

# Intermodal Transfer Terminal – Bonded Vehicular Bridge and Associated Roads

Monthly EM&A Report for September 2022 October 2022

Airport Authority Hong Kong

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Airport Authority Hong Kong

# Intermodal Transfer Terminal – Bonded Vehicular Bridge and Associated Roads

Monthly EM&A Report for September 2022

October 2022

This Submission of Construction Phase Monthly Environmental Monitoring and Audit (EM&A) Report for September 2022

has been reviewed and certified by

the Environmental Team Leader (ETL) in accordance with

Condition 3.4 of Environmental Permit No. EP-560/2018 and

Section 10.3 of the EM&A Manual of the Project.

Certified by:

Mum Clea

Ir Thomas Chan Environmental Team Leader (ETL) Mott MacDonald Hong Kong Limited

Date

11 October 2022



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#### By Email

Airport Authority Hong Kong HKIA Tower, 1 Sky Plaza Road, Hong Kong International Airport, Lantau, Hong Kong

#### Attn: Alan Chan (Manager, Civil)

11 October 2022

Dear Sir,

#### Contract C19C02 – Independent Environmental Checker Consultancy Services for Intermodal Transfer Terminal – Bonded Vehicular Bridge and Associated Roads <u>Monthly Environmental and Audit (EM&A) Report for September 2022</u>

Reference is made to the Environmental Team's submission of Monthly EM&A Report for September 2022 in accordance with Condition 3.4 of the Environmental Permit (No: EP-560/2018) and Section 10.3 of the EM&A Manual of the Project certified by the ET Leader on 11 October 2022.

We would like to inform you that we have verified on the captioned submission in accordance with the requirement stipulated in Condition 1.9 of EP-560/2018.

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

Yours faithfully, AECOM Asia Co. Ltd.

Y W Fung Independent Environmental Checker

### Contents

Exe	ecutive	summary	4
1	Intro	oduction	6
	1.1	Background	6
	1.2	Project Organisation	6
	1.3	Construction Works Programme and Construction Works Area	7
	1.4	Construction Works undertaken during the Reporting Period	7
2	Wat	er Quality Monitoring	8
	2.1	Impact Water Quality Monitoring	8
		2.1.1 Monitoring Requirement	8
		2.1.2 Monitoring Parameters	8
		2.1.3 Monitoring Locations	8
		2.1.4 Monitoring Results	8
		2.1.5 Monitoring Schedule for the Reporting Period	9
	2.2	Action and Limit Levels	9
	2.3	Post-Construction Water Quality Monitoring	9
	2.4	Conclusion	9
3	Envi	ronmental Site Inspection and Audit	10
	3.1	Environmental Site Inspection	10
	3.2	Advice on the Solid and Liquid Waste Management Status	11
	3.3	Implementation Status of Environmental Mitigation Measures	11
	3.4	Summary of Complaints, Notifications of Summons and Successful Prosecutions	11
4	Futu	ire Key Issues	13
	4.1	Construction Programme for the Coming Month	13
	4.2	Environmental Site Inspection for the Next Reporting Period	13
5	Con	clusions	14

Figure

Figure 2.1 Water Quality Monitoring Locations

#### Appendices

Appendix A. Project Organisation

Appendix B. Construction Works Programme

Appendix C. Construction Works Area

Appendix D. Monitoring Data and Graphical Plots

Appendix E. Environmental Site Inspection Schedule

Appendix F. Waste Flow Table

Appendix G. Status of Environmental Permits and Licences

Appendix H. Environmental Mitigation Measures Implementation Status

#### Tables

Table 1.1: Contact Information of Key Personnel	7
Table 2.1: Locations of Marine Water Quality Monitoring Stations	8
Table 3.1: Summary of Site Inspections and Recommendations	10
Table 3.2: Statistics on Environmental Complaints, Notifications of Summons and	
Successful Prosecutions	12
Table 4.1: Construction Activities for the Next Reporting Period	13

### **Executive summary**

On 23 August 2018, the Environment Impact Assessment (EIA) Report (Register No.: AEIAR-216/2018) for the Project was approved and an Environmental Permit (EP) (Permit No.: EP-560/2018) was issued for the construction and operation of the Project.

In June 2019, Mott MacDonald Hong Kong Limited (MMHK) was commissioned by Airport Authority Hong Kong (AAHK) to provide Environmental Team (ET) consultancy services for implementation of an Environmental Monitoring and Audit (EM&A) programme of the "Intermodal Transfer Terminal – Bonded Vehicular Bridge and Associated Roads" (hereinafter referred to as "the Project") in accordance with the Environmental Permit (EP) requirements throughout the Preconstruction, Construction and Post-construction phases.

The project construction was commenced on 5 October 2020 and the construction phase EM&A programme started on 5 October 2020.

This is the 24<sup>th</sup> Monthly EM&A Report for the construction phase of the Project which summaries findings of the EM&A programme during the reporting period from 1 to 30 September 2022.

#### Key Construction Works in the Reporting Period

A summary of construction activities undertaken during the reporting period is presented below:

- Plant and material mobilization for marine works
- Plant and material mobilization for landside works
- Marine pier construction
- Bridge deck construction
- Ancillary buildings construction
- Abutment, upramp structure & superstructure
- Retaining wall construction
- Drainage works

#### **Environmental Monitoring and Audit Progress**

The monthly EM&A programme was undertaken by ET in accordance with the approved EM&A Manual. A summary of the monitoring activities during the reporting period is presented below:

#### Table I: Summary Table for EM&A Activities in the Reporting Period

EM&A Activities	Number of Sessions
Water quality monitoring	13 (under ACL project)
Weekly environmental site inspections	4

#### **Complaint Log**

There was no complaint in relation to the environmental impact received during the reporting period.

#### **Notifications of Summons and Successful Prosecutions**

There was no notifications of summons or successful prosecutions received during this reporting period.

#### **Reporting Changes**

There was no reporting change during the reporting period.

#### **Future Key Issues**

The future key issues to be undertaken in the upcoming month are:

- Plant and material mobilization for landside works
- Plant and material mobilization for marine works
- Marine pier construction
- Bridge deck construction
- Ancillary buildings construction
- Abutment, upramp structure & superstructure
- Retaining wall construction
- Drainage works

### **1** Introduction

#### 1.1 Background

On 23 August 2018, the Environment Impact Assessment (EIA) Report (Register No.: AEIAR-216/2018) for the Project was approved and an Environmental Permit (EP) (Permit No.: EP-560/2018) was issued for the construction and operation of the Project.

The Project site is situated between the Hong Kong-Zhuhai-Macao Bridge Boundary Crossing Facilities (HKBCF) Island and the Hong Kong International Airport (HKIA), at the south of the existing SkyPier on the Airport Island. The Bonded Vehicular Bridge serves as a land connection between the HKBCF Island and Intermodal Transfer Terminal (ITT) building next to the SkyPier to be built by AAHK. Part of the bridge is located in the marine area (marine section) and part on the HKBCF Island (land section). The marine section of the site is situated in a marine area between HKIA and HKBCF Island.

The Bonded Vehicular Bridge serves as a dedicated direct vehicular access connecting the ITT of HKIA and HKBCF Island. The Project scale is anticipated to be small, the bridge's marine section is approximately 360 m in length, supported by bridge concrete piers. The Bridge's land section spans over the HKBCF Island with a total length of approximately 210 m.

In June 2019, Mott MacDonald Hong Kong Limited (MMHK) was commissioned by Airport Authority Hong Kong (AAHK) to provide Environmental Team (ET) consultancy services for implementation of an Environmental Monitoring and Audit (EM&A) programme in accordance with the EP requirements throughout the Pre-construction, Construction and Post-construction phases of the Project.

Baseline monitoring for the Project was carried out between August to October 2019, and the baseline monitoring report was submitted in April 2020 in accordance with the requirements set out in the EP and recommended in the EM&A Manual and received no further comment from the Environmental Protection Department (EPD).

For Construction phase of the Project, the construction has been commenced on 5 October 2020 and the construction phase EM&A programme was started on 5 October 2020.

This is the 24<sup>th</sup> monthly EM&A report summarising the key findings of the construction phase EM&A programme from 1 to 30 September 2022 (the reporting period) and is submitted to fulfil requirements in Condition 3.4 of EP and Section 10.3 of EM&A Manual of the Project.

#### 1.2 **Project Organisation**

The organisation chart and lines of communication with respect to the on-site environmental management structure of the key personnel are shown in **Appendix A**. The key personnel contact names and numbers are summarized in **Table 1.1**.

#### **Table 1.1: Contact Information of Key Personnel**

Party	Position	Name	Telephone
Project Manager's Representative (Airport Authority Hong Kong)	Senior Project Engineer, Environment	Becky Yan	2183 2773
Environmental Team (ET)	Environmental Team Leader	Thomas Chan	2828 5967
(Mott MacDonald Hong Kong Limited)	Deputy Environmental Team Leader	Gary Chow	2828 5874
Independent Environmental Checker (IEC)	Independent Environmental Checker	Y W Fung	3922 9366
(AECOM Asia Company Limited)	Deputy Independent Environmental Checker	Lemon Lam	3922 9381
Main Contractor	Senior Project Manager	Brian Ho	9041 7535
(Gammon Construction Limited)	Environmental Officer	Elena Lai	6841 3324

#### **1.3 Construction Works Programme and Construction Works Area**

The construction works commenced on 5 October 2020. The construction works programme and the construction works area of the Project are shown in **Appendix B** and **Appendix C** respectively.

#### 1.4 Construction Works undertaken during the Reporting Period

A summary of construction activities undertaken during this reporting period is presented below:

- Plant and material mobilization for marine works
- Plant and material mobilization for landside works
- Marine pier construction
- Bridge deck construction
- Ancillary buildings construction
- Abutment, upramp structure & superstructure
- Retaining wall construction
- Drainage works

8

### 2 Water Quality Monitoring

#### 2.1 Impact Water Quality Monitoring

#### 2.1.1 Monitoring Requirement

The impact water quality monitoring was conducted three days per week at mid-flood and midebb tides, at 5 water quality monitoring stations. Samples were taken at three depths, namely, 1m below water surface, mid-depth and 1m above sea bed, except where the water depth less than 6m, the mid-depth station was omitted. For locations with water depth less than 3m, only the mid-depth station was monitored. Duplicate in-situ measurements and water samples were collected from each independent monitoring event for all parameters to ensure a robust statistically interpretable dataset.

#### 2.1.2 Monitoring Parameters

For the 3 impact stations (M1 to M3) and 2 control stations (C1 and C2), monitoring of DO, DO%, pH, temperature, turbidity, salinity, SS and water depth were undertaken.

Other relevant data were also recorded, including monitoring location, time, tidal stages, weather conditions and any special phenomena or work during the monitoring.

#### 2.1.3 Monitoring Locations

With reference to the Baseline Monitoring Report, the water quality monitoring was conducted at three locations in the sea channel between the HKIA and the HKBCF (M1, M2 and M3) and two control stations (C1 and C2), locations are shown in **Figure 2.1** and summarized in **Table 2.1**.

ID	Monitoring Station	Easting	Northing
M1	Impact Station	812423	819635
M2 <sup>(1)</sup>	Impact Station	812629	819845
M3 <sup>(2)</sup>	Impact Station	812586	820069
C1	Control Station - West	812419	820670
C2	Control Station - East	813072	820595

#### Table 2.1: Locations of Marine Water Quality Monitoring Stations

Notes:

1. As updated in the baseline monitoring report, the water quality monitoring at M2 station was shifted to bring it closer to the Project site and away from the SkyPier ferry movements for better representation.

2. As updated in the baseline monitoring report, the water quality monitoring at M3 station was shifted to the location near the seawater intake of HKBCF to better represent the potential water quality impacts at the nearby sensitive receiver

#### 2.1.4 Monitoring Results

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As informed by AAHK, the marine works below sea water level of the Project were completed on 25 July 2022. Since the construction activities under sea water level and the impact water quality monitoring of Airport City Link (ACL) project were commenced (i.e. 26 July 2022) right after the completion of the construction activities under the sea water level of the ITT-BVB project, as the impact water quality monitoring programme (e.g. monitoring requirement and parameter) and monitoring locations under the EM&A Manual of EP (Permit no.: EP-581/2020) of ACL project are the same as that of ITT-BVB project. Hence, the water quality monitoring results of ACL project

are adopted and presented in this Monthly EM&A Report as agreed with AAHK, and such arrangement will be continued until the completion of all marine works of the Project.

The impact monitoring results and relevant graphical plots are presented in Appendix D.

#### 2.1.5 Monitoring Schedule for the Reporting Period

The schedule for water quality monitoring under ACL project of the reporting period is presented in **Appendix E**.

#### 2.2 Action and Limit Levels

The Action and Limit Levels for the impact monitoring stations and Event and Action Plan can refer to the Monthly EM&A Report of ACL project.

#### 2.3 Post-Construction Water Quality Monitoring

The post-construction water quality monitoring of ITT-BVB will combine with the post-construction water quality monitoring of ACL project and will be conducted after completion of the construction activities under sea water level of ACL project.

The alternative arrangement for post-construction water quality monitoring was proposed to EPD on 7 July 2022 and EPD expressed no comment on 18 July 2022 on the alternative arrangement.

#### 2.4 Conclusion

As informed by AAHK, the marine works below sea water level was completed on 25 July 2022. Refer to **Section 2.1.4**, the water quality monitoring results of ACL project are adopted and presented in this Monthly EM&A Report as agreed with AAHK, and such arrangement will be continued until the completion of all marine works of the Project.

In addition, the post-construction water quality monitoring of ITT-BVB will combine with the postconstruction water quality monitoring of ACL project and will be conducted after completion of the construction activities under sea water level of ACL project.

### **3** Environmental Site Inspection and Audit

#### 3.1 Environmental Site Inspection

Site inspections were carried out by ET on a weekly basis to monitor the implementation of proper environmental pollution control mitigation measures for the Project. Key observations were recorded in the site inspection checklist and passed to the Contractor together with the appropriate recommended mitigation measures where necessary. During the reporting period, site inspections were carried out on 7, 14, 21 and 28 September 2022. Joint IEC site inspection was carried out on 7 September 2022.

Monthly landscape and visual site audit was carried out on 7 September 2022.

Key observations and reminders during the site inspections and landscape and visual site audit are described in **Table 3.1**.

Inspection Date	Key Observations / Reminders	Recommendations / Actions	Close-Out Date
29 Aug 2022	Exposed site area at drainage works area was observed dry.	The Contractor should provide regular water spraying on the exposed site area for dust suppression.	7 Sep 2022
7 Sep 2022	Faded NRMM label was observed (Reminder).	The Contractor was reminded to replace the faded NRMM label displayed on the excavator.	7 Sep 2022
7 Sep 2022	Mitigation measures should be implemented properly to avoid construction debris and refuse to fall from works area (Reminder).	The Contractor was reminded to provide receptacle with cover and regular collection of refuse to avoid construction debris and refuse to fall from works area.	7 Sep 2022
14 Sep 2022	Construction debris was observed scattered at the access platform at Pier 1.	The Contractor should clean up the construction debris to prevent washing into the sea.	21 Sep 2022
14 Sep 2022	Oil stain was observed at the bottom of chemical storage cabinet at Pier 1.	The Contractor should clean up the oil stain and any oil spill in the cabinet to prevent spillage into the sea.	21 Sep 2022
14 Sep 2022	The NRMM label was observed missing on the excavator (Reminder).	The Contractor was reminded to display valid NRMM label on the excavator	14 Sep 2022
21 Sep 2022	Chemical spill was observed near Kiosk No.2.	The Contractor should remove the chemical spill and treat it as chemical waste.	28 Sep 2022
21 Sep 2022	Dusty stockpile was observed at drainage works area.	The Contractor should provide sufficient dust suppression measures (e.g. water spraying) to minimise fugitive dust emission.	28 Sep 2022
21 Sep 2022	Mitigation measures should be implemented properly to keep the haul road clean (Reminder).	The Contractor was reminded to provide regular cleaning to remove any mud and dusty materials on the haul road.	21 Sep 2022

#### Table 3.1: Summary of Site Inspections and Recommendations

Inspection Date	Key Observations / Reminders	Recommendations / Actions	Close-Out Date
28 Sep 2022	Chemical powder used in wastewater treatment facility was unwrapped and not properly stored.	The Contractor should properly store the chemical powder in a secure container to prevent chemical spillage.	On-going
28 Sep 2022	Loading and unloading work was conducted and the site area was observed dry.	The Contractor should provide sufficient water spraying for the loading and unloading work to prevent fugitive dust emission.	On-going
28 Sep 2022	The maintenance record for the wastewater treatment facility was observed not fully complete (Reminder).	The Contractor was reminded to complete the maintenance record for the wastewater treatment facility properly.	28 Sep 2022

#### 3.2 Advice on the Solid and Liquid Waste Management Status

The Contractor was registered as a chemical waste producer for the Project. Construction and demolition (C&D) material sorting was carried out on site. Sufficient numbers of receptacles were provided for general refuse collection and sorting. Excavated inert C&D materials were reused to minimise the disposal of C&D waste to public fill. The Contractor was reminded to maintain on site waste sorting and recording system and maximize reuse / recycling of C&D wastes, whenever these are generated.

The monthly summary of waste flow table is detailed in Appendix F.

The valid environmental licenses and permits for the Project during the reporting period are summarized in **Appendix G**.

#### 3.3 Implementation Status of Environmental Mitigation Measures

In response to the site audit findings, the Contractor carried out corrective actions.

A summary of the environmental mitigation measures implementation status is presented in **Appendix H**. Necessary mitigation measures were implemented properly, observations and reminders were issued to the Contractor where actions were taken by the Contractor to rectify the identified issues.

#### 3.4 Summary of Complaints, Notifications of Summons and Successful Prosecutions

#### **Complaint Log**

There was no complaint received in relation to the environmental impact during the reporting period.

#### Notifications of Summons or Status of Prosecution

There was no notification of summons or prosecutions received during the reporting period.

#### **Cumulative Statistics**

Statistics on complaints, notifications of summons and successful prosecutions are summarized in **Table 3.2.** 

Table 3.2:	Statistics	on	Environmental	Complaints,	Notifications	of	Summons	and
Successful I	Prosecutio	ns						

Reporting Period	Environmental Complaints	Notifications of Summons	Successful Prosecutions
This reporting period (Sep 2022)	0	0	0
From commencement date of construction to end of reporting period	0	0	0

### 4 Future Key Issues

#### 4.1 Construction Programme for the Coming Month

As informed by the Contractor, the major construction activities for the next reporting period (October 2022) are summarized in **Table 4.1**.

#### Table 4.1: Construction Activities for the Next Reporting Period

Period	Description of Activities				
	<ul> <li>Plant and material mobilization for landside works</li> <li>Plant and material mobilization for marine works</li> </ul>				
	Marine pier construction				
Oct 2022	Bridge deck construction				
001 2022	Ancillary buildings construction				
	<ul> <li>Abutment, upramp structure &amp; superstructure</li> </ul>				
	Retaining wall construction				
	Drainage works				

#### 4.2 Environmental Site Inspection for the Next Reporting Period

The tentative schedule for weekly site inspection for the next reporting period is provided in **Appendix E**.

## 5 Conclusions

#### General

The construction works for the Project commenced on 5 October 2020. The ET of the Project has undertaken environmental site inspections and water quality monitoring under the construction phase EM&A programme during the reporting period.

#### Water Quality Monitoring

As informed by AAHK, the marine works below sea water level was completed on 25 July 2022. Water quality monitoring results of ACL project are adopted and presented in this Monthly EM&A Report as agreed with AAHK, and such arrangement will be continued until the completion of all marine works of the Project.

#### **Environmental Site Inspections**

Environmental site inspections were carried out four (4) times during the reporting period. Recommendations on remedial actions were given to the Contractor for the deficiencies identified during the site inspections.

#### **Complaint Log**

There was no complaint received in relation to the environmental impact during the reporting period.

#### **Reporting Changes**

There was no reporting change during the reporting period.

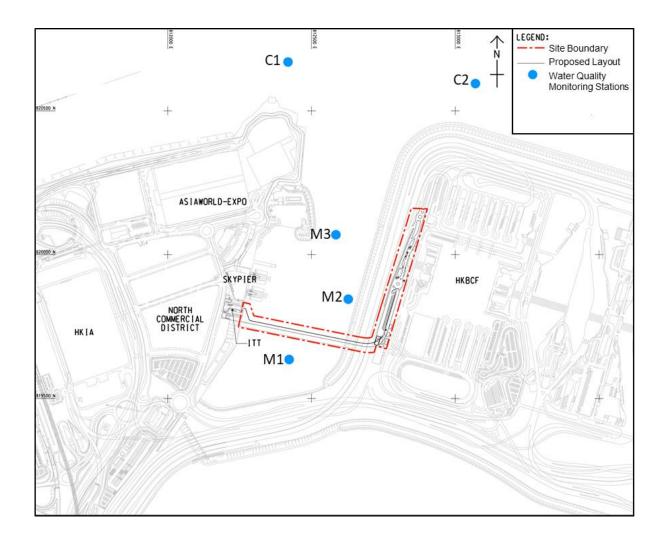
#### Notifications of Summons and Successful Prosecutions

There was no notification of summons or successful prosecutions received during the reporting period.

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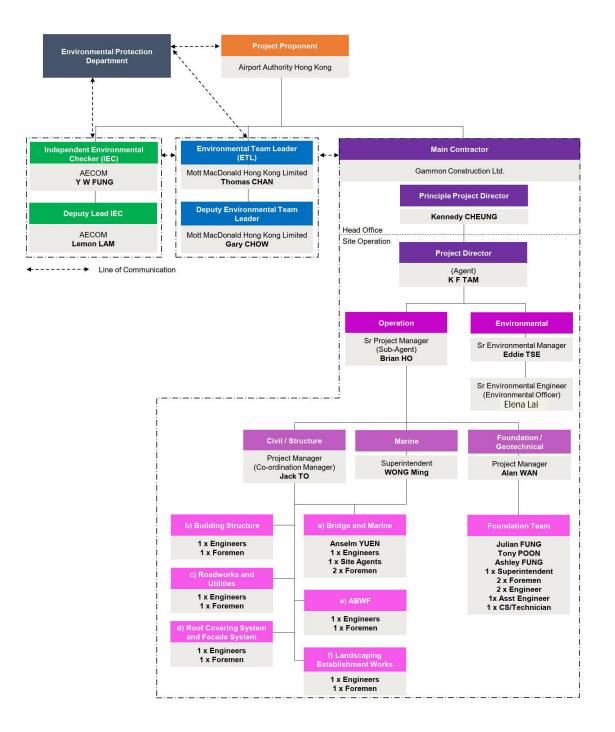
### Figure

### **Figure 2.1 Water Quality Monitoring Locations**



# Appendices

## **Appendix A. Project Organisation**



# **Appendix B. Construction Works Programme**

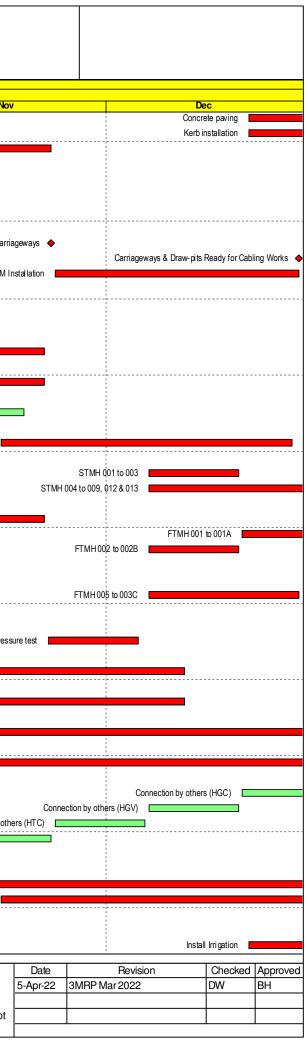
vity ID	Activity Name	Current Start	Current Finish	Orig Dur			Con	Oct	2022	No
C19W10 ITTB AD	2 Monthly Programme Rev. C Updated as 30 Sep 2022					┢	Sep	OCI		
Contract Dates					_					1 1 1
Key Dates (PS App	pendix B)									1 1 1
Contract Completio						-				
Sections of the Wo										- - 
19W10.K.KD01	KD-1 Comp. Site Office at CY Road Incl. T&C, Stat. Approv., FS, & OP (61 Wks)		30-Sep-22*	0	0%	<b>-</b>	at CY Road Incl. T&C, Stat. Approv., FS, & OP (61 Wks)			1 d
19W10.K.KD02	KD-2 Comp. Permanent Structure, Weather-tight for Ancillary Bldgs & Access to Fit-out (108 Wks)		06-Dec-22*	0	0%				0-2 Comp. Permanent Struc	ture, Weather-tight for Ancillar
Option Works			00 000 22	U	070					
19W10.K.KD3A	KD-3A Comp. Optical F/C Connection & Fit-out Works to Govt Facilities for T&C (120 Wks)		19-Oct-22*	0	0%		KD-3A Comp. Optical F/C Connection & Fit-out Works	; d Govt Facilities for T&C (120 Wks)	₽	
Target Completion I			10 000 22	U	070	-			•	
Sections of the Wo						<b>.</b>		 		 
19W10.K.TD01	TKD-1 Comp. Site Office at CY Road Ind. T&C, Statutory Approvals, FS & OP		30-Sep-22*	0	0%	Dff	ice at CY Road Ind. T&C, Statutory Approvals, FS & OP			1
19W10.K.TD02	TKD-2 Comp. Permanent Structure, Weather-tight for Ancillary Bldg & Access to Fit-out		06-Dec-22*	0	0%	-[			TKD-2 Comp Pern	hanent Structure, Weather-tigh
Option Works			00 D00 EE	Ű	070				1112 2 0 0 mp 1 0 m	
19W10.K.TD3A	TD-3A Comp. Optical F/C Connection & Fit-out Works to Govt Facilities for T&C		19-Oct-22*	0	0%	-	TD-3A Comp. Optical F/C Connection & Fit-	ut Works to Govt Facilities for T&C	4	- 
	npletion Dates (EOT no. 1 Granted)		10 000 22	U	070				•	 
Ţ.	acate Dates (PS Appendix C2)									1
	and the second									1 1 1
	(PS Appendix C3)									1
	liminaries and General Requirements									
	ded Vehicular Bridge - Marine Portion from Chainage CH0.000 to CH43	9.827						     		! ! 
Marine Piling and S	Substructure Works									1
larine Superstruc	ture									1 1 1
Pier 4					_					
19W10.C.31900	Cantilever Erection of 9 cycles	06-Jul-22 A	05-Oct-22	63	15.249	% 🗖				- - 
19W10.C.31910	Cast the Stitching at Between P3 to P4 Span	06-Oct-22	14-Oct-22	7	0%	_	Cast the Stitching at Between P3 to			
19W10.C.31920	Cast the Stitching at Between P4 to P5 Span	08-Oct-22	17-Oct-22	7	0%		Cast the Stitching at Between P	to P5 Span		   
19W10.C.31950	Stressing P3-P4 Bottom Tendon	15-Oct-22	20-Oct-22	5	0%	_	Stres	ing P3-P4 Bottom Tendon		1 1 1
19W10.C.31960	Stressing P4-P5 Bottom Tendon	18-Oct-22	22-Oct-22	5	0%	_		Stressing P4-P5 Bottom Tendon		1 1 1
Pier 3										1 1 1
Pier 7										1
19W10.C.31660	Assembly of Travelling Formworks (TF1 & 2)	27-Oct-22	02-Nov-22	6	0%			Assembly of Travelling Formv	vorks (TF1 & 2)	
19W10.C.31670	Cantilever Erection of 4 cycles	03-Nov-22	05-Dec-22	28	0%			C	antilever Erection of 4 cycle	¦ S
19W10.C.31640	Cast Packing Between M.J. Segment	11-Oct-22	22-Oct-22	10	0%	_	Cast Packing Betw	een M.J. Segment		- 
19W10.C.31680	Cast the Stitching at Between P7 to P8 Span	06-Dec-22	13-Dec-22	7	0%	_				Cast the
19W10.C.31630	Construct M.J. Segment	29-Aug-22 A		14	50%	-	·			
19W10.C.31620	ErectFalsework	20-Jul-22 A	05-Sep-22 A	18	100%		·			· · · · · · · · · · · · · · · · · · · ·
19W10.C.31650	Install TPT & Nailing System	24-Oct-22	26-Oct-22	3	0%	-		Install TPT & Nailin	svstem	- - 
19W10.C.31690	Stressing P7-P8 Bottom Tendon	14-Dec-22	17-Dec-22	4	0%	_				1
Pier 6					0,0					1 1
19W10.C.32060	Assembly of Travelling Formworks (TF1 & 2) with Marine Navigation Channel Diversion	19-Sep-22 A	26-Sep-22 A	6	100%	 . Iar	ihe Navigation Channel Diversion			
19W10.C.32080	Cantilever Erection of 8 cycles	27-Sep-22 A	01-Dec-22	56	8.93%		Cantilever Erection of 8 cycles			
19W10.C.32120	Cast the Stitching at Between P5 to P6 Span	10-Dec-22	17-Dec-22	7	0.007					
19W10.C.32090	Cast the Stitching at Between P6 to P7 Span	02-Dec-22	09-Dec-22	7	0%	-				Cast the Stitchir
19W10.C.32000	Hammer Head	25-Aug-22 A	14-Sep-22 A	24	100%					
19W10.C.32170	Stressing P5-P6 Bottom Tendon	19-Dec-22	22-Dec-22	4	0%	_				
		19-Dec-22	14-Dec-22	4				       		1 1 1 1
19W10.C.32190	Stressing P6-P7 Bottom Tendon	10-Dec-22	14-Dec-22	4	0%	-				1 1 1
Pier 2	Casting the Fird Span	16 Nev 00	06 Dec 22	10	00/	-				Conting the End Span
19W10.C.32410	Casting the End Span	16-Nov-22	06-Dec-22	18	0%	_				Casting fhe End Span
19W10.C.33420	Casting fhe Stitching at Between P2 and P3 Span	07-Dec-22	29-Dec-22	18	0%	_			_	Casting the
19W10.C.32280	Curing of Pier 2	18-Oct-22	20-Oct-22	3	0%			Curing of Pier 2		
19W10.C.32360	Setting-up the Temporary Jacks	14-Nov-22	15-Nov-22	2	0%	_		0, 15, 0, 17	Ū.	p the Temporary Jacks
19W10.C.32290	Steel Frame Setting-up	21-Oct-22	12-Nov-22	20	0%	_		Steel Frame Setting	-up	
nstallation of Pern	nanent Bearings									
Parapet Construct	ion (Assuming 6sets of Catch Fence, 12sets Formworks & 4day Cycle	)								
Adual LOE	Critical Remaining Work 🐺 Start Constraint			-		_			Data Date: 30-Sep	-99
Remaining LOE	<ul> <li>♦ Milestone</li> <li>♥ Finish Constraint</li> </ul>		Proje	ect	ID:	С	19W10-DWPG-B-AD-M2		Printed: 08-Oct-22	
Actual Work	Crit Milestone     No Predecessors	3-Mar	nth Roll	ina	Dro		ramme (As of 30 Septem		Layout: C19W10	
Remaining Work	Actual Milestone     No Successors			ing	110	'yı	Page 1 of 4			th Rolling (MPU), Not
Hernalling Work										

Vov					Dec	;	
,			00.144	1			
ary I	Bldgs & Access	to Fit-out (1	U8 VVKS)	€			
ght fo	or Ancillary Bldg	g & Access t	o Fit-out	₽			
					_		
the S	Stitching at Betv	veen P7 to F	8 Span				
		Stressing	9 P7-P8 B	ottom Tendon			
Ca	ast the Stitching	at Betweer	P5 to P6	Span			
	at Between P6						
			Streesing	g P5-P6 Bottom	Tond	on <b>ee</b>	
	01-	cinc DC D7					
	Stres	sing P6-P7	DULIOM I 6				
				_			
<b>_</b>		-	<b>D</b> 0.0	<b></b>			
ine S	Stitching at Betw	veen P2 and	1 P3 Span				
_							
	Date		Revis	sion		Checked	Approved
	5-Apr-22	3MRP N	lar 2022			DW	BH
ot					+		
		1					

y ID	Activity Name	Current Start	Current Finish	Orig Dur	Pct Com	2022 Sep Oct 2022
TT Transfer Dec						
	onded Vehicular Bridge - Land Portion from Chainage CH439.827	to CH685.000				
	ncillary Buildings					
tructure Works						
C&ED Observatio	n Booth					
ImmD Kiosk 1						
ImmD Kiosk 2						
	and Equipment Room					
19W10.C.51110	Construction of footings	12-Nov-22	19-Nov-22	7	0%	Construction of footings
19W10.C.51290	Construction of ground slab	05-Dec-22	08-Dec-22	4	0%	
19W10.C.51490	Construction of RC beam & roof slab (C&ED Operation & Equipment Room)	29-Nov-22	06-Dec-22	7	0%	Construction of RC beam & roof slab (C&E
19W10.C.51120	Construction of screen wall/ column & structure wall	21-Nov-22	28-Nov-22	7	0%	Construction of screen wall/ colum
19W10.C.51080	Excavation	04-Nov-22	11-Nov-22	7	0%	Excavation
19W10.C.51190	Mass concrete fill	29-Nov-22	03-Dec-22	5	0%	
oilet A						
19W10.C.52520	Construction of ground slab	08-Oct-22	13-Oct-22	4	0%	Construction of ground slab
19W10.C.52840	Construction of RC beam & roof slab (Toilet A)	01-Sep-22 A	03-Oct-22	2	0%	
19W10.C.52120	Construction of screen wall/ column & structure wall	22-Aug-22 A		7	100%	
19W10.C.52310	Mass concrete fill	30-Sep-22	07-Oct-22	5	0%	Mass concrete fill
C&ED Mobile X-R						
19W10.C.52100	Construction of foortings (3 bays)	25-Oct-22	03-Nov-22	9	0%	Construction of foortings (3 bays)
19W10.C.52340	Construction of retaining wall	04-Nov-22	17-Nov-22	12	0%	Construction of retaining wall
19W10.C.51870	Excavation	18-Oct-22	24-Oct-22	6	0%	Excavation
19W10.C.51865	Installation of ELS	29-Aug-22 A	17-Oct-22	14	4.29%	
Electrical Room						
acade & Roof						
BWF Works						
Building Services	s Works					
	rport and Specialist Systems					
ost Centre 7 - Ex						
encing and Mod						
Permanent Fencir		40.0.1.00	44.11 00	00	00/	habili actuated familia
19W10.C.71422	Install permanent fencing	10-Oct-22	14-Nov-22	30	0%	Install permanent fencing
Modification of Si		00.0	00 D 00		001	
19W10.C.71572	Fabrication & delivery of modified sign gantry DS 23	30-Sep-22	30-Dec-22	79	0%	Fabrication & delivery of modified sign gantry DS 23
19W10.C.71581	Remove existing sign gantry	30-Sep-22	17-Oct-22	12	0%	Remove existing sign gantry
	W1, RW2 & RW3)					
RW1 (3m height v	vith 6m length)					
19W10.C.71230	Backfilling	08-Oct-22	20-Oct-22	10	0%	Backfilling
19W10.C.71130	Completion of ELS and Excavatoin	06-May-22 A	31-Aug-22 A	12	100%	
19W10.C.71210	Steel Fixing and Cast the Slab	01-Sep-22 A	26-Sep-22 A	6	100%	
19W10.C.71220	Steel Fixing and Cast the Wall	27-Sep-22 A	07-Oct-22	6	6.67%	Steel Fixing and Cast the Wall
RW2 ( (2.15m heiç	ght with 4m length)					
19W10.C.71280	Backfilling	18-Oct-22	25-Oct-22	7	0%	Backfilling
19W10.C.71250	Completion of ELS and Excavatoin	21-May-22 A	24-Sep-22 A	6	100%	
19W10.C.71260	Steel Fixing and Castthe Slab	25-Sep-22 A	08-Oct-22	6	0%	Steel Fixing and Cast the Slab
19W10.C.71270	Steel Fixing and Castthe Wall	10-Oct-22	17-Oct-22	6	0%	Steel Fixing and Castthe Wall
RW3 (1.65m heig	ht with 3.2m length)					
19W10.C.71390	Backfilling	18-Oct-22	24-Oct-22	6	0%	Backfilling
19W10.C.71320	Completion of ELS and Excavatoin	06-Jun-22 A	24-Sep-22 A	5	100%	
19W10.C.71330	Steel Fixing and Cast the Slab	25-Sep-22 A	08-Oct-22	6	0%	Steel Fixing and Cast the Slab
19W10.C.71380	Steel Fixing and Cast the Wall	10-Oct-22	17-Oct-22	6	0%	Steel Fixing and Cast the Wall
t-Grade Roadw	-	13 00 22	000 22	Ť	370	
19W10.C.71580	Compaction & testing (sub-base)	23-Nov-22	21-Dec-22	25	0%	Compactio
		20-1100-22	21-060-22		070	
Actual LOE	Critical Remaining Work 🐺 Start Constraint		Draid	20+	ID. (	
Remaining LOE			Proje	JDe	ט: (	C19W10-DWPG-B-AD-M27 Data Date: 30-Sep-22 Printed: 08-Oct-22 10:19
-	Crit Milestone I No Predecessors	2 Mar		ina	Droo	
Actual Work		1 2 2 1 2 1 2 1 2 1 2 1 2 1 2 1 2 1 2 1			<b>F</b> [ ( ) ( )	
Actual Work Remaining Work		3-10101		ing	FIU	Page 2 of 4 Layout: C19W10 ITT 3MRP - M2 TASK filters: 3-Month Rolling (MP

Vov				De	C	
	Construct	on of ground	l alab			
			i slab			
	& Equipment R	oom)				
cture	wall					
	Mass concre	oto fill 💻				
	-					
-				_		
na (e	ub-base) 📕					
.y (3						
	Date		Revision		Checked	Approved
		014001				
	5-Apr-22	3MRP M	ar 2022		DW	ВН
ot						
						•

ctivity ID	Activity Name	Current Start	Current Finish	Orig Dur	Pct Com		202	
19W10.C.71595	Conserve paying	22-Dec-22	26-Jan-23	25	0%	Sep	Oct	No
19W10.C.71595	Concrete paving Kerb installation	22-Dec-22	26-Jan-23	25	0%			
19W10.C.71240	Lay sub-base	25-Oct-22	20-Jan-23 22-Nov-22	25	0%		Lay sub-base	
	s Inspection Aera Canopy	23-001-22	22-1100-22	25	070			1
19W10.C.71470	Submit BA10	20 San 22	10-Oct-22	7	0%	Submit BA10		
19W10.C.71470	Submit BA8 and BA10 for Glass Glazing and Metal Cladding Installation	30-Sep-22 30-Sep-22	10-0ct-22 12-Nov-22	7 35		and BA10 for Glass Glazing and Metal Cladding Installation		
	Submit DAG and DATO TO GLASS Glazing and Metal Gladding Installation	50-5ep-22	12-1100-22	30	070			
E & M Works								
E&M Works at Carri			00.11 00	0	00/			Assess to the Corri
19W10.C.71170	Access to the Carriageways		22-Nov-22	0	0%			Access to the Carri
19W10.C.71190 19W10.C.71180	Carriageways & Draw-pits Ready for Cabling Works	02 Nov 02	29-Dec-22	0	0%			E&M II
Utilities	E&M Installation	23-Nov-22	29-Dec-22	30	0%			LOWIN
	teide Obeinenn Ol (COE)							
	tside Chainage CH685)	05.0.1.00	07.11 00	40	00/			
19W10.C.71660		25-Oct-22	07-Nov-22	12	0%	Medify Eviating 6	CCTV (others)	
19W10.C.71400	Modify Existing SMH 1301 to 1303	10-Oct-22	24-Oct-22	12	0%	, ,	MH 1301 to 1303	
19W10.C.71510	SMH 01 to SMH 08	30-Sep-22	21-Nov-22	42	0%	SMH 01 to SMH 08		1
19W10.C.71300	SMH 09 to SMH 26	20-Jun-22 A	14-Nov-22	48	25%			
19W10.C.71515	SMH 1101 to 1108	30-Sep-22	21-Nov-22	42	0%	SMH 1101 to 1108		
19W10.C.71340	SMH 1201 to 1203	15-Jul-22 A	08-Oct-22	12	50%			
19W10.C.71120	SMH 26 to SMH 37	13-May-22 A	18-Nov-22	60	13.33%			1
19W10.C.71030	SMH 37 to SMH 39	19-Aug-22 A	08-Oct-22	12	50%			
19W10.C.71290	SMH 40 to SMH 46	15-Nov-22	28-Dec-22	36	0%			SMH 40 to SMH 46
19W10.C.71060	SMH 46 to SMH 55	31-Mar-21 A	14-Oct-22		i6.67%			
19W10.C.71310	STMH 001 to 003	07-Dec-22	20-Dec-22	12	0%			
19W10.C.71430	STMH 004 to 009, 012 & 013	07-Dec-22	11-Jan-23	28	0%			
Sewerage	2071/	00 NL 00	04.01 00	40	00/			0071/
19W10.C.71670		08-Nov-22	21-Nov-22	12	0%			CCTV
19W10.C.71440	FTMH 001 to 001A	21-Dec-22	06-Jan-23	12	0%			
19W10.C.71410	FTMH 002 to 002B	07-Dec-22	20-Dec-22	12	0%			
19W10.C.71460	FTMH 003 to 003C	13-Jan-22 A	13-Oct-22	18	50%			
19W10.C.71490	FTMH 004 to 003B	13-Jan-22 A	05-Oct-22	6	50%			
19W10.C.71500 19W10.C.71520	FTMH 005 to 003C	07-Dec-22	29-Dec-22	18	0% 50%			
19W10.C.71520	FTMH 006 10 003B	13-Jan-22 A	05-Oct-22 07-Nov-22	6 30	0%			
19W10.C.71530		25-Jan-22 A						Press
ELV Ducting	Pressure test	22-Nov-22	05-Dec-22	12	0%			Fiess
19W10.C.71150	FLV Ducting At Crode	20 Can 22	10 Dec 22	60	00/	ELV Ducting At Grade		
Water Main	ELV Ducting At Grade	30-Sep-22	12-Dec-22	60	0%			
19W10.C.71080	Install Water Main	02-Apr-22 A	12-Dec-22	01	14.070/			
EL Cable & Ducting		02-Api-22 A	12-Dec-22	91	4.07%			
19W10.C.71090	-	20 Can 22	07 Fab 02	100	00/	EL Cable & Ducting At Grade		
TCSS Ducting	EL Cable & Ducting At Grade	30-Sep-22	27-Feb-23	120	0%	EL Cable & Ducung At Grade		
19W10.C.71350	TCSS Ducting	21-Oct-22	09-Feb-23	90	0%		TCSS Ducting	
	TCSS Ducting	21-04-22	09-FED-23	90	0 76			
Telecom Ducting 19W10.C.81400	Connection by others (UCC)	21 Dec 22	06 Jan 02	10	00/			
19W10.C.81390	Connection by others (HGC)	21-Dec-22 07-Dec-22	06-Jan-23	12	0%			
19W10.C.81390	Connection by others (HGV) Connection by others (HTC)	23-Nov-22	20-Dec-22 06-Dec-22	12	0% 0%			Connection by oth
19W10.C.72010				12			Connection by	others (PCCW)
19W10.C.72010	Connection by others (PCCW)	09-Nov-22	22-Nov-22	12	0%	Telecom Ducting	Connection by	
I	Telecom Ducting	30-Sep-22	08-Nov-22	31	0%	Telecom Ducing		
Road Lighting Duct 19W10.C.71610	Drawing Submission and Material Ordering	30-Sep-22	19-Jan-23	90	0%	Drawing Submission and Material Ordering		
19W10.C.71360	Road Lighting Ducting At Grade		06-Mar-23		0%	blawing oubmission and material ordening	Roa	Lighting Ducting At Grade
	וייסמע ביטוגוווט בעעוווט אג טומעפ	15-Nov-22	00-11/101-23	90	070			
Irrigation	Consent of Works		20 0 + 22	0	00/		Consent of Works 🔶	
19W10.S.71010 19W10.S.71015	Consent of Works	22 000 00	29-Oct-22	0	0% 0%			
190010.5.71015	Install Irrigation	22-Dec-22	25-Mar-23	75	0%			
Actual LOE Remaining LOE Actual Work Remaining Work	Critical Remaining Work	3-Mon	-			C19W10-DWPG-B-AD-M2 gramme (As of 30 Septem Page 3 of 4	ber 2022) Layout: C19W10	2 10:19



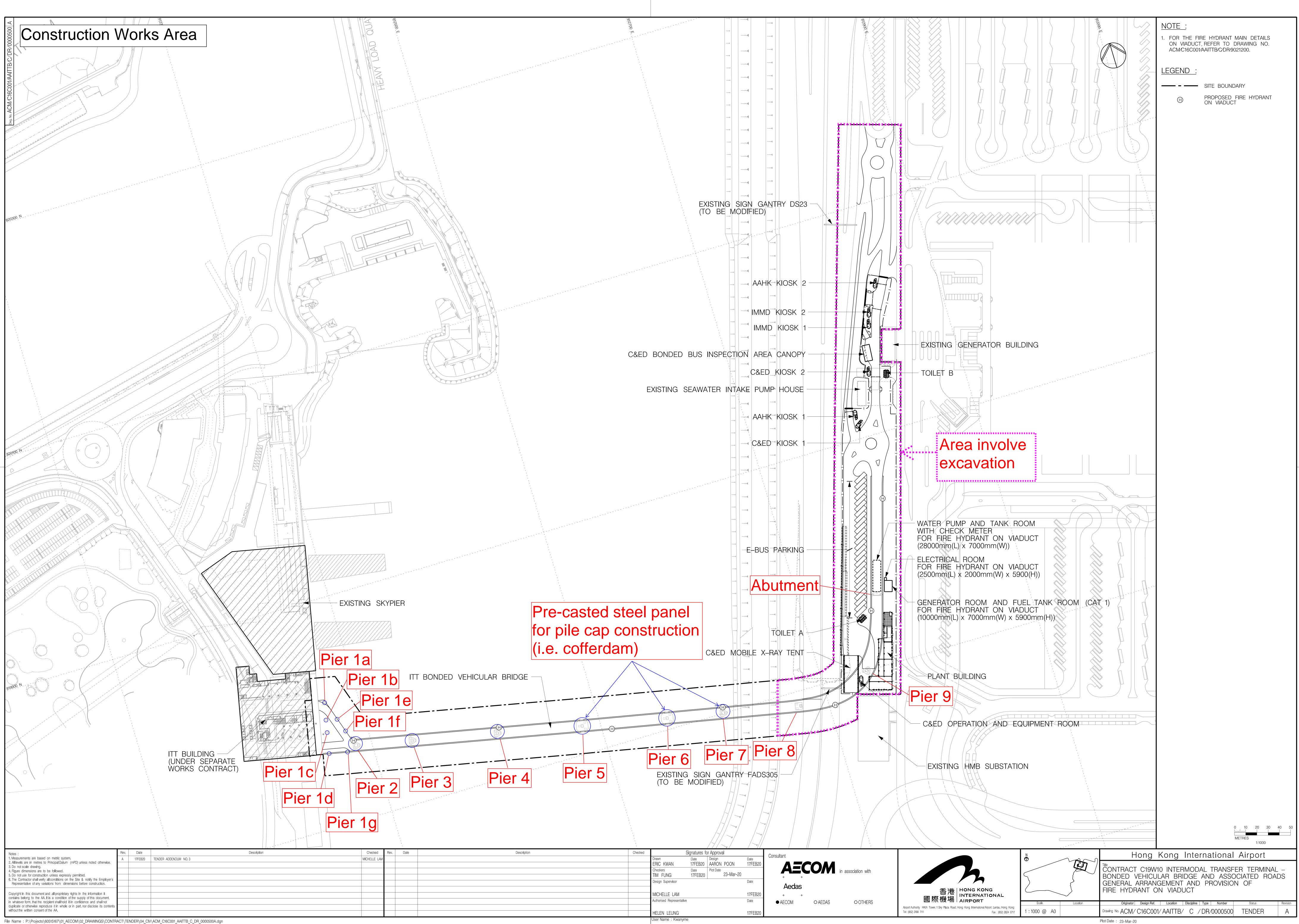
\ci	tivity ID	Activity Name	Current	Current	Orig	Pct			
			Start	Finish		Com		2022	
							Sep	Oct	No
	19W10.S.71000	Submit WWO 046 Part 1 & 2	30-Sep-22		0	0%	Submit WWO 046 Part 1 & 2		
	Fire Hydrant								
	19W10.C.71110	Fire Hydrant At Grade	30-Sep-22	19-Jan-23	90	0%	Fire Hydrant At Grade		
	E-Bus Charger								
	19W10.C.72030	Material Order & delivery	03-Jun-22 A	31-Mar-23	180	2.78%			
	<b>OPTION WORKS</b>								

Re	dual LOE lemaining LOE dual Work lemaining Work	•	Critical Remaining Work Milestone Crit Milestone Actual Milestone	<b>₽</b> ⊲	Start Constraint	Project ID: C19W10-DWPG-B-AD-M27 3-Month Rolling Programme (As of 30 September 2022) Page 4 of 4	Data Date: 30-Sep-22 Printed: 08-Oct-22 10:19 Layout: C19W10 ITT 3MRP - M27 TASK filters: 3-Month Rolling (MPU), Not Level of Effort.
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Nov			Dec	
		• • • •		
		1		

	Dale	Revision	Checked	Abbionec
	5-Apr-22	3MRP Mar 2022	DW	BH
lot				

### **Appendix C. Construction Works Area**



# Appendix D. Monitoring Data and Graphical Plots

#### Water Quality Monitoring

Water Quality Monitoring Results on 01 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	pl	н	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.8	28.8	8.1	8.1	23.6	23.5	73.8	73.8	5.0		3.0		3.1	
					Guildoc	1.0	28.8	20.0	8.1	0.1	23.4	20.0	73.8	70.0	4.9	5.0	3.0		3.4	1
C1	Misty	Moderate	14:29	9.8	Middle	4.9	28.7	28.8	8.1	8.1	23.9	23.8	73.8	73.8	5.0	0.0	4.6	4.5	4.2	4.0
01	moty	modelate		0.0		4.9	28.8	2010	8.1	0.1.	23.6	20.0	73.8		5.0		4.5		3.9	
					Bottom	8.8	28.4	28.6	8.1	8.1	24.0	24.4	77.7	77.7	5.3	5.3	5.8		4.5	1
						8.8	28.8		8.1		24.8		77.7		5.2		5.8		5.0	Ļ
					Surface	1.0	28.7	28.8	8.1	8.1	23.8	23.6	72.2	71.9	4.9		1.3		3.0	4
						1.0	28.8		8.1		23.4		71.6		4.9	4.9	1.4		3.3	4
C2	Misty	Moderate	14:48	8.4	Middle	4.2	28.6	28.7	8.1	8.1	24.0	23.8	72.2	72.0	4.9		2.5	2.4	3.9	4.0
						4.2	28.7		8.1		23.6		71.7		4.9		2.4		3.6	4
					Bottom	7.4	28.7 28.7	28.7	8.1 8.1	8.1	23.9	23.8	74.4 72.3	73.4	5.0	5.0	3.3		4.8 5.2	1
				[			-				23.6				4.9 4.9		3.3		5.2 8.4	┝───
					Surface	1.0	28.6 28.7	28.7	8.1 8.1	8.1	24.2 24.2	24.2	72.5 70.6	71.6	4.9		3.9 3.9		8.4 8.5	Í
						-	-		-		-				4.0	4.9	-		-	1
M1	Misty	Moderate	14:41	4.8	Middle	-	-	-	-	-	-	-	-			-	-	4.0	-	8.0
						3.8	28.6		8.1		24.2		75.0		5.1		4.0		- 7.8	1
					Bottom	3.8	28.7	28.7	8.1	8.1	24.2	24.2	71.8	73.4	4.9	5.0	4.1		7.4	i i
						1.0	28.4		8.1		24.5		73.5		5.0		5.6		4.6	
					Surface	1.0	28.3	28.4	8.1	8.1	24.6	24.6	73.5	73.5	4.9		5.5		4.3	i
						-	-		-		-		-		-	5.0	-		-	
M2	Misty	Moderate	14:37	4.2	Middle	-	-	-	-	-	-	-	-	-	-		-	5.9	-	5.2
					Dattan	3.2	28.2	00.0	8.1	8.1	24.3	24.4	72.6	70.0	5.0	5.0	6.3		5.7	1
					Bottom	3.2	28.4	28.3	8.1	8.1	24.5	24.4	72.6	72.6	4.9	5.0	6.3		6.0	Í
					Surface	1.0	28.5	28.6	8.1	0.4	24.3	24.3	67.5	67.1	4.6		4.3		4	
					Sunace	1.0	28.6	20.0	8.1	8.1	24.2	24.3	66.7	07.1	4.5	4.6	4.2		4	i
M3	Misty	Moderate	14:33	6.4	Middle	3.2	28.5	28.6	8.1	8.1	24.4	24.4	67.3	67.1	4.6	4.0	6.5	6.1	5	5
IVIS	IVIISLY	wouerate	14.55	0.4	IVIIUUIE	3.2	28.6	20.0	8.1	0.1	24.3	24.4	66.8	07.1	4.5		6.6	0.1	5	5
					Bottom	5.4	28.7	28.6	8.1	8.1	24.1	24.3	68.7	68.2	4.7	4.7	7.4		6	j
			1		Bollom	5.4	28.5	20.0	8.1	0.1	24.4	24.5	67.7	00.2	4.6	4.7	7.5	1	6	i i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 01 September 22 during Mid-Flood Tide

		toring Resu			01 September 22	auning mia	11000													
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	F	рH	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg.	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.4	28.4	8.0	8.0	23.6	23.8	78.6	78.5	5.4		3.3		2.2	
					Gunace	1.0	28.3	20.4	8.0	0.0	24.0	20.0	78.4	70.0	5.3	5.2	3.3		2.1	1
C1	Misty	Moderate	09:18	8.2	Middle	4.1	28.2	28.3	8.0	8.0	24.0	24.0	75.6	75.3	5.1	0.2	4.9	4.1	2.9	2.8
				-		4.1	28.3		8.0		24.0		75.0		5.1		5.0		2.6	1
					Bottom	7.2	28.3	28.4	8.0	8.0	24.0	23.9	74.5	74.5	5.0	5.1	4.0		3.6	1
		1				7.2	28.4		8.0		23.7		74.5		5.1		4.2		3.3	┝───
					Surface	1.0 1.0	28.3 28.1	28.2	8.0 8.0	8.0	23.8 24.4	24.1	67.2 67.0	67.1	4.6 4.6	-	4.1 4.1		2.7 2.5	1
						4.8	28.1		8.0		24.4		66.4		4.6	4.5	4.1 5.1		2.5 3.1	i
C2	Misty	Moderate	09:01	9.6	Middle	4.8	28.1	28.0	8.0	8.0	24.0	24.6	66.1	66.3	4.4		5.1	5.1	2.9	3.0
					_	8.6	27.9		8.0		25.0		68.5		4.7		6.1		3.6	1
					Bottom	8.6	28.3	28.1	8.0	8.0	23.6	24.3	68.8	68.7	4.7	4.7	6.0		3.4	i
					Surface	1.0	28.1	28.3	8.0	8.0	23.5	23.4	80.1	80.2	5.4		6.4		8.7	
					Sunace	1.0	28.5	20.3	8.0	0.0	23.3	23.4	80.2	00.2	5.4	5.4	6.5		8.3	]
M1	Misty	Moderate	09:08	5.0	Middle	-	-	-	-	-	-	-	-	_	-	5.4	-	6.7	-	7.1
	whicey	modorato	00.00	0.0	middio	-	-		-		-		-		-		-	0.1	-	1
					Bottom	4.0	27.8	28.1	8.0	8.0	23.8	23.6	78.4	78.2	5.3	5.3	7.0		5.8	1
			-	1		4.0	28.4		8.0		23.4		78.0		5.3		7.0		5.5	<u> </u>
					Surface	1.0	28.5 28.5	28.5	8.0 8.0	8.0	23.6 23.6	23.6	75.0 75.1	75.1	5.1 5.1	-	5.8 5.9		3.1 3.4	1
						1.0					23.0		-		-	5.1	5.9			1
M2	Misty	Moderate	09:11	5.8	Middle	-	-	-	-	-	-	-	-	-	-	-	-	6.1	-	2.9
						4.8	28.5		8.0		23.5		- 77.5		5.2		6.4		2.3	i
					Bottom	4.8	28.5	28.5	8.0	8.0	23.6	23.6	77.4	77.5	5.2	5.2	6.4		2.6	i
						1.0	28.4		8.0		23.3		76.4		5.2	<u> </u>	1.5		2	<u> </u>
					Surface	1.0	28.4	28.4	8.0	8.0	23.1	23.2	76.8	76.6	5.2	1	1.5		2	i –
M3	Mich		09:14	6.2	Middle	3.1	28.3	28.4	8.0	8.0	23.4	23.3	72.5	72.6	5.0	5.1	2.9	2.5	2	2
IVIS	Misty	Moderate	09:14	0.2	ivildale	3.1	28.4	20.4	8.0	0.0	23.2	23.3	72.6	12.0	4.9	1	2.9	2.5	2	2
					Bottom	5.2	28.3	28.4	8.0	8.0	23.3	23.3	75.7	75.4	5.2	5.2	3.0		2	1
					Dollom	5.2	28.4	20.4	8.0	0.0	23.3	20.0	75.1	73.4	5.1	5.2	3.1		2	1

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 03 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	~~~~		mperature (°C)	р	Н	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)	Camping 2 op		Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.5	27.5	8.0	8.0	27.1	27.1	70.4	70.4	4.8		4.1		3.4	
					Cullabo	1.0	27.5	2110	8.0	0.0	27.1		70.4		4.8	4.6	4.2		3.1	1
C1	Sunny	Rough	16:41	10.6	Middle	5.3	27.2	27.2	8.0	8.0	27.5	27.5	64.5	64.6	4.4		4.4	5.6	2.6	2.7
	,					5.3	27.2		8.0		27.5	-	64.6		4.4		4.3		2.9	1
					Bottom	9.6	26.6	26.6	8.0	8.0	28.4	28.4	56.6	56.6	3.9	3.9	8.1		2.1	1
						9.6	26.6		8.0		28.4		56.5		3.9		8.2		2.3	<u> </u>
					Surface	1.0	27.1 27.2	27.2	8.0 8.0	8.0	27.5 27.5	27.5	64.3 64.2	64.3	4.4	-	5.8 5.7		2.1 2.3	1
						4.9	26.7		8.0		28.2		58.8		4.4	4.2	9.4		2.5	1
C2	Sunny	Rough	17:11	9.7	Middle	4.9	26.7	26.7	8.0	8.0	28.2	28.2	58.7	58.8	4.0		9.4	8.1	2.3	2.6
					_	8.7	26.5		8.0		28.6		57.7		4.0		9.1		2.9	
					Bottom	8.7	26.5	26.5	8.0	8.0	28.6	28.6	57.7	57.7	4.0	4.0	9.1		3.2	
					Surface	1.0	27.7	27.7	8.0	8.0	26.1	26.1	64.3	64.3	4.4		4.8		3.2	
					Sunace	1.0	27.7	21.1	8.0	8.0	26.1	20.1	64.2	04.3	4.4	4.4	4.8		3.0	
M1	Sunny	Moderate	16:56	5.4	Middle	-	-	_	-	_	-	-	-	_	-	4.4	-	4.7	-	2.5
IVII	Ournry	woderate	10.50	5.4	Middle	-	-		-		-	_	-		-		-	4.7	-	2.5
					Bottom	4.4	27.7	27.7	8.0	8.0	26.2	26.2	65.2	65.1	4.4	4.4	4.6		1.8	
					Bottom	4.4	27.7		8.0	0.0	26.2	20.2	65.0		4.4		4.6		1.9	Ļ
					Surface	1.0	27.9	27.9	8.0	8.0	26.1	26.1	67.2	67.4	4.6		5.4		2.6	1
						1.0	27.9		8.0		26.1		67.5		4.6	4.6	5.4		2.3	4
M2	Sunny	Moderate	17:01	5.2	Middle	-	-	-	-	-	-	-	-	-	-	-	-	6.2	-	2.1
						4.2	27.3		8.0		27.0		65.7		4.5		7.0		- 1.7	1
					Bottom	4.2	27.3	27.3	8.0	8.0	26.8	26.9	65.7	65.7	4.5	4.5	6.9		1.9	1
						1.0	27.9		8.0		26.1		67.7		4.6		4.9		3	
					Surface	1.0	27.9	27.9	8.0	8.0	26.1	26.1	67.7	67.7	4.6	1	4.9		3	1
MO	Cummi	Daugh	10.47	7.5	Middle	3.8	27.0	07.0	8.0	0.0	27.4	07 F	61.9	61.0	4.2	4.4	6.2	6.2	2	
M3	Sunny	Rough	16:47	7.5	Middle	3.8	27.0	27.0	8.0	8.0	27.5	27.5	61.7	61.8	4.2	1	6.2	6.3	2	2
					Bottom	6.5	26.6	26.6	8.0	8.0	28.3	28.3	60.2	60.1	4.1	4.1	7.8		1	1
					DOLLOITI	6.5	26.6	20.0	8.0	0.0	28.3	20.3	60.0	00.1	4.1	4.1	7.7		2	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 03 September 22
 during Mid-Flood Tide

	inty morn	toring Resu			03 September 22	uuning miu	11000	lue												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	F	ъH	Salin	ity (ppt)	DO Satu	ation (%)	Dissolved (mg/		Turbidity	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.8	27.8	8.0	8.0	26.2	26.2	75.3	75.3	5.1		2.6		3.0	
					Gunace	1.0	27.8	27.0	8.0	0.0	26.2	20.2	75.3	10.0	5.1	4.7	2.6		2.8	
C1	Sunny	Moderate	11:59	8.5	Middle	4.3	26.8	26.8	8.0	8.0	27.9	27.9	62.0	62.0	4.2		8.4	4.9	2.5	2.5
	,					4.3	26.8		8.0		27.9		62.0		4.2		8.3		2.4	
					Bottom	7.5	26.6	26.6	8.0	8.0	28.4	28.4	61.1	61.1	4.2	4.2	4.0		2.1	
						7.5	26.6		8.0		28.4		61.0	1	4.2		3.7		2.2	
					Surface	1.0 1.0	27.3 27.4	27.4	8.0 8.0	8.0	26.9 26.8	26.9	72.7 72.6	72.7	5.0 5.0	-	5.0 4.5		2.1 2.3	
						4.5	26.7		8.0		20.0		67.7		3.0 4.6	4.8	6.2		2.3	
C2	Sunny	Moderate	11:31	8.9	Middle	4.5	26.7	26.7	8.0	8.0	28.1	28.1	67.7	67.7	4.6	-	6.2	6.4	3.1	2.9
					<b>-</b>	7.9	26.7		8.0		28.2		62.9		4.3		8.3		3.6	
					Bottom	7.9	26.7	26.7	8.0	8.0	28.2	28.2	62.8	62.9	4.3	4.3	8.3		3.3	
					Surface	1.0	27.7	27.7	8.0	8.0	26.1	26.1	65.9	65.9	4.5		5.1		2.2	
					Sunace	1.0	27.7	21.1	8.0	0.0	26.1	20.1	65.8	05.9	4.5	4.5	5.2		2.4	
M1	Sunny	Moderate	11:44	4.2	Middle	-	-	-	-	-	-	-	-		-	4.0	-	4.8	-	2.6
	o anny	moderate			maaro	-	-		-		-		-		-		-		-	2.0
					Bottom	3.2	27.7	27.7	8.0	8.0	26.1	26.1	69.4	69.3	4.7	4.7	4.5		2.7	
						3.2	27.7		8.0		26.1		69.1	1	4.7		4.5		3.0	
					Surface	1.0	27.6 27.6	27.6	8.0 8.0	8.0	26.1 26.1	26.1	66.5 66.5	66.5	4.5 4.5	-	4.7 4.7		3.3 2.9	
						1.0	- 27.0		- 0.0		20.1		- 00.5	-	4.5	4.5	4.7		- 2.9	
M2	Sunny	Moderate	11:41	4.2	Middle	-	-	-	-	-	-	-	-		-	-	-	4.8	-	2.7
						3.2	27.6		8.0		26.2		65.5		4.5		4.9		2.3	
					Bottom	3.2	27.6	27.6	8.0	8.0	26.2	26.2	65.5	65.5	4.5	4.5	4.9		2.0	
					<u> </u>	1.0	27.6		8.0		26.1		74.2	= 1.0	5.1		3.4		3	
					Surface	1.0	27.6	27.6	8.0	8.0	26.1	26.1	74.2	74.2	5.1	5.0	3.4		3	
M3	Sunny	Sunny Moderate	11:51	7.8	Middle	3.9	27.5	27.5	8.0	8.0	26.1	26.1	71.2	71.2	4.9	5.0	3.8	5.4	2	2
IVIS	Sunny	wouerate	11.51	1.0	IVIIQUIE	3.9	27.5	27.5	8.0	0.0	26.1	20.1	71.1	/1.2	4.9		3.8	0.4	2	2
					Bottom	6.8	27.2	27.2	8.0	8.0	26.6	26.6	65.9	65.9	4.5	4.5	9.0		2	
					Dottom	6.8	27.2	21.2	8.0	0.0	26.6	20.0	65.8	00.5	4.5	7.0	8.9		2	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 06 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition		Water Depth	Sampling Dep	oth (m)	Water T	emperature (°C)	p	ъH	Salin	ity (ppt)	DO Satur	ration (%)	Dissolved ( (mg/l		Turbidity(	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.4	27.5	8.3	8.3	27.3	27.2	115.5	115.5	7.9		1.1		6.0	
					Cunado	1.0	27.5	21.0	8.2	0.0	27.1	27.2	115.5	110.0	7.7	7.4	1.1		5.6	1
C1	Misty	Moderate	08:49	9.6	Middle	4.8	27.3	27.4	8.3	8.3	27.4	27.3	102.6	102.6	7.0		1.7	1.7	6.2	6.3
						4.8	27.5		8.2		27.2		102.6		7.0		1.6		6.4	
					Bottom	8.6	27.3	27.4	8.3	8.3	27.5	27.4	106.8	106.6	7.3	7.3	2.5		6.7	1
						8.6	27.5		8.3		27.2		106.4		7.2	_	2.4		7.0	
					Surface	1.0	27.5	27.6	8.3	8.3	26.9	26.9	121.6	121.4	8.3		1.0		5.8	1
						1.0	27.6		8.3		26.8		121.2		8.1	7.9	1.0		6.2	1
C2	Misty	Moderate	08:31	9.6	Middle	4.8	27.2	27.4	8.3	8.3	27.2	27.0	111.0	111.1	7.6		1.1	1.1	6.8	6.6
						4.8	27.6		8.3		26.8		111.1		7.5		1.1		6.5	1
					Bottom	8.6	27.0 27.6	27.3	8.3 8.3	8.3	27.2	27.0	112.8	112.7	7.7	7.7	1.2		7.0 7.3	1
			1			8.6					26.8		112.6	1	7.7		1.3			
					Surface	1.0 1.0	27.1 27.3	27.2	8.2 8.2	8.2	27.6 27.5	27.6	97.9 96.8	97.4	6.7 6.6		1.5 1.6		7.8 7.5	1
							- 21.3				- 27.5		90.0			6.7	-			1
M1	Misty	Moderate	08:38	4.8	Middle	-	-	-	-	-	-	-			-		-	2.1	-	7.0
						3.8	27.0		8.2		26.8		98.7		6.8		2.6		6.5	1
					Bottom	3.8	27.0	27.1	8.2	8.2	27.6	27.2	99.2	99.0	6.8	6.8	2.6		6.3	1
			1			1.0	27.0		8.2		28.0		94.4	1	6.4		2.0		6.4	
					Surface	1.0	27.1	27.1	8.2	8.2	28.0	28.0	92.6	93.5	6.3		2.0		6.2	1
						-	-		-		-		-		-	6.4	-		-	
M2	Misty	Moderate	08:41	5.8	Middle	-	-	-	-	-	-	-	-	- 1	-		-	2.5	-	6.1
					Detterr	4.8	26.9	07.0	8.2	0.0	28.1	28.1	96.8	95.9	6.6	6.6	2.9		5.7	1
					Bottom	4.8	27.0	27.0	8.2	8.2	28.0	28.1	95.0	95.9	6.5	6.6	3.0		6.0	1
					Surface	1.0	27.1	27.1	8.2	0.0	27.9	27.9	96.7	95.8	6.6		2.7		7	
					Sunace	1.0	27.1	27.1	8.2	8.2	27.8	21.9	94.9	95.6	6.5	6.3	2.6		7	1
M3	Misty	Moderate	08:45	6.2	Middle	3.1	27.1	27.1	8.1	8.1	28.2	28.1	89.3	87.1	6.1	0.3	3.3	3.5	6	6
IVIO	iviisty	wouerate	00.40	0.2	IVIIGUIE	3.1	27.1	27.1	8.1	0.1	28.0	20.1	84.8	07.1	5.8		3.3	3.0	7	U
					Bottom	5.2	27.1	27.1	8.1	8.2	28.0	27.9	95.5	94.6	6.5	6.5	4.6		6	1
	1		1		Bollom	5.2	27.1	27.1	8.2	0.2	27.8	21.3	93.6	34.0	6.4	0.5	4.7		5	i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 06 September 22
 during Mid-Flood Tide

Monitoring Station	Weather Condition	Sea Condition	Sompling	Water Depth (m)	Sampling Depth (m)		Water Temperature (°C)		pН		Salinity (ppt)		DO Saturation (%)		Dissolved Oxygen (mg/L)		Turbidity(NTU)		Suspended Solids (mg/L)	
							Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
C1 C2	Misty Misty	Moderate Moderate	16:02	9.8	Surface	1.0	28.1	28.1	8.4	8.5	27.3	27.3	146.5	146.3	9.8		1.1		6.2	
						1.0	28.1		8.5	0.0	27.3		146.0	110.0	9.7 9.7	9.7	1.0		6.5	ł
					Middle	4.9	28.0	28.1	8.4	8.5	27.5	27.4	144.8	144.7	9.7		1.3	1.6	5.9	5.8
						4.9	28.1		8.5		27.3		144.6		9.6		1.2		5.6	
					Bottom	8.8 8.8	28.0 28.1	28.1 27.3	8.4 8.5 8.5	27.4 27.3	27.4	141.2 141.5	141.4	9.5 9.4	9.5	2.5 2.4		5.3 5.0	-	
						1.0	28.1		8.2		27.3	<sup>_</sup>	141.5		7.5		3.6	ł	5.0 6.7	+
						1.0	27.2		8.2	8.2	28.4	28.4	109.8	110.1	7.4		3.7	4.4	6.3	- 5.8
					Middle	4.2	26.6	27.0	8.2		28.8	28.6	102.4	404.0	7.0 7.2	7.2	4.6		5.6	
						4.2	27.3		8.2	8.2	28.4		100.1	101.3	6.8		4.6		6.0	
					Bottom	7.4	26.6	27.0	8.2	8.2	28.8	28.6	105.6	105.9	7.2	7.2	5.0		5.4	
						7.4	27.3		8.2	0.2	28.4		106.1	105.5	7.2		5.0		5.0	<u> </u>
M1	Misty	Moderate	16:07	5.0	Surface	1.0	28.4	28.4	8.6	8.6	27.0	27.1	161.6	161.4	10.8		3.2	3.7	6.1	5.5
						1.0	28.4		8.6		27.1		161.1		10.8	10.8	3.3		5.8	
					Middle	-	-	-	-	-	-	-	-		-	-	-		-	
					Bottom	4.0	28.4		- 8.6		- 26.5		- 134.4		9.0		4.2		4.9	
						4.0	28.4	28.4	8.6	8.6	27.1	26.8	134.1	134.3	8.9	9.0	4.1		5.2	
M2	Misty	Moderate	16:11	4.2	Surface	1.0	28.4	1 90	8.5		27.6	27.6	136.5	400.0	9.1		6.0		5.2	
						1.0	28.4 28.4	8.4 8.5	27.6	27.6	136.0	136.3	9.0	9.1	5.9	i F	5.0	1		
					Middle	-	-	-	-		-	-	-	_	- 9.1	9.1	-	5.1	-	4.7
						-	-		-		-		-		-		-		-	4.1
					Bottom	3.2	28.5	28.5 3.4	8.5	85	27.4	27.5 123.2	123.2	8.2	8.2	4.3		4.4	ł	
						3.2	28.4		8.4		27.6		123.2		8.2		4.2		4.2	<u> </u>
	Misty	Moderate	16:16	6.4	Surface	1.0	28.3	28.2	8.4	8.4	27.4	27.5	145.8	145.7	9.8	9.7	4.6		7	I
МЗ					Middle	1.0 3.2	28.1 28.3	28.2	8.4		27.5		145.6 145.0		9.7 9.7		4.7 5.3		6	6
						3.2	28.3		8.4 8.4	8.4	27.4 27.5	27.5	145.0	145.2	9.7 9.7		5.3	5.3 -	<u>6</u>	
					Bottom	5.4	28.4	8.4 28.3	8.4	3.4 9.4	27.5	27.3	145.4		-	9.7 9.7	6.1		5	
						5.4	28.2		8.4		27.4		144.2	144.4	9.6		6.0		5	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 08 September 22
 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition		Water Depth	Sampling Dep	th (m)	Water Te	emperature (°C)	F	ъH	Salin	ity (ppt)	DO Satur	ration (%)	Dissolved ( (mg/L		Turbidity	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.3	27.3	8.2	8.2	28.6	28.6	93.6	93.2	6.3		6.8		6.1	
					Guildee	1.0	27.3	27.5	8.2	0.2	28.6	20.0	92.8	55.2	6.3	6.3	6.7		6.5	1
C1	Misty	Moderate	10:56	8.2	Middle	4.1	27.3	27.3	8.2	8.2	28.6	28.6	93.7	93.5	6.3	0.0	7.5	7.4	7.5	7.6
•						4.1	27.3		8.2		28.6		93.3		6.3		7.5		8.0	
					Bottom	7.2	27.3	27.3	8.2	8.2	28.6	28.6	94.3	94.0	6.4	6.4	8.0		8.7	1
						7.2	27.3		8.2		28.6		93.6		6.3		8.1		8.5	
					Surface	1.0	27.5 27.6	27.6	8.2 8.2	8.2	28.5 28.5	28.5	94.8 93.6	94.2	6.4 6.3		4.6		6.7	1
						1.0 4.7	-						93.6 95.3		6.3 6.4	6.4	4.7 6.0		7.0	1
C2	Misty	Moderate	10:38	9.4	Middle	4.7	27.5 27.6	27.6	8.2 8.2	8.2	28.5 28.5	28.5	95.3 94.0	94.7	6.3		6.0 6.0	5.9	7.4 7.8	7.6
						8.4	27.6		8.2		28.5		94.0 96.2		6.5		7.0		8.4	1
					Bottom	8.4	27.6	27.6	8.2	8.2	28.5	28.5	94.3	95.3	6.4	6.5	6.9		8.0	1
						1.0	27.5		8.3		28.6		99.4		6.7		4.0		7.8	
					Surface	1.0	27.5	27.5	8.3	8.3	28.6	28.6	98.4	98.9	6.6		4.0		7.5	1
M1	Mater	Madausta	40.45	5.0	Middle	-	-		-		-		-		-	6.7	-		-	7.0
IMT	Misty	Moderate	10:45	5.0	IVIIdale	-	-	-	-	-	-	-	-	-	-		-	4.1	-	7.2
					Bottom	4.0	27.5	27.5	8.3	8.3	28.6	28.6	100.0	99.6	6.7	6.7	4.1		6.6	1
					Bollom	4.0	27.5	21.5	8.3	0.5	28.6	20.0	99.1	99.0	6.7	0.7	4.1		6.9	. <u> </u>
					Surface	1.0	27.4	27.5	8.2	8.2	28.7	28.7	99.0	98.5	6.7		4.3		11.2	1
					Cullabo	1.0	27.5	2.10	8.2	0.2	28.6	2011	97.9	00.0	6.6	6.7	4.3		11.6	1
M2	Misty	Moderate	10:48	4.2	Middle	-	-	-	-	-	-	-	-	-	-		-	4.8	-	10.6
	,					-	-		-		-		-		-		-		-	1
					Bottom	3.2	27.4	27.4	8.2	8.2	28.7	28.7	99.5	99.0	6.7	6.7	5.3		10.0	1
						3.2	27.4		8.2		28.7		98.5		6.6		5.3		9.6	
					Surface	1.0	27.4 27.4	27.4	8.2 8.2	8.2	28.6 28.6	28.6	96.5 95.0	95.8	6.5 6.4		6.0 5.9		9 10	1
						3.3	27.4		8.2		28.8		95.0		6.6	6.5	6.2		10	1
M3	Misty	Moderate	10:52	6.6	Middle	3.3	27.1	27.3	8.2	8.2	28.6	28.7	97.0	96.0	6.4		6.2	6.4	10	10
						5.6	26.9		8.2		29.0		98.1		6.7		7.1		12	1
					Bottom	5.6	20.3	27.2	8.2	8.2	28.6	28.8	95.3	96.7	6.4	6.6	7.1		11	1

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 08 September 22
 during Mid-Flood Tide

	inty morn	ioning nesu			Vo September 22	during mid	11000 1	luc												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	F	рH	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg.	
Station	Condition		Time	(m)		()	Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.7	27.7	8.2	8.2	28.3	28.4	97.6	97.0	6.6		3.2		6.7	
					Sunace	1.0	27.7	27.7	8.2	0.2	28.4	20.4	96.4	97.0	6.5	6.6	3.2		7.0	1
C1	Misty	Moderate	17:11	9.4	Middle	4.7	27.7	27.7	8.2	8.2	28.4	28.4	97.8	97.2	6.6	0.0	4.7	3.9	6.4	6.3
01	moty	modelate		0.1	Wildelo	4.7	27.7	21.1	8.2	0.2	28.4	20.1	96.6	07.2	6.5		4.6	0.0	6.2	0.0
					Bottom	8.4	27.7	27.7	8.2	8.2	28.4	28.4	98.4	97.8	6.6	6.6	4.0		5.5	1
						8.4	27.7		8.2		28.3		97.2		6.5		3.9		5.9	Ļ
					Surface	1.0	27.7	27.7	8.2	8.2	28.3	28.4	96.4	96.0	6.5	-	4.5		7.4	1
						1.0	27.7		8.2		28.4		95.6		6.4	6.5	4.5		7.7	4
C2	Misty	Moderate	17:29	8.6	Middle	4.3 4.3	27.6 27.7	27.7	8.2 8.2	8.2	28.5 28.4	28.5	96.9 95.9	96.4	6.5 6.4	-	5.5 5.6	5.6	6.5 6.2	6.5
						7.6	27.7		8.2		28.5		95.9		6.6		6.8		5.7	i i
					Bottom	7.6	27.7	27.7	8.2	8.2	28.3	28.4	96.4	97.4	6.5	6.6	6.7		5.5	i i
					<u> </u>	1.0	27.7	07.7	8.2		28.6	00.0	97.4	00.0	6.5		5.9		19.6	
					Surface	1.0	27.7	27.7	8.2	8.2	28.6	28.6	96.2	96.8	6.5	6.5	6.0		19.1	i
M1	Misty	Moderate	17:20	5.8	Middle	-	-	-	-	_	-	-	-		-	0.5	-	6.1	-	20.5
IVII	wiisty	woderate	17.20	5.0	Wilddie	-	-		-		-	_	-		-		-	0.1	-	20.5
					Bottom	4.8	27.7	27.7	8.2	8.2	28.6	28.6	98.6	97.8	6.6	6.6	6.3		21.3	1
						4.8	27.7		8.2	-	28.6		97.0		6.5		6.3		21.8	<u> </u>
					Surface	1.0	27.6	27.6	8.2	8.2	28.6	28.6	94.0	93.5	6.3		6.4		6.8	4
						1.0	27.6		8.2		28.6		93.0		6.3	6.3	6.3		6.6	1
M2	Misty	Moderate	17:24	5.2	Middle	-	-	-	-	-	-	-	-		-	-	-	7.0	-	7.5
						4.2	- 27.5		- 8.2		- 28.4		- 96.1		- 6.5		- 7.6		- 8.5	i
					Bottom	4.2	27.5	27.6	8.2	8.2	28.6	28.5	90.1	94.8	6.3	6.4	7.6		8.2	Í
						1.0	27.6		8.2		28.6		96.0		6.5		6.8		31	<u> </u>
					Surface	1.0	27.6	27.6	8.2	8.2	28.6	28.6	95.1	95.6	6.4	1	7.6		31	i
			17.10		NC 1 II	3.0	27.6	07.0	8.2		28.6	00.0	96.3	05.0	6.5	6.5	7.3		26	
M3	Misty	Moderate	17:16	6.0	Middle	3.0	27.6	27.6	8.2	8.2	28.6	28.6	95.3	95.8	6.4	1	7.3	7.5	25	26
					Bottom	5.0	27.6	27.6	8.2	8.2	28.6	28.6	96.8	96.1	6.5	6.5	8.1		22	i –
					BOILOTT	5.0	27.6	27.0	8.2	0.2	28.6	20.0	95.4	90.1	6.4	0.0	8.0		23	1

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 10 September 22 during Mid-Ebb Tide

		toring head			To September 22	during init														
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	р	Η	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.2	28.2	8.1	8.1	30.1	30.2	85.2	84.8	5.6		10.7		5.8	
					Sullace	1.0	28.2	20.2	8.1	0.1	30.2	30.2	84.4	04.0	5.6	5.6	10.5		4.5	j
C1	Cloudy	Moderate	12:19	10.6	Middle	5.3	28.1	28.1	8.1	8.1	30.2	30.2	84.4	84.4	5.6	5.0	12.3	12.4	7.4	5.6
01	Cloudy	Woderate	12.15	10.0	Middle	5.3	28.1	20.1	8.1	0.1	30.2	00.2	84.3	04.4	5.6		12.3	12.7	5.8	0.0
					Bottom	9.6	28.1	28.2	8.1	8.1	30.2	30.2	84.8	84.8	5.6	5.6	14.4		5.7	1
					Dottom	9.6	28.2	20.2	8.1	0	30.2	00.2	84.8	0.110	5.6	0.0	14.2		4.6	ļ
					Surface	1.0	28.3	28.3	8.1	8.1	30.1	30.2	86.9	86.2	5.7		10.0		5.2	1
						1.0	28.2		8.1		30.2		85.4		5.6	5.7	9.2		5.1	1
C2	Cloudy	Moderate	11:56	10.8	Middle	5.4	28.1	28.1	8.0	8.1	30.2	30.2	86.5	85.8	5.7		9.7	10.7	3.6	5.2
	,					5.4	28.1		8.1		30.2		85.1		5.6		9.5		5.0	4
					Bottom	9.8	28.1	28.1	8.0	8.1	30.2	30.2	88.3	86.9	5.8	5.7	12.9		6.4	4
	1					9.8	28.1		8.1		30.2		85.5		5.6		13.0		5.8	<u> </u>
					Surface	1.0	28.2 28.2	28.2	8.1 8.1	8.1	30.6	30.6	80.7	80.8	5.3	-	7.7		7.3	1
						1.0	-		-		30.6		80.9		5.3	5.3	7.6		8.2	i
M1	Cloudy	Moderate	12:10	5.7	Middle	-	-	-	-	-	-	-	-	-	-	-	-	7.9	-	7.5
						- 4.7	28.2		- 8.0		30.6		- 80.7		- 5.3		- 8.2		7.0	i
					Bottom	4.7	28.2	28.2	8.1	8.1	30.6	30.6	80.7	80.8	5.3	5.3	8.2		7.0	i i
						1.0	28.3		8.1		30.6		81.2		5.3		5.3		9.2	<u> </u>
					Surface	1.0	28.2	28.3	8.1	8.1	30.6	30.6	80.1	80.7	5.3		5.4		11.4	1
						-	-		-		-		-		-	5.3	-		-	1
M2	Cloudy	Moderate	12:06	5.4	Middle	-	-	-	-	-	-	-	-	-	-		-	5.8	-	10.8
					<b>D</b>	4.4	28.2		8.0		30.6		79.4		5.2		6.2		12.6	1
					Bottom	4.4	28.2	28.2	8.1	8.1	30.6	30.6	80.9	80.2	5.3	5.3	6.3		9.8	1
					0 /	1.0	28.3		8.1		30.4	00.4	84.5	00.0	5.6		7.0		10	
					Surface	1.0	28.2	28.3	8.1	8.1	30.4	30.4	83.2	83.9	5.5	5.5	7.8		8	i
M3	Cloudy	Moderate	12:13	7.5	Middle	3.8	28.1	28.1	8.0	8.1	30.6	30.6	79.7	80.6	5.3	5.5	9.6	9.2	10	9
IVIS	Cioudy	woderate	12:13	6. Y	widdie	3.8	28.1	20.1	8.1	0.1	30.6	30.0	81.4	0.00	5.4	1	9.5	9.2	10	9
					Bottom	6.5	28.2	28.2	8.0	8.1	30.5	30.6	78.9	77.8	5.2	5.2	10.5		10	i –
					BOILOITI	6.5	28.1	20.2	8.1	0.1	30.7	30.0	76.7	11.0	5.1	J.2	10.5	]	8	i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

### Water Quality Monitoring

 Water Quality Monitoring Results on
 10 September 22
 during Mid-Flood Tide

		toring Resu			To September 22	uunng mu		lue												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	F	рН	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)	Camping 2 op		Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.4	28.4	8.1	8.2	30.1	30.2	85.5	85.1	5.6		8.2		9.9	
					Suilace	1.0	28.3	20.4	8.2	0.2	30.2	30.2	84.6	05.1	5.6	5.6	8.9		7.9	l
C1	Cloudy	Moderate	18:42	10.4	Middle	5.2	28.2	28.2	8.1	8.2	30.3	30.3	83.7	83.5	5.5	0.0	10.4	11.0	6.6	8.6
•					Inidato	5.2	28.2	2012	8.2	0.2	30.3	00.0	83.2	00.0	5.5		10.9		6.6	1
					Bottom	9.4	28.2	28.2	8.1	8.2	30.3	30.3	83.8	83.5	5.5	5.5	14.0		10.4	ł
						9.4	28.2		8.2		30.3		83.1		5.5		13.3		10.1	
					Surface	1.0	28.4	28.4	8.1	8.2	30.1	30.2	84.4	84.4	5.6	_	7.9		9.4	ł
						1.0	28.3		8.2		30.2		84.3		5.5	5.4	7.9		9.5	ł
C2	Cloudy	Moderate	19:04	10.1	Middle	5.1 5.1	28.3 28.3	28.3	8.1 8.2	8.2	30.4 30.4	30.4	80.5 81.1	80.8	5.3 5.3	-	8.2 8.3	9.9	10.3 8.6	8.9
						9.1	28.3		8.1		30.4		78.9		5.2		0.3 13.6		8.2	ł
					Bottom	9.1	28.3	28.3	8.2	8.2	30.4	30.4	78.0	78.5	5.1	5.2	13.2		7.3	ł
						1.0	28.4		8.1		30.3		82.3		5.4		7.9		7.7	[
					Surface	1.0	28.4	28.4	8.1	8.1	30.3	30.3	82.2	82.3	5.4		7.4		9.4	ł
M1	Claudy	Moderate	18:53	5.5	Middle	-	-		-		-		-		-	5.4	-	10.4	-	8.1
IVI1	Cloudy	woderate	18:53	5.5	IVIIdale	-	-	-	-	-	-	-	-	- 1	-		-	10.4	-	8.1
					Bottom	4.5	28.6	28.5	8.0	8.1	30.3	30.3	79.4	78.4	5.2	5.2	13.0		7.4	l
					Dottom	4.5	28.4	20.5	8.1	0.1	30.3	00.0	77.4	70.4	5.1	0.2	13.1		8.0	I
					Surface	1.0	28.4	28.4	8.1	8.1	30.4	30.4	83.6	83.7	5.5		9.2		6.9	1
						1.0	28.4		8.1		30.4		83.8		5.5	5.5	9.2		8.2	ł
M2	Cloudy	Moderate	18:56	5.6	Middle	-	-	-	-	-	-	-	-		-		-	11.0	-	6.7
	,					-	-		-		-		-		-		-		-	
					Bottom	4.6	28.3	28.4	8.1	8.1	30.5	30.5	82.8	83.4	5.4	5.5	13.0		5.3	ł
				1		4.6	28.4		8.1		30.4		83.9	1	5.5		12.4		6.3	
					Surface	1.0	28.4	28.4	8.1	8.1	30.3	30.3	83.2	83.3	5.5	_	10.5		6	ł
						1.0 3.5	28.3		8.1		30.3		83.3 81.8		5.5 5.4	5.5	10.6		5	ł
M3	Cloudy	Moderate	18:49	7.0	Middle	3.5	28.3 28.3	28.3	8.1 8.1	8.1	30.4 30.4	30.4	81.8 81.7	81.8	5.4	-	10.9 10.6	11.1	6 5	6
						6.0	28.3		8.1		30.4		79.0		5.4		10.6		5 6	ł
					Bottom	6.0	28.3	28.3	8.1	8.1	30.3	30.4	79.0 80.5	79.8	5.2	5.3	11.9		6	ł
						0.0	20.3		0.1		30.3		00.5		0.0		11.0		0	<u> </u>

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 13 September 22 during Mid-Ebb Tide

		toring Resu			13 September 22	uunny mu		6												
Monitoring	Weather	Sea Condition		Water Depth	Sampling Dep	th (m)	Water Te	mperature (°C)	p	эΗ	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)		· · · · ·	Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.9	28.9	8.2	8.2	26.7	26.7	85.4	85.1	5.7		5.6		6.3	
					Sullace	1.0	28.9	20.9	8.2	0.2	26.7	20.7	84.8	00.1	5.6	5.6	5.8		6.2	]
C1	Cloudy	Moderate	13:33	11.1	Middle	5.6	28.6	28.6	8.2	8.2	27.1	27.1	82.4	81.8	5.5	0.0	10.2	10.3	8.8	6.9
01	cloudy	modorato	10.00		Middlo	5.6	28.6	20.0	8.2	0.2	27.1	27.1	81.1	01.0	5.4		10.2	10.0	6.5	0.0
					Bottom	10.1	28.6	28.6	8.2	8.2	27.2	27.2	83.0	82.9	5.5	5.5	15.0		6.8	1
					Dottom	10.1	28.6	2010	8.2	0.2	27.1		82.8	02.0	5.5	0.0	15.0		6.9	Ļ
					Surface	1.0	28.8	28.9	8.2	8.2	26.9	26.9	84.1	83.9	5.6		7.2		4.8	1
						1.0	28.9		8.2	-	26.8		83.6		5.6	5.5	7.0		6.6	1
C2	Cloudy	Moderate	13:57	11.2	Middle	5.6	28.4	28.4	8.2	8.2	27.6	27.7	82.1	81.3	5.5		11.8	10.8	11.9	7.1
						5.6	28.3		8.2		27.8		80.4		5.4		10.9		7.2	4
					Bottom	10.2	28.0	28.2	8.2	8.2	28.4	28.2	76.2	74.9	5.1	5.0	13.6		5.8	4
		1		1		10.2	28.3		8.2		27.9		73.5		4.9		14.0		6.3	<u> </u>
					Surface	1.0	28.8 28.6	28.7	8.2 8.2	8.2	27.2 27.3	27.3	81.1 79.7	80.4	5.4 5.3	-	7.5		5.9 4.6	1
									0.Z		27.3					5.4	8.9			1
M1	Cloudy	Moderate	13:42	5.8	Middle	-	-	-	-	-	-	-	-	-	-	-	-	8.4	-	4.9
						4.8	28.5		- 8.1		27.3		78.0		5.2		- 8.8		4.6	1
					Bottom	4.8	28.7	28.6	8.2	8.2	27.3	27.3	80.9	79.5	5.4	5.3	8.2		4.5	1
						1.0	28.7		8.1		27.2		80.9		5.4		7.1		5.2	<u> </u>
					Surface	1.0	28.8	28.8	8.1	8.1	27.2	27.2	82.3	81.6	5.5		7.4		4.9	1
						-	-		-		-		-		-	5.5	-		-	
M2	Cloudy	Moderate	13:47	5.4	Middle	-	-	-	-	-	-	-	-	-	-		-	7.5	-	5.4
					Bottom	4.4	28.6	28.7	8.1	8.1	27.3	27.3	79.9	79.4	5.3	5.3	7.6		6.1	1
					Bottom	4.4	28.8	28.7	8.1	8.1	27.2	27.3	78.9	79.4	5.2	5.3	7.8		5.4	1
					Surface	1.0	28.7	28.7	8.2	8.2	27.2	27.2	81.6	81.7	5.4		7.6		6	
					Sunace	1.0	28.7	20.1	8.2	0.2	27.2	21.2	81.7	01.7	5.4	5.3	7.9		6	i
M3	Cloudy	Moderate	13:38	7.4	Middle	3.7	28.4	28.5	8.2	8.2	27.3	27.3	79.1	78.8	5.3	5.5	12.6	11.4	6	6
NIS	Cioudy	wouerate	13.30	7.4		3.7	28.5	20.5	8.2	0.2	27.3	21.5	78.5	10.0	5.2		12.8	11.4	6	Ŭ
					Bottom	6.4	28.4	28.5	8.2	8.2	27.3	27.3	83.7	81.0	5.2	5.2	13.6		7	i i
	1				Bottom	6.4	28.5	20.0	8.2	0.2	27.3	21.5	78.3	01.0	5.2	5.2	13.8		6	i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

## Water Quality Monitoring

 Water Quality Monitoring Results on
 13 September 22
 during Mid-Flood Tide

Pr Sea Condition	Sampling Time	Water Depth (m)	Sampling Dep	th (m)	Water Te	emperature (°C)		рH	Salin	ity (ppt)	DO Satur	(0/)	Dissolved	Oxygen	Turbidity(		Suspende	d Solids
	Time	(m)	eamping 2 op				ł	<b>P</b> 11	Jain	ity (ppt)	DO Salui	alion (%)	(mg/l	_)	Turbluity	N10)	(mg/	
					Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
			Surface	1.0	28.4	28.4	8.1	8.1	27.1	27.1	79.2	78.9	5.3		13.5		3.2	í
			Gunace	1.0	28.4	20.4	8.1	0.1	27.1	27.1	78.6	10.5	5.3	5.3	13.3		4.0	l
/ Moderate	09:18	11.0	Middle	5.5	28.4	28.4	8.1	81	27.2	27.2	79.3	78.9		0.0	12.3	9.9	10.0	5.9
					-	2011	-	0.1			-	1010	-					1
			Bottom			28.4		8.1		27.2		80.8		5.4	-			1
					-		-								_			
			Surface			28.4		8.1		27.0		80.1		-				ł
			-											5.3				ł
/ Moderate	08:57	10.6	Middle			28.4		8.1		27.1		79.7		-		11.2		11.5
					-		-								-			ł
			Bottom			28.4		8.1		27.1		79.7		5.4				ł
													-					
			Surface	1.0	28.4	28.4	8.1	8.1	27.4	27.4	74.2	74.6	5.0		6.8		6.1	ł
Madarata	00.00	5.0	Middle	-	-		-		-		-		-	5.0	-	<u> </u>	-	5.4
woderate	09:08	5.9	ivildale	-	-	-	-	-	-	-	-	-	-		-	0.0	-	5.4
			Bottom	4.9	28.4	28.4	8.1	81	27.4	27 4	76.1	75.3	5.1	51	6.8			1
			Bottom	4.9	-	20.4		0.1		21.4	74.4	10.0		0.1			_	<u> </u>
			Surface			28.4		8.1		27.3		75.4		-				ł
				1.0	28.4		8.1	-	27.3	-	74.8		5.0	5.1	8.8		11.8	ł
Moderate	09:05	5.8	Middle	-	-	-	-	-	-	-	-	-	-		-	10.7	-	12.6
				-	-		-		-		-		-		-		-	ł
			Bottom			28.4		8.1		27.3		77.0		5.2				ł
												1	-		-			<u> </u>
			Surface			28.5		8.1		26.8		79.0		-				ł
							-							5.2				ł
/ Moderate	09:13	7.0	Middle		-	28.4		8.1		27.1		76.5	-			5.7		10
	1												-					ł
	1		Bottom			28.4		8.1		27.3		72.8		4.9				l
	y Moderate y Moderate	y Moderate 08:57 y Moderate 09:08 y Moderate 09:08	y Moderate 08:57 10.6 y Moderate 09:08 5.9 y Moderate 09:05 5.8	y Moderate 08:57 10.6 Bottom Moderate 08:57 10.6 Middle Bottom Moderate 09:08 5.9 Middle Bottom 9 Moderate 09:08 5.9 Middle Bottom 9 Moderate 09:05 5.8 Middle Bottom 9 Moderate 09:05 5.8 Surface 9 Moderate 09:05 5.8 Middle Bottom 9 Moderate 09:05 5.8 Middle Bottom 9 Moderate 09:13 7.0 Middle	y         Middle         5.5           Bottom         10.0           Bottom         10.0           y         Moderate         08:57         10.6         Surface         1.0           y         Moderate         08:57         10.6         Surface         1.0           y         Moderate         08:57         10.6         Middle         5.3           y         Moderate         08:57         10.6         Middle         5.3           y         Moderate         09:08         5.9         Surface         1.0           y         Moderate         09:08         5.9         Surface         1.0           y         Moderate         09:05         5.8         Surface         1.0           y         Moderate         09:05         5.8         Surface         1.0           y         Moderate         09:05         5.8         Middle            Bottom         4.8              y         Moderate         09:13         7.0         Middle         3.5           Surface         1.0	y Moderate 09:18 11.0 Middle 5.5 28.4 Bottom 10.0 28.4 10.0 28.4 10.0 28.4 10.0 28.4 10.0 28.4 1.0 28.4 1.0 28.4 5.3 28.4 5.3 28.4 9.6 28.4 9.6 28.4 9.6 28.4 9.6 28.4 9.6 28.4 9.6 28.4 9.6 28.4 1.0 28.4 9.6 28.4 9.6 28.4 9.6 28.4 9.6 28.4 1.0 28.5 2.8 A 1.0 28.5 1.0 28.5	y         Moderate         09:18         11.0         Middle         5.5         28.4         23.4           Bottom         10.0         28.4         28.4         28.4         28.4           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4           y         Moderate         08:57         10.6         Middle         5.3         28.4         28.4           y         Moderate         08:57         10.6         Middle         5.3         28.4         28.4           y         Moderate         08:57         10.6         Middle         5.3         28.4         28.4           y         Moderate         09:08         5.9         Surface         1.0         28.4         28.4           y         Moderate         09:08         5.9         Middle         -         -         -           Bottom         4.9         28.4         28.4         28.4         28.4         28.4           y         Moderate         09:05         5.8         Middle         -         -         -           Bottom         4.8         28.4         28.4         28.4         28.4	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1           Bottom         10.0         28.4         28.4         8.1         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1           y         Moderate         09:08         5.9         Surface         1.0         28.4         28.4         8.1           y         Moderate         09:08         5.9         Surface         1.0         28.4         28.4         8.1           y         Moderate         09:05         5.8         Surface         1.0         28.4         28.4         8.1           y         Moderate         09:05         5.8         Surface         1.	y         Moderate         09.18         11.0         Middle         5.5         28.4         28.4         8.1         8.1           Bottom         10.0         28.4         28.4         28.4         8.1         8.1         8.1           y         Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         28.4         8.1         8.1           y         Moderate         08:57         10.6         Middle         5.3         28.4         28.4         8.1         8.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1         8.1           y         Moderate         09:08         5.9         Surface         1.0         28.4         28.4         8.1         8.1           y         Moderate         09:05         5.8         Surface         1.0         28.4         28.4         8.1         8.1           y         Moderate         09:05         5.8         Middle         -	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2           Bottom         10.0         28.4         28.4         8.1         8.1         8.1         27.2         27.1           y         Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.2         27.1           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.0         27.	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2           Bottom         10.0         28.4         28.4         8.1         8.1         27.2         27.2         27.2           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.0         27.1         27	y         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         78.4           Bottom         10.0         28.4         28.4         8.1         8.1         8.1         27.2         27.2         78.4           y         Moderate         08.57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.2         27.2         78.9           y         Moderate         08.57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.0         27.0         78.9           y         Moderate         08.57         10.6         Middle         5.3         28.4         28.4         8.1         8.1         27.0         27.0         79.9           Moderate         08.57         10.6         Middle         5.3         28.4         28.4         8.1         8.1         27.0         27.1         79.8           Bottom         9.6         28.4         28.4         8.1         8.1         27.4         27.4         74.9           y         Moderate         09.08         5.9         Middle         -	y         Moderate         09.18         11.0         Middle         5.5         28.4         28.4         8.1         27.2         27.2         78.4         78.9           Bottom         10.0         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         80.8           y         Moderate         08.57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.0         70.0         70.9         80.3           y         Moderate         08.57         10.6         Middle         5.3         28.4         28.4         8.1         8.1         27.0         27.1         77.0         79.9         79.7           Moderate         08.57         10.6         Middle         5.3         28.4         28.4         8.1         8.1         27.1         27.1         79.4         79.7         79.7         79.4         79.7         79.7         79.4         79.7         79.7         79.7         79.7         79.7         79.7         79.7         79.7         79.7         74.6         74.2         74.6         74.4         74.4         74.2         74.6         74.2         74	y         Middle         5.5         28.4         26.4         8.1         27.2         27.2         78.4         78.9         5.2           Bottom         10.0         28.4         28.4         8.1         8.1         27.2         27.2         78.9         80.8         5.5           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.1         27.0         27.0         78.9         80.8         5.5           y         Moderate         08:57         10.6         Surface         1.0         28.4         28.4         8.1         8.1         27.0         27.1         79.8         79.7         5.3           Bottom         9.6         28.4         28.4         8.1         8.1         27.0         27.1         79.8         79.7         5.3           Bottom         9.6         28.4         28.4         8.1         8.1         27.1         27.4         79.4         79.7         5.3           Moderate         09:08         5.9         Middle         -         -         -         -         -         -         -         -         -         -	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         27.2         79.3         78.9         5.3           y         Moderate         09:18         11.0         28.4         28.4         8.1         8.1         27.2         27.2         27.2         27.2         78.9         5.3         5.4           y         Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.2         27.2         27.2         27.0         78.9         6.5.5         5.4           y         Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.0	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         79.3         78.9         5.3         5.3         11.9           Bottom         10.0         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         5.3         5.3         5.4         40.0           y         Moderate         06:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.0         27.0         79.3         80.8         5.3         5.4         40.0           y         Moderate         06:57         10.6         Middle         5.3         28.4         28.4         8.1         8.1         27.0         27.0         79.9         80.1         5.3         79.9         80.1         5.3         79.7         5.3         79.4         79.7         5.3         79.4         79.7         75.3         79.4         79.7         75.3         79.4         79.7         75.3         79.4         79.7         75.3         79.4         79.7         75.3         79.7         75.3         79.7         75.3	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         5.5         5.5         11.9         9.9           Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         5.5         5.6         4.0         4.0           Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.1         27.0         78.9         80.1         5.3         5.4         4.0           Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.0         27.0         78.9         80.1         5.3         5.4         4.0           Moderate         08:57         10.6         Surface         10.0         28.4         28.4         8.1         8.1         27.0         27.1         78.6         78.7         5.3         5.4         11.1           Moderate         09:08         5.9         Middle	y         Moderate         09:18         11.0         Middle         5.5         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         5.3         1.0         10.0         5.5         28.4         28.4         8.1         8.1         27.2         27.2         78.4         78.9         5.3         5.2         11.9         6.6         6.7         5.6         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         6.7         11.9         11.9         11.0         28.4         28.4         8.1         8.1         27.1         27.0         27.0         27.0         27.0         27.0         27.0         27.0         27.0         27.1         79.8         6.7         5.3         11.1         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.2         11.

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 15 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	~~~~		mperature (°C)	p	эΗ	Salin	ity (ppt)	DO Satur	ration (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)	Camping 2 op		Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.6	29.7	8.2	8.2	29.0	28.9	93.7	94.3	6.1		2.9		4.2	
					Sullace	1.0	29.8	23.1	8.2	0.2	28.8	20.3	94.8	34.3	6.1	5.8	3.1		3.8	1
C1	Cloudy	Moderate	14:30	10.6	Middle	5.3	29.2	29.2	8.1	8.2	29.4	29.6	83.8	84.3	5.5	0.0	5.6	6.7	6.9	6.2
01	cloudy	moderate			indato	5.3	29.1	2012	8.2	0.2	29.8	2010	84.7	0.10	5.5		5.9	0	6.5	0
					Bottom	9.6	29.0	29.0	8.1	8.2	29.9	29.9	82.6	81.9	5.4	5.4	11.2		8.0	1
						9.6	29.0		8.2	-	29.9		81.1		5.3		11.2		7.9	Ļ
					Surface	1.0	29.3	29.3	8.1	8.1	29.4	29.5	84.4	84.6	5.5		6.7		9.4	4
						1.0	29.2		8.1		29.6		84.8		5.5	5.3	7.0		9.1	4
C2	Cloudy	Moderate	14:51	10.1	Middle	5.1	29.0	29.0	8.1 8.1	8.1	29.9	30.0	79.0	78.7	5.2	-	8.5	7.9	7.6	7.8
	-					5.1	29.0				30.0		78.4		5.1		8.7		8.0	1
					Bottom	9.1	28.9	29.0	8.1 8.1	8.1	30.1	30.0	80.2	79.4	5.2	5.2	8.2		6.6 6.2	1
						9.1	29.1 29.6				29.8		78.6		5.1		8.2 6.0		5.7	┝───
					Surface	1.0	29.6	29.6	8.1 8.1	8.1	29.4 29.4	29.4	85.3 84.1	84.7	5.5 5.5	-	6.6		5.7	1
						-	- 29.0		-		- 29.4				5.5	5.5	-		- 5.0	1
M1	Cloudy	Moderate	14:41	5.8	Middle	-	-	-	-	-	-	-	-		-	-	-	6.8		6.0
						4.8	29.5		8.1		29.5		84.6		- 5.5		7.4		6.5	1
					Bottom	4.8	29.5	29.5	8.1	8.1	29.5	29.5	83.3	84.0	5.4	5.5	7.4		6.0	1
						1.0	29.6		8.2		29.3		88.3		5.7		4.7		8.6	
					Surface	1.0	29.5	29.6	8.1	8.2	29.4	29.4	87.2	87.8	5.7	1	5.0		9.0	1
	<u>.</u>					-	-		-		-		-		-	5.7	-		-	
M2	Cloudy	Moderate	14:44	5.8	Middle	-	-	-	-	-	-	-	-	-	-	1	-	4.8	-	7.8
					Dettern	4.8	29.4	29.5	8.2	8.2	29.4	29.4	88.9	86.9	5.8	5.7	4.5		7.0	1
					Bottom	4.8	29.6	29.5	8.1	8.2	29.3	29.4	84.8	60.9	5.5	5.7	4.8		6.7	1
					Surface	1.0	29.3	29.3	8.2	8.2	29.4	29.4	85.7	84.6	5.6		8.5		4	
					Suilace	1.0	29.3	23.3	8.1	0.2	29.4	23.4	83.5	04.0	5.4	5.5	8.5		4	i i
M3	Cloudy	Moderate	14:36	6.8	Middle	3.4	29.3	29.2	8.1	8.1	29.4	29.5	84.4	82.6	5.5	5.5	8.5	9.8	4	5
NIO NIO	Cioudy	moderate	17.00	0.0	Middle	3.4	29.1	20.2	8.1	0.1	29.6	20.0	80.8	02.0	5.3		8.2	5.5	5	Ŭ
					Bottom	5.8	29.1	29.2	8.1	8.1	29.6	29.6	82.9	81.9	5.4	5.4	12.6		7	1
	1				Bottom	5.8	29.2	20.2	8.1	0.1	29.5	20.0	80.8	01.0	5.3	0.1	12.5		7	i i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 15 September 22 during Mid-Flood Tide

Water Qua		toring Resu		1	15 September 22	during mid	110001						1				1			
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	P	эΗ	Salin	ity (ppt)	DO Satu	ation (%)	Dissolved ( (mg/l		Turbidity(	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.2	29.2	8.1	8.1	29.1	29.1	83.7	83.8	5.5		5.8		8.5	
					Guilace	1.0	29.2	23.2	8.1	0.1	29.0	23.1	83.9	00.0	5.5	5.5	6.1		8.6	
C1	Cloudy	Moderate	09:57	10.8	Middle	5.4	29.1	29.1	8.1	8.1	29.2	29.3	83.2	83.1	5.4	0.0	5.9	5.2	9.2	9.1
	,				maaro	5.4	29.1	2011	8.1	0.1.	29.3	2010	83.0		5.4		5.4		8.9	
					Bottom	9.8	29.1	29.1	8.1	8.1	29.3	29.3	83.3	83.4	5.4	5.5	4.0		9.7	
	-					9.8	29.1	-	8.1	-	29.2		83.5		5.5		4.2		9.5	
					Surface	1.0	29.2	29.2	8.1	8.1	28.8	29.0	85.9	85.7	5.6		5.3		11.4	
						1.0	29.1		8.1		29.1		85.4		5.6	5.6	6.2		11.3	
C2	Cloudy	Moderate	09:37	10.1	Middle	5.1 5.1	29.1 29.1	29.1	8.1 8.1	8.1	29.3 29.3	29.3	85.0 85.1	85.1	5.6 5.6	-	7.1 7.1	6.9	13.6 13.2	13.3
						9.1	29.1		8.1		29.3		85.1	-	5.6		7.1		13.2	
					Bottom	9.1	29.1	29.1	8.1	8.1	29.3	29.3	85.2	84.1	5.6	5.5	7.7		15.3	
						1.0	29.2		8.1		29.6		76.9		5.0		8.1		8.7	
					Surface	1.0	29.2	29.2	8.1	8.1	29.6	29.6	76.0	76.5	5.0		8.6		8.6	
M1	Olavaha	Madausta	00.40	5.0	N Al al all a	-	-		-		-		-		-	5.0	-	7.0	-	
IVIT	Cloudy	Moderate	09:48	5.9	Middle	-	-	-	-	-	-	-	-	- 1	-	1	-	7.9	-	9.3
					Bottom	4.9	29.2	29.2	8.1	8.1	29.7	29.7	78.8	77.6	5.1	5.1	7.3		10.1	
					Dottom	4.9	29.2	23.2	8.1	0.1	29.6	23.1	76.4	11.0	5.0	5.1	7.4		9.7	
					Surface	1.0	29.2	29.3	8.1	8.1	29.3	29.3	79.4	79.5	5.2		10.0		8.9	
						1.0	29.3		8.1		29.2		79.6		5.2	5.2	10.7		8.6	
M2	Cloudy	Moderate	09:45	5.6	Middle	-	-	-	-	-	-	-	-		-		-	10.6	-	7.0
	,					-	-		-		-		-		-		-		-	
					Bottom	4.6	29.2	29.2	8.1	8.1	29.4	29.4	80.4	79.6	5.2	5.2	11.1		5.5	
						4.6	29.2		8.1		29.4		78.7	1	5.1		10.7		5.1	
					Surface	1.0	29.3	29.4	8.1	8.1	28.8	28.8	85.1	86.2	5.6 5.7		4.5		4	
						1.0	29.4		8.1		28.7		87.2		5.7	5.5	4.0		5 5	
M3	Cloudy	Moderate	09:53	6.5	Middle	3.3	29.2 29.2	29.2	8.1 8.1	8.1	29.1 29.1	29.1	83.8 81.4	82.6	5.5	4	4.1 4.0	4.9	5	6
						5.5	29.2		8.1		29.1		78.2	<u> </u>	5.3		4.0 6.2		6 7	
					Bottom	5.5	29.1	29.2	8.1	8.1	29.4	29.2	80.1	79.2	5.1	5.2	6.6		7	
		1	1			0.0	29.3		0.1		29.0		0U. I		5.Z		0.0		1	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 17 September 22 during Mid-Ebb Tide

Water Qua		loning Resu		1	17 September 22			e			1				Dissolved	0.00000			Suspende	
Monitoring	Weather	Sea Condition		Water Depth	Sampling Dep	th (m)	Water Te	mperature (°C)	P	ъH	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.3	29.4	8.2	8.2	29.1	29.1	96.0	96.3	6.3		6.2		1.8	
					Guidado	1.0	29.4	20.1	8.2	0.2	29.0	20.1	96.6	00.0	6.2	6.2	6.3		2.9	
C1	Misty	Moderate	15:48	9.4	Middle	4.7	29.1	29.2	8.2	8.2	29.9	29.6	95.6	95.6	6.2		7.1	7.2	1.9	2.1
	,					4.7	29.3		8.2		29.2		95.6		6.2		7.2		2.2	
					Bottom	8.4 8.4	29.1 29.4	29.3	8.2 8.2	8.2	30.0 29.1	29.6	95.8 95.4	95.6	6.2 6.2	6.2	8.0 8.1		2.4 1.5	
						1.0	29.4		8.2		30.2		95.4 84.3		5.5		5.0		3.2	
					Surface	1.0	29.7	29.4	8.2	8.2	28.7	29.5	84.0	84.2	5.5		5.0		2.6	
00			10.00		N 41 1 11	4.0	29.0	00.0	8.2		30.2	00.7	84.7		5.5	5.5	6.9		3.5	
C2	Misty	Moderate	16:03	8.0	Middle	4.0	29.5	29.3	8.2	8.2	29.2	29.7	84.1	84.4	5.5	1	6.8	6.6	3.7	3.4
					Bottom	7.0	29.0	29.3	8.2	8.3	30.1	29.3	88.0	88.1	5.7	5.7	7.9		3.1	
					Dollom	7.0	29.5	29.3	8.3	0.5	28.5	29.5	88.1	00.1	5.7	5.7	7.9		4.4	
					Surface	1.0	29.5	29.6	8.2	8.2	28.9	28.8	91.8	92.1	6.0		7.6		3.8	
						1.0	29.7		8.2		28.7		92.3		6.0	6.0	7.7		2.9	
M1	Misty	Moderate	15:58	5.2	Middle	-	-	-	-	-	-	-	-	-	-		-	7.9	-	3.1
	-					-	-		-		-		-		-		-		-	
					Bottom	4.2	29.5 29.7	29.6	8.2 8.2	8.2	29.0 28.7	28.9	97.2 93.3	95.3	6.3 6.1	6.2	8.1 8.0		2.9 2.9	
						1.0	30.1		8.2		28.4		101.8		6.6		4.8		3.0	
					Surface	1.0	30.1	30.1	8.2	8.2	28.4	28.4	101.7	101.8	6.6		4.8		3.2	
M2	Misty	Madavata	15:56	5.6	Middle	-	- 1		-		-		-		-	6.6	-	5.2	-	3.1
IVIZ	iviisty	Moderate	15:56	5.6	Middle	-	-	-	-	-	-	-	-	-	-		-	5.2	-	3.1
					Bottom	4.6	30.1	30.1	8.3	8.3	28.4	28.4	102.4	102.2	6.6	6.6	5.5		3.4	
					Dottom	4.6	30.1	00.1	8.2	0.0	28.4	20.1	102.0	102.2	6.6	0.0	5.6		2.9	
					Surface	1.0	29.2	29.3	8.2	8.2	29.5	29.4	91.5	91.6	6.0		4.2		3	
						1.0	29.3		8.2		29.3		91.6		5.9	6.0	4.3		4	
M3	Misty	Moderate	15:52	6.0	Middle	3.0 3.0	29.0 29.2	29.1	8.2 8.2	8.2	29.9 29.5	29.7	95.6 95.0	95.3	6.1 6.1		5.9 5.8	5.5	3	3
						5.0	29.2		8.2		29.5 29.7		95.0 95.7		6.1		5.8 6.4		3	
					Bottom	5.0	20.9	29.1	8.2	8.2	29.4	29.6	95.4	95.6	6.1	6.2	6.3		4	
	1	1		1		5.0	23.0		0.2		23.4		50.4		0.1	1	0.5		4	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

## Water Quality Monitoring

Water Quality Monitoring Results on 17 September 22 during Mid-Flood Tide

matci Quu		toring Resu			17 September 22	uunny mu	11000 1	luc												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	р	эΗ	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)	5 a		Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.4	29.5	8.1	8.2	28.4	28.2	95.9	96.9	6.3		2.3		3.7	
					Guilace	1.0	29.5	23.5	8.2	0.2	27.9	20.2	97.8	30.3	6.4	6.2	2.3		2.9	1
C1	Misty	Moderate	11:52	8.0	Middle	4.0	29.3	29.4	8.1	8.1	29.0	28.5	89.7	91.8	5.9	0.2	3.0	3.2	2.5	2.8
			-			4.0	29.5		8.1		28.0		93.9		6.1		3.1	-	2.0	1
					Bottom	7.0	29.3	29.4	8.1	8.1	29.1	28.6	95.8	95.9	6.2	6.3	4.0		2.0	1
						7.0	29.5		8.1		28.0		95.9	1	6.3		4.2		3.4	<u> </u>
					Surface	1.0	29.7	29.8	8.2 8.2	8.2	27.5 27.1	27.3	108.7	108.1	7.1	-	2.0		5.3	1
						1.0	29.8						107.4		7.0 6.6	6.8	1.9		4.6	1
C2	Misty	Moderate	11:35	9.2	Middle	4.6	29.6 29.7	29.7	8.2 8.2	8.2	28.0 28.1	28.1	101.7 98.8	100.3	6.6	-	2.3 2.3	2.2	5.5 5.0	5.4
						8.2	29.6		8.2		27.9		102.6		6.7		2.3		6.7	Í
					Bottom	8.2	29.8	29.7	8.2	8.2	29.1	28.5	102.0	102.4	6.6	6.7	2.3		5.4	i
					0 <i>i</i>	1.0	29.7	00.7	8.2		27.4	07.4	98.7	00.0	6.5		7.1		5.9	
					Surface	1.0	29.7	29.7	8.2	8.2	27.4	27.4	98.9	98.8	6.5	6.5	7.2		5.4	Í
M1	Mistv	Moderate	11:41	5.0	Middle	-	-	_	-		-	-	-	_	-	0.0	-	7.6	-	5.4
IVII	iviisty	woderate	11.41	5.0	Wildule	-	-	-	-	-	-	-	•	-	-		-	7.0	-	5.4
					Bottom	4.0	29.6	29.7	8.2	8.2	27.5	27.5	101.1	100.2	6.6	6.6	8.0		5.6	1
					2011011	4.0	29.7	2011	8.2	0.2	27.4	2.1.0	99.3		6.5	0.0	8.1		4.6	<u> </u>
					Surface	1.0	29.7	29.7	8.2	8.2	28.1	28.1	95.6	95.1	6.2		5.1		5.6	1
						1.0	29.7		8.2		28.0		94.5		6.2	6.2	5.2		4.6	4
M2	Misty	Moderate	11:43	4.6	Middle	-	-	-	-	-	-	-	-		-	-	-	5.8	-	5.0
	-					-	-		-		-		-		-		-		-	4
					Bottom	3.6 3.6	29.7 29.7	29.7	8.2 8.2	8.2	28.1 28.1	28.1	97.8 95.2	96.5	6.4 6.2	6.3	6.5 6.4		5.2 4.5	Í
	1		1	1		1.0	29.7		8.2		28.1		95.2 106.7	1	7.0		0.4 2.0		4.5	<u> </u>
					Surface	1.0	29.7	29.8	8.2	8.2	26.7	27.0	106.7	106.7	6.9	1	2.0		7	i –
						3.4	29.9		8.2		27.5		100.7		6.7	6.8	3.1		4	i –
M3	Misty	Moderate	11:47	6.8	Middle	3.4	29.8	29.7	8.2	8.2	26.8	27.2	102.5	102.4	6.7	1	3.2	3.1	4	5
					<b>D</b>	5.8	29.6		8.2		27.6		101.5		6.6		4.2		4	i –
					Bottom	5.8	29.8	29.7	8.2	8.2	27.0	27.3	101.6	101.6	6.6	6.6	4.1		5	i i

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 20 September 22
 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	р	н	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/l		Turbidity	(NTU)	Suspende (mg.	
Station	Condition		Time	(m)	Camping 2 op	()	Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.4	29.4	8.4	8.4	27.1	27.1	112.1	112.2	7.4		1.5		2.2	
					Sullace	1.0	29.4	23.4	8.4	0.4	27.1	27.1	112.3	112.2	7.4	6.5	1.4		2.4	1
C1	Cloudy	Moderate	09:13	10.5	Middle	5.3	29.1	29.1	8.2	8.2	28.7	28.8	84.3	84.0	5.5	0.0	5.0	4.7	2.7	2.8
01	Cloudy	moderate	00.10	10.0	Middlo	5.3	29.1	20.1	8.2	0.2	28.8	20.0	83.7	01.0	5.5		5.0		2.9	2.0
					Bottom	9.5	28.8	28.9	8.2	8.2	30.8	31.1	71.6	72.2	4.7	4.7	7.6		3.2	1
						9.5	28.9		8.1	•	31.4		72.8		4.7		7.6		3.4	<u> </u>
					Surface	1.0	29.4	29.4	8.3	8.3	27.5	27.7	104.9	104.3	6.9		1.7		2.9	4
						1.0	29.4	-	8.3		27.9		103.6		6.8	6.0	2.0		3.2	4
C2	Cloudy	Moderate	08:51	10.4	Middle	5.2	29.1	29.1	8.1	8.1	29.0	29.1	78.9	78.8	5.2		3.4	3.5	3.6	3.7
	-					5.2	29.0		8.1		29.1		78.6		5.2		4.2		3.9	4
					Bottom	9.4	28.4	28.7	8.1	8.1	32.1	31.8	67.4	69.3	4.4	4.5	4.9		4.3	4
						9.4	28.9		8.1		31.5		71.1		4.6		4.7		4.0	<u> </u>
					Surface	1.0	29.6 29.6	29.6	8.4 8.4	8.4	27.8 27.8	27.8	111.0 110.1	110.6	7.3 7.2	-	2.7 2.9		2.8 3.0	1
													-			7.3				1
M1	Cloudy	Moderate	09:03	5.9	Middle	-	-	-	-	-	-	-	-	-	-	-	-	4.6	-	3.2
						4.9	- 29.2		8.2		29.5		- 79.8		- 5.2		6.2		3.6	1
					Bottom	4.9	29.2	29.2	8.2	8.2	29.3	29.7	80.0	79.9	5.2	5.2	6.5		3.0	1
						1.0	29.8		8.4		27.4		119.5		7.8		1.5		2.9	<u> </u>
					Surface	1.0	29.8	29.8	8.4	8.4	27.2	27.3	117.3	118.4	7.7		1.6		2.6	1
						-	-		-		-		-		-	7.8	-		-	
M2	Cloudy	Moderate	08:59	5.8	Middle	-	-	-	-	-	-	-	-	-	-		-	4.1	-	3.1
					<b>D</b>	4.8	29.1		8.2		30.0		78.7		5.1		6.5		3.5	1
					Bottom	4.8	28.9	29.0	8.1	8.2	30.7	30.4	72.6	75.7	5.0	5.1	6.9		3.2	1
					Ourfeas	1.0	29.7	00.7	8.3	0.0	27.6	07.0	116.8	447.0	7.6		1.6		3	
					Surface	1.0	29.7	29.7	8.3	8.3	27.6	27.6	117.8	117.3	7.7	7.3	1.5		3	1
M3	Cloudy	Moderate	09:08	7.0	Middle	3.5	29.5	29.5	8.3	8.3	28.0	28.0	106.2	107.1	6.9	1.3	2.6	4.2	4	4
IVIO	Cioudy	woderate	09:08	7.0	IVIIGGIE	3.5	29.5	29.0	8.3	0.3	27.9	28.0	107.9	107.1	7.1	1	2.1	4.2	3	4
					Bottom	6.0	29.0	29.0	8.2	8.2	30.0	30.1	76.4	75.9	5.0	5.0	8.6		4	1
					Bollom	6.0	29.0	29.0	8.1	0.2	30.1	30.1	75.4	15.9	4.9	5.0	8.9		5	l I

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 20 September 22
 during Mid-Flood Tide

		toring Resu			zu September zz	adning inia	11000	luc												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	1	рH	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	29.6	29.6	8.4	8.4	28.0	28.1	121.1	120.6	7.9		2.9		4.0	
					Gunace	1.0	29.5	23.0	8.4	0.4	28.2	20.1	120.1	120.0	7.8	6.5	3.5		3.7	l
C1	Cloudy	Moderate	20:30	10.3	Middle	5.2	29.1	29.1	8.1	8.1	29.5	29.5	77.5	77.2	5.1	0.0	5.3	4.2	3.2	3.4
•	,					5.2	29.1	2011	8.1	0.1.	29.5	2010	76.8		5.0		5.2		3.6	1
					Bottom	9.3	28.6	28.8	8.1	8.1	31.3	31.4	70.0	70.4	4.6	4.6	4.0		3.1	1
						9.3	28.9		8.1		31.4		70.8		4.6		4.2		2.9	<u> </u>
					Surface	1.0	29.6	29.6	8.5	8.5	27.6	27.7	142.6	140.6	9.3	-	1.4		2.7	ł
						1.0	29.6		8.5		27.7		138.6		9.1	7.1	1.3		3.0	ł
C2	Cloudy	Moderate	20:51	10.5	Middle	5.3	29.0 28.9	29.0	8.1 8.1	8.1	29.9	30.0	77.9 70.2	74.1	5.1 5.0		5.4 5.5	3.8	3.6 3.4	3.7
						5.3 9.5	28.9				30.1		69.1		5.0 4.5		5.5 4.5		3.4 4.8	ł
					Bottom	9.5	28.9	28.9	8.1 8.1	8.1	30.5 30.3	30.4	71.0	70.1	4.5	4.6	4.5		4.0	ł
						1.0	29.6		8.4		28.3		113.7		7.4		3.3		2.5	
					Surface	1.0	29.7	29.7	8.3	8.4	28.1	28.2	115.2	114.5	7.5	-	3.7		2.7	ł
•••						-	-		-		-		-		-	7.5	-		-	
M1	Cloudy	Moderate	20:41	5.6	Middle	-	-	-	-	-	-	-	-	-	-		-	5.1	-	2.9
					Bottom	4.6	29.3	29.5	8.2	8.3	29.2	28.8	87.2	94.1	5.7	5.7	6.8		3.1	ł
					Bollom	4.6	29.6	29.5	8.3	0.3	28.4	20.0	100.9	94.1	5.6	5.7	6.7		3.3	1
					Surface	1.0	29.7	29.7	8.3	8.4	28.1	28.1	118.4	120.2	7.7		6.0		3.4	1
					Odilace	1.0	29.7	25.1	8.4	0.4	28.1	20.1	121.9	120.2	7.9	7.8	5.2		3.2	1
M2	Cloudy	Moderate	20:44	5.4	Middle		-	_	-	-	-	-	-		-	7.0	-	4.6	-	3.0
1112	Cloudy	modorato	20.11	0.1	middio		-		-		-		-		-		-	1.0	-	0.0
					Bottom	4.4	29.6	29.6	8.3	8.3	28.3	28.5	105.7	107.5	6.9	7.0	3.7		2.7	1
					Bottom	4.4	29.5	20.0	8.3	0.0	28.6	2010	109.2		7.1		3.6		2.8	
					Surface	1.0	29.7	29.7	8.5	8.5	27.8	27.7	133.6	134.7	8.7	_	2.0		4	ł
						1.0	29.7		8.4		27.5		135.8		8.9	8.3	1.9		4	ł
M3	Cloudy	Moderate	20:37	7.0	Middle	3.5	29.6	29.7	8.3	8.4	28.3	28.1	120.3	125.1	7.8	-	3.0	5.0	3	3
						3.5	29.7		8.4		27.8		129.9		7.6		2.8		3	ł
					Bottom	6.0	29.5	29.3	8.3	8.3	28.7	29.1	103.2	93.6	5.7	5.6	10.2		3	ł
						6.0	29.1		8.2		29.5		84.0	1	5.5	1	10.2		2	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

 Water Quality Monitoring Results on
 22 September 22 during Mid-Ebb Tide

water Qua		ioning Resi			zz September zz															
Monitoring	Weather	Sea Condition		Water Depth	Sampling Dep	th (m)	Water Te	emperature (°C)		pН	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved ( (mg/L		Turbidity	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)	Camping 2 op		Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.1	28.1	8.3	8.3	27.9	27.9	97.7	97.1	6.5		2.8		3.6	
					Sunace	1.0	28.1	20.1	8.3	0.5	27.9	21.5	96.5	57.1	6.5	6.5	2.8		3.8	
C1	Fine	Moderate	10:52	9.0	Middle	4.5	28.1	28.1	8.3	8.3	27.9	27.9	97.9	97.6	6.6	0.0	2.9	3.0	4.4	4.2
01	1 110	modorato	10.02	0.0		4.5	28.1	20.1	8.3	0.0	27.9	21.0	97.2	01.0	6.5		3.0	0.0	4.0	
					Bottom	8.0	28.1	28.1	8.3	8.3	28.0	28.0	99.8	98.6	6.7	6.6	3.2		4.6	
						8.0	28.1		8.3		27.9		97.4		6.5		3.2		4.8	
					Surface	1.0	28.0	28.1	8.2	8.2	28.1	28.1	87.8	89.4	5.9	-	6.1		4.4	
						1.0	28.1		8.2		28.1		91.0		6.1	6.0	6.0		4.6	
C2	Fine	Moderate	10:35	8.2	Middle	4.1	27.7	27.9	8.2	8.2	28.3	28.2	88.6	88.1	6.0		7.1	7.1	4.3	4.3
						4.1	28.1		8.2		28.1		87.6		5.9		7.2		4.2	
					Bottom	7.2	27.5 28.1	27.8	8.2 8.2	8.2	28.4 28.1	28.3	92.2 88.3	90.3	6.2 5.9	6.1	8.1 8.0		4.2 4.1	
						1.0	20.1		8.2		28.3		85.8		5.8		3.8		4.1	
					Surface	1.0	28.0	27.9	8.2	8.2	28.1	28.2	81.8	83.8	5.5	-	3.9		5.1	
						-	-		-		-		-		-	5.7	-		-	
M1	Fine	Moderate	10:41	5.0	Middle	-	-	-	-	-	-	-	-		-	1	-	4.4	-	4.3
					<b>D</b>	4.0	27.5		8.2		28.6		87.9		5.9		5.0		3.5	
					Bottom	4.0	27.9	27.7	8.2	8.2	28.2	28.4	85.5	86.7	5.7	5.8	5.0		3.9	
					Surface	1.0	27.8	27.9	8.2	8.2	28.4	28.3	87.1	87.1	5.9		4.3		4.0	
					Sunace	1.0	28.0	27.9	8.2	0.2	28.2	20.3	87.1	07.1	5.9	5.9	4.4		3.6	
M2	Fine	Moderate	10:44	5.4	Middle	-	-	_	-	_	-	-	-		-	5.5	-	5.1	-	4.1
1112	1 IIIC	Moderate	10.44	0.4	Wilddie	-	-		-		-		-		-		-	0.1	-	4.1
					Bottom	4.4	27.4	27.7	8.2	8.2	28.5	28.4	92.6	92.6	6.3	6.3	5.9		4.2	
						4.4	28.0		8.2		28.2		92.6		6.2		5.8		4.5	
					Surface	1.0	28.0	28.1	8.2	8.2	28.3	28.2	82.2	82.9	5.5	1	4.2		6	
						1.0	28.1		8.2		28.1		83.6		5.6	5.5	4.1		6	
M3	Fine	Moderate	10:48	7.2	Middle	3.6	27.9	28.0	8.2	8.2	28.4	28.3	80.6	81.9	5.4	4	5.4	5.3	7	7
						3.6	28.1		8.2		28.1		83.1		5.6		5.4		7	
					Bottom	6.2	27.7	27.9	8.2	8.2	28.5	28.4	82.9	82.9	5.6	5.6	6.4		8	
						6.2	28.0		8.2		28.3		82.9		5.5	1	6.5		8	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

## Water Quality Monitoring

 Water Quality Monitoring Results on
 22 September 22 during Mid-Flood Tide

Water wua		toring Resu			zz September zz	uunny mu	110001	lue												
Monitoring	Weather	Sea Condition		Water Depth	Sampling Dept	th (m)	Water Te	mperature (°C)	р	н	Salin	ity (ppt)	DO Satur	ration (%)	Dissolved ( (mg/l		Turbidity(	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.5	28.5	8.3	8.3	27.8	27.8	98.1	97.8	6.5		3.8		4.2	í
					Suilace	1.0	28.5	20.5	8.3	0.5	27.8	27.0	97.4	97.0	6.5	6.5	3.7		4.4	l
C1	Fine	Moderate	16:50	9.4	Middle	4.7	28.5	28.5	8.3	8.3	27.8	27.8	98.3	98.0	6.5	0.0	4.8	4.2	4.7	4.9
	-			-		4.7	28.5		8.3		27.8		97.7		6.5		4.9		5.0	1
					Bottom	8.4	28.5	28.5	8.3	8.3	27.8	27.8	99.1	98.6	6.6	6.6	4.0		5.3	ł
						8.4	28.5		8.3		27.8		98.0		6.5		4.1		5.7	ļ
					Surface	1.0	28.6 28.3	28.5	8.3 8.3	8.3	27.7 27.9	27.8	101.5 101.5	101.5	6.7 6.8		1.5 1.6		4.0 4.4	ł
						4.0	28.6		8.3		27.9		101.5		6.8	6.8	2.5		4.4	ł
C2	Fine	Moderate	17:08	8.0	Middle	4.0	28.4	28.5	8.3	8.3	27.9	27.8	103.1	103.1	6.8		2.5	2.6	5.3	5.0
					D. //	7.0	28.5		8.3		27.8		99.9		6.6		3.8		5.8	ł
					Bottom	7.0	28.6	28.6	8.3	8.3	27.8	27.8	99.9	99.9	6.7	6.7	3.9		5.5	ł
					Surface	1.0	28.5	28.5	8.3	8.3	28.2	28.2	91.7	91.2	6.1		5.8		8.3	
					Guilace	1.0	28.5	20.5	8.3	0.5	28.2	20.2	90.7	31.2	6.0	6.1	5.8		8.6	1
M1	Fine	Moderate	16:59	4.8	Middle	-	-	-	-	-	-	-	-	-	-	0.1	-	6.0	-	8.1
						-	-		-		-		-		-		-		-	1
					Bottom	3.8 3.8	28.5 28.5	28.5	8.3 8.3	8.3	28.1 28.2	28.2	94.5 91.3	92.9	6.3 6.1	6.2	6.1 6.2		7.7	ł
						3.8	28.5		8.3		28.2		91.3 91.1		6.1		6.2 4.1		7.9 4.4	
					Surface	1.0	28.4	28.2	8.3	8.3	28.1	28.2	91.1	91.1	6.1		4.1		4.4	ł
						-	-		-		20.1		-		-	6.1	-			1
M2	Fine	Moderate	17:02	5.6	Middle	-	-	-	-	-	-	-	-		-		-	4.8	-	4.3
					D. //	4.6	27.8		8.3		28.6		97.3		6.5		5.4		4.0	ł
					Bottom	4.6	28.2	28.0	8.3	8.3	28.2	28.4	97.3	97.3	6.5	6.5	5.4		4.2	ł
					Surface	1.0	28.5	28.5	8.3	8.3	27.9	27.9	99.4	97.8	6.6		3.5		6	
					Sunace	1.0	28.5	20.0	8.3	0.3	27.9	21.9	96.2	91.0	6.4	6.4	3.4		5	l
MЗ	Fine	Moderate	16:55	6.0	Middle	3.0	28.5	28.5	8.3	8.3	27.9	27.9	94.1	94.2	6.3	0.4	4.4	4.4	6	6
				0.0		3.0	28.5	20.0	8.3	0.0	27.9		94.2	<u> </u>	6.3		4.4		6	
					Bottom	5.0	28.4	28.5	8.3	8.3	28.0	28.0	93.3	94.7	6.2	6.3	5.5		7	ł
			I			5.0	28.5		8.3		27.9		96.1		6.4		5.4		6	<u> </u>

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 24 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	mperature (°C)	р	Н	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.1	28.2	8.2	8.2	27.8	27.8	80.9	80.7	5.6		6.7		5.5	
					Odilace	1.0	28.2	20.2	8.2	0.2	27.8	27.0	80.5	00.7	5.6	5.6	6.8		5.8	1
C1	Fine	Moderate	12:01	9.0	Middle	4.5	28.1	28.2	8.2	8.2	27.9	27.9	82.0	81.3	5.7	0.0	7.7	7.7	6.8	6.5
01		moderate		010	maaro	4.5	28.2	2012	8.2	0.2	27.8	2.1.0	80.5	0110	5.6		7.6		6.4	
					Bottom	8.0	28.1	28.2	8.2	8.2	27.9	27.9	83.6	82.2	5.8	5.7	8.7		7.4	4
						8.0	28.2	-	8.2	-	27.8	_	80.7		5.6		8.8		7.1	<u> </u>
					Surface	1.0	28.2	28.2	8.3	8.3	27.7	27.8	85.0	83.8	5.9		6.1		8.1	4
						1.0	28.2		8.3		27.8		82.6		5.7	5.9	6.2		8.5	4
C2	Fine	Moderate	11:43	8.0	Middle	4.0	28.1	28.2	8.3 8.3	8.3	27.9	27.8	85.9	84.8	6.0		7.0	7.1	7.0	7.3
						4.0	28.2				27.7		83.7		5.8		7.1		7.2	i i
					Bottom	7.0	28.0	28.1	8.3 8.3	8.3	27.9	27.8	88.3	86.5	6.1	6.0	8.0		6.3 6.6	1
							28.2 28.2				27.7		84.6		5.9		8.1 5.1		6.6 7.2	<u> </u>
					Surface	1.0	28.2	28.2	8.2 8.2	8.2	28.0 28.1	28.1	86.5 86.5	86.5	6.0 6.0	-	5.1 5.1		6.8	i i
						-	- 20.2		-		- 20.1				0.0	6.0	-		0.0	i i
M1	Fine	Moderate	11:50	4.6	Middle	-	-	-	-	-	-	-	-	-	-	-	-	5.9		7.6
						3.6	28.1		8.2		28.2		88.9		6.1		6.6		8.4	i i
					Bottom	3.6	28.2	28.2	8.2	8.2	28.0	28.1	88.9	88.9	6.1	6.1	6.6		8.0	1
						1.0	28.1		8.2		28.2		87.0		6.1		7.5		6.9	
					Surface	1.0	28.1	28.1	8.2	8.2	28.3	28.3	87.0	87.0	6.0	1	7.4		6.7	i i
	_					-	-		-		-		-		-	6.1	-		-	
M2	Fine	Moderate	11:53	5.0	Middle	-	-	-	-	-	-	-	-	-	-		-	7.8	-	6.6
					Dettern	4.0	28.1	28.1	8.2	8.2	28.2	28.3	89.7	89.7	6.2	6.3	8.1		6.4	i i
					Bottom	4.0	28.1	20.1	8.2	8.2	28.3	28.3	89.7	69.7	6.3	0.3	8.0		6.4	i i
					Surface	1.0	28.2	28.2	8.2	8.2	27.9	27.9	88.0	86.5	6.1		6.9		5	í T
					Sunace	1.0	28.2	20.2	8.2	0.2	27.9	21.3	84.9	00.0	5.9	6.0	6.9		5	i
M3	Fine	Moderate	11:56	7.2	Middle	3.6	28.1	28.2	8.2	8.2	28.0	28.0	89.7	87.8	6.2	0.0	7.5	7.4	6	6
1010	1 110	moderate	11.50	1.2	wildule	3.6	28.2	20.2	8.2	0.2	27.9	20.0	85.8	07.0	5.9		7.5	·.+	6	Ŭ
					Bottom	6.2	28.1	28.2	8.2	8.2	28.0	28.0	91.7	89.5	6.0	6.1	7.9		7	1
					Dottom	6.2	28.2	20.2	8.2	0.2	27.9	20.0	87.3	00.0	6.1	0.1	7.9		7	í

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 24 September 22 during Mid-Flood Tide

Mator Quu		ioning resu			24 September 22	during mid	11000	lac												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	th (m)	Water Te	emperature (°C)	þ	рН	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg.	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.3	28.3	8.2	8.2	27.6	27.6	90.3	90.3	6.1		6.1		7.5	
					Gunace	1.0	28.3	20.5	8.2	0.2	27.6	27.0	90.3	30.3	6.2	6.2	6.2		7.7	1
C1	Fine	Moderate	17:32	9.0	Middle	4.5	28.3	28.3	8.2	8.2	27.6	27.6	92.0	92.0	6.3	0.2	7.8	6.0	6.9	6.8
	-		_			4.5	28.3		8.2		27.6		92.0		6.2		7.7		6.5	1
					Bottom	8.0	28.3	28.3	8.2	8.2	27.6	27.6	93.7	93.7	6.4	6.4	4.0		6.1	1
			-			8.0	28.3		8.2	_	27.6		93.7		6.3	_	4.0		5.8	<u> </u>
					Surface	1.0	28.3 28.3	28.3	8.2 8.2	8.2	27.5 27.5	27.5	91.6	90.6	6.2 6.1		6.6		8.0	1
						1.0	28.3		8.2		27.5		89.5 92.8		6.1	6.2	6.5 7.0		7.6 7.0	1
C2	Fine	Moderate	17:48	7.8	Middle	3.9	28.3	28.3	8.2	8.2	27.5	27.5	92.8 89.9	91.4	6.1	-	7.0	7.1	6.8	7.0
						6.8	28.3		8.2		27.5		94.4		6.4		7.6		6.4	1
					Bottom	6.8	28.3	28.3	8.2	8.2	27.5	27.5	91.0	92.7	6.2	6.3	7.5		6.1	i
					Quitan	1.0	28.3	00.0	8.2	0.0	27.9	07.0	88.6	07.4	6.0		7.1		7.1	
					Surface	1.0	28.3	28.3	8.2	8.2	27.9	27.9	86.2	87.4	5.9	6.0	7.2		6.7	i i
M1	Fine	Moderate	17:40	4.8	Middle	-	-	-	-		-	-	-		-	0.0	-	7.7	-	5.9
IVII	1 IIIC	Woderate	17.40	4.0	Wilddie	-	-		-		-	_	-		-		-	1.1	-	5.5
					Bottom	3.8	28.2	28.3	8.2	8.2	27.9	27.9	92.3	90.1	6.3	6.2	8.3		5.0	1
						3.8	28.3		8.2		27.9		87.8		6.0		8.2		4.8	Ļ
					Surface	1.0	28.3	28.3	8.2	8.2	27.9	27.9	89.1	87.3	6.1	-	8.0		8.0	4
						1.0	28.3		8.2		27.8		85.4		5.8	6.0	8.0		7.6	4
M2	Fine	Moderate	17:43	5.6	Middle	-	-	-	-	-	-	-	-	-	-		-	8.6	-	7.1
						4.6	- 28.2		- 8.2		- 27.9		- 92.3		- 6.3		- 9.2		- 6.6	i i
					Bottom	4.6	28.2	28.3	8.2	8.2	27.9	27.9	92.3 88.3	90.3	6.0	6.2	9.2 9.3		6.0	i i
						1.0	28.3		8.2		27.9		86.4		5.9		9.3		0.2	<u> </u>
					Surface	1.0	28.3	28.3	8.2	8.2	27.8	27.9	85.3	85.9	5.8	-	4.4		7	i –
	_					3.1	28.3		8.2		27.9		85.9		5.8	5.8	5.6		6	1 .
M3	Fine	Moderate	17:37	6.2	Middle	3.1	28.3	28.3	8.2	8.2	27.8	27.9	84.2	85.1	5.8		5.5	5.4	6	6
					Detterre	5.2	28.3	00.0	8.2	0.0	28.0	00.0	87.4	00.0	5.9	5.0	6.2		5	i i
					Bottom	5.2	28.3	28.3	8.2	8.2	27.9	28.0	86.3	86.9	5.9	5.9	6.1		5	i –

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

### Water Quality Monitoring

Water Quality Monitoring Results on 27 September 22 during Mid-Ebb Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	oth (m)	Water Te	mperature (°C)	р	н	Salin	ity (ppt)	DO Satur	ation (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)			Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.2	28.2	8.1	8.1	28.1	28.1	79.2	79.1	5.2		6.6		7.4	
					Guildoo	1.0	28.2	20:2	8.1	0.1	28.1	20.1	79.0	70.1	5.2	5.2	6.5		7.2	
C1	Fine	Moderate	12:23	9.2	Middle	4.6	28.2	28.2	8.1	8.2	28.1	28.2	79.8	78.5	5.3	-	7.3	7.3	6.8	6.8
	-		-	-		4.6	28.2	-	8.2	-	28.2	-	77.1		5.1		7.3	-	6.6	
					Bottom	8.2	28.2	28.2	8.1	8.2	28.1	28.1	82.3	80.1	5.5	5.4	8.0		6.2	
						8.2	28.2		8.2		28.1		77.9		5.2 5.0		8.0		6.4	
					Surface	1.0 1.0	28.1 28.1	28.1	8.1 8.2	8.2	28.2 28.2	28.2	76.4 75.0	75.7	5.0	-	4.2 4.2		7.2 7.0	
						3.9	28.1		8.1		28.3		76.8		5.1	5.0	5.2		7.3	
C2	Fine	Moderate	12:40	7.8	Middle	3.9	28.1	28.1	8.1	8.1	28.2	28.3	75.5	76.2	5.0	-	5.2	5.5	7.5	7.4
					_	6.8	28.1		8.1		28.3		79.6		5.3		7.0		7.9	
					Bottom	6.8	28.1	28.1	8.1	8.1	28.2	28.3	76.2	77.9	5.1	5.2	6.9		7.7	
					Surface	1.0	28.2	28.2	8.1	8.1	28.1	28.1	80.0	80.0	5.3		7.0		7.4	
					Sunace	1.0	28.2	28.2	8.1	0.1	28.1	20.1	80.0	80.0	5.3	5.3	7.1		7.2	
M1	Fine	Moderate	12:31	5.6	Middle	-	-	_	-	_	-	-	-		-	5.5	-	7.8	-	7.0
IVII	1 IIIC	Woderate	12.01	0.0	Middle	-	-		-		-		-		-		-	7.0	-	7.0
					Bottom	4.6	28.1	28.2	8.1	8.1	28.1	28.1	84.4	84.4	5.6	5.6	8.5		6.7	
						4.6	28.2		8.1		28.1		84.4		5.6		8.5		6.5	
					Surface	1.0	28.2	28.2	8.1 8.1	8.1	28.2	28.2	79.2	79.2	5.2	_	6.3		6.4	
						1.0	28.2		8.1		28.2		79.2	1	5.2	5.2	6.2		6.7	
M2	Fine	Moderate	12:34	5.6	Middle	-	-	-	-	-	-	-	-		-	-	-	6.9	-	6.9
						4.6	28.2		8.1		28.1		84.9		5.6		7.5		7.1	
					Bottom	4.6	28.2	28.2	8.1	8.1	28.2	28.2	84.9	84.9	5.7	5.7	7.4		7.1	
						1.0	28.1		8.1		28.1		74.0		5.0		6.0		8	
					Surface	1.0	28.1	28.1	8.1	8.1	28.1	28.1	73.7	73.9	4.9	5.0	6.1		8	
MO	Fine	Madarat	10.00	6.0	Middle	3.0	28.1	00.4	8.1	8.1	28.1	00.4	74.3	74.0	5.0	5.0	7.1	7.2	7	7
M3	Fine	Moderate	12:28	6.0	Middle	3.0	28.1	28.1	8.1	8.1	28.1	28.1	73.7	/4.0	4.9	1	7.2	1.2	7	/
					Bottom	5.0	28.1	28.1	8.1	8.1	28.1	28.1	74.6	74.2	5.0	5.0	8.5		6	
					BUILUITI	5.0	28.1	20.1	8.1	0.1	28.1	20.1	73.8	14.2	4.9	5.0	8.4		7	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

## Water Quality Monitoring

 Water Quality Monitoring Results on
 27 September 22
 during Mid-Flood Tide

Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	oth (m)	Water Te	emperature (°C)	P	эΗ	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/l		Turbidity	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)		()	Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	28.1	28.1	8.1	8.1	28.2	28.2	77.0	77.1	5.2		6.2		7.2	
						1.0	28.1	-	8.1	-	28.2	-	77.2		5.1	5.2	6.2		7.1	1
C1	Fine	Moderate	08:43	9.2	Middle	4.6	28.1	28.1	8.1	8.1	28.2	28.2	77.8	77.6	5.2	_	7.4	5.9	7.6	7.6
						4.6 8.2	28.1 28.1		8.1 8.1		28.2 28.2		77.4 81.5		5.2 5.5		7.5 4.0		7.4 8.2	1
					Bottom	8.2	28.1	28.1	8.1	8.1	28.2	28.2	80.4	81.0	5.5	5.5	4.0		7.9	1
					<u> </u>	1.0	28.1		8.1		28.1		76.4		5.1	1	7.6		6.7	
					Surface	1.0	28.1	28.1	8.1	8.1	28.1	28.1	74.8	75.6	5.0	- A	7.7		6.5	1
C2	Fine	Moderate	08:25	7.8	Middle	3.9	28.0	28.1	8.0	8.1	28.1	28.1	77.1	76.1	5.2	- 5.1	8.1	8.3	7.2	7.1
02	1 IIIC	Moderate	00.20	7.0	Middle	3.9	28.1	20.1	8.1	0.1	28.1	20.1	75.0	70.1	5.0		8.1	0.0	6.8	7.1
					Bottom	6.8	28.0	28.1	8.0	8.1	28.1	28.1	78.3	76.9	5.2	5.2	9.1		7.7	1
						6.8	28.1	-	8.1	-	28.1	-	75.5		5.1	_	9.0		7.4	
					Surface	1.0 1.0	28.0 28.0	28.0	8.0 8.1	8.1	28.1 28.1	28.1	77.5 76.9	77.2	5.2 5.0	-	5.1 5.2		8.4 8.0	1
						-	- 20.0		-		- 20.1		-			5.1			-	1
M1	Fine	Moderate	08:31	4.6	Middle	-	-	-	-	-	-	-	-	-	-		-	5.6	-	7.9
					D-#	3.6	28.0	28.0	8.0	8.1	28.1	28.1	82.0	82.1	5.5	5.5	6.1		7.5	1
					Bottom	3.6	28.0	28.0	8.1	8.1	28.1	28.1	82.1	82.1	5.5	5.5	6.1		7.6	
					Surface	1.0	28.0	28.0	8.0	8.1	28.2	28.2	77.3	77.3	5.2		7.6		6.7	
					Cuildoo	1.0	28.0	20.0	8.1	0.1	28.2	20.2	77.2	11.0	5.1	5.2	7.7		7.0	1
M2	Fine	Moderate	08:35	5.0	Middle	-	-	-	-	-	-	-	-	-	-		-	7.9	-	7.7
						-	-		-		-		-		-		-		-	1
					Bottom	4.0	28.0 28.0	28.0	8.0 8.0	8.0	28.2 28.2	28.2	81.3 81.0	81.2	5.5 5.4	5.5	8.2 8.1		8.7 8.2	1
						1.0	28.0		8.0		28.2		75.9		5.4		5.2		0.2 7	
					Surface	1.0	28.1	28.1	8.1	8.1	28.1	28.1	75.4	75.7	5.0		5.2		7	1
	-:		00.00	7.0	N 41 1 11	3.8	28.0	00.4	8.0		28.1	00.4	77.5	70.4	5.2	5.1	6.7		7	-
M3	Fine	Moderate	08:38	7.6	Middle	3.8	28.1	28.1	8.0	8.0	28.1	28.1	78.6	78.1	5.2		6.7	6.5	7	7
					Bottom	6.6	28.0	28.0	8.0	8.0	28.1	28.1	81.1	81.3	5.4	5.4	7.6		7	1
					DUILUITI	6.6	28.0	20.0	8.0	0.0	28.1	20.1	81.4	01.3	5.4	5.4	7.7		8	1

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

#### Water Quality Monitoring

Water Quality Monitoring Results on 29 September 22 during Mid-Ebb Tide

mator Quu		loning Kesu				during init		•							Dissolved	0.00000			Suspende	
Monitoring	Weather	Sea Condition	Sampling	Water Depth	Sampling Dep	th (m)	Water Te	mperature (°C)	pł	Н	Salin	ity (ppt)	DO Satur	ation (%)	mg/l		Turbidity	(NTU)	Suspende (mg	
Station	Condition		Time	(m)		( )	Value	Average	Value A	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.7	27.8	8.2	8.2	29.0	29.0	85.5	84.8	5.7		5.1		8.3	
						1.0	27.8	2110	8.2	0.2	28.9	20.0	84.1	0.10	5.6	5.7	5.2		8.1	1
C1	Fine	Moderate	13:26	9.0	Middle	4.5	27.7	27.7	8.2	8.2	29.0	29.0	86.1	85.4	5.8	-	6.6	6.3	9.4	9.4
						4.5	27.7		8.2		29.0		84.6		5.7		6.5		9.8	4
					Bottom	8.0	27.7 27.7	27.7	8.2 8.2	8.2	29.0	29.0	87.7 85.2	86.5	5.9 5.7	5.8	7.2 7.2		10.4	4
			1			8.0	27.7		8.2		29.0 29.0		85.2 83.8		5.7		6.9		10.2 10.7	
					Surface	1.0	27.8	27.8	8.1	8.2	29.0	29.0	82.9	83.4	5.5		7.0		11.0	1
						4.5	27.0		8.2		29.0		83.8		5.6	5.6	7.6		9.4	1
C2	Fine	Moderate	13:48	9.0	Middle	4.5	27.8	27.8	8.1	8.2	29.0	29.0	83.2	83.5	5.6		7.6	7.2	9.8	9.8
					-	8.0	27.7		8.2		29.0		84.9		5.7		7.0		8.7	
					Bottom	8.0	27.8	27.8	8.1	8.2	29.0	29.0	83.8	84.4	5.6	5.7	7.0		9.0	
					Surface	1.0	27.7	27.7	8.2	8.2	28.8	28.8	91.4	91.4	6.1		6.5		9.5	
					Sullace	1.0	27.7	21.1	8.1	0.2	28.8	20.0	91.4	91.4	6.0	6.1	6.6		9.9	
M1	Fine	Moderate	13:37	4.2	Middle	-	-	_	-	-	-		-	_	-	0.1	-	6.9	-	10.0
1011	T IIIC	Woderate	10.07	7.2	Middle	-	-		-		-		-		-		-	0.5	-	10.0
					Bottom	3.2	27.6	27.7	8.2	8.2	28.5	28.7	94.1	94.1	6.3	6.3	7.1		10.1	1
						3.2	27.7		8.2		28.8		94.1		6.3		7.2		10.6	<u> </u>
					Surface	1.0	27.7	27.7	8.2	8.2	28.8	28.8	86.2	84.9	5.8		8.5		9.9	
						1.0	27.7		8.2		28.8		83.5		5.6	5.7	8.5		9.5	4
M2	Fine	Moderate	13:41	5.6	Middle	-	-	-	-	-	-	-	-		-	-	-	7.5	-	9.2
						4.6	27.8		8.2		28.8		- 88.7		5.9	-	6.6		8.5	1
					Bottom	4.6	27.8	27.8	8.2	8.2	28.8	28.8	86.3	87.5	5.7	5.8	6.5		9.0	1
						1.0	27.7		8.2		28.8		86.3		5.8		7.8		10	<u> </u>
					Surface	1.0	27.8	27.8	8.2	8.2	28.8	28.8	87.1	86.7	5.9	1	7.8		10	
			40.00		NAT L II	3.2	27.7	07.7	8.2		28.9	00.0	87.1		5.8	5.9	8.2		9	10
M3	Fine	Moderate	13:32	6.4	Middle	3.2	27.7	27.7	8.2	8.2	28.8	28.9	89.5	88.3	6.1	1	8.2	8.4	10	10
					Dettern	5.4	27.7	27.7	8.2	0.0	28.8	20.0	89.5	00.0	6.0	6.0	9.0		9	1
					Bottom	5.4	27.7	21.1	8.2	8.2	28.8	28.8	89.0	89.3	6.0	6.0	9.1	1	9	

DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher

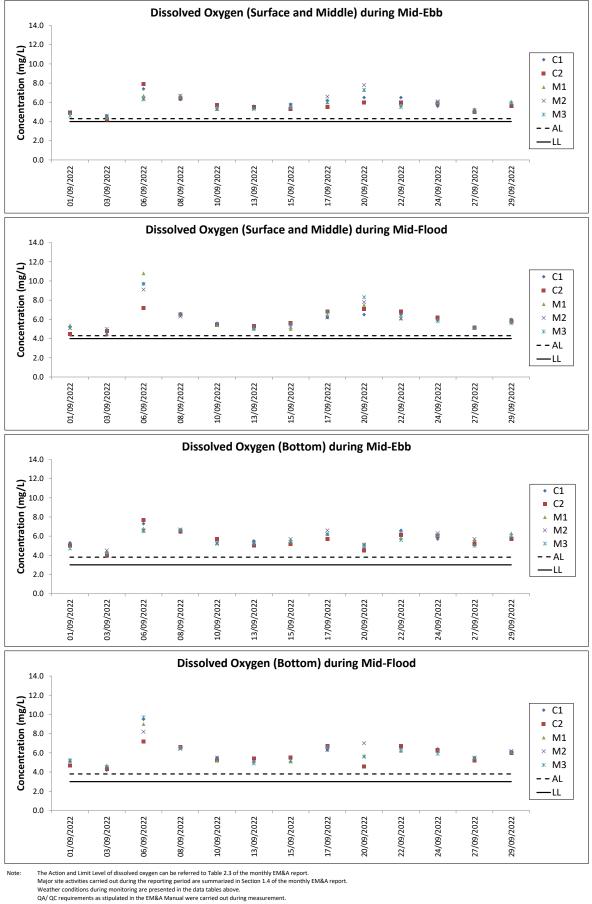
#### Water Quality Monitoring

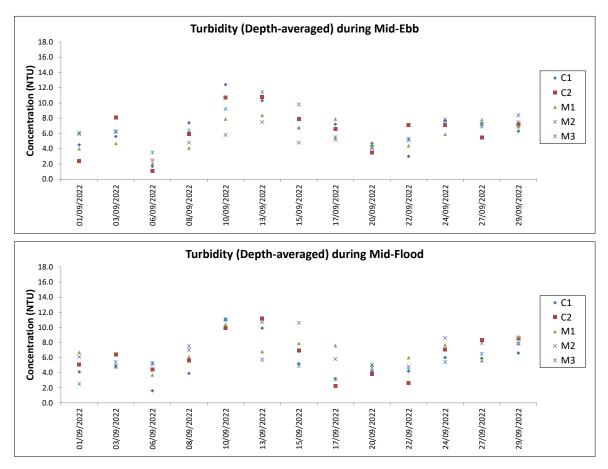
 Water Quality Monitoring Results on
 29 September 22
 during Mid-Flood Tide

		ioning resu			29 September 22	uaning inia	11000	lac												
Monitoring	Weather	Sea Condition	Sampling		Sampling Dep	oth (m)	Water Te	emperature (°C)	1	рH	Salin	ity (ppt)	DO Satu	ration (%)	Dissolved (mg/l		Turbidity(	(NTU)	Suspende (mg/	
Station	Condition		Time	(m)	Camping 2 op	()	Value	Average	Value	Average	Value	Average	Value	Average	Value	DA	Value	DA	Value	DA
					Surface	1.0	27.7	27.7	8.1	8.1	28.9	28.9	87.8	87.7	5.9		7.3		9.4	i
					Gunace	1.0	27.7	21.1	8.1	0.1	28.9	20.3	87.6	07.7	5.9	6.0	7.2		9.6	l
C1	Rainy	Moderate	09:41	9.0	Middle	4.5	27.7	27.7	8.1	8.1	28.9	28.9	89.4	89.7	6.0	0.0	8.5	6.6	10.2	10.1
						4.5	27.7		8.1		28.9		90.0		6.0		8.5		9.9	4
					Bottom	8.0	27.7	27.7	8.1	8.1	28.9	28.9	91.6	91.6	6.1	6.1	4.0		11.0	4
		1				8.0	27.7		8.1		28.9		91.5		6.1		4.2		10.7	<b> </b>
					Surface	1.0 1.0	27.6 27.7	27.7	8.0 8.0	8.0	28.8 28.8	28.8	85.3 85.6	85.5	5.7 5.7	-	7.0 7.1		7.5 7.9	i i
						3.8	27.6		8.0		28.8		85.6		5.7	5.8	8.9		7.9 8.7	i i
C2	Rainy	Moderate	09:23	7.6	Middle	3.8	27.6	27.6	8.0	8.0	28.8	28.8	87.0	87.1	5.8	-	8.9	8.5	8.2	8.5
					_	6.6	27.6		8.1		28.8		89.0		6.0		9.5		9.0	i i
					Bottom	6.6	27.6	27.6	8.0	8.1	28.8	28.8	89.4	89.2	6.0	6.0	9.4		9.4	i i
					Surface	1.0	27.6	27.6	8.0	8.0	28.7	28.7	87.3	87.4	5.9		8.1		9.9	í – – – – – – – – – – – – – – – – – – –
					Sunace	1.0	27.6	27.0	8.0	0.0	28.7	20.7	87.4	07.4	5.9	5.9	8.0		9.5	j
M1	Rainy	Moderate	09:30	5.0	Middle	-	-	_	-	-	-	-	-	_	-	5.5	-	8.8	-	10.3
	rearry	modorato	00.00	0.0	Middlo	-	-		-		-		-		-		-	0.0	-	10.0
					Bottom	4.0	27.6	27.6	8.0	8.0	28.7	28.7	90.6	90.6	6.1	6.1	9.5		10.7	4
		1				4.0	27.6		8.0		28.7		90.5		6.1		9.5		11.1	<b> </b>
					Surface	1.0 1.0	27.5 27.5	27.5	8.1 8.1	8.1	28.7 28.8	28.8	87.5 87.0	87.3	5.9 5.8	-	7.1 7.2		10.7 10.9	i i
						1.0	- 27.5		0.1		20.0		- 87.0		0.0	5.9	1.2		- 10.9	i i
M2	Rainy	Moderate	09:33	5.2	Middle	-	-	-	-	-	-	-	-		-	-	-	7.8	-	10.4
						4.2	27.5		8.1		28.4		91.5		6.2		8.5		10.1	i i
					Bottom	4.2	27.5	27.5	8.1	8.1	28.7	28.6	91.4	91.5	6.1	6.2	8.4		9.8	i i
						1.0	27.6		8.1		28.7		82.2		5.5		7.1		9	
					Surface	1.0	27.6	27.6	8.1	8.1	28.7	28.7	82.6	82.4	5.5	5.6	7.1		10	i i
M3	Rainy	Moderate	09:37	6.8	Middle	3.4	27.6	27.6	8.1	8.1	28.7	28.7	83.8	83.5	5.6	0.0	7.8	7.9	9	9
IVIO	кашу	wouerate	09.37	0.0	IVIIQUIE	3.4	27.6	27.0	8.1	0.1	28.7	20.7	83.1	03.0	5.6		7.9	1.9	9	9
					Bottom	5.8	27.6	27.6	8.1	8.1	28.6	28.7	90.4	90.4	6.1	6.1	8.7		9	1
					Dettom	5.8	27.6	27.0	8.1	0.1	28.7	20.7	90.4	00.4	6.1	0.1	8.6		9	I

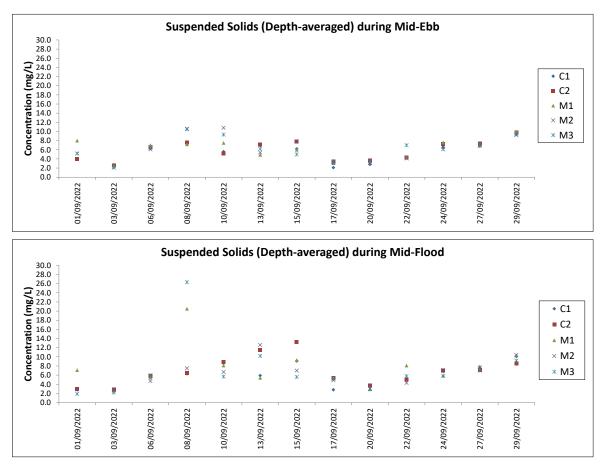
DA: Depth-averaged

Calm: Small or no wave; Moderate: Between calm and rough; Rough: White capped or rougher





The Action and Limit Level of turbidity can be referred to Table 2.3 of the monthly EM&A report. Major site activities carried out during the reporting period are summarized in Section 1.4 of the monthly EM&A report. Weather conditions during monitoring are presented in the data tables above. QA/ QC requirements as stipulated in the EM&A Manual were carried out during measurement. Note:



The Action and Limit Level of suspended solids can be referred to Table 2.3 of the monthly EM&A report. Major site activities carried out during the reporting period are summarized in Section 1.4 of the monthly EM&A report. Weather conditions during monitoring are presented in the data tables above. QA/ QC requirements as stipulated in the EM&A Manual were carried out during measurement. Note

# Appendix E. Environmental Site Inspection Schedule

#### ITT-BVB Site Inspection Schedule for Sep 2022

# Sep-22

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	
				1	2	3	
				(1)			(1)
				Water Quality Monitoring		Water Quality Monit	oring
				mid- ebb: 16:00		mid- ebb:	17:47
				mid-flood: 9:52		mid- flood:	12:18
4	5	6	7	8	9	10	
		(1)		(1)			(1)
		Water Quality Monitoring	Environmental Site Inspection	Water Quality Monitoring		Water Quality Monit	
		mid- ebb: 9:15		mid- ebb: 11:23		mid- ebb:	12:59
		mid-flood: 17:29		mid-flood: 18:48	10	mid- flood:	19:53
11	12	13	14	15	16	17	(1)
		(1) Water Quality Monitoring	Environmental Site Inspection	Water Quality Monitoring		Water Quality Monit	
		mid- ebb: 14:51	Environmental Site inspection	mid- ebb: 15:54		mid- ebb:	17:07
		mid- flood: 8:39		mid- flood: 10:12		mid- flood:	12:28
18	19	20	21	22	23	24	12.20
10	15	(1)	21	(1)	25	24	(1)
		Water Quality Monitoring	Environmental Site Inspection	Water Quality Monitoring		Water Quality Monit	oring
		mid- ebb: 9:01		mid- ebb: 11:00		mid- ebb:	12:16
		mid- flood: 21:48		mid- flood: 18:17		mid- flood:	18:56
25	26	27	28	29	30		
		(1)		(1)			
		Water Quality Monitoring	Environmental Site Inspection	Water Quality Monitoring			
		mid- ebb: 13:54		mid- ebb: 15:05			
		mid-flood: 7:39		mid-flood: 9:08			
		Notes:					
		(1) The water quality monitoring	schedule under the ACL project	t.			

#### ITT-BVB Site Inspection Schedule for Oct 2022



1         (1)           Water Quality Monitoring         mid-ebb:         16:40           mid-flood:         11:13         8         (1)           Water Quality Monitoring         mid-ebb:         11:54           mid-flood:         11:54         18:41           15         15         15
mid- flood:         11:13           8         (1)           Water Quality Monitoring         (1)           mid- ebb:         11:54           mid- flood:         18:41
8 (1) Water Quality Monitoring mid- ebb: 11:54 mid- flood: 18:41
(1) Water Quality Monitoring mid- ebb: 11:54 mid- flood: 18:41
Water Quality Monitoring mid- ebb: 11:54 mid- flood: 18:41
mid- ebb: 11:54 mid- flood: 18:41
mid- flood: 18:41
15
(1)
Water Quality Monitoring
mid- ebb: 16:00
mid-flood: 11:05
22
(1)
Water Quality Monitoring
mid- ebb: 11:00
mid-flood: 17:42
29
(1) Water Quality Monitoring
,
mid-flood: 10:20
_

# **Appendix F. Waste Flow Table**

## AAHK Contract No. 19W10 Intermodal Transfer Terminal - Bonded Vehicular Bridge and Associated Roads <u>Monthly Waste Flow Table</u>

		Actual Quan		&D Materials (e s) e.g. broken co	-	vated waste)	Act	tual Quantities	of Non-inert C&	D Waste (tonn	es)		
Month	Excavated Waste (tonnes)	(a) Total inert C&D material generated (a) = (b) + (c) + (d) + (e)	(b) Reused in contract	(c) Reused in other projects	(d) Sent to recycling company	(e) Disposed to public fill	(f) Recycled scrap metal	(g) Reused / recycled timber	(h) Chemical waste	(i) Other waste disposed to landfill	$\begin{array}{c} (j) \\ Total non-inert C&D \\ material \\ generated \\ (j) = (f) + (g) + \\ (h) + (i) \end{array}$	(k) Total recyclable waste (k) = (b) + (c) + (d) + (f) + (g)	(I) Total construction waste generated (I) = (a) + (j)
Jul-20	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Aug-20	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Sep-20	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.04	4.04	0.00	4.04
Oct-20	740.49	740.49	0.00	0.00	0.00	740.49	0.00	0.00	0.00	3.55	3.55	0.00	744.04
Nov-20	574.90	574.90	0.00	0.00	0.00	574.90	0.00	0.00	0.00	6.76	6.76	0.00	581.66
Dec-20	536.08	536.08	0.00	0.00	0.00	536.08	0.00	0.00	0.00	2.33	2.33	0.00	538.41
Jan-21	1778.61	1778.61	0.00	0.00	0.00	1778.61	0.00	0.00	0.00	5.33	5.53	0.00	1784.14
Feb-21	4031.66	4031.66	0.00	2832.32	0.00	1199.34	0.00	0.00	0.00	4.40	4.40	2832.32	4036.06
Mar-21	1921.26	1921.26	0.00	419.77	0.00	1501.49	0.00	0.00	0.00	12.28	12.28	419.77	1933.54
Apr-21	3929.82	3929.82	0.00	1702.03	0.00	2227.79	0.00	0.00	0.00	26.48	26.48	1702.03	3956.30
May-21	2062.98	2062.98	0.00	1694.52	0.00	368.46	0.00	0.00	0.00	12.63	12.63	1694.52	2075.61
Jun-21	5098.30	5098.30	0.00	4446.42	0.00	651.88	0.00	0.00	0.54	23.41	23.95	4446.42	5122.25
Jul-21	6868.66	6868.66	0.00	6440.45	0.00	428.21	0.00	0.00	0.00	12.92	12.92	6440.45	6881.58
Aug-21	6884.63	6884.63	0.00	5662.00	0.00	1222.63	8.56	0.00	1.08	38.91	48.55	5670.56	6933.18
Sep-21	3949.49	3949.49	0.00	2798.89	0.00	1150.60	0.00	0.00	0.00	15.66	15.66	2798.89	3965.15
Oct-21	389.98	389.98	0.00	235.10	0.00	154.88	6.20	0.00	0.00	15.48	21.68	241.30	411.66
Nov-21	1926.96	1926.96	285.00	650.00	0.00	991.96	13.78	0.00	0.00	16.18	29.96	948.78	1956.92
Dec-21	672.20	672.20	240.00	0.00	0.00	432.20	0.00	0.00	0.00	17.40	17.40	240.00	689.60
Jan-22	584.00	584.00	584.00	0.00	0.00	0.00	6.03	0.00	0.00	22.17	28.20	590.03	612.20
Feb-22	1056.52	1056.52	378.00	240.26	0.00	438.26	0.00	0.00	0.00	33.95	33.95	618.26	1090.47
Mar-22	1426.34	1426.34	0.00	1199.88	0.00	226.46	0.00	0.00	0.00	38.49	38.49	1199.88	1464.83
Apr-22	68.10	68.10	0.00	0.00	0.00	68.10	0.00	0.00	0.00	50.11	50.11	0.00	118.21
May-22	366.14	366.14	0.00	0.00	0.00	366.14	0.00	0.00	0.00	55.50	55.50	0.00	421.64
Jun-22	5806.30	5806.30	0.00	3751.49	0.00	2054.81	0.00	0.00	0.72	74.26	74.98	3751.49	5881.28
Jul-22	4334.71	4334.71	0.00	3561.75	0.00	772.96	0.00	0.00	0.00	81.66	81.66	3561.75	4416.37
Aug-22	7115.76	7115.76	1588.85	2406.49	0.00	3120.42	3.73	0.00	0.00	72.25	75.98	3999.07	7191.74
Sep-22	4345.65	4345.65	0.00	625.55	0.00	3720.10	0.00	0.00	0.00	66.94	66.94	625.55	4412.59
Total	66469.54	66469.54	3075.85	38666.92	0.00	24726.77	38.30	0.00	2.34	713.09	753.93	41781.07	67223.47

# Appendix G. Status of Environmental Permits and Licences

Type of Licence / Permit	Reference No.	Valid From	Valid Until	Remark
Environmental Permit	EP-560/2018	24 August 2017	End of Project	N/A
Billing Account for Disposal of Construction Waste	7037763	6 July 2020	End of Project	N/A
Construction Dust Notification under APCO	458075	13 July 2020	N/A	N/A
Construction Noise Permit	GW-RS0607-22	27 Jul 2022	25 Jan 2023	N/A
Chemical Waste Producer	5213-951- G2857-02	24 August 2020	End of Project	N/A
Water Discharge License – Landside	WT00037071- 2020	12 January 2021	31 January 2026	N/A
Water Discharge License – Marine	WT00037556- 2021	9 Jun 2021	31 May 2026	Variation of discharge license WT00037556-2021 granted on 14 May 2021

# Table G.1: Summary of Environmental Licenses and Permits

# Appendix H. Environmental Mitigation Measures Implementation Status

#### **Recommended Mitigation Measures for Air Quality Impact**

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		Relevant control measures as required in the Air Pollution Control (Construction Dust) Regulation shall be implemented to minimise dust impact.	Yes
		Skip hoist for material transport should be totally enclosed by impervious sheeting.	Yes
		• All dusty materials should be sprayed with water prior to any loading, unloading or transfer operation to maintain the dusty materials wet.	Obs
	S2.2.1	• All stockpiles of aggregate or spoil should be covered and/or water applied.	Obs
S3.7.1		• The height from which excavated materials are dropped should be controlled to a minimum practical height to limit fugitive dust generation from unloading.	N/A
		• Every vehicle should be washed to remove any dusty materials from its body and wheels before leaving the construction sites.	Yes
		<ul> <li>The load of dusty materials carried by a vehicle leaving a construction site should be covered entirely by clean impervious sheeting to ensure dust materials do not leak from the vehicle.</li> </ul>	Yes
		• All NRMMs operated on-site are approved or exempted (as the case may be) and affixed with the requisite approval/exemption labels under the Air Pollution Control (Non-road Mobile Machinery) (Emission) Regulation, or are in the process of application for such approval/exemption during the relevant grace period.	Rem

#### **Recommended Mitigation Measures for Noise Impact**

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		Only well-maintained plant should be operated on-site and plant should be serviced regularly.	Yes
		Silencers or mufflers on construction plant should be utilised.	Yes
		Mobile plant should be sited as far away from sensitive uses as possible.	Yes
	down to a minimum.	• Machines and plant that may be in intermittent use should be shut down between works periods or should be throttled down to a minimum.	Yes
S4.5.2	S3.2.1	• Plant known to emit noise strongly in one direction should, where possible, be orientated so that noise is directed away from the nearby sensitive uses.	Yes
		• Material stockpiles and other structures such as site hoarding should be effectively utilised to screen noise from on-site construction activities.	N/A
		<ul> <li>Noisy construction activities such as road breaking, should be scheduled to less sensitive hours during the day, e.g. midday.</li> </ul>	Yes

#### **Recommended Mitigation Measures for Water Quality Impact**

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
S5.9.1	S4.3.1	<ul> <li>Steel pile casing and watertight cofferdam should be installed at the pier site and seawater trapped inside the casing and cofferdam should be pumped out to generate a dry working environment prior to carrying out sediment excavation.</li> </ul>	Yes
S5.9.2	S4.3.1	<ul> <li>During dewatering of the cofferdam, appropriate desilting or sedimentation device should be provided on site for treatment before discharge. The Contractor should ensure discharge water from the sedimentation tank meeting the WPCO / TM-DSS requirements before discharge.</li> </ul>	Yes
S5.9.3	S4.3.1	• To minimise any adverse water quality impact during the excavation of sediment, a funnel should be placed at the top of pile casing during excavation and silt curtains should be deployed to completely enclose the cofferdam and steel pile casing. Silt curtains should be deployed prior to installation of temporary platform on barge, cofferdam and steel pile casing. Silt curtains should only be removed after completion of pile caps and piers. The Contractor should be responsible for the design, installation and maintenance of the silt curtain to minimise the impacts on water quality. The design and specification of the silt curtains should be submitted by the Contractor to the Project Manager or Project Manager's Representative of AAHK for approval. The marine bridge piers should not be constructed at the same time to avoid adverse hydrodynamic impact due to flow blockage increase during the interim construction stages. All vessels should be sized such that adequate clearance is maintained between vessels and the sea bed at all states of the tide to ensure that undue turbidity is not generated by turbulence from vessel movement or propeller wash.	Yes
S5.9.5	S4.3.1	• Surface run-off from construction sites should be discharged into storm drains via adequately designed sand/silt removal facilities such as sand traps, silt traps and sedimentation basins. Channels or earth bunds or sand bag barriers should be provided on site to properly direct stormwater to such silt removal facilities. Perimeter channels at site boundaries should be provided on site boundaries where necessary to intercept storm run-off from outside the site so that it will not wash across the site. Catchpits and perimeter channels should be constructed in advance of site formation works and earthworks.	Yes
S5.9.6	S4.3.1	• Silt removal facilities, channels and manholes should be maintained and the deposited silt and grit should be removed regularly, at the onset of and after each rainstorm to prevent local flooding. Before disposal at the public fill reception facilities, the deposited silt and grit should be solicited in such a way that it can be contained and delivered by dump truck instead of tanker truck. Any practical options for the diversion and re-alignment of drainage should comply with both engineering and environmental requirements in order to provide adequate hydraulic capacity of all drains.	Obs
S5.9.7	S4.3.1	• Construction works should be programmed to minimise soil excavation works in rainy seasons (April to September). If excavation in soil cannot be avoided in these months or at any time of year when rainstorms are likely, for the purpose of preventing soil erosion, temporary exposed slope surfaces should be covered e.g. by tarpaulin, and temporary access roads should be protected by crushed stone or gravel, as excavation proceeds. Intercepting channels should be provided (e.g. along the crest / edge of excavation) to prevent storm runoff from washing across exposed soil surfaces. Arrangements should always be in place in such a way that adequate surface protection measures can be safely carried out well before the arrival of a rainstorm.	Yes
S5.9.8	S4.3.1	• Earthworks final surfaces should be well compacted and the subsequent permanent work or surface protection should be carried out immediately after the final surfaces are formed to prevent erosion caused by rainstorms. Appropriate drainage like intercepting channels should be provided where necessary.	Yes

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
S5.9.9	S4.3.1	<ul> <li>Measures should be taken to minimise the ingress of rainwater into trenches. If excavation of trenches in wet seasons is necessary, they should be dug and backfilled in short sections. Rainwater pumped out from trenches or foundation excavations should be discharged into storm drains via silt removal facilities.</li> </ul>	Yes
S5.9.10	S4.3.1	<ul> <li>Manholes (including newly constructed ones) should always be adequately covered and temporarily sealed so as to prevent silt, construction materials or debris from getting into the drainage system, and to prevent storm run-off from getting into foul sewers. Discharge of surface run-off into foul sewers must always be prevented in order not to unduly overload the foul sewerage system.</li> </ul>	Yes
S5.9.11	S4.3.1	<ul> <li>If bentonite slurries are required for any construction works, they should be reconditioned and reused wherever practicable to minimise the disposal volume of used bentonite slurries. Temporary enclosed storage locations should be provided on-site for any unused bentonite that needs to be transported away after the related construction activities are completed. Requirements as stipulated in ProPECC Note PN 1/94 should be closely followed when handling and disposing bentonite slurries.</li> </ul>	N/A
	S4.3.1	<ul> <li>Loading of the excavated marine-based sediment to the barge shall be controlled to avoid splashing and overflowing of the sediment slurry to the surrounding water.</li> </ul>	N/A
S5.9.12		• The barge transporting the excavated marine-based sediment to the designated disposal sites shall be equipped with tight fitting seals to prevent leakage and shall not be filled to a level that would cause overflow of materials or laden water during loading or transportation.	N/A
		<ul> <li>Monitoring of the barge loading shall be conducted to ensure that loss of material does not take place during transportation. Transport barges or vessels shall be equipped with automatic self-monitoring devices as specified by the Director of Environmental Protection (DEP).</li> </ul>	N/A
S5.9.13	S4.3.1	<ul> <li>Water used in ground boring and drilling for site investigation or rock/soil anchoring should as far as practicable be re- circulated after sedimentation. When there is a need for final disposal, the wastewater should be discharged into storm drains via silt removal facilities.</li> </ul>	N/A
S5.9.14	S4.3.1	<ul> <li>All vehicles and plant should be cleaned before they leave a construction site to minimise the deposition of earth, mud, debris on roads. A wheel washing bay should be provided at every site exit if practicable and wash-water should have sand and silt settled out or removed before discharging into storm drains. The section of construction road between the wheel washing bay and the public road should be paved with backfall to reduce vehicle tracking of soil and to prevent site run-off from entering public road drains.</li> </ul>	Yes
S5.9.15	S4.3.1	• There is a need to apply to EPD for a discharge licence for discharge of effluent from the construction site under the WPCO. The discharge quality must meet the requirements specified in the discharge licence. All the runoff and wastewater generated from the works areas should be treated so that it satisfies all the standards listed in the TM-DSS. The beneficial uses of the treated effluent for other on-site activities such as dust suppression, wheel washing and general cleaning etc., can minimise water consumption and reduce the effluent discharge volume. If monitoring of the treated effluent quality from the works areas is required during the construction phase of the Project, the monitoring should be carried out in accordance with the relevant WPCO license.	Yes

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
S5.9.16	S4.3.1	• No discharge of sewage to the storm water system and marine water will be allowed. Sufficient chemical toilets should be provided in the works areas to handle the sewage generated from the construction workforce. A licensed waste collector should be deployed to clean the chemical toilets on a regular basis.	Yes
S5.9.17	S4.3.1	<ul> <li>Notices should be posted at conspicuous locations to remind the workers not to discharge any sewage or wastewater into the surrounding environment. Regular environmental audit of the construction site will provide an effective control of any malpractices and can encourage continual improvement of environmental performance on site. It is anticipated that sewage generation during the construction phase of the project would not cause water pollution problem after undertaking all required measures.</li> </ul>	Yes
S5.9.18	S4.3.1	<ul> <li>The Contractor must register as a chemical waste producer if chemical wastes would be produced from the construction activities. The Waste Disposal Ordinance (Cap 354) and its subsidiary regulations in particular the Waste Disposal (Chemical Waste) (General) Regulation, should be observed and complied with for control of chemical wastes.</li> </ul>	Yes
S5.9.19	S4.3.1	<ul> <li>Any service shop and maintenance facilities should be located on hard standings within a bonded area, and sumps should be provided. Maintenance of vehicles and equipment involving activities with potential for leakage and spillage should only be undertaken within the areas appropriately equipped to control these discharges.</li> </ul>	N/A
	S4.3.1	• Suitable containers should be used to hold the chemical wastes to avoid leakage or spillage during storage, handling and transport.	Yes
S5.9.20		• Chemical waste containers should be suitably labelled, to notify and warn the personnel who are handling the wastes, to avoid accidents.	Yes
		• Storage area should be selected at a safe location on site and adequate space should be allocated to the storage area.	Yes
S5.9.22	S4.3.1	• For the operation of road works, a surface water drainage system should be provided to collect the road runoff. The road drainage should be provided with adequately designed silt trap as necessary. The design of the operational phase mitigation measures for the road works shall take into account the guidelines published in ProPECC PN 5/93 <i>"Drainage Plans subject to Comment by the EPD"</i>	Yes
S5.9.23 to 5.9.29		<ul> <li><u>Design Measures:</u></li> <li>Exposed surface shall be avoided within the roads to minimise soil erosion. The roads shall be hard paved.</li> <li>The drainage system should be designed to avoid flooding.</li> </ul>	Yes
	S4.3.1	<ul> <li><u>Devices and Facilities:</u></li> <li>Screening facilities such as standard gully grating and trash grille, with spacing which is capable of screening large substances such as rubbish should be provided at the inlet of drainage system.</li> <li>Road gullies with standard design and silt traps should be provided to remove particles present in stormwater runoff, where appropriate.</li> </ul>	N/A

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		<ul> <li><u>Administrative Measures:</u></li> <li>Good management measures such as regular cleaning and sweeping of road surface/ open areas are suggested. The road surface/ open area cleaning should also be carried out prior to occurrence rainstorm.</li> <li>Manholes, as well as stormwater gullies, ditches provided at the Project site should be regularly inspected and cleaned (e.g. monthly). Additional inspection and cleansing should be carried out before forecast heavy rainfall.</li> </ul>	Rem
S5.9.30	S4.3.1	All the sewage flow generated from the proposed toilets should be properly collected and conveyed to the existing sewerage system on HKBCF Island. No direct discharge of sewage effluent into the marine water will be allowed.	Yes
Recomme	ended Mitiga	tion Measures for Waste Management	
EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		<ul> <li><u>Good Site Practices:</u></li> <li>Nomination of approved personnel, such as a site manager, to be responsible for implementation of good site practices, arrangements for waste collection and effective disposal to an appropriate facility.</li> </ul>	Yes
	S5.2.1	<ul> <li>Training of site personnel in site cleanliness, concepts of waste reduction, reuse and recycling, proper waste management and chemical waste handling procedures.</li> </ul>	Yes
S6.5.3		Provision of sufficient waste reception/ disposal points, and regular collection of waste.	Obs
00.0.0		• Adoption of appropriate measures to minimise windblown litter and dust during transportation of waste by either covering trucks or by transporting wastes in enclosed containers.	Yes
		Provision of regular cleaning and maintenance programme for drainage systems and sumps.	Yes
		• Adoption of a recording system for the amount of wastes generated, recycled and disposed (including the disposal sites).	Yes
		• Preparation of Waste Management Plan (WMP), as part of the Environmental Management Plan (EMP).	Yes
		<ul> <li>Waste Reduction Measures:</li> <li>Segregate and store different types of construction related waste in different containers, skips or stockpiles to enhance reuse or recycling of materials and their proper disposal.</li> </ul>	Yes
	S5.2.1	<ul> <li>Provide separate labelled bins to segregate recyclable waste such as aluminium cans from other general refuse generated by the work force, and to encourage collection by individual collectors.</li> </ul>	Yes
S6.5.4		Recycle any unused chemicals or those with remaining functional capacity.	N/A
		Maximise the use of reusable steel formwork to reduce the amount of C&D materials.	Yes
		Adopt proper storage and site practices to minimise the potential for damage to, or contamination of construction materials.	Yes
		Plan the delivery and stock of construction materials carefully to minimise the amount of waste generated.	N/A

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		Minimise over ordering and wastage through careful planning during purchasing of construction materials.	N/A
		<ul> <li><u>C&amp;D materials:</u></li> <li>Proper handling and storage of waste such as soil by means of covers and/or water spraying system to minimise the potential environmental impact and to prevent materials from wind-blown or being washed away.</li> </ul>	Yes
		Covering materials during heavy rainfall.	N/A
S6.5.6	S5.2.1	Locating stockpiles to minimise potential visual impacts.	N/A
50.5.0	55.2.1	Minimising land intake of stockpile areas as far as possible.	N/A
		<ul> <li>Adopting GPS or equivalent system for tracking and monitoring of all dump trucks engaged for the Project in recording their travel routings and parking locations to prohibit illegal dumping and landfilling of C&amp;D materials.</li> </ul>	N/A
		<ul> <li>Keeping record and analysis of data collected by GPS or equivalent system related to travel routings and parking locations of dump trucks engaged on site.</li> </ul>	N/A
	S5.2.1	<u>General Refuse:</u> <ul> <li>General refuse should be stored in covered bins or compaction units separately from C&amp;D materials. A reputable waste collector should be employed by the Contractor to remove general refuse from the site regularly, separately from C&amp;D materials. An enclosed and covered area is preferred to reduce the occurrence of "wind blown" light materials.</li> </ul>	Yes
S6.5.7 to 5.5.9		• The recyclable component of general refuse, such as aluminium cans, paper and cleansed plastic containers shall be separated from other waste. Provision and collection of recycling bins for different types of recyclable waste shall be set up by the Contractor. The Contractor shall also be responsible for arranging recycling companies to collect these materials.	Yes
		• The Contractor should carry out an education programme for workers in avoiding, reducing, reusing and recycling of materials generation. Posters and leaflets advising on the use of the bins should also be provided in the site as reminders.	N/A
S6.5.10 to 6.5.12		<u>Chemical Waste:</u> <ul> <li>If chemical wastes were to be produced, the Contractor would be required to register with the EPD as a Chemical Waste Producer, and to follow the guidelines stated in the Code of Practice on the Packaging, Labelling and Storage of Chemical Wastes.</li> </ul>	Obs
	S5.2.1	<ul> <li>Appropriate containers with proper labels should be used for storage of chemical wastes. Chemical wastes should be collected and delivered to designated outlet by a licensed collector. Chemical wastes (e.g. spent lubricant oil) should be recycled at an appropriate facility as far as possible, while the chemical waste that cannot be recycled should be disposed of at either the CWTC, or another licensed facility, in accordance with the Waste Disposal (Chemical Waste) (General) Regulation.</li> </ul>	Obs
		• Any unused chemicals or those with remaining functional capacity should be collected for reuse as far as practicable.	N/A
S6.5.13 to 6.5.16	S5.2.1	<ul> <li>Sediment:</li> <li>The sediment should be excavated, handled, treated, transported and/or disposed of in a manner that would minimise adverse environmental impacts.</li> </ul>	N/A

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		• Requirements of the Air Pollution Ordinance (Construction Dust) Regulation, where relevant, shall be adhered to during excavation, treatment, transportation and disposal of the sediment.	N/A
		• The land-based sediment will be treated using S/S technique and will be reused on site (e.g. as backfilling materials).	Yes
		• Any treatment area for the land-based sediment should be confined for carrying out the cement S/S process and any temporary stockpiling. The area should be designed to prevent leachate from entering the ground. Leachate, if any, should be collected and discharged according to the Water Pollution Control Ordinance (WPCO). In order to minimise the exposure to contaminated materials, workers shall, if necessary, wear appropriate personal protective equipments (PPE) when handling contaminated sediments. Adequate washing and cleaning facilities shall also be provided on site.	Yes
S6.5.17	S5.2.1	<ul> <li>For off-site disposal, the basic requirements and procedures specified under PNAP No. 252 (ADV-21) shall be followed.</li> <li>Marine Fill Committee (MFC) of CEDD is managing the disposal facilities in Hong Kong for the excavated sediment, while EPD is the authority of issuing marine dumping permit under the Dumping at Sea Ordinance (DASO).</li> </ul>	N/A
S6.5.18 to 6.5.19	S5.2.1	• For the purpose of site allocation and application of marine dumping permit and if considered necessary by Dumping at Sea Ordinance (DASO) Team/EPD, separate submissions (e.g. SSTP/SQR) shall be submitted to DASO team/EPD for agreement under DASO. Additional SI works, based on the SSTP, shall then be carried out in order to confirm the disposal arrangements of the excavated sediment. A Sediment Quality Report (SQR), reporting the chemical and biological screening results and the estimated quantities of sediment under different disposal options, shall then be submitted to DASO team/EPD for agreement under DASO.	N/A
S6.5.18 to 6.5.19	S5.2.1	<ul> <li>To ensure disposal space is allocated for the Project, the Project Proponent should be responsible for obtaining agreement from MFC on the allocation of the disposal site. The contractor(s), on the other hand, should be responsible for the application of the marine dumping permit under DASO from EPD for the sediment disposal.</li> </ul>	N/A
S6.5.20 to 6.5.23		<ul> <li>The excavated sediments is expected to be loaded onto the barge and transported to the designated disposal sites allocated by MFC. The excavated sediment would be disposed of according to its determined disposal options and PNAP No. 252 (ADV-21).</li> </ul>	N/A
	S5.2.1	• Stockpiling of contaminated sediments should be avoided as far as possible. If temporary stockpiling of contaminated sediments is necessary, the excavated sediment should be covered and the area should be placed within earth bunds or sand bags to prevent leachate from entering the ground, nearby drains and surrounding water bodies. The stockpiles area should be completely paved in order to avoid contamination to underlying soil or groundwater. Separate and clearly defined areas should be provided for stockpiling of contaminated and uncontaminated materials. Leachate, if any, should be collected and discharged according to the Water Pollution Control Ordinance (WPCO).	Yes
		• In order to minimise the potential odour / dust emissions during excavation and transportation of the sediment, the excavated sediments shall be wetted during excavation / material handling and shall be properly covered when placed on trucks or barges. Loading of the excavated sediment to the barge shall be controlled to avoid splashing and overflowing of the sediment slurry to the surrounding water.	N/A
		• The barge transporting the sediments to the designated disposal sites shall be equipped with tight fitting seals to prevent leakage and shall not be filled to a level that would cause overflow of materials or laden water during loading or transportation. In addition, monitoring of the barge loading shall be conducted to ensure that loss of material does not take	N/A

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		place during transportation. Transport barges or vessels shall be equipped with automatic self-monitoring devices as specified by the DEP.	
S6.5.24	S5.2.1	Potential Floating Refuse: Proper management and education should be given to construction site workers such that accidental release or intentional disposal would be avoided. The refuse should be stored in enclosed bin to avoid adverse impacts to the surroundings including marine environment. Regular checking should also be carried out to ensure that the refuse is stored properly.	N/A
Recomme	ended Mitiga	tion Measures for Marine Ecological Impact	
EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
S7.8.3	S6.3.3	<ul> <li>Based upon a precautionary approach, a speed limit of 10 knots should be strictly enforced on all construction-related vessels.</li> </ul>	Yes
S7.8.6	S6.3.1	<ul> <li>Good site practices, guidelines and mitigation measures detailed in Water Quality Sections 5.9.1 to 5.9.20 should be adopted to further alleviate water quality impacts.</li> </ul>	Yes
S7.8.9	S6.3.2	<ul> <li>Coral colonies at REA2 under the direct impacts of habitat loss should be translocated as a precautionary measure. A detailed Coral Translocation Proposal, including description of methodology and precautionary post-translocation monitoring programme, should be prepared and subject to agreement with the authority before commencement of the coral translocation.</li> </ul>	N/A
Recomme	ended Mitiga	tion Measures for Landscape and Visual Impact	
EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		Preservation of New Tree Planting:	
S8.9.2	S7.3.1	<ul> <li>All the planned new trees to be retained and not to be affected by the Project shall be carefully protected during construction in accordance with DevB TCW No. 7/2015 – Tree Preservation during Development issued by GLTM Section of DevB.</li> </ul>	N/A
		<ul> <li>Any existing vegetation in landscaped area and natural terrain not to be affected by the Project shall be carefully preserved.</li> </ul>	N/A
S8.9.2	S7.3.1	Transplanting of Affected Trees: <ul> <li>Planned trees to be planted under HKBCF unavoidably affected by the works shall be transplanted within the Project boundary or off-site within the Airport Island (i.e. within area of approx. 6.2km) as far as possible in accordance with DevB TCW No. 7/2015 – Tree Preservation and the latest Guidelines on Tree Transplanting issued by GLTM Section of DevB.</li> </ul>	N/A

N/A

Compensatory Tree Planting:

S8.9.2

S7.3.1

EIA Ref.	EM&A Ref.	Recommended Mitigation Measures	Mitigation Measures Implemented? ^
		<ul> <li>Any planned trees to be planted under HKBCF to be felled under the Project shall be compensated within the Project boundary or off-site within the Airport Island (i.e. within area of approx. 6.2km), in accordance with DevB TCW No. 7/2015 – Tree Preservation. The compensatory planting shall be of a ratio not less than 1:1 in terms of number, i.e. the number of compensatory trees shall not be lower than that of the number of trees to be felled. Justification shall be provided if tree compensation requirement could not be met. For trees to be compensated on slopes, the guidelines for tree planting stipulated in GEO Publication No. 1/2011 will be followed.</li> </ul>	
S8.9.2	S7.3.1	Control of night-time lighting glare: <ul> <li>Any lighting provision of the construction works at night shall be carefully control to prevent light overspill to the nearby VSRs and into the sky.</li> </ul>	N/A
S8.9.2	S7.3.1	<ul> <li><u>Erection of Decorative Screen Hoarding:</u></li> <li>Decorative Hoarding, which is compatible with the surrounding settings, shall be erected during construction to minimise the potential landscape and visual impacts due to the construction works and activities.</li> </ul>	N/A
S8.9.2	S7.3.1	<ul> <li>Management of Construction Activities and Facilities:</li> <li>The facilities and activities at works sites and areas, which include site office, temporary storage areas, temporary works etc., shall be carefully managed and controlled on the height, deposition and arrangement to minimise any potential adverse landscape and visual impacts.</li> </ul>	N/A
S8.9.2	S7.3.1	<ul> <li><u>Reinstatement of Temporarily Disturbed Landscape Areas:</u></li> <li>All hard and soft landscape areas disturbed temporarily during construction shall be reinstated on like-to-like basis, to the satisfaction of the relevant Government Departments.</li> </ul>	N/A
\$8.9.2	S7.3.1	Aesthetically Pleasing Design of Aboveground / Above-sea Structures: <ul> <li>The proposed structures in regard of layouts, forms, materials and finishes shall be sensitively designed so as to blend in the structures to the adjacent landscape and visual context.</li> </ul>	N/A
S8.9.2	S7.3.1	<ul> <li>Provision of Amenity Planting:</li> <li>Amenity planting, including groundcover and trees shall be provided to soften the proposed above-ground structures on HKBCF as far as appropriate.</li> </ul>	N/A

Notes:

Yes = Implemented where applicable

No = Not implemented

Obs/Rem = Observations or reminders were issued, and items were rectified

N/A = Not applicable to the construction works implemented during the reporting period

^ Checked by ET through site inspection and record provided by the Contractor.