W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and Handliged W 14 HA 1000 Hold W 15 Expland seed, Hr, HA 19 and Handliged W 14 HA 1000 Hold W 15 Expland Seed, Hr, HA 19 and Hand 19 A 19 A 1000 Hold W 15 Expland Seed																										
CMARE 8T 502 reperter TT M 50 or 2 Log 44. 2 Or 10.4. 2 Or 10.4. 2 Or 10.4. 0 Or 0.4. CAME 8T 502 Restant or drawing & legister IT M 504 Get 20 Step 4.4. 2 Or 10.4. 2			6d																							
CMAD FTE 300 Factors of Namely & Reprinter TUM 96 6 0 2000 FTE 300 Fee Backers of Namely & Reprinter TUM 98 6 60 6000000000000000000000000000000000000	3840-ETS-044	Drill for H5 (rock socket), H6, H7 & H8 and Install/grout for H4 to H8	17d	0d 02-Feb-15 A	25-Feb-15 A	100%				Dril	ll for H5 (r	rock socke	et), H/6, H/7	& H8 an	nd Inistall/g	rout for H	14 to H8									
C386 FT 56 Tut finds account for damp and para gas any Nullian Read 10 0 2 500-54 4 6 100 10 0 10	3840-ETS-052	Implement TTM 803	6d	0d 21-Oct-14A	22-Oct-14 A	100%			I Impler	nent TTM 80	03															
Caseb-EF6 cm Type III Sheer Pa. 102n sing bahan Road 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6//// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6///// 6////// 6///// 6///// 6///// 6////// 6///// 6///// 6//	3840-ETS-053	Relocation of hoarding & Implement TTM 804	6d	0d 20-Nov-14 A	28-Nov-14 A	100%			E R	elocation of I	hoarding	& Impleme	ent TTM 80	94												
C2860-TE-070 Type III Sheet Plik aing Caranova Raad Tab Gal L-L-L-L L-L-L-L <thl-l-l-l< th=""> L-L-L-L L-L-L-L<td>3840-ETS-054</td><td>Trial trench excavation for driving sheet pile along Nathan Road</td><td>12d</td><td>0d 23-Oct-14A</td><td>04-Nov-14 A</td><td>100%</td><td></td><td></td><td>🖬 Trial</td><td>trench excav</td><td>vation for</td><td>driving sh</td><td>eet pile aloi</td><td>ng Natha</td><td>an Road</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></thl-l-l-l<>	3840-ETS-054	Trial trench excavation for driving sheet pile along Nathan Road	12d	0d 23-Oct-14A	04-Nov-14 A	100%			🖬 Trial	trench excav	vation for	driving sh	eet pile aloi	ng Natha	an Road											
C3800-FTS-007 Tote Grouting (only listing grout pipe) along Nathen Road & Carrainon Road 86 00 27-Jun-14A 07-Jun-14A 100% C3800-FTS-007 Tote Grouting (only listing grout pipe) along Nathen Road & Carrainon Road 86 00 27-Jun-14A 100% C3800-FTS-007 Modulation: 2nd Plang Rg and Seaup 46 00 2-Jun-14A 100% 9 9 100 modulation: 2nd Plang Rg and Seaup 9 00 0-Jun-14A 100% 9 <th< td=""><td>3840-ETS-060</td><td>Type III Sheet Pile, 102m along Nathan Road</td><td>6d</td><td>0d 05-Nov-14 A</td><td>21-Nov-14 A</td><td>100%</td><td></td><td></td><td>🗖 Ту</td><td>pe III Sheet I</td><td>Pile, 102n</td><td>n along Na</td><td>athan Road</td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td></th<>	3840-ETS-060	Type III Sheet Pile, 102m along Nathan Road	6d	0d 05-Nov-14 A	21-Nov-14 A	100%			🗖 Ту	pe III Sheet I	Pile, 102n	n along Na	athan Road													
C3840-ETS-00 Toe Grouting Pair allea aung Nathan Road & Carrarvon Road 84 00 <td>3840-ETS-070</td> <td>Type III Sheet Plle along Carnarvon Road</td> <td>12d</td> <td>0d 14-Jun-14 A</td> <td>25-Jun-14 A</td> <td>100%</td> <td></td> <td>П ТУ</td> <td>e III Sheet Pile a</td> <td>long Carnary</td> <td>von Road</td> <td></td>	3840-ETS-070	Type III Sheet Plle along Carnarvon Road	12d	0d 14-Jun-14 A	25-Jun-14 A	100%		П ТУ	e III Sheet Pile a	long Carnary	von Road															
C3840-ETS-00 Toe Grouting Pair allea aung Nathan Road & Carrarvon Road 84 00 <td>3840-ETS-075</td> <td>Toe Grouting (only install grout pipe) along Carnaryon Road</td> <td>8d</td> <td>0d 27-Jun-14 A</td> <td>07-Jul-14 A</td> <td>100%</td> <td></td> <td></td> <td>pe Grouting (only</td> <td>install grout</td> <td>pipe) alor</td> <td>ng Carnar</td> <td>von Road</td> <td></td>	3840-ETS-075	Toe Grouting (only install grout pipe) along Carnaryon Road	8d	0d 27-Jun-14 A	07-Jul-14 A	100%			pe Grouting (only	install grout	pipe) alor	ng Carnar	von Road													
C3840-ETS-090 Mobilization: 2nd Pling Rig and Satup 4 00 05-Jul-14A 14-Jul-14A 100% C3840-ETS-090 Mobilization: 2nd Pling Rig 10 02 02-Sep-14A 100% 1 Demobilization: 2nd Pling Rig and Satup 1 0 0 05-Jul-14A 100% 1 Demobilization: 2nd Pling Rig and Satup 1 0 0 05-Sep-14A 100% 1 Demobilization: 2nd Pling Rig and Satup 1 0<														2 & hen	Darnaryon	Road										
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C3840-ETS-094 Mobilization: Drilling Rig for Curtain Grouting for TM803 1d 0d 22-Oct-14A 100% 1 C3840-ETS-095 Demobilization for Drilling Rig & Mobilization for Curtain Grouting Rig 1d 0d 12-Nov-14A 12-Nov-14A 100% 1 Demobilization: Drilling Rig & Mobilization; for Curtain Grouting Rig 1 Demobilization: Curtain Grouting Rig 1 1 1 Demobilization: Curtain Grouting Rig 1	3840-ETS-092	Mobilization; Drilling Rig for Curtain Grouting for TM800	1d	0d 26-Sep-14 A	26-Sep-14 A	100%			l Mobilizati	on; Drilling R	ig for Cur	rtain Grou	ting for TM	800												
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C3840-ETS-096 Demobilization: Curtain Grouting Rig 1d 0d 28-Nov-14A 100% Image: Cartain Grouting Rig Ima	3840-ETS-094	Mobilization; Drilling Rig for Curtain Grouting for TM803	1d	0d 22-Oct-14 A	22-Oct-14 A	100%			l Mobili	zation; Drillin	g Rig for (Curtain G	routing for	TM803												
C3840-ETS-097 Mobilization: Drilling Rig 1d 0d 29-Nov-14A 100% Image: Constraining Rig	3840-ETS-095	Demobilization for Drilling Rig & Mobilization for Curtain Grouting Rig	1d	0d 12-Nov-14 A	12-Nov-14 A	100%			I Der	nobilization f	or Drilling	Rig & Mo	bilization fo	r Curtair	n Grouting	Rig										
C3840-ETS-097 Mobilization: Drilling Rig 1d 0d 29-Nov-14A 100% Image: Constraint of the c	3840-ETS-096	Demobilization: Curtain Grouting Rig	1d	0d 28-Nov-14 A	28-Nov-14 A	100%			I D	emobilization	n: Curtain	Grouting	Rig													
C3840-ETS-098 Demobilization: Drilling Rig 1d od 12-Dec-14 A 100% 12-Dec-1																										
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C3840-ETS-099	Mobilization: Curtain Grouting Rig		1d	0d 13-Dec-14 A	A 13-Dec-14 A	100%								1	Mobilizati	ion: C	urtain G	routing	g Rig							
C3840-ETS-101	Demobilization: Curtain Grouting Rig		1d	0d 14-Dec-14 A	A 14-Dec-14 A	100%								1	Demobili	zatior	i: Curtair	ו Grou	ting Ri	g						
C3840-ETS-102	Demobilization: Piling Rig		1d	0d 25-Feb-15A	A 25-Feb-15 A	100%										Demo	obilizatio	n: Pilinç	g Rig							
C3840-ETS-110	56 nos. pipe piels along Grid Line B		25d	0d 24-Jul-14 A	11-Dec-14 A	100%								-	6 nos. p	ipe pi	iels alono) Grid I	Line B							
C3840-ETS-120	Curtain Grouting along Grid Line B		13d	0d 30-Sep-14 A	A 26-Jan-15 A	100%							-	_	Cur	rtain C	Grouting	along	Grid L	ine B						
Piles & Grouting for Re	maining Section of Cofferdam at D2		63d	0d 17-Aug-16 A	30-Sep-16 A																					
C3840-ECD-010	Mobilization for Piling Rig and Setup		4d	0d 17-Aug-16 A	A 18-Aug-16 A	100%																		I	Mobili	zatio
C3840-ECD-012	Construct 2 nos. king posts		2d	0d 19-Aug-16 A	A 23-Aug-16 A	100%																			Cons	struc
C3840-ECD-020	Construct 22 nos, pipe piles at D2		22d	0d 25-Aug-16 A	A 17-Sep-16A	100%																			Co	ohst
C3840-ECD-021	Construct 5 nos. pipe piles between Grids 1 & 2		7d	0d 19-Sep-16 A	A 26-Sep-16A	100%																			∎ c	Cons
C3840-ECD-022	Demobilize piling rig and mobilize & setup curtan grouting rig		2d	0d 19-Sep-16A	A 20-Sep-16A	100%																			I De	emc
C3840-ECD-030	Curtain Grouting along Grid Line B at D2		8d	0d 21-Sep-16 A																						
		12				10070	1044																			
	xcavation for Temporary Staricase)		281d	0d 26-Jan-14 A			124d																			
Excavation		2	209d	0d 12-Feb-15 <i>A</i>	02-Nov-15 A																					
C3840-EXC-100	Pump test prior to excavate for temporary staricase		24d	0d 12-Feb-15A	A 18-Feb-15 A	100%									∎ F	Pump	test prio	r to exc	cavate	for temp	porary	staricase				
C3840-TSE-10	Demolish temporary D1 & investigation of extent and nature of artificial obs	struction	66d	0d 26-Feb-15 A	A 19-May-15 A	100%									-		Der	nolish t	tempor	rary D1 8	& invest	tigation o	fexten	t and r	ature o	ofa
C3840-TSE-12	Excavate (+5.5mPD to +4.7mPD), install waling/strut (L1), traffic deck & pa obstruction	artially remove unknown	35d	0d 26-Feb-15 A	11-Apr-15 A	100%									-	-	Excavate	∍ (+ 5.5)	mPD t	:d +4.7m	PD), in	nstall walir	ng/strut	(L1),	raffic c	Jeck
C3840-TSE-14	Excavate 2nd layer (+4.7mPD to +1.7mPD) install waling L1A/L1B & partia obstruction	ally remove unknown	23d	0d 13-Apr-15 A	09-May-15 A	100%										-	Exca	vate 2r	nd laye	ər (+4.7n	nPD to	+1.7mPD)) instal	.ll walin	g L1A/I	L1B
C3840-TSE-16	Flame cut existing encasing sheetpiles up to +1.7mPD		16d	0d 06-May-15 A	A 23-May-15 A	100%											🗖 Fla	me cut	t existir	ng encas	ing she	etpiles ur	p to +1.	.7mPD		
C3840-TSE-18	Lagging between pipe piles and preparation works for waterproofing to +1	I.7mPD	18d	0d 14-May-15 A	A 05-Jun-15 A	100%											= 4	agging	betwe	en pipe	piles ar	nd prepar	ration v	vorks f	or wate	erpr
C3840-TSE-20	Existing concrete infill removal up to +1.7mPD		12d	0d 21-May-15 A	A 04-Jun-15 A	100%											E E	xisting	concre	ete infill r	emqval	l up to +1.	.7mPD	,		
C3840-TSE-22	Waling & strut installation L2		9d	0d 01-Jun-15 A	10-Jun-15 A	100%											∎ v	Valing	& strut	t installati	ion L2					
C3840-TSE-24	Excavation from +1.7mPD to -0.87mPD		13d	0d 05-Jun-15 A	19-Jun-15 A	100%												Excava	ation fr	rom +1.7	mPD te	d -0.87mF	PD			
C3840-TSE-26	Flame cut existing encasing sheetpiles up to -0.87mPD		7d	0d 09-Jun-15 A	16-Jun-15 A	100%												Flame	cut ex	isting en	casing	sheetpiles	s up to	-0.87r	nPD	
C3840-TSE-28	Existing concrete infill & RC wall removal up to -0.87mPD		13d	0d 12-Jun-15 A	27-Jun-15 A	100%												Existir	ng qon	crete inf	ill & RC	wall rem	noval ur	p to -0	87mPl	S
C3840-TSE-30	Lagging between pipe piles and preparation works for waterproofing to -0	1.87mPD	23d	0d 16-Jun-15 A	. 14-Jul-15 A	100%												Lac	gging t	petween	pipe pil	les and pr	reparat	tion wr	rks for	wa
C3840-TSE-31	Excavate up to +4.2mPD at C&C (grid 2-4) & install traffic deck		34d	0d 22-Jun-15 A	31-Jul-15 A	100%																PD at C&C				
C3840-TSE-32	Excavation from -0.87mPD to -2.2mPD		18d	0d 16-Jul-15 A																		nPD to +2				
C3840-TSE-32				0d 20-Jul-15 A	-																	asing she			3 2-5	
	Flame cut existing encasing sheetpiles up to -3.3mPD		15d																							
C3840-TSE-36	Existing concrete infill & RC wall removal up to -3.3mPD		12d	0d 30-Jul-15 A																		& RC wa				
C3840-TSE-38	Lagging between pipe piles and preparation works for waterproofing to -3	3.3mPD	9d	0d 10-Aug-15 <i>A</i>	-																	e piles ar		aration	work	s for
C3840-TSE-40	Waling & strut installation L3		6d	0d 13-Aug-15 A															Walin	ng & strut	t installa	ition L3				
C3840-TSE-42	Excavation (grid 1-2) up to -3.3mPD		8d	0d 25-Aug-15 A	02-Sep-15 A	100%													Exca	avation (grid 1-:	2) up to -	3.3mPI	D		
C3840-TSE-44	Flame cut existing encasing sheetpiles up to -3.3mPD		6d	0d 28-Aug-15 A	A 04-Sep-15 A	100%	1												Flar	me cut e	xisting (encasing	sheetp	iles up	to -3.3	3mP
Current Bar	Critical Remaining Work	Data Date: 01	-Jun	-18	1		L	1 1					<u> </u>				<u> i</u>	<u> </u>	<u> </u>		<u> </u>	<u> </u>			<u> </u>	<u>.</u>
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		Activity Nome	i	wie !	D	Chart	Linish		Total			2044				015			0010			
D		Activity Name	1	Dur	Dur	Start	Finish	% Complete	Float O N D	JFI	M A M	2014 J Jul /	ASON	DJFN			N D J F			I A S C		
	C3840-TSE-48	Lagging between pipe piles and preparation works for waterproofing to -3	3.3mPD	3d	0d	05-Sep-15 A	08-Sep-15 A	100%								I La	ging between	pipe piles	and prep	aration wo	vorks for wa	terprpofi
	C3840-TSE-50	Waling & strut installation L4		6d	0d	09-Sep-15 A	15-Sep-15 A	100%								∎ W	aling & strut in	stallation L	_4			
	C3840-TSE-52	Excavation up to formation at grid 1-2 & up to +3.75mPD at grid 2-4		8d	0d	09-Sep-15 A	30-Sep-15 A	100%									Excavation up t	o formatic	on at grid	1-2 & up t	to +3.75mP	D at grid
	C3840-TSE-58	Lagging between pipe piles and preparation works for waterproofing to for	ormation level	4d	0d	26-Oct-15 A	02-Nov-15 A	100%									Lagging be	tween pip	e piles an	id prepara	ation works	for wate
	C3840-TSE-60	Formation & place mass concrete foundation stage 1		2d	0d	24-Sep-15 A	26-Sep-15 A	100%								l F	ormation & pla	açe mass /	concrete f	foundation	n stage 1	
	C3840-TSE-62	Place mass concrete formation (remaining)		3d	0d	28-Oct-15 A	02-Nov-15 A	100%									Place mass	s concrete	formatior	n (remainir	ing)	
	Additional Unforseen	Obstruction		6d	0d	03-Jul-15 A	27-Oct-15 A															
	C3840-AOB-100	Prepare MS and carryout trial for trimming bulged section of existing TST	Sto wall	1d	b0	03-Jul-15 A	07-Jul-15A	100%								Prenare M	S and carryou	t trial for tr	rimmina b	ulaed sea	tion of exist	ina TST
	C3840-AOB-102	Investigation, prepare MS and trimming to expose rebar at exising TST St	tn wall	1d	0d	11-Jul-15 A	04-Aug-15 A	100%									ation, prepare					
	C3840-AOB-104	Remove overpour section of TST Stn wall from +1.0mPD to -1.0mPD		4d	0d	07-Aug-15 A	11-Aug-15 A	100%								Remo	ve overpour se	ction of T	ST Striwa	all from +1.	1.0mPD to -	1.0mPD
	C3840-AOB-106	Prepare MS and trimming to expose rebar at existing subway wall		5d	0d	07-Aug-15 A	12-Aug-15 A	100%								Prepa	re MS and trim	ming to e	xpose reb	aratexisti	sting subway	/ wall
	C3840-AOB-108	Remove overpour section of wall at existing subway from -1.0mPD to -2.0)mPD	2d	0d	14-Aug-15 A	15-Aug-15 A	100%								I Remo	ve overpour se	ection of w	/all at exist	ting subwa	/ay from -1.	0mPD to
	C3840-AOB-110	Remove overpour section of wall at existing subway from -2.0mPD to -3.5	5mPD 3	60d	0d	15-Aug-15 A	19-Sep-15 A	100%								— R	emove overpo	ur section	of wall at	existing s	subway from	າ -2.0mP
	C3840-AOB-112	Remove overpour section of RC structure at TST Station from -3.5mPD to	to formation level 2	29d	0d	21-Sep-15 A	27-Oct-15 A	100%									Remove ov	erpour se	ction of R(C structur	re at TST S	tation fro
R	emoval of ACM by Oth	er		1d	0d	08-Oct-14 A	16-Nov-14 A															
		Diversion of existing BS & MCB at the breakthrogh location		6d		08-Oct-14 A		100%						arcion of avia	ing BS&A	ICB at the bre	akthrogh locati	ion				
	C3840-ACM-105	Relocation of existing EIB at Entrance D, Concourse Level (additional wor	rk)	9d	0d	08-Oct-14 A	24-Oct-14 A	100%					Re	location of ex	isting EIB a	it Entrance D,	Concourse Lev	el (additlo	nal work)			
	C3840-ACM-110	Removal of ACM by other		6d	0d	16-Nov-14 A	16-Nov-14 A	100%						Removal of A	CM by oth	ər						
R	C Structure (Temporar	y Staricase)	10	50d	0d	19-Aug-15 A	12-Mar-16 A															
	Section between Grid	I 2 and 4	2	94d	0d	19-Aug-15 A	20-Nov-15 A		· - · · · · · · · · · ·													
	Bay 1 (Base Slab at	t +0.18mPD)		5d	0d	19-Aug-15 A	31-Aug-15 A															
	C3840-TSR-100	Falsework & soffit fwk		4d	0d	19-Aug-15 A	22-Aug-15 A	100%								I False	work & soffit f	wk				
	C3840-TSR-105	Rebar fixing		4d	0d	25-Aug-15 A	28-Aug-15 A	100%								Reb	ar fixing					
	C3840-TSR-110	Water proofing system, erect fwk & concreting (13.5m3)		0d	0d	20-Aug-15 A	31-Aug-15 A	100%								■ Wat	er proofing sys	stem, erec	tfwk&cc	oncretina ((13.5m3)	
		0.36mPD to +2.2mPD)				01-Sep-15 A	-															
	C3840-TSR-120	Rebar fixing for sidewall and end wall		2d	0d	01-Sep-15 A	02-Sep-15 A	100%								Ret	ar fixing for sic	ewall and	end wall			
	C3840-TSR-125	Install water proofing membrane, fwk erection & concreting (5.0m3)		4d	0d	03-Sep-15 A	08-Sep-15 A	100%								l Ins	tall water proo	ing memb	orane, fwk	¢ erection a	a & concretin	g (5.0m
	Bay 3 (Staircase at	from +2.2 to +4.2mPD)		7d	0d	09-Sep-15 A	16-Sep-15 A															
	C3840-TSR-135	Falsework & soffit fwk		2d	0d	09-Sep-15 A	10-Sep-15 A	100%								I Fa	lsework & soffi	t fwk				
	C3840-TSR-140	Rebar fixing		3d	0d	11-Sep-15 A	14-Sep-15 A	100%								I Re	əbar fixing					
	C3840-TSR-145	Water proofing, fwk and concreting (6.0m3)		3d	0d	14-Sep-15 A	16-Sep-15 A	100%								I W	ater proofing,	fwk and c	concreting	ı (6.0m3)		
	Bay 4 (Staircase fro	om +4.2 to +6.1mPD)		6d	0d	17-Sep-15 A	23-Sep-15 A															
	C3840-TSR-185	Rehar fixing		4d	b0	17-Sep-15 A	21-Sep-15 A	100%								I R	ebar fixing					
																		(4) -				
	C3840-1 SR-190	Fwk & concreting (14.5m3)		3d	Ud	21-Sep-15 A	23-Sep-15 A	100%									wk & concretir	g (14.5m	3)			
			Data Date: 01-	lun.	-18																	
	Current Bar	Critical Remaining Work		Jun							ъ		-		D7							-
	Current Bar Actual Work Remaining Work	 ♦ Milestone 	Page 10 of						Μ	aste	r Prog	grar	nme R	evisio	n RM	PRSA1					01-	Date Jun-18-

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MA	М	J	17 Jul	A	S	0	N	D	J	F	М		М	20 J	18 J	A	S	0	N	D	20 ⁻ J	19 F
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grid 2-4																						
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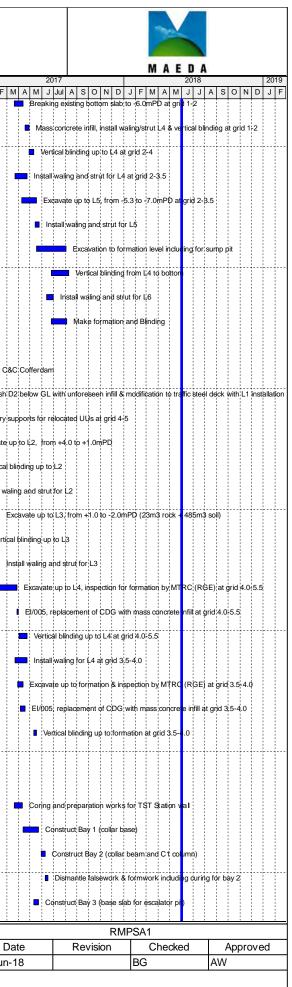
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Activity ID	_	Activity Name	Du	ir D		Finish	% Complete	Total Float	N D	JFMA		14 Jul A	SO	N D J	I F N	M A	201 M J J		S O N	D	JFN		2016 N J Ju		5 0 N	D J	F
	Bay 5 (Staircase fr	om +0.33 to 2.2mPD)	10	d (0d 24-Sep-1	15 A 29-Sep-15 A																					
	C3840-TSR-200	Soffit fwk	2	d (0d 24-Sep-1	15 A 25-Sep-15 A	100%												I Soffit I	fwk							
	C3840-TSR-210	Rebar fixing, fwk for risers & concreting (2.0m3)	2	d (0d 26-Sep-1	15 A 29-Sep-15 A	100%												Reba	ir fixin	g, fwk f	or riser:	s & conc	reting (2.0m3)		
	Bay 6 (walls & roo	f from 2.2mPD to 4mPD)	12	d (0d 02-Oct-1	5A 12-Oct-15A																					
	C3840-TSR-150	Strike fwk, form cj, install waterproofing membrane & rebar fixing	4	d (0d 02-Oct-1	5A 06-Oct-15A	100%												Strik	e fwk	, form (cj, instal	waterp	roofing	membra	ne & re	əbar
	C3840-TSR-165	Erect fwk/working platform & concreting (16.0m3)	5	d (0d 07-Oct-1	5A 12-Oct-15A	100%												Ere	ct fwk	/workin	ıg platfc	rm & cc	ncretin	g (16.0m	3)	
	Bay 7 (walls & roo	f from +4mPD to +5.7mPD)	6	d (0d 13-Oct-1	5A 19-Oct-15A																					
	C3840-TSR-215	Strike fwk, remove working platform, form cj & rebar fixing	2	d (0d 13-Oct-1	5A 14-Oct-15A	100%												I Stri	ke fw	k, remc	ove worl	<ing pla<="" td=""><td>tform, fr</td><td>orm dj & i</td><td>rebar fi</td><td>xing</td></ing>	tform, fr	orm dj & i	rebar fi	xing
	C3840-TSR-225	Falsework, fwk, working platform & concreting (13.5m3)	4	d (0d 15-Oct-1	5A 19-Oct-15A	100%												I Fa	Isewo	rk, fwk	, workin	g platfo	rm & cc	oncreting	(13.5m	13)
	Bay 8 (walls & roo	f above +5.7mPD)	45	d (0d 20-Oct-1	5A 20-Nov-15A	•																				
	C3840-TSR-230	Strike fwk, remove working platform, form cj , erect fwk & rebar fixing	10	d (0d 20-Oct-1	5A 31-Oct-15A	100%												E S	trike	fwnk, ner	nove w	orking p	latform	form cj	erect	fwk (
	C3840-TSR-235	Falsework, fwk, working platform & concreting (33.5m3)	10	d (0d 20-Oct-1	5A 02-Nov-15A	100%												F	alsev	vork. fw	/k. work	irla plat	form &	concretin	ia (33.5	5m3)
		Erect fwk and concreting (2m3) for upstand wall				15 A 05-Nov-15 A																			upstaind v		
		Concrete curing and remove fwk/falsework	15			15 A 20-Nov-15 A														Conc	rete cu	ring and	1 remov	e twk/ta	alsework		
	Section between Grid	i 1 and 2	111	d (0d 28-Oct-1	5A 12-Mar-16A																					
	Bay 9 (Collar Fram	e up to -4.3mPD)	35	d (0d 28-Oct-1	5A 16-Nov-15A																					
	C3840-TSR-500	Coring dowel bars holes & form groove/cj	12	d (0d 28-Oct-1	5 A 11-Nov-15 A	. 100%													Corin	j dowel	l bars ho	olles&fo	rm gro	ove/¢j		
	C3840-TSR-505	Install waterproofing membrane/dowel bars	5	d (0d 04-Nov-1	15 A 09-Nov-15 A	100%												•	Install	waterp	roofing	membra	ane/dov	vel bars		
	C3840-TSR-510	Rebar fixing	2	d (0d 11-Nov-1	15 A 12-Nov-15 A	100%												I	Reba	ır fixing						
	C3840-TSR-515	End fwk shuttering & concreting collar to slab (2.5m3)	3	d (0d 13-Nov-1	15 A 16-Nov-15 A	100%												1	End f	wk shu	ttering {	& concre	əting co	llar to sla	b (2.5n	n3)
	Bay 12 (Base Slab	at -4.32mPD)	13	d (0d 04-Nov-1	15 A 19-Nov-15 A	•		+																		
	C3840-TSR-540	Construct base slab (20.0m3)	13	d (0d 04-Nov-1	15 A 19-Nov-15 A	100%													Con	struct b:	ase slab) (20.0m	13)			
	Bay 10 (Collar Fran	ne up to -2mPD)	9	d (0d 20-Nov-1	15 A 27-Nov-15 A	•																				
	C3840-TSR-520	Erect working platform, install waterproofing membrane & rebar fixing	3	d (0d 20-Nov-1	15 A 24-Nov-15 A	100%												1	Erec	t worki	ng platf	orm, ins	tall wat	erproofin	g mem	bran
	C3840-TSR-525	Fwk & concreting to -2.2mPD (1.5m3)	4	d (0d 25-Nov-1	15 A 27-Nov-15 A	100%												1	Fwl	(& con/	creting t	o -2.2m	iPD (1.	im3)		
	Bay 13 (Walls up to	o -3.2mPD)	7	d (0d 27-Nov-1	15A 07-Dec-15A	•																				
	C3840-TSR-550	Install water proofing system, rebar fixing for W1, W2, W3 & 250 mm partition	on wall 3	d (0d 27-Nov-1	15 A 30-Nov-15 A	100%													Inst	all wate	ər proof	ing systr	əm, reb	ar fixing f	for W1.	, W2
	C3840-TSR-555	Erect working platform, fwk shuttering & concreting (9.0m3)	4	d (0d 01-Dec-1	15 A 07-Dec-15 A	100%													Er	ect wor	king pla	tform, f	wk shut	tering &	concret	ting (
	Bay 11 (Collar Fran	ne up to +1.2mPD)	12	d (0d 30-Nov-1	15A 07-Dec-15A	•																				
	C3840-TSR-530	Erect working platform, Install waterproofing membranne & rebar fixing	5	d (0d 30-Nov-1	15 A 03-Dec-15 A	100%													Ere	ect worl	king pla	tførm, Ir	nstall w:	aterproofi	ing me	mbre
	C3840-TSR-535	Fwk & concreting to collar (4.0m3)	7	d (0d 01-Dec-1	15A 07-Dec-15A	100%													Fv	vk & co	ncreting	to colla	ır (4.0m	3)		
		o -0.96mPD) and Bay 18a (Stair)				15A 28-Dec-15A																5		Ì			
		Construct bay 14 (18.5m3)				15 A 15-Dec-15 A															onet	t bay 14	1/10 =-	n3\			
	C3840-TSR-602	Construct bay 18a (3.5m3)	5	d (ud 19-Dec-1	15 A 28-Dec-15 A	100%														Jonstru	uot bay '	18a (3.5	.m3)			
	Current Bar	Critical Remaining Work	Data Date: 01-J	un-1	8				ħ #					D. 1	•	P		D C	A 1								
	Actual Work	♦ ♦ Milestone	Page 11 of 2	26					Ma	aster P	rog	ram	me .	kevi	S10	n K	JMP	KS	AI							01-	D Jun
	Remaining Wor	ĸ																									
																											_

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bar fixing					
king: (3)					
wk & rebar fixing m3)					
3)					
brane & rebar fixi	ġ				
W2, W3 & 250 r Ing (9.0m3) nbranne & rebar		wall			
Data	De		PSA1	ockod	Approved
Date Jun-18	Kev	vision	BG Ch	lecked	Approved AW
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		Activity Name		ur I	Rem Start Dur	Finish	Complete	e Float	O N D	JFI	M A M J	014 Jul A S	SONE	DJFN	MAM.	2015 I Jul A S (O N D	JFMAN	2016 / J Jul	A S O	N D J	FMAN	2017 M J Jul /	ASON	IDJF	M A M J		SON
Bay 1	15 (Walls up to	+1.25mPD)	1:	3d	0d 23-Dec-1	5 A 07-Jan-16	4																					
C3	840-TSR-580	Remove platform & strike fwk, propping, water proofing, re-bar fixing, fwk suttering & con (20m3)	creting 1	3d	0d 23-Dec-1	5 A 07-Jan-16	A 100%	b									1	Remové platfo	orm & stri	ke fwk, pr	opping, wa	ær proofing, r	re-bar fixing	j, fwk sutte	ring & cohcré	ting (20m3)		
Bay 1	l6 (Walls & Ro	of Slab)	3:	2d	0d 08-Jan-16	6A 13-Feb-16	A																					
C3	840-TSR-590	Remove fwk, form cj, install WPS, remove L2, re-propping & erect falsework	:	5d	0d 08-Jan-16	6A 16-Jan-16	A 100%	Ď										Remove fwk	, form cj,	install WP	\$, remove	L2, re-proppi	ng & erect	falsework				
C3	840-TSR-595	Construct wall & roof slab (31.5m3)	14	4d	0d 18-Jan-16	A 23-Jan-16	A 100%	b										Construct w	all & roof	slab (31.5	im3)							
C3	840-TSR-600	Concrete curing, coring, saw cut & breakthrough, removal of scaffold/falsework/fwk, repro-	opping 1:	3d	0d 25-Jan-16	6A 13-Feb-16	A 100%	6										Concrete	curing, c	oring, saw	cut & brea	kthrough, rer	moval of sc	affold/falsev	/ork/fwk, rep	ropping		
Bays	17 and 18b (S	tairs up to 2nd Landing)		7d	0d 15-Feb-1	6A 20-Feb-16	A																		+			
C3	840-TSR-585	Construct staircase (8.0m3)		7d	0d 15-Feb-1	6A 20-Feb-16	A 100%											Construc	rt staircas	e (8.0ml3)								
								5												c (0.0110)								
	struction of Re			7d	0d 03-Mar-10	6A 12-Mar-16	A																					
C3	840-TSR-604	Construct Refuse Bin		7d	0d 03-Mar-1	6 A 12-Mar-16	A 100%	Ď										Const	ruct Refu	se Bin								
Milestones	s for Cost Cen	tre D - Temporary Entrance	1584	4d	0d 26-Jan-14	A 01-Aug-18		151d																				
C3840-M	/IS-D01	D1 - Comp. removal of all overhead signs affecting Works for the Temp. Entrance	(0d	0d	26-Jan-14	A 100%	Ď		♦ D1	- Comp. ren	noval of all	overheads	signs affect	ting Works t	dr the Temp. I	Entrance											
C3840-M	/IS-D02	D2-Comp. 20% of cofferdam for T. E. and all U/G UU diversion/protection for T.E. cofferda	am (0d	0d	06-Sep-14	A 100%	Ď				•	D2-Comp.	. 20% of co	offerdam fo	T. E. and all L	U/G U/U d	lversion/protectio	n for T.E	cofferdan	1							
C3840-M	/IS-D03	D3 - Comp. temp. cofferdam and grouting (excl. satisf. comp. of pump test)		0d	0d	18-Feb-15	A 100%	6						• [D3 - Comp.	temp. cofferda	am and g	outing (excl. satis	sf. comp.	of pump t	əst)							
C3840-M	/IS-D04	D4-Comp. 66% const. of temp. stair measured by vol. of conc. poured & comp. form. oper	n. into TST	0d	0d	13-Feb-16	A 100%	6										◆ D4-Comp	o. 66% cc	nst, of ten	np. stair me	easured by vol). of conc, r	ooured & cc	mp. form. op	en, into TST	Stn	
C3840-M	4S-D05	Stn D5-Open Temporary Entrance for use		0d	0d	06-Jul-16 A	100%													5-Open T	emporary	Entrance for u	use					
C3840-M		D6-Comp. demolition of Temp. Entrance and disposal of all C&D waste arising there from			0d	01-Aug-18		5 151d																			◆ D6-	-Comp
pen Cut Se	equence 3 (Ac	Ivance Ground Works at D2 & in front of D1)	178	8d	0d 17-Nov-1	5A 17-Sep-16	A																					
C3840-ELS	6-400	Expose underground UUs and provide support to UUs; at grid 1-4	13:	2d	0d 17-Nov-1	5 A 30-Apr-16	A 100%	Ď									-		Expose u	ndergrour	d UUs and	l provide supp	ort to UUs	, at grid 1-4				
C3840-ELS	-410	Expose existing sewer & strom drainage/trim concrete surround for PCCW cable ducts & PCCW cable ducts	1st lift of 30	6d	0d 03-May-1	6 A 16-Jun-16	A 100%	b										-	Exp	ose existir	g sewer &	strom drainag	ge/trim con	crete surroi	and for PCC	V cable ducts	s & 1st lift o	of PC¢\
C3840-ELS-	6-420	Re-arrange existing sewer & strom drainage/ 2nd lift of PCCW cable ducts & provide supp ducts	port to cable 50	0d	0d 17-Jun-16	6 A 09-Sep-16	A 100%	þ											-	Re-	arrange ex	kisting sewer 8	& strom dra	inage/ 2nd	lift of PCCW	cable ducts 8	provide s	support
C3840-ELS	-430	Partial demolition of existing subway slab and coring through for two nos. king posts	1:	2d	0d 28-Jul-16	A 18-Aug-16	A 100%	, D												Partia	demolition	of existing sul	ıbway slab	and coring	hrough for t	vo nos king r	oosts	
C3840-ELS	-450	Partial demolition of existing subway slab and coring through existing subway for piling PP1	175 to 12	2d	0d 12-Sep-1	6A 17-Sep-16	A 100%													I Pa	rtial demoli	itlon of existing	g subway's	lab and cor	ng through é	xisting subwa	ly for piling	3 PP175
C3840-ELS	-510	PP179 Joint Survey & Remove existing BS & ABWF Services at D2		6d	0d 07-Jul-16	A 16-Jul-16 A	100%	6												Joint Surv	ev & Remo	ve existing BS	S&ABWF	Services at	D2			
C3840-ELS		Erect FRP hoarding and flood gate/scaffolding platform for demolish D2				A 26-Jul-16 A																and flood gat	terscall oldin	g plation m	tor demoilsr	52		
C3840-ELS	-530	Demolish D2 above GL	1:	2d	0d 14-Jul-16	A 09-Aug-16	A 100%	b												Demoli	sh D2 abov	∍GL						
C3840-ELS	S-540	Erect piling platform and shift hoarding		6d	0d 10-Aug-1	6 A 20-Aug-16	A 100%	Ď												Erect	piling platfo	orm and shift h	noarding					
pen Cut Se	equence 4 (E)	cavation for Subway in front of D1)	24	9d	0d 31-Jul-16	A 09-Aug-17	A																					
C3840-ELS	D1-102	Install support beam, load transfer & remove concrete support at grid 2	8	8d	0d 31-Jul-16	A 14-Sep-16	A 100%	Ď												ns	tall support	beam, load tr	ransfer & r	emove con	rete support	at grid 2		
C3840-ELS	D1-115	Complete excavation up to +1.0mPD including vertical blinding/install L2 & struts	74	4d	0d 03-Oct-16	SA 11-Jan-17	A 100%	6														Complete exc	cavation ur	oto+1.0mP	D including v	ərtical blindin	g/install L2	& strut
C3840-ELS	D1-145	Remove existing subway 7.5m below G.L. and excavate to L3 (-2.0mPD) with unforeseen	n infill 29	9d	0d 28-Dec-1	6 A 04-Mar-17	A 100%	b														Remov	ve existing	subway 7;5	n below G.L	. and excavate	e to L3 (+2	2.0mPD
C3840-ELS	D1-155	Vertical blinding up to L3		8d	0d 09- Jan-17	A 27-Feb-17	A 100%														<u>.</u>	Vertical	l blinding tu	n th I 3				
JUDIO LLOI																									0			
C2040 EL C		Install waling and strut for L3				'A 17-Mar-17																Install						
C3840-ELS	D 4 475	Remove existing subway 10.6m below G.L. and excavate to L4 (-5.3mPD) with unforesee	en infill 29	9d	0d 14-Feb-1	7 A 31-Mar-17	A 100%	b														Rer	nove existi	ng subway	10.6m below	G.L. and exc	avate to L	4 (-5.3r
C3840-ELSI C3840-ELSI	D1-175																										1 1 1	1 1
		Critical Remaining Work Dat	ta Date: 01	Jun-1	18											PRSA1						<u> </u>	<u> </u>		RMPSA	<u> </u>	<u></u>	

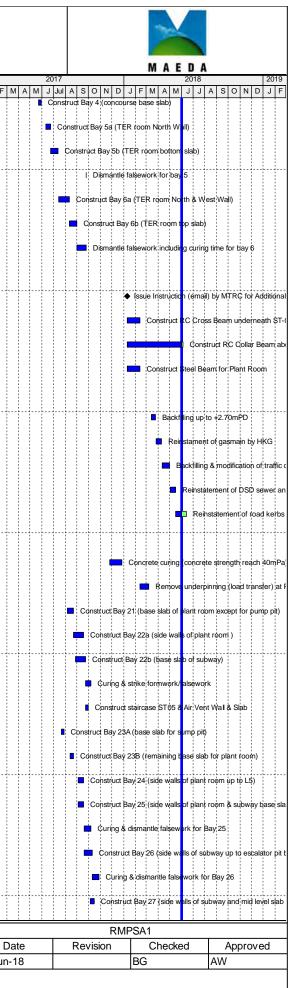


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/ity ID		Activity Name	Or D	ig R ur	Rem Start Dur	Finish	% Complete	Total Float	0 N	D	JF	MA	201 M J J	4 ul A :	so	N D	JF	MA	2 A M .	2015 J Jul	A S	O N	DJ	FM	AM	2016 J Jul	AS		2 J	F N
	C3840-ELSD1-177	Breaking existing bottom slab to -6.0mPD at grid 1-2		ld	0d 20-Mar-17 A	13-Apr-17 A	100%																							
	C3840-ELSD1-179	Mass concrete infill, install waling/strut L4 & vertical blinding at grid 1-2		d	0d 18-Apr-17 A	28-Apr-17 A	100%																							
	C3840-ELSD1-185	Vertical blinding up to L4 at grid 2-4	ξ	3d	0d 29-Apr-17 A	10-May-17 A	100%																							
	C3840-ELSD1-195	Install waling and strut for L4 at grid 2-3.5	6	6d	0d 23-Mar-17 A	22-Apr-17 A	100%																							
	C3840-ELSD1-205	Excavate up to L5, from -5.3 to -7.0mPD at grid 2-3.5	27	7d	0d 10-Apr-17 A	17-May-17 A	100%																							
-	C3840-ELSD1-225	Install waling and strut for L5	6	6d	0d 15-May-17 A	25-May-17 A	100%																							
	C3840-ELSD1-235	Excavation to formation level including for sump pit	48	3d	0d 18-May-17 A	02-Aug-17 A	100%																							
┢	C3840-ELSD1-245	Vertical blinding from L4 to bottom	8	3d	0d 26-Jun-17 A	09-Aug-17 A	100%																							
_	C3840-ELSD1-255	Install waling and strut for L6	6	6d	0d 13-Jun-17 A	30-Jun-17 A	100%																							
-	C3840-ELSD1-330	Make formation and Blinding		łd	0d 26-Jun-17 A	05-Aug-17 A	100%																							
	Open Cut Sequence 4 (E	Excavation for D2 & Subway in front of D2)	20'	d	0d 26-Sep-16 A	18-May-17 A																								
г	C3840-ELSD2-100	Pump test at C&C Cofferdam	24	łd	0d 26-Sep-16A	11-Oct-16 A	100%																				-	Pump	test af	۱ C &۱
-	C3840-ELSD2-115	Demolish D2 below GL with unforeseen infill & modification to traffic steel deck with L1 insta	allation 40)d	0d 04-Oct-16 A	25-Nov-16 A	100%																					-	Démoli	sh D
_	C3840-ELSD2-122	Temporary supports for relocated UUs at grid 4-5	15	ād	0d 05-Oct-16A	09-Nov-16 A	100%																				-	🗖 Te	mpora	rysı
	C3840-ELSD2-145	Excavate up to L2, from +4.0 to +1.0mPD	1:	Bd	0d 29-Oct-16A	28-Nov-16 A	100%																						Excava	ate u
-	C3840-ELSD2-155	Vertical blinding up to L2	8	3d	0d 01-Dec-16A	15-Dec-16 A	100%																						Vertio	calb
	C3840-ELSD2-165	Install waling and strut for L2		6d	0d 22-Nov-16A	07-Dec-16 A	100%																						Install	i wali
_	C3840-ELSD2-175	Excavate up to L3, from +1.0 to -2.0mPD (23m3 rock + 485m3 soil)	28	3d	0d 13-Dec-16A	10-Feb-17 A	100%																							Ex
_	C3840-ELSD2-185	Vertical blinding up to L3		3d	0d 22-Dec-16A	04-Jan-17 A	100%																						🗖 Ve	ertica
	C3840-ELSD2-195	Install waling and strut for L3		6d	0d 19-Dec-16A	10-Feb-17 A	100%																							n:
_	C3840-ELSD2-205	Excavate up to L4, inspection for formation by MTRC (RGE) at grid 4.0-5.5	40)d	0d 11-Feb-17 A	27-Mar-17 A	100%																							
_	C3840-ELSD2-207	El/005, replacement of CDG with mass concrete infill at grid 4.0-5.5		łd	0d 28-Mar-17 A	31-Mar-17 A	100%																							
	C3840-ELSD2-215	Vertical blinding up to L4 at grid 4.0-5.5			0d 03-Apr-17 A		100%																							
	C3840-ELSD2-225	Install waling for L4 at grid 3.5-4.0			0d 23-Mar-17 A																									
_	C3840-ELSD2-235	Excavate up to formation & inspection by MTRC (RGE) at grid 3.5-4.0			0d 29-Mar-17 A																									
	C3840-ELSD2-237	El/005, replacement of CDG with mass concrete infill at grid 3.5-4.0			0d 06-Apr-17 A																									
	C3840-ELSD2-240	Vertical blinding up to formation at grid 3.5-4.0			0d 11-May-17 A		100%	400-1																						
_		Construction of Subway & D2)	360		12d 21-Mar-17 A			163d																						
		e (Between Grids 1 and 1.8)			0d 21-Mar-17 A																									
		Coring and preparation works for TST Station wal			0d 21-Mar-17 A																									
	C3840-STR-D1-100	Construct Bay 1 (collar base)	22	2d	0d 12-Apr-17 A	22-May-17 A	100%																							
	C3840-STR-D1-110	Construct Bay 2 (collar beam and C1 column)	\$	9d	0d 31-May-17 A	09-Jun-17 A	100%																							
	C3840-STR-D1-112	Dismantle falsework & formwork including curing for bay 2	8	3d	0d 10-Jun-17 A	17-Jun-17 A	100%																							
	C3840-STR-D1-120	Construct Bay 3 (base slab for escalator pit)	15	3d	0d 10-May-17 A	22-May-17 A	100%																							
	Current Bar	Critical Remaining Work Data	a Date: 01-J	un-'	18	1				<u> </u>									1 1	1 1					<u></u>					<u> </u>
	Actual Work	♦ Milestone	Page 13 of 2	26						Ma	aste	r Pr	rogr	amı	me	Rev	visio	n]	RM	PR	SA	1							01-Ju	Da
	Remaining Wor		-																									ľ		-11



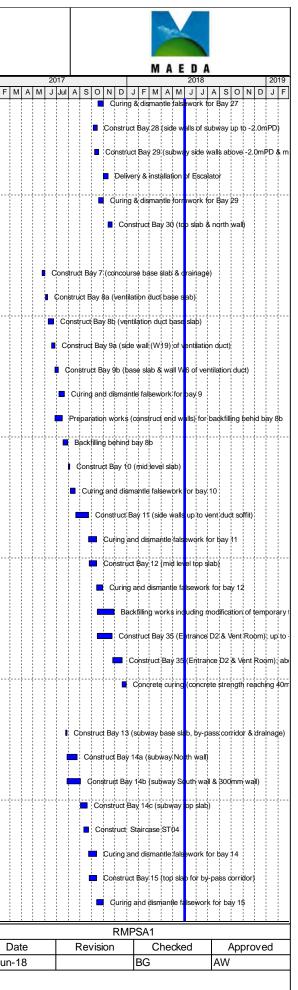


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y ID	Activity Name	Orig Dur	Rem Du	n Start r	Finish	% Complete	Total Float	0 N	DJ	FMA		2014 J Jul A	s	D N I	J J I	FМ		2015 J Jul		6 0 N	ID.	JFI	MAN	2016 NJJu		108	۷D.	FN
C3840-STR-D1-130	Construct Bay 4 (concourse base slab)	12d	00	d 23-May-17 A	29-May-17 A	100%																						
C3840-STR-D1-132	Construct Bay 5a (TER room North Wall)	10d	00	d 12-Jun-17 A	23-Jun-17 A	100%																						
C3840-STR-D1-132b	Construct Bay 5b (TER room bottom slab)	10d	00	d 24-Jun-17 A	13-Jul-17 A	100%																						
C3840-STR-D1-133	Dismantle falsework for bay 5	2d	00	d 25-Sep-17A	26-Sep-17 A	100%																						
C3840-STR-D1-134	Construct Bay 6a (TER room North & West Wall)	12d	00	d 14-Jul-17 A	11-Aug-17 A	100%																						
C3840-STR-D1-135	Construct Bay 6b (TER room top slab)	17d	00	d 12-Aug-17 A	31-Aug-17 A	100%																						
C3840-STR-D1-136	Dismantle falsework including curing time for bay 6	16d	00	d 01-Sep-17A	25-Sep-17 A	100%																						
Additional Remedial Wo	orks for Permanent Structures	30d	40	d 09-Jan-18 A	05-Jun-18		171d																					
C3840-RMD-100	Issue Instruction (email) by MTRC for Additional Remedial Works for Permanent St	tructures 0d	00	b b b b b b b b b b b b b b b b b b b	09-Jan-18 A	100%																						
C3840-RMD-110	Construct RC Cross Beam underneath ST-01	30d	00	d 10-Jan-18 A	12-Feb-18A	100%																						
C3840-RMD-120	Construct RC Collar Beam above +3.6mPD	30d	40	d 10-Jan-18 A	05-Jun-18	63.3%	171d																					
C3840-RMD-130	Construct Steel Beam for Plant Room	30d	00	d 10-Jan-18 A	12-Feb-18A	100%																						
Reinstament Works in F				d 15-Mar-18 A			12d																					
C3840-STR-300	Backfiling up to +2.70mPD	76d		d 15-Mar-18A		100%																						
C3840-STR-302	Reinstament of gasmain by HKG	8d		d 26-Mar-18 A		100%																						
C3840-STR-304	Backfilling & modification of traffic deck	12d		d 11-Apr-18 A		100%																						
C3840-STR-306	Reinstatement of DSD sewer and storm pipe & U/U reinstatement	12d		d 02-May-18 A		100%																						
C3840-STR-308	Reinstatement of road kerbs and paving block	24d	120	d 17-May-18 A	14-Jun-18	50%	12d																					
RC Structure at D1 Side	e (Between Grids 1.8 and 3.3)	209d	00	d 22-Jul-17 A	07-Mar-18 A																							
C3840-STR-290	Concrete curing (concrete strength reach 40mPa) & removal of falsework/fwk for b	oay 30 9d	00	d 25-Nov-17 A	27-Dec-17 A	100%																						
C3840-STR-310	Remove underpinning (load transfer) at Plant Room	25d	00	d 13-Feb-18A	07-Mar-18 A	100%																						
C3840-STR-D1-140	Construct Bay 21 (base slab of plant room except for pump pit)	7d	00	d 07-Aug-17 A	22-Aug-17 A	100%																						
C3840-STR-D1-150	Construct Bay 22a (side walls of plant room)	21d	00	d 23-Aug-17 A	18-Sep-17 A	100%																						
C3840-STR-D1-155	Construct Bay 22b (base slab of subway)	10d	00	d 28-Aug-17 A	22-Sep-17 A	100%																						
C3840-STR-D1-170	Curing & strike formwork/falsework	14d	00	d 23-Sep-17 A	07-Oct-17 A	100%																						
C3840-STR-D1-180	Construct staircase ST05 & Air Vent Wa I & Slab	13d	00	d 23-Sep-17A	30-Sep-17 A	100%																						
C3840-STR-D1-200	Construct Bay 23A (base slab for sump pit)	3d	00	d 22-Jul-17 A	28-Jul-17 A	100%																						
C3840-STR-D1-210	Construct Bay 23B (remaining base slab for plant room)	6d	00	d 14-Aug-17 A	22-Aug-17 A	100%																						
C3840-STR-D1-212	Construct Bay 24 (side walls of plant room up to L5)	10d	00	d 04-Sep-17A	18-Sep-17 A	100%																						
C3840-STR-D1-214	Construct Bay 25 (side walls of plant room & subway base slab)	9d	00	d 04-Sep-17A	18-Sep-17 A	100%																						
C3840-STR-D1-215	Curing & dismantle falsework for Bay 25	14d	00	d 19-Sep-17A	07-Oct-17 A	100%																						
C3840-STR-D1-216	Construct Bay 26 (side walls of subway up to escalator pit base slab)	9d	00	d 19-Sep-17A	10-Oct-17 A	100%																						
C3840-STR-D1-217	Curing & dismantle falsework for Bay 26	14d	00	d 11-Oct-17 A	28-Oct-17 A	100%																						
C3840-STR-D1-222	Construct Bay 27 (side walls of subway and mid level slab @0.18mPD)	9d	00	d 05-Oct-17 A	16-Oct-17 A	100%																						
		Data Data: 01 Ju	<u> </u>	<u> </u>																				<u> </u>	<u> </u>			
Current Bar Actual Work	Critical Remaining Work Milestone	Data Date: 01-Ju						I	Mas	ster H	Prog	gran	nme	e Re	evisi	ion	RN	/IPI	RSA	1							-	Da
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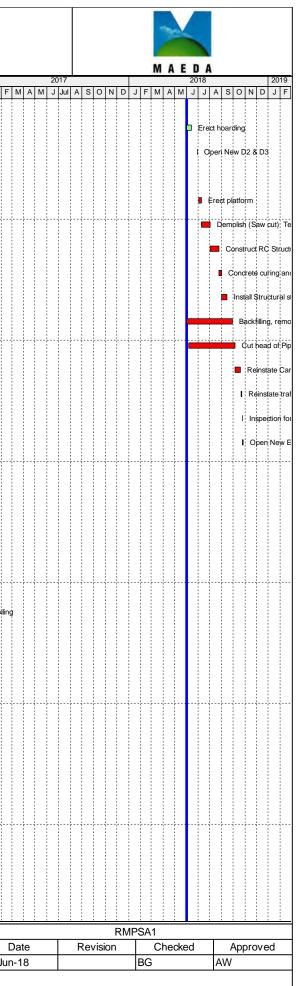




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ctivity ID		Activity Name	Orig Dur	Rer Du	m Start ur	Finish	% Complete	Total Float	ONC	JFN		2014 J Jul A \$	SON	DJ	= M A	2015 M J Jul	ASO	ND.	JFM	20 A M J	 6 0 N E	JFN
	C3840-STR-D1-223	Curing & dismantle falsework for Bay 27	14d	0	d 17-Oct-17 A	31-Oct-17 A	100%															
	C3840-STR-D1-230	Construct Bay 28 (side walls of subway up to -2.0mPD)	8d	0	d 05-Oct-17 A	16-Oct-17 A	100%															
	C3840-STR-D1-240	Construct Bay 29 (subway side walls above -2.0mPD & mid level lab)	4d	0	d 09-Oct-17 A	19-Oct-17 A	100%															
	C3840-STR-D1-242	Delivery & installation of Escalator	11d	0	d 01-Nov-17 A	13-Nov-17 A	100%															
	C3840-STR-D1-245	Curing & dismantle formwork for Bay 29	14d	0	d 20-Oct-17 A	31-Oct-17 A	100%														 	
	C3840-STR-D1-255	Construct Bay 30 (top slab & north wall)	10d	0	d 14-Nov-17 A	24-Nov-17 A	100%															
	RC Structure at D2 Side	(Between Grids 3.3 and 4.5)	179d	0	d 25-May-17 A	30-Dec-17 A																
	C3840-STR-D2-100	Construct Bay 7 (concourse base slab & drainage)	6d	0	d 25-May-17 A	01-Jun-17 A	100%															
	C3840-STR-D2-110	Construct Bay 8a (ventilation duct base slab)	10d	0	d 02-Jun-17 A	08-Jun-17 A	100%															
	C3840-STR-D2-110b	Construct Bay 8b (ventilation duct base slab)	10d	0	d 09-Jun-17 A	23-Jun-17 A	100%														 	
	C3840-STR-D2-120	Construct Bay 9a (side wall (W19) of ventilation duct)	10d	0	id 19-Jun-17 A	27-Jun-17 A	100%															
	C3840-STR-D2-120b	Construct Bay 9b (base slab & wall W6 of ventilation duct)	10d	0	d 28-Jun-17 A	05-Jul-17 A	100%															
	C3840-STR-D2-122	Curing and dismantle falsework for bay 9	14d	0	id 07-Jul-17 A	22-Jul-17 A	100%															
	C3840-STR-D2-125	Preparation works (construct end walls) for backfilling behid bay 8b	1d	0	ld 27-Jun-17 A	17-Jul-17 A	100%															
	C3840-STR-D2-126	Backfilling behind bay 8b	11d	0	id 18-Jul-17 A	31-Jul-17 A	100%														 	
	C3840-STR-D2-130	Construct Bay 10 (mid level slab)	5d	0	d 01-Aug-17 A	05-Aug-17 A	100%															
	C3840-STR-D2-132	Curing and dismantle falsework for bay 10	16d	0	d 06-Aug-17 A	19-Aug-17 A	100%															
	C3840-STR-D2-140	Construct Bay 11 (side walls up to vent duct soffit)	20d	0	d 21-Aug-17A	22-Sep-17 A	100%															
	C3840-STR-D2-142	Curing and dismantle falsework for bay 11			d 23-Sep-17A		100%															
	C3840-STR-D2-150	Construct Bay 12 (mid level top slab)	16d		d 25-Sep-17A		100%														 	
	C3840-STR-D2-152	Curing and dismantle falsework for bay 12	15d		d 14-Oct-17A		100%															
	C3840-STR-D2-160	Backfilling works including modification of temporary traffic deck	23d		d 16-Oct-17A		100%															
	C3840-STR-D2-165	Construct Bay 35 (Entrance D2 & Vent Room); up to +4.3mPD	12d		d 16-Oct-17A		100%															
					d 25-Nov-17 A																	
		Construct Bay 35 (Entrance D2 & Vent Room); above +4.3mPD																			 	
		Concrete curing (concrete strength reaching 40mPa) and removal of falsew			id 20-Dec-17 A		100%															
		(Between Grids 4.5 and 5.9)			id 25-Jul-17 A																	
		Construct Bay 13 (subway base slab, by-pass corridor & drainage)	9d		ld 25-Jul-17 A		100%															
	C3840-STR-D2-210	Construct Bay 14a (subway North wall)	14d		id 29-Jul-17 A		100%															
	C3840-STR-D2-211	Construct Bay 14b (subway South wall & 300mm wall)	14d		id 29-Jul-17 A		100%															
		Construct Bay 14c (subway top slab)	13d	0	d 02-Sep-17 A	20-Sep-17 A	100%															
	C3840-STR-D2-213	Construct Staircase ST04	7d	0	d 11-Sep-17 A	22-Sep-17 A	100%															
	C3840-STR-D2-215	Curing and dismantle falsework for bay 14	17d	0	ld 23-Sep-17 A	14-Oct-17 A	100%															
	C3840-STR-D2-220	Construct Bay 15 (top slab for by-pass corridor)	16d	0	d 25-Sep-17 A	13-Oct-17 A	100%															
	C3840-STR-D2-222	Curing and dismantle falsework for bay 15	15d	0	d 14-Oct-17 A	31-Oct-17 A	100%															
	Current Bar	Critical Remaining Work	Data Date: 01-Ju	า-18	3	1			1 1				<u> </u>		<u> </u>				<u> </u>	<u> </u>		1 1 1
	Actual Work	♦ Milestone	Page 15 of 26						N	laster	r Pro	gramı	me R	evis	ion R	MPR	RSA1					Da 01-Jun-
	Remaining Worl	k																				
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	Activity Name			Rem Dur	Start	Finish	% Complete	Total Float	D N D	JF	MA	2014 M J Jul	ASO	N D	JFN	1 A M	2015 1 J Ju		6 0 N	D J	F M A	201 \ M J J		SON	I C
pen Cut Sequence 6			25d	25d	01-Jun-18	30-Jun-18		Od																	
C3840-D1-100	Erect hoarding		12d	12d (01-Jun-18	14-Jun-18	0%	12d																	
C3840-D1-110	Open New D2 & D3		1d	1d 3	30-Jun-18	30-Jun-18	0%	0d																	
en Cut Sequence 7 (D1)		121d	121d	02-Jun-18	26-Oct-18		0d																	
C3840-D1-120	Erect platform		6d	6d (03-Jul-18	09-Jul-18	0%	0d																	
C3840-D1-130	Demolish (Saw cut) Temporary Staircase		20d	20d	10-Jul-18	01-Aug-18	0%	0d																	•
C3840-D1-150	Construct RC Structure at D1 Entrance		20d	20d	02-Aug-18	24-Aug-18	0%	0d																	
C3840-D1-160	Concrete curing and removal of falsework/fwk		6d	6d 2	25-Aug-18	31-Aug-18	0%	0d																	
C3840-D1-170	Install Structural steel		12d	12d	01-Sep-18	14-Sep-18	0%	0d																	
C3840-D1-190	Backfilling, removal of temporary decking & reinstate UUs		100d ⁻	100d	02-Jun-18	29-Sep-18	0%	0d																	
C3840-D1-200	Cut head of Pipe Pile 2m		100d ⁻	100d	07-Jun-18	05-Oct-18	0%	0d -																	
C3840-D1-210	Reinstate Carnarvon Road		12d	12d	06-Oct-18	20-Oct-18	0%	0d																	
C3840-D1-220	Reinstate traffic sign and shop sign		3d	3d 3	22-Oct-18	24-Oct-18	0%	0d																	
C3840-D1-225	Inspection for acceptance by relevant authorities		1d	1d 3	25-Oct-18	25-Oct-18	0%	0d																	
C3840-D1-230	Open New Entrache D1		1d	1d 3	26-Oct-18	26-Oct-18	0%	0d																	
cavation for Shaft an	d Turnel		814d	bo	13-Oct-14 A	07-Aug-17 A																			-
Additional G.I. (ABH1)			203d			02-Jun-15 A																			
C3840-ABH1-10	Submission for BD consent				26-Nov-14 A		100%							A Su	omission	for BD	consent	*							
C3840-ABH1-20	Obtain consent from BD		65d				100%																		
						31-Jan-15 A									Obt										
C3840-ABH1-30	Site preparation, mobilization, set up and drilling hole for ABH1		6d			06-Feb-15 A	100%															ble for ABH			_
C3840-ABH1-40	Prepare & submit assessment report to for ABH1 to MTRC for submission	n to BD	9d			17-Feb-15 A	100%								Pi	repare	& submi	it asses	sment r	eport to	or ABH1	to MTRC	for subn	nission to	C
C3840-ABH1-50	BD review assessment report for ABH1 & issue consent for horizontal pilin	ng	62d			02-Jun-15 A	100%										BD	review :	assessr	nent rept	ort for ABI	H1 & issue) consen	it for hor	ſ
Shaft Excavation, Tuni	nel Grouting and HPP Works		569d	0d	13-Oct-14 A	12-Sep-16 A																			
C3840-SH-100	Pump Test		13d	0d 1	13-Oct-14 A	27-Oct-14 A	100%						-	Pump	Test										
C3840-SH-110	Expose utilities, excavatefrom +5.5 to +0.2mPD (496.8m3), install 1st wali	ing and traffic decking	17d	0d 2	28-Oct-14 A	15-Nov-14 A	100%							🗖 Expo	ose utilitie	es, exca	avatefror	m +5.5	to +0.2	mPD (49	6.8m3), ir	nstall 1st w	/aling an	nd traffic	. (
C3840-SH-120	Utilities protection and temporary diversion and install lagging wall		18d	0d	17-Nov-14 A	06-Dec-14 A	100%							– V	tilities pro	otection	and ter	mporary	y diversi	on and ir	stall laggi	ng wall			
C3840-SH-130	Install steel plate lagging and 2nd layer waling & strut		13d	0d	08-Dec-14 A	27-Dec-14 A	100%								Install st	eel plat	te laggin	ng and 2	2nd laye	er waling	& strut				
C3840-SH-140	Forming platform for tunnel works		15d	0d 2	29-Dec-14 A	12-Jan-15 A	100%								Formi	ng platf	form for	tunnel	works						
C3840-SH-150	Regrouting for curtain grouting & pumping test (re-test)		24d	0d 1	12-Jan-15 A	07-Feb-15 A	100%								📫 Re	groutine	g for cui	rtain gro	outing 8	pumpin	g test (re-	test)			
C3840-SH-160	Mobilization & set up for tunnel grouting works (Simon & Son)		4d	0d	09-Feb-15 A	12-Feb-15 A	100%								I Mo	obilizatio	on & set	t up for	tunnel o	grouting	vorks (Sir	mon & Sp	n)		
C3840-SH-170	Trial grouting		7d	0d	13-Feb-15 A	24-Feb-15 A	100%								т 🖪	rial gro	outing								-
C3840-SH-180	Horizontal grouting for top section (44 nos. holes)		23d	0d 2	25-Feb-15 A	23-Mar-15 A	100%								_	Horiz	zontal gr	routing	for top	section (#	14 nos. ho	olles)			
C3840-SH-190	Excavation of tunnel shaft from 0.2mPD to -0.5mPD (67m3)		2d	0d	07-Mar-15 A	09-Mar-15 A	100%									Excava	ation of t	tunnel s	shaft fro	m 0.2mF	D to -0.5	imPD (67r	m3)		
C3840-SH-200	Demobilize plants for tunnelling works		2d	0d 3	24-Mar-15 A	25-Mar-15 A	100%									l Dem	nobilize p	plants fo	or tunne	elling wor	s				
		Data Data O		10																					-
 Current Bar 	Critical Remaining Work	Data Date: 07	ı-Jun-	-18							_			n		ъ									ľ
Actual Work	Milestone								N	ast	er P	rogra	mme	Rev	יהוצך	n Kr	VIPI	KNA							





	Activity Name	Orig Dur	Rem Dur	Start	Finish	% Complete	Total Float		.1		201				e lui i		015				20			
C3840-SH-210	Excavate tunnel shaft from -0.5mPD to -1.7mPD (soil 79m3, rock 34m3)	26d		25-Mar-15 A	28-Apr-15 A	100%	i idat (DND	JF	MA	MJJ	A	SON	DJ				O N D shaft from						
C3840-SH-220	Install waling/strut/lagging	8d	l 0d	20-Apr-15 A	28-Apr-15 A	100%										l Insta	l waling/st	ut/lagging						
C3840-SH-230	Mobilize & set up tunnel plants/erect platform at -0.5mPD	3d	l 0d	29-Apr-15 A	02-May-15 A	100%										Mob	ilize & set i	p tunnel pla	ants/ere	ect platfo	orm at -0	0.5mPD		
C3840-SH-240	Obtain consent from MTR/BD for test boring	28d	0d	24-Mar-15 A	02-May-15 A	100%										Obt	in consen	from MTR/	/BD for	test bor	ina			
C3840-SH-250	Test boring for horizontal pipe piling (HPP53 incl. BD inspection)	3d			06-May-15 A													horizontal p				PD incho		
				-															pipe piii		55 110	DD IIISPe	ciony	
C3840-SH-260	Install HPP16	7d	0d	03-Jun-15 A	10-Jun-15 A	100%											Install HPF	16						
C3840-SH-270	Extract misaligned HPP53	2d	0d	11-Jun-15 A	12-Jun-15 A	100%										1	Extract m	saligned HF	PP53					
C3840-SH-280	Make good extracted casing, reinstall HPP53 & check alignment	8d	0d	13-Jun-15 A	23-Jun-15 A	100%											Make go	od extracte	d casin	g,reihsta	III HPP5	3 & check	k alighn	nent
C3840-SH-290	Preparation work for drilling HPP54, drill HPP54 & drilling aborted due to problem detected with interlocking	6d	0d	24-Jun-15 A	30-Jun-15 A	100%											Prepara	tion work fo	or drillin	g HPP5	4, drill H	IPP54 & c	drilling a	aborted di
C3840-SH-300	Demobilization HPP rig off site & remove platform at -0.5mPD	3d	0d	02-Jul-15 A	04-Jul-15 A	100%											Demob	lization HPF	P rig off	site & r	emove p	platformia	tt -0.5m	ıPD
C3840-SH-310	Mobilization for excavation plant & excavate tunnel shaft from -1.7mPD to -2.8mPD (113.1m3)	39d	0d	06-Jul-15 A	20-Aug-15 A	100%											№	obilization fo	or exca	vation pl	lant & e	xcavate tu	unnel sh	naft from -
C3840-SH-320	Demobilization of excavation plants and setting up for drilling platform	2d	l 0d	21-Aug-15 A	22-Aug-15 A	100%											I C	emobilzatio	n of exc	avation	plants a	and setting	g up for	r drilling p
C3840-SH-330	Mobilization for drilling rig & site set up	2d	l 0d	24-Aug-15 A	25-Aug-15 A	100%											IN	lobilization f	for drilli	ng rig &	site set	up		
C3840-SH-340	Extraction of HPP16	1d	l 0d	26-Aug-15 A	26-Aug-15 A	100%											I E	xtracction o	of HPP1	6				
C3840-SH-350	Site preparation for drilling works	4d	l 0d	27-Aug-15 A	31-Aug-15 A	100%												ite prepara	ation for	drilling	works			
C3840-SH-360	Horizontal pipe piling; 3 nos. (HPP16 to HPP18)	7d			08-Sep-15 A													Horizontal					P18)	
C3840-SH-370	Extraction of HPP53 & HPP54																							
		2d		-	10-Sep-15 A													Extraction						
3840-SH-380	Horizontal pipe piling; 4 nos. (HPP19, HPP53 to HPP55)	8d	0d	11-Sep-15 A	19-Sep-15 A	100%											•	Horizonta	al pipe p	iling; 4 r	ios. (HP	PP19, HPF	P53 to I	HPP55)
3840-SH-390	Demobilization for drilling rig & setting up for horizontal grouting	3d	0d	21-Sep-15 A	23-Sep-15 A	100%												Demobiliz	zation fo	or drilling	g rig & s	etting up I	for høri	zontal gro
3840-SH-400	Drilling and horizontal grouting (19 nos.)	17d	0d	24-Sep-15 A	15-Oct-15 A	100%												Drilling	g and he	prizontal	groutin	g (19 nos	i.)	
3840-SH-410	Demobilize grouting plants, remove rock fill, & mobilize & set up for rock excavation	17d	0d	16-Oct-15 A	23-Oct-15 A	100%												Demo	obilize g	routing	plants, r	emove ro	ock fill, 8	& mobilize
C3840-SH-420	Installation of waling L2A, installation of steel plate and prepartion works for removal of vertical pipe piles	8d	0d	24-Oct-15 A	28-Oct-15 A	100%												l Instal	Illation o	t waling	L2A, in	stallation	of stelel	l plate and
C3840-SH-430	Removal of vertical pipe pile PP84 ~ PP89a (7 numbers) & grouting for the gaps	9d	l Od	29-Oct-15 A	07-Nov-15 A	100%												Ren	moval o	fvertical	l pipe pil	le PIP84 ~	PP89a	a (7 numb
C3840-SH-440	Removal of temporary platform	1d	l 0d	09-Nov-15 A	09-Nov-15 A	100%												l Rer	moval o	f tempo	rary plat	tform		
C3840-SH-450	Shaft excavation;-2.8mPD ~ -3.5mPD (65.6m ³)	31d	0d	24-Oct-15 A	28-Nov-15 A	100%												💼 s	Shaft ex	cavation	r;-2.8mF	PD ~ -3.5r	mPD (6	35,6m³)
C3840-SH-460	Shaft excavation;-3.5mPD ~ -4.8mPD (122m ³)	46d	0d	30-Nov-15 A	25-Jan-16 A	100%													s	haft exc	avation;	-3.5mPD	~ -4.8r	mPD (122
C3840-SH-470	Installation of additional waling L3A	2d	l 0d	23-Jan-16 A	27-Jan-16 A	100%													I Ir	nstallatio	n of add	ditional wa	aling L3	3A'
C3840-SH-490	Shaft excavation;-4.8mPD ~ -6.0mPD (115m ³)	36d	0d	18-Jul-16 A	11-Aug-16 A	100%																🗖 Sh	nalit exc	avation;-4
C3840-SH-500	Reinstall drilling platform	2d		28-Jan-16 A		100%													6	einstall	drilling p			
					02-Feb-16 A																		rillin a rie	
C3840-SH-510	Mobilization & setup for drilling rig	4d				100%																etup for di		
C3840-SH-520	Installation of HPP roof (31 nos.)	30d	0d	03-Feb-16 A	22-Mar-16 A	100%														Ins	stallation	of HPP r	roof (31	nos.)
C3840-SH-530	Modification of working platform for drilling rig	1d	0d	23-Mar-16 A	24-Mar-16 A	100%														I Mo	odificatic	on df worl	king pla	atform for
C3840-SH-540	Dismantling of waling L2B	1d	0d	29-Mar-16 A	30-Mar-16 A	100%														I D	lismantli	ing of wali	ing L2B	,
C3840-SH-550	Installation of HPP wall (10 nos.)	10d	0d	30-Mar-16 A	18-Apr-16 A	100%														•	Installa	ition of HF	PP wall	(10 nos.)
Current Bar	Critical Remaining Work Data Date	: 01-Ju	ın-18									: :				<u></u>	<u></u>	<u></u>	<u> </u>	<u>; ;</u>				$\overline{\mathbf{T}}$
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	Activity Name		Orig Dur	Rem Dur	Start	Finish	% Complete	Total Float) J I	FM		2014 J Jul	ASC	D N I	DJ	FM		2015 J Jul		sol	N D	JI	- м	AI		016 Jul A	A S	O N	DJ	FI
C3840-SH-560	Modification of drilling platform		2d	0d	19-Apr-16 A	21-Apr-16 A	100%																		IN	Jodific	cation	of drill	ling pla	tform	
C3840-SH-570	Installation of HPP wall (3 numbers)		8d	0d	18-Apr-16 A	25-Apr-16 A	100%																			Install	lation (of HPF	' wall ((3 numb	ers)
C3840-SH-572	Drilling for HPP64 & HPP25, cease drilling due to obstruction & extract HPP64		8d	0d	26-Apr-16 A	04-May-16 A	100%																		••••	Drillif	ng for	HPP6	4 & HF	PP25, c	ase
C3840-SH-620	Demobilize HPP rig, dismantle drilling platform, mobilization & setup for Horizon	ntal Grouting works	2d	0d	05-May-16 A	16-May-16 A	100%																			Der	mobiliz	ze HPI	² rig, d	dismantl) dri
C3840-SH-630	Drilling for horizontal grout hoels (13 nos.)		5d	0d	16-May-16 A	26-May-16 A	100%																		0	Di	rilling f	or hor	izontal	grout h	oel
C3840-SH-632	Grouting for horizontal grout holes (13 nos.)		4d	0d	25-May-16 A	14-Jul-16 A	100%																			-	🗖 G	routine	g for he	orizonta	∣ gr
C3840-SH-640	Modification of drilling rig for HPP works & mobilization and set up HPP works		1d	0d	27-May-16 A	30-May-16 A	100%																			I M	lodific	ation c	f drillin	ıg rig for	HF
C3840-SH-642	Extract HPP25		2d	0d	30-May-16 A	31-May-16 A	100%																			ΪĒ	xtract	HPP2	.5		
C3840-SH-644	Drilling for HPP wall (5 nos.) including extraction of casing for HPP64		5d	0d	01-Jun-16 A	10-Jun-16 A	100%																				Drilling	j for H	IPP wa	all (5 nos	з.) i
C3840-SH-646	Demolize drilling rig		3d	0d	13-Jun-16 A	13-Jun-16 A	100%																			1	Demc	ize dr	illing rig	g	
C3840-SH-648	Modification of waling L3 & L3A/setting up drilling rig platform/mobilize & set up	drilling rig	2d	0d	14-Jun-16 A	16-Jun-16 A	100%																			1	Modif	icatior	۱ of wa	ding L3	š L
C3840-SH-650	Drilling for HPP wall (8 nos.)		23d	0d	17-Jun-16 A	14-Jul-16 A	100%																				ם	rilling f	or HPI	P wall (8	; nc
C3840-SH-660	Demobilize drilling rig/Dismantle drilling platform		2d	0d	15-Jul-16 A	16-Jul-16 A	100%																				I D	emob	lize dri	illing rig/	Disi
C3840-SH-665	Removal of vertical pipe piles PP89b		2d	0d	12-Aug-16 A	13-Aug-16 A	100%																							f vertica	
C3840-SH-668	Assembly of drilling platform for HPP rig		2d		12-Aug-16 A		100%																							of drilling	
C3840-SH-670					13-Aug-16 A		100%																								
	Drilling and horizontal grouting (13 nos.)		18d																											nd horizo	
C3840-SH-680	Modification of drilling rig		2d		24-Aug-16 A		100%																							ion of dr	
C3840-SH-690	Drilling for HPP wall (8 nos.)		8d			10-Sep-16 A	100%																							for HPP	
C3840-SH-740	Modification of drilling rig		2d	0d	10-Sep-16 A	12-Sep-16 A	100%																					IN	1odifice	ation of	lint,
Re-fabrication and I	elivery of Remaining Interlocking HPP Casing		87d	0d	07-Sep-15 A	12-Jan-16 A																									
C3840-CF-100	Fabrication for remaining casing (Roof); 1st batch		20d	0d	07-Sep-15 A	30-Sep-15 A	100%													•	Fat	oricatic	on for	rema	lining	casin	g (Ro	of); 1s	t batch		
C3840-CF-102	Delivery of casing (Roof); 1st batch		7d	0d	02-Oct-15 A	15-Oct-15 A	100%															eliver	y of c	asing ((Rdof	f); 1st	ť baťch	'			1
C3840-CF-104	Fabrication for remaining casing (Roof); 2nd batch		20d	0d	05-Oct-15 A	31-Oct-15 A	100%														-	Fabri	cation	for re	emair	ning c	asing	(Roof)); 2nd t	batch	
C3840-CF-106	Delivery of casing (roof); 2nd batch		7d	0d	02-Nov-15 A	09-Nov-15 A	100%														•	Deliv	very c	f casir	ng (r	oof);	2nd ba	atch			
C3840-CF-108	Fabrication for remaining casing; 3rd batch		20d	0d	21-Nov-15 A	17-Dec-15 A	100%															-	Fabri	cation	n for r	remair	ning c	asing	3rd ba	itch	
C3840-CF-110	Delivery of casing (Wall); 3rd batch		7d	0d	18-Dec-15 A	24-Dec-15 A	100%															۵	Deli	/ery oʻ	f casi	ing (V	Vall); 3	3rd baʻ	ich		
C3840-CF-112	Fabrication for remaining casing (wall); 4th batch		12d	0d	18-Dec-15 A	02-Jan-16 A	100%																Fal	oricatio	ion to	r rem	aining	casin() (wall)); 4th ba	tcł
C3840-CF-114	Delivery of casing (Wall); 4th batch		7d	0d	04-Jan-16 A	12-Jan-16 A	100%																D	elivery	y of ca	asing	(Wall)	; 4th t	atch		
BD Submissions Pri	or to Tunnel Excavation	4	403d	0d	23-Nov-15 A	20-Jan-17 A																									
C3840-BD-100	Submit piling record for phase 1 HPP		14d	0d	02-Jul-16 A	14-Jul-16 A	100%																				SI	Jbmit	oiling re	ecord fo	r p
C3840-BD-102	Submit grouting record for pahse 1 grouting work		5d	0d	23-Nov-15 A	28-Nov-15 A	100%															s St	ubmit	grouti	ing re	acord	for pa	hse 1	groutir	ng work	
C3840-BD-106	BA8 for phase 1 tunnel excavation		28d	0d	18-Jul-16 A	27-Sep-16 A	100%																				-	_	BA8 f	for phas	e 1
C3840-BD-108	BA10 for pahse 1 tunnel excavation		7d	0d	19-Sep-16 A	27-Sep-16 A	100%																						BA10) for pah	se
C3840-BD-109	Obtain consent from BD for commencing phase 1 tunnel excavation		0d	0d		28-Sep-16 A	100%																					•	Obtai	ín conse	nt
00040-00-103																															_
03040-00-103	1	Data Data 24	1	40																											
 Current Bar Actual Work 	Critical Remaining Work	Data Date: 01	-Jun	-18					V	last	ter	Pro	grai	nm	e Ra	vic	ion	ВV	1рі	25	1									<u> </u>	

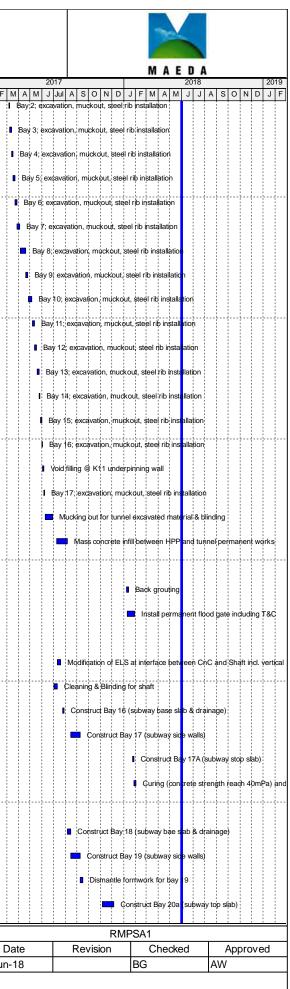
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	MTR				Т	Contract C3840-13C m Sha Tsui Station, Carnarvon Road Subwa	-		
	Activity Name	Orig Rem Start Dur Dur	Finish		Fotal ^{Float} O N D	2014 2015 J F M A M J Jul A S O N D J F M A M J Jul A S O N	2016 D J F M A M J Jul A S O N	2017 D J F M A M J Jul	
C3840-BD-110	Submit piling record for pahse 2 HPP	3d 0d 30-Nov-16	30-Nov-16 A	100%				Submit piling record for pa	
C3840-BD-112	Submit grouting record for pahse 2 grouting work	5d 0d 30-Nov-16	A 30-Nov-16 A	100%				Submit grouting record for	pahse 2 grouting work
C3840-BD-114	BA14 for HPP works	1d 0d 15-Nov-16	A 15-Nov-16 A	100%				BA14 for HPP works	
C3840-BD-118	BA10 for pahse 2 tunnel excavation	7d 0d 20-Jan-17	A 20-Jan-17 A	100%				I BA10 for pahse 2 tu	inel'excavation
Stage 1, Tunnel Ex	ccavation	205d 0d 11-Jun-16	A 28-Feb-17 A						
C3840-SE-640	Additional grouting for Probe Hole	3d 0d 11-Jun-16	A 11-Jun-16 A	100%			I Additional grouting	t for Probe Hole	
C3840-SE-650	Horizontal Probe Hole for Water Inflow Determination	1d 0d 11-Jun-16		100%	_			Hole for Water Inflow Determ	hating
C3840-SE-651	Demobilize HPP plants, remove HPP spoils	1d 0d 14-Sep-16	SA 19-Sep-16A	100%				bilizė HPP plants, remove HP	
C3840-SE-652	Install working platform for tunnel excavation at -2.15mPD & additional poratal frame	4d 0d 20-Sep-16	6 A 28-Sep-16 A	100%			Insta	ll working platform for tunnel	excavation at -2.15mPD & additional poratal frame
C3840-SE-660	Removal of vertical pipe pile PP84 - PP89a (7 nos.)	9d 0d 29-Sep-16	6 A 05-Oct-16 A	100%			🖡 Rer	noval of vertical pipe pile PP84	- PP89a (7 nos.)
C3840-TE1-100	Bay 1; excavation, muckout, steel rib installation	9d 0d 29-Sep-16	A 15-Oct-16 A	100%			Ba	y 1; excavation, muckout, ste	I rib installation
C3840-TE1-102	Bay 2; excavation, muckout, steel rib installation	4d 0d 17-Oct-16	A 22-Oct-16 A	100%			∎ в	ay 2; excavation, muckbut, ste	el rib installation
C3840-TE1-104	Bay 3; excavation, muckout, steel rib installation	4d 0d 24-Oct-16	A 28-Oct-16 A	100%			8 E	ay 3; excavatioh, muckout, st	el rib installation
C3840-TE1-106	Bay 4; excavation, muckout, steel rib installation	5d 0d 29-Oct-16	A 04-Nov-16 A	100%				Bay 4; excavation, muckout, s	eel rib installation
C3840-TE1-108	Bay 5; excavation, muckout, steel rib installation	5d 0d 05-Nov-16	A 09-Nov-16 A	100%				Bay 5; excavation, muckout,	teel rib installation
C3840-TE1-110	Bay 6; excavation, muckout, steel rib installation	5d 0d 10-Nov-16	A 14-Nov-16A	100%				Bay 6; excavation, muckout,	steel rib installation
					_				
C3840-TE1-112	Bay 7; excavation, muckout, steel rib installation		SA 18-Nov-16A					Baý 7; excavation, múckout,	
C3840-TE1-114	Bay 8; excavation, muckout, steel rib installation	6d 0d 19-Nov-16	3A 24-Nov-16A	100%			1	Bay 8, excavation, muckout	steel rib installation
C3840-TE1-116	Bay 9; excavation, muckout, steel rib installation	6d 0d 25-Nov-16	30-Nov-16 A	100%				Bay 9; excavation, muckou	, steel rib installation
C3840-TE1-118	Bay 10; excavation, muckout, steel rib installation	6d 0d 01-Dec-16	A 08-Dec-16 A	100%				Bay 10; excavation, muck	put, steel rib installation
C3840-TE1-120	Bay 11; excavation, muckout, steel rib installation	6d 0d 09-Dec-16	6A 13-Dec-16A	100%				Bay 11; excavation, muck	put, steel rib installation
C3840-TE1-122	Bay 12; excavation, muckout, steel rib installation	6d 0d 12-Dec-16	A 17-Dec-16 A	100%				Bay 12; excavation, muc	tout, steel rib installation
C3840-TE1-124	Bay 13; excavation, muckout, steel rib installation	6d 0d 19-Dec-16	A 23-Dec-16 A	100%				Bay 13; excavation, mu	kout, steel hib ihstallation
C3840-TE1-126	Bay 14; excavation, muckout, steel rib installation	6d 0d 24-Dec-16	A 30-Dec-16 A	100%				Bay 14; excavation, mu	ckout, steel rib installation
C3840-TE1-128	Bay 15; excavation, muckout, steel rib installation	4d 0d 31-Dec-16	A 05-Jan-17 A	100%				Bay 15: excavation m	ckout, steel rib installation
C3840-TE1-130		4d 0d 05-Jan-17		100%					uckout, steel rib installation
C3840-TE1-132		4d 0d 09-Jan-17	A 12-Jan-17 A	100%					iuckiout; stelel rib installation
C3840-TE1-133	Removal of unforeseen concrete pile	1d 0d 04-Jan-17	A 12-Jan-17 A	100%				Removal of unforese	n concrete, pile
C3840-TE1-134	Remove excavated material & working platform	10d 0d 09-Jan-17	A 28-Feb-17 A	100%				Remove excava	ted material & working platform
C3840-TE1-136	Mass concrete infill in between steel ribs (roof) & back grouting	10d 0d 13-Jan-17	A 15-Feb-17 A	100%				Mass concrete int	ill in between steel ribs (roof) & back grouting
Stage 2, Tunnel Ex	cavation	245d 0d 13-Sep-16	6 A 07-Aug-17 A						
C3840-SE-800	Probe hole for phase 2, tunnel excavation	1d 0d 13-Sep-16	6A 13-Sep-16A	100%			l Probe	hole for phase 2, tunnel exca	Vation
C3840-SE-802	Removal of vertical pipe piles PP84 ~PP89a (7 nos.)	5d 0d 24-Feb-17	A 27-Feb-17A	100%				Removal of vert	ical þipe piles PP84 ~PP89a (7 nds.)
C3840-TE2-100	Bay 1; excavation, muckout, steel rib installation	5d 0d 28-Feb-17	7 A 07-Mar-17 A	100%				Bay 1; excavati	ọn, muckout, steel rib installation
Current Ber		ata Date: 01-Jun-18						<u> </u>	RMPSA1
Current Bar Actual Work					Μ	ster Programme Revision RMPRSA1		Date	Revision Checked App
Remaining V		Page 19 of 26				-		01-Jun-18	BG AW

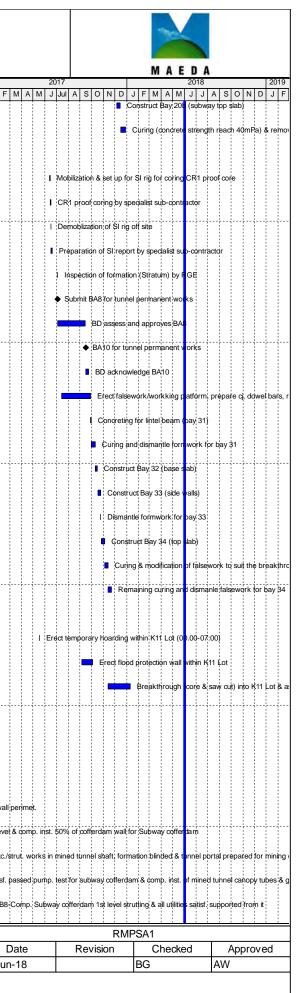


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tivity ID		Activity Name	Orig Dur	g Re r D	əm S Dur	Start	Finish	% Complete	Total Float	Ο Ν Ι	D J	I F M		201 M J .	4 Jul A	S O	N D	JF	M	A M	2015 J Ju	I A S	so	N D	JFN	/ A I	201 NJJ	6 Iul A	so	N D	JF	١
	C3840-TE2-110	Bay 2; excavation, muckout, steel rib installation	5d	d (Od C	06-Mar-17 A	09-Mar-17 A	100%																								Ī
	C3840-TE2-120	Bay 3; excavation, muckout, steel rib installation	6d	d (Od C	09-Mar-17 A	13-Mar-17 A	100%																								٥
	C3840-TE2-130	Bay 4; excavation, muckout, steel rib installation	60	d (0d 1	13-Mar-17 A	17-Mar-17 A	100%																								•
	C3840-TE2-140	Bay 5; excavation, muckout, steel rib installation	60	d (0d 1	17-Mar-17 A	22-Mar-17 A	100%																								ſ
	C3840-TE2-150	Bay 6; excavation, muckout, steel rib installation	60	d (0d 2	23-Mar-17 A	28-Mar-17 A	100%																								
	C3840-TE2-160	Bay 7; excavation, muckout, steel rib installation	60	d (0d 2	28-Mar-17 A	03-Apr-17 A	100%																								
	C3840-TE2-170	Bay 8; excavation, muckout, steel rib installation	5d	d (Od C	05-Apr-17 A	19-Apr-17 A	100%																								
	C3840-TE2-180	Bay 9; excavation, muckout, steel rib installation	5d	d (0d 2	20-Apr-17 A	25-Apr-17 A	100%																								
	C3840-TE2-190	Bay 10; excavation, muckout, steel rib installation	6d	d (0d 2	26-Apr-17 A	06-May-17 A	100%																								
	C3840-TE2-200	Bay 11; excavation, muckout, steel rib installation	60	d (0d C	08-May-17 A	12-May-17 A	100%																								
	C3840-TE2-210	Bay 12; excavation, muckout, steel rib installation	60	d (0d 1	13-May-17 A	18-May-17 A	100%																								
	C3840-TE2-220	Bay 13; excavation, muckout, steel rib installation	60	d (0d 1	19-May-17 A	24-May-17 A	100%																								
	C3840-TE2-230	Bay 14; excavation, muckout, steel rib installation	60	d (0d 2	25-May-17 A	27-May-17 A	100%																								
	C3840-TE2-240	Bay 15; excavation, muckout, steel rib installation	6d	d (0d 2	29-May-17 A	31-May-17 A	100%																								
	C3840-TE2-250	Bay 16; excavation, muckout, steel rib installation	20	d (Od C	01-Jun-17 A	02-Jun-17 A	100%																								
	C3840-TE2-251	Void filling @ K11 underpinning wall	1d	d (0d C	02-Jun-17 A	05-Jun-17 A	100%																								
	C3840-TE2-252	Bay 17; excavation, muckout, steel rib installation	6d	d (Od C	06-Jun-17 A	08-Jun-17 A	100%																								
	C3840-TE2-254	Mucking out for tunnel excavated material & blinding	40	d (0d C	09-Jun-17 A	28-Jun-17 A	100%																								
	C3840-TE2-256	Mass concrete infill between HPP and tunnel permanent works	15d	d (0d 1	10-Jul-17 A	07-Aug-17 A	100%																								
	Tunnel RC Works includ	Ing Breakthrough to K11 Diaphragm Wall	2240	d (0d 1	17-May-17 A	01-Feb-18 A																									
	C3840-TU-260	Back grouting	6d	d (0d C	08-Jan-18 A	13-Jan-18 A	100%																								
	C3840-TU-262	Install permanent flood gate including T&C	60	d (0d 1	11-Jan-18 A	29-Jan-18 A	100%																								
	RC Works Between Gri	ds 5.9 and 6.2	1850	d (0d C	03-Jul-17 A	01-Feb-18 A																									
	C3840-TU-165	Modification of ELS at interface between CnC and Shaft incl. vertical blinding at shaft	11d	d (0d 1	12-Jul-17 A	19-Jul-17 A	100%																								
	C3840-TU-170	Cleaning & Blinding for shaft	20	d (0d C	03-Jul-17 A	11-Jul-17 A	100%																								
	C3840-TU-180	Construct Bay 16 (subway base slab & drainage)	9d	d (0d 2	25-Jul-17 A	28-Jul-17 A	100%																								
	C3840-TU-185	Construct Bay 17 (subway side walls)	21d	d (0d 1	16-Aug-17 A	08-Sep-17 A	100%																								
	C3840-TU-248	Construct Bay 17A (subway stop slab)	6d	d (0d 2	24-Jan-18 A	27-Jan-18 A	100%																								
	C3840-TU-250	Curing (concrete strength reach 40mPa) and remove falsework for bay 17A	5d	d (0d 2	28-Jan-18 A	01-Feb-18A	100%																								
	RC Works Between Gri	ds 6.2 and 8.5	1250	d (0d C	07-Aug-17 A	28-Dec-17 A																									
	C3840-TU-282	Construct Bay 18 (subway bae slab & drainage)	9d	d (Od C	07-Aug-17 A	15-Aug-17 A	100%																								
	C3840-TU-284	Construct Bay 19 (subway side walls)	15d	d (0d 1	16-Aug-17 A	08-Sep-17 A	100%																								
	C3840-TU-285	Dismantle formwork for bay 19	30	d (0d C	09-Sep-17 A	16-Sep-17 A	100%																								
	C3840-TU-286	Construct Bay 20a (subway top slab)	260	d (0d C	06-Nov-17 A	05-Dec-17 A	100%																								
	Current Bar	Critical Remaining Work Data Date:	01-Ju	un-1	8						1	<u>: i</u>	<u> </u>	<u> </u>					<u>: i</u>	<u> </u>		<u>: i</u>	<u> </u>	<u> </u>	<u> </u>	<u> </u>			<u>_: i</u>	<u>_: i</u> T	<u></u>	-
	Actual Work		0 of 2	26						N	I a	ste	r Pr	ogr	am	me	Re	visi	on	RM	1PI	RSA	41							01	D	_
	Remaining Wor	rk		-																										01	-Jun	1-
																														<u> </u>		_





		Activity Name		Orig Dur	Rem Dur	Start	Finish	% Complete	Total Float		I I E		2014				EM		201		50	ND			2016		
C	3840-TU-287	Construct Bay 20b (subway top slab)		9d		06-Dec-17 A	15-Dec-17 A				JF	M F				DJ	FIM		vi J J		50		JFM		J Jui	A 5 0	NDJFM
C	3840-TU-288	Curing (concrete strength reach 40mPa) & remove falsework for bay 2	0	9d	0d	16-Dec-17A	28-Dec-17 A	100%																			
RC V	Vorks Between Gri	ids 8.5 and 9 (BD Full Approval Zone)		133d	0d	14-Jun-17 A	21-Nov-17 A																				
C3	3840-TU-290	Mobilization & set up for SI rig for coring CR1 proof core		2d	0d	1 14-Jun-17 A	14-Jun-17 A	100%																			
C	3840-TU-292	CR1 proof coring by specialist sub-contractor		4d	0d	1 15-Jun-17 A	16-Jun-17 A	100%																			
C	3840-TU-294	Demoblization of SI rig off site		1d	0d	I 17-Jun-17 A	17-Jun-17 A	100%																			
C	3840-TU-296	Preparation of SI report by specialist sub-contractor		6d	0d	1 17-Jun-17 A	19-Jun-17 A	100%																			
C	3840-TU-298	Inspection of formation (Stratum) by RGE		1d	0d	1 04-Jul-17 A	04-Jul-17 A	100%																			
C	3840-TU-300	Submit BA8 for tunnel permanent works		0d	0d	1	04-Jul-17 A	100%																			
C	3840-TU-302	BD assess and approves BA8		28d	0d	I 05-Jul-17 A	14-Sep-17 A	100%																			
	3840-TU-304	BA10 for tunnel permanent works		0d			15-Sep-17 A																				
	3840-TU-306	BD acknowledge BA10		7d		I 16-Sep-17 A																					
	3840-TU-308	Erect falsework/workking platform, prepare cj, dowel bars, rebar fixing	and fwk for lintel beam	11d		I 15-Jul-17 A																					
	3840-TU-310	Concreting for lintel beam (bay 31)		11		29-Sep-17 A																					
	3840-TU-312	Curing and dismantle formwork for bay 31		11d		30-Sep-17 A		100%																			
	3840-TU-316	Construct Bay 32 (base slab)		4d		1 11-Oct-17 A		100%																			
	3840-TU-318	Construct Bay 33 (side walls)		8d		17-Oct-17 A		100%																			
C	3840-TU-319	Dismantle formwork for bay 33		1d	0d	25-Oct-17 A	25-Oct-17 A	100%																			
C	3840-TU-320	Construct Bay 34 (top slab)		8d	0d	26-Oct-17 A	04-Nov-17 A	100%																			
C	3840-TU-330	Curing & modification of falsework to suit the breakthrough work		5d	0d	1 05-Nov-17 A	12-Nov-17 A	100%																			
C	3840-TU-340	Remaining curing and dismanle falsework for bay 34		8d	0d	13-Nov-17 A	21-Nov-17 A	100%																			
K11 I	Breakthroug			203d	0d	17-May-17 A	09-Jan-18 A																				
C	3840-TU-190	Erect temporary hoarding within K11 Lot (00.00-07:00)		1d	0d	17-May-17 A	17-May-17 A	100%																			
C	3840-TU-200	Erect flood protection wall within K11 Lot		6d	0d	06-Sep-17 A	04-Oct-17 A	100%																			
C	3840-TU-210	Breakthrough (core & saw cut) into K11 Lot & associated works		40d	0d	13-Nov-17 A	09-Jan-18 A	100%																			
Milesto	nes for Cost Cer	ntre B - Carnarvon Road Subway and Entrances		1668d	133d	30-Apr-14 A	24-Oct-18		67d				*+														
C384	0-MS-B01	B1-Complete all U/G UU identif. & cables in north & south foot paths in	Carn. Rd. exposed	0d	0d	1	30-Apr-14 A	100%					♦ B1-Con	nplete all	U/G UU	J identi	f. & cal	bles în	north 8	& south	foot p	aths in C	am. Rd.	exposed			
C384	0-MS-B02	B2-Close CR, hoarding erected, all pipes & UU diverted and all O/H sig	ns removed	0d	0d	1	01-Jun-14 A	100%					♦ B2-	Close CF	R, hbard	ing ere	cted, a	all pipe	es&UU	divent	ed and	all Ю/Н	signs ren	noved			
C384	0-MS-B03	B3-All underground utilities affecting the Works satisfactorily removed o	r protected	0d	0d	1	31-Aug-14 A	100%						♦ В	3-All und	dergrou	und uti	ilities at	ffecting	the W	orks sa	ati sfa ctor	ilyremo∖	ved or pr	otected		
C384	0-MS-B04	B4-Comp. inst. of 75% of cofferdam wall for mined tunnel shaft installed perimet.	I, measure as a % of wall	0d	0d	1	30-Nov-14 A	100%							•	B4-C	omp. ii	inst. of	75% of	f coffer	dam w	all for m	ned tunr	ıel shaft	nstalled,	measure	as a % of wall p
C384	0-MS-B05	B5-Exc. of mined tunnel shaft reached -3.0mPD level & comp. inst. 50% Subway cofferdam	of cofferdam wall for	0d	0d	1	28-Nov-15 A	100%					<u>.</u>									♦ B5	Exc. of r	mined tur	nel shaf	t reached	-3.0mPD level 8
C384	0-MS-B06	B6-Comp. exc./strut. works in mined tunnel shaft, formation blinded & to mining exc.	unnel portal prepared for	0d	0d	1	30-Sep-16 A	100%																		♦ В	6-Comp. exc./str
C384	0-MS-B07	B7-Satisf, passed pump, test for subway cofferdam & comp, inst. of min grouted	ed tunnel canopy tubes &	0d	0d	1	14-Nov-16 A	100%																			♦ B7-Satisf. þa
C384	0-MS-B08	B8-Comp. Subway cofferdam 1st level strutting & all utilities satisf. supp	orted from it	0d	0d	1	16-Jan-17 A	100%																			♦ B8-C
	urrent Bar	Critical Remaining Work	Data Date:)1-Ju	n-18						<u></u>							<u> </u>		<u> </u>			<u> </u>			<u> </u>	
	ctual Work	 Milestone 	Page 21	of 26	;					N	laste	er I	rogra	amm	ie R	evis	sior	n R	MP	RS.	A1						Da
	emaining Wo		Page 21	01 20	,	1																					01-Jun-

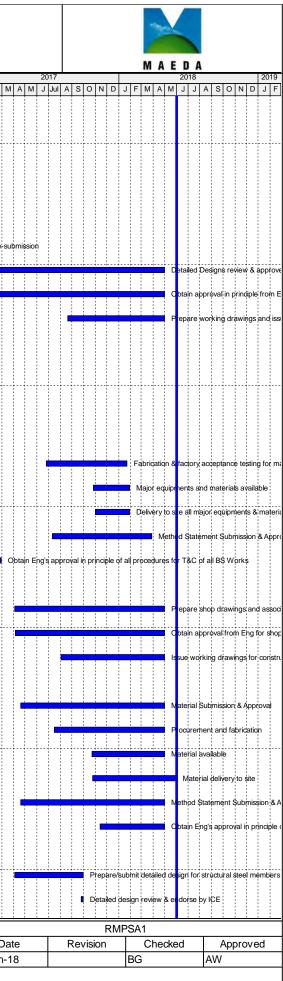


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/ity ID		Activity Name	Orig Dur	I Re	em Start Dur	Finish	Com	% plete	Total Float	DN	D J	FM	A M	2014 J Jul	ASO	NC) J F	м		2015 J Jul		0	I D	JFI	MAN	2016 // J Ju		O N	DJ	F
	C3840-MS-B09	B9-Exc. of Subway reached -5.5mPD, grids 4-5 blinded, comp. exc, for tunnel & 50% removal of K11 D. wall	0d	1	0d	30-Nov-1	7A 1	00%																						
	C3840-MS-B10	B10-Comp. all Subway RC structures fr. grids 1 to 4+3m,	0d	1	0d	28-Dec-1	7A 1	00%																			1			
	C3840-MS-B11	B11-Comp. all RC structures betn TST Stn wall & grid 4+3m & mined tunnel	0d	1	0d	29-Jan-1	8A 1	00%																						
	C3840-MS-B12	B12-Comp. all ABWF works to Deg. 1 except for works assoc. with new entrance D1	0d	1	0d	26-Feb-1	8A 1	00%																						
	C3840-MS-B13	B13-Comp. all ABWF works to Deg. 3 except for works assoc. with new entrance D1	0d	1	0d	13-Jun-1	8	0%	200d																					
- ·	C3840-MS-B14	B14-Complete all works in this Cost Centre	0d	1	0d	24-Oct-1	8	0%	67d																					
Buil	ding Services & A	BWF Works	1445d	1 12	1d 01-Feb-	14 A 25-Oct-1	8		54d												+									
Sit	e Validation		228d	1	0d 01-Feb-	14 A 31-Dec-1	4 A																							
	C3840-SV-100	Carry out detailed site survey	6d	1	0d 01-Feb-	14 A 28-Feb-1	4A 1	00%				🗖 Ca	rry ou	t detailed	l site surv	/ey														
	C3840-SV-110	Prepare Implementation Programme/Method Statement with detailed Phasing/Sequence	90d	1	0d 01-Aug-	14 A 29-Sep-1	4A 1	00%							F	repare	mpler	nenta	tion Pro	ogrami	me/Me	thod St	lateme	nt with o	detailed	Phasing	/Seque	nce		
- ·	C3840-SV-120	Obtain Eng's approval for Implementation Programme/Method Statement for modification & diversion works	60d	1	0d 30-Sep-	14 A 31-Dec-1	4A 1	00%									Obt	ain Er	ng's app	oroval	for Imp	lement	tation I	Program	nme/Me	thod Sta	tement	for modi	ification	& di
De	sign for BS & ABWF V	works Norks at Temporary Staircase	646d	1	0d 07-Jul-1	4 A 15-Dec-1	5 A																							
	C3840-TSD-100	Prepare and submit detailed designs for BS works	49d	1	0d 07-Jul-1	4 A 11-Aug-1	4 A 1	00%						_	Prepar	e and	submit (detaile	ed desig	ins for	BS wo	orks								
<u> </u>	C3840-TSD-110	Obtain approval detailed designs for BS works from Eng	50d	1	0d 12-Aug-	14 A 05-Sep-1	4A 1	00%							📫 Ōbt	ain apr	oroval d	etaileo	d desigi	ns for I	BS wor	rks fror	n Eng							
<u> </u>	C3840-TSD-120	Issue working drawings of BS works for construction	60d	1	0d 06-Sep-	14 A 05-Nov-1	4A 1	00%								lss	uę work	ting di	rawings	of BS	works	for cor	nstruct	ion						
<u> </u>	C3840-TSD-160	Prepare and submit detailed designs for ABWF works	6d	1	0d 17-Nov-	15 A 24-Nov-1	5A 1	00%															Pre	pare an	d subm	it detaile	d desigi	nis for AB	3WF wo	orks
<u> </u>	C3840-TSD-170	Obtain approval detailed designs for ABWF works from Eng	30d	1	0d 25-Nov-	15 A 14-Dec-1	5A 1	00%) btain a	pproval	detailed	designs	s for ABV	WF wor	ksfr
<u> </u>	C3840-TSD-180	Issue working drawings of ABWF works for construction	0d	1	0d	15-Dec-1	5A 1	00%																				F works		
		Vaterial Procurement/Delivery for Temporary Staircase	535d			14 A 05-Mar-1																								
	C3840-TSD-130	Material submission	21d			14A 05-Feb-1		00%																Ma	aterial s	ubmissic				
	C3840-TSD-140	Obtain approval of material submission from MTR	56d			-14 A 22-Feb-1		00%																				erial subr	mission	from
	C3840-TSD-150	Procurement & delivery of materials	10d			16 A 05-Mar-1		00%																				y of mat		
			200d			15 A 06-Jul-16		0078																	inocui	emente	cicell/el	y or mat	el idio	
	8 ABWF Works at Te							0001																						
	C3840-TSBA-100	Complete RC works for grid 2-4	0d		0d	20-Nov-1		00%															• Con			s for gri				
	C3840-TSBA-105	Complete RC works for grid 1-2				20-Feb-1		00%																• (grid 1-2		
	C3840-TSBA-110	Installation of BS and ABWF works for grid 2-4	59d			16 A 23-Mar-1		00%																				dABWF		
	C3840-TSBA-115	Installation of BS and ABWF work for grid 1-2	33d			16 A 23-Mar-1		00%																				dABWF	work f	br gr
	C3840-TSBA-117	CN&SE Works by others	2d			16 A 15-Mar-1		00%																		SE Worl	s by oth	hers		
	C3840-TSBA-130	T&C	4d			16 A 17-Mar-1		00%																1	T&C					
	C3840-TSBA-140	Inspection prior to open for public use	83d	1	0d 22-Mar-	16 A 22-Jun-1	6A 1	00%																		n In	spection	n prior to	open f	or pi
	C3840-TSBA-150	Open for public use	0d	1	0d	06-Jul-16	A 1	00%																		•	Open fo	or public	use	
Sc	heme Designs for BS	Works	85d		0d 07-Jul-1	4 A 05-Nov-1	4A																							
	C3840-SD-100	Prepare a scheme designs	60d	1	0d 07-Jul-1	4 A 15-Aug-1	4A 1	00%						-	Prepa	re a sc	heme d	esigns	s											
	C3840-SD-120	Scheme design review & comment by Eng/MTRC & FSD	28d	1	0d 16-Aug-	14 A 15-Sep-1	4 A 1	00%							S c	heme (design r	eview	& com	ment t	by Eng	MTRC	& F\$	C						
	 Current Bar Actual Work Remaining Wor 	Critical Remaining Work Data Date: 0 ♦ ♦ Milestone Page 22 k			8]		L	N	Ias	ter]	Pro	gra	nme	Re	visi	on	RN	1PF	RSA	1	<u> </u>	<u> </u>		<u> </u>	<u></u>	<u></u>	01	D Jun-

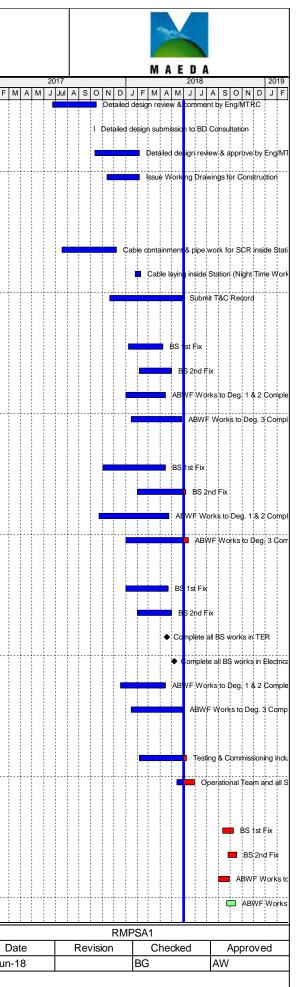
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C3840-SD-130	Scheme designs re-submission		24d	0d 16-Sep-14A	06-Oct-14 A	100%	0		JF		JJUI		Scher	ne desigi	ns re-su	bmission	n n	50		5 5	FIM		<u> </u>	ul A	50		<u>ר</u>
C3840-SD-140	Scheme design review & approve by Eng/MTRC & FSD		28d	0d 07-Oct-14 A	05-Nov-14 A	100%							 \$0	heme de	sign rev	iew & a	pprove	by En	g/MTF	۲C & F	ŦSD						
C3840-SD-150	Obtain approval of scheme design		0d	0d	05-Nov-14 A	100%							• O	btain app	roval of	scheme	e desigr	1									
Detailed Designs for B	IS Works	12	273d	0d 03-Oct-14 A	30-Apr-18 A																						
C3840-DD-100	Prepare a detailed designs		40d	0d 03-Oct-14 A	04-Dec-14 A	100%								Prepare	e a deta	led des	igns										
C3840-DD-120	Detailed Designs review & comment by MTRC		28d	0d 05-Dec-14A	07-Jan-15 A	100%								Det	ailed De	sians re	view &	comm	nent by	v MTF	۶C						
C3840-DD-130	Detailed designs re-submission		7d	0d 26-Aug-16 A		100%										- 3									De		
																											-
C3840-DD-140	Detailed Designs review & approve by MTRC		464d	0d 26-Oct-16 A	· ·	100%																					
C3840-DD-150	Obtain approval in principle from Eng for All Detailed Designs	4	442d	0d 27-Sep-16 A	30-Apr-18 A	100%																				1	-
C3840-DD-160	Prepare working drawings and issue for construction	1	114d	0d 21-Aug-17 A	30-Apr-18 A	100%																					
laterial Submission/P	rocurement/Delivery & Method Statement Submission for BS Wo	rks 10	051d	0d 08-Jul-14 A	29-Mar-18 A																						
C3840-BSP-100	Submit proposal on supplier & model types of all major BS equip. & mater	ials	60d	0d 08-Jul-14 A	07-Oct-14 A	100%					-		Subm	iit propos	al on su	pplier &	madel	types (of all n	najor I	BS equ	uip.8.m	nateria	ls			
C3840-BSP-110	Approval of proposal on supplier & model types of all major BS equip. & n	naterials	48d	0d 08-Oct-14 A	05-Nov-14 A	100%							🗖 Ap	oproval o	fpropos	al on si	upplier	& mod	lel type	es of a	II majo	vr BS e∕	quip. &	mater	ials	• •	
C3840-BSP-130	Material Submission & Approval		90d	0d 11-Aug-14 A	28-Feb-15 A	100%						-			Mate	rial Sub	mission	& App	oroval								
C3840-BSP-140	Placing order for major equipments and materials		36d	0d 02-Mar-15 A	16-Mar-15 A	100%									🗖 Pla	cing or	ler for r	najor (equipn	nents	and m	aterials	3				
C3840-BSP-150	Fabrication & factory acceptance testing for major equipments and materia	als 1	178d	0d 26-Jun-17 A	22-Jan-18 A	100%																					
C3840-BSP-160	Major equipments and materials available		65d	0d 27-Oct-17 A	29-Jan-18 A	100%																					
C3840-BSP-170	Delivery to site all major equipments & materials		59d	0d 01-Nov-17A	29-Jan-18 A	100%																					-
C3840-BSP-190	Method Statement Submission & Approval	1	176d	0d 12-Jul-17 A		100%																					
C3840-BSP-200						100%																					
	Obtain Eng's approval in principle of all procedures for T&C of all BS Wor		32d	0d 28-Dec-16 A		100%																					
esign for ABWF Work	S	3	302d	0d 04-Apr-17 A	30-Apr-18 A																						
C3840-DABWF-100	Prepare shop drawings and associated temporary works design submissi	on 2	207d	0d 04-Apr-17 A	30-Apr-18 A	100%																					
C3840-DABWF-110	Obtain approval from Eng for shop drawings & associated temp. works de	esigns 2	212d	0d 05-Apr-17 A	30-Apr-18 A	100%																					
C3840-DABWF-120	Issue working drawings for construction	1	117d	0d 03-Aug-17 A	30-Apr-18 A	100%																					
Aaterial Submission/M	laterial Procurement/Delivery & Method Statement Submission fo	or ABWF Works 3	345d	0d 19-Apr-17 A	31-May-18 A																						
C3840-ABWP-100	Material Submission & Approval	2	243d	0d 20-Apr-17 A	30-Apr-18 A	100%																					
C3840-ABWP-110	Procurement and fabrication	1	157d	0d 17-Jul-17 A	30-Apr-18 A	100%																					
C3840-ABWP-120	Material available		65d	0d 23-Oct-17 A	30-Apr-18 A	100%																					
C3840-ABWP-130	Material delivery to site		51d	0d 25-Oct-17 A	31-May-18 A	100%																					
C3840-ABWP-140	Method Statement Submission & Approval	2	250d	0d 19-Apr-17A	30-Apr-18 A	100%																					
C3840-BSP-180	Obtain Eng's approval in principle of all acceptance procedures for ABWF	Works	44d	0d 13-Nov-17 A	30-Apr-18 A	100%																					
Detailed Design for Ca	nopies on Above Ground Structures (PS CI. P43.3)		212d	0d 04-Apr-17 A																							
C3840-PWDC-210	Prepare/submit detailed design for structural steel members & connection		24d	0d 04-Apr-17 A		100%																					-
C3840-PWDC-220	Detailed design review & endorse by ICE		7d	0d 25-Sep-17 A	30-Sep-17 A	100%																					-
 Current Bar 	Critical Remaining Work	Data Date: 01	-Jun	1-18				T 4					, D				ם מ										
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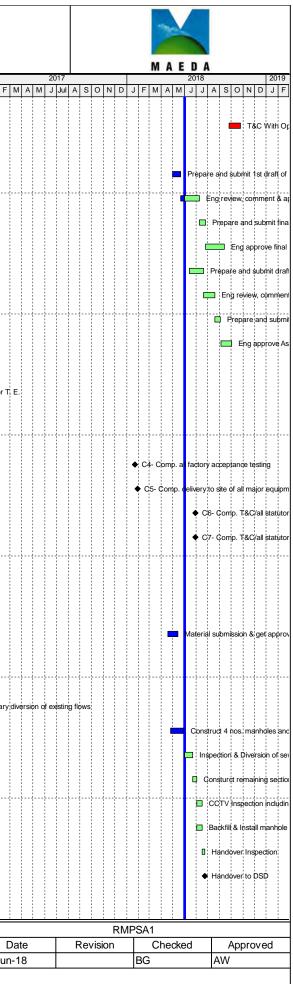




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C3840-PWDC-230	Detailed design review & comment by Eng/MTRC		28d	Ud	23-Jun-17 A	16-Oct-17 A	100%																						
C3840-PWDC-240	Detailed design submission to BD Consultation		6d	0d	11-Oct-17 A	11-Oct-17 A	100%																						
C3840-PWDC-250	Detailed design review & approve by Eng/MTRC/BD		44d	0d	12-Oct-17 A	05-Feb-18 A	100%																						
C3840-PWDC-270	Issue Working Drawings for Construction		6d	0d	13-Nov-17 A	05-Feb-18 A	100%																						
BS Works at TST St	ation		234d	0d	19-Dec-14 A	31-May-18 A																							
C3840-BST-140	Cable containment work for Substation #4 inside TST Station (Night Tir	me Work)	7d	0d	19-Dec-14 A	30-Dec-14 A	100%										Cable	contain	ment w	vork fo	r Subs	tation #4 i	nside TS	ST Stat	ion (Nig	ht Time	Work)		
C3840-BST-150	Cable containment & pipe work for SCR inside Station (Night Time Work	rk)	114d	0d	18-Jul-17 A	08-Dec-17 A	100%																						
C3840-BST-180	Cable laying inside Station (Night Time Work)		24d	0d	26-Jan-18 A	09-Feb-18 A	100%																						
C3840-BST200	Submit T&C Record		2d	0d	20-Nov-17 A	31-May-18 A	100%																						
BS & ABWF Works a	at D2 Entrance including at By Pass Corridor		47d	0d	02-Jan-18 A	26-May-18 A																							
C3840-BSD2-110	BS 1st Fix		24d	0d	08-Jan-18 A	07-Apr-18 A	100%																						
C3840-BSD2-120	BS 2nd Fix		24d	0d	05-Feb-18 A	30-Apr-18 A	100%																						
C3840-BSD2-130	ABWF Works to Deg. 1 & 2 Completion including installation for SS ste	elwork	24d	0d	02-Jan-18 A	14-Apr-18 A	100%																						
C3840-BSD2-135	ABWF Works to Deg. 3 Completion		24d	0d	15-Jan-18 A	26-May-18 A	100%																						
BS & ABWF Works a	at Subway Conc. Level, including at Plant Room & D3		180d	11d	23-Oct-17 A	13-Jun-18		2d																					
C3840-BSS-100	BS 1st Fix		90d	0d	02-Nov-17 A	14-Apr-18 A	100%																						
C3840-BSS-110	BS 2nd Fix		40d	5d	01-Feb-18 A	06-Jun-18	99%	5d																					
C3840-BSS-120	ABWF Works to Deg. 1 & 2 Completion		80d	0d	23-Oct-17 A	24-Apr-18 A	100%																						
C3840-BSS-125	ABWF Works to Deg. 3 Completion		40d	11d	02-Jan-18 A	13-Jun-18	98%	2d																					
BS & ABWF Works a	at Mid Landing Level including TER Rooms		120d	0d	18-Dec-17 A	31-May-18 A																							
C3840-BSM-100	BS 1st Fix		56d	0d	02-Jan-18 A	21-Apr-18 A	100%																						
C3840-BSM-110	BS 2nd Fix		40d	0d	01-Feb-18A	30-Apr-18 A	100%																						
C3840-BSM-120	Complete all BS works in TER		0d	0d	1	18-Apr-18 A	100%																						
C3840-BSM-130	Complete all BS works in Electrical Room & Power On for New MCB B	oard		0d		08-May-18 A																							
C3840-BSM-140	ABWF Works to Deg. 1 & 2 Completion		40d			14-Apr-18 A	100%																						
C3840-BSM-150	ABWF Works to Deg. 3 Completion		40d			31-May-18 A																							
					05-Feb-18A	-	10078	04																					
	nspections Prior to Open Entrances D2/D3 for Public Use						500/	0d																					
C3840-BSM-160	Testing & Commissioning including issuance of FSD Form 501 for comp		24d		05-Feb-18 A		50%	4d																					
C3840-BSM-170	Operational Team and all Statutory inspections / obtain compliance cert	incates			15-May-18 A		20%	0d																					
BS & ABWF Works a					01-Sep-18	18-Oct-18		60d																					
C3840-BSD1-130	BS 1st Fix		24d	24d	11-Sep-18	10-Oct-18	0%	0d																					
C3840-BSD1-140	BS 2nd Fix		18d	18d	26-Sep-18	18-Oct-18	0%	0d																					
C3840-BSD1-150	ABWF Works to Deg. 1 & 2 Completion including installation of SS stee	elwork	24d	24d	01-Sep-18	29-Sep-18	0%	0d																					
C3840-BSD1-155	ABWF Works to Deg. 3 Completion		18d	18d	22-Sep-18	15-Oct-18	0%	62d																					
Current Bar	Critical Remaining Work	Data Date: 01	-Jun	n-18							1 1		1 1			<u>, i</u>		<u> i i</u>	<u> </u>			<u> </u>	1 1						<u></u>
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Remaining \	Work	l ľ																										01-	Juil



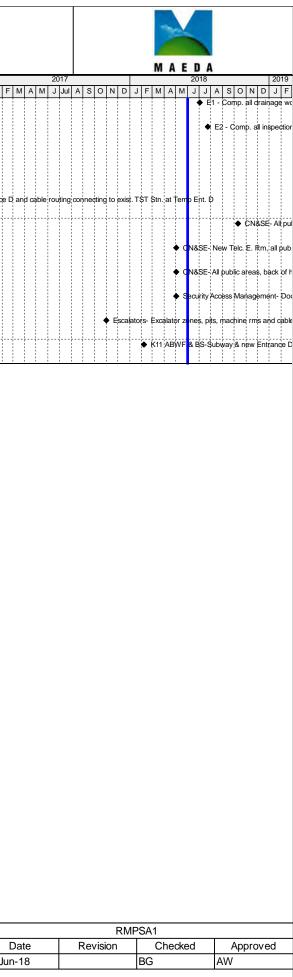
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		section Prior to Open Entrance D1 for Public Use			d 26-Sep-18	25-Oct-18		Od																				
	C3840-BSD1-170	T&C With Operation Inspection	24d	24	d 26-Sep-18	25-Oct-18	0%	0d																				
0	Operational & Maintena	ance Manuals, As-built Drawings, Design Data	114d	103	d 02-May-18 A	03-Oct-18		19d																				
	C3840-OD-1000	Prepare and submit 1st draft of O&M Manuals as per PS 18	30d	0	d 02-May-18 A	22-May-18 A	100%																					
	C3840-OD-1010	Eng review, comment & approve draft O&M Manuals as per PS 18	56d	40	d 23-May-18 A	10-Jul-18	20%	43d																				
	C3840-OD-1020	Prepare and submit final version of O&M Manuals as per PS 18	15d	15	id 11-Jul-18	25-Jul-18	0%	43d																				
	C3840-OD-1030	Eng approve final version of O&M Manuals as per PS 18	50d	50	d 26-Jul-18	13-Sep-18	0%	43d																				
	C3840-OD-1040	Prepare and submit draft as-built Drawings as per PS 18	30d	30	d 14-Jun-18	20-Jul-18	0%	19d																				
	C3840-OD-1050	Eng review, comment & approve draft as-built Drawings as per PS 18	30d	30	id 21-Jul-18	19-Aug-18	0%	23d																				
	C3840-OD-1060	Prepare and submit final as-built Drawings as per PS 18	15d	15	id 20-Aug-18	03-Sep-18	0%	23d																				_
	C3840-OD-1070					03-Oct-18	0%	23d																				
		Eng approve As-built Drawings as per PS 18	30d		d 04-Sep-18		0%																					
M	lilestones for Cost Ce	entre C - Building Services	1304d	0	10-Nov-14 A	29-Jun-18		184d																				
	C3840-MS-C01	C1- Approval of detailed designs for BS works, suppliers/models/types of BS equip./mat. & SD f E.	or T. Od	0	ld	10-Nov-14 A	100%								♦ C	1- Appr	oval of	detaile	d desig	ins for	BS wo	rks, sup	opliers/m	odels/ty	/pes of I	BS equi	ip./m	ľ
	C3840-MS-C02	C2- Approval in principe of all BS Shop Drwgs	0d	0	ld	10-Nov-14 A	100%								♦ C	2- Appr	oval in j	orincip	e of all	BS Sh	op Drv	vgs						
	C3840-MS-C03	C3- Comp. placing all orders for all major BS equipment & materials	0d	0	d	16-Mar-15 A	100%										♦ 0	:3- Co	mp, pla	icing al	ll order	s for all	major B	\$ equip	ment &	materia	als	
	C3840-MS-C04	C4- Comp. all factory acceptance testing	0d	0	ld	22-Jan-18 A	100%																					
	C3840-MS-C05	C5- Comp. delivery to site of all major equipment for the basement E&M plant room	0d	0	ld	29-Jan-18 A	100%																					
	C3840-MS-C06	C6- Comp. T&C/all statutory & operational team inspections for New Entrance D2	0d	0	ld	29-Jun-18	0%	184d																				
	C3840-MS-C07	C7- Comp. T&C/all statutory & operanal team inspection for new Entrance D3 and Subway	0d	0	d	29-Jun-18	0%	184d																				
פו	D Entructed Drain	nage Works - Option	1119d	44	d 20-Dec-13A	24-Jul-18		131d																				
	ubmissions		1368d	0	d 20-Dec-13 A	14-May-18 A																						
						, i	1000/									_												
	C3840-ENT-010	Engineer Exercise Option 1 (Assume 1 year after Contract Commence)	0d			08-Oct-14 A	100%								Engin	eerExe	ercise C	ption	1 (Assu	lme 1 y	/ear af	er Cont	tract Cor	nmence	e)			
	C3840-ENT-020	Material submission & get approval from MTRC	60d	0	d 18-Apr-18 A	14-May-18 A	100%																					
	C3840-ENT-030	Proposed procedures for diversion agreed during meeting held on 20 Dec 13	0d	0	ld	20-Dec-13 A	100%			♦ Pr	opose	d proce	dures fo	diversio	on agree	ed durin	g meet	ing he	ld on 20) Dec 1	13							
D	SD Entrusted Sewage	e Works	604d	44	d 26-Jul-16 A	24-Jul-18		78d																				
	C3840-ENT-070	Temporary diversion of existing flows	18d	0	id 26-Jul-16 A	09-Nov-16 A	100%																		1	—	H	1
	C3840-ENT-080	Construct 4 nos. manholes and pipe laying in between 4 nos. manholes (85%)	13d	0	d 26-Apr-18A	31-May-18 A	100%																					
	C3840-ENT-082	Inspection & Diversion of sewer flow from temporary sewer pipeline to newly constructed sewer	18d	18	id 01-Jun-18 A	22-Jun-18	0%	78d																				
	C3840-ENT-090	pipeline Consturct remaining section of entrusted sewage works (15%)	8d	8	id 23-Jun-18	03-Jul-18	0%	78d																				
	C3840-ENT-160	CCTV Inspection including report	12d	12	d 04-Jul-18	17-Jul-18	0%	78d																				
	C3840-ENT-170	Backfill & Install manhole cover	12d		d 04-Jul-18	17-Jul-18	0%	78d																				
	C3840-ENT-180	Handover Inspection	6d		id 18-Jul-18	24-Jul-18	0%	78d																				
	C3840-ENT-190	Handover to DSD	0d	0	ld	24-Jul-18	0%	78d																				
M	lilestones for Cost Ce	ntre E - DSD Entrusted Drainage Works - Option	21d	21	d 03-Jul-18	24-Jul-18		159d																				
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	C3840-MS-E01	E1 - Comp. all drainage works incl. pipes, manholes, bedding and etc.	0d	00	1	03-Jul-18	0%	180d																							-
	C3840-MS-E02	E2 - Comp. all inspection works and handed over to DSD	0d	00	Ł	24-Jul-18	0%	159d																							
I	nterface Requirem	ents Associated with Designated Contracts	893d	00	d 14-Mar-16A	11-Oct-18		81d																							
	Access Dates for De	signated Contractors As PS Appendix B	893d	00	d 14-Mar-16A	11-Oct-18		81d																							
	C3840-DC-10	CN&SE- Temp. stairs, temp. Entrance D and cable routing connecting to exist. TST Stn. at Temp Ent. D	0d	00	d 14-Mar-16A		100%																	♦ CN	I&SE-	Temp.	stairs,	temp.	Entra	nce D	2
	C3840-DC-20	CN&SE- All public areas, back of house areas and cable routings at New Entrance D1	0d	00	d 11-Oct-18		0%	81d																							-
	C3840-DC-30	CN&SE- New Telc. E. Rm, all pub. areas, back of house areas and cab. rout. at B. P. Rm, m.l., Subw& N.E. D2	0d	00	d 02-May-18 A		100%																								
	C3840-DC-40	CN&SE- All public areas, back of house areas & cable routings at Subway & new Ent. D3	0d	00	d 02-May-18 A		100%																								
	C3840-DC-50	Security Access Management- Doors requiring security protection or door contacts at Basement P. Rm.	0d	00	d 02-May-18 A		100%																								
	C3840-DC-60	Escalators- Excalator zones, pits, machine rms and cable routes at Subway IvI to mid-landing	0d	00	d 01-Nov-17 A		100%																								
	C3840-DC-70	K11 ABWF & BS-Subway & new Entrance D3 within K11 Lot Boundary at Subway within K11 Lot B.	0d	00	d 08-Feb-18A		100%								÷	1				+											ľ

Current Bar Actual Work Remaining Work Critical Remaining Work Milestone	Data Date: 01-Jun-18 Page 26 of 26	Master Programme Revision RMPRSA1	Date 01-Jun-18
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APPENDIX D

IMPLEMENTATION SCHEDULE

Appendix VIII

Implementation Schedule

Project Profile Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Parties	Location of the measure	When to implement the measure	Relevant requirements or standards for the measure to achieve
	Noise Impact					
S.3.1	Use of quieter plant	To minimise construction noise emissions	Contractor	Work site	Construction Stage	ProPECC PN2/93 and Noise Control Ordinance
S.3.1	 Use of noise enclosure and movable barrier movable barrier can achieve a 5 dB(A) reduction for movable PME and 10 dB(A) reduction for stationary PME; noise enclosure can achieve 15dB(A) reduction for PME; A typical design barrier with a steel frame of vertical / cantilever type would be adopted and located close to the noise generating part of PME; Barrier material of surface mass in excess of 7kg/m² shall be required to achieve the maximum screening effect (and minimum 10kg/m² for noise enclosure); The length of barrier should generally be at least five times greater than its height and the minimum height of a barrier should be such that no part of the noise source will be visible from the noise sensitive receiver being protected. 	To minimize construction noise emissions	Contractor	Work site	Construction Stage	ProPECC PN2/93, Noise Control Ordinance and EIAO Guidance Note NO. 9/2010
S.3.1	General Construction Noise Control MeasuresThe Code of Practice on Good Management Practice	To minimize construction noise	Contractor	Work site	Construction Stage	ProPECC PN2/93 and Noise Control

Project Profile Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Parties	Location of the measure	When to implement the measure	Relevant requirements or standards for the measure to achieve
	 to Prevent Violation of the Noise Control Ordinance (Chapter 400) (for Construction Industry) published by EPD shall be adopted; The statutory and non-statutory requirements and guidelines shall be complied with; Approval for the method of working, equipment and noise mitigation measures intended to be used at the site shall be granted from the Project Engineer before commencing any work; Working methods to minimize the noise impact on the surrounding NSRs shall be formulated and executed, and the implementation of these methods shall be monitored by experienced personnel with suitable training; Noisy equipment and noisy activities shall be located as far away from the NSRs as is practical; Unused equipment shall be turned off; PME should be kept to a minimum and the parallel use of noisy equipment shall be maintained regularly; and Material stockpiles and other structures shall be effectively utilized as noise barriers, whenever practicable. 	emissions				Ordinance
	Air Quality Impact	· - · · · ·				
S.3.2	 Construction Dust Control Measures Decking will be provided subsequent to the completion of surface excavation works. The duration 	To minimise the dust impacts arising from the	Contractor	Work site	Construction Stage	Air Pollution Control (Construction

Project Profile Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Parties	Location of the measure	When to implement the measure	Relevant requirements or standards for the measure to achieve
	 of decking is around 13 months after surface excavation works; Regular watering to reduce dust emissions from all exposed site surface, particularly during dry weather; Frequent watering for particularly dusty construction areas and areas close to air sensitive receivers; Cover all excavated or stockpile of dusty material by impervious sheeting or spraying with water to maintain the entire surface wet; Provision of vehicle washing facilities at the exit points of the site; and Provision of tarpaulin covering of any dusty materials on a vehicle leaving the site. 	construction works				Dust) Regulation
	Water Quality Impact					
S.3.3	 Construction Water Quality Impact Measures The Contractor should design and implement all the mitigation measures and practices specified in the ProPECC PN 1/94 "Construction Site Drainage" and "Recommended Pollution Control Clauses for Construction Contracts" issued by EPD. All runoffs arising from the construction site should be properly collected and treated to ensure the discharge standards as stipulated in WPCO are met. Silt trap and oil interceptor should be provided to remove the oil, lubricants, grease, silt, grit and debris from the wastewater before being pumped to the public stormwater drainage system. The silt traps and oil interceptors should be cleaned and maintained regularly. 	To reduce water quality impact induced by the construction work	Contractor	Work Site	Construction Stage	ProPECC PN1/94; Water Pollution Control Ordinance

Project Profile Ref.	Recommended Mitigation Measures	Objectives of the Recommended Measures & Main Concerns to address	Implementation Parties	Location of the measure	When to implement the measure	Relevant requirements or standards for the measure to achieve
	 Any foul effluent should not be discharged into any public sewer and stormwater drain, unless an effluent discharge permit is obtained under the WPCO by the Contractor. Site toilet facilities, if needed, should be chemical toilets or should have the foul water effluent directed to a foul sewer. 					
	Waste Management					
S.3.4	 Construction Waste Management Measures Excavated material should be reused on site as far as possible to minimise off-site disposal. Scrap metals or abandoned equipment should be recycled if possible. Waste arising should be kept to a minimum and be handled, transported and disposed of in a suitable manner. The Contractor should adopt a trip ticket system for the disposal of C&D materials to any designated public filling facility and/or landfill. Independent audits of the Contractor and resident site staff will be undertaken to ensure that the correct procedures are being followed. Chemical waste shall be handled in accordance with the Code of Practice on the Packaging, Handling and Storage of Chemical Wastes. All general refuse should be segregated and stored in enclosed bins or compaction units and waste separation facilities for paper, aluminium cans, plastic bottles etc. should be provided to facilitate reuse or 	To adopt waste management measures in the way of avoiding, minimising, reusing and recycling so as to reduce waste generation	Contractor	Work Site	Construction Stage	Waste Disposal Ordinance (Cap. 54); Waste Disposal (Chemical Waste) (General) Regulation; ETWB TCW No. 31/2004; ETWB TCW No. 19/2005.

APPENDIX E

STATUS OF ENVIRONMENTAL LICENSES AND PERMITS



Contract No. C3840-13C Tsim Sha Tsui Station Carnarvon Road Subway

Licence Summary

ltem No.	Our Ref.	Govt. Ord.	Type? (License / Permit / Account / Notification / Registration & etc.)	, Description	Submission	Ref. No	Date of Submission (to EPD) (DD-MM-YYYY)	Date of Approval / Receipt (from EPD) (DD-MM-YYYY)	Date of Activation (DD-MM-YYYY)	Date of Expiry (DD-MM-YYYY) Green = expire next mth; Yellow = expire this wk; Red = Expired	Description	Remarks
000	000	EIAO	Permit	Environmental Permit	N/A	AEP-440/2012	N/A	N/A	18 - 07 - 2012	N/A	Baseline, Air & Noise Impact Monitoring	
001	APCO #004	APCO	Notification	Construction Dust Notification	Form NB – Notification S3(3) of APCO (Construction Dust)	433242	04 - 05 - 2018	07 - 05 - 2018	01 - 01 - 2016	31 - 12 - 2018	Construction of the Superstructure of a Building	Change of anticipated date of completion is notified
001	APCO #002	APCO	Notification	Construction Dust Notification	Form NB – Notification S3(3) of APCO (Construction Dust)	403252	27 - 05 - 2016	02 - 06 - 2016	01 - 11 - 2016	28 - 02 - 2019	Road Construction Work	Change of anticipated date of completion is notified
002	APCO #002	WDO	Account	Construction Waste Billing Account	EPD-211 (Form 1) Application for a Billing Account for Disposal of Construction Waste	7018523	18 - 10 - 2013	25 - 10 - 2013	25 - 10 - 2013	N/A	Disposal of C&D Waste	Application No. WFG12765
003	WPCO #002	WPCO	Licence	Water Discharge Licence	EPD-117 (Form A) Application for a Licence of Water Discharge	WT00019722-2014	24 - 07 - 2014	01 - 09 - 2014	01 - 09 - 2014	31 - 03 - 2019	Quarterly Report FlowRate 25m3/d, pH 6-9, SS 30mg/L, COD 80mg/L	
004	CWP #001	WDO	Registration	Chemical Waste Producer	EPD-129 Application for Registration as a Chemical Waste Producer	5213-2214-M2446-16	15 - 01 - 2014	04 - 03 - 2014	04 - 03 - 2014	N/A	Surplus paint, spent lubrucating oil, spent battery	
006	CNP#011	NCO	Permit	Construction Noise Permit	EPD74A(s) Form 1 - Application for a Construction Noise Permit	OSS Ref: 002069312 Permit: GW-RE0635-18	05 - 09 - 2018	19 - 09 - 2018	01 - 10 - 2018	30 - 03 - 2019	4nos Submersible Water pump (Electric) or 1 drill for 24-hr; 4 drill & 4 grinder for 07:00-23:00	Working Area includes the underground area

APPENDIX F

EVENT AND ACTION PLAN

Event and Action Plan for Air Quality

In case the Action and Limit Levels are not complied during construction stage, the Event and Action Plan shown below should be followed.

Event / Action	ET	IEC	ER	Contractor
Action Level Exceedance for one sample	 Identify source; If valid, inform IEC and ER; Repeat measurement to confirm finding; Increase monitoring frequency to daily. 	 Check monitoring data submitted by ET; Check Contractor's working method. 	1. Notify Contractor	 Rectify any unacceptable practice; Amend working methods if appropriate
Exceedance for two or more consecutive samples	 Identify source; Inform IEC and EPD; Repeat measurements to confirm findings; Increase monitoring frequency to daily; Discuss with IEC and Contractor on remedial action required; If exceedance continues, arrange meeting with IEC and ER; If exceedance stops, cease additional monitoring. 	 Check monitoring data submitted by ET; Check Contractor's working method; Discuss with ET and Contractor on possible remedial measures; Advise the ER on the effectiveness of the proposed remedial measures; Supervise implementation of remedial measures. 	 Confirm receipt of notification of failure in writing; Notify Contractor; Ensure remedial measure properly implemented. 	 Submit proposals for remedial action to IEC within 3 working days of notification; Implement the agreed proposals; Amend proposal if appropriate.
Limit Level Exceedance for one sample	 Identify source; Inform ER and EPD; Repeat measurement to confirm finding; Increase 	 Check monitoring data submitted by ET; Check Contractor's working 	 Confirm receipt of notification of failure in writing; Notify Contractor; Ensure remedial 	 Take immediate action to avoid further exceedance; Submit proposals for remedial actions to IEC

Action	ET	IEC	ER	Contractor
	monitoring frequency to daily; 5. Assess effectiveness of Contractor's remedial actions and keep IEC, EPD and ER informed of the results.	 method; 4. Discuss with ET and the Contractor on possible remedial measures; 5. Advise the ER on the effectiveness of the proposed remedial measures; 6. Supervise implementation of remedial measures. 	measures properly implemented.	within 3 worki days of notification; 3. Implement the agreed proposals; 4. Amend proposal if appropriate.
Exceedance for two or more consecutive samples	 Notify IEC, ER, Contractor and EPD; Identify sources; Repeat measurement to confirm findings; Increase monitoring frequency to daily; Carry out analysis of Contractor's working procedures to determine possible mitigation to be implemented; Arrange meeting with IEC and ER to discuss the remedial actions to be taken; Assess the effectiveness of Contractor's remedial actions and keep IEC, EPD and ER 	 Discuss amongst ER, ET and Contractor on the potential remedial actions; Review Contractor's remedial actions whenever necessary to assure their effectiveness and advise the ET accordingly. Supervise the implementation of remedial measures. 	 Confirm receipt of notification of failure in writing; Notify Contractor; In consultation with IEC, agree with the Contractor on the remedial measures to be implemented; Ensure remedial measures properly implemented; 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. 	 Take immedia action to avoi further exceedance; Submit proposals for remedial actions to IEC within 3 worki days of notification; Implement the agreed proposals; Resubmit proposals if problem still r under control Stop the relevant portio of works as determined b the ER until the exceedance i abated.

Event / Action	ET	IEC	ER	Contractor	
	results;				
	8. If exceedance stops, cease additional monitoring.				

Event and Action Plan for Construction Noise

In case the Action and Limit Levels are not complied during the construction stage, the Event and Action Plan shown below should be followed.

Event / Action	ET	IEC	ER	Contractor
Action Level	 Notify IEC and Contractor. Carry out investigation. Report the results of investigation to the IEC and Contractor. Discuss with the Contractor and formulate remedial measures Increase monitoring frequency to check mitigation effectiveness. 	 Review the analyzed result submitted by ET. Review the proposed remedial measures by the Contractor and advise the ER accordingly. Supervise the implementation of remedial measures. 	 Confirm receipt of notification of exceedance Notify Contractor Require Contractor to propose remedial measures for the analysed noise problem Ensure remedial measures are properly implemented. 	 Submit noise mitigation proposals to IEC Implement noise mitigation proposals
Limit Level	 Notify IEC, ER, EPD and Contractor, and follow other actions Identify source Repeat measurement to confirm findings Increase monitoring frequency Check Contractor's working procedures to determine possible mitigation to be implemented Inform IEC, ER and EPD the causes and actions taken for the exceedances Assess effectiveness of 	 Discuss amongst ER, ET and Contractor on the potential remedial actions Review Contractor's remedial actions whenever necessary to assure their effectiveness and advise the ET accordingly Supervise the implementation of remedial measures 	 Confirm receipt of notification of exceedances Notify Contractor Require Contractor to propose remedial measures Ensure remedial measures are properly implemented 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. 	 Take immediate action to avoid further exceedance Submit proposals for remedial actions to IEC within 3 working days of notifications Implement the agreed proposals Revise and resubmit proposals if problem still not under control Stop the relevant portion of works as determined by the ER until the exceedance is abated

Event / Action	ET	IEC	ER	Contractor	
	remedial actions and keep IEC, EPD, ER informed of the results				
	8. If exceedance stops, cease additional monitoring				

APPENDIX G

MONITORING SCHEDULE

			tal Monitoring & Au ecember 20			
Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
						1
2	3	4 1-hr TSP* Noise Weekly Site Audit	5	6	7	8
9	10	11 1-hr TSP* Noise Weekly Site Audit	12	13	14	15
16	17	18 1-hr TSP* Noise Weekly Site Audit	19	20	21	22
23	24	25	26	27 1-hr TSP* Weekly Site Audit Noise	28	29
30	31					
		21st September 2018 due te bected circumstances (e.g. a		-		

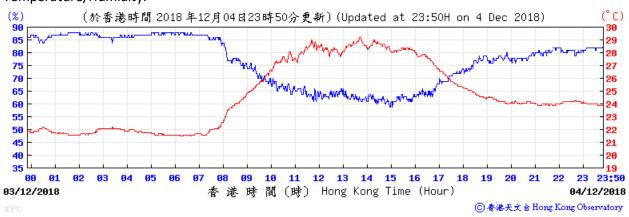
		Janua	ary 2019 (Ter	ntative)		
Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
		1	2 1-hr TSP*	3	4	5
			Noise			
			Weekly Site Audit			
6	7	8	9	10	11	12
		1-hr TSP*				
		Noise				
10	44	Weekly Site Audit	40	47	40	
13	14	15 1-hr TSP*	16	17	18	19
		Noise				
		Weekly Site Audit				
20	21	22	23	24	25	26
		1-hr TSP*				
		Noise				
		Weekly Site Audit				
27	28	29	30	31		
		1-hr TSP*				
		Noise				
		Weekly Site Audit				

APPENDIX H

WEATHER INFORMATION EXTRACTED FROM HK OBSERVATORY

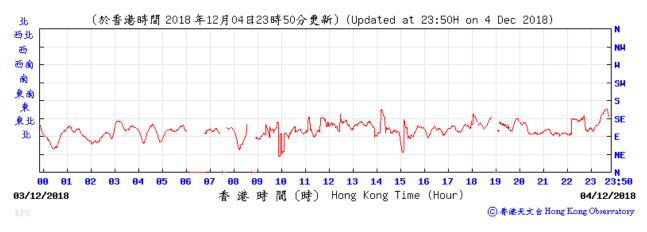
Day	Total Rainfall, mm	1-hr TSP	Noise	Remarks
1	0.0			
2	0.0			
3	0.0			
4	0.0	✓	√	No significant rainfall during noise measurement
5	Trace			
6	0.1			
7	1.0			
8	0.0			
9	Trace			
10	0.2			
11	Trace	✓	✓	No significant rainfall during noise measurement
12	0.0			
13	0.0			
14	0.0			
15	0.0			
16	Trace			
17	0.0			
18	0.0	✓	√	No significant rainfall during noise measurement
19	0.0			
20	0.0			
21	0.0			
22	0.0			
23	10.5			
24	0.1			
25	0.0			
26	0.0			
27	Trace	√	√	No significant rainfall during noise measurement
28	Trace		1	
29	Trace			
30	Trace			
31	0.0			
ean/Total	11.9		1	

King's Park Weather Station – 04 December 2018

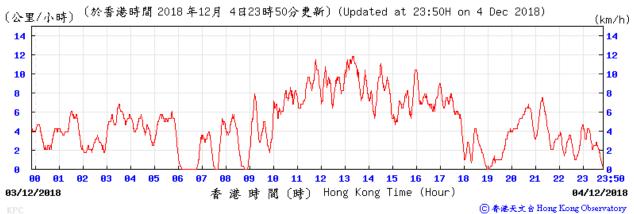


Temperature/Humidity:

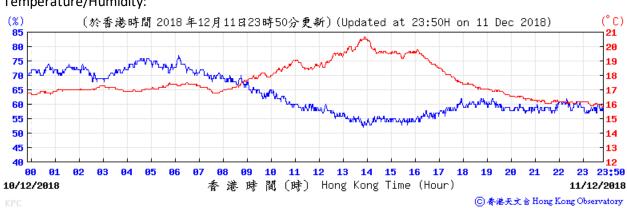
Wind Direction:





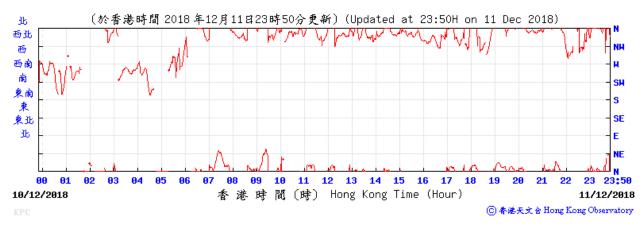


King's Park Weather Station – 11 December 2018



Temperature/Humidity:

Wind Direction:





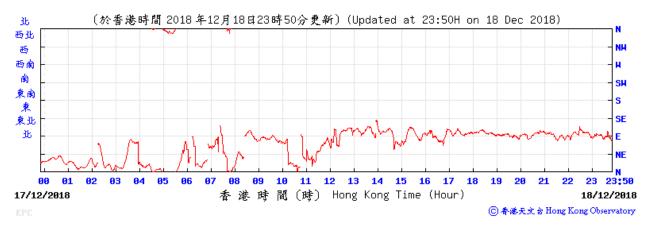
Wind Speed:

King's Park Weather Station – 18 December 2018

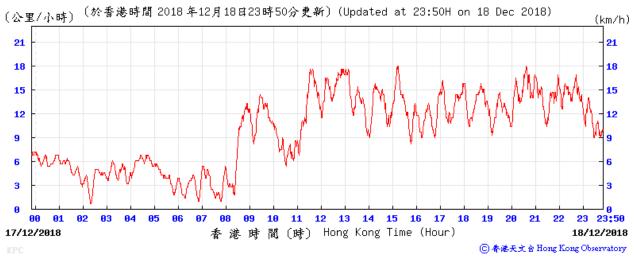


Temperature/Humidity:

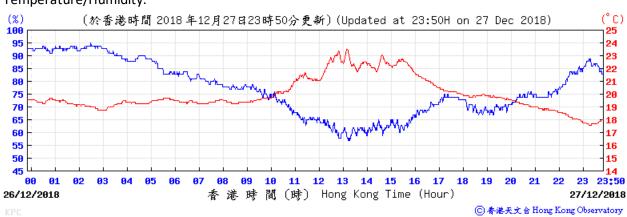
Wind Direction:





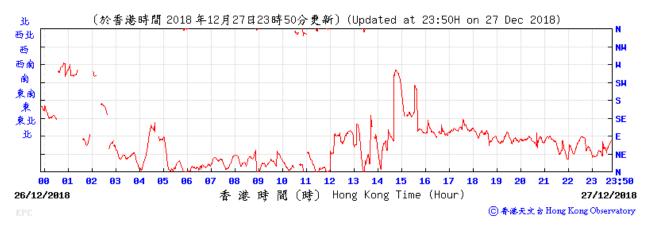


King's Park Weather Station – 27 December 2018



Temperature/Humidity:

Wind Direction:





APPENDIX I

CERTIFICATE OF LABORATORY AND EQUIPMENT CALIBRATION

ALS Technichem (HK) Pty Ltd

ALS Laboratory Group

ANALYTICAL CHEMISTRY & TESTING SERVICES



	SUB-CONTRACTING REPO	ORT	
CONTACT	: MR THOMAS CHAN	WORK ORDER	HK1858992
CLIENT	: MOTT MACDONALD HONG KONG LIMITED		
ADDRESS	3/F MAPLETREE BAY POINT, 348 KWUN TONG ROAD,	SUB-BATCH	: 1
	KOWLOON, HONG KONG	DATE RECEIVED	: 12-NOV-2018
		DATE OF ISSUE	: 21-NOV-2018
PROJECT	:	NO. OF SAMPLES	: 1
		CLIENT ORDER	1

General Comments

- Sample(s) were received in ambient condition.
- Sample(s) analysed and reported on an as received basis.
- Calibration was subcontracted to and analysed by Action United Enviro Services.

Signatories

PP

This document has been signed by those names that appear on this report and are the authorised signatories

Signatories	/	Position	
Richard Fung	V	General Manager	

This is the Final Report and supersedes any preliminary report with this batch number.

Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release.

ALS Technichem (HK) Pty Ltd Part of the ALS Laboratory Group

11/F. Chung Shun Knitting Centre 1 - 3 Wing Yip Street Kwai Chung N T. Hong Kong Tel. +852 2610 1044 Fax. +852 2610 2021 www.alsglobal.com WORK ORDER

: HK1858992

SUB-BATCH CLIENT

PROJECT

² 1 2 Mott Macdonald Hong Kong Limited 2 ----



ALS Lab	Client's Sample ID	Sample Type	Sample Date	External Lab Report No.	
HK1858992-001	S/N: 5201707005	Equipments	12-Nov-2018	S/N: 5201707005	

Equipment Verification Report (TSP)

Equipment Calibrated:

Туре:	Laser Dust monitor	
Manufacturer:	TSI AM520	
Serial No.	5201707005	
Equipment Ref:	NA	_
Work Order:	HK1858992	

Standard Equipment:

Standard Equipment:	Higher Volume Sampler (TSP)
Location & Location ID:	Calibration Room
Equipment Ref:	HVS 018
Last Calibration Date:	21 September 2018

Equipment Verification Results:

Verification Date:

13&14 November 2018

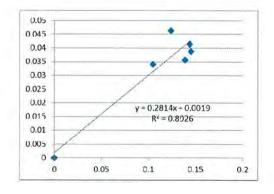
Hour	Time	Mean Temp °C	Mean Pressure (hPa)	Concentration in mg/m ³ (Standard Equipment)	Concentration in mg/m ³ (Calibrated Equipment)	Tolerance (mg/m ³)
2hr01min	09:20 ~ 11:21	24.3	1014.1	0.036	0.139	0.103
2hr01min	11:27 ~ 13:28	24.3	1014.1	0.039	0.145	0.106
2hr01min	13:35 ~ 15:36	24.3	1014.1	0.041	0.144	0.103
2hr10min	15:41 ~ 17:51	24.3	1014.1	0.046	0.124	0.078
2hr15min	09:24 ~ 11:39	23.5	1015.6	0.034	0.105	0.071

Linear Regression of Y or X

Slope (factor):	0.2814	
Correlation Coefficient	0.9448	
Date of Issue	21 November 2018	

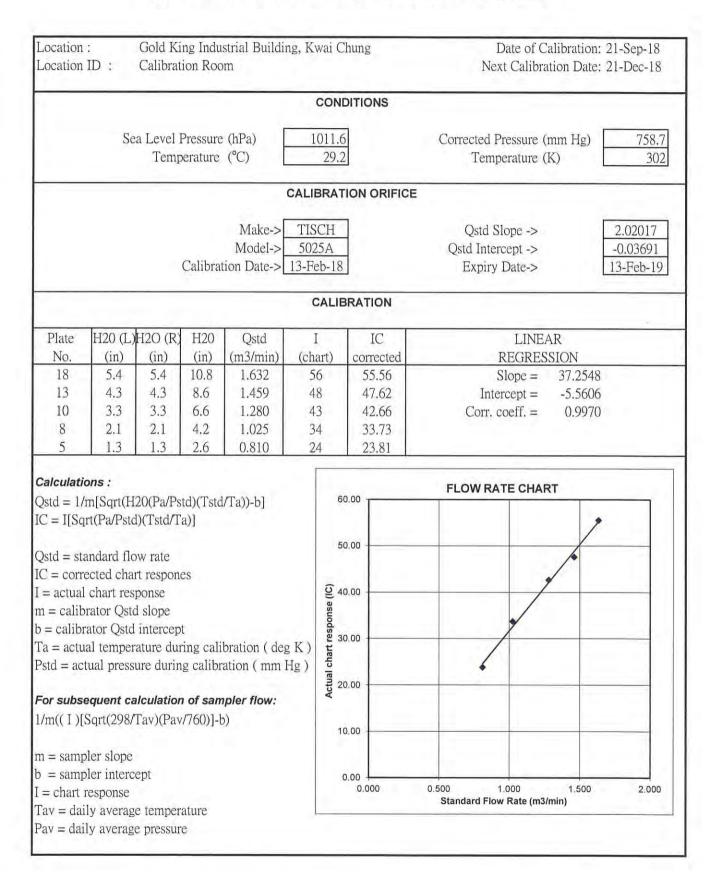
Remarks:

- 1. **Strong** Correlation (R>0.8)
- 2. Factor 0.2814 should be applied for TSP monitoring *If R<0.5, repair or re-verification is required for the equipment

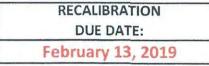


Operator :	Fai So	_ Signature : _	Sav	Date :	21 November 2018
QC Reviewer :	Ben Tam	_ Signature : _	36	Date :	21 November 2018

TSP SAMPLER CALIBRATION CALCULATION SPREADSHEET







Cal. Date:	February 13	3, 2018	Rootsn	neter S/N: 4	138320	Ta:	293	°K
Operator:	Jim Tisch					Pa:	763.3	mm Hg
Calibration		TE-5025A	Calib	rator S/N:	1612			
								1
		Vol. Init	Vol. Final	ΔVol.	ΔTime	ΔΡ	ΔΗ	
	Run	(m3)	(m3)	(m3)	(min)	(mm Hg)	(in H2O)	
	1	1	2	1	1.3970	3.2	2.00	
	2	3	4	1	1.0000	6.3	4.00	
	3	5	6	1	0.8900	7.9	5.00	
	4	7	8	1	0.8440	8.7	5.50	
	5	9	10	1	0.7010	12.6	8.00	
			D	ata Tabulat	ion]
	1.00		Aul Pa	V/Tstd			TALL T- (D-)	
	Vstd	Qstd	$\sqrt{\Delta H \left(\frac{Pa}{Pstd}\right)}$			Qa	√∆H(Ta/Pa)	
	(m3)	(x-axis)	(y-axi	and the second day of the second day is a second day of the second	Va	(x-axis)	(y-axis)	
	1.0172	0.7281	1.429		0.9958	0.7128	0.8762	
	1.0130	1.0130	2.021	No. of Concession, Name	0.9917	0.9917	1.2392	
	1.0109	1.1358	2.259		0.9896	1.1120	1.3854	
	1.0098	1.1964	2.370		0.9886	1.1713	1.4530	-
	1.0046	1.4331	2.858	in the second se	0.9835	1.4030	1.7524	
	OCTO	m=	2.020	and the second se	0.4	m=	1.26500	-
	QSTD	b= r=	-0.036	a loss includes and the second second	QA	b= r=	0.99988	
								1
	Vetd	AVAL/Do AD	(Date)/Tate /Ta	Calculation		ΔVol((Pa-Δl		-
		$Vstd/\Delta Time$	/Pstd)(Tstd/Ta	1	and the second se	Va/ATime	-)/Fd)	-
	Qstu-	vstu/drime	For subseque	ont flow rat				-
		11 5 1			e calculation	11	· / /	1
	Qstd=	1/m((√∆H(·	Pa Pstd (Tstd Ta)-ь)	Qa=	1/m((√∆⊦	H(Ta/Pa))-b)	
		Conditions						
Tstd:	1705 P. C. STORE L.					RECA	LIBRATION	
Pstd:	a second and a second and a second as a	mm Hg				mmends a	nnual recalibrati	on ner 199
AH: calibrat		er reading (in	2 H2O)				Regulations Part	and the second second
		eter reading (i					, Reference Met	
		perature (°K)					ended Particulat	
		essure (mm	Hg)			and the second se	ere, 9.2.17, page	
rd. dcludi D								

Tisch Environmental, Inc. 145 South Miami Avenue

Village of Cleves, OH 45002

www.tisch-env.cor TOLL FREE: (877)263-761(FAX: (513)467-900



Certificate No. 800699 Pag	e 1 of 4 Pages
Customer : Arcadis Design & Engineering Limited	
Address : 20/F, AXA Tower, Landmark East, 100 How Ming Street, Kwun To	ng, Kowloon, Hong Kong.
Order No.: Q80223 Date of recei	pt : 15-Jan-18
Item Tested	
Description : Sound Level Meter	
Manufacturer : B&K I.D.	3 m
Model : 2238 Serial No.	: 2448529
Test Conditions	
Date of Test : 17-Jan-18 Supply Volta	ge ;
Ambient Temperature : (23 ± 3)°C Relative Hum	nidity : (50 ± 25) %
Test Specifications	
Calibration check.	
Ref. Document/Procedure: Z01,IEC 61672, IEC 61260.	
Test Results	
All results were within the IEC 61672 Type1 & IEC 61260 Class 1specification.(whe	re applicable)
The results are shown in the attached page(s).	
Main Test equipment used:	
Equipment No. Description Cert. No.	Traceable to
S017 Multi-Function Generator C170120	SCL-HKSAR
S240 Sound Level Calibrator 703741	NIM-PRC & SCL-HKSAR

The values given in this Calibration Certificate only relate to the values measured at the time of the test and any uncertainties quoted will not include allowance 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 measurement. Hong Kong Calibration Ltd, shall not be liable for any loss or damage resulting from the use of the equipment.

The test equipment used for calibration are traceable to International System of Units (SI), or by reference to a natural constant. The test results apply to the above Unit-Under-Test only

Ast	0
Calibrated by :	Approved by :
Elva Chong	Kin Wong
This Certificate is issued by: Hong Kong Calibration Ltd. Unit 88, 24/F., Well Fung Industrial Centre, No. 58-76, Ta Chuen Ping Street, Kw Tel: 2425 8801 Fax: 2425 8646	Date: 17-Jan-18 wai Chung, NT,Hong Kong.

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Certificate No. 800699

Page 2 of 4 Pages

Results :

1. Self-generated noise: 18.1 dBA

2. Acoustical signal test

	UUT Se	etting		
Range (dB)	Frequency Time Weighting Weighting		Applied Value (dB)	UUT Reading (dB)
40-120	A	F	94.0	94.0
	1000 A. S. A. A. A.	S		94.0
	C	F		94.0
	L	F		94.0
	AF	F	114.0	113.9
		S		113.9
	C	F		113.9
	L	F		113.9

IEC 61672 Type 1 Spec. : \pm 1.1 dB Uncertainty : \pm 0.1 dB

3 Electrical signal tests of frequency weightings (A weighting)

Frequency	Attenuation (dB)	IEC 61672 Type 1 Spec.
31.5 Hz	- 39.3	- 39.4 dB, ± 2 dB
63 Hz	- 26.3	- 26.2 dB, ± 1.5 dB
125 Hz	- 16.2	- 16.1 dB, ± 1.5 dB
250 Hz	- 8.7	- 8.6 dB, ±1 dB
500 Hz	- 3.3	- 3.2 dB, ±1.4 dB
1 kHz	0.0 (Ref)	0 dB, ± 1.1 dB
2 kHz	+ 1.2	$+$ 1.2 dB, \pm 1.6 dB
4 kHz	+ 0.9	$+$ 1.0 dB, \pm 1.6 dB
8 kHz	- 1.2	- 1.1 dB, + 2.1 dB ~ -3.1 dB
16 kHz	- 6.7	- 6.6 dB, + 3.5 dB ~ - 17.0 dB

Uncertainty : $\pm 0.1 \text{ dB}$



Certificate No. 800699

Page 3 of 4 Pages

4. Frequency & Time weightings at 1 kHz

4.1 Frequency Weighting (Fast)

UUT Setting	Applied Value (dB)	UUT Reading (dB)	Difference (dB)	IEC 61672 Type 1 Spec.
А	94.0	94.0 (Ref.)		± 0.4 dB
С	94.0	94.0	0.0	
L	94.0	93.9	-0.1	

4.2 Time Weighting (A-weighted)

UUT Setting	Applied Value (dB)	UUT Reading (dB)	Difference (dB)	IEC 61672 Type 1 Spec.
Fast	94.0	94.0 (Ref.)		± 0.3 dB
Slow	94.0	94.0	0.0]
Time-averaging	94.0	93.9	-0.1	

Uncertainty : ± 0.1 dB

5. Filter Characteristics

5.1 1/1 – Octave Filter

Frequency	Attenuation (dB)	IEC 61260 Class 1 Spec. (dB)
125 Hz	-63.9	<- 61
250 Hz	-44.9	<- 42
500 Hz	-21.1	< - 17.5
707 Hz	-3.8	- 2~- 5
1 kHz (Ref)		
1.414 kHz	-3.8	- 2 ~ - 5
2 kHz	-21.1	<- 17.5
4 kHz	-44.9	<- 42
8 kHz	-64.3	<- 61

Uncertainty : $\pm 0.25 \text{ dB}$



Certificate No. 800699

Page 4 of 4 Pages

5.2 1/3 – Octave Filter

Frequency	Attenuation (dB)	IEC 61260 Class 1 Spec.(dB)
326 Hz	-64.7	<- 61
530 Hz	-47.2	<- 42
772 Hz	-22.6	<- 17.5
891 Hz	-3.6	+ 0.3 ~ - 5.0
1 kHz (Ref)		
1.122 kHz	-3.6	+ 0.3 ~ - 5.0
1.296 kHz	-22.7	<- 17.5
1.887 kHz	-47.4	<- 42
3.070 kHz	-65.7	< - 61

Remarks : 1. UUT : Unit-Under-Test

2. The uncertainty claimed is for a confidence probability of not less than 95%.

3. Atmospheric Pressure : 1 028 hPa.

4. Preamplifier model : ZC 0030 , S/N : --

5. Firmware Version: 1.1.0

6. Power Supply Check: OK

7. The UUT was adjusted with the laboratory's sound calibrator at the reference sound pressure level before the calibration.

----- END -----

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Certificate No. 803788			Pag	Page 1 of 2 Pages		
Customer	: Arcadis Design & Engineer	ing Limited				
Address	20/F, AXA Tower, Landma	rk East, 100 How Mi	ng Street, Kwun To	ng, Kowloon,	Hong Kong.	
Order No.			Date of recei			
Item Teste	d					
Description	: Precision Acoustic Calibrat	or				
Manufacture	r : Larson Davis		I.D.	ž		
Model	: CAL200		Serial No.	: 10929)	
Test Cond	itions					
Date of Test	: 26-Apr-18		Supply Volta	ae :		
Ambient Tem	perature : (23 ± 3)°C		Relative Hun		25) %	
Test Speci	fications					
Calibration ch	eck.					
	nt/Procedure : IEC 60942, F20	, Z02.				
Test Resul	ts					
All results wor	e within the IEC 60942 Class	1 ano alfination				
	e shown in the attached page(
The recure up	e one with the attached page(5).				
Main Test equ	ipment used:					
Equipment No	Description	Cert. No.		Traceable	to	
S014	Spectrum Analyzer	707126			SCL-HKSAR	
S240	Sound Level Calibrator	803357			SCL-HKSAR	
S041	Universal Counter	802061		SCL-HKSA		
S206	Sound Level Meter	707129		SCL-HKSA	R	
The values given i	in this Calibration Certificate only rela	to to the values measure	d -4.46- 17-22 - File 2 - 24			
vill not include allo	owance for the equipment long term of	rift, variations with enviro	nmental changes, vibra	tion and shock d	uning transportation	
verioading, mis-r	nandling, or the capability of any other mage resulting from the use of the eq	laboratory to repeat the	measurement. Hong Ko	ong Calibration L	td. shall not be liable	
he test equipmen The test results ap	nt used for calibration are traceable to oply to the above Unit-Under-Test only	International System of	Units (SI), or by referen	ce to a natural co	onstant.	
10 MAR 1929 241				1		
	X9A			V/		
Calibrated by		A	pproved by :	SAN		
	Elva Chong			Kin Wong		
his Certificate is issued ong Kong Calibration L		D	ate: 26-Apr-18			
nit 8B. 24/F , Well Fung						

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Certificate No. 803788

Page 2 of 2 Pages

Results :

1. Generated Sound Pressure Level

UUT Nominal Value (dB)	Measured Value (dB)	IEC 60942 Class 1 Spec.	
94.0	93.7	± 0.4 dB	
114.0	113.8		

Uncertainty : ± 0.2 dB

 Short-term Level Fluctuation : 0.0 dB IEC 60942 Class 1 Spec. : ± 0.1 dB Uncertainty : ± 0.01 dB

3. Frequency

UUT Nominal Value (kHz)	Measured Value (kHz)	IEC 60942 Class 1 Spec.	
1	0.999	±1%	

Uncertainty : \pm 3.6 x 10⁻⁶

4. Total Distortion : < 0.4% IEC 60942 Class 1 Spec. : < 4 % Uncertainty : ± 2.3 % of reading

Remark : 1. UUT : Unit-Under-Test

- 2. The uncertainty claimed is for a confidence probability of not less than 95%.
- 3. Atmospheric Pressure : 1 015 hPa.

----- END -----

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APPENDIX J

SAMPLE DATA RECORD SHEET

Monitoring Location	on		4/F Roof top, K11		
Date of Monitoring				4 December 2018	
	No. Measurement Time (minutes)			Monitoring Results, ug/M ³ (Average (min-max))	
1-Hour TSP	1	09:07 – 10:07	60	66 (62-156)	
Monitoring	2	10:07 – 11:07	60	67 (63-164)	
	3	11:07 – 12:07	60	61 (54-228)	
Weather Conditio	n			Cloudy	
Equipment Model	(Serial N	Number)		TSI AM520 (5201707005)	
Expiry Date				12 November 2019	
Action Level, ug/M ³			250		
Limit Level, ug/M ³	3			500	
Major Constructio	on Dust S	ource(s) During Mo	nitoring	On-site excavation, filling, loading and un-loading of dusty materials	
Other Dust Sourc	e(s) Duri	ng Monitoring		Traffic, nearby fixed plant exhaust/emission	
Name & Des	signation		Date	Signature	
Record by: Wong Fu Nam 4 December 2018			0. Y		
Checked by: Tung Chi Sun			cember 2018	SUN	

Photo Records



C3840-13C MTRCL Tsim Sha Tsui Station

Carnarvon Road Subway and Entrances Modification Works

Monitoring Location	า		4/F Roof top, K11		
Date of Monitoring				11 December 2018	
	No. Measurement Time (minutes)			Monitoring Results, ug/M³ (Average (min-max))	
1-Hour TSP	1	09:09 – 10:09	60	57 (52-190)	
Monitoring	2	10:09 – 11:09	60	54 (46-137)	
	3	11:09 – 12:09	60	58 (49-379)	
Weather Condition				Cloudy	
Equipment Model (Serial Nu	umber)		TSI AM520 (5201707005)	
Expiry Date				12 November 2019	
Action Level, ug/M	3			250	
Limit Level, ug/M ³				500	
Major Construction	Dust So	urce(s) During M	onitoring	On-site excavation, filling, loading and un-loading of dusty materials	
Other Dust Source	(s) Durin	g Monitoring		Traffic, nearby fixed plant exhaust/emission	
<u>Name & Desi</u>	gnation		<u>Date</u>	<u>Signature</u>	
Record by: Wong Fu Nam 11 December 2018			Mr S		
Checked by: Tung Chi Sun		11 Dec	ember 2018	SUN	

Photo Records



Monitoring Location	on		4/F Roof top, K11		
Date of Monitoring	9		18 December 2018		
	No.	Measurement	t Time (minutes)	Monitoring Results, ug/M ³ (Average (min-max))	
1-Hour TSP	1	09:19 – 10:19	60	61 (56-156)	
Monitoring	2	10:19 – 11:19	60	62 (58-84)	
	3	11:19 – 12:19	60	62 (57-179)	
Weather Condition	n			Cloudy	
Equipment Model	(Serial N	lumber)		TSI AM520 (5201707005)	
Expiry Date				12 November 2019	
Action Level, ug/M	∕l ³			250	
Limit Level, ug/M ³	5			500	
Major Constructio	n Dust S	ource(s) During Mo	On-site excavation, filling, loading and un-loading of dusty materials		
Other Dust Source	e(s) Duri	ng Monitoring		Traffic, nearby fixed plant exhaust/emission	
Name & Des	signation		Date	Signature	
Record by: Wong	Record by: Wong Fu Nam 03 January 2019			S. P.	
Checked by: Tung Chi Sun 03 January 2019			SUN		
Photo Records		I			
Max 0.154 Max 0.154 Man 0.054 Man 0.064 Man 0.064 Man 0.064 Man 0.064 Man 0.064 Man 0.064 Man 0.064 Man 0.064 Man 0.054 Man 0.	02.01.2015	9 14:02	AAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAAA	the second	

Monitoring Locatio	n		4/F Roof top, K11		
Date of Monitoring	I	27 December 2018			
	No.	Measuremen	t Time (minutes)	Monitoring Results, ug/M ³ (Average (min-max))	
1-Hour TSP	1	08:03 - 09:03	60	52 (50-57)	
Monitoring	2	09:03 - 10:03	60	56 (50-269)	
	3	10:03 - 11:03	60	53 (49-191)	
Weather Condition	1			Cloudy	
Equipment Model	(Serial N	lumber)		TSI AM520 (5201707005)	
Expiry Date				12 November 2019	
Action Level, ug/M	l ³			250	
Limit Level, ug/M ³				500	
Major Constructior	n Dust S	ource(s) During Mc	pnitoring	On-site excavation, filling, loading and un-loading of dusty materials	
Other Dust Source	e(s) Duri	ng Monitoring		Traffic, nearby fixed plant exhaust/emission	
Name & Desi	ignation		Date	Signature	
Record by: Wong Fu Nam 03 January 2019			Mr Composition		
Checked by: Tung	Chi Sur	ı 03 Ji	SUN		
Photo Records					
TEST 42 Max 0.057 Min 0.050 Avg 0.052 THA 0.007 Thia 0.007 Time 1h	AM5	20 Marx Min Ayza Timo	Max 0.191 mg/m3 Max 0.491 mg/m3 0.049 mg/m3 0.007 mg/m3 0.007 mg/m3 1.h 1.m		

Monitoring Location		4/F Roof top, K11			
Date of Monitoring		04 December 2018			
Monitoring Start Time		09:07			
Monitoring Stop Time		09:37			
Measurement Time Length		30 mins			
Weather Condition		Cloudy			
Wind Speed		1.7 m/s			
Noise Meter Model (Serial Numbe	r)	BK-2238 (2448529)			
Calibrator Model (Serial Number)		CAL-200 (10929)			
	L _{eq}	71.3 dB(A)			
Measurement Results	L ₁₀	69.5 dB(A)			
-	L ₉₀	66.0 dB(A)			
Limit Level		75.0 dB(A)			
Major Construction Noise Source(s) During Monitoring		On-site powered mechanical equipment			
Other Noise Source(s) During Monitoring		Traffic and nearby fixed plant			
Name & Designation	Date	<u>Signature</u>			
Record by: Wong Fu Nam	04 December 2018	of the			
Checked by: Tung Chi Sun	04 December 2018	SUW			

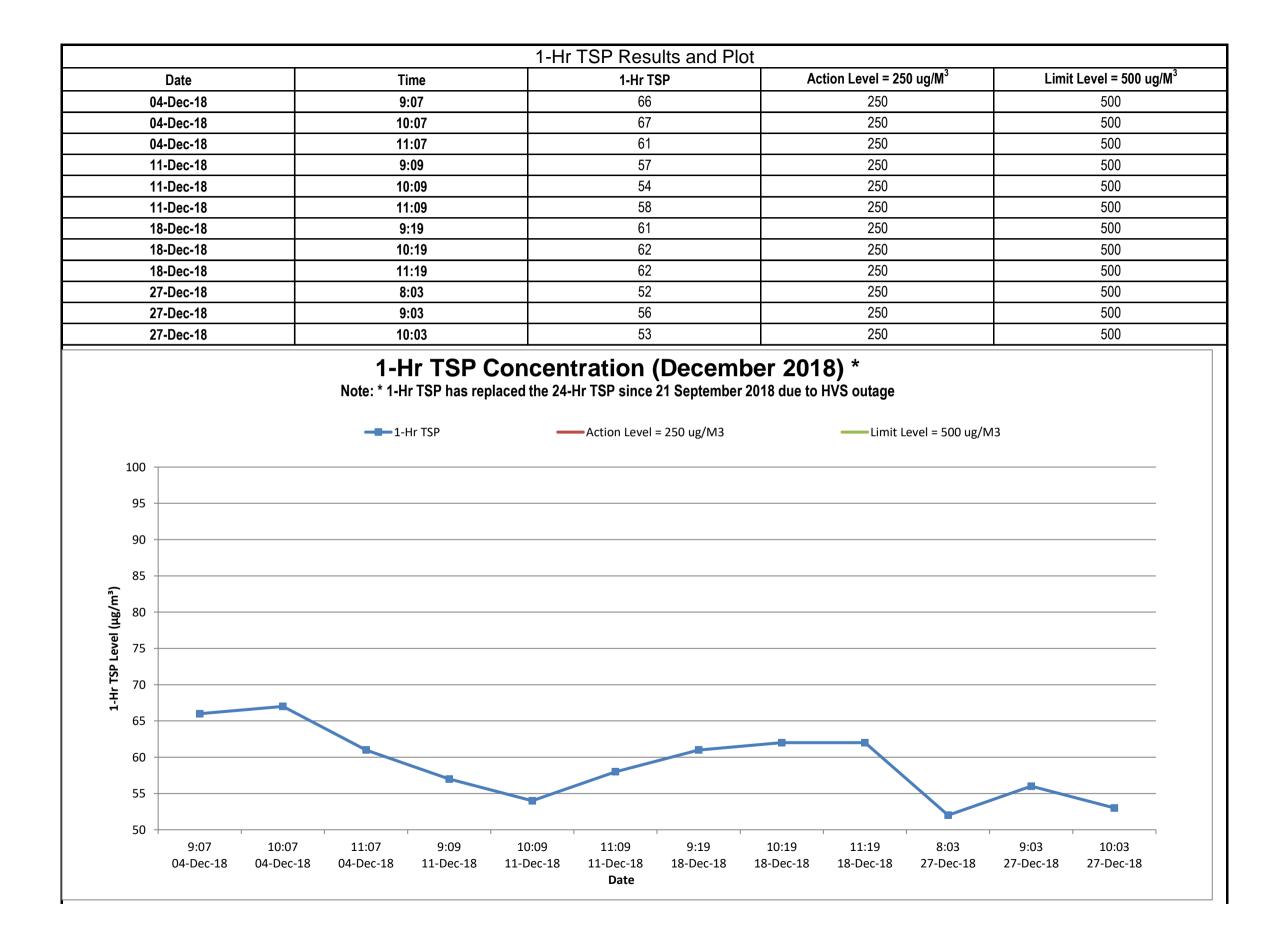
Monitoring Location		4/F Roof top, K11			
Date of Monitoring		11 December 2018			
Monitoring Start Time		09:09			
Monitoring Stop Time		09:39			
Measurement Time Length		30 mins			
Weather Condition		Cloudy			
Wind Speed		1.4 m/s			
Noise Meter Model (Serial Numbe	r)	BK-2238 (2448529)			
Calibrator Model (Serial Number)		CAL-200 (10929)			
	L _{eq}	70.5 dB(A)			
Measurement Results	L ₁₀	69.5 dB(A)			
-	L ₉₀	64.5 dB(A)			
Limit Level		75.0 dB(A)			
Major Construction Noise Source(s) During Monitoring		On-site powered mechanical equipment			
Other Noise Source(s) During Monitoring		Traffic and nearby fixed plant			
Name & Designation	Date	Signature			
Record by: Wong Fu Nam	11 December 2018	M Company			
Checked by: Tung Chi Sun	11 December 2018	SUN			

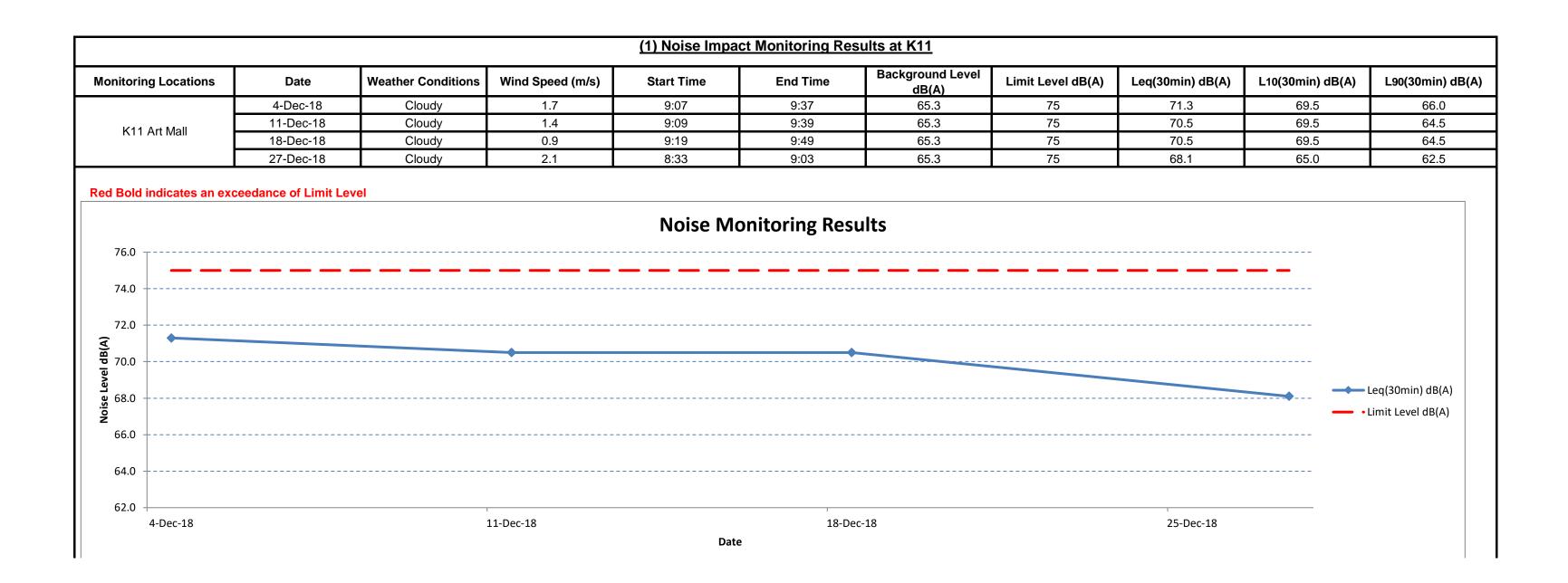
Monitoring Location		4/F Roof top, K11			
Date of Monitoring		18 December 2018			
Monitoring Start Time		09:19			
Monitoring Stop Time		09:49			
Measurement Time Length		30 mins			
Weather Condition		Cloudy			
Wind Speed		0.9 m/s			
Noise Meter Model (Serial Numbe	r)	BK-2238 (2448529)			
Calibrator Model (Serial Number)		CAL-200 (10929)			
	L _{eq}	70.5 dB(A)			
Measurement Results	L ₁₀	69.5 dB(A)			
	L ₉₀	64.5 dB(A)			
Limit Level		75.0 dB(A)			
Major Construction Noise Source	s) During Monitoring	N / A			
Other Noise Source(s) During Mor	nitoring	Traffic and nearby fixed plant			
Name & Designation	Date	<u>Signature</u>			
Record by: Wong Fu Nam	03 January 2018	and a			
Checked by: Tung Chi Sun	03 January 2018	SUN			

Monitoring Location		4/F Roof top, K11			
Date of Monitoring		27 December 2018			
Monitoring Start Time		08:33			
Monitoring Stop Time		09:03			
Measurement Time Length		30 mins			
Weather Condition		Cloudy			
Wind Speed		2.1 m/s			
Noise Meter Model (Serial Numbe	r)	BK-2238 (2448529)			
Calibrator Model (Serial Number)		CAL-200 (10929)			
	L _{eq}	68.1 dB(A)			
Measurement Results	L ₁₀	65.0 dB(A)			
	L ₉₀	62.5 dB(A)			
Limit Level		75.0 dB(A)			
Major Construction Noise Source	s) During Monitoring	N / A			
Other Noise Source(s) During Mor	nitoring	Traffic and nearby fixed plant			
Name & Designation	Date	<u>Signature</u>			
Record by: Wong Fu Nam	03 January 2018	M Composition			
Checked by: Tung Chi Sun	03 January 2018	SUN			

APPENDIX K

MONITORING RESULTS AND PLOTS



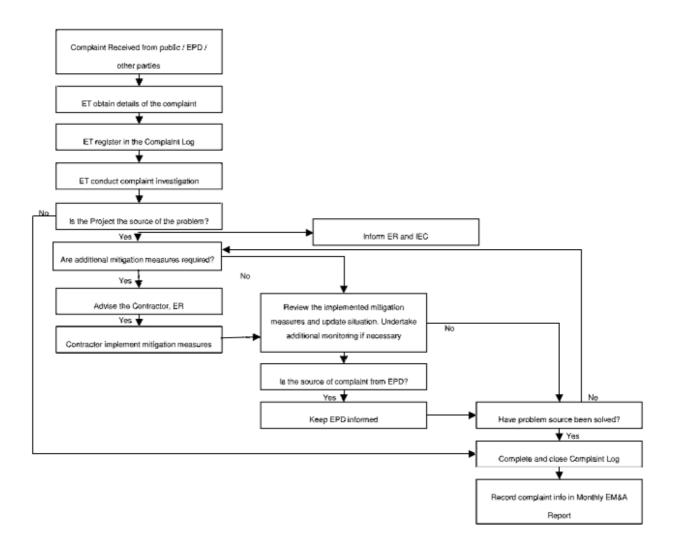


APPENDIX L

FLOW CHAT FOR HANDLING ENVIRONMENTAL COMPLAINTS

APPENDIX L

Complaint Response Procedure



APPENDIX M

WASTE MANAGEMENT RECORDS

Monthly Summary Waste Flow Table for 2018 (year)

Contract No:C3840-13C Tsim Sha Tsui Station Carnarvon Road SubwayDate Reported:2-January-2019

	Actual Quantities of Inert C&D Materials Generated Monthly					Actual Quantities of Non-inert C&D Wastes Generated Monthly					
Month	Total Quantity Generated	Hard Rocks and Large Broken Concrete	Reused in the Contract	Reused in other Projects	Disposed as Public Fill	Imported Fill	Metals	Paper/ cardboard packaging	Plastics	Chemical Waste	Others, e.g. general refuse
		(See Note 3)							(see Note 2)		
	(in '000m ³)	(in '000m ³)	(in '000m ³)	(in '000m ³)	(in '000m ³)	(in '000m ³)	(in '000kg)	(in '000kg)	(in '000kg)	(in'000kg)	(in '000m3/tonne)
Carried from Project Start	9.6228	-	-	-	9.6228	-	-	-	-	-	0.1930
Jan	0.0212	-	-	-	0.0212	-	-	-	-	-	0.0198
Feb	0.0033	-	-	-	0.0033	-	-	-	-	-	0.0090
Mar	0.0072	-	-	-	0.0072	-	-	-	-	-	0.0089
Apr	0.0024	-	-	-	0.0024	-	-	-	-	-	0.0048
May	0.0022	-	-	-	0.0022	-	-	-	-	-	0.0065
June	0.0000	-	-	-	0.0000	-	-	-	-	-	0.0192
Sub-total	0.0363	-	-	-	0.0363	-	-	-	-	-	0.0682
July	0.0540	-	-	-	0.0540	-	-	-	-	-	0.0081
Aug	0.0410	-	-	-	0.0410	-	-	-	-	-	0.0092
Sept	0.0057	-	-	-	0.0057	-	225.1300	-	-	-	0.0077
Oct	0.0235	-	-	-	0.0235	-	41.6400	-	-	-	0.0084
Nov	0.0216	-	-	-	0.0216	-	-	-	-	-	0.0069
Dec	0.0272	-	-	-	0.0272	-	26.8600	-	-	-	0.0099
Total	0.2093	-	-	-	0.2093	-	293.6300	-	-	-	0.1184
Acc. Total	9.8321 (accumulated quantity of the project = carried amount + this year amount)									0.3114	

Notes:

- (1) The performance targets are given below:
 - All excavated materials to be sorted for recovering the inert portion of C&D materials, e.g. hard rocks, soil and broken concrete, for reuse on the Site or disposal to designated outlets;
 - All metallic waste to be recovered for collection by recycling contractors;
 - All cardboard and paper packaging (for plant, equipment and materials) to be recovered, properly stockpiled in dry and covered condition to prevent cross contamination;
 - All chemical wastes to be collected and properly disposed of by specialist contractors; and
 - All demolition debris to be stored to recover broken concrete, reinforcement bars, mechanical and electrical fittings, hardware as well as other fitting / materials that have established recycling outlets.
- (2) Plastics refer to plastic bottles/containers, plastic sheets/foam from packaging material.
- (3) Broken concrete for recycling into aggregates.
- (4) The waste flow table shall also include C&D materials that are specified in the Contract to be imported for use at the Site.