

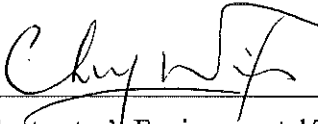
Civil Engineering and Development Department

**Contract No.KLN/2013/16
Environmental Monitoring Works for
Kai Tak Development
Variation Order No.2
Demolition of ex-GFS Building**

Final EM&A Report

June 2015

(Version 1.1)

Certified By 
(Contractor's Environmental Team Leader)

REMARKS:

The information supplied and contained within this report is, to the best of our knowledge, correct at the time of printing.

CINOTECH accepts no responsibility for changes made to this report by third parties.

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EXECUTIVE SUMMARY

Introduction

1. This is the final Environmental Monitoring and Audit (EM&A) Report prepared by Cinotech Consultants Limited under Variation Order No. 2 of Contract No. KLN/2013/16 – Environmental Monitoring Works for Demolition of ex-GFS Building. This report documents the findings of EM&A Works conducted between 19th September 2014 and 2nd June 2015.
2. The Works under the Project was substantially completed in 7th May 2015, as notified by the Contractor and confirmed by the Project Proponent (CEDD). The environmental monitoring and audit was terminated on 2nd June 2015 as verified by the Independent Environmental Checker of the Project (Mott MacDonald Hong Kong Limited).

Environmental Audit Works

3. Environmental audit works for the Project were performed regularly as stipulated in the EM&A Manual. The implementation of the environmental mitigation measures and environmental complaint handling procedures were also checked. Details of the audit findings and implementation status are presented in the Monthly EM&A Reports.

Complaints and Prosecutions

4. No environmental complaints were received in the whole project period. Details of the complaints were shown in **Appendix B**.
5. No environmental prosecution was received throughout the whole Project.

Conclusion

6. EM&A programme was implemented to monitor and mitigate impacts arising from the Project. The findings of the EM&A works suggest that environmental impacts arising from the demolition of ex-GFS Building were reduced to a minimum. No non-compliance was recorded during the project period. The environmental performance of the Project was considered acceptable.

1. INTRODUCTION

Background

- 1.1 The former Kai Tak Airport is located in the south-eastern part of Kowloon Peninsula, comprising the north and south aprons and runway areas extending into the Kowloon Bay. The entire airport site covers a total land area of about 260 hectares, of which the land area other than the north apron is about 96 hectares.
- 1.2 In 2002, the Chief Executive in Council approved the Kai Tak Outline Zoning Plans (No. S/K19/3 and S/K21/3) to provide the statutory framework to proceed with the South East Kowloon Development at the former Kai Tak Airport. However, following the judgment of the Court of Final Appeal in January 2004 regarding the Harbour reclamation, the originally proposed development which involved reclamation has to be reviewed.
- 1.3 In order to make available the remaining former Kai Tak Airport site for the Kai Tak Development (KTD), the Decommissioning of the Former Kai Tak Airport Other than the North Apron is proposed to demolish remaining existing structures / buildings and remove abandoned facilities of the former Kai Tak Airport within the Project boundary; identify and clean up contaminated areas associated with the previous airport operation within the Project boundary; and implement appropriate mitigation measures to ensure the site would be safe and free of hazards for the planned future use.
- 1.4 An Environmental Impact Assessment (EIA) Study for the Project has been undertaken in accordance with the EIA Study Brief (No. ESB-152/2006) and the Technical Memorandum on Environmental Impact Assessment Process (EIAO-TM). An EIA Report was approved by the Environmental Protection Department (EPD) on 4 March 2009. Environmental Permit (EP) No. EP-339/2009/A was issued on 18 June 2009 for the decommissioning designated project to Civil Engineering and Development Department (CEDD) as the Permit Holder. The decontamination works under the project was substantially completed in February 2010 as certified by the Resident Engineer of the Project (AECOM).
- 1.5 The demolition works for the ex-GFS building were awarded to Able Engineering Co., Ltd (The Contractor) in August 2014. Cinotech Consultants Limited (Cinotech) was commissioned by Civil Engineering and Development Department (CEDD) under Variation Order No. 2 of Contract No. KLN/2013/16 as the Environmental Team (ET) to undertake the Environmental Monitoring and Audit works for demolition of the ex-Government Flying Services (GFS) building at Kai Tak (hereafter referred as “the Project”).
- 1.6 This is the Final EM&A report summarizing the EM&A works for the Project between 19th September 2014 and 2nd June 2015.

2. PROJECT CHARACTERISTICS

Project Organizations

- 2.1. Different parties with different levels of involvement in the project organization include:
- Project Proponent – Civil Engineering and Development Department (CEDD)
 - Environmental Team (ET) – Cinotech Consultants Limited.
 - Independent Environmental Checker (IEC) – Mott MacDonald Hong Kong Limited
 - Contractor – Able Engineering Co., Ltd
- 2.2. The responsibilities of respective parties are detailed in Sections 1.4.1 to 1.4.9 of the approved EM&A Manual of the Project.
- 2.3. The key contacts of the Project are shown in **Table 2.1**.

Table 2.1 Key Project Contacts

Party	Role	Name	Phone No.	Fax No.
CEDD	Project Proponent	Ms. Hannah Chiu	2301 1449	2369 4980
Cinotech	Environmental Team	Dr. Priscilla Choy	2151 2089	3107 1388
		Mr. Kevin Lam	2151 2099	
Mott MacDonald	Independent Environmental Checker	Mr. Terence Kong	2828 5919	2827 1823
Able Engineering	Contractor	Mr. Daniel Lau	2796 0960	2796 0519
		Mr. Yu Cheuk Hang		

Construction Programme

- 2.4. The site activities undertaken in the construction period included:
- Hoarding erection;
 - Propping erection;
 - Removal of loose furniture;
 - Demolition of steel decking;
 - Demolition of cantilever structure;
 - Demolition of long span steel trusses;
 - Demolition of long span beam;
 - Demolition of reinforced concrete structure; and
 - Site clearance.

- 2.5. The EM&A programme requires environmental site audit for decommissioning activities. The EM&A requirements for each parameter are described in the following sections, including:
- Environmental mitigation measures, as recommended in the project EIA study final report; and
 - Environmental requirements in contract documents.
- 2.6. The advice on the implementation status of environmental protection and pollution control/mitigation measures is presented in **Appendix A**.

3. ENVIRONMENTAL REVIEW

Environmental Site Audit

- 3.1 Site audit provided a direct means to trigger and enforce the specified environmental protection and pollution control measures. The ET undertook site audits routinely to ensure that appropriate environmental protection and pollution control mitigation measures are properly implemented. Additionally, the ET was responsible for defining the scope of the inspections, detailing any deficiencies that are identified, and reporting any necessary action or mitigation measures that were implemented as a result of the audit.
- 3.2 Site audits were carried out once per week. The areas of inspection included the general environmental conditions in the vicinity of the site, pollution control and mitigation measure within the site, and also review the environmental conditions outside the site area which are likely to be affected, directly or indirectly, by the site activities.
- 3.3 In the construction period, total 37 environmental site inspections were conducted by ET and 9 environmental site inspections were conducted with IEC. During site inspections in the construction period, no non-conformance was identified.

Implementation Status of Environmental Mitigation Measures

- 3.4 The mitigation measures detailed in the Environmental Permit and the Manual were implemented throughout the whole project period. The implementation status of environmental mitigation measures (EMIS) is given in **Appendix A**.
- 3.5 No non-compliance was recorded throughout the construction period. Observations and recommendations recorded during the site inspections were summarized in each of the Monthly EM&A Reports.

Summary of Record of All Complaints Received

- 3.6 No environmental complaints have been received since the commencement of the Project. The complaint log is given in **Appendix B**.

Summary of Record of Notifications of Summons and Successful Prosecutions

- 3.7 No environmental summon and prosecution has been received since the commencement of the Project.

Waste Management

- 3.8 Waste management audit was carried out by the ET on a weekly basis. During the construction period, the Contractor followed the recommended procedures stipulated in the EM&A manual on handling and disposal of wastes.
- 3.9 Summary of the waste generated by the Project is shown in **Appendix C**.

Comparison with EIA predictions

- 3.10 The environmental impact caused by the Project during the Construction phase was generally in line with the predictions in EIA report.
- 3.11 With the environmental monitoring and site inspection to directly ensure the timely implementation of mitigation measures during the Project, the environmental performance of the Project was considered acceptable.

4. COMMENTS, CONCLUSIONS AND RECOMMENDATIONS

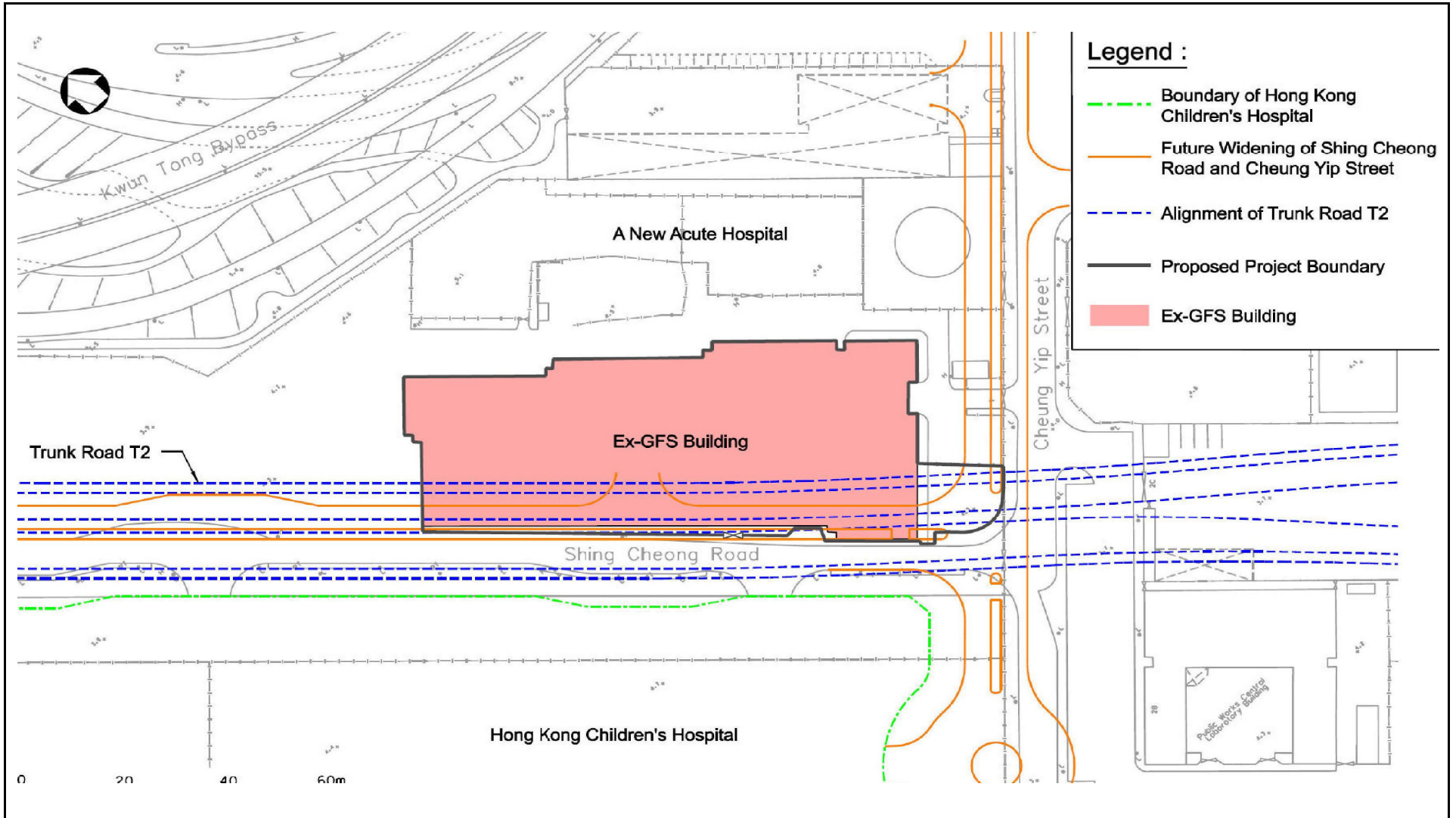
Comments on Overall EM&A Programme

- 4.1 The weekly site inspections were effective to ensure the implementation and efficiency of the mitigation measures. In addition, the recommendations made by the auditors of the ET could continuously improve the house keeping of the Contractor and maintain good site cleaning and tidiness. As a result, environmental nuisance to the public could be reduced to a minimal.
- 4.2 Therefore, the overall performance of the environmental management system in this Project was sound and effective.

Recommendations and Conclusions

- 4.3 There was no environmental complaint, prosecution or notification of summons received in the construction period. The EM&A programme was terminated on 2nd June 2015.
- 4.4 EM&A programme was implemented to monitor and mitigate impacts arising from the Project. The findings of the EM&A works suggest that environmental impacts arising from the demolition of ex-GFS Building were reduced to a minimum. No non-compliance was recorded during the project period. The environmental performance of the Project was considered acceptable.

FIGURES



Title	Contract No. KLN/2013/16		Scale	Propose No.	MA14037	CINOTECH
	Environmental Monitoring Works for Kai Tak Development VO No.2 – EM&A works for Demolition of Ex-GFS Building					
	Site Layout Plan		Date	Figure	1	
			Sep-14			

**APPENDIX A
ENVIRONMENTAL MITIGATION
IMPLEMENTATION SCHEDULE (EMIS)**

Appendix A Environmental Mitigation Implementation Schedule (EMIS)**Implementation Schedule for Air Quality Measures**

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.2.19	<p><u>Good site practices to minimise dust and other air pollutants impacts during soil excavation, transportation, loading and unloading the excavated contaminated soils</u></p> <ul style="list-style-type: none"> The excavation area should be limited to as small in size as possible and backfilled with clean and/or treated soil shortly after excavation work. The exposed excavated area shall be covered by the tarpaulin during night time. The top layer soils shall be sprayed with fine misting of water immediately before the excavation. Stockpiling site(s) shall be lined with impermeable sheeting and banded. Stockpiles shall be properly covered by impermeable sheeting to reduce dust and other air pollutants emission. Misting for the dusty material shall be carried out before being loaded into the vehicle. Any vehicle with an open load carrying area shall have properly fitted side and tail boards. Material having the potential to create dust shall not be loaded from a level higher than the side and tail boards and shall be dampened and covered by a clean tarpaulin. 	Work sites / during decommissioning	Contractor				√	N/A
								N/A
								N/A
								N/A
								N/A
								N/A
								N/A

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.2.19	<ul style="list-style-type: none"> The tarpaulin shall be properly secured and shall extend at least 300 mm over the edges of the sides and tailboards. The material shall also be dampened if necessary before transportation. The vehicles shall be restricted to maximum speed of 10 km per hour and confined haulage and delivery vehicle to designated roadways inside the site. On-site unpaved roads shall be compacted and kept free of loose materials. Vehicle washing facilities should be provided at every vehicle exit point. 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 hardcore. Every main haul road should be sealed with concrete and kept clear of dusty materials or sprayed with water so as to maintain the entire road surface wet. Every stock of more than 20 bags of cement should be covered entirely by impervious sheeting placed in an area sheltered on the top and the three sides. Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites. 	Work sites / during decommissioning	Contractor				√	N/A N/A N/A N/A N/A ^

* Des - Design, C – Construction, O – Operation, and Dec - Decommission

Implementation Schedule for Noise Measures

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.3.10	<p><u>Good site practices to be implemented:</u></p> <ul style="list-style-type: none"> • Only well-maintained plant should be operated on-site and plant shall be serviced regularly during the decommissioning program. • Silencers or mufflers on construction equipment should be utilized and shall be properly maintained during the decommissioning program • Mobile plant, if any, should be sited as far away from NSRs as possible. • Machines and plant (such as trucks) that may be in intermittent use should be shut down between works periods or should be throttled down to a minimum. • Plant known to emit noise strongly in one direction should, wherever possible, be orientated so that the noise is directed away from the nearby NSRs. • Material stockpiles and other structures should be effectively utilised, wherever practicable, in screening noise from on-site construction activities. 	Work sites / during decommissioning	Contractor				√	^ N/A N/A N/A N/A N/A

* Des - Design, C – Construction, O – Operation, and Dec - Decommission

Implementation Schedule for Water Quality Measures

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.4	<p><u>TPH Removal</u></p> <ul style="list-style-type: none"> Petrol interceptor should be adopted, where appropriate, as the first tier of treatment to removal TPH contaminant from contaminated runoff and effluent discharge from the decontamination works area. 	Work sites / During the decommissioning, excavation and soil treatment	Contractor		√	√	√	N/A
S5.4	<p><u>Failure of Centralized Wastewater Treatment Unit</u></p> <ul style="list-style-type: none"> In the event of wastewater treatment unit failure, all decontamination activities should be ceased to avoid emergency discharge. 	Work sites / During the decommissioning, excavation and soil treatment	Contractor		√	√	√	N/A
S5.4	<p><u>Building Demolition</u></p> <ul style="list-style-type: none"> The site practices outlined in ProPECC PN 1/94 "Construction Site Drainage" should be followed as far as practicable in order to minimise surface runoff and the chance of erosion. 	Work sites / During decommissioning	Contractor				√	N/A

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.4	<ul style="list-style-type: none"> There is a need to apply to EPD for a discharge licence under the WPCO for discharging effluent from the construction site. The discharge quality is required to meet the requirements specified in the discharge licence. All the runoff, wastewater or extracted groundwater generated from the works areas should be treated so that it satisfies all the standards listed in the TM-DSS. Regular monitoring of the treated effluent quality from the centralized wastewater treatment unit and stormwater discharges from major storm outfalls within the works areas will be conducted. Monitoring parameters should constantly include SS, turbidity, oil and grease, COD and less frequently include TPH, BTEX and selected metals. Parameters included in the WPCO licence, will also be included in the monitoring programme. The chemical testing of water samples collected in the monitoring programme should be undertaken by a Hong Kong Laboratory Accreditation Scheme (HOKLAS) accredited laboratory. Detail monitoring programme / plan will be submitted at later stage for EPD's agreement. 	Work sites / During decommissioning	Contractor				√	N/A
S5.4	<p><u>Sewage from Workforce</u></p> <ul style="list-style-type: none"> Temporary sanitary facilities, such as portable chemical toilets, should be employed on-site where necessary to handle sewage from the workforce. A licensed contractor would be responsible for appropriate disposal of waste matter and maintenance of these facilities. 	Work sites / During decommissioning	Contractor				√	N/A

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.4	<p><u>Solid Waste and Accidental Spillage</u></p> <ul style="list-style-type: none"> Debris and refuse generated on-site should be collected, handled and disposed of properly to avoid entering into the adjacent harbour waters. Stockpiles of cement and other construction materials should be kept covered when not being used. 	Work sites / During decommissioning	Contractor				√	^
S5.4	<ul style="list-style-type: none"> Oils and fuels should only be used and stored in designated areas which have pollution prevention facilities. To prevent spillage of fuels and solvents to the nearby harbour waters, all fuel tanks and storage areas should be provided with locks and be sited on sealed areas, within bunds of a capacity equal to 110% of the storage capacity of the largest tank. The bund should be drained of rainwater after a rain event. 	Work sites / During decommissioning	Contractor				√	^

* Des - Design, C – Construction, O – Operation, and Dec - Decommission

Implementation Schedule for Waste Management Measures

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.5	<p><u>Good Site Practices</u></p> <p>Recommendations for good site practices during the decommissioning works include:</p> <ul style="list-style-type: none"> • Nomination of an approved person, such as a site manager, to be responsible for good site practices, arrangements for collection and effective disposal to an appropriate facility, of all wastes generated at the site; • Training of site personnel in proper waste management and chemical waste handling procedures; • Provision of sufficient waste disposal points and regular collection for disposal; • Appropriate measures to minimise windblown litter and dust during transportation of waste by either covering trucks or by transporting wastes in enclosed containers; • A recording system for the amount of wastes generated, recycled and disposed of (including the disposal sites). 	Work sites / During decommissioning	Contractor				√	<p>^</p> <p>^</p> <p>^</p> <p>^</p> <p>^</p>

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.5	<p><u>Waste Reduction Measures</u></p> <p>Waste reduction is best achieved at the planning and design stage, as well as by ensuring the implementation of good site practices. Recommendations to achieve waste reduction include:</p> <ul style="list-style-type: none"> • Sort C&D waste from demolition of the remaining structures to recover recyclable portions such as metals • Segregation and storage of different types of waste in different containers, skips or stockpiles to enhance reuse or recycling of materials and their proper disposal; • To encourage collection of aluminium cans, PET bottles and paper by providing separate labelled bins to enable these wastes to be segregated from other general refuse generated by the work force; • Any unused chemicals or those with remaining functional capacity shall be recycled; • Proper storage and site practices to minimise the potential for damage or contamination of construction materials; 	Work sites / During design stage, decommissioning, excavation and soil treatment	Contractor				√	^ ^ ^ ^ ^

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.5	<p><u>Construction and Demolition Material</u></p> <p>Mitigation measures and good site practices should be incorporated into the contract document to control potential environmental impact from handling and transportation of C&D material. The mitigation measures include:</p> <ul style="list-style-type: none"> • Where it is unavoidable to have transient stockpiles of C&D material within the work site pending collection for disposal, the transient stockpiles shall be located away from waterfront or storm drains as far as possible. • Open stockpiles of construction materials or construction wastes on-site should be covered with tarpaulin or similar fabric. • Skip hoist for material transport should be totally enclosed by impervious sheeting. • Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving a construction site. • 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 load of dusty materials carried by vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure dust materials do not leak from the vehicle. 	Work sites / During decommissioning	Contractor				√	N/A N/A ^ ^ ^ ^

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.5	<ul style="list-style-type: none"> All dusty materials should be sprayed with water prior to any loading, unloading or transfer operation so as to maintain the dusty materials wet. The height from which excavated materials are dropped should be controlled to a minimum practical height to limit fugitive dust generation from unloading. The height from which excavated materials are dropped should be controlled to a minimum practical height to limit fugitive dust generation from unloading. 	Work sites / During decommissioning	Contractor				√	^
S5.5	<ul style="list-style-type: none"> When delivering inert C&D material to public fill reception facilities, the material should consist entirely of inert construction waste and of size less than 250mm or other sizes as agreed with the Secretary of the Public Fill Committee. In order to monitor the disposal of the surplus C&D material at the designed public fill reception facility and to control fly tipping, a trip-ticket system as stipulated in the ETWB TCW No. 31/2004 "Trip Ticket System for Disposal of Construction and Demolition Materials" should be included as one of the contractual requirements and implemented by an Environmental Team undertaking the Environmental Monitoring and Audit work. An Independent Environmental Checker should be responsible for auditing the results of the system. 	Work sites / During decommissioning	Contractor and Independent Environmental Checker				√	^

EIA Ref	Environmental Protection Measures / Mitigation Measures	Location / Timing	Implementation Agent	Implementation Stages*				Status
				Des	C	O	Dec	
S5.5	<p><u>Chemical Wastes</u></p> <ul style="list-style-type: none"> After use, chemical wastes (for example, cleaning fluids, solvents, lubrication oil and fuel) should be handled according to the Code of Practice on the Packaging, Labelling and Storage of Chemical Wastes. Spent chemicals should be collected by a licensed collector for disposal at the CWTF or other licensed facility in accordance with the Waste Disposal (Chemical Waste) (General) Regulation. 	Work sites / During decommissioning	Contractor				√	^
S5.5	<p><u>General Refuse</u></p> <ul style="list-style-type: none"> General refuse should be stored in enclosed bins or compaction units separate from C&D material. A licensed waste collector should be employed by the contractor to remove general refuse from the site, separately from C&D material. Effective collection and storage methods (including enclosed and covered area) of site wastes would be required to prevent waste materials from being blown around by wind, wastewater discharge by flushing or leaching into the marine environment, or creating odour nuisance or pest and vermin problem. 	Work sites / During decommissioning	Contractor				√	^

* Des – Design, C – Construction, O – Operation, and Dec – Decommission

Remarks: ^ Compliance of mitigation measure; X Non-compliance of mitigation measure;
N/A Not Applicable; • Non-compliance but rectified by the contractor;
* Recommendation was made during site audit but improved/rectified by the contractor;
Non-compliance but rectified/improved by the contractor and awaiting IEC's further comment.

**APPENDIX B
COMPLAINT LOG**

Appendix B - Complaint Log

Log Ref.	Date/Location	Complainant/ Date of Contact	Details of Complaint	Investigation/ Mitigation Action	File Closed
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**APPENDIX C
WASTE FLOW TABLE**

Contract No. TC Y305 - Demolition of Ex-Government Flying Service Building
Monthly Summary Waste Flow Table

Month	Accumulated Quantities of Inert C&D Materials Generated Monthly						Accumulated Quantities of Non-inert C&D Wastes Generated Monthly							Calculated Waste Recycling Rate		
	(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	(n) / (o)
	Hard Rocks or Broken Concrete Recycled (in '000kg)	Hard Rocks or Broken Concrete Disposed as Public Fill (in '000kg)	Excavated Materials Reused in this Project (in '000kg)	Excavated Materials Reused in other Projects (in '000kg)	Excavated Materials Disposed as Public Fill (in '000kg)	Imported Fill (in '000kg)	Mixed Wastes Disposed at Sorting Facility (in '000kg)	Metals Recycled (in '000kg)	Paper/ Cardboard Packaging Recycled (in '000kg)	Timber Recycled (in '000kg)	Plastics Recycled (in '000kg)	Chemical Waste Collected (in '000kg)	Others, e.g. General Refuse Disposed at Landfill (in '000kg)	Total Recycled or Reused Wastes (in '000kg)	Total Amount of Wastes (in '000kg)	Waste Recycling Rate (in %)
Sep-14	0	303.62	0	0	0	0	160.03	0	0	0	0	62.5	160.03	526.15	30.4%	
Oct-14	0	389.64	0	0	0	0	54.5	0	0	0	0	148.98	54.5	593.12	9.2%	
Nov-14	0	7.53	0	0	0	0	0	0	0	0	0	3.64	0	11.17	0.0%	
Dec-14	0	0	0	0	0	0	63.78	0	0	0	0	92.21	63.78	155.99	40.9%	
Jan-15	0	353.52	0	0	0	0	47.02	0	0	0	0	9.55	47.02	410.09	11.5%	
Feb-15	0	2242.06	0	0	0	0	82.23	0	0	0	0	0	82.23	2324.29	3.5%	
Mar-15	0	4885.27	0	0	0	0	144.14	0	0	0	0	0	144.14	5029.41	2.9%	
Apr-15	0	4869.27	0	0	0	0	51.19	0	0	0	0	16.63	51.19	4937.09	1.0%	
May-15	0	0	0	0	0	0	0	0	0	0	0	0	0	0	-	
Total	0	13050.91	0	0	0	0	602.89	0	0	0	0	333.51	602.89	13987.31	4.3%	

Note:

For BEAM Plus certification scheme, excavated materials are excluded from the calculation of the waste recycling rate.

Recycled or Reused Wastes = (a) + (h) + (i) + (j) + (k)

Total Amount of Wastes = (a) + (b) + (g) + (h) + (i) + (j) + (k) + (m)