東業德勤測試顧問有限公司
ETS-TESTCONSULT LIMITED
8/F., Block B, Veristrong Industrial Centre, 34-36 Au Pui Wan Street, Fotan, Hong Kong
Tel : 2695 8318 E-mail : etl@ets-testconsult.com
Fax : 2695 3944 Web site : www.ets-testconsult.com

CHINA INTERNATIONAL WATER & ELECTRIC CORP

CONTRACT NO.: SS Y307 – CONSTRUCTION OF A SECONDARY BOUNDARY FENCE AND NEW SECTIONS OF PRIMARY BOUNDARY FENCE AND BOUNDARY PATROL ROAD (PHASE 2)

MONTHLY EM&A REPORT NO.18

(JULY 2014)

Prepared by: _____
LAW, Sau Yee
Senior Environmental Officer

Checked by: _____
LAU, Chi Leung
Environmental Team Leader

Issued Date: 09 August 2014 *Report No.: ENA41349*

ENVIRON

Ref.: ASDBFBPREM00_0_0581L.14

11 August 2014

Mott MacDonald Hong Kong Limited
20/F Two Landmark East,
100 How Ming Street,
Kwun Tong,
Hong Kong

By Fax (2827 1823) and Post

Attention: Mr. James Kam / Mr. F. Y. Wong

Dear Sirs,

Re: Environmental Permit No. EP-347/2009/A and FEP-05/347/2009/A
Contract No. SSY307 - Section 3
Construction of a Secondary Boundary Fence and New Section of Primary Boundary Fence and Boundary Patrol Road (Phase 2)
Monthly EM&A Report No. 18 for July 2014 (01 – 31 July 2014)

Reference is made to the Environmental Team's submission of the draft Monthly EM&A Report No. 18 for July 2014 by e-mail on 9 August 2014.

We are pleased to inform you that we have no adverse comments on the captioned report received on 9 August 2014. We write to verify that the captioned submission in accordance with Condition 4.5 of EP-347/2009/A and FEP-05/347/2009/A.

Thank you for your attention and please feel free to contact the undersigned should you have any queries.

Yours faithfully,

David Yeung
Independent Environmental Checker

c.c.	ArchSD	Attn.: Mr. W. K. Yiu (CPM203) / Mr. Laurence Kwan (SPM225)	Fax: 2810 5372
	MMHK (Site)	Attn.: Mr. Peter Tsang	Fax: 2683 1195
	CWE	Attn.: Mr. Chris Chan	Fax: 2670 6658
	ETS	Attn.: Mr. C. L. Lau	Fax: 2695 3944

Z:\Projects\ASDBFBPREM00\Corr\ASDBFBPREM00_0_0581L.14.doc

ENVIRON Hong Kong Limited 英環香港有限公司
Room 2403, 24/F., Jubilee Centre, 18 Fenwick Street, Wanchai, Hong Kong Tel: 852.3465 2888 Fax: 852.3465 2899
www.environcorp.com

TABLE OF CONTENTS

FIGURE

TABLES

EXECUTIVE SUMMARY

Under the requirements of "Environmental Monitoring & Audit Manual (Final) – Construction of Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road" (the EM&A Manual), impact environmental monitoring and audit is required to be implemented for the "Contract No.: SS Y307 – Construction of Secondary Boundary Fence and New Section of Primary Boundary Fence and Boundary Patrol Road (Phase 2)" (the Project).

This monthly Environmental Monitoring and Audit (EM&A) report No.18 was prepared by ETS-Testconsult Ltd (ET) for the Project. This report documented the findings of EM&A Works conducted during the Project in July 2014.

Site Activities

As informed by the Contractor, site activities were carried out in this reporting month:

- *Foundation;*
- *Concrete works;*
- *Metal works;*
- *Backfilling works; and*
- *Installation of metal works.*

Environmental Monitoring Progress

The summary of the monitoring activities in this monitoring month is listed below:

- *Day-time Noise Monitoring (0700-1900 on normal weekday): 5 Occasions at LW02, MW02, WL01(R) and WL03*
- *Weekly-site inspection: 5 Occasions*

Noise Monitoring

No exceedance of Action and Limit Level of noise monitoring was recorded in this reporting month.

Site Inspection

Environmental site inspections conducted in this reporting month are presented as follows:

Concerned Parties	*Dates of Audit / Inspection*
ET Weekly site inspection	*02, 09, 16, 23, 30 July 2014*
Monthly Joint site inspection	*23 July 2014*

In general, performance on environmental mitigation measures implemented was found to be satisfactory in this reporting month. The major findings observed during site inspections are presented in Section 5.0.

Environmental Complaints, Notification of summons and successful prosecutions

No complaint, notification of summons and prosecution with respect to environmental issues was received in this reporting month.

Change in Environmental Aspect in this Reporting Month

No change on environmental aspect was reported in this reporting month.

Future Key Issues

Based on the forecast of site works in the coming month, key issues to be considered are as follows:

- *Noise impact due to construction works;*
- *Maintain good site practice to minimize environmental impacts at the site.*

1.0 INTRODUCTION

China International Water & Electric Corp. (CWE) has appointed Environmental Team of ETS-Testconsult Limited (ETL) to undertake the Environmental Impact Monitoring for "Contract No.: SS Y307 – Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)" (the Project) under the requirements of "Environmental Monitoring & Audit Manual (Final) – Construction of Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road" (the EM&A Manual) and "the Further Environmental Permit No. FEP-05/347/2009/A - Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road" (the FEP).

This report documented the findings of EM&A Works conducted in July 2014.

2.0 PROJECT INFORMATION

2.1 Project Background

ASD Contract SS Y307 namely "The Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)" to be executed comprise the following works generally along the boundary from Ng Tung River to Ping Yuen River (Section 3A) and from Pak Fu Shan to Lin Ma Hang (Section 3C):

- Construction of secondary boundary fence along the existing boundary patrol road completed with vehicular and pedestrian gate;
- Construction of new bituminous boundary patrol road to the northwest of Lin Ma Hang;
- Construction of primary boundary fence along the northern side of the new boundary patrol road and secondary boundary fence along the southern side of the new boundary patrol road complete with electrical and manual vehicular and pedestrian gates;
- Provision of security lighting posts and luminaries along the boundary patrol road together with associated power supply installation including pillar boxes, electrical cables, power distribution system and the like;
- Reinstatement and modification of existing bituminous road;
- Associated landscaping works including tree felling, transplanting existing trees and provision of ground cover;
- Provision of drainage system along the new boundary patrol road and modification of existing catchpits, box culverts and the like;
- Provision of builder's works in a subsequent installation of CCTV system and Fence Protection System carried out by the Hong Kong Police Force (HKPF);
- Erection of frontier closed area warning signages;
- Demolition works to be executed comprise the following works generally along the existing boundary fence from Lok Ma Chau Control Point to Sha Tau Kok:
  - Demolition of original primary boundary fence and associated facilities to the south of Lok Ma Chau Loop and Hoo Hok Wai;
  - Demolition of existing police posts and the associated facilities;
  - Demolition of existing FCA warning signs;
  - Demolition of exiting check points at Lok Ma Chau and Shek Chung Au.

Surrounding the construction site, there are village houses at Mai Po, Ma Tso Lung, Lo Wu, Muk Wu Chuen Yiu, Chuk Yuen, Wang Lek and Sha Tau Kok, which are considered as noise sensitive receivers of this Project.

Areas of the Project present in Appendix G. Locations of environmental monitoring stations is shown in Figure 1.

2.2 Work Programme

Details of work programme are shown in Appendix D.

2.3 Project Organization

Organization chart with respect to the on-site environmental management is shown in Appendix A.

2.4 Contact Details of Key Personnel

The key personnel contact names and telephone numbers are shown in Table 2.1.

Table 2.1 Contact Details of Key Personnel

Project Role	*Organization*	*Name of Key Staff*	*Tel. No.*	*Fax No.*
Engineer's Representative	*Mott MacDonald*	*Mr. James Kam* *Mr. F. Y. Wong*	*2828 5757*	*2827 1823*
IEC	*ENVIRON*	*Mr David Yeung*	*3465 2888*	*3465 2899*
Contractor's Agent	*CWE*	*Mr. Chris Chan*	*5646 5790*	*2508 0987*
ET Leader	*ET (ETL)*	*Mr C. L. Lau*	*2946 7791*	*2695 3944*

3.0 WORK PROGRESS IN THIS REPORTING MONTH

As informed by the Contractor, site activity was carried out in the reporting month:

- *Foundation;*
- *Concrete works;*
- *Metal works;*
- *Backfilling works; and*
- *Installation of metal works.*

4.0 IMPACT NOISE MONITORING

4.1 Monitoring Requirements

As the requirement in the EM&A Manual, impact noise monitoring was conducted for a weekly basis at designated monitoring locations.

4.2 Monitoring Equipment

Integrating Sound Level Meters used for impact noise monitoring were Type 1 sound level meters capable of giving a continuous readout of the noise level reading including equivalent continuous sound pressure level (L_{eq}) and percentile sound pressure level (Lx). They complied with International Electro technical Commission Publications 651:1979 (Type1) and 804:1985 (Type1).

Table 4.1 summarized the noise monitoring equipment model used during the impact monitoring. Copies of calibration certificates and calibration summary for noise meters and calibrators used are attached in Appendix B1.

Table 4.1 Noise Monitoring Equipment

Equipment	*Model*
Sound Level Meter	*Rion NL-31*
Sound Level Calibrator	*Rion NC-73*

4.3 Monitoring Parameters, Duration and Frequency

Impact noise monitoring for the A-weighted levels L_{eq}, L_{10} and L_{90} were recorded once per week. Data obtained from impact noise monitoring was processed and presented as below:

- *Daytime: three sets of 30-minute noise level monitored between 0700-1900 hrs on normal weekdays;*
- *Evening-time*: three sets of 5-minute noise level monitored between 1900-2300 hrs ;*
- *Night-time*: three sets of 5-minute noise level monitored between 2300-0700 hrs of next day; and*
- *Holiday*: three sets of 5-minute noise level monitored between 0700-1900 hrs on holiday.*

(*): Noise monitoring to be conducted only when there is construction work.

4.4 Monitoring Locations

There was eight noise monitoring stations, VH01, VH03, MTL01, LW02, MW02, WL01(R), WL03 and STK05, were required to perform impact noise monitoring during the construction phase.

The detail of noise monitoring locations is summarized in Table 4.2.

Table 4.2 Details of Noise Monitoring Stations

Noise Monitoring Station	*Description*	*Section*	*Type of Measurement*
VH01	*Village House at Mai Po*	*Section 1*	*Façade*
VH03	*Village House at Mai Po*	*Section 1*	*Façade*
MTL01	*Village House at Ma Tso Lung*	*Section 2*	*Façade*
LW02	*House No.39 at Lo Wu*	*Section 3A*	*Free Field **
MW02	*House No.11, Muk Wu Chuen Yiu*	*Section 3A*	*Free Field **
WL01(R)	*Village House at Wang Lek*	*Section 3C*	*Free Field **
WL03	*Village House at Wang Lek*	*Section 3C*	*Free Field **
STK05	*Village House at Sha Tau Kok*	*Section 4*	*Free Field **

Remark (*): The monitoring stations LW02, MW02, WL01(R), WL03 and STK05 are all free-field located outside the premises of the nearby NSRs since they are enclosed areas and not willing to be entered. 3 dB(A) correction had been added to the results if noise measurement was free-field.

In this reporting month, the major construction works were carried out at Section 3A and therefore the impact noise monitoring was implemented at LW02 and MW02. Since minor site works, such as site preparation and site clearance work, were carried out at Section 3C in this reporting month, noise monitoring performed at WL01(R) and WL03 were used as reference. No noise monitoring was required at MTL01 at Section 2 in this reporting month since no construction work was undertaken in this reporting month.

4.5 Monitoring Methodology

Instrumentation

Integrating Sound Level Meters were employed for noise monitoring.

Operation/Analysis Procedures

- Sound Level Meter was set on a tripod at a height of 1.2m above the ground;
- For free field measurement, the meter was positioned away from any nearby reflective surfaces.
- The battery condition was checked to ensure the correct functioning of the meter:
- Parameters such as frequency weighting, the time weighting and the measurement time were set as follows:
  - Frequency weighting : A
  - Time weighting : Fast
  - Time measurement : 30 mins
- Prior to and after each noise measurement, the meter was calibrated using a Calibrator for 94 dB at 1000HZ. If the difference in the calibration level before and after measurement was more than 1.0 dB(A), the measurement would be considered invalid and repeat measurement would be required after re-calibration or repair of the equipment;
- During the monitoring period, the L_{eq}, L_{10} and L_{90} were recorded. In addition, site conditions and noise sources were recorded on a standard record sheet;
- 3dB(A) correction had been added to the results if noise measurements were free-field; and
- Noise monitoring would be cancelled in the presence of fog, rain, storm, wind with a steady speed exceeding 5m/s, or wind gusts exceeding 10m/s.

Maintenance and Calibration

- The microphone head of the sound level meter and calibrator are cleaned with soft cloth at quarterly intervals; and
- The meters are sent to supplier or HOKLAS laboratory to check and calibrated at yearly intervals.

4.6 Actions and Limit Levels

The Action and Limit Levels (AL Levels) were established in accordance to the Table 4.3 of the EM&A Manual. Table 4.4 presents the AL levels for noise monitoring.

Table 4.3 Action and Limit Levels for Noise Monitoring

Time Period	Action	Limit
0700 –1900 hrs on normal weekday (Day-time)	When one documented complaint is received	75 dB(A) *
1900-2300 hrs (Evening-time)		70 dB(A)
0700-1900 hrs on Holiday (Holiday-time)		70 dB(A)
Restricted hours (2300-0700 hrs of next day) (Night-time)		55 dB(A)

* reduce to 70dB(A) for school and 65dB(A) during school examination periods

4.7 Event-Action Plans

Should the results of the monitoring parameters at any designated monitoring stations indicate that the noise level criteria are exceeded, the actions in accordance with the Event and Action Plan that summarized in Appendix C should be carried out.

4.8 Results

5 occasions of Day-time noise monitoring at noise monitoring stations, LW02, MW02, WL01(R) and WL03 were carried out at this reporting month.

No Day-time noise monitoring results at all monitoring stations exceeded the Action Level since no documented complaints on noise issue were received during the reporting period. Besides, no exceedances in Limit Level were recorded according to the results from Day-time noise monitoring. Table 4.4 summaries the noise daytime monitoring results in the reporting period.

Table 4.4 Summary of Impact Noise Monitoring Results

Monitoring Parameter	Date	LW02		MW02		WL01(R)		WL03	
		Result	Exceed*	Result	Exceed*	Result	Exceed*	Result	Exceed*
Daytime	02/07/14	58.2	X	47.7	X	47.3	X	46.3	X
	09/07/14	57.2	X	48.2	X	47.5	X	46.2	X
	16/07/14	56.4	X	47.7	X	46.9	X	45.7	X
	23/07/14	57.7	X	48.4	X	46.8	X	46.0	X
	30/07/14	56.0	X	48.4	X	47.7	X	47.0	X

Remark (*): L = Limit Level Exceedance, A = Action Level Exceedance and X = not an Exceedance

5.0 SITE ENVIRONMENTAL AUDIT

During this reporting month, weekly site inspections were undertaken on 02, 09, 16, 23 and 30 July 2014 by ET. Monthly joint site inspection at 23 July 2014 was carried out by IEC, CWE and ET. A summary of implementation status of mitigation measures on site inspections is presented in Appendix F.

5.1 Summary of the ET weekly site inspection findings

According to the summary of the ET weekly site inspections carried out in July 2014, it indicated that site practices of the Contractor were generally undertaken in an environmentally acceptable manner and the overall site environmental performance was satisfactory. Summaries of key findings of weekly ET site inspections in this month are described in Table 5.1.

Table 5.1 Key Findings of Weekly ET Site Inspections in this reporting month

Date	Key Findings	Action(s) Taken recommended by ET	Action(s) Taken by the Contractor during the site audit	Rectification Status by ET
02 July 2014	Oil drum without drip tray was observed in New Road site. (Previous item)	The Contractor was reminded to provide drip tray for the oil drum.	Oil drum without drip tray observed in New Road site was removed.	Closed
	Rubbish was observed near Fence No. 207 in Pak Fu Shan site. (Previous item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	Rubbish observed near Fence No. 207 in Pak Fu Shan site was collected.	Closed
	Rubbish was observed near the middle section in New Road site. (New item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	---	Follow-up
	Rubbish was observed near Gate No. 206 in Pak Fu Shan site. (New item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	---	Follow-up
09 July 2014	Rubbish was observed near the middle section in New Road site. (Previous item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	Oil drum without drip tray observed in New Road site was removed.	Closed
	Rubbish was observed near Gate No. 206 in Pak Fu Shan site. (Previous item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	Rubbish observed near Fence No. 207 in Pak Fu Shan site was collected.	Closed
	Oil drum without drip tray was observed near the middle section in New Road site. (New item)	The Contractor was reminded to provide drip tray for the oil drum.	---	Follow-up
	Rubbish was observed in Lo Wu site. (New item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	---	Follow-up
	Stagnant water was observed near Gate No. 76 in Lo Wu site. (New item)	The Contractor was reminded to drain down the stagnant water or add mosquito oil on the water to avoid breeding of mosquitoes.	---	Follow-up
16 July 2014	Oil drum without drip tray was observed near the middle section in New Road site. (Previous item)	The Contractor was reminded to provide drip tray for the oil drum.	Oil drum without drip tray observed near the middle section in New Road site was removed.	Closed
	Rubbish was observed in Lo Wu site. (Previous item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	Rubbish observed in Lo Wu site was collected.	Closed
	Stagnant water was observed near Gate No. 76 in Lo Wu site. (Previous item)	The Contractor was reminded to drain down the stagnant water or add mosquito oil on the water to avoid breeding of mosquitoes.	Mosquito oil was added into the stagnant water observed near Gate No. 76 in Lo Wu site.	Closed
	Dusty road surface was observed in New Road site. (New item)	The Contractor was reminded to spray water to the work site regularly.	---	Follow-up
	Dusty road surface was observed in Pak Fu Shan site. (New item)	The Contractor was reminded to spray water to the work site regularly.	---	Follow-up
	Rubbish was observed near Fence No. 206 in Pak Fu Shan site. (New item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	---	Follow-up

Date	Key Findings	Action(s) Taken recommended by ET	Action(s) Taken by the Contractor during the site audit	Rectification Status by ET
23 July 2014	Dusty road surface was observed in New Road site. (Previous item)	The Contractor was reminded to spray water to the work site regularly.	Dusty road surface was sprayed with water near the middle section in New Road site.	Closed
	Dusty road surface was observed in Pak Fu Shan site. (Previous item)	The Contractor was reminded to spray water to the work site regularly.	Dusty road surface was sprayed with water in Pak Fu Shan site.	Closed
	Rubbish was observed near Fence No. 206 in Pak Fu Shan site. (Previous item)	The Contractor was reminded to collect rubbish regularly to keep good site practices.	Rubbish observed near Fence No. 206 in Pak Fu Shan site was collected.	Closed
30 July 2014	No new item was observed during the site inspection and audit.			

5.2 Recommendations on site inspection findings in Site Inspections of this month

Based on the site inspection findings, the recommendations are as below:

- *Minimize noise impact due to construction works;*
- *Clean the access road regularly;*
- *Cover or water the stockpile;*
- *Checking and maintaining all the site machines to prevent black smoke emission;*
- *Providing briefing to the concerned site staff on remedial actions, such as handling method of chemicals and chemical waste;*
- *Implement all necessary preventive measures to avoid oil leakage. In the event an oil leakage happens, the Contractor should properly remove the leaked oil and handle the contaminated soil and all materials using for this cleaning works as chemical waste;*
- *Maintain good waste management at the site*
- *Remove all stagnant water; and*
- *Apply proper treatment facilities to wastewater before discharge.*

6.0 STATUS OF ENVIRONMENTAL PERMITS

Permits/licenses valid in this reporting month are summarized in Table 6.1.

Table 6.1 Summary of Environmental Licensing and Permit valid in this reporting month

Description	Permit No.	Valid Period		Concerned Locations
		From	To	
Environmental Permit	FEP-05/347/2009/A	10/08/12	End of Project	Section 3 – from Ng Tung River to Ping Yuen River and from Pak Fu Shan to Lin Ma Hang
Wastewater Discharge Licence	W5/1G43/1	09/10/12	31/10/17	Section 3A and Section 3C (Effluent arising from Construction site Sedimentation Tank(s) and other necessary treatment facilities)
Chemical Waste Producer	5213-641-C1206-09	09/10/12	End of Project	Section 3A and Section 3C (Spent Paints, Spent Diesel and Spent Lubricating Oil)
Notification under APCO	Application had been submitted to EPD on 28/08/12 and approved from 30/08/12.			
Notification under WCO	Application had been submitted to EPD on 28/08/12 and approved from 30/08/12.			

7.0 WASTE MANAGEMENT

7.1 Monthly Waste Summary

The quantities of waste generated from the Project in this month are summarized in Table 7.1 and monthly summary waste flow table present in Appendix H.

Table 7.1 Summary of Quantities of Waste generated in this reporting month

Type of Waste		*Quantity*	*Cumulative Quantity from February 2013*
Inert C&D Materials	*Total Quantity Generated (in '000m^3)*	*0*	*0.238*
	Hard Rocks and Large Broken Concrete (in '000m^3)	*0*	*0.03*
	Reused in the Contract (in '000m^3)	*0*	*0*
	Reused in other Projects (in '000m^3)	*0*	*0*
	Disposal as Public Fill (in '000m^3)	*0*	*0.208*
	Imported Fill (in '000m^3)	*0*	*1.842*
C&D Waste	*Metals (in '000kg)*	*0*	*0.02*
	Paper/Cardboard Packaging (in '000kg)	*0*	*0.140*
	Plastics (in '000kg)	*0*	*0*
	Chemical Waste (in '000kg)	*0*	*0.1*
	Other, e.g. General Refuse (in '000m^3)	*0*	*0.9945*

7.2 Advice on the Solid and Liquid Waste Management Status

The Contractor should provide sufficient preventive measures during equipment maintenance works so as to avoid oil leakage on the ground. In the event of any oil leakage, the Contractor should clean up the polluted soil and handle all the materials used for this cleaning works as chemical waste.

Besides, pre-cast drip trays were provided for oil drums at several areas, such as generator and chemical storage area. The Contractor should collect and dispose of any stagnant water accumulated in the drip trays and handle them as chemical waste.

The Contractor should use suitable containers with proper labels to store chemical wastes in accordance with Code of Practice on the Packaging, Labeling and Storage of Chemical Waste. The Contractor should also advise their workers of the proper procedures in handling the chemical waste.

All the trip tickets for chemical waste disposal were properly kept in the site office. No chemical waste disposal was undertaken in the reporting month.

The Contractor was reminded to increase the frequency of inspection and cleaning of the site drainage system, including desilting facilities. Moreover, the Contractor should apply approved pesticides in the stagnant water.

8.0 ENVIRONMENTAL NON-CONFORMANCE

8.1 Summary of Non-Conformance

No exceedance of Action and Limit Level of noise monitoring was recorded in this reporting month.

8.2 Summary of Environmental Complaints

No complaint was received in this reporting month.

8.3 Summary of Notification of Summons and Prosecution

There was no notification of summons respect to environmental issues registered in this month.

9.0 IMPLEMENTATION STATUS

9.1 Implementation Status of Environmental Mitigation Measures

An updated summary of the Environmental Mitigation Implementation Schedule (EMIS) is presented in Appendix F. Most of the necessary mitigation measures were implemented properly. Any deficiencies were noted in the remarks of the schedule.

9.2 Implementation Status of Event and Action Plan

No exceedance of Action and Limit Level of noise monitoring was recorded in this reporting month. Hence, no further action was required.

9.3 Implementation Status of Environmental Complaint, Notifications of Summons and Successful Prosecutions Handling

No complaint, notification of summons and successful prosecution were received in this reporting month. A summary of environmental complaints, notifications of summons and successful prosecutions was given in Table 9.1.

Table 9.1 Summary of Environmental Complaints and Prosecutions

Complaints logged		*Summons served*		*Successful prosecution received*	
July 2014	*Overall Cumulative from February 2013*	*July 2014*	*Overall Cumulative from February 2013*	*July 2014*	*Overall Cumulative from February 2013*
0	*0*	*0*	*0*	*0*	*0*

10.0 COMMENTS, CONCLUSIONS AND RECOMMENDATIONS

Comments and Conclusions

Impact noise monitoring was carried out at designated locations in accordance with the EM&A Manual in this reporting month.

No exceedance of Action and Limit Level of impact noise monitoring was recorded in this reporting month.

According to the ET weekly site inspections carried out in this reporting month, the Contractor generally implemented sufficient environmental mitigation measures.

No complaint, prosecution or notification of summon was received in this reporting month.

Recommendations

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

Air Quality
- Ensure the frequency of water spraying on unloading areas and stockpiles to be sufficient to suppress the dust sources;
- Provide proper maintenance for the powered mechanical equipment and barges to avoid emission of dark smoke; and
- Implement the dust mitigation measures for the site activities.

Noise
- Conduct noisy activities at a farther location from the NSRs.

Water Quality
- Provide proper treatment for the wastewater discharge; and
- Remove the stagnant water or provide approved pesticides for the stagnant water, if any.

Chemical and Waste Management

- Remove waste materials from the site to avoid accumulation regularly;
- Handle and store chemical wastes properly;
- Remove unwanted material in the existing stockpiles and avoid further dumping of such material;
- Provide and maintain sufficient drip trays for diesel drums, chemical containers, chemical waste storage drums and diesel operated generator set; and
- Maintain good housekeeping at the works area..

11.0 FUTURE KEY ISSUES

11.1 Work Programme for the Coming Month

As informed by the Contractor, site activities proposed to be carried out in the coming month:

- *Foundation;*
- *Concrete works;*
- *Metal works;*
- *Backfilling works; and*
- *Installation of metal works.*

11.2 Key Issues for the Coming Month

Key issues to be considered in the coming month include:

- *Minimize noise impact due to construction works;*
- *Clean the access road regularly;*
- *Cover or water the stockpile;*
- *Checking and maintaining all the site machines to prevent black smoke emission;*
- *Providing briefing to the concerned site staff on remedial actions, such as handling method of chemicals and chemical waste;*
- *Implement all necessary preventive measures to avoid oil leakage. In the event an oil leakage happens, the Contractor should properly remove the leaked oil and handle the contaminated soil and all materials using for this cleaning works as chemical waste;*
- *Maintain good waste management at the site*
- *Remove all stagnant water; and*
- *Apply proper treatment facilities to wastewater before discharge.*

Mitigation measures to be required in the coming month:

Air Quality Impact

- To ensure implementation of the dust mitigation measures for the site activities;
- To provide proper maintenance for vehicles and machines on site; and
- To investigate any other dust sources around the air sensitive receivers

Noise

- To switch off equipment if not in use;
- To operate silent equipment; and
- To re-schedule the work activities in the event of valid noise exceedance.

Water Quality Impact

- To maintain the drainage system;
- To provide covers for the drip trays to avoid stagnant water due to rainfall;
- To provide proper treatment for wastewater from the area; and
- To avoid any stagnant water or provide insecticide to avoid mosquito breeding.

Chemical and Waste Management

- To remove waste from the site regularly;
- To properly store and handle chemical wastes on site;
- To provide and manage sufficiently sized drip trays for diesel drums or chemical containers;
- To maintain proper housekeeping;
- To remove the oil stains in the event of leakage and handle all materials using for this cleaning works as chemical waste; and
- To identify C&D material by packaging, labeling, storage, transportation and disposal in accordance with statutory regulations.

- END OF REPORT -

Appendix A

Organization Chart

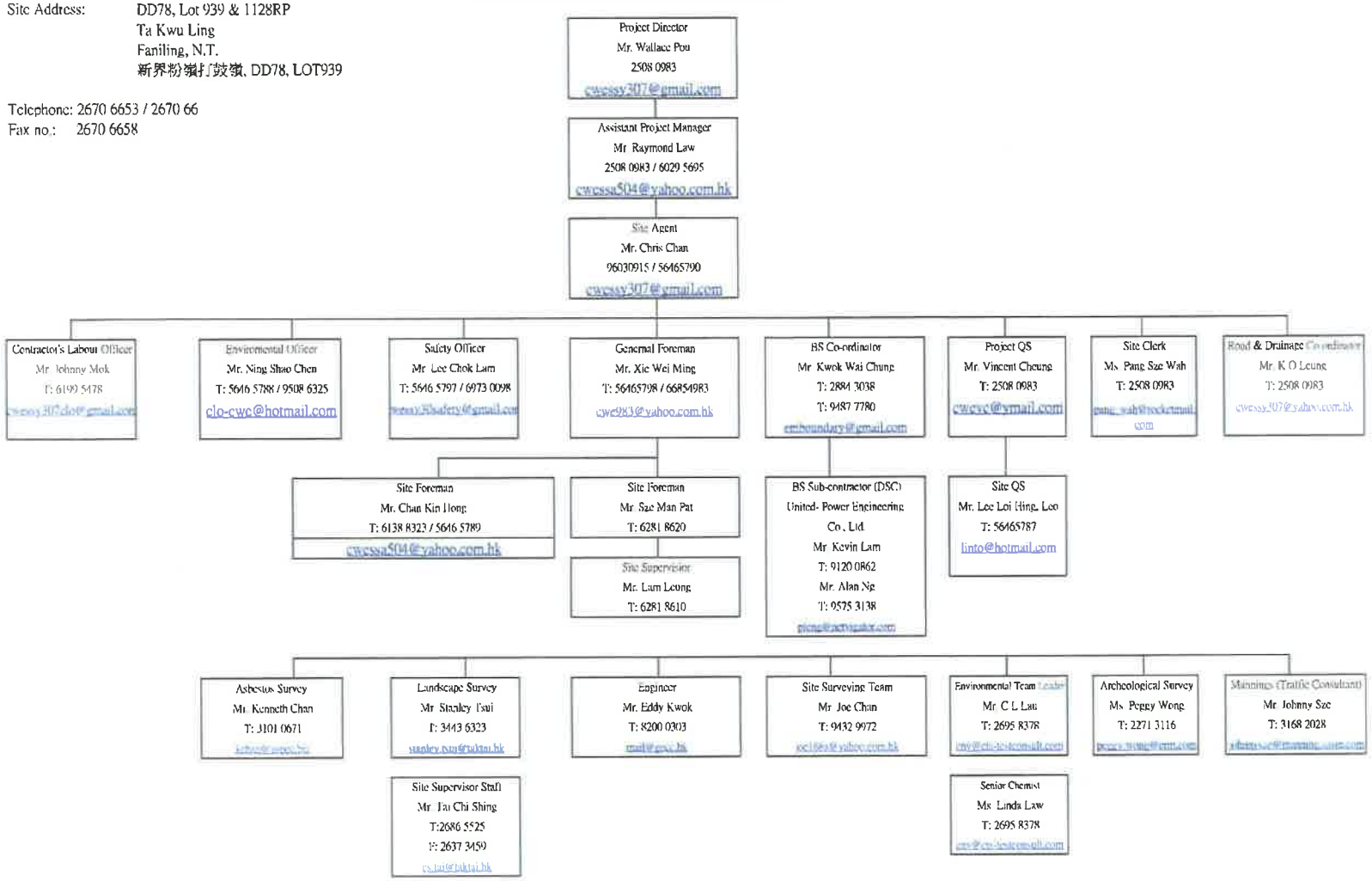
中国水利电力对外公司
CHINA INTERNATIONAL WATER & ELECTRIC CORP.

Site Organization Chart for Project SS Y307

Rev : 8

Site Address: DD78, Lot 939 & 1128RP
Ta Kwu Ling
Fanling, N.T.
新界粉嶺打鼓嶺, DD78, LOT939

Telephone: 2670 6653 / 2670 66
Fax no.: 2670 6658



Appendix B1

Calibration Certificates for Impact Noise Monitoring Equipment

Hong Kong Calibration Ltd.
香港校正有限公司

Calibration Certificate

Certificate No. **38224** Page 1 of 2 Pages

Customer : ETS-Testconsult Limited

Address : 8/F., Block B, Veristrong Industrial Centre, 34-36 Au Pui Wan St., Fotan, Hong Kong.

Order No. : Q33271 **Date of receipt :** 13-Nov-13

Item Tested

Description : Sound Level Calibrator (ET/EN/002/01)

Manufacturer : Rion

Model : NC-73 **Serial No. :** 10196943

Test Conditions

Date of Test : 15-Nov-13 **Supply Voltage :** --

Ambient Temperature : (23 ± 3)°C **Relative Humidity :** (50 ± 25) %

Test Specifications

Calibration check.

Ref. Document/Procedure : F21, Z02.

Test Results

All results were within the manufacturer's specification.

The results are shown in the attached page(s).

Main Test equipment used:

Equipment No.	Description	Cert. No.	Traceable to
S014	Spectrum Analyzer	35730	NIM-PRC & SCL-HKSAR
S205	Ref. Sound Level Calibrator	PHCO40002	SCL-HKSAR
S041	Universal Counter	34621	SCL-HKSAR
S206	Sound Level Meter	36203	SCL-HKSAR
S031	6½ dgt. Multimeter	30128	NIM-PRC

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).
The test results apply to the above Unit-Under-Test only

Calibrated by : Dorothy Cheuk

Approved by : Steve Kwan

Date: 15-Nov-13

This Certificate is issued by:
Hong Kong Calibration Ltd.
Unit 8B, 24/F., Well Fung Industrial Centre, No. 58-76, Ta Chuen Ping Street,Kwai Chung, NT,Hong Kong.
Tel: 2425 8801 Fax: 2425 8646

E

Calibration Certificate

Results :

1. **Level Accuracy (at 1 kHz)**

UUT Nominal Value	Measured Value	Mfr's Spec.
94 dB	94.1 dB	± 1 dB

Uncertainty : ± 0.2 dB

2. **Frequency Accuracy**

UUT Nominal Value	Measured Value	Mfr's Spec.
1 kHz	0.986 kHz	± 2 %

Uncertainty : ± 0.1 %

3. **Level Stability** : 0.0 dB
   Uncertainty : ± 0.01 dB

4. **Total Harmonic Distortion** : < 0.1 %
   Mfr's Spec. : < 3 %
   Uncertainty : ± 2.3 % of reading

Remarks: 1. UUT : Unit-Under-Test
2. The uncertainty claimed is for a confidence probability of not less than 95%.
3. Atmospheric Pressure : 1006 hPa

---------- END ----------

Hong Kong Calibration Ltd.
香 港 校 正 有限公司

Calibration Certificate

Certificate No. 38223

Customer : ETS-Testconsult Limited

Address : 8/F., Block B, Veristrong Industrial Centre, 34-36 Au Pui Wan St., Fotan, Hong Kong.

Order No. : Q33271 **Date of receipt :** 13-Nov-13

Item Tested

Description : Precision Integrating Sound Level Meter (ET/EN/003/13)

Manufacturer : Rion

Model : NL-31 **Serial No. :** 00593620

Test Conditions

Date of Test : 15-Nov-13 **Supply Voltage :** --

Ambient Temperature : (23 ± 3)°C **Relative Humidity :** (50 ± 25) %

Test Specifications

Calibration check.

Ref. Document/Procedure : Z01.

Test Results

All results were within the IEC 651 Type 1 & IEC 804 Type1 specification.

The results are shown in the attached page(s).

Main Test equipment used:

Equipment No.	Description	Cert. No.	Traceable to
S017	Multi-Function Generator	C127181	SCL-HKSAR
S205	Ref. Sound Level Calibrator	PHCO40002	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).

The test results apply to the above Unit-Under-Test only

Calibrated by : Dorothy Cheuk

Approved by : Steve Kwan

Date: 15-Nov-13

This Certificate is issued by:
Hong Kong Calibration Ltd.
Unit 8B, 24/F., Well Fung Industrial Centre, No. 58-76, Ta Chuen Ping Street,Kwai Chung, NT,Hong Kong.
Tel: 2425 8601 Fax: 2425 8646

E

Calibration Certificate

Results :

1. SPL Accuracy

UUT Setting			Applied Value (dB)	UUT Reading (dB)
Level Range (dB)	Weight	Response		
20 – 100	L_A	Fast	94.0	94.0
		Slow		94.0
	L_C	Fast		94.0
	Lp	Fast		94.0
30 – 120	L_A	Fast	94.0	94.0
		Slow		94.0
	L_C	Fast		94.0
	Lp	Fast		94.0
30 – 120	L_A	Fast	114.0	114.0
		Slow		114.0
	L_C	Fast		114.0
	Lp	Fast		114.0

IEC 651 Type 1 Spec. : ± 0.7 dB
Uncertainty : ± 0.1 dB

2. Level Stability : 0.0 dB

IEC 651 Type 1 Spec. : ± 0.3 dB
Uncertainty : ± 0.01 dB

3. Linearity

3.1 Level Linearity

UUT Range (dB)	Applied Value (dB)	UUT Reading (dB)	Variation (dB)	IEC 651 Type 1 Spec. (Primary Indicator Range)
130	114.0	114.0	0.0	± 0.7 dB
130	104.0	104.0	0.0	
120	94.0	94.0 (Ref.)	- -	
110	84.0	84.0	0.0	
100	74.0	74.0	0.0	
90	64.0	64.1	0.1	
80	54.0	54.1	0.1	

Uncertainty : ± 0.1 dB

Calibration Certificate

3.2 Differential level linearity

UUT Range (dB)	Applied Value (dB)	UUT Reading (dB)	Variation (dB)	IEC 651 Type 1 Spec.
120	84.0	84.0	0.0	± 0.4 dB
	94.0	94.0 (Ref.)	- -	
	95.0	95.0	0.0	± 0.2 dB

Uncertainty : ± 0.1 dB

4. Frequency Weighting - A weighting

Frequency	Attenuation (dB)	IEC 651 Type 1 Spec.
31.5 Hz	39.6	- 39.4 dB, ± 1.5 dB
63 Hz	-36.3	- 26.2 dB, ± 1.5 dB
125 Hz	-16.3	- 16.1 dB, ± 1 dB
250 Hz	-8.7	- 8.6 dB, ± 1 dB
500 Hz	-3.3	- 3.2 dB, ± 1 dB
1 kHz	0.0 (Ref.)	0 dB, ± 1 dB
2 kHz	+1.2	+ 1.2 dB, ± 1 dB
4 kHz	+1.1	+ 1.0 dB ,± 1 dB
8 kHz	-1.0	- 1.1 dB, + 1.5 dB ~ - 3 dB
16 kHz	-6.4	- 6.6 dB, + 3 dB ~- ∞

Uncertainty : ± 0.1 dB

5. Time Averaging

6.

Applied Burst duty Factor	Applied Leq Value (dB)	UUT Reading (dB)	IEC 804 Type 1 Spec.
continuous	40.0	40.0	--
1/10	40.0	39.9	± 0.5 dB
$1/10^2$	40.0	39.7	
$1/10^3$	40.0	39.8	± 1.0 dB
$1/10^4$	40.0	39.8	

Uncertainty : ± 0.1 dB

Remarks:
1. UUT : Unit-Under-Test
2. The uncertainty claimed is for a confidence probability of not less than 95%.
3. Atmospheric Pressure : 1006 hPa
4. The UUT was adjusted with the supplied sound calibrator at the reference sound pressure level before the calibration.

---------- END ----------

Appendix B2

Impact Noise Monitoring Results

Day-time Noise monitoring Results

Location	LW02 - House No.39 at Lo Wu (Section 3A)							
Date	Weather Condition	Start Time	End Time	Noise Level for 30 min, dB(A)			Limit Level	Baseline Noise Level
				Leq	L10	L90		
02/07/14	Fine	8:20	8:50	58.2	59.9	54.1	75.0	60.4
09/07/14	Fine	10:35	11:05	57.2	58.8	53.0	75.0	60.4
16/07/14	Fine	9:30	10:00	56.4	58.2	52.1	75.0	60.4
23/07/14	Fine	10:45	11:15	57.7	59.0	53.2	75.0	60.4
30/07/14	Fine	10:55	11:25	56.0	57.7	50.9	75.0	60.4

Location	MW02 - House No.11, Muk Wu Chuen Yiu (Section 3A)							
Date	Weather Condition	Start Time	End Time	Noise Level for 30 min, dB(A)			Limit Level	Baseline Noise Level
				Leq	L10	L90		
02/07/14	Fine	9:00	9:30	47.7	50.1	42.9	75.0	51.5
09/07/14	Fine	11:15	11:45	48.2	50.1	43.4	75.0	51.5
16/07/14	Fine	10:10	10:40	47.7	49.6	42.8	75.0	51.5
23/07/14	Fine	11:25	11:55	48.4	50.1	43.5	75.0	51.5
30/07/14	Fine	10:15	10:45	48.4	49.7	42.6	75.0	51.5

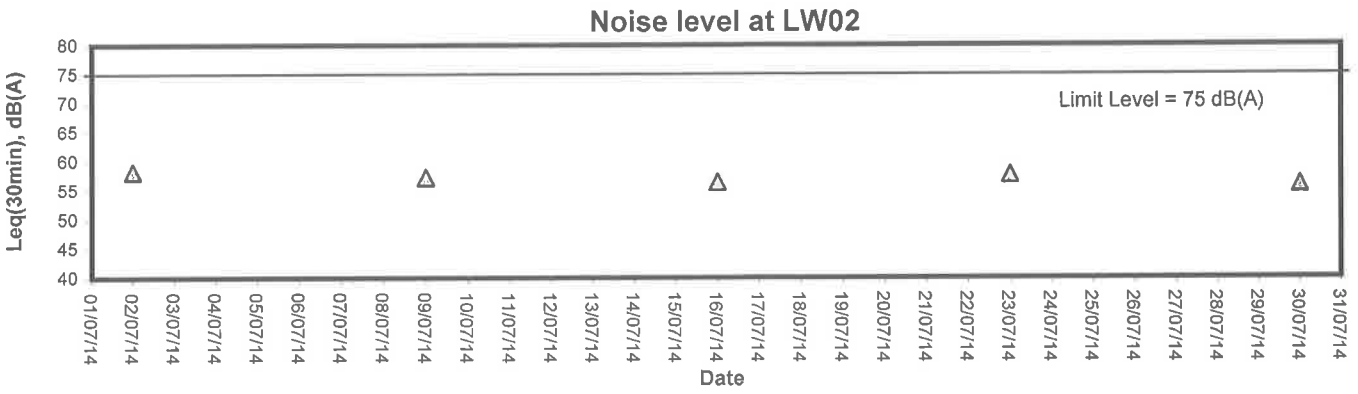
Location	WL01(R) - Village House at Wang Lek (Section 3C)							
Date	Weather Condition	Start Time	End Time	Noise Level for 30 min, dB(A)			Limit Level	Baseline Noise Level
				Leq	L10	L90		
02/07/14	Fine	9:40	10:10	47.3	49.6	42.1	75.0	53.3
09/07/14	Fine	13:35	14:05	47.5	49.0	40.9	75.0	53.3
16/07/14	Fine	10:50	11:20	46.9	48.5	42.2	75.0	53.3
23/07/14	Fine	13:35	14:05	46.8	48.5	42.7	75.0	53.3
30/07/14	Fine	9:35	10:05	47.7	48.8	42.6	75.0	53.3

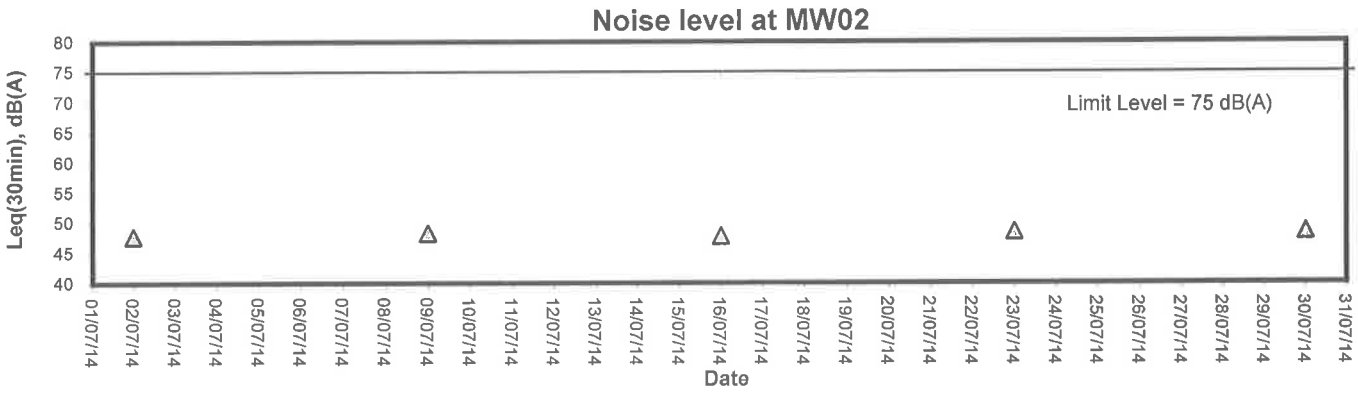
Location	WL03 - Village House at Wang Lek (Section 3C)							
Date	Weather Condition	Start Time	End Time	Noise Level for 30 min, dB(A)			Limit Level	Baseline Noise Level
				Leq	L10	L90		
02/07/14	Fine	10:15	10:45	46.3	48.0	41.4	75.0	56.3
09/07/14	Fine	13:00	13:30	46.2	48.0	41.3	75.0	56.3
16/07/14	Fine	11:25	11:55	45.7	47.4	41.9	75.0	56.3
23/07/14	Fine	13:00	13:30	46.0	47.7	40.9	75.0	56.3
30/07/14	Fine	9:00	9:30	47.0	48.2	41.9	75.0	56.3

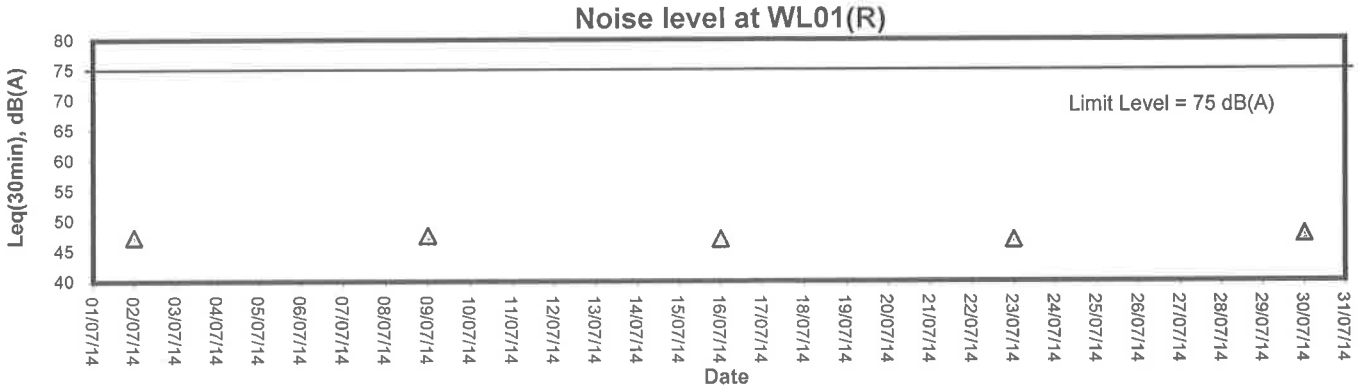
Appendix B3

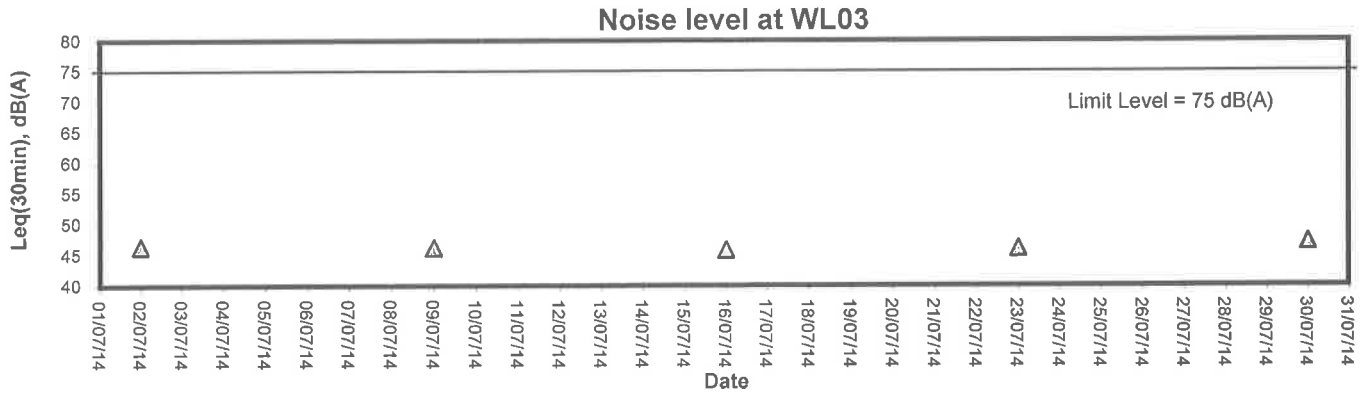
Graphical Plots of Impact Noise Monitoring Data

Noise Monitoring (Day-time)









Appendix C

Event-Action Plans

Event and Action Plan for Construction Noise

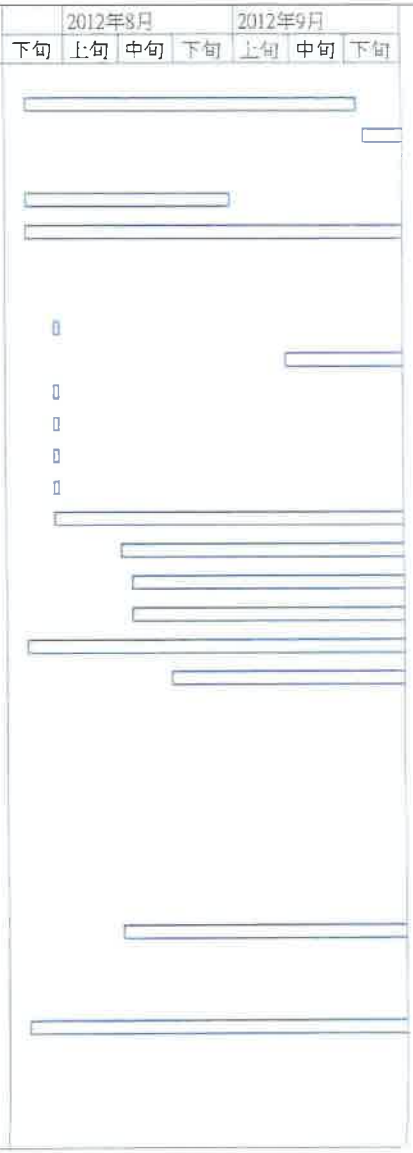
Event	Action			
	ET Leader	IEC	ER	Contractor
Action Level	1. Notify IEC and the Contractor. 2. Carry out investigation. 3. Report the results of investigation to IEC and the Contractor. 4. Discuss with the Contractor and formulate remedial measures. 5. Increase monitoring frequency to check mitigation measures.	1. Review with analysed results submitted by ET. 2. Review the proposed remedial measures by the Contractor and advise ER accordingly. 3. Supervise the implement of remedial measures.	1. Confirm receipt of notification of exceedance in writing. 2. Notify the Contractor. 3. Require the Contractor to propose remedial measures for the analysed noise problem. 4. Ensure remedial measures are properly implemented.	1. Submit noise mitigation proposals to IEC. 2. Implement noise mitigation proposals.
Limit Level	1. Identify the source. 2. Notify IEC, ER, EPD and the Contractor. 3. Repeat measurement to confirm findings. 4. Increase monitoring frequency. 5. Carry out analysis of Contractor's working procedures to determine possible mitigation to be implemented. 6. Inform IEC, ER, and EPD the causes & actions taken for the exceedances. 7. Assess effectiveness of the Contractor's remedial actions and keep IEC, EPD and ER informed of the results. 8. If exceedance stops, cease additional monitoring.	1. Discuss amongst ER, ET Leader and the Contractor on the potential remedial actions. 2. Review the Contractor's remedial actions whenever necessary to assure their effectiveness and advise ER accordingly. 3. Supervise the implementation of remedial measures.	1. Confirm receipt of notification of exceedance in writing. 2. Notify the Contractor. 3. Require the Contractor to propose remedial measures for the analysed noise problem. 4. Ensure remedial measures are properly implemented. 5. If exceedance continues, consider what activity of the work is responsible and instruct the Contractor to stop that activity of work until the exceedance is abated.	1. Take immediate action to avoid further exceedance. 2. Submit proposals for remedial actions to IEC within 3 working days of notification. 3. Implement the agreed proposals. 4. Resubmit proposals if problem still not under control. 5. Stop the relevant activity of works as determined by the ER until the exceedance is abated.

Appendix D

Work Programme

China International Water & Electric Corp. Construction of A Secondary Boundary Fence & New Boundary Fence And Boundary Partol Road (Phase 2)

識別碼	任務名稱	工期	開始時間	完成時間
1	**Construction of SBF & PBF & Patrol Road at Frontier (Section B)**	**764 days?**	**2012/7/25**	**2014/8/27**
2	General Site Office setup	60 days	2012/7/25	2012/9/22
3	General Site mobilization	30 days	2012/9/24	2012/10/23
4	**Apply for working permit**	**584 days**	**2012/7/25**	**2014/2/28**
5	- car, site personel, worker for preparation & surveying works	37 days	2012/7/25	2012/8/30
6	- car, site personel, worker for construction works	584 days	2012/7/25	2014/2/28
7	**General Submission works**	**764 days**	**2012/7/25**	**2014/8/27**
8	Initital site survey	50 days	2012/10/8	2012/11/26
9	Submission to EPD required under further Environment Permit	1 day	2012/7/30	2012/7/30
10	Submission of temporary traffic arrangement	717 days	2012/9/10	2014/8/27
11	1st submission of site aspect schedule	1 day	2012/7/30	2012/7/30
12	1st submission of safety plan	1 day	2012/7/30	2012/7/30
13	1st Submission of Environmental Management Plan	1 day	2012/7/30	2012/7/30
14	submission of waste management plan for trip tick	1 day	2012/7/30	2012/7/30
15	Submission of Smart Card System(subject to site poession)	90 days	2012/7/30	2012/10/27
16	Submission of method statement for construction works	180 days	2012/8/11	2013/2/6
17	Submission of initial tree survey	110 days	2012/8/13	2012/11/30
18	Submission of tree risk assessment (2013)	110 days	2012/8/13	2012/11/30
19	Submission of method statement for tree works	764 days	2012/7/25	2014/8/27
20	Materials submission & approval	558 days	2012/8/20	2014/2/28
21	Submission of tree risk assessment (2014)	172 days	2014/3/9	2014/8/27
22				
23	**Steelwork**			
24	fabrication of steel material	334 days	2013/8/1	2014/6/30
25	fabrication of mesh	243 days	2013/6/25	2014/2/22
26				
27	**Section A (Lin Ma Hang)**	**333 days**	**2012/7/25**	**2013/6/22**
28	1. Setting out & Topographical survey for site boundary	143 days	2012/8/11	2012/12/31
29	2. Site clearance for new road / archaeologicial survey	28 days	2013/1/1	2013/1/28
30	**3. Archaeological survey**	**333 days**	**2012/7/25**	**2013/6/22**
31	-preparation & submission of archeological proposal	225 days	2012/7/25	2013/3/6
32	-seek AMO's approval & Licence	45 days	2013/3/6	2013/4/19
33	-carry out the field survey (subject to licence's approval)	21 days	2013/4/20	2013/5/10
34	-preparation & submission of report to AMO & EPD	30 days	2013/5/11	2013/6/9

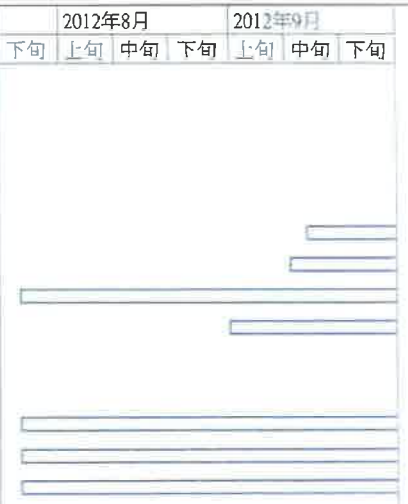


專案: Programe for Frontier
日期: 19-5-2014

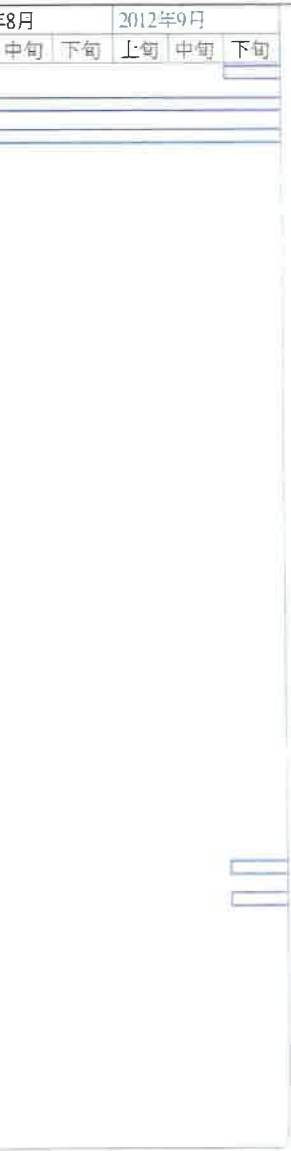
task

Revision: G

識別碼	任務名稱	工期	開始時間	完成時間
35	-submission of report to IEC	14 days	2013/6/9	2013/6/22
36	-submission of report to AMO & IEC	14 days	2013/6/9	2013/6/22
37				
38	**Section B (Man Kam To Lo Wu , Pak Fu Shan to Lin Ma Hang)**	**764 days?**	**2012/7/25**	**2014/8/27**
39	Site mobilization			
40	1. condition survey	199 days	2012/9/15	2013/4/1
41	2. Initital tree survey	169 days	2012/9/12	2013/2/27
42	3. Setting out for works	764 days	2012/7/25	2014/8/27
43	4. Underground detection & submission report	119 days	2012/9/1	2012/12/28
44				
45	**6a. Boundary Fence (Man Kam To Section)**	**764 days?**	**2012/7/25**	**2014/8/27**
46	1. site clearance	764 days	2012/7/25	2014/8/27
47	2. Maintenance landscaping works	764 days	2012/7/25	2014/8/27
48	2. Implementation landscaping works	764 days	2012/7/25	2014/8/27
49	(protection/punning/checking/inspection works etc)			
50	**- RC footings**	**586 days**	**2012/11/12**	**2014/6/20**
51	- Footing excavation	582 days	2012/11/12	2014/6/16
52	-Blinding layer	582 days	2012/11/13	2014/6/17
53	-Formwork	582 days	2012/11/14	2014/6/18
54	-Bar fixing	582 days	2012/11/15	2014/6/19
55	-Threaded rod	582 days	2012/11/15	2014/6/19
56	- Concreting	582 days	2012/11/16	2014/6/20
57	- Backfilling works	582 days	2012/11/17	2014/6/21
58	-Reinstatement works	478 days	2013/5/7	2014/8/27
59	**- erection of metal fence**	**282 days**	**2013/11/19**	**2014/8/27**
60	1. steel frame works	261 days	2013/11/19	2014/8/6
61	2. mesh	265 days	2013/11/21	2014/8/12
62	3. barbed wire	59 days	2014/6/30	2014/8/27
63	4. installation of gates	59 days	2014/6/30	2014/8/27
64	5. painting works	73 days	2014/6/16	2014/8/27
65	6. Installation of copper tape	173 days	2014/3/8	2014/8/27
66	7. Installation of cable tray (including gate)	40 days	2014/7/19	2014/8/27
67				
68	**6b. Boundary Fence (Lo Wu Section)**	**764 days?**	**2012/7/25**	**2014/8/27**



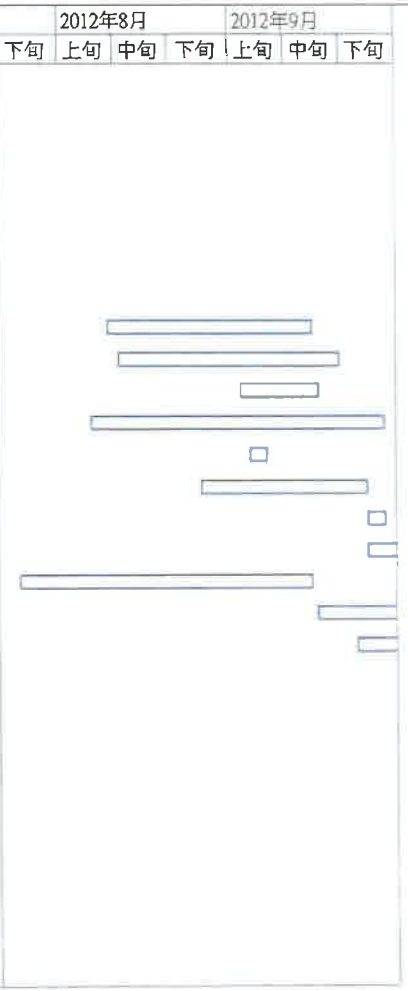
識別碼	任務名稱	工期	開始時間	完成時間
69	1. site clearance	706 days	2012/9/21	2014/8/27
70	2. Maintenance landscaping works	764 days	2012/7/25	2014/8/27
71	3. Implementation landscaping works	764 days	2012/7/25	2014/8/27
72	(protection/punning/checking/inspection works etc)			
73	**-RC footings**	**654 days**	**2012/11/12**	**2014/8/27**
74	- footing excavation works	582 days	2012/11/12	2014/6/16
75	- blinding layer	582 days	2012/11/13	2014/6/17
76	-Formwork	582 days	2012/11/14	2014/6/18
77	-Bar fixing	582 days	2012/11/15	2014/6/19
78	- Threaded rod	582 days	2012/11/15	2014/6/19
79	- Concreting	582 days	2012/11/16	2014/6/20
80	- backfilling works	582 days	2012/11/17	2014/6/21
81	-Reinstatement works	171 days	2014/3/10	2014/8/27
82	**- erection of metal fence**	**274 days**	**2013/11/27**	**2014/8/27**
83	1. steel frame works	180 days	2013/11/27	2014/5/25
84	2. mesh	184 days	2013/11/28	2014/5/30
85	3. barbed wire	113 days	2014/5/7	2014/8/27
86	4. installation of gates	59 days	2014/6/30	2014/8/27
87	5. painting works	143 days	2014/4/7	2014/8/27
88	6. Installation of copper tape	173 days	2014/3/8	2014/8/27
89	7. Installation of cable tray	40 days	2014/7/19	2014/8/27
90				
91	- Demolition/Alternatiion of extg fence	331 days	2013/10/1	2014/8/27
92				
93	**6c. Bound fence (Pak Fu Shan Section)**	**764 days?**	**2012/7/25**	**2014/8/27**
94	Maintenance landscaping works	706 days	2012/9/21	2014/8/27
95	Implementation landscaping works	706 days	2012/9/21	2014/8/27
96	(protection/punning/checking/inspection works etc)			
97	1. site clearance & preparation works	89 days	2013/1/1	2013/3/30
98	**2. excavation works**	**573 days**	**2013/1/1**	**2014/7/27**
99	3. blinding layer	573 days	2013/1/2	2014/7/28
100	4. erection of formwork	573 days	2013/1/3	2014/7/29
101	5. bar fixing	573 days	2013/1/4	2014/7/30
102	6 Threaded rod	573 days	2013/1/4	2014/7/30



識別碼	任務名稱	工期	開始時間	完成時間
103	7. concrete works	573 days	2013/1/5	2014/7/31
104	8. backfilling works	573 days	2013/1/6	2014/8/1
105	9. reinstatement works	59 days	2014/6/30	2014/8/27
106	**10. steel frame erection**	**113 days**	**2014/3/10**	**2014/6/30**
107	11. mesh	31 days	2014/6/16	2014/7/16
108	12. barbed wire	27 days	2014/8/1	2014/8/27
109	13. installation of gates	45 days	2014/7/14	2014/8/27
110	14. painting works	130 days	2014/4/20	2014/8/27
111	15. installation of copper tape (BS)	142 days	2014/4/8	2014/8/27
112	16. installation of cable tray	40 days	2014/7/19	2014/8/27
113				
114	- Demolition/Alternatiion of extg fence	331 days	2013/10/1	2014/8/27
115				
116	**6d. Bound fence (Lin Ma Hang Section)**	**604 days**	**2013/1/1**	**2014/8/27**
117	Maintenance landscaping works	764 days	2012/7/25	2014/8/27
118	Implementation of plannting works	764 days	2012/7/25	2014/8/27
119	(protection/punning/checking/inspection works etc)	1 day?	2012/8/11	2012/8/11
120	1. site clearance	89 days	2013/1/1	2013/3/30
121	**2. excavation works**	**573 days**	**2013/1/1**	**2014/7/27**
122	3. blinding layer	573 days	2013/1/2	2014/7/28
123	4. erection of formwork	573 days	2013/1/3	2014/7/29
124	5. bar fixing	573 days	2013/1/4	2014/7/30
125	6 Threaded rod	573 days	2013/1/4	2014/7/30
126	7. concrete works	573 days	2013/1/5	2014/7/31
127	8. backfilling works	573 days	2013/1/6	2014/8/1
128	9. reinstatement works	179 days	2013/12/10	2014/6/6
129	**10. steel frame erection**	**113 days**	**2014/2/10**	**2014/6/2**
130	11. mesh	31 days	2014/3/24	2014/4/23
131	12. barbed wire	31 days	2014/7/28	2014/8/27
132	13. installation of gates	61 days	2014/4/7	2014/6/6
133	14. painting works	130 days	2014/1/28	2014/6/6
134	15. installation of copper tape (BS)	91 days	2014/5/29	2014/8/27
135	16. installation of cable tray	91 days	2014/5/29	2014/8/27
136	17. construction of solar lamp poles	45 days	2014/7/14	2014/8/27

識別碼	任務名稱	工期	開始時間	完成時間	2012年8月 下旬	2012年8月 上旬	2012年8月 中旬	2012年8月 下旬	2012年9月 上旬	2012年9月 中旬	2012年9月 下旬
137											
138	- Demolition/Alternation of extg fence	331 days	2013/10/1	2014/8/27							
139											
140	Works disturbance by local villagers, pending for commencement of works	436 days	2013/3/4	2014/5/13							
141											
142	**Section C(subject to excision) (subject to item 29)**	**419 days**	**2013/7/5**	**2014/8/27**							
143	- Setting out for site boundary	30 days	2013/7/5	2013/8/3							
144	- Condition survey	30 days	2013/7/5	2013/8/3							
145	- Setting out	30 days	2013/7/5	2013/8/3							
146	- Maintenance landscaping works	419 days	2013/7/5	2014/8/27							
147	- Implementation landscaping works (removal/purnning/protection)	419 days	2013/7/5	2014/8/27							
148	**Road work & Boundary fence**	**402 days**	**2013/7/22**	**2014/8/27**							
149	Road work & Boundary fence	364 days	2013/7/22	2014/7/20							
150	- Backfilling works for road	314 days	2013/7/22	2014/5/31							
151	- footing excavation	209 days	2013/10/26	2014/5/22							
152	- blinding layer	209 days	2013/10/27	2014/5/23							
153	- erection of formwork	209 days	2013/10/28	2014/5/24							
154	- reinforcement works	209 days	2013/10/29	2014/5/25							
155	- threaded rod	209 days	2013/10/29	2014/5/25							
156	- concrete	209 days	2013/10/30	2014/5/26							
157	- construction of pillar box (2 nos.)	30 days	2014/6/16	2014/7/15							
158	- backfilling works	30 days	2014/6/30	2014/7/29							
159	- steel frame erection	45 days	2014/6/26	2014/8/9							
160	- installation of mesh	30 days	2014/7/14	2014/8/12							
161	- installation of barbed wire	30 days	2014/7/14	2014/8/12							
162	- installation of gates	30 days	2014/4/1	2014/4/30							
163	- painting works	31 days	2014/7/14	2014/8/13							
164	- Drainage & U-channel works & catch pit	75 days	2014/5/19	2014/8/1							
165	- BS works (installation of cable tray)	31 days	2014/6/23	2014/7/23							
166	- BS works (installation of copper tape)	31 days	2014/6/23	2014/7/23							
167	- construction of cable draw pit / duct / lamp pole footing	176 days	2014/2/6	2014/7/31							
168	- erection of lamp pole	31 days	2014/6/30	2014/7/30							
169	- flood-light wiring & miscellaneous works	31 days	2014/6/30	2014/7/30							
170	- road surfacing	61 days	2014/6/3	2014/8/2							

識別碼	任務名稱	工期	開始時間	完成時間
171	- power energizing	15 days	2014/7/29	2014/8/13
172	- T&C inspection	15 days	2014/8/13	2014/8/27
173				
174	Pending for GI works at fish pond			
175	*pending for provision of method statement of backfilling at fish pond			
176	*works for backfilling works			
177				
178	**Section D (Shek Chung Au)**	**107 days**	**2012/7/25**	**2012/11/8**
179	-Submission of method statement on Tree survey works	37 days	2012/8/10	2012/9/15
180	-Seek IEC's approval and carry out Bascline monitoring	40 days	2012/8/12	2012/9/20
181	-Carry out initital tree survey	14 days	2012/9/3	2012/9/16
182	-Removed extg UU by Others	53 days	2012/8/7	2012/9/28
183	-Carry out the asbestos survey	3 days	2012/9/5	2012/9/7
184	-Application for TTA approved by TD/RMO	30 days	2012/8/27	2012/9/25
185	-Seek Police's approval	3 days	2012/9/26	2012/9/28
186	-Seek EPD's noise approval	10 days	2012/9/26	2012/10/5
187	- Preparation,submission & approval of method statement & demolition works	53 days	2012/7/25	2012/9/15
188	-Preparation worsk for site demolition works	21 days	2012/9/17	2012/10/7
189	-Removal of extg fixture & funitures fittings	14 days	2012/9/24	2012/10/7
190	-Demolition of extg structure & signage	32 days	2012/10/8	2012/11/8
191				
192	**Preparation works for Section E**			
193	- Asbestos survey	31 days	2012/12/1	2012/12/31
194	- Submission & approval of Demolition plan	70 days	2012/12/1	2013/2/8
195	-Application for TTA	30 days	2013/9/16	2013/10/15
196	**Section E (Lok Ma Chau)**	**199 days**	**2013/7/31**	**2014/2/14**
197	-Demolition of extg structure/checkpoints	199 days	2013/7/31	2014/2/14
198				
199	**7. Anticipated completion date**	1 day	2014/8/27	2014/8/27



Appendix E

ET Weekly Site Inspection Records

WEEKLY SITE INSPECTION CHECKLIST

Inspection Date	2/7/14	Inspected by	~~RE~~ Peter	IEC	Contractor	ET
Time	14:45	Name	C.L. Cheng	✓		Mak

Weather
Condition : Sunny / (Fine) / cloudy / Drizzle / Rain / Storm / Hazy
Wind : Calm / (Light) / Breeze / Strong

Temperature : 32°C
Humidity : High / Moderate / (Low)

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Fugitive Dust Emission					
• Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	✓				
• The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.			✓		
• Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.			✓		
• Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.				✓	
• The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	✓				
• The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	✓				
• All dusty materials should be sprayed with water prior to any loading, unloading or transfer.			✓		
• Vehicle speed should be limited to 10 kph except on completed access roads.	✓				
• Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	✓				
• Vehicle and equipment should be switched off while not in use.	✓				
• All plant and equipment should be well maintained e.g. without black smoke emission.	✓				
• Open burning should be prohibited.	✓				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Noise Impact					
▪ 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 adopt.	√				
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	√				
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	√				
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	√				
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	√				
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	√				
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	√				
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.			√		
▪ PME should be covered or shielded by appropriate acoustic materials.	√				
▪ Air compressors and hand held breakers should have noise labels.	√				
▪ Compressors and generators should operate with door closed.	√				
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:	√				
▪ Particular models of plants should be quieter than the standards given in GW-TM.	√				
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	√				
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:				√	
▪ Use of welder is recommended to replace the use of hand-held driller				√	
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.				√	
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.				√	
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	√				
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site	√				
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	√				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	√				
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	√				
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	√				
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	√				
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	√				
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	√				
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	√				
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	√				
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	√				
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	√				
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.				√	
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	√				
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.			√		
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.			√		
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.			√		
▪ Disposal of the waste oil should be done by a licensed collector.			√		
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	√				
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle the chemicals on site.	√				
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.				√	

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.				√	
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.				√	
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	√				
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	√				
▪ C&D materials should be recycled as much as possible on-site.	√				
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	√				
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	√				
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	√				
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	√				
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	√				
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	√				
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	√				
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	√				
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	√				
▪ Be enclosed on at least 3 sides.	√				
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	√				
▪ Have adequate ventilation	√				

▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	√				
▪ Be arranged so that incompatible materials are adequately separated	√				
▪ Disposal of chemical waste should					
▪ Be via a licensed waste collector	√				
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	√				
▪ To be re-user of the waste, under approval from the EPD				√	
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	√				
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	√				
▪ Burning of refuse on construction sites is prohibited by law.	√				
Landscape and Visual					
Preservation of Existing Vegetation					
• Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	√				
• The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	√				
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	√				
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	√				
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.				√	
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.				√	
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	√				
Preservation of Existing Topsoil					
• Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.				√	
• The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion				√	
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.				√	
Permanent and Temporary Works Areas					
• Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.				√	
• Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.				√	

Mitigation Planting					
• Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.				√	
• Use of native plant species predominantly in the planting design for the buffer areas.				√	
Good Site Practices					
• The Environmental Permit should be displaced conspicuously on site.	√				
• Construction noise permits should be posted at site entrance or available for site inspection.				√	
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.		√			Item 3 and 4
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	√				
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	√				

Summary of the Weekly Site Inspection:

Item	Details of defective works or observations	Status of the item (closed / continue follow-up)	Proposed Follow Up Action (if required)	Photo Ref.	Target Completion Date
1	Follow-up action to item 4 on 27/06/2014,oil drum without drip tray observed in New Road site was removed.	Closed	---	140702_001	---
2	Follow-up action to item 5 on 27/06/2014,rubbish observed near Fence No. 207 in Pak Fu Shan site was collected.	Closed	---	140702_002	---
3	Rubbish was observed near the middle section in New Road site.	Follow-up	The Contractor was reminded to collect rubbish regularly to keep good site practices.	140702_003	09/07/14
4	Rubbish was observed near Gate No. 206 in Pak Fu Shan site.	Follow-up	The Contractor was reminded to collect rubbish regularly to keep good site practices.	140702_004	09/07/14

Remark

	Name	Title	Signature	Date
Checked by	C. L. Lau	ET Leader		02 July 2014

Photos

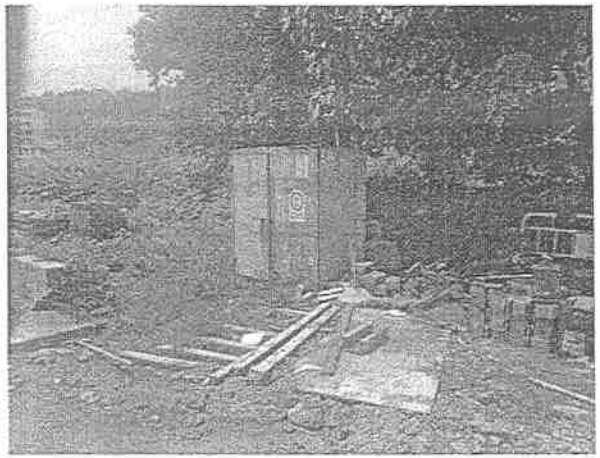


Photo 140702_001 – Oil tank without drip tray observed in New Road site was removed.

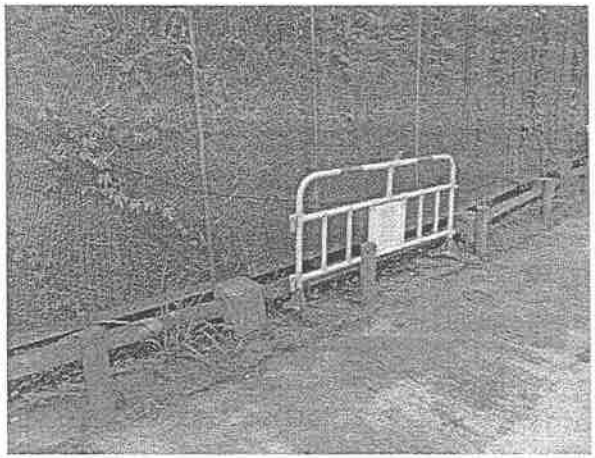


Photo 140702_002 – Rubbish observed near Fence No. 207 in Pak Fu Shan site was collected.

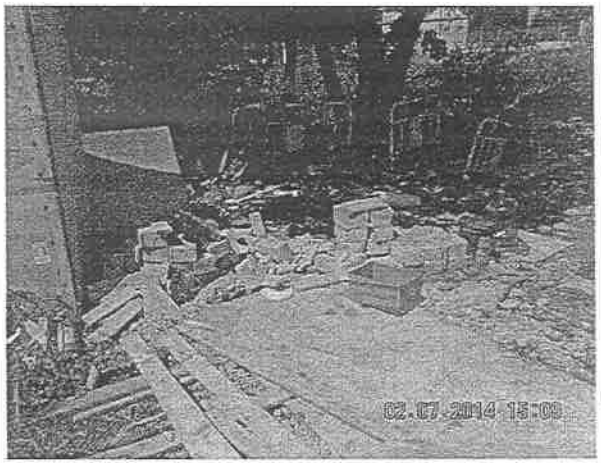


Photo 140702_003 – Rubbish was observed near the middle section of New Road site.

Photo 140702_004 – Rubbish was observed near Gate No. 206 in Pak Fu Shan site.

WEEKLY SITE INSPECTION CHECKLIST

Inspection Date	9/7/14	Inspected by	RE	IEC	Contractor	ET
Time	14:20	Name	[illegible]	/	[illegible]	Mak

Weather
Condition : Sunny / (Fine) / cloudy / Drizzle / Rain / Storm / Hazy
Wind : Calm / (Light) / Breeze / Strong

Temperature : 32°C
Humidity : High / Moderate / (Low)

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Fugitive Dust Emission					
• Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	✓				
• The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.			✓		
• Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.			✓		
• Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.				✓	
• The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	✓				
• The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	✓				
• All dusty materials should be sprayed with water prior to any loading, unloading or transfer.			✓		
• Vehicle speed should be limited to 10 kph except on completed access roads.	✓				
• Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	✓				
• Vehicle and equipment should be switched off while not in use.	✓				
• All plant and equipment should be well maintained e.g. without black smoke emission.	✓				
• Open burning should be prohibited.	✓				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Noise Impact					
▪ 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 adopt.	√				
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	√				
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	√				
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	√				
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	√				
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	√				
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	√				
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.			√		
▪ PME should be covered or shielded by appropriate acoustic materials.	√				
▪ Air compressors and hand held breakers should have noise labels.	√				
▪ Compressors and generators should operate with door closed.	√				
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:	√				
▪ Particular models of plants should be quieter than the standards given in GW-TM.	√				
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	√				
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:				√	
▪ Use of welder is recommended to replace the use of hand-held driller				√	
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.				√	
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.				√	
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	√				
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site		√			Item 5
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	√				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	√				
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.		√			Item 3
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	√				
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	√				
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	√				
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	√				
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	√				
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	√				
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	√				
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	√				
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.				√	
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	√				
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.			√		
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.			√		
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.			√		
▪ Disposal of the waste oil should be done by a licensed collector.			√		
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	√				
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle the chemicals on site.	√				
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.				√	

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.				√	
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.				√	
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	√				
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	√				
▪ C&D materials should be recycled as much as possible on-site.	√				
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	√				
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	√				
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	√				
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	√				
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	√				
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	√				
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	√				
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	√				
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	√				
▪ Be enclosed on at least 3 sides.	√				
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	√				
▪ Have adequate ventilation	√				

▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	√				
▪ Be arranged so that incompatible materials are adequately separated	√				
▪ Disposal of chemical waste should					
▪ Be via a licensed waste collector	√				
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	√				
▪ To be re-user of the waste, under approval from the EPD				√	
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	√				
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	√				
▪ Burning of refuse on construction sites is prohibited by law.	√				
Landscape and Visual					
Preservation of Existing Vegetation					
• Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	√				
• The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	√				
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	√				
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	√				
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.				√	
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.				√	
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	√				
Preservation of Existing Topsoil					
• Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.				√	
• The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion				√	
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.				√	
Permanent and Temporary Works Areas					
• Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.				√	
• Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.				√	

Mitigation Planting					
• Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.				√	
• Use of native plant species predominantly in the planting design for the buffer areas.				√	
Good Site Practices					
• The Environmental Permit should be displaced conspicuously on site.	√				
• Construction noise permits should be posted at site entrance or available for site inspection.				√	
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.		√			Item 4
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	√				
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	√				

Summary of the Weekly Site Inspection:

Item	Details of defective works or observations	Status of the item (closed / continue follow-up)	Proposed Follow Up Action (if required)	Photo Ref.	Target Completion Date
1	Follow-up action to item 3 on 02/07/2014,oil drum without drip tray observed in New Road site was removed.	Closed	---	140709_001	---
2	Follow-up action to item 4 on 02/07/2014,rubbish observed near Fence No. 207 in Pak Fu Shan site was collected.	Closed	---	140709_002	---
3	Oil drum without drip tray was observed near the middle section in New Road site.	Follow-up	The Contractor was reminded to provide drip tray for the oil drum.	140709_003	16/07/14
4	Rubbish was observed in Lo Wu site.	Follow-up	The Contractor was reminded to collect rubbish regularly to keep good site practices.	140709_004	16/07/14
5	Stagnant water was observed near Gate No. 76 in Lo Wu site.	Follow-up	The Contractor was reminded to drain down the stagnant water or add mosquito oil on the water to avoid breeding of mosquitoes.	140709_005	16/07/14

Remark

	Name	Title	Signature	Date
Checked by	C. L. Lau	ET Leader		09 July 2014

Photos

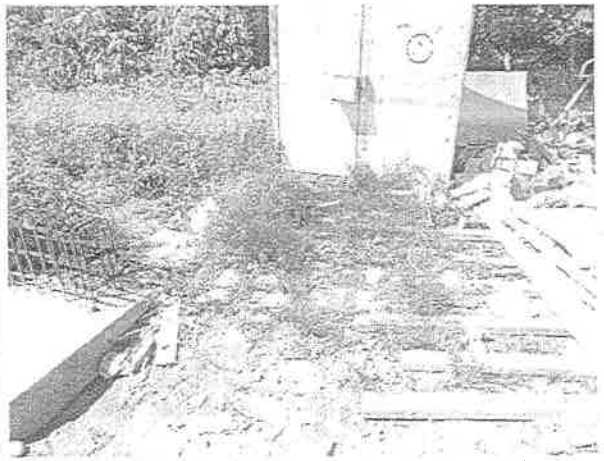


Photo 140709_001 – Rubbish observed near the middle section of New Road site was collected.

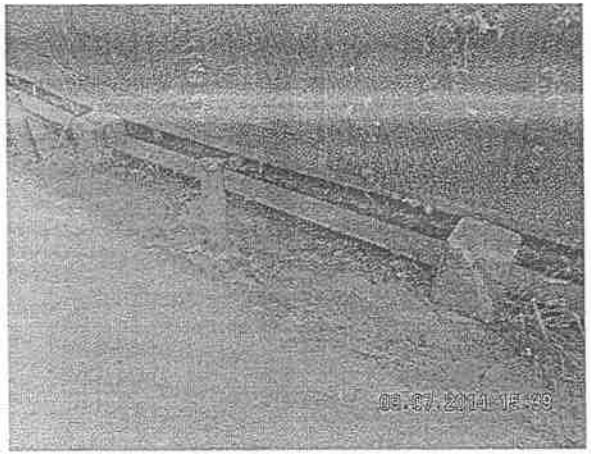


Photo 140709_002 – Rubbish observed near Gate No. 206 in Pak Fu Shan site was collected.

Photo 140709_003 – Oil drum without drip tray was observed near the middle section of New Road site.

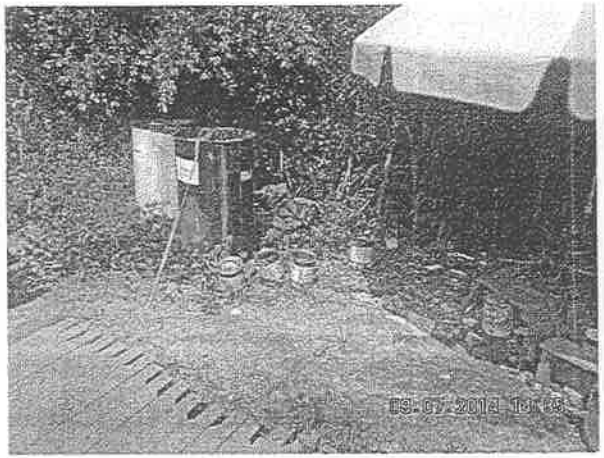


Photo 140709_004 – Rubbish was observed in Lo Wu site.

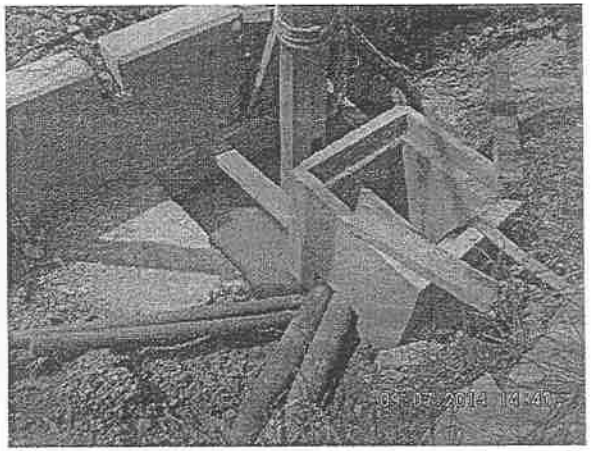


Photo 140709_005 – Stagnant water was observed near Gate No. 76 in Lo Wu site.

WEEKLY SITE INSPECTION CHECKLIST

Inspection Date	16/7/14	Inspected by	RE C.K. Cheung	IEC	Contractor	ET
Time	14:15	Name	C.K. Cheung Yeung	/		Mak

Weather
Condition : Sunny / (Fine) / cloudy / Drizzle / Rain / Storm / Hazy
Wind : Calm / (Light) / Breeze / Strong

Temperature : 32°C
Humidity : High / Moderate / (Low)

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Fugitive Dust Emission					
• Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	✓				
• The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.	Not Limit	✓			Item 4 and 5
• Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.			✓		
• Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.				✓	
• The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	✓				
• The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	✓				
• All dusty materials should be sprayed with water prior to any loading, unloading or transfer.			✓		
• Vehicle speed should be limited to 10 kph except on completed access roads.	✓				
• Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	✓				
• Vehicle and equipment should be switched off while not in use.	✓				
• All plant and equipment should be well maintained e.g. without black smoke emission.	✓				
• Open burning should be prohibited.	✓				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Noise Impact					
▪ 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 adopt.	√				
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	√				
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	√				
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	√				
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	√				
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	√				
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	√				
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.			√		
▪ PME should be covered or shielded by appropriate acoustic materials.	√				
▪ Air compressors and hand held breakers should have noise labels.	√				
▪ Compressors and generators should operate with door closed.	√				
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:	√				
▪ Particular models of plants should be quieter than the standards given in GW-TM.	√				
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	√				
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:				√	
▪ Use of welder is recommended to replace the use of hand-held driller				√	
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.				√	
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.				√	
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	√				
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site	√				
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	√				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	√				
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	√				
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	√				
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	√				
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	√				
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	√				
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	√				
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	√				
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	√				
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	√				
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.				√	
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	√				
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.			√		
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.			√		
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.			√		
▪ Disposal of the waste oil should be done by a licensed collector.			√		
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	√				
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle the chemicals on site.	√				
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.				√	

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.				√	
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.				√	
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	√				
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	√				
▪ C&D materials should be recycled as much as possible on-site.	√				
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	√				
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	√				
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	√				
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	√				
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	√				
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	√				
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	√				
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	√				
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	√				
▪ Be enclosed on at least 3 sides.	√				
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	√				
▪ Have adequate ventilation	√				

▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	√				
▪ Be arranged so that incompatible materials are adequately separated	√				
▪ Disposal of chemical waste should					
▪ Be via a licensed waste collector	√				
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	√				
▪ To be re-user of the waste, under approval from the EPD				√	
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	√				
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	√				
▪ Burning of refuse on construction sites is prohibited by law.	√				
Landscape and Visual					
Preservation of Existing Vegetation					
• Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	√				
• The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	√				
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	√				
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	√				
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.				√	
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.				√	
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	√				
Preservation of Existing Topsoil					
• Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.				√	
• The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion				√	
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.				√	
Permanent and Temporary Works Areas					
• Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.				√	
• Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.				√	

Mitigation Planting					
• Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.				√	
• Use of native plant species predominantly in the planting design for the buffer areas.				√	
Good Site Practices					
• The Environmental Permit should be displaced conspicuously on site.	√				
• Construction noise permits should be posted at site entrance or available for site inspection.				√	
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.		√			Item 6
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	√				
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	√				

Summary of the Weekly Site Inspection:

Item	Details of defective works or observations	Status of the item (closed / continue follow-up)	Proposed Follow Up Action (if required)	Photo Ref.	Target Completion Date
1	Follow-up action to item 3 on 09/07/2014,oil drum without drip tray observed near the middle section in New Road site was removed.	Closed	---	140716_001	---
2	Follow-up action to item 4 on 09/07/2014,rubbish observed in Lo Wu site was collected.	Closed	---	140716_002	---
3	Follow-up action to item 5 on 09/07/2014,mosquito oil was added into the stagnant water observed near Gate No. 76 in Lo Wu site.	Closed	---	140716_003	---
4	Dusty road surface was observed in New Road site.	Follow-up	The Contractor was reminded to spray water to the work site regularly.	140716_004	23/07/14
5	Dusty road surface was observed in Pak Fu Shan site.	Follow-up	The Contractor was reminded to spray water to the work site regularly.	140716_004	23/07/14
6	Rubbish was observed near Fence No. 206 in Pak Fu Shan site.	Follow-up	The Contractor was reminded to collect rubbish regularly to keep good site practices.	140716_006	23/07/14

Remark

	Name	Title	Signature	Date
Checked by	C. L. Lau	ET Leader		16 July 2014

Photos

Photo 140709_001 – Oil drum without drip tray observed near the middle section of New Road site was removed.

Photo 140709_002 – Rubbish observed in Lo Wu site was collected.

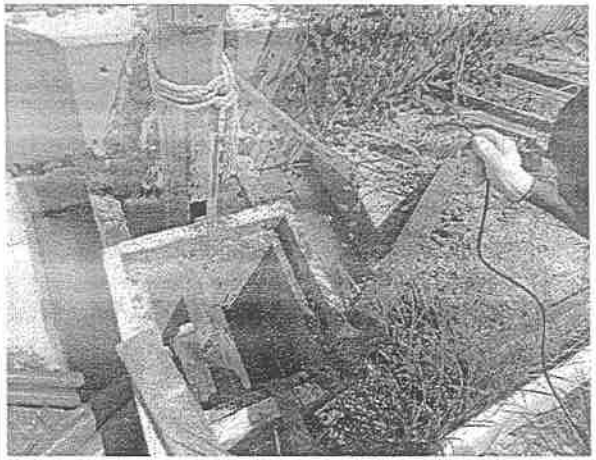


Photo 140709_003 – Mosquito oil was added to the stagnant water near the middle section of New Road site.

Photo 140709_004 – Dusty road surface was observed in New Road site.

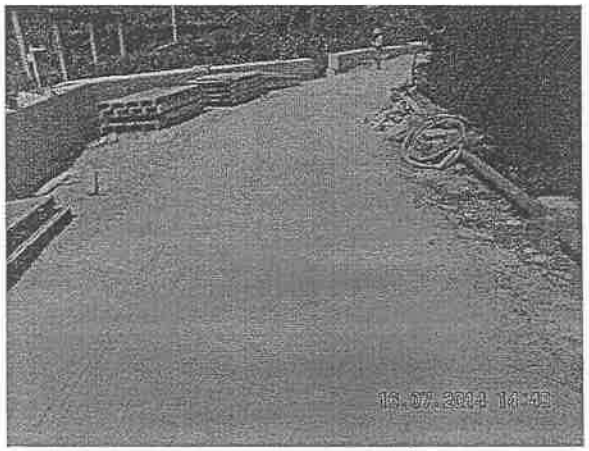


Photo 140709_005 – Dusty road surface was observed in Pak Fu Shan site.

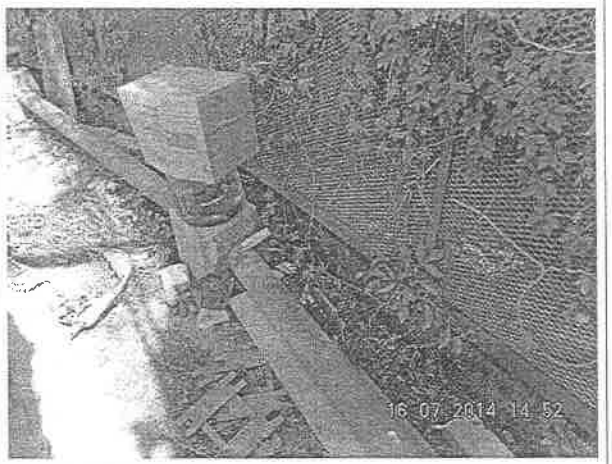


Photo 140709_006 – Rubbish was observed near Fence No. 206 in Pak Fu Shan site.

WEEKLY SITE INSPECTION CHECKLIST

Inspection Date	23 July 2014	Inspected by	RE	IEC	Contractor	ET
Time	14:30	Name	—			C.L. Lam

Weather
Condition : Sunny / Fine / cloudy / Drizzle / Rain / Storm / Hazy
Wind : Calm / Light / Breeze / Strong
Temperature :
Humidity : High / Moderate / Low

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Fugitive Dust Emission					
▪ Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	✓				
▪ The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.	✓				
▪ Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.			✓		
▪ Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.				✓	
▪ The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	✓				
▪ The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	✓				
▪ All dusty materials should be sprayed with water prior to any loading, unloading or transfer.			✓		
▪ Vehicle speed should be limited to 10 kph except on completed access roads.	✓				
▪ Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	✓				
▪ Vehicle and equipment should be switched off while not in use.	✓				
▪ All plant and equipment should be well maintained e.g. without black smoke emission.	✓				
▪ Open burning should be prohibited.	✓				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Noise Impact					
▪ 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 adopt.	√				
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	√				
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	√				
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	√				
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	√				
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	√				
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	√				
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.			√		
▪ PME should be covered or shielded by appropriate acoustic materials.	√				
▪ Air compressors and hand held breakers should have noise labels.	√				
▪ Compressors and generators should operate with door closed.	√				
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:	√				
▪ Particular models of plants should be quieter than the standards given in GW-TM.	√				
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	√				
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:				√	
▪ Use of welder is recommended to replace the use of hand-held driller				√	
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.				√	
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.				√	
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	√				
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site	√				
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	√				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	√				
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	√				
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	√				
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	√				
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	√				
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	√				
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	√				
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	√				
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	√				
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	√				
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.				√	
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	√				
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.			√		
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.			√		
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.			√		
▪ Disposal of the waste oil should be done by a licensed collector.			√		
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	√				
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle the chemicals on site.	√				
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.				√	

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.				√	
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.				√	
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	√				
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	√				
▪ C&D materials should be recycled as much as possible on-site.	√				
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	√				
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	√				
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	√				
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	√				
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	√				
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	√				
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	√				
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	√				
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	√				
▪ Be enclosed on at least 3 sides.	√				
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	√				
▪ Have adequate ventilation	√				

▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	√				
▪ Be arranged so that incompatible materials are adequately separated	√				
▪ Disposal of chemical waste should					
▪ Be via a licensed waste collector	√				
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	√				
▪ To be re-user of the waste, under approval from the EPD				√	
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	√				
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	√				
▪ Burning of refuse on construction sites is prohibited by law.	√				
Landscape and Visual					
Preservation of Existing Vegetation					
• Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	√				
• The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	√				
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	√				
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	√				
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.				√	
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.				√	
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	√				
Preservation of Existing Topsoil					
• Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.				√	
• The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion				√	
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.				√	
Permanent and Temporary Works Areas					
• Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.				√	
• Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.				√	

Mitigation Planting					
• Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.				√	
• Use of native plant species predominantly in the planting design for the buffer areas.				√	
Good Site Practices					
• The Environmental Permit should be displaced conspicuously on site.	√				
• Construction noise permits should be posted at site entrance or available for site inspection.				√	
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.	√				
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	√				
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	√				

Summary of the Weekly Site Inspection:

Item	Details of defective works or observations	Status of the item (closed / continue follow-up)	Proposed Follow Up Action (if required)	Photo Ref.	Target Completion Date
1	Follow-up action to item 4 on 16/07/2014,dusty road surface was sprayed with water near the middle section in New Road site.	Closed	---	140723_001	---
2	Follow-up action to item 5 on 16/07/2014,dusty road surface was sprayed with water in Pak Fu Shan site.	Closed	---	140723_002	---
3	Follow-up action to item 6 on 16/07/2014, rubbish observed near Fence No. 206 in Pak Fu Shan site was collected.	Closed	---	140723_003	---

Remark

	Name	Title	Signature	Date
Checked by	C. L. Lau	ET Leader		23 July 2014

Photos

Photo 140723_001 – Water was sprayed to the work site near the middle section of New Road site.

Photo 140723_002 – Water was sprayed to the work site in Pak Fu Shan site.

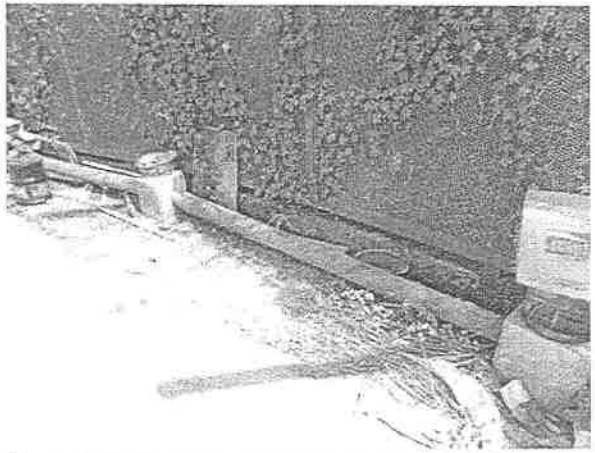


Photo 140723_003 – Rubbish observed near Fence No. 206 in Pak Fu Shan site was collected

WEEKLY SITE INSPECTION CHECKLIST

Inspection Date	30/7/14	Inspected by	RE	IEC	Contractor	ET
Time	13:15	Name	/	/	/	Mak

Weather
Condition : Sunny / (Fine) / cloudy / Drizzle / Rain / Storm / Hazy
Wind : Calm / (Light) / Breeze / Strong

Temperature : 33°C
Humidity : High / Moderate / (Low)

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Fugitive Dust Emission					
• Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	✓				
• The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.	✓				
• Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.			✓		
• Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.				✓	
• The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	✓				
• The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	✓				
• All dusty materials should be sprayed with water prior to any loading, unloading or transfer.			✓		
• Vehicle speed should be limited to 10 kph except on completed access roads.	✓				
• Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	✓				
• Vehicle and equipment should be switched off while not in use.	✓				
• All plant and equipment should be well maintained e.g. without black smoke emission.	✓				
• Open burning should be prohibited.	✓				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Noise Impact					
▪ 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 adopt.	√				
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	√				
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	√				
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	√				
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	√				
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	√				
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.	√				
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.			√		
▪ PME should be covered or shielded by appropriate acoustic materials.	√				
▪ Air compressors and hand held breakers should have noise labels.	√				
▪ Compressors and generators should operate with door closed.	√				
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:	√				
▪ Particular models of plants should be quieter than the standards given in GW-TM.	√				
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	√				
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:				√	
▪ Use of welder is recommended to replace the use of hand-held driller				√	
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.				√	
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.				√	
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	√				
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site	√				
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	√				

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	√				
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	√				
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	√				
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	√				
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	√				
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	√				
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	√				
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	√				
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	√				
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	√				
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.				√	
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	√				
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.			√		
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.			√		
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.			√		
▪ Disposal of the waste oil should be done by a licensed collector.			√		
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	√				
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle the chemicals on site.	√				
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.				√	

Environmental Checklist	Implementation Stages*				Remark
	Yes	No	Not Obs	N/A	
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.				√	
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.				√	
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	√				
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	√				
▪ C&D materials should be recycled as much as possible on-site.	√				
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	√				
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	√				
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	√				
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	√				
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	√				
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	√				
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	√				
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	√				
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	√				
▪ Be enclosed on at least 3 sides.	√				
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	√				
▪ Have adequate ventilation	√				

▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	√				
▪ Be arranged so that incompatible materials are adequately separated	√				
• Disposal of chemical waste should					
▪ Be via a licensed waste collector	√				
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	√				
▪ To be re-user of the waste, under approval from the EPD				√	
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	√				
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	√				
▪ Burning of refuse on construction sites is prohibited by law.	√				
Landscape and Visual					
Preservation of Existing Vegetation					
• Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	√				
• The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	√				
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	√				
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	√				
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.				√	
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.				√	
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	√				
Preservation of Existing Topsoil					
• Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.				√	
• The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion				√	
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.				√	
Permanent and Temporary Works Areas					
• Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.				√	
• Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.				√	

Mitigation Planting					
• Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.				√	
• Use of native plant species predominantly in the planting design for the buffer areas.				√	
Good Site Practices					
• The Environmental Permit should be displaced conspicuously on site.	√				
• Construction noise permits should be posted at site entrance or available for site inspection.				√	
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.	√				
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	√				
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	√				

Summary of the Weekly Site Inspection:

Item	Details of defective works or observations	Status of the item (closed / continue follow-up)	Proposed Follow Up Action (if required)	Photo Ref.	Target Completion Date

Remark

No new item was observed during the site inspection and audit on 30 July 2014.

	Name	Title	Signature	Date
Checked by	C. L. Lau	ET Leader		30 July 2014

Photos

Appendix F

Implementation Schedule of Mitigation Measures

Contract No.: SS Y307 - Construction of a Secondary Boundary Fence and
New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)

Environmental Mitigation Implementation Schedule

Environmental Protection Measures	Location	Implementation Status			
		Implemented	Not implemented	Not Observed	Not Applicable
Air Quality					
▪ Any excavated dusty materials or stockpile of dusty materials should be covered entirely by impervious sheeting or sprayed with water so as to maintain the entire surface wet, and recovered or backfilled or reinstated within 24 hours of the excavation or unloading.	All areas	√			
▪ The working area of excavation should be sprayed with water immediately before, during and immediately after the operations so as to maintain the entire surface wet.	All areas		√		
▪ Dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure that the dusty materials do not leak from the vehicle.	All areas			√	
▪ Where a site boundary adjoins a road, streets or other area accessible to the public, hoarding of not less than 2.4m high from ground level should be provided along the entire length except for a site entrance or exit.	Site boundary				√
▪ The area where vehicle washing takes place and the section of the road between the washing facilities and the exit point should be paved with concrete, bituminous materials or hardcores.	All areas	√		√	
▪ The portion of road leading only to a construction site that is within 30m of a designated vehicle entrance or exit should be kept clear of dusty materials.	Site egress	√			
▪ All dusty materials should be sprayed with water prior to any loading, unloading or transfer.	All areas			√	
▪ Vehicle speed should be limited to 10 kph except on completed access roads.	All access roads	√			
▪ Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	All areas	√			
▪ Vehicle and equipment should be switched off while not in use.	All areas	√			
▪ All plant and equipment should be well maintained e.g. without black smoke emission.	All areas	√			
▪ Open burning should be prohibited.	All areas	√			
Noise Impact					
▪ 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 adopt.	All areas	√			
▪ The approved method of working, equipment and sound-reducing measures (e.g. use of silenced type of equipment, etc.) shall be adapted.	All areas	√			
▪ The constructions works should be scheduled to minimize noise nuisance. Concurrent noisy works should be carried out at different time slots or spread around the construction sites in order to help to reduce the cumulative noise effect produced in the construction process.	All areas	√			
▪ Noisy equipment and noisy activities shall be located as far away from NSRs as is practical.	All areas	√			
▪ Machines and plant that may be in intermittent use should be shut down between work periods or should be throttled down to a minimum.	All areas	√			
▪ Well maintained plant should be operated on-site and plant should be serviced regularly during the construction works.	All areas	√			
▪ Material stockpiles and other structures should be effectively utilised, where practicable, to screen noise from on-site construction activities.		√			
▪ Mobile or movable noise barriers should be erected near to the construction plants to reduce the noise levels from stationary items of Powered mechanical equipment (PME) whenever practicable.	All areas			√	
▪ PME should be covered or shielded by appropriate acoustic materials.	All areas	√			
▪ Air compressors and hand held breakers should have noise labels.	All areas	√			
▪ Compressors and generators should operate with door closed.	All areas	√			

Environmental Protection Measures	Location	Implementation Status			
		Implemented	Not implemented	Not Observed	Not Applicable
Noise Impact					
▪ With construction / demolition work undertaken at a distance of 60m or less to the NSRs, **Level 1 – use of Quiet Plant and Moveasble Noise barrier shall be adopted. Below mitigation measures** should be included:					
▪ Particular models of plants should be quieter than the standards given in GW-TM.	All areas	√			
▪ Purpose-built movable noise barriers should be used to mitigate construction noise directly at sources that are not usually mobile provide that the direct line of sight to the source is blocked.	All areas	√			
▪ With demolition work undertaken at a distance of 12m or less to the NSRs, **Level 2 – Alternative demolition method of existing boundary fence** should be adopted. Below mitigation measures should be included:					
▪ Use of welder is recommended to replace the use of hand-held driller	All areas				√
▪ Use of hand-held breaker with movable noise barrier is recommended to replace the use of mini-robot mounted breaker; and the duration for the used of hand-held breaker is minimal as only the surface level of the footing to be broken.	All areas				√
▪ The removal of the footing of the existing boundary fence should be carried by concrete crusher mini-robot mounted after the surface level broken by hand-held breaker.	All areas				√
Water Quality					
Mitigation Measures for General Construction Activities					
▪ The site should be confined to avoid silt runoff to the site	All areas	√			
▪ No discharge of silty water into the storm drain and drainage channel within and the vicinity of the site	All areas		√		
▪ Any soil contaminated with chemicals / oils shall be removed from site and the void created shall be filled with suitable materials	All areas	√			
▪ Stockpiles to be covered by tarpaulin to avoid spreading of materials during rainstorms	All areas		√		
▪ Suitable containers shall be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	All areas	√			
▪ Chemical waste containers shall be labelled with appropriate warning signs in English and Chinese to avoid accidents. Clear instructions showing what action to take in the event of an accidental should be provided.	All areas	√			
▪ Storage areas shall be selected at safe locations on site and adequate space shall be allocated to the storage area.	All areas	√			
▪ Any construction plant which causes pollution to the water system due to leakage of oil or fuel shall be removed off-site immediately.	All areas	√			
▪ Spillage or leakage of chemical waste to be controlled by using suitable absorbent materials.	All areas	√			
▪ Chemicals will always be stored on drip trays or in bunded areas where the volume is 110% of the stored volume.	All areas	√			
▪ Regular clearance of domestic waste generated in the temporary sanitary facilities to avoid waste water spillage.	All areas	√			
▪ Temporary sanitary facilities to be provided for on-site workers during construction.	All areas	√			
Mitigation Measures for Concreting Works					
▪ A temporary drainage channel and associated facilities should be provided to collect the runoff generated and prevent concrete-contaminated water from entering watercourses. Adjustment of pH can be achieved by adding a suitable neutralizing reagent to wastewater prior to discharge.	All areas	√			
▪ **For work sites of Section 3 in the proximity of Lin Ma Hang Stream SSSI**, the concreting works should be temporarily isolated with proper method, such as by placing of sandbags or silt curtains with lead edge at bottom and properly supported props.	All areas				√
Mitigation Measures for Soil Excavation and Stockpiling					
▪ Excavated soil with needs to be temporarily stockpiled should be stored in a specially designated area and provided with a tarpaulin cover to avoid runoff into the drainage channels.	All areas	√			

Contract No.: SS Y307 - Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)

Environmental Protection Measures	Location	Implementation Status			
		Implemented	Not implemented	Not Observed	Not Applicable
Water Quality					
Mitigation Measures for Site Depot					
▪ All compounds in works areas should be located on areas of hard standing with provision of drainage channels and settlement ponds where necessary to allow interception and controlled release of settled / treated water.	All areas			√	
▪ Hard standing compounds should drain via an oil interceptor. The oil interceptor should be regularly inspected and cleaned to avoid wash-out of oil during storm conditions. A by pass should be provided to avoid overload of the interceptor's capacity.	All areas			√	
▪ Any contractor generating waste oil or other chemicals as a result of his activities should be register as a chemical waste producer.	All areas			√	
▪ Disposal of the waste oil should be done by a licensed collector.	All areas			√	
▪ Good housekeeping practices should be implemented to minimise careless spillage and to keep the storage and the work space in a tidy and clean condition.	All areas	√			
▪ Appropriate training including safety codes and relevant manuals should be given to the personnel who regularly handle chemicals.	All areas	√			
Mitigation Measures for Construction of Checkpoint at Shek Chung Au					
▪ Sewage system should be constructed to divert domestic sewage, which will be generated from the sanitary facilities provided in the new checkpoint at Shek Chung Au, to public sewer connected to government sewage treatment facilities.	All areas				√
Waste Management					
Site Clearance					
▪ The topsoil and vegetation removed and excavated material may have to be temporarily stockpiled on site. Control measures should be taken at the stockpile area to prevent the generation of dust and pollution of stormwater channels, fish ponds or river channels.	All areas				√
▪ During the wet season, stockpiling of excavated materials should be avoided to eliminate the risk of blocking drains.	All areas				√
Construction and Demolition Materials					
▪ Careful design, planning and good site management can minimize over-ordering and generation of waste materials such as concrete mortars and cement grouts.	All areas	√			
▪ The design of formwork should maximize the use of standard wooden panels so to achieve high reuse levels. Alternatives such as steel formwork or plastic facing should be considered to increase the potential for reuse.	All areas	√			
▪ C&D materials should be recycled as much as possible on-site.	All areas	√			
▪ Proper segregation of waste on-site will increase the feasibility of certain components of the waste system by the recycling contractors.	All areas	√			
▪ Different areas of the worksite shall be designated for such segregation and storage wherever site conditions permit.	All areas	√			
▪ Trip-ticket system should be employed to monitor the disposed of C&D material and solid at public filling facilities and landfills, and to control fly-tipping.	All areas	√			
Chemical Waste					
▪ For those processes which generate chemical waste, it may be possible to find alternatives which generate reduced quantities or even no chemical waste, or less dangerous types of chemical waste.	All areas	√			
▪ Chemical waste that is produced, as defined by Schedule 1 of the Waste Disposal (Chemical Waste) (General) Regulation, should be handled in according with the Code of Practice on the Packaging, Handling and Storage of Chemical Waste as follow:	All areas	√			
▪ Containers used for the storage of chemical wastes should:					
▪ Be suitable for the substance they are holding, resistant to corrosion, maintained in a good condition, and securely closed.	All areas	√			
▪ Have a capacity of less than 450 litres unless the specifications have been approved by the EPD.	All areas	√			
▪ Display a label in English and Chinese in accordance with instructions prescribed in Schedule 1 of the Regulations	All areas	√			

Environmental Protection Measures	Location	Implementation Status			
		Implemented	Not implemented	Not Observed	Not Applicable
Waste Management					
Chemical Waste					
▪ The storage area for chemical wastes should:					
▪ Be clearly labelled and used solely for the storage of chemical waste.	All areas	√			
▪ Be enclosed on at least 3 sides.	All areas	√			
▪ Have an impermeable floor and bounding, of capacity to accommodate 110% of the volume of the largest container o 20% by volume of the chemical waste stored in that area whichever is the greatest.	All areas	√			
▪ Have adequate ventilation	All areas	√			
▪ Be covered to prevent rainfall entering (water collected within the bund must be tested and disposed as chemical waste if necessary)	All areas	√			
▪ Be arranged so that incompatible materials are adequately separated	All areas	√			
▪ Disposal of chemical waste should					
▪ Be via a licensed waste collector	All areas	√			
▪ Be to a facility licensed to receive chemical waste, such as the Chemical Waste Treatment Facility which also offers a chemical waste collection service and can supply the necessary storage containers	All areas	√			
▪ To be re-user of the waste, under approval from the EPD	All areas				√
General Refuse					
▪ General refuse should be stored in enclosed bins or compaction units separate from C&D and chemical waste.	All areas	√			
▪ A reputable waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D and chemical waste, on a regular basis to minimise odour, pest and litter impacts.	All areas	√			
▪ Burning of refuse on construction sites is prohibited by law.	All areas	√			
Landscape and Visual					
Preservation of Existing Vegetation					
▪ Trees that have high amenity or ecology value and contribute most to the landscape and visual amenity of the site and its immediate environs should be retained.	All areas	√			
▪ The storage of materials including fuel, the movement of construction vehicles, and the refuelling and washing of equipment including concrete mixers within the precautionary area should be prohibited.	All areas	√			
▪ Phase segmental root pruning for trees should be retained and transplanted over a suitable period (determined by species and size) prior to lifting or site formation works which affect the existing rootball of trees identified for retention. The extent of the pruning will be based on the size and the species of the tree in each case.	All areas	√			
▪ Pruning of the branches of existing trees identified for transplantation and retention should be based on the principle of crown thinning maintaining their form and amenity value.	All areas	√			
▪ Existing vegetation should be watered particularly during periods of excavation when the water table beneath the existing vegetation is lowered.	All areas				√
▪ The damaged vegetation should be rectified and repaired following the construction phase to it's original condition prior to the commencement of the works or replacement using specimens of the same species, size and form where appropriate to the design intention of the area affected.	All areas				√
▪ All works affecting the trees identified for retention and transplantation should be monitored carefully. This includes the key stages in the preparation of the trees, the implementation of protection measures and health monitoring through out the construction period.	All areas	√			

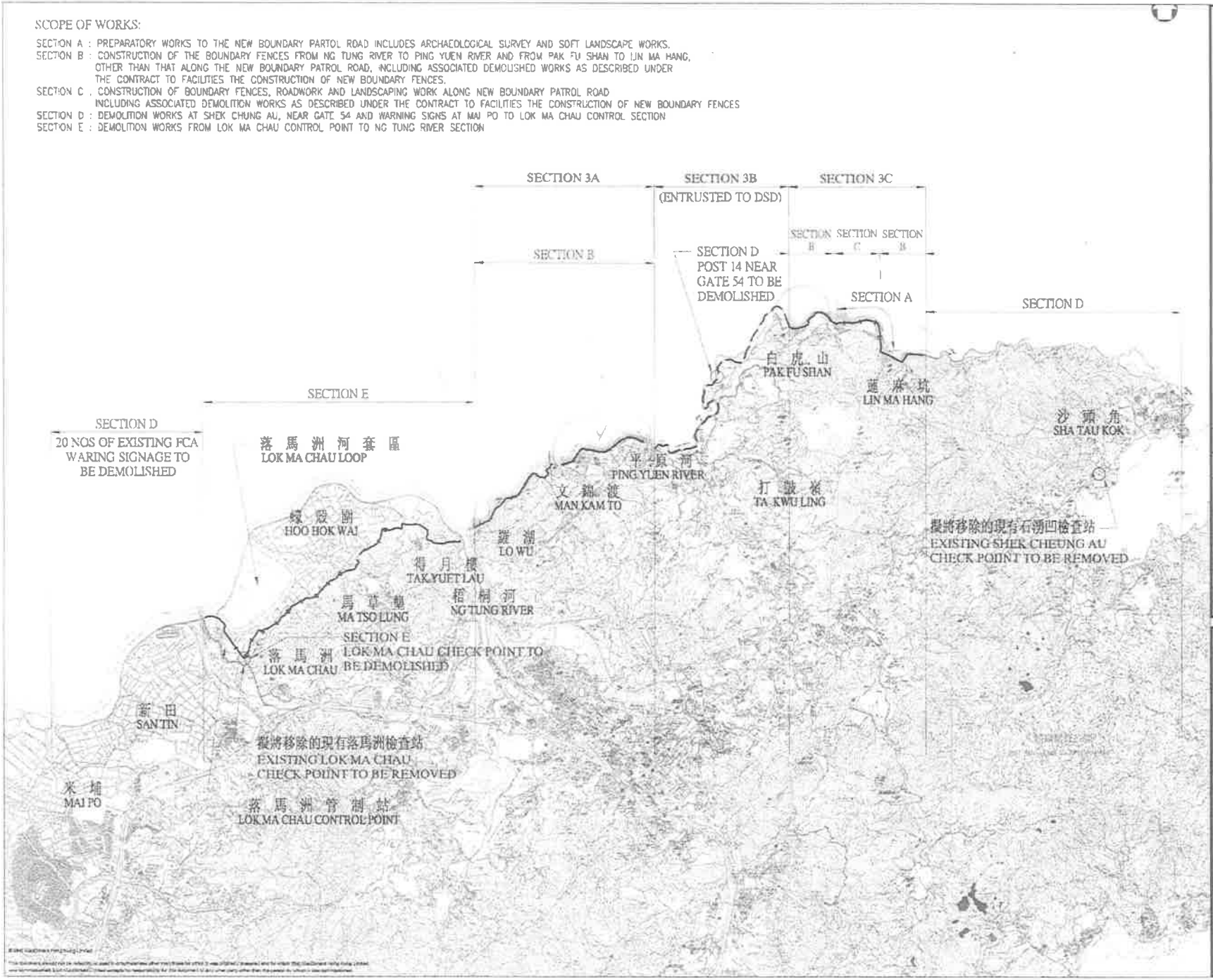
Environmental Protection Measures	Location	Implementation Status			
		Implemented	Not implemented	Not Observed	Not Applicable
Landscape and Visual					
Preservation of Existing Topsoil					
▪ Topsoil disturbed during the construction phase should be tested using a standard soil testing methodology and where it is found to be worthy of retention stored for re-used.	All areas				√
▪ The soil should be stockpiled to a maximum height of 2m and will be either temporarily vegetated with hydroseeded grass during construction or covered with a waterproof covering to prevent erosion	All areas				√
▪ The stockpile should be turned over on a regular basis to avoid acidification and the degradation of the organic material, and reused after completion.	All areas				√
Permanent and Temporary Works Areas					
▪ Where appropriate to the final design the landscape of these works areas should be restored following the completion of the construction phase.	All areas				√
▪ Construction site controls should be enforced including the storage of materials, the location and appearance of site accommodation and the careful design of site lighting to prevent light spillage.	All areas				√
Mitigation Planting					
▪ Replanting of disturbed vegetation should be undertaken at the earliest possible stage of the construction phase.	All areas				√
▪ Use of native plant species predominantly in the planting design for the buffer areas.	All areas				√
Good Site Practices					
▪ The Environmental Permit should be displaced conspicuously on site.	All areas	√			
▪ Construction noise permits should be posted at site entrance or available for site inspection.	All areas				√
▪ Good site practices should be adopted to clean the rubbish and litter on a regular basis so as to prevent the rubbish and litter from dropping into the nearby environment.	All areas		√		
▪ Regular cleaning and maintenance programme for waste storage area, drainage systems, silt traps, sumps and oil interceptors.	All areas	√			
▪ Proper storage and site practices to minimise the potential for damage or contamination of construction materials.	All areas	√			

Appendix G

Site General Layout plan

SCOPE OF WORKS:

SECTION A : PREPARATORY WORKS TO THE NEW BOUNDARY PARTOL ROAD INCLUDES ARCHAEOLOGICAL SURVEY AND SOFT LANDSCAPE WORKS.
SECTION B : CONSTRUCTION OF THE BOUNDARY FENCES FROM NG TUNG RIVER TO PING YUEN RIVER AND FROM PAK FU SHAN TO LIN MA HANG, OTHER THAN THAT ALONG THE NEW BOUNDARY PATROL ROAD, INCLUDING ASSOCIATED DEMOLISHED WORKS AS DESCRIBED UNDER THE CONTRACT TO FACILITIES THE CONSTRUCTION OF NEW BOUNDARY FENCES.
SECTION C . CONSTRUCTION OF BOUNDARY FENCES, ROADWORK AND LANDSCAPING WORK ALONG NEW BOUNDARY PATROL ROAD INCLUDING ASSOCIATED DEMOLITION WORKS AS DESCRIBED UNDER THE CONTRACT TO FACILITIES THE CONSTRUCTION OF NEW BOUNDARY FENCES
SECTION D : DEMOLITION WORKS AT SHEK CHUNG AU, NEAR GATE 54 AND WARNING SIGNS AT MAI PO TO LOK MA CHAU CONTROL SECTION
SECTION E : DEMOLITION WORKS FROM LOK MA CHAU CONTROL POINT TO NG TUNG RIVER SECTION



Notes

LEGEND:

- PROPOSED NEW SECTIONS OF PRIMARY BOUNDARY FENCE OR PROPOSED SECONDARY BOUNDARY FENCE ALONG EXISTING BOUNDARY PATROL ROAD
- PROPOSED NEW SECTIONS OF BOUNDARY PATROL ROAD WITH PRIMARY AND SECONDARY BOUNDARY FENCES
- EXISTING BOUNDARY PATROL ROAD TO BE DEMOLISHED
- PROPOSED REALIGNMENT OF BOUNDARY PATROL ROAD AND PRIMARY BOUNDARY FENCE AND PROPOSED SECONDARY BOUNDARY FENCE ENTRUSTED TO DRAINAGE SERVICES DEPARTMENT FOR THEIR CONSTRUCTION UNDER ANOTHER PROJECT NAMELY "REGULATION OF SHENZHEN RIVER STAGE 4 – ANCILLARY ROAD WORKS"

No.	Date	Description	Initial
0	01/12	ISSUE FOR TENDER	

Revision

Consultant Project No.
215727

Mott MacDonald

	Name	Signed	Date
Designed	DC		09-DEC-11
Drawn	LYK	LYK	09-DEC-11
Checked	LW		09-DEC-11
Approved	TT		09-DEC-11

Contract No.
SS Y307

File No.
ASD/201/7906

Project No.
12GB

Consultant Agreement No.
9SN005

Contract
CONSTRUCTION OF A SECONDARY BOUNDARY FENCE AND NEW SECTIONS OF PRIMARY BOUNDARY FENCE AND BOUNDARY PATROL ROAD (PHASE 2)

Drawing Title
GENERAL LAYOUT PLAN

Drawing No.
FIGURE 1

Scale
N.T.S.

The Architect of the Contract

01/12
(Date)

ARCHITECTURAL SERVICES DEPARTMENT

Appendix H

Monthly Summary Waste Flow Table

Name of Department: ArchSD

Contract No.: SS Y307

Monthly Summary Waste Flow Table for 2014 (year)

Month	Actual Quantities of Inert C&D Materials Generated Monthly						Actual Quantities of C&D Wastes Generated Monthly				
	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 (see Note 3)	Chemical Waste	Others, e.g. general refuse
	(in '000m^3)	(in '000m^3)	(in '000m^3)	(in '000m^3)	(in '000m^3)	(in '000m^3)	(in '000 kg)	(in '000kg)	(in '000kg)	(in '000kg)	(in '000m^3)
Jan	0	0	0	0	0	0	0	0.01	0	0	0
Feb	0	0	0	0	0	0.052	0	0.02	0	0	0
Mar	0	0	0	0	0	0.884	0	0	0	0.1	0
Apr	0	0	0	0	0	0.906	0	0	0	0	0
May	0	0	0	0	0	0	0	0	0	0	0
June	0	0	0	0	0	0	0	0	0	0	0
July	0	0	0	0	0	0	0	0	0	0	0
Sub-total	0	0	0	0	0	1.842	0	0.03	0	0.1	0
Aug											
Sept											
Oct											
Nov											
Dec											
Total											

Notes: The performance targets are given in PS Clause 6(14).

The waste flow table shall also include C&D materials that are specified in the Contract to be imported for use at the Site.

Plastics refer to plastic bottles/containers, plastic sheets/foam from packaging material.

Appendix I

Monitoring Schedule for this Reporting Month and the Coming Month

東業德勤測試顧問有限公司
ETS-TESTCONSULT LIMITED

Contract No.: SS Y307 - Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)

Schedule for Noise Monitoring (NM) and Weekly Site Inspection (Weekly SI)

July 2014

Sun	Mon	Tue	Wed	Thu	Fri	Sat
		1	2 NM Weekly SI	3	4	5
6	7	8	9 NM Weekly SI	10	11	12
13	14	15	16 NM Weekly SI	17	18	19
20	21	22	23 NM Weekly SI	24	25	26
27	28	29	30 NM Weekly SI	31		

東業德勤測試顧問有限公司
ETS-TESTCONSULT LIMITED

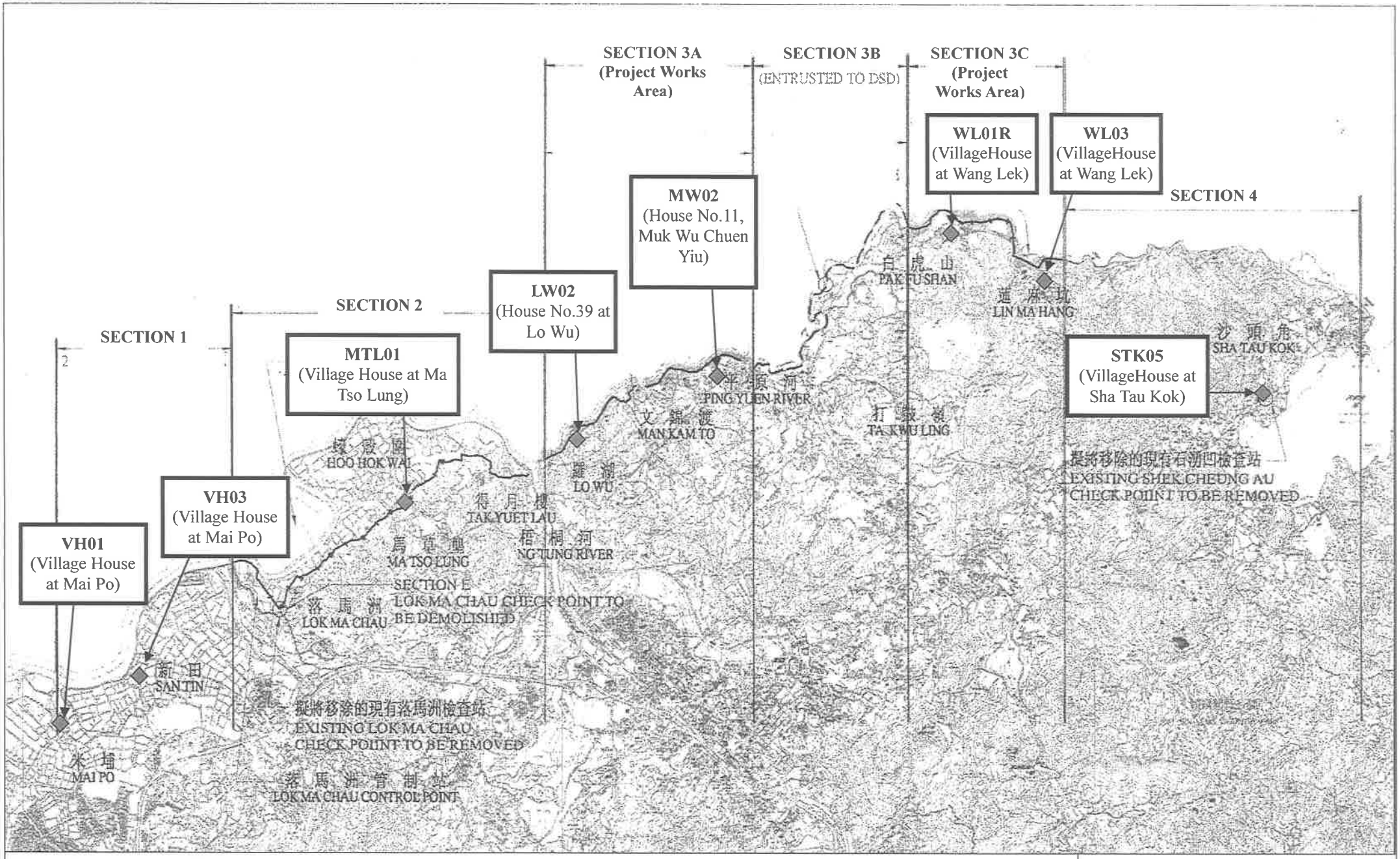
Contract No.: SS Y307 - Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)

Schedule for Noise Monitoring (NM) and Weekly Site Inspection (Weekly SI)

August 2014

Sun	Mon	Tue	Wed	Thu	Fri	Sat
					1	2
3	4	5	6 NM Weekly SI	7	8	9
10	11	12	13 NM Weekly SI	14	15	16
17	18	19	20 NM Weekly SI	21	22	23
24	25	26	27 NM Weekly SI	28	29	30
31						

Figure



Title: Locations of Noise Monitoring Stations	**ETS-Testconsult Ltd**
Project: Contract No. SS Y307 – Construction of a Secondary Boundary Fence and New Sections of Primary Boundary Fence and Boundary Patrol Road (Phase 2)	**Figure 1**