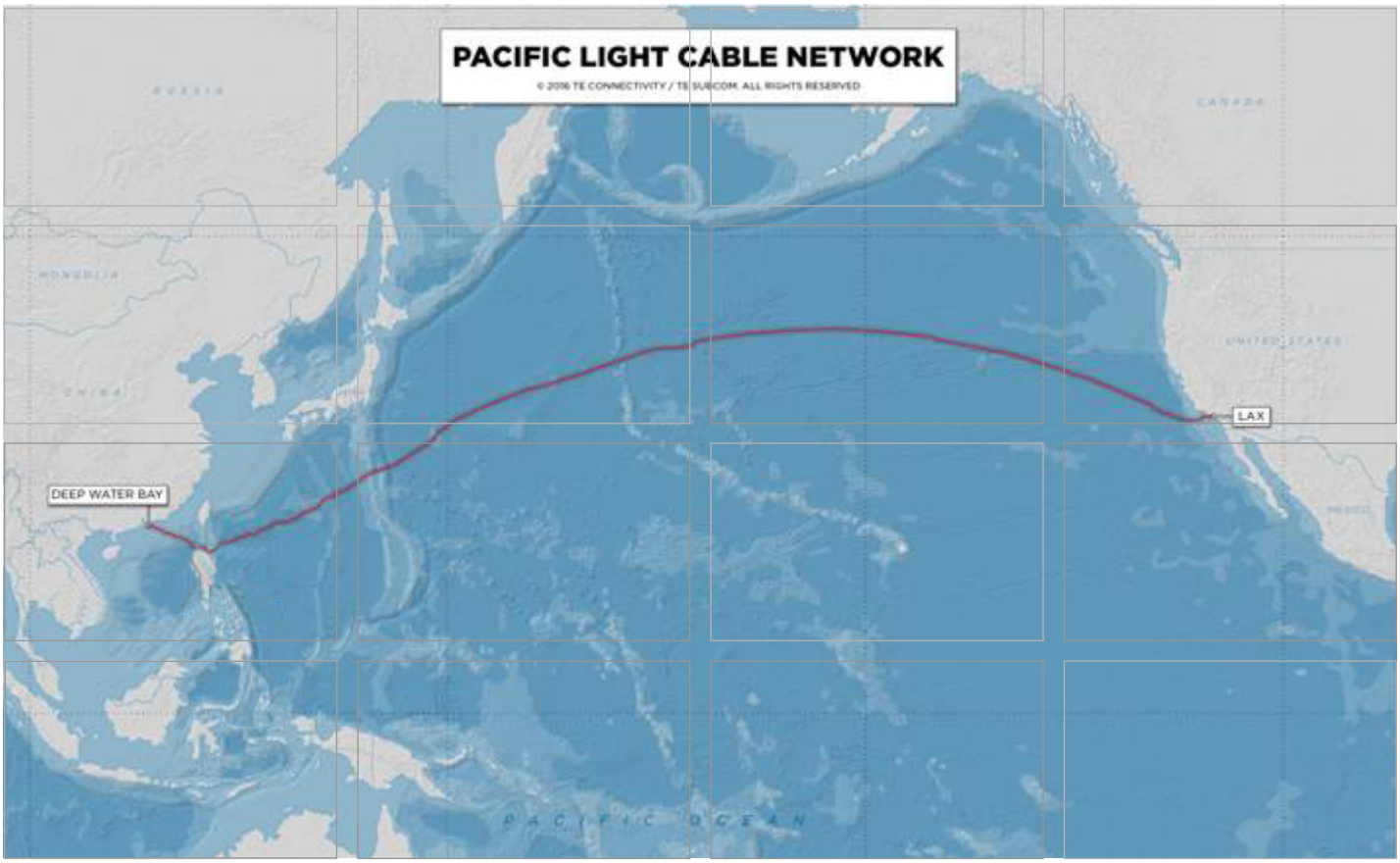

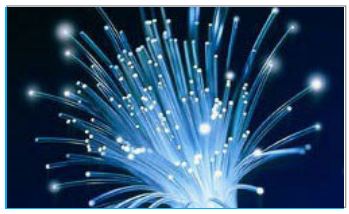

Pacific Light Cable Network (PLCN) - Deep Water Bay (EP-539/2017)

PCCW Global®

Phase 2 – Post-Project Water Quality Impact Monitoring Report

Sep 2018

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Pacific Light Cable Network (PLCN) – Deep Water Bay (EP-539/2017)

Phase 2 – Post-Project Water Quality Impact Monitoring Report

ERM Document Code: 0448409.doc

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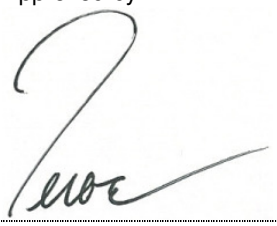
Client: PCCW Global (HK) Limited	GMS No: 0448409
Summary: This report presents the monitoring requirements, methodologies and results of the post-project water quality monitoring in accordance with the Project Profile (PP-550/2017).	Date: 6 Sep 2018 Approved by :  *Terence Fong* *Partner*

Revision	Description	By	Checked	Approved	Date
0	Phase 2 – Post-Project Water Quality Impact Monitoring Report	NN	FZino	TFONG	6 Sep 18

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Pacific Light Cable Network (PLCN) – Deep Water Bay
Environmental Certification Sheet
EP-539/2017

Reference Document/Plan

Document/~~Plan~~ to be ~~Certified~~/ Verified:	*Phase 2 –Post-Project Water Quality Monitoring Report*
Date of Report:	6 Sep 2018
Date prepared by ET:	ERM-Hong Kong Ltd
Date received by IEC:	Ecosystem Ltd

Reference EM&A Manual/ EP Requirement

EM&A Manual Requirement: Section 2

Content: *Water Quality Monitoring*

G.2.3.1 "Post Project Monitoring will comprise sampling on three occasions (days) within three weeks after completion of the cable installation/ repair operation works at the same stations as Baseline Monitoring, during mid-flood and mid-ebb tides. The interval between two sets of monitoring shall not be less than 36 hours."

G2.5 The reports to be provided shall include:

- Baseline Monitoring Report;
- Weekly Impact Monitoring Reports; and
- **Post Project Monitoring Report.**

The Baseline Monitoring Report shall be provided no later than two weeks before the cable installation/ repair operation work and the report should be submitted to EPD for agreement on the Action/Limit Levels.

EP Condition: Conditions No. 3.2 – 3.3

Content: *Water Quality Monitoring*

3.2 Samples, measurements and necessary remedial actions shall be taken in accordance with the EM&A requirements described in the Project Profile (Register No. PP-550/2017) by:

(a) conducting baseline environmental monitoring;
(b) conducting impact monitoring; and
(c) carrying out remedial actions in accordance to the EM&A requirements as described in the Project Profile (Register No. PP-550/2017), or as agreed by the Director, in case where specified criteria in the EM&A requirements are exceeded.

3.3 Submit to the Director three hard copies and one electronic copy of the following, as defined in the EM&A requirements described in the Project Profile (Register No. PP-550/2017):

(a) Baseline Monitoring Report on water quality no later than 2 week before the commencement of cable installation works;
(b) Weekly EM&A Report no later than 3 days after the relevant monitoring data are collected or become available during the cable installation works; and
(c) **Final EM&A Report within one month after completion of the construction works.**

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ET Certification

I hereby certify that the above referenced document/~~plan~~ complies with the above referenced condition of EP-539/2017.

Terence Fong, Environmental Team Leader: Date: 6 Sep 2018

IEC Verification

I hereby verify that the above referenced document/~~plan~~ complies with the above referenced condition of EP-539/2017.

Dr Vincent Lai, Independent Environmental Checker: Date: 7/9/2018

CONTENTS

LIST OF TABLES

LIST OF ANNEXES

The cable installation works for the **Pacific Light Cable Network – Deep Water Bay** (the 'Project') are scheduled to be carried out in phases:

- **Phase 1** Land Cable Installation and Shore-End Cable Installation **(Zone A only)** – completed on 4 April 2018;
- **Phase 2** Submarine Cable Installation **(Zones A and B)** – completed on 27 Jul 2018.

Phase 2 of the Project commenced within Zone A on 10 July 2018, proceeded beyond Zone A on 11 July 2018 and after down time for adverse weather between 13-19 July, re-started works and proceeded into Zone B on 20 July. Installation work then stopped on 21 July due to equipment problems and resumed on 24 July. Jetting works proceeded beyond Zone B on 25 July and remaining works within the area east of Zone B were completed on 27 July.

This *Phase 2 - Post Project Water Quality Monitoring Report* presents the EM&A post project water quality monitoring conducted from 21 to 28 Aug 2018 in accordance with the *Annex G* of *the Project Profile* and the requirements under EP-539/2017.

Water Quality

Post-Project Water Quality Monitoring was carried out on three occasions (days) at all monitoring stations within each of Zone A and Zone B. The monitoring exercise was started within 3 weeks after the completion of the Phase 2 cable installation works within both zones, with adverse weather conditions minimally affecting the latter part of monitoring. The intervals between two sets of monitoring were not less than 36 hours and the water quality sampling was undertaken within 2 hours before and 2 hours after mid-flood and mid-ebb tidal state on each sampling occasion.

Post project data showed larger DO range (and on average lower values) for surface and mid-depth levels, lower bottom DO, lower turbidity and higher SS records compared to the baseline data. The overall water quality at the impact stations in both zones was found to be similar to that at the corresponding control stations. Given the control stations are far away (about 1.5 km for Zone A and about 3 km for Zone B) from the Phase 2 work area and sediments disturbed during the cable laying works are calculated to settle onto the seabed within approximately 180 m from the cable alignment, it is concluded that the overall changes in DO, turbidity and SS levels during the post-project monitoring period at all designated stations, including the control stations, are likely to represent natural variation and were not due to the Project.

Conclusion

Phase 2 of the Project is considered to have negligible impact on water quality.

1 INTRODUCTION

ERM-Hong Kong, Limited (ERM) was appointed by PCCWG as the Environmental Team (ET) to implement the Environmental Monitoring and Audit (EM&A) programme for the Pacific Light Cable Networks (PLCN) – Deep Water Bay Project (thereinafter called the 'Project').

1.1 PURPOSE OF THE REPORT

This is the Post-Project Water Quality Monitoring Report for Phase 2 (Submarine Cable Installation) of the Project and summarises the post-project water quality (WQ) monitoring results for the post-project water quality monitoring from 21 to 28 August 2018. The post-project water quality monitoring results are used to compare with the Baseline and Impact monitoring results in order to investigate any potential impact of the Project works on the WQ in the vicinity of the Project.

1.2 STRUCTURE OF THE REPORT

The structure of the report is as follows:

Section 1 : ***Introduction***
Details the background, purpose and structure of the report.

Section 2 : ***Project Information***
Summarises background and scope of the project, the construction works undertaken and the status of Environmental Permits/Licenses during the reporting period.

Section 3 : ***Water Quality Monitoring Requirements***
Summarises the monitoring parameters, monitoring programmes, monitoring methodologies, monitoring frequency, monitoring locations, Action and Limit Levels, and Event / Action Plans.

Section 4 : ***Monitoring Results***
Summarises the monitoring results obtained in the post-project water quality monitoring for Phase 2 of the Project.

Section 5 : ***Conclusions***
Presents the key findings of the post-project water quality monitoring results for Phase 2 of the Project.

2 PROJECT INFORMATION

2.1 BACKGROUND

In order to help meet the tremendous telecommunication services requirements between Asia and North America, the **PLCN Consortium** has decided to build a submarine telecommunication cable system, which will be approximately 12,800 km in length, connecting Hong Kong and the United States. The cable will connect to Deep Water Bay (DWB) within the HKSAR. **PCCW Global (HK) Limited (PCCWG)** is providing the cable landing point and the associated cable landing service in Hong Kong for the PLCN Consortium.

The proposed cable will land at an existing Beach Man Hole location at Deep Water Bay (DWB) in Hong Kong and the full route of the proposed PLCN submarine cable system is depicted in *Figure 1.1*. It should be noted that DWB is currently the landing site for a number of submarine cables.

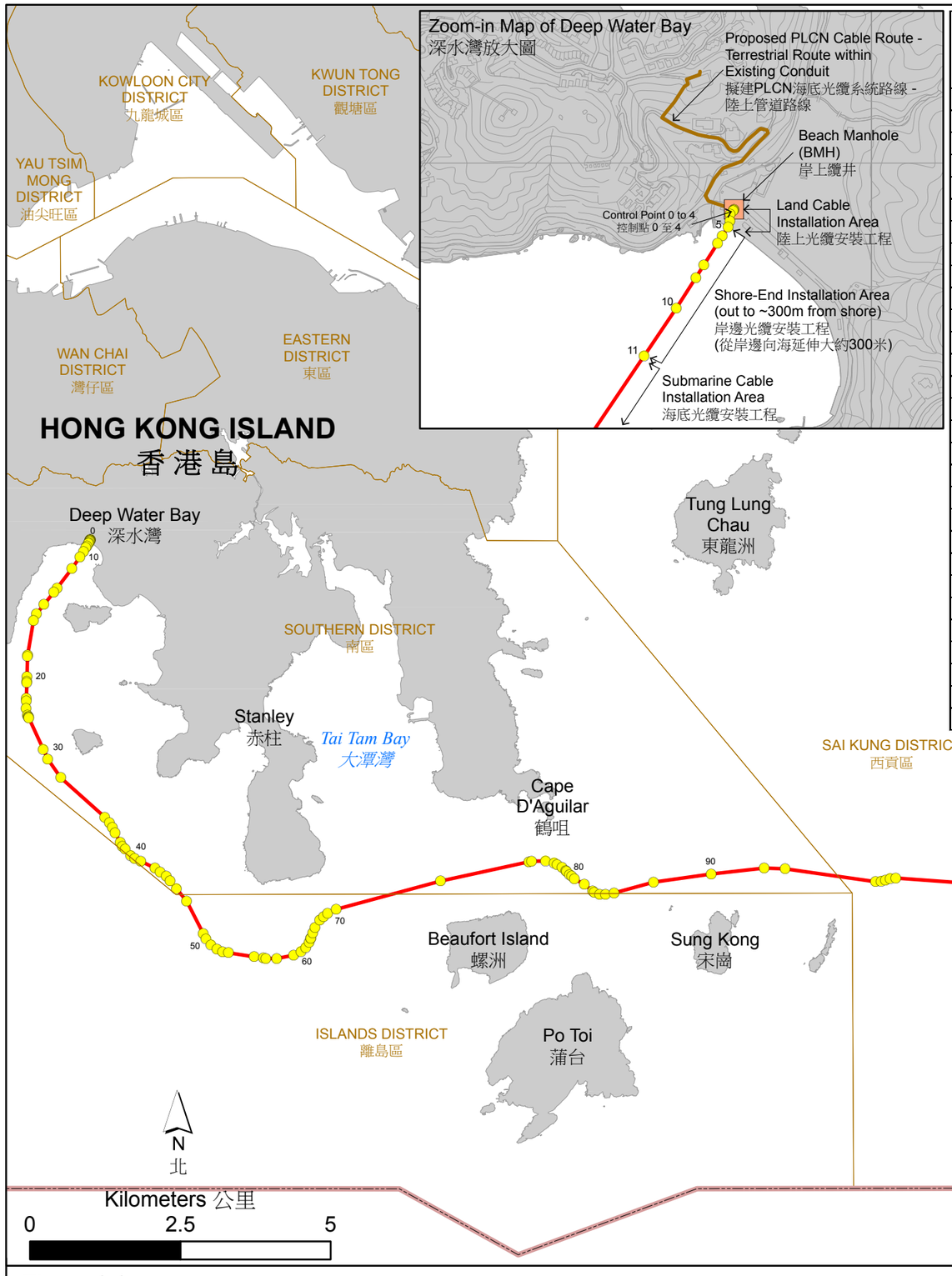
The Project Profile (PP-550/2017) which includes an assessment of the potential environmental impacts associated with the installation and operation of the submarine telecommunications cable system within HKSAR (including connection to land at DWB) was prepared and submitted to the Environmental Protection Department (EPD) under section 5.(1) (b) and 5.(11) of the *Environmental Impact Assessment Ordinance* (EIAO) for the application for Permission to apply directly for Environmental Permit (EP). On 1 June 2017, EPD issued a letter to PCCWG permitting direct application for an environmental permit and following an application, EPD subsequently issued an Environmental Permit (EP-539/2017) on 10 July 2017.

Pursuant to *Condition 3.1* of the EP, an environmental monitoring and audit (EM&A) programme, as set out in the Project Profile is required for this Project. As per *Condition 3.2* of the EP regarding Water Quality Monitoring, there is a requirement to conduct water quality baseline monitoring, impact monitoring as well as post-project monitoring. Action and Limit Levels are derived from the baseline data.

2.2 SUMMARY OF PHASE 1 & PHASE 2 CABLE INSTALLATION WORKS SCHEDULE

Cable installation for this Project was carried out in two phases, with Phase 1 situated in part of Zone A only and Phase 2 covering Zones A and B (as well as the alignment outside both Zone A or Zone B). The zoning is shown in *Figures 2.1* to *2.3* and the schedule and works carried out to date for each Phase is as follows:

- **Phase 1 Land Cable Installation and Shore-End Cable Installation (Zone A only):** Mini shore-end cable installation to Beach Manhole at Deep Water Bay (DWB), involving land trench excavation and shore-end cable



Working Limit Control Point 工作工程控制點	Coordinate System (HK Grid 1980) 香港1980方格網坐標		Chainage Distance 測量距離	Working Limit Control Point 工作工程控制點	Coordinate System (HK Grid 1980) 香港1980方格網坐標		Chainage Distance 測量距離	Working Limit Control Point 工作工程控制點	Coordinate System (HK Grid 1980) 香港1980方格網坐標		Chainage Distance 測量距離	Working Limit Control Point 工作工程控制點	Coordinate System (HK Grid 1980) 香港1980方格網坐標		Chainage Distance 測量距離
	X	Y	(km)		X	Y	(km)		X	Y	(km)		X	Y	(km)
0	837231.04	811909	0.000	29	836207.07	808946	3.294	58	840327.75	804946	9.388	87	845797.25	806008	15.528
1	837230.01	811907	0.002	30	836447.47	808423	3.870	59	840610.31	805001	9.677	88	845939.37	806035	15.674
2	837229.32	811906	0.003	31	836522.74	808260	4.051	60	840735.25	805062	9.816	89	846597.69	806215	16.358
3	837223.82	811899	0.012	32	836738.08	807951	4.428	61	840812.92	805128	9.919	90	847556.1	806350	17.328
4	837223.31	811887	0.025	33	837470.89	807294	5.415	62	840870.82	805211	10.020	91	848437.53	806449	18.217
5	837219.53	811875	0.037	34	837548.41	807207	5.531	63	840896.58	805280	10.094	92	848785.74	806437	18.566
6	837208.19	811857	0.058	35	837595.16	807121	5.629	64	840897.78	805283	10.097	93	850288.9	806222	20.089
7	837198.74	811842	0.076	36	837641.74	807036	5.727	65	840931.1	805373	10.193	94	850382.39	806229	20.183
8	837172.11	811801	0.126	37	837729.57	806874	5.912	66	840965.45	805465	10.291	95	850454.55	806251	20.258
9	837156.48	811776	0.155	38	837763.44	806812	5.983	67	841046.88	805583	10.435	96	850531.36	806275	20.339
10	837118.34	811716	0.226	39	837809.33	806760	6.052	68	841110.98	805638	10.520	97	850624.33	806284	20.433
11	837055.12	811622	0.339	40	837900.6	806658	6.189	69	841177.64	805695	10.608	98	858725.33	805691	28.576
12	836923.7	811428	0.575	41	837970.38	806612	6.273	70	841319.93	805764	10.767	99	858880.21	805680	28.731
13	836678.36	811108	0.979	42	838071.27	806562	6.386	71	843055.3	806234	12.569	100	863088.39	805889	32.955
14	836622.35	811035	1.071	43	838305.54	806448	6.647	72	844523.23	806553	14.075	101	865032.94	805816	34.906
15	836459.3	810831	1.333	44	838393.37	806384	6.756	73	844570.83	806563	14.124	102	865321.36	805805	35.195
16	836331.99	810671	1.538	45	838490.83	806313	6.877	74	844800.96	806568	14.355	103	865441.32	805812	35.316
17	836284.22	810566	1.654	46	838557.18	806233	6.981	75	844945	806533	14.503	104	865562.24	805851	35.443
18	836186.45	809988	2.242	47	838659.97	806108	7.143	76	844991.07	806508	14.556	105	865660.44	805911	35.559
19	836186.11	809974	2.255	48	838831.53	805900	7.414	77	845074.62	806463	14.651	106	865735.92	805991	35.668
20	836176.14	809626	2.604	49	839107.83	805363	8.020	78	845137.9	806403	14.739	107	865786.28	806083	35.773
21	836174.08	809556	2.675	50	839152.88	805275	8.118	79	845149.6	806392	14.755	108	865843.48	806187	35.893
22	836173.56	809535	2.696	51	839234.71	805173	8.249	80	845200.84	806343	14.826	109	865913.47	806261	35.995
23	836165.83	809267	2.964	52	839335.1	805096	8.376	81	845234.72	806311	14.873	110	866000.33	806315	36.098
24	836164.62	809227	3.005	53	839429.13	805055	8.479	82	845279.43	806269	14.934	111	866111.29	806350	36.214
25	836161.02	809105	3.127	54	839527.45	805040	8.579	83	845447.74	806176	15.127	112	867081.39	806403	37.188
26	836185.59	808992	3.242	55	839955.45	804974	9.013	84	845585.99	806066	15.304	113	869751.57	806549	39.869
27	836198.13	808965	3.273	56	840106.71	804951	9.166	85	845613.5	806045	15.339	114	869840.61	806545	39.958
28	836202.77	808955	3.284	57	840148.99	804945	9.209	86	845700.31	806015	15.431				

Legend 圖例

- Working Limit Control Point 工作限制工程點
- Proposed PLCN Cable Route 擬建PLCN海底光纜系統路線
- Boundary of HKSAR 香港特別行政區邊界

Figure 1.1
圖 1.1

Proposed PLCN Cable Route
擬建PLCN海底光纜系統路線

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Date: 29/3/2017

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installation of the PLCN cable (ie from Beach Manhole out to approximately 650 m from Beach Man Hole) using diver jetting;

- Baseline data were collected prior to the start of Phase 1 cable installation works (between 5th and 9th February 2018) and Action and Limit Levels derived from these data, as presented in the final *Baseline Water Quality Monitoring Report (Zone A*).

- Land trenching commenced 6 March 2018. Following issue of Marine Department Notice on 23 March 2018, land trenching completed with LCSD inspection of restored beach area, on 24 March 2018.

- Near shore marine diver jetting works within silt curtain commenced 24 Mar 2018, and was completed on 4 April.

- Note that all works in April were done outside 300 m from the seaward boundary of the beach, as required in the Environmental Permit [EP-539/2017] conditions.

- **Phase 2 Submarine Cable Installation (Zones A and B):** Installation of PLCN cable from shore-end (ie approximately 650m from Beach Manhole) to HK SAR marine eastern boundary, involving jetting technique and potential diver jetting in specific areas (eg HK Electric Pipeline crossing).

  - Baseline data were collected prior to the start of Phase 2 cable installation works (between 28 May and 2 June 2018) and Action and Limit Levels derived from these data, as presented in the final *Baseline Water Quality Monitoring Report (Zone A and Zone B for Phase 2 Installation*).

  - Marine installation works using jetting commenced in Zone A on 10 July 2018, moved in to Zone B on 12 July and were suspended due to adverse weather on same day. They remained on standby until restart in Zone B on 20 July. Marine installation works were then suspended again due to equipment problems at the end of the day on 21 July 2018. Marine installation works resumed in Zone B on 24 July and works within Zone B was completed on 25 July. Marine installation continued outside Zone B and the installation to the east of Zone B was completed on 27 July. Some equipment retrieval and demobilization as well as inspections where then carried out and works completed on 4 August 2018.

This report presents the Project's post project monitoring data for *Phase 2 Submarine Cable Installation* (Zone A and Zone B as shown in *Figures 2.2-2.3*).

2.3 SITE DESCRIPTION

The cable installation runs from Deep Water Bay out through southeast Hong Kong offshore waters. The alignment of the cable is illustrated in *Figure 1.1*.

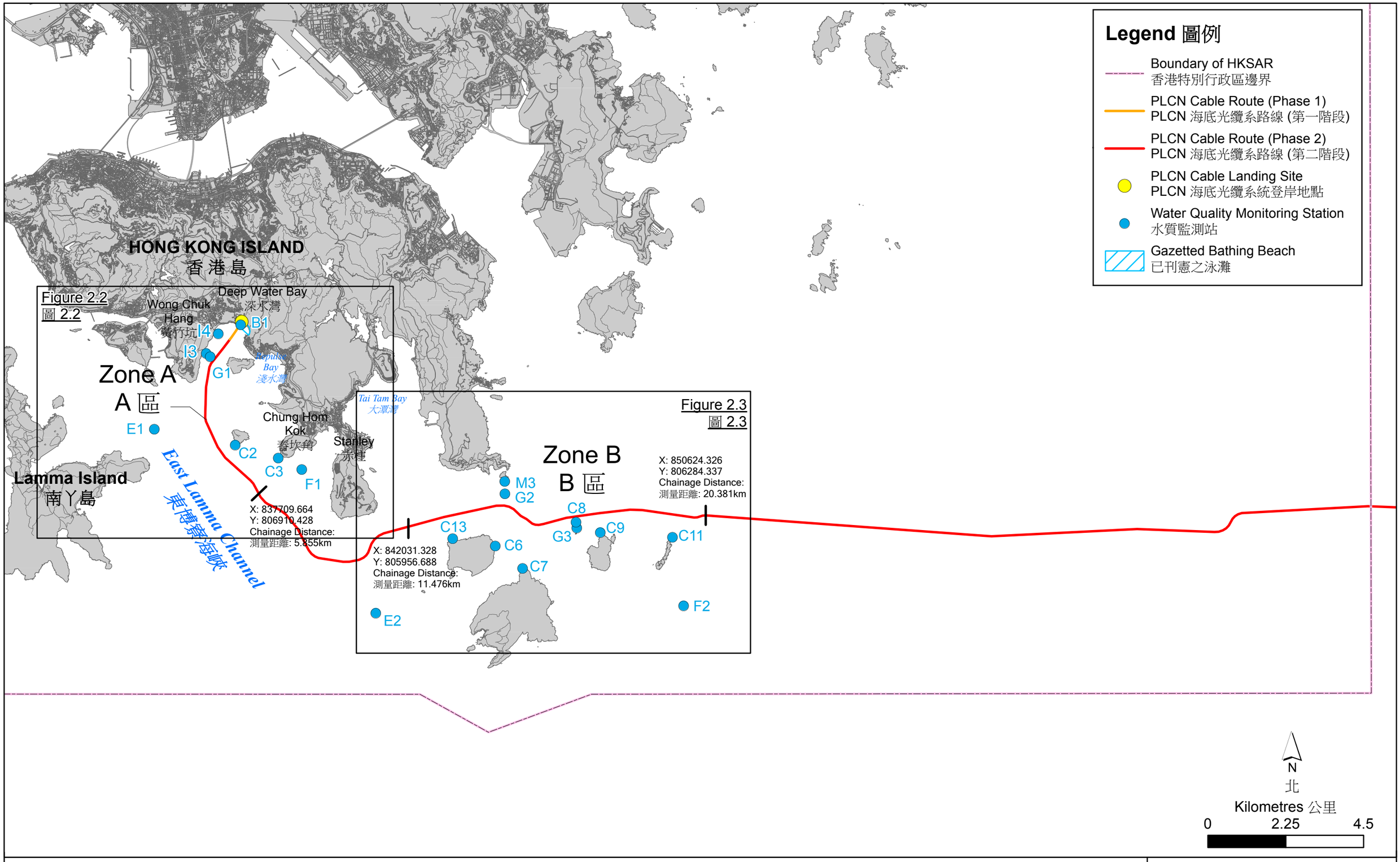

Figure 2.1
圖 2.1

Water Quality Monitoring Stations - Overview
水質監測圖 - 概覽

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Date: 14/3/2018

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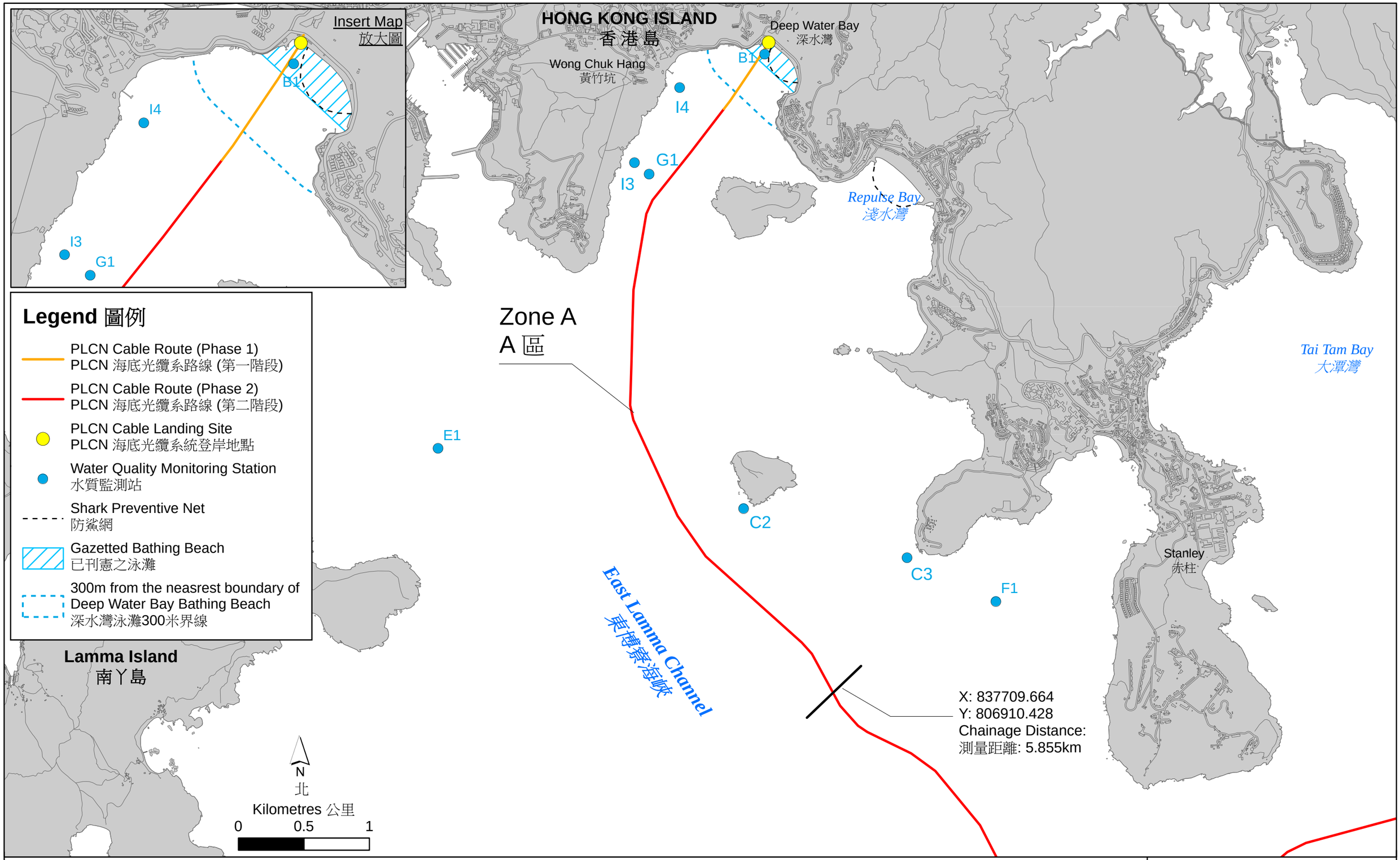

Figure 2.2
圖 2.2

Water Quality Monitoring Stations - Zone A
水質監測站 - A 區

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Date: 14/3/2018

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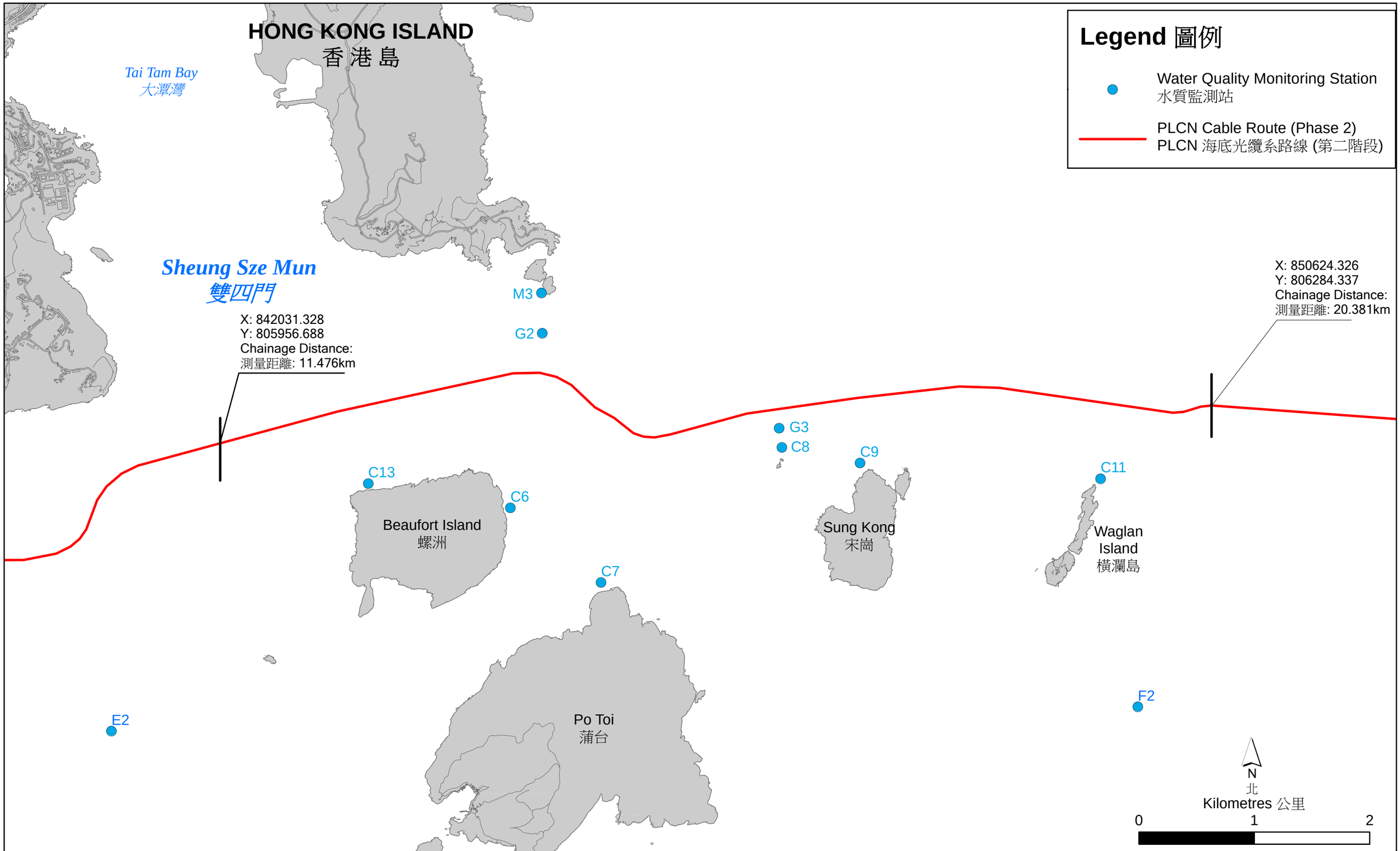

Figure 2.3
圖 2.3

Water Quality Monitoring Stations - Zone B
水質監測站 - B 區

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Date: 14/3/2018

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2.4 STATUS OF ENVIRONMENTAL APPROVAL DOCUMENTS

A summary of the relevant permits, licences, notifications and/or reports on environmental protection for this Project is presented in *Table 2.2*.

Table 2.2 Summary of Environmental Licensing, Notification, Permit and Reporting Status

Permit / Licence / Notification / Report	Reference	Validity Period	Remarks
Environmental Permit	(EP-539/2017) Available at http://www.epd.gov.hk/eia/english/alpha/aspd_717.html	Throughout construction & operation period	Granted on 10 July 2017
EM&A Manual	(PP-550/2017) (as part of the Project Profile – see above)	Throughout construction & operation period	Approved by EPD on 1 June 2017
Baseline Water Quality Monitoring Report (Zone A)	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Throughout construction period for Phase 1 works in Zone A	Approved by EPD on 15 March 2018
Phase 1 – 1st Weekly WQ Impact Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	n/a	Submitted to EPD 18 April 2018
Phase 1 – 2nd Weekly WQ Impact Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	n/a	Submitted to EPD 20 April 2018
Phase 1- Post Project Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Following construction period for Phase 1 works in Zone A	Final Submission to EPD on 15 May 2018
Baseline Water Quality Monitoring Report (Zone A and Zone B for Phase 2 Installation)	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Throughout construction period for Phase 2 works in Zone A and Zone B	Final Submission to EPD on 29 June 2018
Phase 2- 1st Weekly WQ Impact Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Throughout first week of construction period for Phase 2	Submission to EPD on 25 July 2018
Phase 2- 2nd Weekly WQ Impact Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Throughout second week of construction period for Phase 2	Submission to EPD on 3 August 2018
Phase 2- 3rd Weekly WQ Impact Monitoring Report	Available at http://www.epd.gov.hk/eia/english/register/aep/ep5392017_content.html	Throughout third week of construction period for Phase 2	Submission to EPD on 10 August 2018

3.1 MONITORING LOCATIONS

In accordance with the *Annex G* of *the Project Profile,* since Phase 2 submarine cable installation works were conducted within both Zone A and Zone B, post project water quality sampling was undertaken at stations in both zones. The locations of the sampling stations within Zone A and Zone B are shown in *Figures 2.2* and *2.3* respectively. The co-ordinates of starting and ending points for two zones and the monitoring stations are listed in *Table 3.1* and *Table 3.2* respectively.

Table 3.1 Co-ordinates of Starting Points and Ending Points for Zones A and Zone B (HK Grid)

Zone	Starting Point		Ending Point	
	Easting	Northing	Easting	Northing
A	Start from shore end.		837709.664	806910.428
B	842031.328	805956.688	850624.326	806284.337

Table 3.2 Co-ordinates of Baseline Monitoring Stations (HK Grid)

Station	Nature	Corresponding Control Station	Easting	Northing
Zone A: The waters from Aberdeen to Chung Hom Kok where a number of sensitive receivers are located close to the cable alignment.				
Covers the cable alignment between Chainage 0 and 5.851 km.				
B1	Impact Station (Adjacent to Deep Water Bay Beach)	E1, F1	837188	811783
I3	Impact Station (Ocean Park's Main Seawater Intake)	E1, F1	836195	810956
I4	Impact Station (Ocean Park's Training Yard Seawater Intake)	E1, F1	836539	811529
C2	Impact Station (Coral sites along the coast of Round Island)	E1, F1	847579	805787
C3	Impact Station (Coral sites along the coast of Chung Hom Kok)	E1, F1	838275	807941
G1	Gradient Station (Between Ocean Park's Main Seawater Intake and cable alignment)	E1, F1	836306	810867
E1	Control Station for Zone A in Ebb Tide	-	834695	808775
F1	Control Station for Zone A in Flood Tide	-	838953	807607
Zone B: The waters from Beaufort Island to Waglan Island where a number of sensitive receivers are located close to the cable alignment.				
Covers the cable alignment between Chainage 11.117 km and 20.014 km.				
C6	Impact Station (Coral sites along the coast of south & east Beaufort Island)	E2, F2	844548	805397
C7	Impact Station (Coral sites along the coast of Po Toi Island)	E2, F2	845334	804749

Station	Nature	Corresponding Control Station	Easting	Northing
C8	Impact Station (Coral sites along the coast of Sung Kong Islet)	E2, F2	846901	805922
C9	Impact Station (Coral sites along the coast of Sung Kong)	E2, F2	837028	808316
C11	Impact Station (Coral sites along the coast of Waglan Island)	E2, F2	849664	805649
C13	Impact Station (Coral site along the coast of north Beaufort Island)	E2, F2	843316	805606
M3	Impact Station (Cape d'Aguilar Marine Reserve)	E2, F2	844817	807259
G2	Gradient Station (Between M3 Cape d'Aguilar Marine Reserve and cable alignment)	E2, F2	844824	806909
G3	Gradient Station (Between C8 Coral sites along the coast of Sung Kong Islet and cable alignment)	E2, F2	846878	806086
E2	Control Station for Area B in Ebb Tide	-	841090	803463
F2	Control Station for Area B in Flood Tide	-	849986	803673

3.2 SAMPLING AND TESTING METHODOLOGY

3.2.1 Monitoring Parameters

Parameters measured *in situ* were:

- dissolved oxygen (DO) (% saturation and mg L^{-1});
- temperature (°C);
- turbidity (NTU); and
- salinity (‰).

The only parameter measured in the laboratory was:

- suspended solids (SS) (mg L^{-1}).

In addition to the water quality parameters, other relevant data were measured and recorded in field logs, including the location of the sampling stations, water depth, time, weather conditions, sea conditions, tidal state, current direction and speed, special phenomena and work activities undertaken around the monitoring and works area that may influence the monitoring results.

3.2.2 Monitoring Equipment

Table 3.3 summaries the equipment used for the water quality impact monitoring.

Table 3.3 Equipment used during Post-Project Water Quality Monitoring

Equipment	Model
Global Positioning Device	Garmin etrex 20x & Furuno GP-170E (dGPS)
Water Depth Gauge	Sontek Hydrosurveyor / Sontek Riversurveyor
Water Sampling Equipment	Wildlife 1120 – 2.2L alpha vertical sampler
Salinity, DO, Temperature Measuring Meter	YSI ProDSS (Multi-Parameter)
Current Velocity and Direction	Sontek Hydrosurveyor / Sontek Riversurveyor
Turbidity Meter	YSI ProDSS (Multi-Parameter)

3.2.3 Monitoring Frequency and Timing

Post-Project Water Quality Monitoring was carried out on three occasions (21, 24 and 26 August 2018) at all monitoring stations within Zone A (B1, I3, I4, C2, C3, G1, E1 and F1) while monitoring at all monitoring stations within Zone B (C6, C7, C8, C9, C11, C13, M3, G2, G3, E2 and F2) were conducted on three occasions (22, 25 and 28 August 2018). The survey period was schedule to start within three weeks after the completion of the Phase 2 cable installation works within both zones A as shown in *Figure 2.1*, with adverse weather conditions minimally affecting the latter part of monitoring. The intervals between two sets of monitoring for the same zone were not less than 36 hours. The water quality sampling was undertaken within 2 hours before and 2 hours after mid-flood and mid-ebb tidal state on each sampling occasion.

Reference was made to the predicted tides at Waglan Island, which is the tidal station nearest to the Project Site, published on the website of the Hong Kong Observatory [1]. Based on the predicted tidal levels at Waglan Island, the post-project water quality monitoring was conducted between 21st and 28th August 2018, following the schedule presented in *Annex A*.

3.2.4 Sampling and Testing Protocol

All *in situ* monitoring instruments were checked, calibrated and certified by a laboratory accredited under HOKLAS or any other international accreditation scheme before use (see calibration reports in *Annex B*), and will subsequently be re-calibrated at-monthly intervals throughout all stages of the water quality monitoring. Responses of sensors and electrodes were checked with certified standard solutions before each use.

For the on-site calibration of field equipment, the *BS 1427: 1993, Guide to Field and On-Site Test Methods for the Analysis of Waters* was observed. Sufficient stocks of spare parts were maintained for replacements when necessary. Backup monitoring equipment was made available.

Water samples for SS measurements were collected in high density polythene bottles, packed in ice (cooled to 4° C without being frozen), and delivered to a HOKLAS laboratory (ALS Technichem [HK] Pty Ltd) as soon as possible after collection.

[1] Hong Kong Observatory (2017) http://www.hko.gov.hk/tide/predtide.htm?s=WAG [Accessed in August 2018]

3.2.5 Laboratory Analysis

All laboratory work was carried out in a HOKLAS accredited laboratory (ALS Technichem [HK] Pty Ltd). Water samples of about 1,000 mL were collected at the monitoring and control stations for carrying out the laboratory determinations. The determination work started within the next working day after collection of the water samples. The SS laboratory measurements were provided within 2 days of the sampling event (48 hours). The analyses followed the standard methods as described in APHA Standard Methods for the *Examination of Water and Wastewater*, 19th Edition, unless otherwise specified (APHA 2540D for SS).

The QA/QC details were in accordance with requirements of HOKLAS or another internationally accredited scheme (for details refer to *Annex C*).

3.2.6 Sampling Depths & Replication

Each station was sampled and measurements were taken at three depths, 1 m below the sea surface, mid depth and 1m above the sea bed. (All stations were at least 3 m in depth)

For *in situ* measurements, duplicate readings were made at each water depth at each station. Duplicate water samples were collected at each water depth at each station.

4 *IMPLEMENTATION STATUS OF ENVIRONMENTAL MITIGATION MEASURES*

Mitigation measures for water quality control were recommended in the Project Profile (PP-550/2017) and Environmental Permit (EP-539/2017). The Contractor implemented the following selected and relevant mitigation measures during Phase 2 cable installation works:

- The crane barge used for the transport of debris recovered from the seabed during route clearance/ pre-lay grapnel run shall be fitted with tight bottom seals in order to prevent leakage of material during loading and transport;

- The crane barge should be filled to a level which ensures that material does not spill over during loading and transport to the disposal site and that adequate freeboard is maintained to ensure that the decks are not washed by wave actions;

- The forward speed of the cable installation barge was limited to a maximum of 1 km/ hour.

- Water quality monitoring was carried out to verify that the project works were not resulting in any impacts to water quality, marine ecology and fisheries.

A total of six monitoring events were carried out between 21 and 28 August 2018 at Zone A and Zone B (i.e. three monitoring events for each zone). The monitoring events at designated monitoring stations within respective zones were started within 3 weeks after the completion of marine works and delayed due to adverse weather condition. The monitoring schedule is shown in *Annex A*. The monitoring events were performed on on 21, 24 and 26 August 2018 for Zone A and 22, 25 and 28 August 2018 for Zone B, as detailed in *Section 3.2.3*.

The monitoring data of post-project water quality monitoring within Zone A and Zone B are presented in *Annex E* and *Annex F* respectively. Graphical presentations in *Figures E1 - E4* compare the data against baseline and impact monitoring data for Phase 2 in Zone A and those in *Figure F1 – F4* compare the data for Zone B.

Zone A

In Zone A, the levels of DO measured during the post project monitoring period were slightly lower than that of the baseline period and slightly higher than that of the impact monitoring period. Exceedance of surface and mid-depth DO (action level: 5.19 mg/L; limit level: 4.77 mg/L) as well as bottom DO (action level: 4.96 mg/L; limit level: 4.95 mg/L) levels were recorded, including at both control stations E1 and F1 in all three survey days (for both tides). Measured DO levels at controls stations E1 and F1 (both approximately 1.5 km from works area of Zone A) were generally similar to that at impact monitoring stations within Zone A, indicating water quality variations during post-project monitoring were due to widespread natural variation and not isolated incidents due to the previous Project works. Detailed analysis during impact monitoring also showed similar results at the control and impact assessment stations. Therefore, although there is some difference between the baseline monitoring period and post-project monitoring, it is considered widespread WQ variation due to natural causes. Overall, the surface and mid-depth level DO levels recorded were satisfactory and always above 5.0 mg/L. For bottom DO levels, recorded levels ranged from 3.4 mg/L to 7.8 mg/L. Both surface and mid-depth level and bottom DO levels were higher than the corresponding Water Quality Objectives of DO of 4 mg/L for surface and middle layer and 2 mg/L for bottom layer.

Levels of Turbidity measured for stations within Zone A during the post-project monitoring period were generally lower than that of the baseline monitoring period. No exceedance of turbidity action and limit levels was recorded. Similar, SS levels recorded at stations within Zone A during the post-project monitoring period were relatively low when compared to that of the baseline monitoring period and no exceedance of SS action and limit levels was recorded.

In general, measured turbidity and SS levels at controls stations E1 and F1 (both about 1.5 km from work area of Phase 2) were similar to that of the rest of the monitoring stations during monitoring. Therefore, similar to that for DO levels, the differences between the baseline and post-project monitoring period are considered to be due to natural variation.

Zone B

In Zone B, recorded levels of surface and mid-depth DO covered the range of from 5.0 mg/L to 8.6 mg/L, which is wider than that of the the baseline monitoring period. Accordingly, exceedances of surface and mid-depth DO (action level: 5.76 mg/L; limit level: 5.56 mg/L) were recorded in 2 out of 3 monitoring surveys. For bottom DO, the recorded levels were generally from 4.3 mg/L to 8.2 mg/L (with two exceptions), including control stations E2 and F2, which result in recorded exceedances (action level: 5.84 mg/L; limit level: 5.64 mg/L) on all three monitoring survey events. It is expected the effect of stratification, which inhibits vertical mixing and results in low DO level at bottom and mid-depth level, was (one of) the cause for the low recorded DO levels. Similar effect due to stratification was also observed during the impact monitoring period. Overall, both surface and mid-depth level and bottom DO levels were higher than the corresponding Water Quality Objectives of DO of 4 mg/L for surface and middle layer and 2 mg/L for bottom layer.

For turbidity, the recorded levels during post-project monitoring events in Zone B were lower than that of both baseline and the impact monitoring period. No exceedance of action and limit levels for turbidity was recorded.

For SS, the recorded levels were similar yet slightly higher than that of the baseline monitoring period. Accordingly, exceedances in SS level (action level: 5.76 mg/L; limit level: 6.26 mg/L) were recorded occasionally, including control stations E2 and F2. For mid-flood survey on 22 August, where exceedance in SS level at relatively high number of survey stations (6 out of 11 stations) were recorded, exceedance of SS were recorded at both control stations E2 and F2. Exceedances of action and limit SS level were also recorded in other survey events, but the exceedances recorded were isolated (i.e. only at one or two impact stations at a time).

It is generally observed that measured turbidity and SS levels at controls stations E2 and F2 (both about 3 km from work area of Phase 2) were similar to that of the rest of the monitoring stations during monitoring. Therefore, similar to that for DO levels, the differences between the baseline and post-project monitoring period are considered to be due to natural variation.

Given the above information, particularly with regard to the control stations as well as the absence of marine works or other activities in the vicinity during post-project monitoring, the overall changes in DO, Turbidity and SS levels during the post project monitoring period at all designated stations compared to baseline data are likely to represent a natural phenomenon.

6 CONCLUSIONS

This *Phase 2 Post Project Water Quality Monitoring Report* presents the post project WQ monitoring undertaken between 21 to 28 August 2018 in accordance with the *Annex G* of *the Project Profile* and the requirements under EP-539/2017.

Post-Project Water Quality Monitoring was carried out on three occasions (days) at all monitoring stations within Zone A and Zone B (separately) and was started within 3 weeks after the completion of the Phase 2 cable installation works within Zone A and Zone B on 4 April 2018. The intervals between two sets of monitoring were not less than 36 hours. The WQ sampling was undertaken within 2 hours before and 2 hours after mid-flood and mid-ebb tidal state on each sampling occasion.

Post project data showed larger DO range (and on average lower values) for surface and mid-depth levels, lower bottom DO, lower turbidity and higher SS records compared to the baseline data. The overall water quality at the impact stations in both zones was found to be similar to that at the corresponding control stations. Given the control stations are far away (about 1.5 km for Zone A and about 3 km for Zone B) from the Phase 2 work area and water quality at these stations could not have been affected by the Project, it is concluded that the overall changes in DO, turbidity and SS levels during the post-project monitoring period at all designated stations, including the control stations, are likely to represent natural variation and were not due to the Project.

Although some changes in WQ were observed between post project and baseline monitoring for marine works under Phase 2 of this Project, for the reasons explained above, none of these changes are considered to be as a result of the Phase 2 Project works. Phase 2 of this Project therefore had negligible impact on water quality.

Annex A

Phase 2 - Post-Project Water Quality Monitoring Schedule (Zone A and Zone B)

Annex A

PLCN Post-Project Water Quality Impact Monitoring Schedule

Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
	ebb tide 7:25 - 11:25 flood tide 14:49 - 18:49 Zone A	ebb tide 8:01 - 12:01 flood tide 15:25 - 19:25 Zone B		ebb tide 9:07 - 13:07 flood tide 16:23 - 20:23 Zone A	ebb tide 9:41 - 13:41 flood tide 16:50 - 20:50 Zone B	ebb tide 10:16 - 14:16 flood tide 17:16 - 21:16 Zone A
27	28	29	30	31		
	ebb tide 11:24 - 15:24 flood tide 4:49 - 8:49 Zone B					
					PLCN Schedule 201808	

Annex B

Calibration Reports of Multi-parameter Sensor

專業化驗有限公司
QUALITY PRO TEST-CONSULT LIMITED
Unit 10, 14/F, Wah Wai Centre, 38-40 Au Pui Wan St., Fotan, Hong Kong
Email: info@qualityprotest.com; Website: www.qualityprotest.com
Tel: (852) 3956 8717; Fax: (852) 3956 3928

REPORT OF EQUIPMENT PERFORMANCE CHECK/ CALIBRATION

Report No. : AH080233
Date of Issue : 21 August 2018

PART A – CUSTOMER INFORMATION

Enovative Environmental Service Ltd.
Flat 2207, Yu Fun House,
Yu Chui Court, Shatin
New Territories, Hong Kong
Attn: Mr. Thomas WONG

PART B – DESCRIPTION

Name of Equipment	:	YSI 6920 v2 (Multi-Parameters)
Manufacturer	:	YSI (a xylem brand)
Serial Number	:	00019CB2
Date of Received	:	Aug 20, 2018
Date of Calibration	:	Aug 20, 2018
Date of Next Calibration[a]	:	Nov 20, 2018

PART C – REFERENCE METHODS/ DOCUMENTS FOR THE CALIBRATION

Parameter	Reference Method
pH at 25°C	APHA 21e 4500-H^+ B
Dissolved Oxygen	APHA 21e 4500-O G
Conductivity at 25°C	APHA 21e 2510 B
Salinity	APHA 21e 2520 B
Turbidity	APHA 21e 2130 B
Temperature	Section 6 of international Accreditation New Zealand Technical Guide no. 3 Second edition March 2008: Working Thermometer Calibration Procedure.

PART D – CALIBRATION RESULTS[b,c]

(1) pH at 25°C

Target (pH unit)	Displayed Reading[d] (pH Unit)	Tolerance[e](pH Unit)	Results
4.00	4.04	0.04	Satisfactory
7.42	7.43	0.01	Satisfactory
10.01	9.97	-0.04	Satisfactory

Tolerance of pH should be less than ±0.10 (pH unit)

(2) Temperature

Reading of Ref. thermometer (°C)	Displayed Reading (°C)	Tolerance (°C)	Results
17.0	17.1	0.1	Satisfactory
26.3	26.2	-0.1	Satisfactory
54.3	54.0	-0.3	Satisfactory

Tolerance limit of temperature should be less than ±2.0 (°C)

~ CONTINUED ON NEXT PAGE ~

Remark(s): -

[a] *The "Date of Next Calibration" is recommended according to best practice principals as practiced by QPT or quoted form relevant international standards.*
[b] *The results relate only to the calibrated equipment as received*
[c] *The performance of the equipment stated in this report is checked with independent reference material and results compared against a calibrated secondary source.*
[d] *"Displayed Reading" denotes the figure shown on item under calibration/ checking regardless of equipment precision or significant figures.*
[e] *The "Tolerance Limit" mentioned is the acceptance criteria applicable for similar equipment used by QPT or quoted form relevant international standards.*

APPROVED SIGNATORY: _____
LAM Ho-yee, Emma
Assistant Laboratory Manager

專業化驗有限公司
QUALITY PRO TEST-CONSULT LIMITED
Unit 10, 14/F, Wah Wai Centre, 38-40 Au Pui Wan St., Fotan, Hong Kong
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REPORT OF EQUIPMENT PERFORMANCE CHECK/ CALIBRATION

Report No. : AH080233
Date of Issue : 21 August 2018

PART D – CALIBRATION RESULTS (Cont'd)

(3) Dissolved Oxygen

Expected Reading (mg/L)	Displayed Reading (mg/L)	Tolerance (mg/L)	Results
0.00	0.05	0.05	Satisfactory
2.81	2.93	0.12	Satisfactory
4.18	4.24	0.06	Satisfactory
7.76	7.81	0.05	Satisfactory

Tolerance limit of dissolved oxygen should be less than ±0.20 (mg/L)

(4) Conductivity at 25°C

Conc. of KCl (M)	Expected Reading (µS/cm)	Displayed Reading (µS/cm)	Tolerance (%)	Results
0.001	146.9	152.5	3.8	Satisfactory
0.01	1412	1424	0.8	Satisfactory
0.1	12890	12688	-1.6	Satisfactory
0.5	58670	57972	-1.2	Satisfactory
1.0	111900	109256	-2.4	Satisfactory

Tolerance limit of conductivity should be less than ±10.0 (%)

(5) Salinity

Expected Reading (g/L)	Displayed Reading (g/L)	Tolerance (%)	Results
10	9.98	-0.2	Satisfactory
20	20.17	0.9	Satisfactory
30	30.24	0.8	Satisfactory

Tolerance limit of salinity should be less than ±10.0 (%)

(6) Turbidity

Expected Reading (NTU)	Displayed Reading[f] (NTU)	Tolerance[g](%)	Results
0	0.5	--	--
10	10.3	3.0	Satisfactory
20	21.2	6.0	Satisfactory
100	100.8	0.8	Satisfactory
800	797.6	-0.3	Satisfactory

Tolerance limit of turbidity should be less than ±10.0 (%)

~ END OF REPORT ~

Remark(s): -

(f) "Displayed Reading" presents the figures shown on item under calibration/ checking regardless of equipment precision or significant figures.

(g) The "Tolerance Limit" mentioned is the acceptance criteria applicable for similar equipment used by Quality Pro Test-Consult Ltd. or quoted form relevant international standards.

專業化驗有限公司
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Report No. : AH080234
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Enovative Environmental Service Ltd.
Flat 2207, Yu Fun House,
Yu Chui Court, Shatin
New Territories, Hong Kong
Attn: Mr. Thomas WONG

PART B – DESCRIPTION

Name of Equipment	:	YSI 6920 v2 (Multi-Parameters)
Manufacturer	:	YSI (a xylem brand)
Serial Number	:	0001C6A7
Date of Received	:	Aug 20, 2018
Date of Calibration	:	Aug 20, 2018
Date of Next Calibration[a]	:	Nov 20, 2018

PART C – REFERENCE METHODS/ DOCUMENTS FOR THE CALIBRATION

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Temperature	Section 6 of international Accreditation New Zealand Technical Guide no. 3 Second edition March 2008: Working Thermometer Calibration Procedure.

PART D – CALIBRATION RESULTS[b,c]

(1) pH at 25°C

Target (pH unit)	Displayed Reading[d] (pH Unit)	Tolerance[e](pH Unit)	Results
4.00	4.05	0.05	Satisfactory
7.42	7.46	0.04	Satisfactory
10.01	10.04	0.03	Satisfactory

Tolerance of pH should be less than ±0.10 (pH unit)

(2) Temperature

Reading of Ref. thermometer (°C)	Displayed Reading (°C)	Tolerance (°C)	Results
17.0	17.2	0.2	Satisfactory
26.3	26.2	-0.1	Satisfactory
54.3	53.8	-0.5	Satisfactory

Tolerance limit of temperature should be less than ±2.0 (°C)

~ CONTINUED ON NEXT PAGE ~

Remark(s): -

[a] *The "Date of Next Calibration" is recommended according to best practice principals as practiced by QPT or quoted form relevant international standards.*
[b] *The results relate only to the calibrated equipment as received*
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[e] *The "Tolerance Limit" mentioned is the acceptance criteria applicable for similar equipment used by QPT or quoted form relevant international standards.*

APPROVED SIGNATORY: _____
LAM Ho-yee, Emma
Assistant Laboratory Manager

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REPORT OF EQUIPMENT PERFORMANCE CHECK/ CALIBRATION

Report No. : AH080234
Date of Issue : 21 August 2018

PART D – CALIBRATION RESULTS (Cont'd)

(3) Dissolved Oxygen

Expected Reading (mg/L)	Displayed Reading (mg/L)	Tolerance (mg/L)	Results
0.00	0.06	0.06	Satisfactory
2.81	2.92	0.11	Satisfactory
4.18	4.23	0.05	Satisfactory
7.76	7.80	0.04	Satisfactory

Tolerance limit of dissolved oxygen should be less than ±0.20 (mg/L)

(4) Conductivity at 25°C

Conc. of KCl (M)	Expected Reading (µS/cm)	Displayed Reading (µS/cm)	Tolerance (%)	Results
0.001	146.9	152.3	3.7	Satisfactory
0.01	1412	1427	1.1	Satisfactory
0.1	12890	12676	-1.7	Satisfactory
0.5	58670	57968	-1.2	Satisfactory
1.0	111900	108346	-3.2	Satisfactory

Tolerance limit of conductivity should be less than ±10.0 (%)

(5) Salinity

Expected Reading (g/L)	Displayed Reading (g/L)	Tolerance (%)	Results
10	9.98	-0.2	Satisfactory
20	19.97	-0.2	Satisfactory
30	30.10	0.3	Satisfactory

Tolerance limit of salinity should be less than ±10.0 (%)

(6) Turbidity

Expected Reading (NTU)	Displayed Reading[f] (NTU)	Tolerance[g](%)	Results
0	0.4	--	--
10	10.2	2.0	Satisfactory
20	20.3	1.5	Satisfactory
100	101.5	1.5	Satisfactory
800	821.7	2.7	Satisfactory

Tolerance limit of turbidity should be less than ±10.0 (%)

~ END OF REPORT ~

Remark(s): -

[f] "Displayed Reading" presents the figures shown on item under calibration/ checking regardless of equipment precision or significant figures.

[g] The "Tolerance Limit" mentioned is the acceptance criteria applicable for similar equipment used by Quality Pro Test-Consult Ltd. or quoted form relevant international standards.

Annex C

QA/QC Results of Laboratory Testing for Suspended Solids (Zone A of Phase 2)

CERTIFICATE OF ANALYSIS

Client	:	ENOVATIVE ENVIRONMENTAL SERVICE LTD	*Laboratory*	:	ALS Technichem (HK) Pty Ltd	*Page*	: 1 of 6
Contact	:	MR THOMAS WONG	*Contact*	:	Richard Fung	*Work Order*	: **HK1844007**
Address	:	FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	*Address*	:	11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong	*Amendment No.*	: 1
E-mail	:	Thomas.Wong@eno.com.hk	*E-mail*	:	richard.fung@alsglobal.com		
Telephone	:	----	*Telephone*	:	+852 2610 1044		
Facsimile	:	----	*Facsimile*	:	+852 2610 2021		
Project	:	PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	*Quote number*	:	HKE/1254/2018	*Date received*	: 21-Aug-2018
Order number	:	—				*Date of issue*	: 29-Aug-2018
C-O-C number	:	—				*No. of samples*	- *Received* : 96
Site	:	—					- *Analysed* : 96

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

Signatory	*Position*	*Authorised results for:*
Fung Lim Chee, Richard	**General Manager**	**Inorganics**

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1844007, Amendment 1 supersedes any previous reports with this reference. Testing period is from 21-Aug-2018 to 23-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1844007 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

Analytical Results

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
E1/Surface/Mid-Ebb	21-Aug-2018	HK1844007-001		3.6	----	----	----	----
E1/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-002		3.5	----	----	----	----
E1/Middle/Mid-Ebb	21-Aug-2018	HK1844007-003		3.6	----	----	----	----
E1/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-004		3.8	----	----	----	----
E1/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-005		4.8	----	----	----	----
E1/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-006		5.2	----	----	----	----
G1/Surface/Mid-Ebb	21-Aug-2018	HK1844007-007		2.6	----	----	----	----
G1/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-008		3.2	----	----	----	----
G1/Middle/Mid-Ebb	21-Aug-2018	HK1844007-009		3.0	----	----	----	----
G1/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-010		3.3	----	----	----	----
G1/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-011		3.0	----	----	----	----
G1/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-012		3.0	----	----	----	----
I3/Surface/Mid-Ebb	21-Aug-2018	HK1844007-013		4.6	----	----	----	----
I3/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-014		4.9	----	----	----	----
I3/Middle/Mid-Ebb	21-Aug-2018	HK1844007-015		4.9	----	----	----	----
I3/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-016		4.8	----	----	----	----
I3/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-017		5.1	----	----	----	----
I3/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-018		4.6	----	----	----	----
I4/Surface/Mid-Ebb	21-Aug-2018	HK1844007-019		4.7	----	----	----	----
I4/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-020		5.1	----	----	----	----
I4/Middle/Mid-Ebb	21-Aug-2018	HK1844007-021		6.0	----	----	----	----
I4/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-022		5.6	----	----	----	----
I4/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-023		5.7	----	----	----	----
I4/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-024		5.6	----	----	----	----
B1/Surface/Mid-Ebb	21-Aug-2018	HK1844007-025		2.7	----	----	----	----
B1/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-026		2.1	----	----	----	----
B1/Middle/Mid-Ebb	21-Aug-2018	HK1844007-027		3.6	----	----	----	----
B1/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-028		3.7	----	----	----	----
B1/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-029		4.2	----	----	----	----
B1/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-030		3.6	----	----	----	----
F1/Surface/Mid-Ebb	21-Aug-2018	HK1844007-031		1.4	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F1/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-032		1.5	----	----	----	----
F1/Middle/Mid-Ebb	21-Aug-2018	HK1844007-033		2.8	----	----	----	----
F1/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-034		3.6	----	----	----	----
F1/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-035		3.2	----	----	----	----
F1/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-036		3.5	----	----	----	----
C2/Surface/Mid-Ebb	21-Aug-2018	HK1844007-037		3.2	----	----	----	----
C2/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-038		3.4	----	----	----	----
C2/Middle/Mid-Ebb	21-Aug-2018	HK1844007-039		3.3	----	----	----	----
C2/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-040		3.1	----	----	----	----
C2/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-041		4.4	----	----	----	----
C2/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-042		5.2	----	----	----	----
C3/Surface/Mid-Ebb	21-Aug-2018	HK1844007-043		3.0	----	----	----	----
C3/Surface/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-044		3.1	----	----	----	----
C3/Middle/Mid-Ebb	21-Aug-2018	HK1844007-045		3.2	----	----	----	----
C3/Middle/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-046		3.0	----	----	----	----
C3/Bottom/Mid-Ebb	21-Aug-2018	HK1844007-047		3.7	----	----	----	----
C3/Bottom/Mid-Ebb Duplicate	21-Aug-2018	HK1844007-048		3.3	----	----	----	----
E1/Surface/Mid-Flood	21-Aug-2018	HK1844007-049		3.0	----	----	----	----
E1/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-050		2.4	----	----	----	----
E1/Middle/Mid-Flood	21-Aug-2018	HK1844007-051		3.8	----	----	----	----
E1/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-052		3.8	----	----	----	----
E1/Bottom/Mid-Flood	21-Aug-2018	HK1844007-053		4.1	----	----	----	----
E1/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-054		4.4	----	----	----	----
G1/Surface/Mid-Flood	21-Aug-2018	HK1844007-055		4.4	----	----	----	----
G1/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-056		3.9	----	----	----	----
G1/Middle/Mid-Flood	21-Aug-2018	HK1844007-057		4.4	----	----	----	----
G1/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-058		4.2	----	----	----	----
G1/Bottom/Mid-Flood	21-Aug-2018	HK1844007-059		5.2	----	----	----	----
G1/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-060		4.7	----	----	----	----
I3/Surface/Mid-Flood	21-Aug-2018	HK1844007-061		3.4	----	----	----	----
I3/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-062		4.0	----	----	----	----
I3/Middle/Mid-Flood	21-Aug-2018	HK1844007-063		3.8	----	----	----	----
I3/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-064		3.6	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
I3/Bottom/Mid-Flood	21-Aug-2018	HK1844007-065		**4.5**	----	----	----	----
I3/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-066		**4.3**	----	----	----	----
I4/Surface/Mid-Flood	21-Aug-2018	HK1844007-067		**4.1**	----	----	----	----
I4/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-068		**3.5**	----	----	----	----
I4/Middle/Mid-Flood	21-Aug-2018	HK1844007-069		**3.7**	----	----	----	----
I4/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-070		**3.8**	----	----	----	----
I4/Bottom/Mid-Flood	21-Aug-2018	HK1844007-071		**4.3**	----	----	----	----
I4/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-072		**4.2**	----	----	----	----
B1/Surface/Mid-Flood	21-Aug-2018	HK1844007-073		**6.3**	----	----	----	----
B1/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-074		**6.6**	----	----	----	----
B1/Middle/Mid-Flood	21-Aug-2018	HK1844007-075		**7.4**	----	----	----	----
B1/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-076		**7.9**	----	----	----	----
B1/Bottom/Mid-Flood	21-Aug-2018	HK1844007-077		**7.7**	----	----	----	----
B1/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-078		**7.6**	----	----	----	----
F1/Surface/Mid-Flood	21-Aug-2018	HK1844007-079		**1.7**	----	----	----	----
F1/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-080		**1.7**	----	----	----	----
F1/Middle/Mid-Flood	21-Aug-2018	HK1844007-081		**2.2**	----	----	----	----
F1/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-082		**3.0**	----	----	----	----
F1/Bottom/Mid-Flood	21-Aug-2018	HK1844007-083		**2.7**	----	----	----	----
F1/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-084		**2.1**	----	----	----	----
C2/Surface/Mid-Flood	21-Aug-2018	HK1844007-085		**2.7**	----	----	----	----
C2/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-086		**3.0**	----	----	----	----
C2/Middle/Mid-Flood	21-Aug-2018	HK1844007-087		**2.7**	----	----	----	----
C2/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-088		**2.7**	----	----	----	----
C2/Bottom/Mid-Flood	21-Aug-2018	HK1844007-089		**2.6**	----	----	----	----
C2/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-090		**2.3**	----	----	----	----
C3/Surface/Mid-Flood	21-Aug-2018	HK1844007-091		**3.7**	----	----	----	----
C3/Surface/Mid-Flood Duplicate	21-Aug-2018	HK1844007-092		**4.1**	----	----	----	----
C3/Middle/Mid-Flood	21-Aug-2018	HK1844007-093		**3.7**	----	----	----	----
C3/Middle/Mid-Flood Duplicate	21-Aug-2018	HK1844007-094		**3.7**	----	----	----	----
C3/Bottom/Mid-Flood	21-Aug-2018	HK1844007-095		**5.0**	----	----	----	----
C3/Bottom/Mid-Flood Duplicate	21-Aug-2018	HK1844007-096		**5.4**	----	----	----	----

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1890430)								
HK1844007-001	E1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.6	4.0	9.27
HK1844007-011	G1/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.0	2.6	13.6
EA/ED: Physical and Aggregate Properties (QC Lot: 1890431)								
HK1844007-021	I4/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.0	6.0	0.00
HK1844007-031	F1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	1.4	1.7	17.6
EA/ED: Physical and Aggregate Properties (QC Lot: 1890432)								
HK1844007-041	C2/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.8	8.70
HK1844007-051	E1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.8	3.4	11.3
EA/ED: Physical and Aggregate Properties (QC Lot: 1890434)								
HK1844007-061	I3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.4	3.5	0.00
HK1844007-071	I4/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.3	4.7	9.42
EA/ED: Physical and Aggregate Properties (QC Lot: 1890436)								
HK1844007-081	F1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.2	2.3	4.40
HK1844007-091	C3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.7	3.4	8.51

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1890430)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1890431)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1890432)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1890434)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	100	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1890436)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

CERTIFICATE OF ANALYSIS

Client	:	ENOVATIVE ENVIRONMENTAL SERVICE LTD	*Laboratory*	:	ALS Technichem (HK) Pty Ltd	*Page*	: 1 of 6
Contact	:	MR THOMAS WONG	*Contact*	:	Richard Fung	*Work Order*	: **HK1844015**
Address	:	FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	*Address*	:	11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong		
E-mail	:	Thomas.Wong@eno.com.hk	*E-mail*	:	richard.fung@alsglobal.com		
Telephone	:	----	*Telephone*	:	+852 2610 1044		
Facsimile	:	----	*Facsimile*	:	+852 2610 2021		
Project	:	PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	*Quote number*	:	HKE/1254/2018	*Date received*	: 24-Aug-2018
Order number	:	---				*Date of issue*	: 29-Aug-2018
C-O-C number	:	---				*No. of samples*	- *Received* : 96
Site	:	---					- *Analysed* : 96

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

Signatory	*Position*	*Authorised results for:*
Fung Lim Chee, Richard	**General Manager**	**Inorganics**

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1844015 supersedes any previous reports with this reference. Testing period is from 24-Aug-2018 to 29-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1844015 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

Analytical Results

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
E1/Surface/Mid-Ebb	24-Aug-2018	HK1844015-001		2.6	----	----	----	----
E1/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-002		2.8	----	----	----	----
E1/Middle/Mid-Ebb	24-Aug-2018	HK1844015-003		2.9	----	----	----	----
E1/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-004		2.7	----	----	----	----
E1/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-005		3.4	----	----	----	----
E1/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-006		3.2	----	----	----	----
G1/Surface/Mid-Ebb	24-Aug-2018	HK1844015-007		1.3	----	----	----	----
G1/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-008		1.5	----	----	----	----
G1/Middle/Mid-Ebb	24-Aug-2018	HK1844015-009		1.0	----	----	----	----
G1/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-010		1.4	----	----	----	----
G1/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-011		2.7	----	----	----	----
G1/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-012		2.8	----	----	----	----
I3/Surface/Mid-Ebb	24-Aug-2018	HK1844015-013		2.6	----	----	----	----
I3/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-014		2.8	----	----	----	----
I3/Middle/Mid-Ebb	24-Aug-2018	HK1844015-015		1.8	----	----	----	----
I3/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-016		1.5	----	----	----	----
I3/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-017		2.8	----	----	----	----
I3/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-018		2.9	----	----	----	----
I4/Surface/Mid-Ebb	24-Aug-2018	HK1844015-019		2.6	----	----	----	----
I4/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-020		2.6	----	----	----	----
I4/Middle/Mid-Ebb	24-Aug-2018	HK1844015-021		2.8	----	----	----	----
I4/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-022		3.3	----	----	----	----
I4/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-023		3.4	----	----	----	----
I4/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-024		2.9	----	----	----	----
B1/Surface/Mid-Ebb	24-Aug-2018	HK1844015-025		2.6	----	----	----	----
B1/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-026		2.5	----	----	----	----
B1/Middle/Mid-Ebb	24-Aug-2018	HK1844015-027		2.9	----	----	----	----
B1/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-028		3.0	----	----	----	----
B1/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-029		4.0	----	----	----	----
B1/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-030		4.1	----	----	----	----
F1/Surface/Mid-Ebb	24-Aug-2018	HK1844015-031		3.9	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F1/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-032		4.2	----	----	----	----
F1/Middle/Mid-Ebb	24-Aug-2018	HK1844015-033		4.2	----	----	----	----
F1/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-034		3.9	----	----	----	----
F1/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-035		5.5	----	----	----	----
F1/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-036		5.2	----	----	----	----
C2/Surface/Mid-Ebb	24-Aug-2018	HK1844015-037		3.1	----	----	----	----
C2/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-038		3.5	----	----	----	----
C2/Middle/Mid-Ebb	24-Aug-2018	HK1844015-039		4.4	----	----	----	----
C2/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-040		4.2	----	----	----	----
C2/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-041		5.0	----	----	----	----
C2/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-042		5.6	----	----	----	----
C3/Surface/Mid-Ebb	24-Aug-2018	HK1844015-043		2.5	----	----	----	----
C3/Surface/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-044		2.3	----	----	----	----
C3/Middle/Mid-Ebb	24-Aug-2018	HK1844015-045		3.6	----	----	----	----
C3/Middle/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-046		3.2	----	----	----	----
C3/Bottom/Mid-Ebb	24-Aug-2018	HK1844015-047		5.0	----	----	----	----
C3/Bottom/Mid-Ebb Duplicate	24-Aug-2018	HK1844015-048		4.7	----	----	----	----
E1/Surface/Mid-Flood	24-Aug-2018	HK1844015-049		4.8	----	----	----	----
E1/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-050		4.9	----	----	----	----
E1/Middle/Mid-Flood	24-Aug-2018	HK1844015-051		4.8	----	----	----	----
E1/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-052		5.4	----	----	----	----
E1/Bottom/Mid-Flood	24-Aug-2018	HK1844015-053		6.3	----	----	----	----
E1/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-054		5.4	----	----	----	----
G1/Surface/Mid-Flood	24-Aug-2018	HK1844015-055		2.1	----	----	----	----
G1/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-056		2.6	----	----	----	----
G1/Middle/Mid-Flood	24-Aug-2018	HK1844015-057		2.8	----	----	----	----
G1/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-058		2.9	----	----	----	----
G1/Bottom/Mid-Flood	24-Aug-2018	HK1844015-059		4.3	----	----	----	----
G1/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-060		4.5	----	----	----	----
I3/Surface/Mid-Flood	24-Aug-2018	HK1844015-061		2.6	----	----	----	----
I3/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-062		2.8	----	----	----	----
I3/Middle/Mid-Flood	24-Aug-2018	HK1844015-063		4.4	----	----	----	----
I3/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-064		4.1	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
I3/Bottom/Mid-Flood	24-Aug-2018	HK1844015-065		4.3	----	----	----	----
I3/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-066		4.5	----	----	----	----
I4/Surface/Mid-Flood	24-Aug-2018	HK1844015-067		3.3	----	----	----	----
I4/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-068		2.9	----	----	----	----
I4/Middle/Mid-Flood	24-Aug-2018	HK1844015-069		2.7	----	----	----	----
I4/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-070		3.3	----	----	----	----
I4/Bottom/Mid-Flood	24-Aug-2018	HK1844015-071		4.2	----	----	----	----
I4/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-072		4.7	----	----	----	----
B1/Surface/Mid-Flood	24-Aug-2018	HK1844015-073		2.7	----	----	----	----
B1/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-074		2.5	----	----	----	----
B1/Middle/Mid-Flood	24-Aug-2018	HK1844015-075		3.4	----	----	----	----
B1/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-076		3.3	----	----	----	----
B1/Bottom/Mid-Flood	24-Aug-2018	HK1844015-077		4.7	----	----	----	----
B1/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-078		4.9	----	----	----	----
F1/Surface/Mid-Flood	24-Aug-2018	HK1844015-079		2.7	----	----	----	----
F1/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-080		3.1	----	----	----	----
F1/Middle/Mid-Flood	24-Aug-2018	HK1844015-081		2.6	----	----	----	----
F1/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-082		3.1	----	----	----	----
F1/Bottom/Mid-Flood	24-Aug-2018	HK1844015-083		3.8	----	----	----	----
F1/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-084		3.5	----	----	----	----
C2/Surface/Mid-Flood	24-Aug-2018	HK1844015-085		4.1	----	----	----	----
C2/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-086		4.3	----	----	----	----
C2/Middle/Mid-Flood	24-Aug-2018	HK1844015-087		4.0	----	----	----	----
C2/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-088		3.8	----	----	----	----
C2/Bottom/Mid-Flood	24-Aug-2018	HK1844015-089		6.7	----	----	----	----
C2/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-090		7.4	----	----	----	----
C3/Surface/Mid-Flood	24-Aug-2018	HK1844015-091		4.4	----	----	----	----
C3/Surface/Mid-Flood Duplicate	24-Aug-2018	HK1844015-092		5.2	----	----	----	----
C3/Middle/Mid-Flood	24-Aug-2018	HK1844015-093		5.5	----	----	----	----
C3/Middle/Mid-Flood Duplicate	24-Aug-2018	HK1844015-094		5.6	----	----	----	----
C3/Bottom/Mid-Flood	24-Aug-2018	HK1844015-095		5.4	----	----	----	----
C3/Bottom/Mid-Flood Duplicate	24-Aug-2018	HK1844015-096		5.6	----	----	----	----

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1900256)								
HK1844015-001	E1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.6	3.0	11.6
HK1844015-011	G1/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.7	2.8	4.48
EA/ED: Physical and Aggregate Properties (QC Lot: 1900257)								
HK1844015-021	I4/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.8	3.1	12.0
HK1844015-031	F1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.9	3.6	6.67
EA/ED: Physical and Aggregate Properties (QC Lot: 1900258)								
HK1844015-041	C2/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.0	5.4	5.77
HK1844015-051	E1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.8	5.1	5.54
EA/ED: Physical and Aggregate Properties (QC Lot: 1900259)								
HK1844015-061	I3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.6	2.5	3.92
HK1844015-071	I4/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.2	4.4	3.51
EA/ED: Physical and Aggregate Properties (QC Lot: 1900260)								
HK1844015-081	F1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.6	2.6	0.00
HK1844015-091	C3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.1	5.31

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1900256)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1900257)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	99.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1900258)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1900259)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1900260)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	101	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

CERTIFICATE OF ANALYSIS

Client	:	ENOVATIVE ENVIRONMENTAL SERVICE LTD	*Laboratory*	:	ALS Technichem (HK) Pty Ltd	*Page*	: 1 of 6
Contact	:	MR THOMAS WONG	*Contact*	:	Richard Fung	*Work Order*	: **HK1844016**
Address	:	FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	*Address*	:	11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong		
E-mail	:	Thomas.Wong@eno.com.hk	*E-mail*	:	richard.fung@alsglobal.com		
Telephone	:	----	*Telephone*	:	+852 2610 1044		
Facsimile	:	----	*Facsimile*	:	+852 2610 2021		
Project	:	PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	*Quote number*	:	HKE/1254/2018	*Date received*	: 26-Aug-2018
Order number	:	---				*Date of issue*	: 29-Aug-2018
C-O-C number	:	---				*No. of samples*	- *Received* : 96
Site	:	---					- *Analysed* : 96

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

Signatory	*Position*	*Authorised results for:*
Fung Lim Chee, Richard	**General Manager**	**Inorganics**

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1844016 supersedes any previous reports with this reference. Testing period is from 26-Aug-2018 to 29-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1844016 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

Analytical Results

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
E1/Surface/Mid-Ebb	26-Aug-2018	HK1844016-001		4.3	----	----	----	----
E1/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-002		4.5	----	----	----	----
E1/Middle/Mid-Ebb	26-Aug-2018	HK1844016-003		5.1	----	----	----	----
E1/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-004		5.8	----	----	----	----
E1/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-005		5.5	----	----	----	----
E1/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-006		6.3	----	----	----	----
G1/Surface/Mid-Ebb	26-Aug-2018	HK1844016-007		3.0	----	----	----	----
G1/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-008		3.4	----	----	----	----
G1/Middle/Mid-Ebb	26-Aug-2018	HK1844016-009		5.0	----	----	----	----
G1/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-010		4.6	----	----	----	----
G1/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-011		4.7	----	----	----	----
G1/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-012		5.2	----	----	----	----
I3/Surface/Mid-Ebb	26-Aug-2018	HK1844016-013		3.1	----	----	----	----
I3/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-014		3.3	----	----	----	----
I3/Middle/Mid-Ebb	26-Aug-2018	HK1844016-015		4.4	----	----	----	----
I3/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-016		5.0	----	----	----	----
I3/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-017		4.7	----	----	----	----
I3/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-018		4.6	----	----	----	----
I4/Surface/Mid-Ebb	26-Aug-2018	HK1844016-019		4.3	----	----	----	----
I4/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-020		4.6	----	----	----	----
I4/Middle/Mid-Ebb	26-Aug-2018	HK1844016-021		5.7	----	----	----	----
I4/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-022		6.2	----	----	----	----
I4/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-023		7.5	----	----	----	----
I4/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-024		8.1	----	----	----	----
B1/Surface/Mid-Ebb	26-Aug-2018	HK1844016-025		6.4	----	----	----	----
B1/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-026		6.5	----	----	----	----
B1/Middle/Mid-Ebb	26-Aug-2018	HK1844016-027		5.9	----	----	----	----
B1/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-028		5.7	----	----	----	----
B1/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-029		7.2	----	----	----	----
B1/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-030		7.0	----	----	----	----
F1/Surface/Mid-Ebb	26-Aug-2018	HK1844016-031		4.6	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F1/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-032		**4.7**	----	----	----	----
F1/Middle/Mid-Ebb	26-Aug-2018	HK1844016-033		**5.0**	----	----	----	----
F1/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-034		**4.9**	----	----	----	----
F1/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-035		**7.4**	----	----	----	----
F1/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-036		**7.2**	----	----	----	----
C2/Surface/Mid-Ebb	26-Aug-2018	HK1844016-037		**5.6**	----	----	----	----
C2/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-038		**5.8**	----	----	----	----
C2/Middle/Mid-Ebb	26-Aug-2018	HK1844016-039		**5.5**	----	----	----	----
C2/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-040		**5.5**	----	----	----	----
C2/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-041		**6.1**	----	----	----	----
C2/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-042		**6.1**	----	----	----	----
C3/Surface/Mid-Ebb	26-Aug-2018	HK1844016-043		**4.3**	----	----	----	----
C3/Surface/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-044		**4.5**	----	----	----	----
C3/Middle/Mid-Ebb	26-Aug-2018	HK1844016-045		**4.4**	----	----	----	----
C3/Middle/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-046		**4.7**	----	----	----	----
C3/Bottom/Mid-Ebb	26-Aug-2018	HK1844016-047		**7.1**	----	----	----	----
C3/Bottom/Mid-Ebb Duplicate	26-Aug-2018	HK1844016-048		**6.7**	----	----	----	----
E1/Surface/Mid-Flood	26-Aug-2018	HK1844016-049		**5.1**	----	----	----	----
E1/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-050		**4.3**	----	----	----	----
E1/Middle/Mid-Flood	26-Aug-2018	HK1844016-051		**5.2**	----	----	----	----
E1/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-052		**5.0**	----	----	----	----
E1/Bottom/Mid-Flood	26-Aug-2018	HK1844016-053		**5.6**	----	----	----	----
E1/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-054		**5.7**	----	----	----	----
G1/Surface/Mid-Flood	26-Aug-2018	HK1844016-055		**4.2**	----	----	----	----
G1/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-056		**4.0**	----	----	----	----
G1/Middle/Mid-Flood	26-Aug-2018	HK1844016-057		**5.7**	----	----	----	----
G1/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-058		**6.1**	----	----	----	----
G1/Bottom/Mid-Flood	26-Aug-2018	HK1844016-059		**6.8**	----	----	----	----
G1/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-060		**7.2**	----	----	----	----
I3/Surface/Mid-Flood	26-Aug-2018	HK1844016-061		**2.8**	----	----	----	----
I3/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-062		**2.7**	----	----	----	----
I3/Middle/Mid-Flood	26-Aug-2018	HK1844016-063		**3.3**	----	----	----	----
I3/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-064		**4.1**	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
I3/Bottom/Mid-Flood	26-Aug-2018	HK1844016-065		**4.3**	----	----	----	----
I3/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-066		**3.9**	----	----	----	----
I4/Surface/Mid-Flood	26-Aug-2018	HK1844016-067		**3.9**	----	----	----	----
I4/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-068		**4.2**	----	----	----	----
I4/Middle/Mid-Flood	26-Aug-2018	HK1844016-069		**4.2**	----	----	----	----
I4/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-070		**3.7**	----	----	----	----
I4/Bottom/Mid-Flood	26-Aug-2018	HK1844016-071		**4.4**	----	----	----	----
I4/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-072		**4.1**	----	----	----	----
B1/Surface/Mid-Flood	26-Aug-2018	HK1844016-073		**2.6**	----	----	----	----
B1/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-074		**3.3**	----	----	----	----
B1/Middle/Mid-Flood	26-Aug-2018	HK1844016-075		**4.3**	----	----	----	----
B1/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-076		**4.4**	----	----	----	----
B1/Bottom/Mid-Flood	26-Aug-2018	HK1844016-077		**5.4**	----	----	----	----
B1/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-078		**5.7**	----	----	----	----
F1/Surface/Mid-Flood	26-Aug-2018	HK1844016-079		**3.7**	----	----	----	----
F1/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-080		**3.9**	----	----	----	----
F1/Middle/Mid-Flood	26-Aug-2018	HK1844016-081		**3.8**	----	----	----	----
F1/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-082		**4.4**	----	----	----	----
F1/Bottom/Mid-Flood	26-Aug-2018	HK1844016-083		**4.9**	----	----	----	----
F1/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-084		**5.2**	----	----	----	----
C2/Surface/Mid-Flood	26-Aug-2018	HK1844016-085		**3.6**	----	----	----	----
C2/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-086		**4.3**	----	----	----	----
C2/Middle/Mid-Flood	26-Aug-2018	HK1844016-087		**4.9**	----	----	----	----
C2/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-088		**5.4**	----	----	----	----
C2/Bottom/Mid-Flood	26-Aug-2018	HK1844016-089		**5.3**	----	----	----	----
C2/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-090		**5.0**	----	----	----	----
C3/Surface/Mid-Flood	26-Aug-2018	HK1844016-091		**5.0**	----	----	----	----
C3/Surface/Mid-Flood Duplicate	26-Aug-2018	HK1844016-092		**5.5**	----	----	----	----
C3/Middle/Mid-Flood	26-Aug-2018	HK1844016-093		**5.7**	----	----	----	----
C3/Middle/Mid-Flood Duplicate	26-Aug-2018	HK1844016-094		**6.0**	----	----	----	----
C3/Bottom/Mid-Flood	26-Aug-2018	HK1844016-095		**7.2**	----	----	----	----
C3/Bottom/Mid-Flood Duplicate	26-Aug-2018	HK1844016-096		**7.5**	----	----	----	----

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1901494)								
HK1844016-001	E1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.3	4.6	6.20
HK1844016-011	G1/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.7	5.1	8.70
EA/ED: Physical and Aggregate Properties (QC Lot: 1901495)								
HK1844016-021	I4/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.7	6.0	5.13
HK1844016-031	F1/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.6	5.0	8.33
EA/ED: Physical and Aggregate Properties (QC Lot: 1901496)								
HK1844016-041	C2/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.1	6.4	4.82
HK1844016-051	E1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.2	4.8	7.04
EA/ED: Physical and Aggregate Properties (QC Lot: 1901497)								
HK1844016-061	I3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.8	3.1	9.36
HK1844016-071	I4/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.5	3.37
EA/ED: Physical and Aggregate Properties (QC Lot: 1901498)								
HK1844016-081	F1/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.8	4.2	7.50
HK1844016-091	C3/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.0	4.6	7.93

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1901494)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	101	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1901495)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	99.0	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1901496)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1901497)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.0	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1901498)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	100	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

Annex D

QA/QC Results of Laboratory Testing for Suspended Solids (Zone B of Phase 2)

CERTIFICATE OF ANALYSIS

Client	:	ENOVATIVE ENVIRONMENTAL SERVICE LTD	*Laboratory*	:	ALS Technichem (HK) Pty Ltd	*Page*	: 1 of 9
Contact	:	MR THOMAS WONG	*Contact*	:	Richard Fung	*Work Order*	: **HK1844012**
Address	:	FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	*Address*	:	11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong	*Amendment No.*	: 1
E-mail	:	Thomas.Wong@eno.com.hk	*E-mail*	:	richard.fung@alsglobal.com		
Telephone	:	----	*Telephone*	:	+852 2610 1044		
Facsimile	:	----	*Facsimile*	:	+852 2610 2021		
Project	:	PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	*Quote number*	:	HKE/1254/2018	*Date received*	: 22-Aug-2018
Order number	:	---				*Date of issue*	: 29-Aug-2018
C-O-C number	:	---				*No. of samples*	- *Received* : 132
Site	:	---					- *Analysed* : 132

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

Signatory	*Position*	*Authorised results for:*
Fung Lim Chee, Richard	**General Manager**	**Inorganics**

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1844012, Amendment 1 supersedes any previous reports with this reference. Testing period is from 22-Aug-2018 to 27-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1844012 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

Analytical Results

Sub-Matrix: MARINE WATER			Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
Client sample ID	Client sampling date / time	Laboratory sample ID		EA/ED: Physical and Aggregate Properties	----	----	----	----
C6/Surface/Mid-Ebb	22-Aug-2018	HK1844012-001		4.3	----	----	----	----
C6/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-002		4.9	----	----	----	----
C6/Middle/Mid-Ebb	22-Aug-2018	HK1844012-003		5.7	----	----	----	----
C6/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-004		6.0	----	----	----	----
C6/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-005		6.4	----	----	----	----
C6/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-006		6.6	----	----	----	----
C7/Surface/Mid-Ebb	22-Aug-2018	HK1844012-007		4.3	----	----	----	----
C7/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-008		4.2	----	----	----	----
C7/Middle/Mid-Ebb	22-Aug-2018	HK1844012-009		4.8	----	----	----	----
C7/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-010		5.2	----	----	----	----
C7/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-011		5.0	----	----	----	----
C7/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-012		4.3	----	----	----	----
C8/Surface/Mid-Ebb	22-Aug-2018	HK1844012-013		3.5	----	----	----	----
C8/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-014		3.9	----	----	----	----
C8/Middle/Mid-Ebb	22-Aug-2018	HK1844012-015		4.4	----	----	----	----
C8/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-016		4.0	----	----	----	----
C8/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-017		6.3	----	----	----	----
C8/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-018		6.5	----	----	----	----
C9/Surface/Mid-Ebb	22-Aug-2018	HK1844012-019		5.4	----	----	----	----
C9/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-020		5.3	----	----	----	----
C9/Middle/Mid-Ebb	22-Aug-2018	HK1844012-021		5.5	----	----	----	----
C9/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-022		4.8	----	----	----	----
C9/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-023		6.1	----	----	----	----
C9/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-024		5.7	----	----	----	----
C11/Surface/Mid-Ebb	22-Aug-2018	HK1844012-025		5.0	----	----	----	----
C11/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-026		6.0	----	----	----	----
C11/Middle/Mid-Ebb	22-Aug-2018	HK1844012-027		6.1	----	----	----	----
C11/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-028		6.0	----	----	----	----
C11/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-029		6.7	----	----	----	----
C11/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-030		6.9	----	----	----	----
C13/Surface/Mid-Ebb	22-Aug-2018	HK1844012-031		5.6	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound: EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit: 0.5 mg/L	----	----	----	----
			EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-032	6.1	----	----	----	----
C13/Middle/Mid-Ebb	22-Aug-2018	HK1844012-033	6.6	----	----	----	----
C13/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-034	6.5	----	----	----	----
C13/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-035	8.8	----	----	----	----
C13/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-036	9.3	----	----	----	----
M3/Surface/Mid-Ebb	22-Aug-2018	HK1844012-037	5.2	----	----	----	----
M3/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-038	4.5	----	----	----	----
M3/Middle/Mid-Ebb	22-Aug-2018	HK1844012-039	5.0	----	----	----	----
M3/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-040	5.5	----	----	----	----
M3/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-041	5.6	----	----	----	----
M3/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-042	6.6	----	----	----	----
G2/Surface/Mid-Ebb	22-Aug-2018	HK1844012-043	3.2	----	----	----	----
G2/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-044	3.4	----	----	----	----
G2/Middle/Mid-Ebb	22-Aug-2018	HK1844012-045	4.8	----	----	----	----
G2/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-046	5.1	----	----	----	----
G2/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-047	4.8	----	----	----	----
G2/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-048	4.5	----	----	----	----
G3/Surface/Mid-Ebb	22-Aug-2018	HK1844012-049	5.0	----	----	----	----
G3/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-050	4.3	----	----	----	----
G3/Middle/Mid-Ebb	22-Aug-2018	HK1844012-051	5.9	----	----	----	----
G3/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-052	6.1	----	----	----	----
G3/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-053	6.4	----	----	----	----
G3/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-054	6.2	----	----	----	----
E2/Surface/Mid-Ebb	22-Aug-2018	HK1844012-055	4.0	----	----	----	----
E2/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-056	4.6	----	----	----	----
E2/Middle/Mid-Ebb	22-Aug-2018	HK1844012-057	5.2	----	----	----	----
E2/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-058	4.9	----	----	----	----
E2/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-059	6.1	----	----	----	----
E2/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-060	5.9	----	----	----	----
F2/Surface/Mid-Ebb	22-Aug-2018	HK1844012-061	4.5	----	----	----	----
F2/Surface/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-062	5.2	----	----	----	----
F2/Middle/Mid-Ebb	22-Aug-2018	HK1844012-063	5.0	----	----	----	----
F2/Middle/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-064	5.1	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Ebb	22-Aug-2018	HK1844012-065		**7.2**	----	----	----	----
F2/Bottom/Mid-Ebb Duplicate	22-Aug-2018	HK1844012-066		**6.9**	----	----	----	----
C6/Surface/Mid-Flood	22-Aug-2018	HK1844012-067		**5.1**	----	----	----	----
C6/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-068		**6.3**	----	----	----	----
C6/Middle/Mid-Flood	22-Aug-2018	HK1844012-069		**6.5**	----	----	----	----
C6/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-070		**6.8**	----	----	----	----
C6/Bottom/Mid-Flood	22-Aug-2018	HK1844012-071		**7.3**	----	----	----	----
C6/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-072		**7.1**	----	----	----	----
C7/Surface/Mid-Flood	22-Aug-2018	HK1844012-073		**5.8**	----	----	----	----
C7/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-074		**5.4**	----	----	----	----
C7/Middle/Mid-Flood	22-Aug-2018	HK1844012-075		**6.3**	----	----	----	----
C7/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-076		**5.5**	----	----	----	----
C7/Bottom/Mid-Flood	22-Aug-2018	HK1844012-077		**6.6**	----	----	----	----
C7/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-078		**6.2**	----	----	----	----
C8/Surface/Mid-Flood	22-Aug-2018	HK1844012-079		**6.1**	----	----	----	----
C8/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-080		**5.7**	----	----	----	----
C8/Middle/Mid-Flood	22-Aug-2018	HK1844012-081		**6.2**	----	----	----	----
C8/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-082		**5.7**	----	----	----	----
C8/Bottom/Mid-Flood	22-Aug-2018	HK1844012-083		**6.7**	----	----	----	----
C8/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-084		**6.6**	----	----	----	----
C9/Surface/Mid-Flood	22-Aug-2018	HK1844012-085		**3.2**	----	----	----	----
C9/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-086		**3.7**	----	----	----	----
C9/Middle/Mid-Flood	22-Aug-2018	HK1844012-087		**4.0**	----	----	----	----
C9/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-088		**3.6**	----	----	----	----
C9/Bottom/Mid-Flood	22-Aug-2018	HK1844012-089		**5.2**	----	----	----	----
C9/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-090		**4.6**	----	----	----	----
C11/Surface/Mid-Flood	22-Aug-2018	HK1844012-091		**3.6**	----	----	----	----
C11/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-092		**4.0**	----	----	----	----
C11/Middle/Mid-Flood	22-Aug-2018	HK1844012-093		**5.5**	----	----	----	----
C11/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-094		**5.3**	----	----	----	----
C11/Bottom/Mid-Flood	22-Aug-2018	HK1844012-095		**6.4**	----	----	----	----
C11/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-096		**6.0**	----	----	----	----
C13/Surface/Mid-Flood	22-Aug-2018	HK1844012-097		**3.5**	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-098		**3.6**	----	----	----	----
C13/Middle/Mid-Flood	22-Aug-2018	HK1844012-099		**3.2**	----	----	----	----
C13/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-100		**3.8**	----	----	----	----
C13/Bottom/Mid-Flood	22-Aug-2018	HK1844012-101		**4.2**	----	----	----	----
C13/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-102		**4.3**	----	----	----	----
M3/Surface/Mid-Flood	22-Aug-2018	HK1844012-103		**3.6**	----	----	----	----
M3/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-104		**4.4**	----	----	----	----
M3/Middle/Mid-Flood	22-Aug-2018	HK1844012-105		**5.1**	----	----	----	----
M3/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-106		**5.9**	----	----	----	----
M3/Bottom/Mid-Flood	22-Aug-2018	HK1844012-107		**6.4**	----	----	----	----
M3/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-108		**7.0**	----	----	----	----
G2/Surface/Mid-Flood	22-Aug-2018	HK1844012-109		**3.3**	----	----	----	----
G2/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-110		**4.1**	----	----	----	----
G2/Middle/Mid-Flood	22-Aug-2018	HK1844012-111		**5.3**	----	----	----	----
G2/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-112		**5.4**	----	----	----	----
G2/Bottom/Mid-Flood	22-Aug-2018	HK1844012-113		**6.0**	----	----	----	----
G2/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-114		**5.9**	----	----	----	----
G3/Surface/Mid-Flood	22-Aug-2018	HK1844012-115		**4.9**	----	----	----	----
G3/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-116		**5.2**	----	----	----	----
G3/Middle/Mid-Flood	22-Aug-2018	HK1844012-117		**5.7**	----	----	----	----
G3/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-118		**6.0**	----	----	----	----
G3/Bottom/Mid-Flood	22-Aug-2018	HK1844012-119		**6.2**	----	----	----	----
G3/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-120		**7.0**	----	----	----	----
E2/Surface/Mid-Flood	22-Aug-2018	HK1844012-121		**4.4**	----	----	----	----
E2/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-122		**4.9**	----	----	----	----
E2/Middle/Mid-Flood	22-Aug-2018	HK1844012-123		**5.8**	----	----	----	----
E2/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-124		**6.2**	----	----	----	----
E2/Bottom/Mid-Flood	22-Aug-2018	HK1844012-125		**8.3**	----	----	----	----
E2/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-126		**8.5**	----	----	----	----
F2/Surface/Mid-Flood	22-Aug-2018	HK1844012-127		**6.1**	----	----	----	----
F2/Surface/Mid-Flood Duplicate	22-Aug-2018	HK1844012-128		**6.4**	----	----	----	----
F2/Middle/Mid-Flood	22-Aug-2018	HK1844012-129		**7.1**	----	----	----	----
F2/Middle/Mid-Flood Duplicate	22-Aug-2018	HK1844012-130		**6.8**	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	**----**	**----**	**----**	**----**
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Flood	22-Aug-2018	HK1844012-131		**7.7**	**----**	**----**	**----**	**----**
F2/Bottom/Mid-Flood Duplicate	22-Aug-2018	HK1844012-132		**7.8**	**----**	**----**	**----**	**----**

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1893626)								
HK1844012-001	C6/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.3	4.2	2.34
HK1844012-011	C7/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.0	5.0	0.00
EA/ED: Physical and Aggregate Properties (QC Lot: 1893627)								
HK1844012-021	C9/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.5	5.6	2.25
HK1844012-031	C13/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.6	5.6	0.00
EA/ED: Physical and Aggregate Properties (QC Lot: 1893628)								
HK1844012-041	M3/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.6	6.0	7.31
HK1844012-051	G3/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.9	5.6	5.24
EA/ED: Physical and Aggregate Properties (QC Lot: 1893629)								
HK1844012-061	F2/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.5	4.4	0.00
HK1844012-071	C6/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	7.3	7.0	3.84
EA/ED: Physical and Aggregate Properties (QC Lot: 1893630)								
HK1844012-081	C8/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.2	5.8	6.72
HK1844012-091	C11/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.6	4.4	17.5
EA/ED: Physical and Aggregate Properties (QC Lot: 1893631)								
HK1844012-101	C13/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.2	3.8	7.50
HK1844012-111	G2/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.3	5.5	2.78
EA/ED: Physical and Aggregate Properties (QC Lot: 1893632)								
HK1844012-121	E2/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.6	4.99
HK1844012-131	F2/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	7.7	8.0	2.87

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1893626)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	100	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893627)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	99.0	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893628)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	101	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893629)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893630)											

Matrix: **WATER**

		Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1893630) - continued											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893631)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1893632)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	101	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

CERTIFICATE OF ANALYSIS

Client	: ENOVATIVE ENVIRONMENTAL SERVICE LTD	Laboratory	: ALS Technichem (HK) Pty Ltd	Page	: 1 of 9		
Contact	: MR THOMAS WONG	Contact	: Richard Fung	Work Order	: HK1844017		
Address	: FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	Address	: 11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong				
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Project	: PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	Quote number	: HKE/1254/2018	Date received	: 25-Aug-2018		
Order number	: —			Date of issue	: 30-Aug-2018		
C-O-C number	: —			No. of samples	- Received	:	132
Site	: —				- Analysed	:	132

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

Signatory	Position	Authorised results for:
Fung Lim Chee, Richard	General Manager	Inorganics

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1844017 supersedes any previous reports with this reference. Testing period is from 25-Aug-2018 to 30-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1844017 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

The accredited LOR of Total Suspended Solids is 0.5mg/L when 2 Litres sample was used. Due to insufficient sample, the results below 2mg/L and the decimal value of the results reported are for reference only.

Analytical Results

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C6/Surface/Mid-Ebb	25-Aug-2018	HK1844017-001		3.4	----	----	----	----
C6/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-002		4.0	----	----	----	----
C6/Middle/Mid-Ebb	25-Aug-2018	HK1844017-003		4.1	----	----	----	----
C6/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-004		4.2	----	----	----	----
C6/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-005		4.1	----	----	----	----
C6/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-006		4.4	----	----	----	----
C7/Surface/Mid-Ebb	25-Aug-2018	HK1844017-007		2.4	----	----	----	----
C7/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-008		2.9	----	----	----	----
C7/Middle/Mid-Ebb	25-Aug-2018	HK1844017-009		2.6	----	----	----	----
C7/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-010		2.5	----	----	----	----
C7/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-011		3.9	----	----	----	----
C7/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-012		4.3	----	----	----	----
C8/Surface/Mid-Ebb	25-Aug-2018	HK1844017-013		3.7	----	----	----	----
C8/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-014		4.1	----	----	----	----
C8/Middle/Mid-Ebb	25-Aug-2018	HK1844017-015		3.9	----	----	----	----
C8/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-016		4.4	----	----	----	----
C8/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-017		6.3	----	----	----	----
C8/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-018		6.0	----	----	----	----
C9/Surface/Mid-Ebb	25-Aug-2018	HK1844017-019		4.9	----	----	----	----
C9/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-020		5.2	----	----	----	----
C9/Middle/Mid-Ebb	25-Aug-2018	HK1844017-021		5.1	----	----	----	----
C9/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-022		5.6	----	----	----	----
C9/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-023		6.0	----	----	----	----
C9/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-024		6.6	----	----	----	----
C11/Surface/Mid-Ebb	25-Aug-2018	HK1844017-025		4.6	----	----	----	----
C11/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-026		5.2	----	----	----	----
C11/Middle/Mid-Ebb	25-Aug-2018	HK1844017-027		5.2	----	----	----	----
C11/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-028		5.0	----	----	----	----
C11/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-029		5.9	----	----	----	----
C11/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-030		6.3	----	----	----	----
C13/Surface/Mid-Ebb	25-Aug-2018	HK1844017-031		5.4	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	**----**	**----**	**----**	**----**
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-032		**5.9**	----	----	----	----
C13/Middle/Mid-Ebb	25-Aug-2018	HK1844017-033		**4.9**	----	----	----	----
C13/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-034		**5.0**	----	----	----	----
C13/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-035		**5.1**	----	----	----	----
C13/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-036		**5.4**	----	----	----	----
M3/Surface/Mid-Ebb	25-Aug-2018	HK1844017-037		**4.9**	----	----	----	----
M3/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-038		**5.4**	----	----	----	----
M3/Middle/Mid-Ebb	25-Aug-2018	HK1844017-039		**6.6**	----	----	----	----
M3/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-040		**6.0**	----	----	----	----
M3/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-041		**7.3**	----	----	----	----
M3/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-042		**7.0**	----	----	----	----
G2/Surface/Mid-Ebb	25-Aug-2018	HK1844017-043		**4.3**	----	----	----	----
G2/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-044		**4.1**	----	----	----	----
G2/Middle/Mid-Ebb	25-Aug-2018	HK1844017-045		**5.8**	----	----	----	----
G2/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-046		**6.2**	----	----	----	----
G2/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-047		**6.7**	----	----	----	----
G2/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-048		**7.0**	----	----	----	----
G3/Surface/Mid-Ebb	25-Aug-2018	HK1844017-049		**4.8**	----	----	----	----
G3/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-050		**4.6**	----	----	----	----
G3/Middle/Mid-Ebb	25-Aug-2018	HK1844017-051		**5.6**	----	----	----	----
G3/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-052		**6.3**	----	----	----	----
G3/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-053		**6.1**	----	----	----	----
G3/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-054		**5.7**	----	----	----	----
E2/Surface/Mid-Ebb	25-Aug-2018	HK1844017-055		**3.9**	----	----	----	----
E2/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-056		**4.3**	----	----	----	----
E2/Middle/Mid-Ebb	25-Aug-2018	HK1844017-057		**5.4**	----	----	----	----
E2/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-058		**5.3**	----	----	----	----
E2/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-059		**6.2**	----	----	----	----
E2/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-060		**6.1**	----	----	----	----
F2/Surface/Mid-Ebb	25-Aug-2018	HK1844017-061		**3.6**	----	----	----	----
F2/Surface/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-062		**4.2**	----	----	----	----
F2/Middle/Mid-Ebb	25-Aug-2018	HK1844017-063		**5.1**	----	----	----	----
F2/Middle/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-064		**5.2**	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	*Compound*	**EA025: Suspended Solids (SS)**	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Ebb	25-Aug-2018	HK1844017-065		**6.2**	----	----	----	----
F2/Bottom/Mid-Ebb Duplicate	25-Aug-2018	HK1844017-066		**5.9**	----	----	----	----
C6/Surface/Mid-Flood	25-Aug-2018	HK1844017-067		**3.9**	----	----	----	----
C6/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-068		**4.5**	----	----	----	----
C6/Middle/Mid-Flood	25-Aug-2018	HK1844017-069		**4.8**	----	----	----	----
C6/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-070		**3.7**	----	----	----	----
C6/Bottom/Mid-Flood	25-Aug-2018	HK1844017-071		**6.1**	----	----	----	----
C6/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-072		**6.4**	----	----	----	----
C7/Surface/Mid-Flood	25-Aug-2018	HK1844017-073		**3.8**	----	----	----	----
C7/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-074		**3.6**	----	----	----	----
C7/Middle/Mid-Flood	25-Aug-2018	HK1844017-075		**4.0**	----	----	----	----
C7/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-076		**4.2**	----	----	----	----
C7/Bottom/Mid-Flood	25-Aug-2018	HK1844017-077		**4.8**	----	----	----	----
C7/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-078		**5.3**	----	----	----	----
C8/Surface/Mid-Flood	25-Aug-2018	HK1844017-079		**2.8**	----	----	----	----
C8/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-080		**2.5**	----	----	----	----
C8/Middle/Mid-Flood	25-Aug-2018	HK1844017-081		**3.7**	----	----	----	----
C8/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-082		**4.5**	----	----	----	----
C8/Bottom/Mid-Flood	25-Aug-2018	HK1844017-083		**5.8**	----	----	----	----
C8/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-084		**5.7**	----	----	----	----
C9/Surface/Mid-Flood	25-Aug-2018	HK1844017-085		**3.5**	----	----	----	----
C9/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-086		**4.1**	----	----	----	----
C9/Middle/Mid-Flood	25-Aug-2018	HK1844017-087		**5.7**	----	----	----	----
C9/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-088		**6.0**	----	----	----	----
C9/Bottom/Mid-Flood	25-Aug-2018	HK1844017-089		**9.0**	----	----	----	----
C9/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-090		**9.2**	----	----	----	----
C11/Surface/Mid-Flood	25-Aug-2018	HK1844017-091		**2.8**	----	----	----	----
C11/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-092		**3.1**	----	----	----	----
C11/Middle/Mid-Flood	25-Aug-2018	HK1844017-093		**3.6**	----	----	----	----
C11/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-094		**3.9**	----	----	----	----
C11/Bottom/Mid-Flood	25-Aug-2018	HK1844017-095		**6.1**	----	----	----	----
C11/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-096		**7.3**	----	----	----	----
C13/Surface/Mid-Flood	25-Aug-2018	HK1844017-097		**3.0**	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-098		3.5	----	----	----	----
C13/Middle/Mid-Flood	25-Aug-2018	HK1844017-099		4.6	----	----	----	----
C13/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-100		5.3	----	----	----	----
C13/Bottom/Mid-Flood	25-Aug-2018	HK1844017-101		5.7	----	----	----	----
C13/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-102		5.1	----	----	----	----
M3/Surface/Mid-Flood	25-Aug-2018	HK1844017-103		2.9	----	----	----	----
M3/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-104		2.7	----	----	----	----
M3/Middle/Mid-Flood	25-Aug-2018	HK1844017-105		3.4	----	----	----	----
M3/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-106		3.0	----	----	----	----
M3/Bottom/Mid-Flood	25-Aug-2018	HK1844017-107		4.9	----	----	----	----
M3/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-108		5.2	----	----	----	----
G2/Surface/Mid-Flood	25-Aug-2018	HK1844017-109		3.0	----	----	----	----
G2/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-110		3.3	----	----	----	----
G2/Middle/Mid-Flood	25-Aug-2018	HK1844017-111		4.4	----	----	----	----
G2/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-112		3.8	----	----	----	----
G2/Bottom/Mid-Flood	25-Aug-2018	HK1844017-113		6.2	----	----	----	----
G2/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-114		6.7	----	----	----	----
G3/Surface/Mid-Flood	25-Aug-2018	HK1844017-115		4.3	----	----	----	----
G3/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-116		3.8	----	----	----	----
G3/Middle/Mid-Flood	25-Aug-2018	HK1844017-117		6.3	----	----	----	----
G3/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-118		6.6	----	----	----	----
G3/Bottom/Mid-Flood	25-Aug-2018	HK1844017-119		7.9	----	----	----	----
G3/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-120		8.2	----	----	----	----
E2/Surface/Mid-Flood	25-Aug-2018	HK1844017-121		3.3	----	----	----	----
E2/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-122		3.5	----	----	----	----
E2/Middle/Mid-Flood	25-Aug-2018	HK1844017-123		4.4	----	----	----	----
E2/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-124		4.9	----	----	----	----
E2/Bottom/Mid-Flood	25-Aug-2018	HK1844017-125		5.4	----	----	----	----
E2/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-126		5.7	----	----	----	----
F2/Surface/Mid-Flood	25-Aug-2018	HK1844017-127		3.0	----	----	----	----
F2/Surface/Mid-Flood Duplicate	25-Aug-2018	HK1844017-128		2.7	----	----	----	----
F2/Middle/Mid-Flood	25-Aug-2018	HK1844017-129		5.2	----	----	----	----
F2/Middle/Mid-Flood Duplicate	25-Aug-2018	HK1844017-130		5.0	----	----	----	----

Sub-Matrix: **MARINE WATER**

	Compound	**EA025: Suspended Solids (SS)**	**----**	**----**	**----**	**----**
	LOR Unit	0.5 mg/L	----	----	----	----
Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Flood	25-Aug-2018	HK1844017-131	**6.2**	**----**	**----**	**----**	**----**
F2/Bottom/Mid-Flood Duplicate	25-Aug-2018	HK1844017-132	**6.4**	**----**	**----**	**----**	**----**

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1904378)								
HK1844017-001	C6/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.4	3.8	11.7
HK1844017-011	C7/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.9	3.6	8.05
EA/ED: Physical and Aggregate Properties (QC Lot: 1904379)								
HK1844017-021	C9/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.1	4.6	9.72
HK1844017-031	C13/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.4	5.0	7.26
EA/ED: Physical and Aggregate Properties (QC Lot: 1904380)								
HK1844017-041	M3/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	7.3	6.9	5.65
HK1844017-051	G3/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.6	5.5	1.80
EA/ED: Physical and Aggregate Properties (QC Lot: 1904381)								
HK1844017-061	F2/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.6	4.0	11.9
HK1844017-071	C6/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.1	5.8	5.02
EA/ED: Physical and Aggregate Properties (QC Lot: 1904382)								
HK1844017-081	C8/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.7	4.0	7.74
HK1844017-091	C11/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	2.8	2.8	0.00
EA/ED: Physical and Aggregate Properties (QC Lot: 1904383)								
HK1844017-101	C13/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.7	5.5	2.68
HK1844017-111	G2/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.2	6.41
EA/ED: Physical and Aggregate Properties (QC Lot: 1904384)								
HK1844017-121	E2/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.3	3.2	0.00
HK1844017-131	F2/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.2	5.9	4.54

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1904378)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	99.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904379)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	101	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904380)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904381)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904382)											

Matrix: **WATER**

		Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1904382) - continued											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904383)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904384)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

CERTIFICATE OF ANALYSIS

Client	: ENOVATIVE ENVIRONMENTAL SERVICE LTD	Laboratory	: ALS Technichem (HK) Pty Ltd	Page	: 1 of 9		
Contact	: MR THOMAS WONG	Contact	: Richard Fung	Work Order	: HK1845495		
Address	: FLAT 2207, YU FUN HSE, YU CHUI COURT, SHATIN, N.T. HONG KONG	Address	: 11/F., Chung Shun Knitting Centre, 1 - 3 Wing Yip Street, Kwai Chung, N.T., Hong Kong				
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Project	: PACIFIC LIGHT CABLE NETWORK (PLCN) - DEEP WATER BAY	Quote number	: HKE/1254/2018	Date received	: 28-Aug-2018		
Order number	: —			Date of issue	: 31-Aug-2018		
C-O-C number	: —			No. of samples	- Received	:	132
Site	: —				- Analysed	:	132

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

Signatory	Position	Authorised results for:
Fung Lim Chee, Richard	General Manager	Inorganics

Report Comments

This report for ALS Technichem (HK) Pty Ltd work order reference HK1845495 supersedes any previous reports with this reference. Testing period is from 28-Aug-2018 to 31-Aug-2018. Results apply to sample(s) as submitted. All pages of this report have been checked and approved for release. When date(s) and/or time(s) are shown bracketed, these have been assumed by the laboratory for process purposes. Abbreviations: CAS number = Chemical Abstract Services number. LOR = Limit of reporting.

Specific Comments for Work Order HK1845495 :

Sample(s) were received in chilled condition.

Water sample(s) analysed and reported on as received basis.

The accredited LOR of Total Suspended Solids is 0.5mg/L when 2 Litres sample was used. Due to insufficient sample, the results below 2mg/L and the decimal value of the results reported are for reference only.

Analytical Results

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C6/Surface/Mid-Flood	28-Aug-2018	HK1845495-001		3.1	----	----	----	----
C6/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-002		2.9	----	----	----	----
C6/Middle/Mid-Flood	28-Aug-2018	HK1845495-003		2.9	----	----	----	----
C6/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-004		2.4	----	----	----	----
C6/Bottom/Mid-Flood	28-Aug-2018	HK1845495-005		2.8	----	----	----	----
C6/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-006		3.2	----	----	----	----
C7/Surface/Mid-Flood	28-Aug-2018	HK1845495-007		2.8	----	----	----	----
C7/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-008		3.4	----	----	----	----
C7/Middle/Mid-Flood	28-Aug-2018	HK1845495-009		3.7	----	----	----	----
C7/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-010		4.2	----	----	----	----
C7/Bottom/Mid-Flood	28-Aug-2018	HK1845495-011		5.0	----	----	----	----
C7/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-012		4.8	----	----	----	----
C8/Surface/Mid-Flood	28-Aug-2018	HK1845495-013		4.2	----	----	----	----
C8/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-014		4.7	----	----	----	----
C8/Middle/Mid-Flood	28-Aug-2018	HK1845495-015		5.3	----	----	----	----
C8/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-016		4.9	----	----	----	----
C8/Bottom/Mid-Flood	28-Aug-2018	HK1845495-017		4.5	----	----	----	----
C8/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-018		5.2	----	----	----	----
C9/Surface/Mid-Flood	28-Aug-2018	HK1845495-019		3.6	----	----	----	----
C9/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-020		4.0	----	----	----	----
C9/Middle/Mid-Flood	28-Aug-2018	HK1845495-021		4.3	----	----	----	----
C9/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-022		3.9	----	----	----	----
C9/Bottom/Mid-Flood	28-Aug-2018	HK1845495-023		5.3	----	----	----	----
C9/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-024		5.0	----	----	----	----
C11/Surface/Mid-Flood	28-Aug-2018	HK1845495-025		5.0	----	----	----	----
C11/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-026		5.3	----	----	----	----
C11/Middle/Mid-Flood	28-Aug-2018	HK1845495-027		6.1	----	----	----	----
C11/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-028		5.6	----	----	----	----
C11/Bottom/Mid-Flood	28-Aug-2018	HK1845495-029		6.1	----	----	----	----
C11/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-030		5.7	----	----	----	----
C13/Surface/Mid-Flood	28-Aug-2018	HK1845495-031		4.2	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-032		4.1	----	----	----	----
C13/Middle/Mid-Flood	28-Aug-2018	HK1845495-033		5.1	----	----	----	----
C13/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-034		5.4	----	----	----	----
C13/Bottom/Mid-Flood	28-Aug-2018	HK1845495-035		5.9	----	----	----	----
C13/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-036		6.4	----	----	----	----
M3/Surface/Mid-Flood	28-Aug-2018	HK1845495-037		4.3	----	----	----	----
M3/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-038		4.9	----	----	----	----
M3/Middle/Mid-Flood	28-Aug-2018	HK1845495-039		5.7	----	----	----	----
M3/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-040		5.4	----	----	----	----
M3/Bottom/Mid-Flood	28-Aug-2018	HK1845495-041		6.4	----	----	----	----
M3/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-042		6.9	----	----	----	----
G2/Surface/Mid-Flood	28-Aug-2018	HK1845495-043		2.3	----	----	----	----
G2/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-044		2.1	----	----	----	----
G2/Middle/Mid-Flood	28-Aug-2018	HK1845495-045		2.4	----	----	----	----
G2/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-046		3.3	----	----	----	----
G2/Bottom/Mid-Flood	28-Aug-2018	HK1845495-047		3.6	----	----	----	----
G2/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-048		4.3	----	----	----	----
G3/Surface/Mid-Flood	28-Aug-2018	HK1845495-049		2.6	----	----	----	----
G3/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-050		2.8	----	----	----	----
G3/Middle/Mid-Flood	28-Aug-2018	HK1845495-051		4.4	----	----	----	----
G3/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-052		4.8	----	----	----	----
G3/Bottom/Mid-Flood	28-Aug-2018	HK1845495-053		4.2	----	----	----	----
G3/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-054		3.7	----	----	----	----
E2/Surface/Mid-Flood	28-Aug-2018	HK1845495-055		1.8	----	----	----	----
E2/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-056		1.5	----	----	----	----
E2/Middle/Mid-Flood	28-Aug-2018	HK1845495-057		2.0	----	----	----	----
E2/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-058		2.1	----	----	----	----
E2/Bottom/Mid-Flood	28-Aug-2018	HK1845495-059		2.2	----	----	----	----
E2/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-060		2.5	----	----	----	----
F2/Surface/Mid-Flood	28-Aug-2018	HK1845495-061		4.0	----	----	----	----
F2/Surface/Mid-Flood Duplicate	28-Aug-2018	HK1845495-062		4.3	----	----	----	----
F2/Middle/Mid-Flood	28-Aug-2018	HK1845495-063		3.3	----	----	----	----
F2/Middle/Mid-Flood Duplicate	28-Aug-2018	HK1845495-064		3.7	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Flood	28-Aug-2018	HK1845495-065		3.3	----	----	----	----
F2/Bottom/Mid-Flood Duplicate	28-Aug-2018	HK1845495-066		3.8	----	----	----	----
C6/Surface/Mid-Ebb	28-Aug-2018	HK1845495-067		3.3	----	----	----	----
C6/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-068		3.6	----	----	----	----
C6/Middle/Mid-Ebb	28-Aug-2018	HK1845495-069		4.0	----	----	----	----
C6/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-070		4.7	----	----	----	----
C6/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-071		5.5	----	----	----	----
C6/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-072		5.0	----	----	----	----
C7/Surface/Mid-Ebb	28-Aug-2018	HK1845495-073		4.4	----	----	----	----
C7/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-074		4.3	----	----	----	----
C7/Middle/Mid-Ebb	28-Aug-2018	HK1845495-075		5.1	----	----	----	----
C7/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-076		5.5	----	----	----	----
C7/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-077		5.6	----	----	----	----
C7/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-078		5.3	----	----	----	----
C8/Surface/Mid-Ebb	28-Aug-2018	HK1845495-079		2.9	----	----	----	----
C8/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-080		3.2	----	----	----	----
C8/Middle/Mid-Ebb	28-Aug-2018	HK1845495-081		4.0	----	----	----	----
C8/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-082		3.7	----	----	----	----
C8/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-083		3.7	----	----	----	----
C8/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-084		4.1	----	----	----	----
C9/Surface/Mid-Ebb	28-Aug-2018	HK1845495-085		2.8	----	----	----	----
C9/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-086		3.5	----	----	----	----
C9/Middle/Mid-Ebb	28-Aug-2018	HK1845495-087		4.9	----	----	----	----
C9/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-088		5.6	----	----	----	----
C9/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-089		6.3	----	----	----	----
C9/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-090		6.5	----	----	----	----
C11/Surface/Mid-Ebb	28-Aug-2018	HK1845495-091		3.8	----	----	----	----
C11/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-092		4.2	----	----	----	----
C11/Middle/Mid-Ebb	28-Aug-2018	HK1845495-093		3.9	----	----	----	----
C11/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-094		4.3	----	----	----	----
C11/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-095		4.7	----	----	----	----
C11/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-096		5.0	----	----	----	----
C13/Surface/Mid-Ebb	28-Aug-2018	HK1845495-097		3.4	----	----	----	----

Sub-Matrix: **MARINE WATER**

Client sample ID	Client sampling date / time	Laboratory sample ID	Compound	EA025: Suspended Solids (SS)	----	----	----	----
			LOR Unit	0.5 mg/L	----	----	----	----
				EA/ED: Physical and Aggregate Properties	----	----	----	----
C13/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-098		3.1	----	----	----	----
C13/Middle/Mid-Ebb	28-Aug-2018	HK1845495-099		3.4	----	----	----	----
C13/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-100		3.9	----	----	----	----
C13/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-101		4.4	----	----	----	----
C13/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-102		4.1	----	----	----	----
M3/Surface/Mid-Ebb	28-Aug-2018	HK1845495-103		3.6	----	----	----	----
M3/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-104		3.4	----	----	----	----
M3/Middle/Mid-Ebb	28-Aug-2018	HK1845495-105		4.0	----	----	----	----
M3/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-106		4.4	----	----	----	----
M3/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-107		6.2	----	----	----	----
M3/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-108		6.0	----	----	----	----
G2/Surface/Mid-Ebb	28-Aug-2018	HK1845495-109		3.8	----	----	----	----
G2/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-110		4.4	----	----	----	----
G2/Middle/Mid-Ebb	28-Aug-2018	HK1845495-111		4.5	----	----	----	----
G2/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-112		4.9	----	----	----	----
G2/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-113		5.1	----	----	----	----
G2/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-114		5.4	----	----	----	----
G3/Surface/Mid-Ebb	28-Aug-2018	HK1845495-115		3.9	----	----	----	----
G3/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-116		3.8	----	----	----	----
G3/Middle/Mid-Ebb	28-Aug-2018	HK1845495-117		4.4	----	----	----	----
G3/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-118		4.0	----	----	----	----
G3/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-119		6.3	----	----	----	----
G3/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-120		6.0	----	----	----	----
E2/Surface/Mid-Ebb	28-Aug-2018	HK1845495-121		3.3	----	----	----	----
E2/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-122		2.9	----	----	----	----
E2/Middle/Mid-Ebb	28-Aug-2018	HK1845495-123		3.7	----	----	----	----
E2/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-124		5.2	----	----	----	----
E2/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-125		4.7	----	----	----	----
E2/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-126		4.8	----	----	----	----
F2/Surface/Mid-Ebb	28-Aug-2018	HK1845495-127		4.1	----	----	----	----
F2/Surface/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-128		4.2	----	----	----	----
F2/Middle/Mid-Ebb	28-Aug-2018	HK1845495-129		5.7	----	----	----	----
F2/Middle/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-130		6.2	----	----	----	----

Sub-Matrix: **MARINE WATER**

	Compound	**EA025: Suspended Solids (SS)**	**----**	**----**	**----**	**----**
	LOR Unit	0.5 mg/L	----	----	----	----
Client sample ID	*Client sampling date / time*	*Laboratory sample ID*	EA/ED: Physical and Aggregate Properties	----	----	----	----
F2/Bottom/Mid-Ebb	28-Aug-2018	HK1845495-131	**8.0**	**----**	**----**	**----**	**----**
F2/Bottom/Mid-Ebb Duplicate	28-Aug-2018	HK1845495-132	**8.3**	**----**	**----**	**----**	**----**

Laboratory Duplicate (DUP) Report

Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report				
				LOR	Unit	Original Result	Duplicate Result	RPD (%)
EA/ED: Physical and Aggregate Properties (QC Lot: 1904620)								
HK1845495-001	C6/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.1	2.8	8.47
HK1845495-011	C7/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.0	4.7	5.18
EA/ED: Physical and Aggregate Properties (QC Lot: 1904621)								
HK1845495-021	C9/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.3	4.2	0.00
HK1845495-031	C13/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.2	4.4	4.08
EA/ED: Physical and Aggregate Properties (QC Lot: 1904622)								
HK1845495-041	M3/Bottom/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	6.4	6.7	4.19
HK1845495-051	G3/Middle/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.1	6.53
EA/ED: Physical and Aggregate Properties (QC Lot: 1904623)								
HK1845495-061	F2/Surface/Mid-Flood	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.0	3.4	17.1
HK1845495-071	C6/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	5.5	5.8	5.76
EA/ED: Physical and Aggregate Properties (QC Lot: 1904624)								
HK1845495-081	C8/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.0	4.4	8.90
HK1845495-091	C11/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.8	3.5	8.28
EA/ED: Physical and Aggregate Properties (QC Lot: 1904625)								
HK1845495-101	C13/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.4	4.7	8.26
HK1845495-111	G2/Middle/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	4.5	4.3	4.57
EA/ED: Physical and Aggregate Properties (QC Lot: 1904626)								
HK1845495-121	E2/Surface/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	3.3	3.0	11.1
HK1845495-131	F2/Bottom/Mid-Ebb	EA025: Suspended Solids (SS)	----	0.5	mg/L	8.0	8.4	4.57

Method Blank (MB), Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report

Matrix: **WATER**

Method: Compound	CAS Number	Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
		LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1904620)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.0	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904621)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	102	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904622)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	99.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904623)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	100	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904624)											

Matrix: **WATER**

		Method Blank (MB) Report			Laboratory Control Spike (LCS) and Laboratory Control Spike Duplicate (DCS) Report						
					Spike	Spike Recovery (%)		Recovery Limits (%)		RPDs (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	DCS	Low	High	Value	Control Limit
EA/ED: Physical and Aggregate Properties (QCLot: 1904624) - continued											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.0	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904625)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	98.5	----	85	115	----	----
EA/ED: Physical and Aggregate Properties (QCLot: 1904626)											
EA025: Suspended Solids (SS)	----	0.5	mg/L	<0.5	20 mg/L	100	----	85	115	----	----

Matrix Spike (MS) and Matrix Spike Duplicate (MSD) Report

- **No Matrix Spike (MS) or Matrix Spike Duplicate (MSD) Results are required to be reported.**

Annex E

Phase 2 - Post-Project Water Quality Monitoring Results for Zone A

Figure E1 Surface and Mid-depth Dissolved Oxygen at Sampling Stations during Phase 2 Cable Installation Works within Zone A

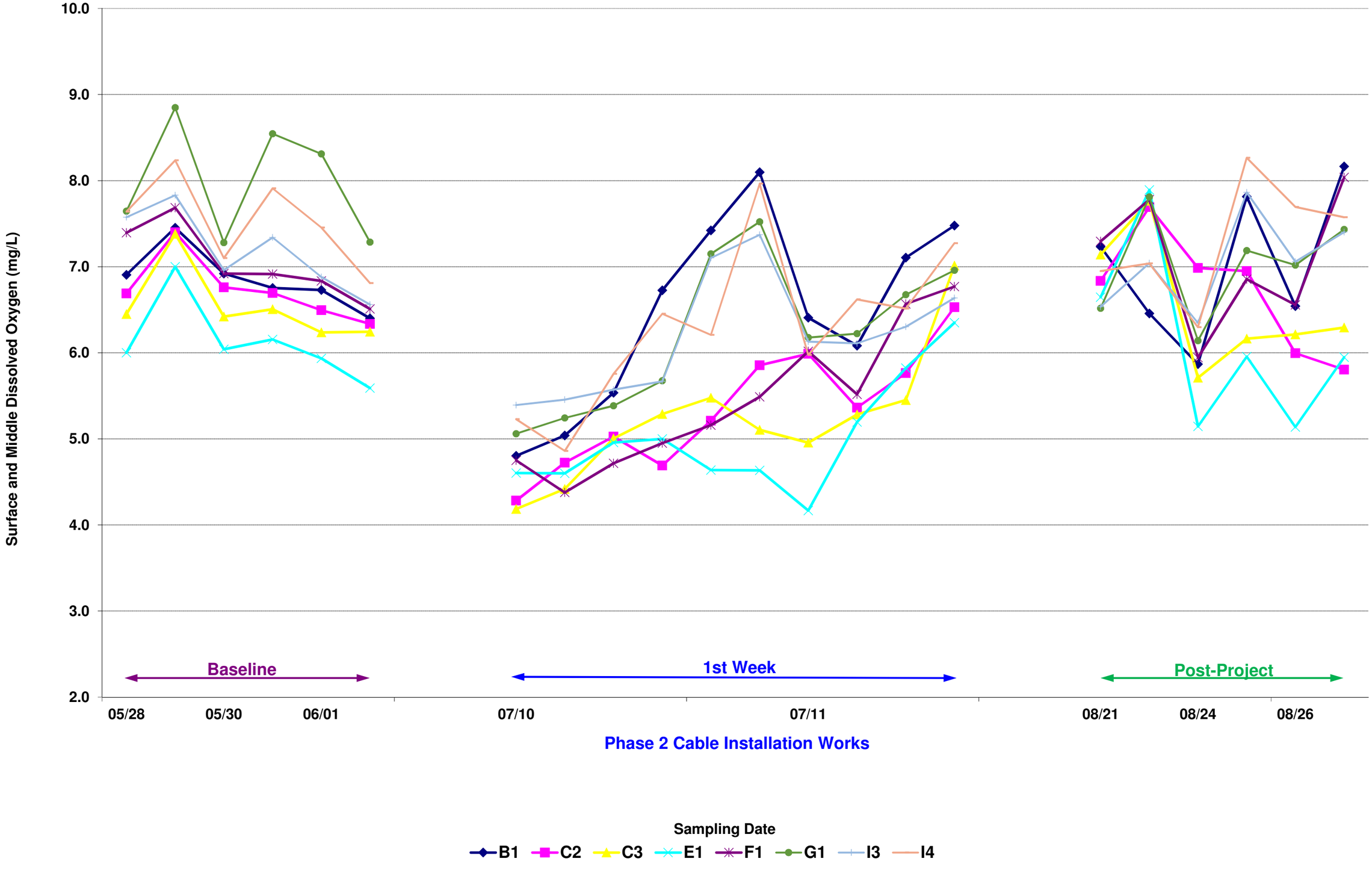


Figure E2 Bottom Dissolved Oxygen at Sampling Stations during Phase 2 Cable Installation Works within Zone A

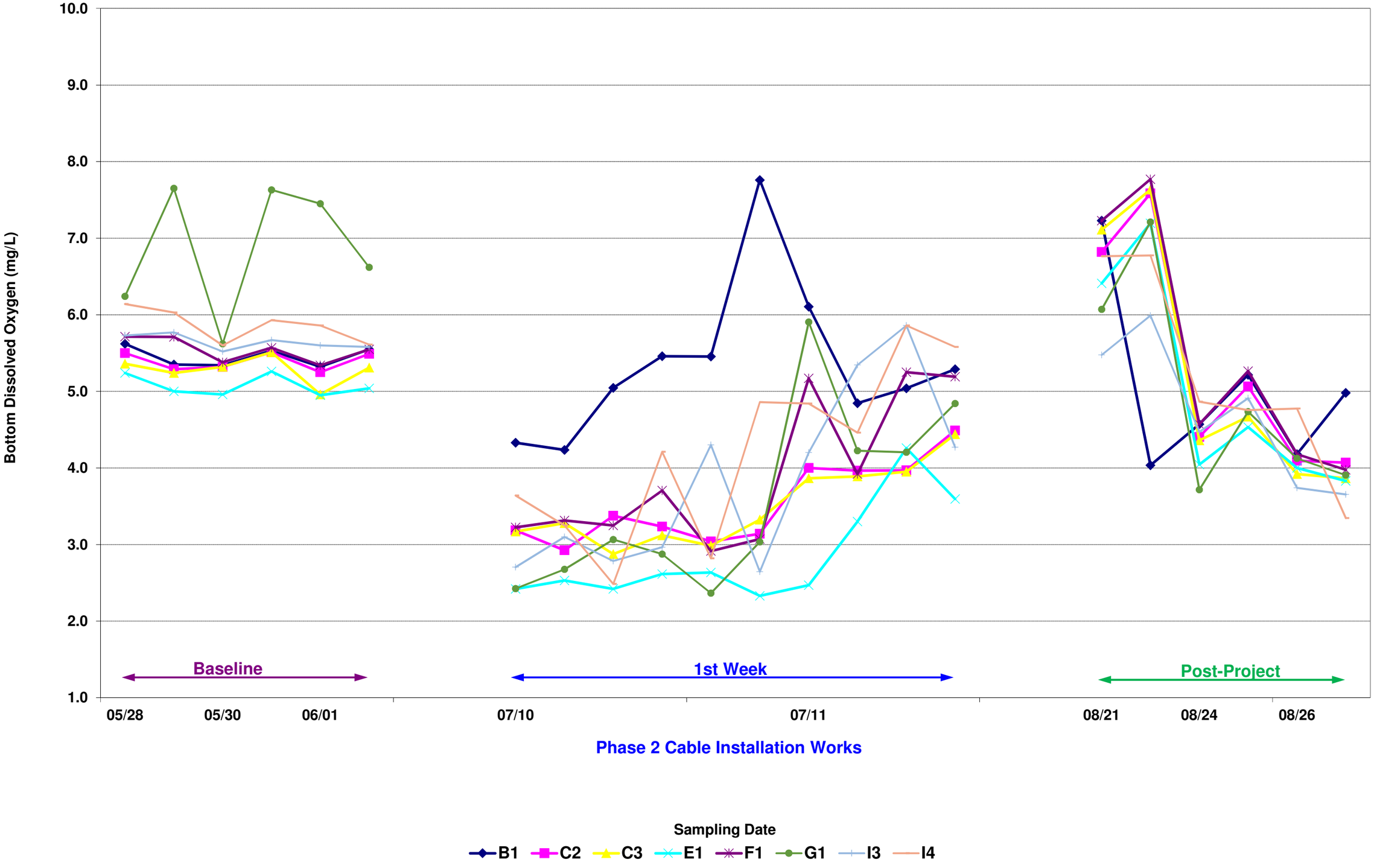


Figure E3 Depth-averaged Turbidity at Sampling Stations during Phase 2 Cable Installation Works within Zone A

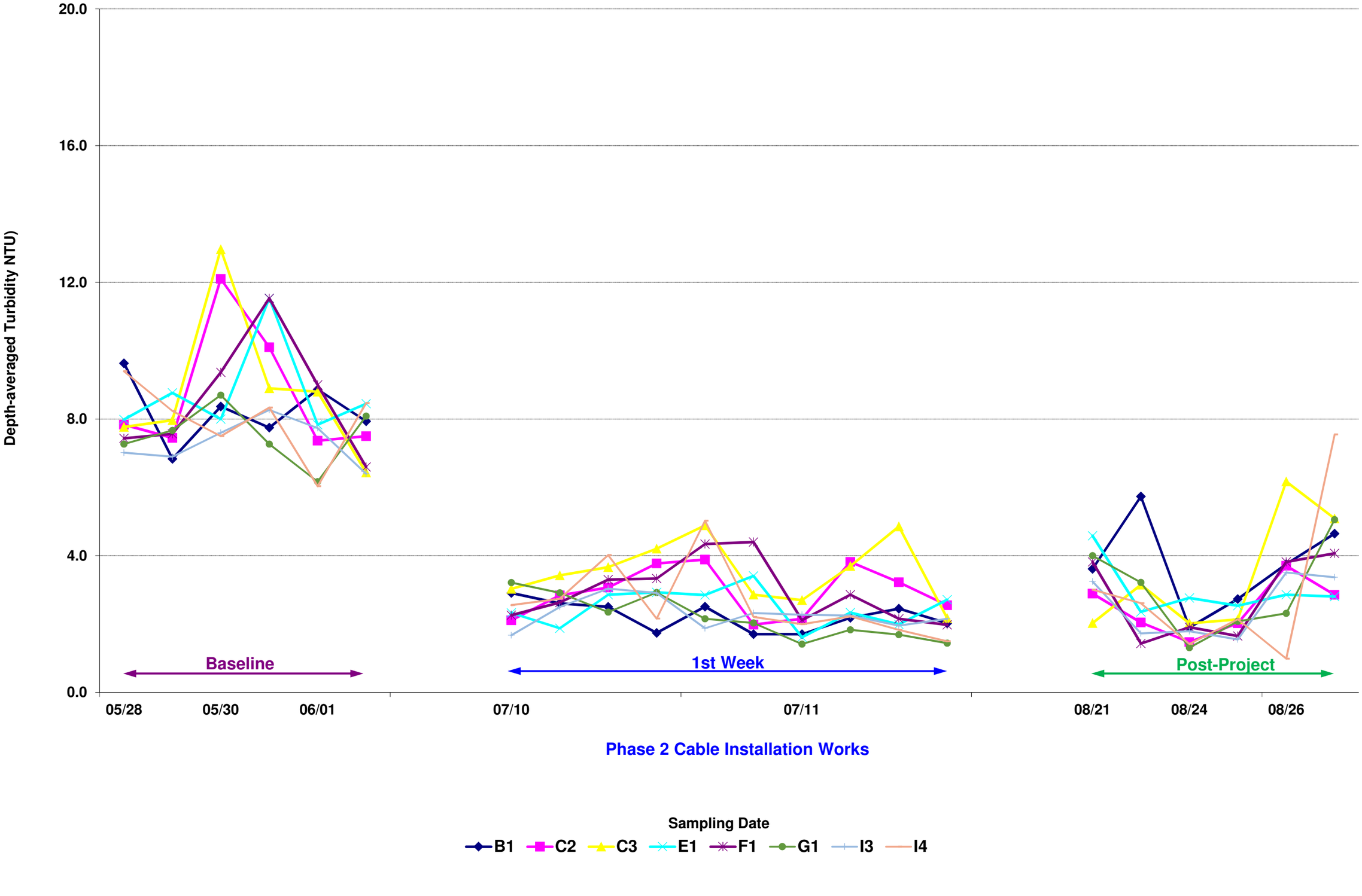
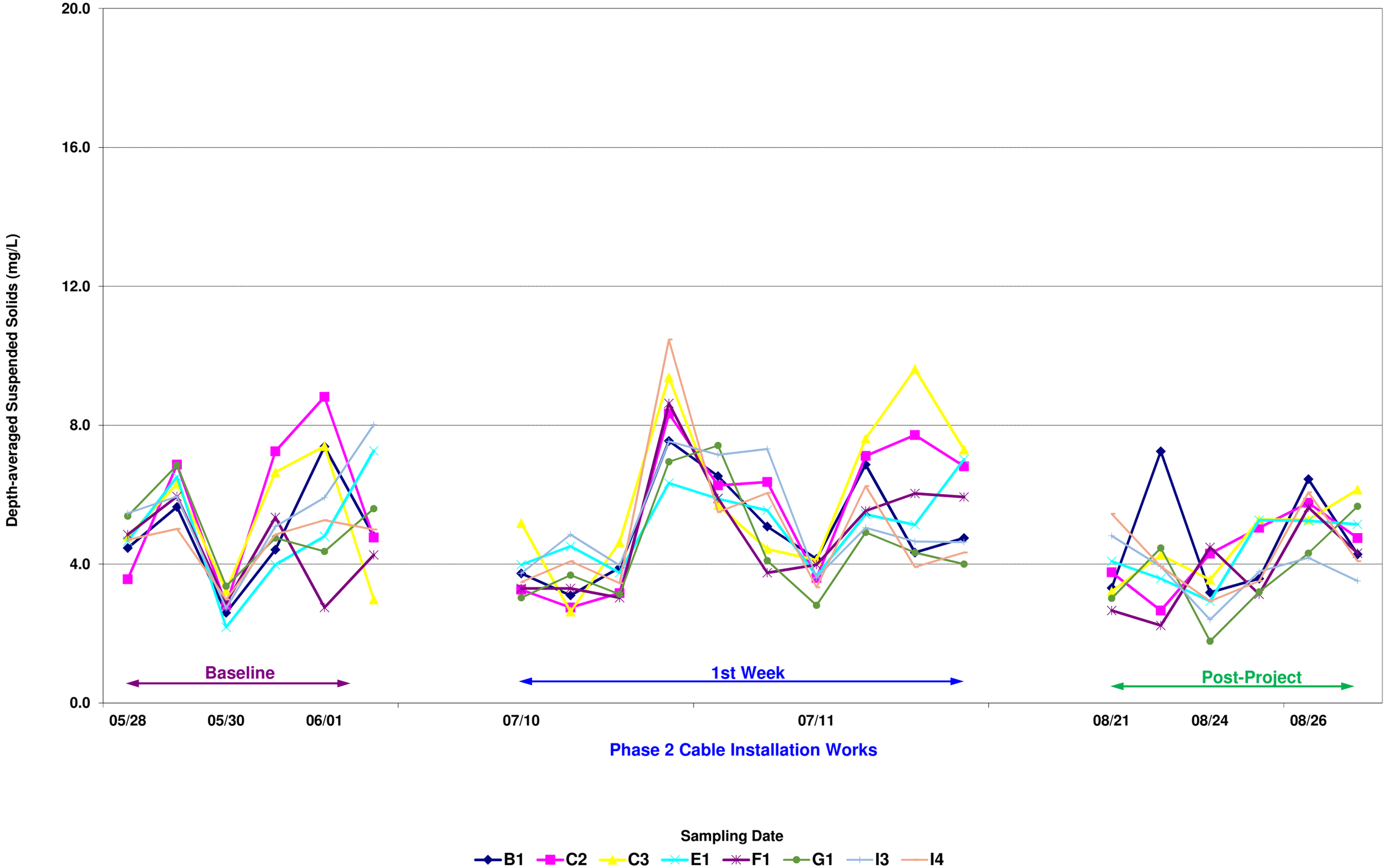


Figure E4 Depth-average Suspended Solids at Sampling Stations during Phase 2 Cable Installation Works within Zone A



					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**

Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.
Green dot to the left of data point indicates no exceedance.

Date	Tide	Station	Time	Level								
2018-Aug-21	Mid-Ebb	E1	09:30	Surface	3.6	101.1	6.69	5.7	6.65	6.41	4.6	4.08
2018-Aug-21	Mid-Ebb	E1	09:30	Surface	3.5	101.1	6.68	5.7				
2018-Aug-21	Mid-Ebb	E1	09:30	Middle	3.6	100.1	6.61	4.9				
2018-Aug-21	Mid-Ebb	E1	09:30	Middle	3.8	100.0	6.60	5.1				
2018-Aug-21	Mid-Ebb	E1	09:30	Bottom	4.8	97.3	6.41	2.9				
2018-Aug-21	Mid-Ebb	E1	09:30	Bottom	5.2	97.2	6.41	3.1				
2018-Aug-21	Mid-Ebb	F1	10:40	Surface	1.4	111.0	7.30	3.2	7.30	7.23	3.8	2.67
2018-Aug-21	Mid-Ebb	F1	10:40	Surface	1.5	111.0	7.30	3.5				
2018-Aug-21	Mid-Ebb	F1	10:40	Middle	2.8	110.8	7.29	4.0				
2018-Aug-21	Mid-Ebb	F1	10:40	Middle	3.6	110.8	7.29	3.9				
2018-Aug-21	Mid-Ebb	F1	10:40	Bottom	3.2	110.0	7.23	4.2				
2018-Aug-21	Mid-Ebb	F1	10:40	Bottom	3.5	109.9	7.23	4.2				
2018-Aug-21	Mid-Ebb	B1	10:05	Surface	2.7	106.9	7.05	2.0	7.23	7.23	3.6	3.32
2018-Aug-21	Mid-Ebb	B1	10:05	Surface	2.1	111.0	7.30	3.5				
2018-Aug-21	Mid-Ebb	B1	10:05	Middle	3.6	110.8	7.29	4.0				
2018-Aug-21	Mid-Ebb	B1	10:05	Middle	3.7	110.8	7.29	3.9				
2018-Aug-21	Mid-Ebb	B1	10:05	Bottom	4.2	110.0	7.23	4.2				
2018-Aug-21	Mid-Ebb	B1	10:05	Bottom	3.6	109.9	7.23	4.2				
2018-Aug-21	Mid-Ebb	C2	10:25	Surface	3.2	104.2	6.84	2.7	6.84	6.82	2.9	3.77
2018-Aug-21	Mid-Ebb	C2	10:25	Surface	3.4	104.2	6.84	2.8				
2018-Aug-21	Mid-Ebb	C2	10:25	Middle	3.3	104.0	6.83	3.8				
2018-Aug-21	Mid-Ebb	C2	10:25	Middle	3.1	104.0	6.83	3.9				
2018-Aug-21	Mid-Ebb	C2	10:25	Bottom	4.4	103.9	6.82	2.1				
2018-Aug-21	Mid-Ebb	C2	10:25	Bottom	5.2	103.9	6.82	2.1				
2018-Aug-21	Mid-Ebb	C3	10:32	Surface	3.0	108.3	7.14	2.1	7.14	7.11	2.0	3.22
2018-Aug-21	Mid-Ebb	C3	10:32	Surface	3.1	108.3	7.14	2.1				
2018-Aug-21	Mid-Ebb	C3	10:32	Middle	3.2	108.2	7.14	2.3				
2018-Aug-21	Mid-Ebb	C3	10:32	Middle	3.0	108.2	7.14	2.5				
2018-Aug-21	Mid-Ebb	C3	10:32	Bottom	3.7	107.9	7.11	1.6				
2018-Aug-21	Mid-Ebb	C3	10:32	Bottom	3.3	107.7	7.11	1.6				
2018-Aug-21	Mid-Ebb	I3	09:55	Surface	4.6	102.8	6.85	3.3	6.54	5.48	3.2	4.82
2018-Aug-21	Mid-Ebb	I3	09:55	Surface	4.9	102.6	6.84	3.4				
2018-Aug-21	Mid-Ebb	I3	09:55	Middle	4.9	93.9	6.23	3.4				
2018-Aug-21	Mid-Ebb	I3	09:55	Middle	4.8	93.8	6.22	3.6				
2018-Aug-21	Mid-Ebb	I3	09:55	Bottom	5.1	83.2	5.47	2.9				
2018-Aug-21	Mid-Ebb	I3	09:55	Bottom	4.6	83.4	5.48	3.0				
2018-Aug-21	Mid-Ebb	I4	10:00	Surface	4.7	106.2	7.02	1.9	6.95	6.77	3.0	5.45
2018-Aug-21	Mid-Ebb	I4	10:00	Surface	5.1	106.2	7.02	1.9				
2018-Aug-21	Mid-Ebb	I4	10:00	Middle	6.0	105.9	6.99	3.7				
2018-Aug-21	Mid-Ebb	I4	10:00	Middle	5.6	102.7	6.77	3.7				
2018-Aug-21	Mid-Ebb	I4	10:00	Bottom	5.7	102.6	6.77	3.5				
2018-Aug-21	Mid-Ebb	I4	10:00	Bottom	5.6	102.6	6.76	3.4				
2018-Aug-21	Mid-Ebb	G1	09:50	Surface	2.6	101.8	6.77	3.0	6.52	6.07	4.0	3.02
2018-Aug-21	Mid-Ebb	G1	09:50	Surface	3.2	101.7	6.76	3.3				
2018-Aug-21	Mid-Ebb	G1	09:50	Middle	3.0	94.8	6.28	3.8				
2018-Aug-21	Mid-Ebb	G1	09:50	Middle	3.3	94.5	6.26	3.6				
2018-Aug-21	Mid-Ebb	G1	09:50	Bottom	3.0	92.2	6.07	5.2				
2018-Aug-21	Mid-Ebb	G1	09:50	Bottom	3.0	92.2	6.07	5.1				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Tide	Station	Time	Level								
2018-Aug-21	Mid-Flood	E1	15:56	Surface	3.0	121.5	7.95	2.5	7.89	7.20	2.4	3.58
2018-Aug-21	Mid-Flood	E1	15:56	Surface	2.4	121.4	7.94	2.5				
2018-Aug-21	Mid-Flood	E1	15:56	Middle	3.8	119.8	7.84	2.8				
2018-Aug-21	Mid-Flood	E1	15:56	Middle	3.8	119.7	7.84	2.7				
2018-Aug-21	Mid-Flood	E1	15:56	Bottom	4.1	110.1	7.20	1.7				
2018-Aug-21	Mid-Flood	E1	15:56	Bottom	4.4	109.9	7.19	1.8				
2018-Aug-21	Mid-Flood	F1	14:49	Surface	1.7	118.8	7.77	1.0	7.78	7.77	1.4	2.23
2018-Aug-21	Mid-Flood	F1	14:49	Surface	1.7	118.8	7.77	1.0				
2018-Aug-21	Mid-Flood	F1	14:49	Middle	2.2	119.2	7.79	2.6				
2018-Aug-21	Mid-Flood	F1	14:49	Middle	3.0	119.2	7.79	2.6				
2018-Aug-21	Mid-Flood	F1	14:49	Bottom	2.7	119.0	7.77	0.7				
2018-Aug-21	Mid-Flood	F1	14:49	Bottom	2.1	119.0	7.77	0.7				
2018-Aug-21	Mid-Flood	B1	15:25	Surface	6.3	110.0	7.22	1.3	6.46	**4.04**	5.7	7.25
2018-Aug-21	Mid-Flood	B1	15:25	Surface	6.6	109.8	7.20	1.3				
2018-Aug-21	Mid-Flood	B1	15:25	Middle	7.4	87.1	5.71	6.9				
2018-Aug-21	Mid-Flood	B1	15:25	Middle	7.9	86.9	5.70	7.2				
2018-Aug-21	Mid-Flood	B1	15:25	Bottom	7.7	61.8	4.03	8.8				
2018-Aug-21	Mid-Flood	B1	15:25	Bottom	7.6	61.9	4.04	8.9				
2018-Aug-21	Mid-Flood	C2	15:06	Surface	2.7	118.5	7.71	1.9	7.69	7.59	2.0	2.67
2018-Aug-21	Mid-Flood	C2	15:06	Surface	3.0	118.4	7.70	2.0				
2018-Aug-21	Mid-Flood	C2	15:06	Middle	2.7	117.9	7.68	2.0				
2018-Aug-21	Mid-Flood	C2	15:06	Middle	2.7	117.9	7.68	2.1				
2018-Aug-21	Mid-Flood	C2	15:06	Bottom	2.6	116.3	7.59	2.1				
2018-Aug-21	Mid-Flood	C2	15:06	Bottom	2.3	116.1	7.58	2.1				
2018-Aug-21	Mid-Flood	C3	14:57	Surface	3.7	118.7	7.78	2.5	7.77	7.64	3.2	4.27
2018-Aug-21	Mid-Flood	C3	14:57	Surface	4.1	118.7	7.78	2.5				
2018-Aug-21	Mid-Flood	C3	14:57	Middle	3.7	118.4	7.75	1.7				
2018-Aug-21	Mid-Flood	C3	14:57	Middle	3.7	118.3	7.75	1.7				
2018-Aug-21	Mid-Flood	C3	14:57	Bottom	5.0	116.6	7.64	5.2				
2018-Aug-21	Mid-Flood	C3	14:57	Bottom	5.4	116.5	7.63	5.2				
2018-Aug-21	Mid-Flood	I3	15:38	Surface	3.4	112.4	7.39	2.4	7.04	5.99	1.7	3.93
2018-Aug-21	Mid-Flood	I3	15:38	Surface	4.0	112.2	7.38	2.5				
2018-Aug-21	Mid-Flood	I3	15:38	Middle	3.8	102.2	6.70	1.5				
2018-Aug-21	Mid-Flood	I3	15:38	Middle	3.6	102.2	6.70	1.5				
2018-Aug-21	Mid-Flood	I3	15:38	Bottom	4.5	91.4	5.99	1.3				
2018-Aug-21	Mid-Flood	I3	15:38	Bottom	4.3	91.5	5.99	1.3				
2018-Aug-21	Mid-Flood	I4	15:31	Surface	4.1	108.3	7.11	2.9	7.04	6.78	2.6	3.93
2018-Aug-21	Mid-Flood	I4	15:31	Surface	3.5	108.2	7.11	2.9				
2018-Aug-21	Mid-Flood	I4	15:31	Middle	3.7	106.0	6.97	2.1				
2018-Aug-21	Mid-Flood	I4	15:31	Middle	3.8	105.8	6.96	2.2				
2018-Aug-21	Mid-Flood	I4	15:31	Bottom	4.3	103.1	6.78	2.7				
2018-Aug-21	Mid-Flood	I4	15:31	Bottom	4.2	102.9	6.77	3.0				
2018-Aug-21	Mid-Flood	G1	15:42	Surface	4.4	120.2	7.90	3.9	7.81	7.21	3.2	4.47
2018-Aug-21	Mid-Flood	G1	15:42	Surface	3.9	119.9	7.89	3.9				
2018-Aug-21	Mid-Flood	G1	15:42	Middle	4.4	117.5	7.73	3.0				
2018-Aug-21	Mid-Flood	G1	15:42	Middle	4.2	117.4	7.72	3.1				
2018-Aug-21	Mid-Flood	G1	15:42	Bottom	5.2	109.9	7.21	2.7				
2018-Aug-21	Mid-Flood	G1	15:42	Bottom	4.7	109.9	7.21	2.7				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Tide	Station	Time	Level								
2018-Aug-24	Mid-Ebb	E1	10:32	Surface	2.6	99.3	6.54	0.9	5.15	**4.05**	2.8	2.93
2018-Aug-24	Mid-Ebb	E1	10:32	Surface	2.8	98.4	6.49	0.9				
2018-Aug-24	Mid-Ebb	E1	10:32	Middle	2.9	54.3	3.77	3.0				
2018-Aug-24	Mid-Ebb	E1	10:32	Middle	2.7	54.5	3.78	3.1				
2018-Aug-24	Mid-Ebb	E1	10:32	Bottom	3.4	58.0	4.04	4.4				
2018-Aug-24	Mid-Ebb	E1	10:32	Bottom	3.2	58.2	4.05	4.2				
2018-Aug-24	Mid-Ebb	F1	11:40	Surface	3.9	116.5	7.61	0.7	5.95	**4.57**	1.9	4.48
2018-Aug-24	Mid-Ebb	F1	11:40	Surface	4.2	115.5	7.54	0.8				
2018-Aug-24	Mid-Ebb	F1	11:40	Middle	4.2	64.1	4.31	2.6				
2018-Aug-24	Mid-Ebb	F1	11:40	Middle	3.9	64.2	4.32	2.8				
2018-Aug-24	Mid-Ebb	F1	11:40	Bottom	5.5	65.9	4.55	2.5				
2018-Aug-24	Mid-Ebb	F1	11:40	Bottom	5.2	66.5	4.59	2.3				
2018-Aug-24	Mid-Ebb	B1	11:04	Surface	2.6	111.6	7.30	0.6	5.87	**4.57**	1.9	3.18
2018-Aug-24	Mid-Ebb	B1	11:04	Surface	2.5	115.5	7.54	0.8				
2018-Aug-24	Mid-Ebb	B1	11:04	Middle	2.9	64.1	4.31	2.6				
2018-Aug-24	Mid-Ebb	B1	11:04	Middle	3.0	64.2	4.32	2.8				
2018-Aug-24	Mid-Ebb	B1	11:04	Bottom	4.0	65.9	4.55	2.5				
2018-Aug-24	Mid-Ebb	B1	11:04	Bottom	4.1	66.5	4.59	2.3				
2018-Aug-24	Mid-Ebb	C2	11:24	Surface	3.1	120.3	7.88	0.7	6.99	**4.41**	1.5	4.30
2018-Aug-24	Mid-Ebb	C2	11:24	Surface	3.5	119.9	7.86	0.7				
2018-Aug-24	Mid-Ebb	C2	11:24	Middle	4.4	92.8	6.12	1.3				
2018-Aug-24	Mid-Ebb	C2	11:24	Middle	4.2	92.2	6.08	1.3				
2018-Aug-24	Mid-Ebb	C2	11:24	Bottom	5.0	63.9	4.39	2.5				
2018-Aug-24	Mid-Ebb	C2	11:24	Bottom	5.6	64.4	4.42	2.4				
2018-Aug-24	Mid-Ebb	C3	11:34	Surface	2.5	115.3	7.52	0.6	5.71	**4.36**	2.0	3.55
2018-Aug-24	Mid-Ebb	C3	11:34	Surface	2.3	114.8	7.49	0.6				
2018-Aug-24	Mid-Ebb	C3	11:34	Middle	3.6	56.6	3.90	2.3				
2018-Aug-24	Mid-Ebb	C3	11:34	Middle	3.2	57.1	3.93	2.2				
2018-Aug-24	Mid-Ebb	C3	11:34	Bottom	5.0	62.2	4.35	3.3				
2018-Aug-24	Mid-Ebb	C3	11:34	Bottom	4.7	62.4	4.37	3.2				
2018-Aug-24	Mid-Ebb	I3	12:06	Surface	2.6	120.3	7.89	0.7	6.35	**4.47**	1.8	2.40
2018-Aug-24	Mid-Ebb	I3	12:06	Surface	2.8	113.4	7.45	0.8				
2018-Aug-24	Mid-Ebb	I3	12:06	Middle	1.8	76.2	5.04	2.2				
2018-Aug-24	Mid-Ebb	I3	12:06	Middle	1.5	75.5	5.00	2.4				
2018-Aug-24	Mid-Ebb	I3	12:06	Bottom	2.8	65.3	4.45	2.3				
2018-Aug-24	Mid-Ebb	I3	12:06	Bottom	2.9	65.8	4.49	2.3				
2018-Aug-24	Mid-Ebb	I4	10:58	Surface	2.6	113.9	7.48	0.7	6.30	**4.87**	1.4	2.93
2018-Aug-24	Mid-Ebb	I4	10:58	Surface	2.6	111.3	7.32	0.8				
2018-Aug-24	Mid-Ebb	I4	10:58	Middle	2.8	78.3	5.20	1.4				
2018-Aug-24	Mid-Ebb	I4	10:58	Middle	3.3	78.1	5.19	1.5				
2018-Aug-24	Mid-Ebb	I4	10:58	Bottom	3.4	72.2	4.84	2.1				
2018-Aug-24	Mid-Ebb	I4	10:58	Bottom	2.9	72.9	4.89	2.1				
2018-Aug-24	Mid-Ebb	G1	10:52	Surface	1.3	116.9	7.66	0.7	6.14	**3.72**	1.3	1.78
2018-Aug-24	Mid-Ebb	G1	10:52	Surface	1.5	115.8	7.60	0.7				
2018-Aug-24	Mid-Ebb	G1	10:52	Middle	1.0	71.3	4.70	1.1				
2018-Aug-24	Mid-Ebb	G1	10:52	Middle	1.4	69.7	4.60	1.1				
2018-Aug-24	Mid-Ebb	G1	10:52	Bottom	2.7	54.7	3.72	2.0				
2018-Aug-24	Mid-Ebb	G1	10:52	Bottom	2.8	54.5	3.71	2.3				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Tide	Station	Time	Level								
2018-Aug-24	Mid-Flood	E1	17:31	Surface	4.8	117.3	7.78	1.5	5.96	**4.54**	2.5	5.27
2018-Aug-24	Mid-Flood	E1	17:31	Surface	4.9	117.7	7.81	1.5				
2018-Aug-24	Mid-Flood	E1	17:31	Middle	4.8	59.5	4.11	2.8				
2018-Aug-24	Mid-Flood	E1	17:31	Middle	5.4	59.6	4.12	2.9				
2018-Aug-24	Mid-Flood	E1	17:31	Bottom	6.3	64.9	4.52	3.4				
2018-Aug-24	Mid-Flood	E1	17:31	Bottom	5.4	65.4	4.55	3.2				
2018-Aug-24	Mid-Flood	F1	16:23	Surface	2.7	128.0	8.29	1.0	6.86	5.27	1.7	3.13
2018-Aug-24	Mid-Flood	F1	16:23	Surface	3.1	126.2	8.17	1.0				
2018-Aug-24	Mid-Flood	F1	16:23	Middle	2.6	82.6	5.48	1.9				
2018-Aug-24	Mid-Flood	F1	16:23	Middle	3.1	82.5	5.48	2.0				
2018-Aug-24	Mid-Flood	F1	16:23	Bottom	3.8	78.3	5.23	2.1				
2018-Aug-24	Mid-Flood	F1	16:23	Bottom	3.5	79.3	5.30	2.0				
2018-Aug-24	Mid-Flood	B1	17:01	Surface	2.7	133.9	8.72	1.0	7.82	5.22	2.7	3.58
2018-Aug-24	Mid-Flood	B1	17:01	Surface	2.5	132.6	8.65	1.2				
2018-Aug-24	Mid-Flood	B1	17:01	Middle	3.4	108.8	7.14	3.2				
2018-Aug-24	Mid-Flood	B1	17:01	Middle	3.3	102.8	6.75	3.1				
2018-Aug-24	Mid-Flood	B1	17:01	Bottom	4.7	79.1	5.20	4.0				
2018-Aug-24	Mid-Flood	B1	17:01	Bottom	4.9	79.4	5.23	4.1				
2018-Aug-24	Mid-Flood	C2	16:40	Surface	4.1	135.8	8.96	1.5	6.95	5.07	2.0	5.05
2018-Aug-24	Mid-Flood	C2	16:40	Surface	4.3	135.4	8.93	1.6				
2018-Aug-24	Mid-Flood	C2	16:40	Middle	4.0	74.9	4.95	1.6				
2018-Aug-24	Mid-Flood	C2	16:40	Middle	3.8	75.0	4.96	1.6				
2018-Aug-24	Mid-Flood	C2	16:40	Bottom	6.7	72.3	5.03	3.0				
2018-Aug-24	Mid-Flood	C2	16:40	Bottom	7.4	73.5	5.10	2.8				
2018-Aug-24	Mid-Flood	C3	16:30	Surface	4.4	116.6	7.63	0.9	6.17	**4.67**	2.1	5.28
2018-Aug-24	Mid-Flood	C3	16:30	Surface	5.2	115.3	7.55	1.0				
2018-Aug-24	Mid-Flood	C3	16:30	Middle	5.5	70.7	4.74	2.1				
2018-Aug-24	Mid-Flood	C3	16:30	Middle	5.6	70.6	4.74	2.2				
2018-Aug-24	Mid-Flood	C3	16:30	Bottom	5.4	66.7	4.64	3.4				
2018-Aug-24	Mid-Flood	C3	16:30	Bottom	5.6	67.6	4.70	3.3				
2018-Aug-24	Mid-Flood	I3	17:13	Surface	2.6	142.8	9.32	0.7	7.86	**4.91**	1.6	3.78
2018-Aug-24	Mid-Flood	I3	17:13	Surface	2.8	141.9	9.27	0.8				
2018-Aug-24	Mid-Flood	I3	17:13	Middle	4.4	98.0	6.45	1.2				
2018-Aug-24	Mid-Flood	I3	17:13	Middle	4.1	97.2	6.41	1.2				
2018-Aug-24	Mid-Flood	I3	17:13	Bottom	4.3	73.5	4.88	2.8				
2018-Aug-24	Mid-Flood	I3	17:13	Bottom	4.5	74.5	4.94	2.7				
2018-Aug-24	Mid-Flood	I4	17:06	Surface	3.3	138.5	9.02	0.6	8.27	**4.76**	2.1	3.52
2018-Aug-24	Mid-Flood	I4	17:06	Surface	2.9	138.0	9.00	0.6				
2018-Aug-24	Mid-Flood	I4	17:06	Middle	2.7	114.3	7.54	2.6				
2018-Aug-24	Mid-Flood	I4	17:06	Middle	3.3	113.5	7.50	2.7				
2018-Aug-24	Mid-Flood	I4	17:06	Bottom	4.2	70.9	4.70	3.2				
2018-Aug-24	Mid-Flood	I4	17:06	Bottom	4.7	72.6	4.81	3.2				
2018-Aug-24	Mid-Flood	G1	17:16	Surface	2.1	134.6	8.75	0.6	7.19	**4.74**	2.1	3.20
2018-Aug-24	Mid-Flood	G1	17:16	Surface	2.6	133.9	8.71	0.6				
2018-Aug-24	Mid-Flood	G1	17:16	Middle	2.8	85.9	5.66	1.3				
2018-Aug-24	Mid-Flood	G1	17:16	Middle	2.9	85.5	5.63	1.3				
2018-Aug-24	Mid-Flood	G1	17:16	Bottom	4.3	70.3	4.69	4.5				
2018-Aug-24	Mid-Flood	G1	17:16	Bottom	4.5	71.6	4.78	4.3				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**

Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.
Green dot to the left of data point indicates no exceedance.

Date	Tide	Station	Time	Level								
2018-Aug-26	Mid-Ebb	E1	11:56	Surface	4.3	98.7	6.52	1.7	5.14	**4.00**	2.9	5.25
2018-Aug-26	Mid-Ebb	E1	11:56	Surface	4.5	98.5	6.51	1.7				
2018-Aug-26	Mid-Ebb	E1	11:56	Middle	5.1	53.9	3.76	3.1				
2018-Aug-26	Mid-Ebb	E1	11:56	Middle	5.8	53.9	3.76	3.0				
2018-Aug-26	Mid-Ebb	E1	11:56	Bottom	5.5	56.7	4.00	3.8				
2018-Aug-26	Mid-Ebb	E1	11:56	Bottom	6.3	56.8	4.00	3.8				
2018-Aug-26	Mid-Ebb	F1	13:00	Surface	4.6	134.4	8.74	0.9	6.56	**4.18**	3.8	5.63
2018-Aug-26	Mid-Ebb	F1	13:00	Surface	4.7	134.1	8.73	0.9				
2018-Aug-26	Mid-Ebb	F1	13:00	Middle	5.0	64.2	4.38	3.5				
2018-Aug-26	Mid-Ebb	F1	13:00	Middle	4.9	64.2	4.38	3.7				
2018-Aug-26	Mid-Ebb	F1	13:00	Bottom	7.4	59.4	4.17	6.9				
2018-Aug-26	Mid-Ebb	F1	13:00	Bottom	7.2	59.8	4.19	7.0				
2018-Aug-26	Mid-Ebb	B1	12:29	Surface	6.4	132.9	8.68	0.5	6.54	**4.18**	3.8	6.45
2018-Aug-26	Mid-Ebb	B1	12:29	Surface	6.5	134.1	8.73	0.9				
2018-Aug-26	Mid-Ebb	B1	12:29	Middle	5.9	64.2	4.38	3.5				
2018-Aug-26	Mid-Ebb	B1	12:29	Middle	5.7	64.2	4.38	3.7				
2018-Aug-26	Mid-Ebb	B1	12:29	Bottom	7.2	59.4	4.17	6.9				
2018-Aug-26	Mid-Ebb	B1	12:29	Bottom	7.0	59.8	4.19	7.0				
2018-Aug-26	Mid-Ebb	C2	12:49	Surface	5.6	124.3	8.14	1.2	6.00	**4.10**	3.7	5.77
2018-Aug-26	Mid-Ebb	C2	12:49	Surface	5.8	124.2	8.13	1.2				
2018-Aug-26	Mid-Ebb	C2	12:49	Middle	5.5	55.1	3.85	4.8				
2018-Aug-26	Mid-Ebb	C2	12:49	Middle	5.5	55.2	3.86	4.8				
2018-Aug-26	Mid-Ebb	C2	12:49	Bottom	6.1	58.1	4.09	5.1				
2018-Aug-26	Mid-Ebb	C2	12:49	Bottom	6.1	58.2	4.10	5.1				
2018-Aug-26	Mid-Ebb	C3	12:58	Surface	4.3	133.8	8.67	0.9	6.21	**3.92**	6.2	5.28
2018-Aug-26	Mid-Ebb	C3	12:58	Surface	4.5	133.6	8.66	1.0				
2018-Aug-26	Mid-Ebb	C3	12:58	Middle	4.4	54.1	3.76	6.8				
2018-Aug-26	Mid-Ebb	C3	12:58	Middle	4.7	54.2	3.76	6.9				
2018-Aug-26	Mid-Ebb	C3	12:58	Bottom	7.1	55.9	3.92	10.6				
2018-Aug-26	Mid-Ebb	C3	12:58	Bottom	6.7	56.0	3.92	10.8				
2018-Aug-26	Mid-Ebb	I3	12:16	Surface	3.1	122.5	7.92	0.5	7.06	**3.74**	3.5	4.18
2018-Aug-26	Mid-Ebb	I3	12:16	Surface	3.3	122.3	7.90	0.5				
2018-Aug-26	Mid-Ebb	I3	12:16	Middle	4.4	93.8	6.21	1.3				
2018-Aug-26	Mid-Ebb	I3	12:16	Middle	5.0	93.6	6.20	1.3				
2018-Aug-26	Mid-Ebb	I3	12:16	Bottom	4.7	54.4	3.74	8.6				
2018-Aug-26	Mid-Ebb	I3	12:16	Bottom	4.6	54.5	3.74	8.9				
2018-Aug-26	Mid-Ebb	I4	12:22	Surface	4.3	118.4	7.67	0.3	7.70	**4.78**	1.0	6.07
2018-Aug-26	Mid-Ebb	I4	12:22	Surface	4.6	118.6	7.68	0.3				
2018-Aug-26	Mid-Ebb	I4	12:22	Middle	5.7	117.3	7.72	0.6				
2018-Aug-26	Mid-Ebb	I4	12:22	Middle	6.2	117.1	7.71	0.6				
2018-Aug-26	Mid-Ebb	I4	12:22	Bottom	7.5	71.4	4.77	2.1				
2018-Aug-26	Mid-Ebb	I4	12:22	Bottom	8.1	71.5	4.78	2.0				
2018-Aug-26	Mid-Ebb	G1	12:12	Surface	3.0	128.1	8.30	0.4	7.02	**4.13**	2.3	4.32
2018-Aug-26	Mid-Ebb	G1	12:12	Surface	3.4	127.8	8.28	0.4				
2018-Aug-26	Mid-Ebb	G1	12:12	Middle	5.0	86.6	5.75	1.3				
2018-Aug-26	Mid-Ebb	G1	12:12	Middle	4.6	86.6	5.74	1.3				
2018-Aug-26	Mid-Ebb	G1	12:12	Bottom	4.7	59.9	4.11	5.2				
2018-Aug-26	Mid-Ebb	G1	12:12	Bottom	5.2	60.3	4.14	5.2				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.19	<4.96	>11.53	>7.39
Limit Level									**<4.77**	**<4.95**	**>12.56**	**>8.44**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Tide	Station	Time	Level								
2018-Aug-26	Mid-Flood	E1	18:28	Surface	5.1	125.2	8.25	1.7	5.95	**3.83**	2.8	5.15
2018-Aug-26	Mid-Flood	E1	18:28	Surface	4.3	124.9	8.24	1.8				
2018-Aug-26	Mid-Flood	E1	18:28	Middle	5.2	52.5	3.65	3.2				
2018-Aug-26	Mid-Flood	E1	18:28	Middle	5.0	52.6	3.65	3.2				
2018-Aug-26	Mid-Flood	E1	18:28	Bottom	5.6	54.8	3.82	3.6				
2018-Aug-26	Mid-Flood	E1	18:28	Bottom	5.7	54.9	3.84	3.5				
2018-Aug-26	Mid-Flood	F1	17:18	Surface	3.7	145.2	9.35	0.8	8.04	**3.98**	4.1	4.32
2018-Aug-26	Mid-Flood	F1	17:18	Surface	3.9	144.9	9.33	0.8				
2018-Aug-26	Mid-Flood	F1	17:18	Middle	3.8	102.3	6.74	0.9				
2018-Aug-26	Mid-Flood	F1	17:18	Middle	4.4	102.1	6.73	0.9				
2018-Aug-26	Mid-Flood	F1	17:18	Bottom	4.9	56.5	3.97	10.6				
2018-Aug-26	Mid-Flood	F1	17:18	Bottom	5.2	56.6	3.98	10.5				
2018-Aug-26	Mid-Flood	B1	17:57	Surface	2.6	124.8	8.02	0.7	8.17	4.98	4.6	4.28
2018-Aug-26	Mid-Flood	B1	17:57	Surface	3.3	124.6	8.00	0.7				
2018-Aug-26	Mid-Flood	B1	17:57	Middle	4.3	128.0	8.33	0.6				
2018-Aug-26	Mid-Flood	B1	17:57	Middle	4.4	127.8	8.31	0.6				
2018-Aug-26	Mid-Flood	B1	17:57	Bottom	5.4	75.6	4.98	12.4				
2018-Aug-26	Mid-Flood	B1	17:57	Bottom	5.7	75.6	4.98	12.9				
2018-Aug-26	Mid-Flood	C2	17:36	Surface	3.6	115.3	7.59	1.9	5.81	**4.07**	2.9	4.75
2018-Aug-26	Mid-Flood	C2	17:36	Surface	4.3	114.7	7.55	1.9				
2018-Aug-26	Mid-Flood	C2	17:36	Middle	4.9	58.9	4.04	2.5				
2018-Aug-26	Mid-Flood	C2	17:36	Middle	5.4	58.9	4.04	2.5				
2018-Aug-26	Mid-Flood	C2	17:36	Bottom	5.3	57.9	4.06	4.2				
2018-Aug-26	Mid-Flood	C2	17:36	Bottom	5.0	58.1	4.08	4.2				
2018-Aug-26	Mid-Flood	C3	17:26	Surface	5.0	136.2	8.86	1.1	6.29	**3.87**	5.1	6.15
2018-Aug-26	Mid-Flood	C3	17:26	Surface	5.5	135.9	8.85	1.1				
2018-Aug-26	Mid-Flood	C3	17:26	Middle	5.7	53.8	3.73	5.3				
2018-Aug-26	Mid-Flood	C3	17:26	Middle	6.0	53.8	3.73	5.3				
2018-Aug-26	Mid-Flood	C3	17:26	Bottom	7.2	55.1	3.86	8.9				
2018-Aug-26	Mid-Flood	C3	17:26	Bottom	7.5	55.1	3.87	8.9				
2018-Aug-26	Mid-Flood	I3	18:10	Surface	2.8	135.7	8.77	0.6	7.40	**3.66**	3.4	3.52
2018-Aug-26	Mid-Flood	I3	18:10	Surface	2.7	135.6	8.76	0.6				
2018-Aug-26	Mid-Flood	I3	18:10	Middle	3.3	91.1	6.04	1.2				
2018-Aug-26	Mid-Flood	I3	18:10	Middle	4.1	91.1	6.04	1.2				
2018-Aug-26	Mid-Flood	I3	18:10	Bottom	4.3	53.2	3.65	8.4				
2018-Aug-26	Mid-Flood	I3	18:10	Bottom	3.9	53.3	3.66	8.4				
2018-Aug-26	Mid-Flood	I4	18:04	Surface	3.9	126.2	8.15	1.1	7.58	**3.35**	7.5	4.08
2018-Aug-26	Mid-Flood	I4	18:04	Surface	4.2	125.9	8.13	1.0				
2018-Aug-26	Mid-Flood	I4	18:04	Middle	4.2	106.2	7.02	0.9				
2018-Aug-26	Mid-Flood	I4	18:04	Middle	3.7	105.9	7.00	0.9				
2018-Aug-26	Mid-Flood	I4	18:04	Bottom	4.4	47.5	3.24	20.7				
2018-Aug-26	Mid-Flood	I4	18:04	Bottom	4.1	50.6	3.45	20.6				
2018-Aug-26	Mid-Flood	G1	18:04	Surface	4.2	139.6	9.10	1.1	7.43	**3.91**	5.1	5.67
2018-Aug-26	Mid-Flood	G1	18:04	Surface	4.0	139.4	9.09	1.1				
2018-Aug-26	Mid-Flood	G1	18:04	Middle	5.7	87.1	5.78	1.3				
2018-Aug-26	Mid-Flood	G1	18:04	Middle	6.1	86.8	5.76	1.3				
2018-Aug-26	Mid-Flood	G1	18:04	Bottom	6.8	56.0	3.90	12.9				
2018-Aug-26	Mid-Flood	G1	18:04	Bottom	7.2	56.2	3.91	12.6				

Annex F

Phase 2 - Post-Project Water Quality Monitoring Results for Zone B

Figure F1 Surface and Mid-depth Dissolved Oxygen at Sampling Stations during Phase 2 Cable Installation Works within Zone B

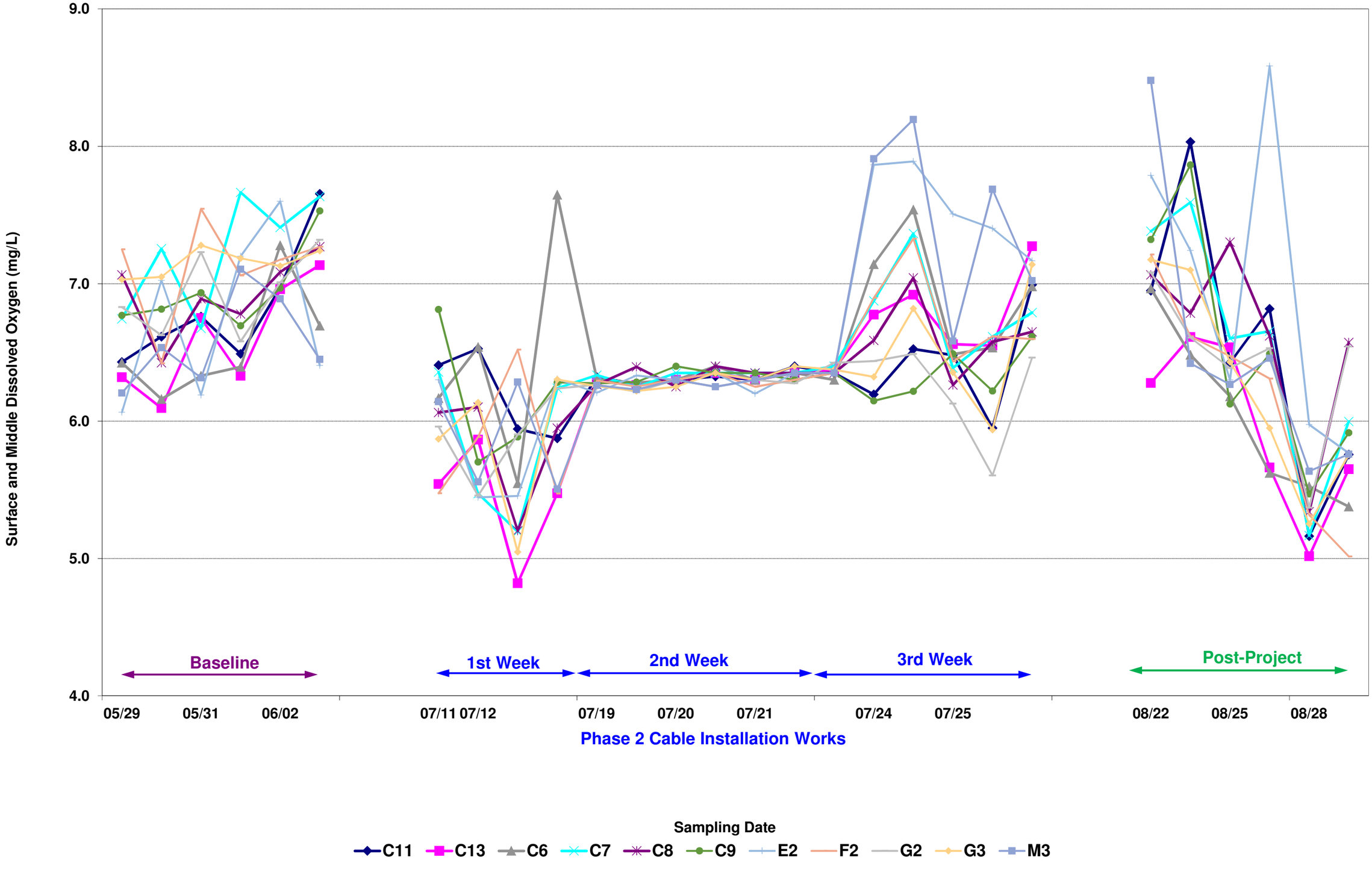


Figure F2 Bottom Dissolved Oxygen at Sampling Stations during Phase 2 Cable Installation Works within Zone B

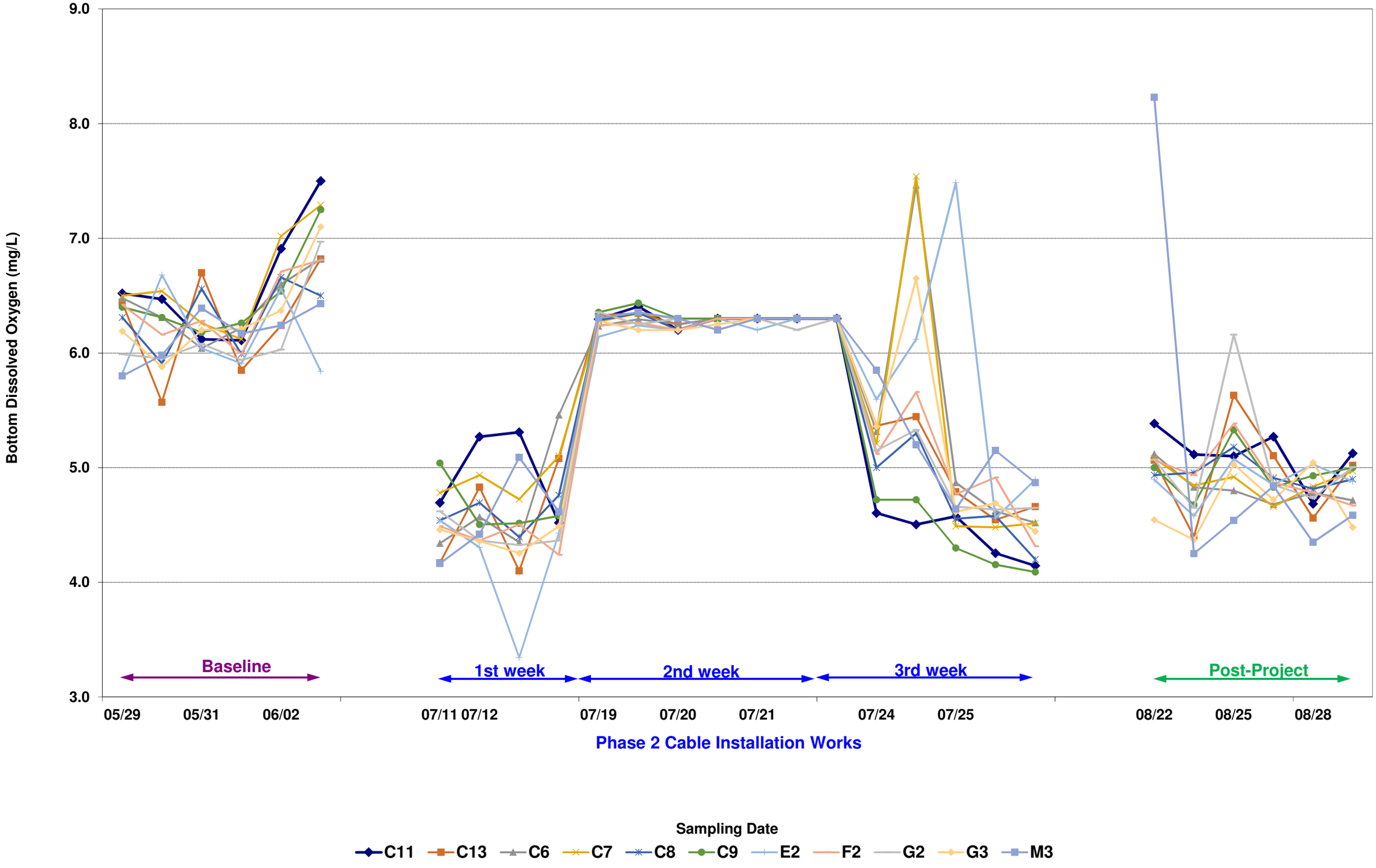


Figure F3 Depth-averaged Turbidity at Sampling Stations during Phase 2 Cable Installation Works within Zone B

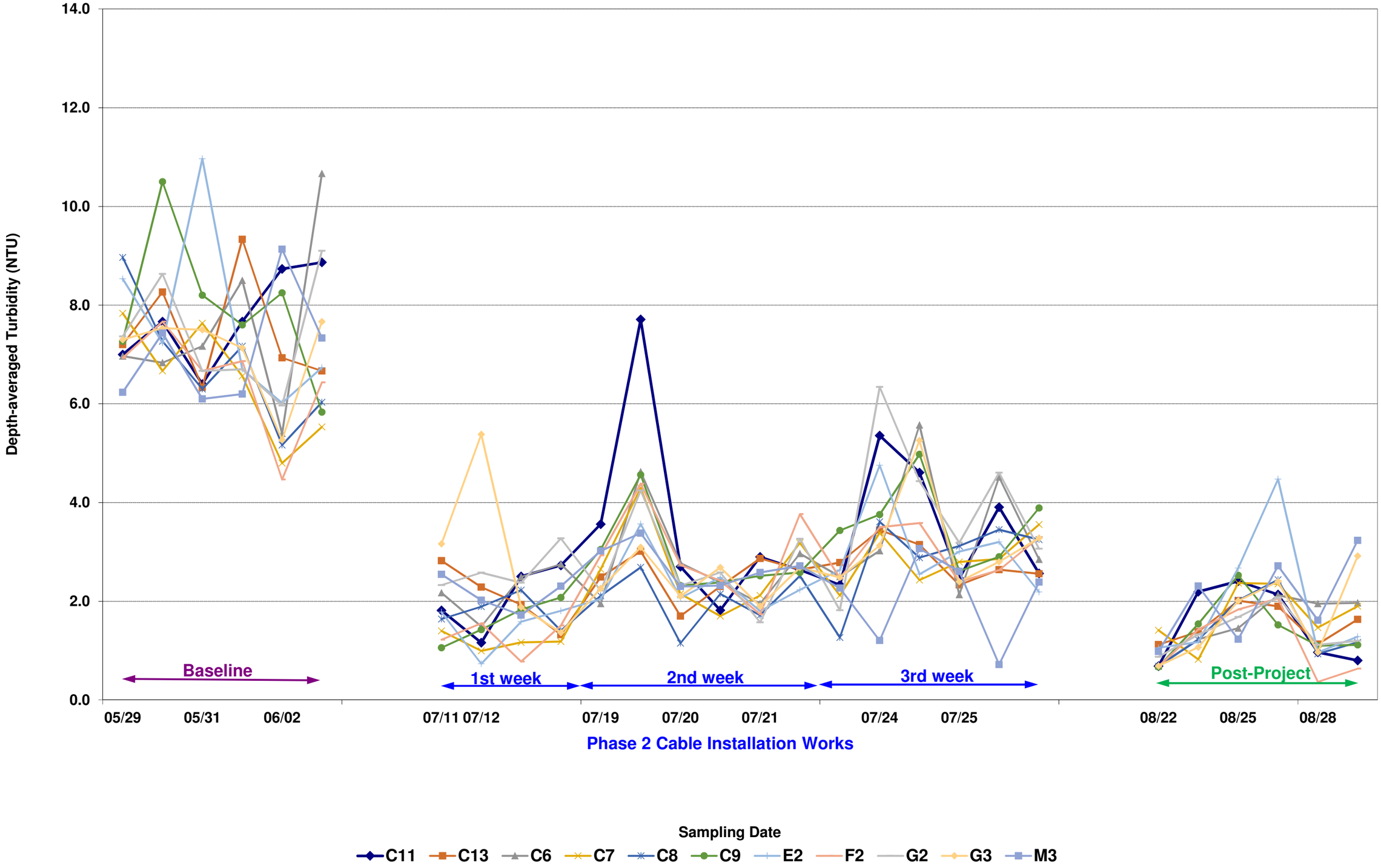
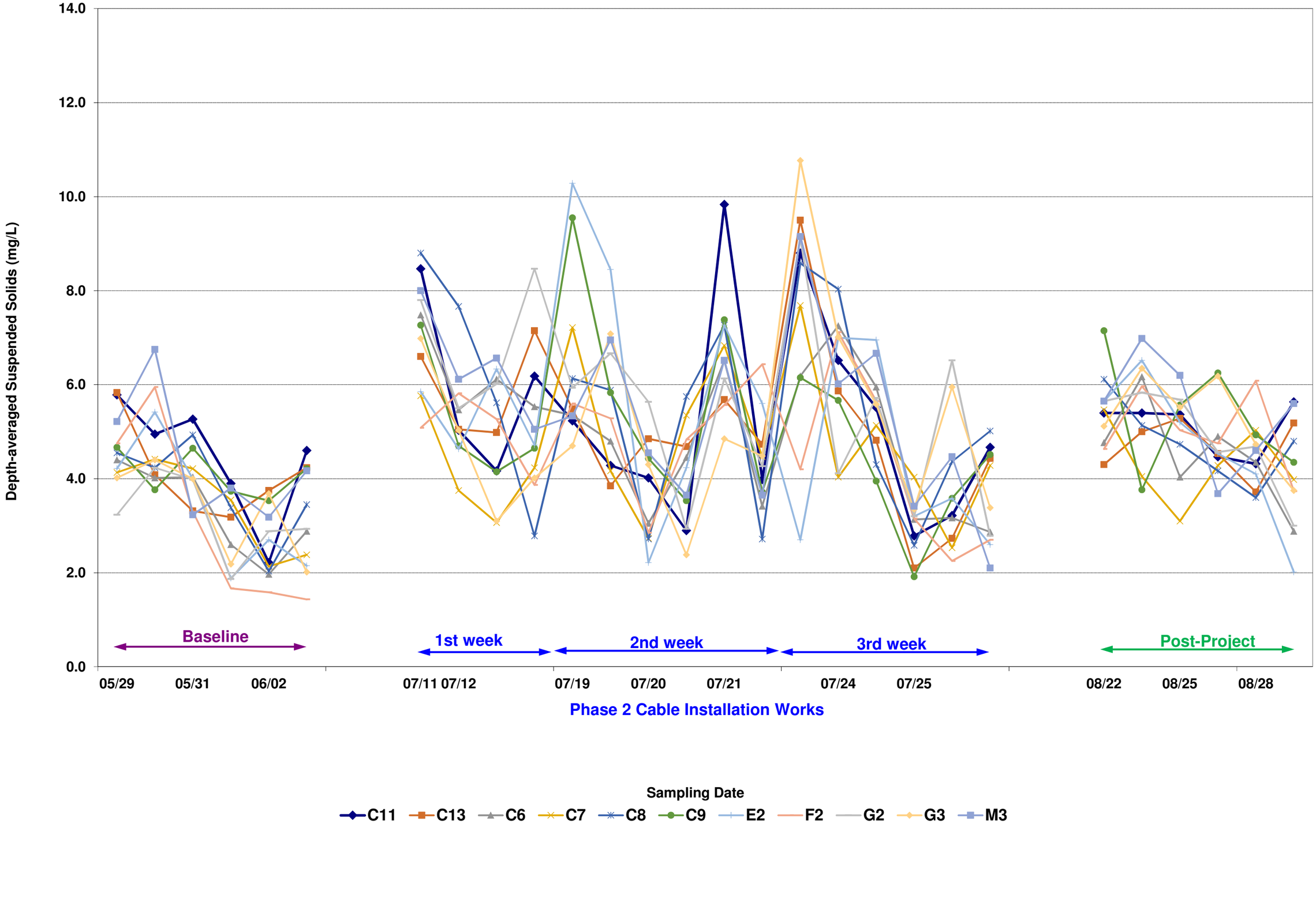


Figure F4 Depth-averaged Suspended Solids at Sampling Stations during Phase 2 Cable Installation Works within Zone B



					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-22	Mid-Ebb	E2	11:53	Surface	4.3	126.0	8.21	0.4	7.79	**4.90**	1.1	5.65
2018-Aug-22	Mid-Ebb	E2	11:53	Surface	4.9	125.8	8.20	0.4				
2018-Aug-22	Mid-Ebb	E2	11:53	Middle	5.7	113.0	7.38	0.5				
2018-Aug-22	Mid-Ebb	E2	11:53	Middle	6.0	112.8	7.36	0.5				
2018-Aug-22	Mid-Ebb	E2	11:53	Bottom	6.4	70.1	4.87	2.3				
2018-Aug-22	Mid-Ebb	E2	11:53	Bottom	6.6	70.8	4.92	2.1				
2018-Aug-22	Mid-Ebb	F2	10:44	Surface	4.3	138.3	9.04	0.4	7.21	**5.07**	0.7	4.63
2018-Aug-22	Mid-Ebb	F2	10:44	Surface	4.2	138.0	9.02	0.4				
2018-Aug-22	Mid-Ebb	F2	10:44	Middle	4.8	83.1	5.40	0.4				
2018-Aug-22	Mid-Ebb	F2	10:44	Middle	5.2	83.0	5.39	0.4				
2018-Aug-22	Mid-Ebb	F2	10:44	Bottom	5.0	73.5	5.05	1.3				
2018-Aug-22	Mid-Ebb	F2	10:44	Bottom	4.3	74.1	5.08	1.2				
2018-Aug-22	Mid-Ebb	C6	11:24	Surface	3.5	131.7	8.61	0.4	6.97	**5.12**	0.7	4.77
2018-Aug-22	Mid-Ebb	C6	11:24	Surface	3.9	131.5	8.59	0.4				
2018-Aug-22	Mid-Ebb	C6	11:24	Middle	4.4	82.4	5.33	0.8				
2018-Aug-22	Mid-Ebb	C6	11:24	Middle	4.0	82.4	5.33	0.8				
2018-Aug-22	Mid-Ebb	C6	11:24	Bottom	6.3	78.0	5.11	1.0				
2018-Aug-22	Mid-Ebb	C6	11:24	Bottom	6.5	78.3	5.13	0.9				
2018-Aug-22	Mid-Ebb	C7	11:16	Surface	5.4	143.0	9.36	0.3	7.38	**5.08**	1.4	5.47
2018-Aug-22	Mid-Ebb	C7	11:16	Surface	5.3	142.9	9.35	0.3				
2018-Aug-22	Mid-Ebb	C7	11:16	Middle	5.5	83.3	5.41	0.4				
2018-Aug-22	Mid-Ebb	C7	11:16	Middle	4.8	83.2	5.41	0.4				
2018-Aug-22	Mid-Ebb	C7	11:16	Bottom	6.1	75.1	5.07	3.6				
2018-Aug-22	Mid-Ebb	C7	11:16	Bottom	5.7	75.6	5.09	3.5				
2018-Aug-22	Mid-Ebb	C8	10:10	Surface	5.0	126.9	8.28	0.5	7.07	**4.94**	0.7	6.12
2018-Aug-22	Mid-Ebb	C8	10:10	Surface	6.0	126.8	8.28	0.5				
2018-Aug-22	Mid-Ebb	C8	10:10	Middle	6.1	90.6	5.85	0.5				
2018-Aug-22	Mid-Ebb	C8	10:10	Middle	6.0	90.5	5.85	0.5				
2018-Aug-22	Mid-Ebb	C8	10:10	Bottom	6.7	74.2	4.93	1.1				
2018-Aug-22	Mid-Ebb	C8	10:10	Bottom	6.9	74.4	4.94	1.0				
2018-Aug-22	Mid-Ebb	C9	10:17	Surface	5.6	135.2	8.87	0.4	7.32	**5.00**	0.7	**7.15**
2018-Aug-22	Mid-Ebb	C9	10:17	Surface	6.1	134.9	8.85	0.4				
2018-Aug-22	Mid-Ebb	C9	10:17	Middle	6.6	89.6	5.80	0.6				
2018-Aug-22	Mid-Ebb	C9	10:17	Middle	6.5	89.2	5.77	0.6				
2018-Aug-22	Mid-Ebb	C9	10:17	Bottom	8.8	75.7	5.00	1.1				
2018-Aug-22	Mid-Ebb	C9	10:17	Bottom	9.3	75.7	5.00	1.1				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-22	Mid-Ebb	C11	10:29	Surface	5.2	124.1	8.11	0.5	6.95	**5.39**	0.7	5.40
2018-Aug-22	Mid-Ebb	C11	10:29	Surface	4.5	124.0	8.10	0.5				
2018-Aug-22	Mid-Ebb	C11	10:29	Middle	5.0	89.2	5.80	0.6				
2018-Aug-22	Mid-Ebb	C11	10:29	Middle	5.5	89.1	5.79	0.6				
2018-Aug-22	Mid-Ebb	C11	10:29	Bottom	5.6	81.4	5.38	1.0				
2018-Aug-22	Mid-Ebb	C11	10:29	Bottom	6.6	81.6	5.39	1.0				
2018-Aug-22	Mid-Ebb	C13	11:35	Surface	3.2	118.7	7.71	0.5	6.28	**5.07**	1.1	4.30
2018-Aug-22	Mid-Ebb	C13	11:35	Surface	3.4	118.5	7.70	0.4				
2018-Aug-22	Mid-Ebb	C13	11:35	Middle	4.8	72.4	4.85	1.5				
2018-Aug-22	Mid-Ebb	C13	11:35	Middle	5.1	72.4	4.85	1.5				
2018-Aug-22	Mid-Ebb	C13	11:35	Bottom	4.8	74.3	5.05	1.5				
2018-Aug-22	Mid-Ebb	C13	11:35	Bottom	4.5	74.7	5.08	1.4				
2018-Aug-22	Mid-Ebb	G2	09:53	Surface	5.0	128.2	8.40	0.5	7.08	**5.07**	0.9	5.65
2018-Aug-22	Mid-Ebb	G2	09:53	Surface	4.3	127.9	8.38	0.5				
2018-Aug-22	Mid-Ebb	G2	09:53	Middle	5.9	88.8	5.78	0.9				
2018-Aug-22	Mid-Ebb	G2	09:53	Middle	6.1	88.7	5.77	0.9				
2018-Aug-22	Mid-Ebb	G2	09:53	Bottom	6.4	77.4	5.07	1.2				
2018-Aug-22	Mid-Ebb	G2	09:53	Bottom	6.2	77.5	5.07	1.2				
2018-Aug-22	Mid-Ebb	G3	10:06	Surface	4.0	130.1	8.53	0.4	7.18	**4.55**	0.7	5.12
2018-Aug-22	Mid-Ebb	G3	10:06	Surface	4.6	130.0	8.52	0.4				
2018-Aug-22	Mid-Ebb	G3	10:06	Middle	5.2	90.4	5.83	0.5				
2018-Aug-22	Mid-Ebb	G3	10:06	Middle	4.9	90.3	5.82	0.5				
2018-Aug-22	Mid-Ebb	G3	10:06	Bottom	6.1	68.2	4.54	1.2				
2018-Aug-22	Mid-Ebb	G3	10:06	Bottom	5.9	68.5	4.55	1.2				
2018-Aug-22	Mid-Ebb	M3	09:39	Surface	4.5	129.8	8.51	2.4	8.48	8.23	1.0	5.65
2018-Aug-22	Mid-Ebb	M3	09:39	Surface	5.2	129.8	8.50	2.4				
2018-Aug-22	Mid-Ebb	M3	09:39	Middle	5.0	129.2	8.46	0.3				
2018-Aug-22	Mid-Ebb	M3	09:39	Middle	5.1	129.0	8.45	0.3				
2018-Aug-22	Mid-Ebb	M3	09:39	Bottom	7.2	125.8	8.24	0.3				
2018-Aug-22	Mid-Ebb	M3	09:39	Bottom	6.9	125.5	8.22	0.3				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-22	Mid-Flood	E2	15:26	Surface	5.1	144.6	9.42	1.0	7.24	**4.58**	1.2	**6.52**
2018-Aug-22	Mid-Flood	E2	15:26	Surface	6.3	144.5	9.42	1.1				
2018-Aug-22	Mid-Flood	E2	15:26	Middle	6.5	77.9	5.07	0.6				
2018-Aug-22	Mid-Flood	E2	15:26	Middle	6.8	77.9	5.06	0.6				
2018-Aug-22	Mid-Flood	E2	15:26	Bottom	7.3	67.0	4.57	1.9				
2018-Aug-22	Mid-Flood	E2	15:26	Bottom	7.1	67.2	4.59	1.9				
2018-Aug-22	Mid-Flood	F2	16:29	Surface	5.8	132.3	8.53	0.3	6.62	**4.94**	1.4	5.97
2018-Aug-22	Mid-Flood	F2	16:29	Surface	5.4	131.8	8.50	0.3				
2018-Aug-22	Mid-Flood	F2	16:29	Middle	6.3	67.5	4.72	1.7				
2018-Aug-22	Mid-Flood	F2	16:29	Middle	5.5	67.6	4.72	1.7				
2018-Aug-22	Mid-Flood	F2	16:29	Bottom	6.6	70.4	4.93	2.2				
2018-Aug-22	Mid-Flood	F2	16:29	Bottom	6.2	70.6	4.94	2.2				
2018-Aug-22	Mid-Flood	C6	15:55	Surface	6.1	125.3	8.11	0.4	6.48	**4.83**	1.2	6.17
2018-Aug-22	Mid-Flood	C6	15:55	Surface	5.7	125.0	8.09	0.4				
2018-Aug-22	Mid-Flood	C6	15:55	Middle	6.2	72.9	4.86	1.4				
2018-Aug-22	Mid-Flood	C6	15:55	Middle	5.7	73.0	4.87	1.4				
2018-Aug-22	Mid-Flood	C6	15:55	Bottom	6.7	69.4	4.82	1.9				
2018-Aug-22	Mid-Flood	C6	15:55	Bottom	6.6	69.8	4.84	1.9				
2018-Aug-22	Mid-Flood	C7	16:03	Surface	3.2	135.9	8.79	0.3	7.59	**4.85**	0.8	4.05
2018-Aug-22	Mid-Flood	C7	16:03	Surface	3.7	135.7	8.77	0.3				
2018-Aug-22	Mid-Flood	C7	16:03	Middle	4.0	98.6	6.43	0.7				
2018-Aug-22	Mid-Flood	C7	16:03	Middle	3.6	97.9	6.38	0.7				
2018-Aug-22	Mid-Flood	C7	16:03	Bottom	5.2	71.1	4.84	1.6				
2018-Aug-22	Mid-Flood	C7	16:03	Bottom	4.6	71.3	4.85	1.5				
2018-Aug-22	Mid-Flood	C8	17:07	Surface	3.6	135.4	8.75	0.3	6.79	**4.96**	1.2	5.13
2018-Aug-22	Mid-Flood	C8	17:07	Surface	4.0	135.0	8.73	0.3				
2018-Aug-22	Mid-Flood	C8	17:07	Middle	5.5	72.6	4.83	1.1				
2018-Aug-22	Mid-Flood	C8	17:07	Middle	5.3	72.5	4.83	1.2				
2018-Aug-22	Mid-Flood	C8	17:07	Bottom	6.4	70.7	4.94	2.2				
2018-Aug-22	Mid-Flood	C8	17:07	Bottom	6.0	71.1	4.97	2.2				
2018-Aug-22	Mid-Flood	C9	16:59	Surface	3.5	167.3	10.81	0.9	7.87	**4.68**	1.5	3.77
2018-Aug-22	Mid-Flood	C9	16:59	Surface	3.6	167.2	10.81	0.9				
2018-Aug-22	Mid-Flood	C9	16:59	Middle	3.2	73.3	4.92	1.1				
2018-Aug-22	Mid-Flood	C9	16:59	Middle	3.8	73.2	4.92	1.1				
2018-Aug-22	Mid-Flood	C9	16:59	Bottom	4.2	66.6	4.67	2.7				
2018-Aug-22	Mid-Flood	C9	16:59	Bottom	4.3	66.8	4.68	2.7				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-22	Mid-Flood	C11	16:42	Surface	3.6	160.2	10.39	0.9	8.03	**5.12**	2.2	5.40
2018-Aug-22	Mid-Flood	C11	16:42	Surface	4.4	160.2	10.40	0.9				
2018-Aug-22	Mid-Flood	C11	16:42	Middle	5.1	86.1	5.67	0.7				
2018-Aug-22	Mid-Flood	C11	16:42	Middle	5.9	86.1	5.67	0.7				
2018-Aug-22	Mid-Flood	C11	16:42	Bottom	6.4	71.9	5.11	5.0				
2018-Aug-22	Mid-Flood	C11	16:42	Bottom	7.0	72.1	5.12	4.9				
2018-Aug-22	Mid-Flood	C13	15:43	Surface	3.3	130.4	8.45	0.4	6.61	**4.40**	1.4	5.00
2018-Aug-22	Mid-Flood	C13	15:43	Surface	4.1	130.2	8.44	0.4				
2018-Aug-22	Mid-Flood	C13	15:43	Middle	5.3	70.8	4.78	1.7				
2018-Aug-22	Mid-Flood	C13	15:43	Middle	5.4	70.8	4.78	1.7				
2018-Aug-22	Mid-Flood	C13	15:43	Bottom	6.0	63.9	4.40	2.1				
2018-Aug-22	Mid-Flood	C13	15:43	Bottom	5.9	63.9	4.40	2.1				
2018-Aug-22	Mid-Flood	G2	17:25	Surface	4.9	133.1	8.61	0.4	6.61	**4.65**	1.3	5.83
2018-Aug-22	Mid-Flood	G2	17:25	Surface	5.2	132.9	8.60	0.4				
2018-Aug-22	Mid-Flood	G2	17:25	Middle	5.7	69.5	4.61	1.4				
2018-Aug-22	Mid-Flood	G2	17:25	Middle	6.0	69.5	4.61	1.4				
2018-Aug-22	Mid-Flood	G2	17:25	Bottom	6.2	66.7	4.64	2.3				
2018-Aug-22	Mid-Flood	G2	17:25	Bottom	7.0	67.0	4.66	2.2				
2018-Aug-22	Mid-Flood	G3	17:11	Surface	4.4	139.4	9.02	0.5	7.10	**4.37**	1.1	**6.35**
2018-Aug-22	Mid-Flood	G3	17:11	Surface	4.9	139.2	9.01	0.5				
2018-Aug-22	Mid-Flood	G3	17:11	Middle	5.8	79.4	5.19	0.9				
2018-Aug-22	Mid-Flood	G3	17:11	Middle	6.2	79.2	5.18	0.9				
2018-Aug-22	Mid-Flood	G3	17:11	Bottom	8.3	62.3	4.36	1.9				
2018-Aug-22	Mid-Flood	G3	17:11	Bottom	8.5	62.5	4.38	1.8				
2018-Aug-22	Mid-Flood	M3	17:30	Surface	6.1	137.3	8.89	0.5	6.42	**4.25**	2.3	**6.98**
2018-Aug-22	Mid-Flood	M3	17:30	Surface	6.4	137.3	8.88	0.5				
2018-Aug-22	Mid-Flood	M3	17:30	Middle	7.1	57.4	3.95	1.5				
2018-Aug-22	Mid-Flood	M3	17:30	Middle	6.8	57.6	3.96	1.5				
2018-Aug-22	Mid-Flood	M3	17:30	Bottom	7.7	60.6	4.24	5.0				
2018-Aug-22	Mid-Flood	M3	17:30	Bottom	7.8	60.9	4.26	4.9				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-25	Mid-Ebb	E2	12:24	Surface	3.9	120.9	7.88	1.0	6.30	**5.08**	2.7	5.20
2018-Aug-25	Mid-Ebb	E2	12:24	Surface	4.3	120.9	7.88	1.0				
2018-Aug-25	Mid-Ebb	E2	12:24	Middle	5.4	68.5	4.72	1.3				
2018-Aug-25	Mid-Ebb	E2	12:24	Middle	5.3	68.5	4.72	1.3				
2018-Aug-25	Mid-Ebb	E2	12:24	Bottom	6.2	72.3	5.07	5.7				
2018-Aug-25	Mid-Ebb	E2	12:24	Bottom	6.1	72.4	5.08	5.7				
2018-Aug-25	Mid-Ebb	F2	11:01	Surface	3.6	112.4	7.35	0.7	6.47	**5.39**	1.8	5.03
2018-Aug-25	Mid-Ebb	F2	11:01	Surface	4.2	112.3	7.34	0.7				
2018-Aug-25	Mid-Ebb	F2	11:01	Middle	5.1	82.1	5.60	0.6				
2018-Aug-25	Mid-Ebb	F2	11:01	Middle	5.2	82.1	5.60	0.6				
2018-Aug-25	Mid-Ebb	F2	11:01	Bottom	6.2	76.3	5.38	4.2				
2018-Aug-25	Mid-Ebb	F2	11:01	Bottom	5.9	76.4	5.39	4.2				
2018-Aug-25	Mid-Ebb	C6	11:46	Surface	3.4	117.9	7.64	0.9	6.18	**4.80**	1.5	4.03
2018-Aug-25	Mid-Ebb	C6	11:46	Surface	4.0	117.8	7.63	0.8				
2018-Aug-25	Mid-Ebb	C6	11:46	Middle	4.1	71.1	4.73	0.8				
2018-Aug-25	Mid-Ebb	C6	11:46	Middle	4.2	71.1	4.72	0.8				
2018-Aug-25	Mid-Ebb	C6	11:46	Bottom	4.1	68.8	4.80	2.8				
2018-Aug-25	Mid-Ebb	C6	11:46	Bottom	4.4	68.8	4.80	2.7				
2018-Aug-25	Mid-Ebb	C7	11:34	Surface	2.4	126.9	8.32	1.9	6.60	**4.92**	2.4	3.10
2018-Aug-25	Mid-Ebb	C7	11:34	Surface	2.9	126.8	8.31	1.8				
2018-Aug-25	Mid-Ebb	C7	11:34	Middle	2.6	72.6	4.89	1.0				
2018-Aug-25	Mid-Ebb	C7	11:34	Middle	2.5	72.6	4.89	1.0				
2018-Aug-25	Mid-Ebb	C7	11:34	Bottom	3.9	70.5	4.92	4.3				
2018-Aug-25	Mid-Ebb	C7	11:34	Bottom	4.3	70.5	4.92	4.3				
2018-Aug-25	Mid-Ebb	C8	10:20	Surface	3.7	120.3	7.86	1.2	7.30	**5.18**	2.0	4.73
2018-Aug-25	Mid-Ebb	C8	10:20	Surface	4.1	120.2	7.86	1.1				
2018-Aug-25	Mid-Ebb	C8	10:20	Middle	3.9	100.4	6.74	0.9				
2018-Aug-25	Mid-Ebb	C8	10:20	Middle	4.4	100.4	6.75	0.9				
2018-Aug-25	Mid-Ebb	C8	10:20	Bottom	6.3	73.4	5.18	3.9				
2018-Aug-25	Mid-Ebb	C8	10:20	Bottom	6.0	73.5	5.18	4.2				
2018-Aug-25	Mid-Ebb	C9	10:28	Surface	4.9	114.5	7.51	1.3	6.13	**5.33**	2.5	5.57
2018-Aug-25	Mid-Ebb	C9	10:28	Surface	5.2	114.5	7.51	1.3				
2018-Aug-25	Mid-Ebb	C9	10:28	Middle	5.1	69.0	4.74	1.3				
2018-Aug-25	Mid-Ebb	C9	10:28	Middle	5.6	69.0	4.74	1.3				
2018-Aug-25	Mid-Ebb	C9	10:28	Bottom	6.0	75.5	5.33	5.0				
2018-Aug-25	Mid-Ebb	C9	10:28	Bottom	6.6	75.6	5.33	5.0				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-25	Mid-Ebb	C11	10:42	Surface	4.6	118.8	7.79	0.9	6.43	**5.10**	2.4	5.37
2018-Aug-25	Mid-Ebb	C11	10:42	Surface	5.2	118.8	7.79	0.9				
2018-Aug-25	Mid-Ebb	C11	10:42	Middle	5.2	74.8	5.06	0.9				
2018-Aug-25	Mid-Ebb	C11	10:42	Middle	5.0	74.8	5.06	0.9				
2018-Aug-25	Mid-Ebb	C11	10:42	Bottom	5.9	72.4	5.10	5.5				
2018-Aug-25	Mid-Ebb	C11	10:42	Bottom	6.3	72.4	5.10	5.5				
2018-Aug-25	Mid-Ebb	C13	11:58	Surface	5.4	117.9	7.69	1.0	6.54	**5.63**	2.0	5.28
2018-Aug-25	Mid-Ebb	C13	11:58	Surface	5.9	117.8	7.68	1.0				
2018-Aug-25	Mid-Ebb	C13	11:58	Middle	4.9	80.3	5.39	1.3				
2018-Aug-25	Mid-Ebb	C13	11:58	Middle	5.0	80.3	5.39	1.3				
2018-Aug-25	Mid-Ebb	C13	11:58	Bottom	5.1	82.6	5.63	3.7				
2018-Aug-25	Mid-Ebb	C13	11:58	Bottom	5.4	82.6	5.63	3.7				
2018-Aug-25	Mid-Ebb	G2	10:01	Surface	4.3	112.1	7.34	0.9	6.39	6.16	1.7	5.68
2018-Aug-25	Mid-Ebb	G2	10:01	Surface	4.1	111.8	7.32	1.0				
2018-Aug-25	Mid-Ebb	G2	10:01	Middle	5.8	80.0	5.44	1.3				
2018-Aug-25	Mid-Ebb	G2	10:01	Middle	6.2	80.2	5.45	1.9				
2018-Aug-25	Mid-Ebb	G2	10:01	Bottom	6.7	91.7	6.16	2.3				
2018-Aug-25	Mid-Ebb	G2	10:01	Bottom	7.0	91.7	6.16	2.7				
2018-Aug-25	Mid-Ebb	G3	10:12	Surface	4.8	113.2	7.42	0.8	6.43	**5.03**	2.0	5.52
2018-Aug-25	Mid-Ebb	G3	10:12	Surface	4.6	113.1	7.41	0.8				
2018-Aug-25	Mid-Ebb	G3	10:12	Middle	5.6	80.0	5.44	1.7				
2018-Aug-25	Mid-Ebb	G3	10:12	Middle	6.3	80.0	5.45	1.7				
2018-Aug-25	Mid-Ebb	G3	10:12	Bottom	6.1	71.4	5.03	3.5				
2018-Aug-25	Mid-Ebb	G3	10:12	Bottom	5.7	71.4	5.03	3.5				
2018-Aug-25	Mid-Ebb	M3	09:43	Surface	4.9	112.5	7.35	0.8	6.27	**4.54**	1.2	6.20
2018-Aug-25	Mid-Ebb	M3	09:43	Surface	5.4	112.4	7.34	0.8				
2018-Aug-25	Mid-Ebb	M3	09:43	Middle	6.6	76.9	5.20	1.2				
2018-Aug-25	Mid-Ebb	M3	09:43	Middle	6.0	76.6	5.18	1.3				
2018-Aug-25	Mid-Ebb	M3	09:43	Bottom	7.3	65.5	4.54	1.6				
2018-Aug-25	Mid-Ebb	M3	09:43	Bottom	7.0	65.5	4.54	1.6				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-25	Mid-Flood	E2	16:51	Surface	3.3	137.7	8.91	3.2	8.59	**4.85**	4.5	4.53
2018-Aug-25	Mid-Flood	E2	16:51	Surface	3.5	137.7	8.91	3.2				
2018-Aug-25	Mid-Flood	E2	16:51	Middle	4.4	125.6	8.27	1.2				
2018-Aug-25	Mid-Flood	E2	16:51	Middle	4.9	125.3	8.25	1.2				
2018-Aug-25	Mid-Flood	E2	16:51	Bottom	5.4	69.6	4.85	9.0				
2018-Aug-25	Mid-Flood	E2	16:51	Bottom	5.7	69.7	4.85	9.0				
2018-Aug-25	Mid-Flood	F2	18:05	Surface	3.0	117.7	7.74	1.1	6.31	**4.87**	2.1	4.75
2018-Aug-25	Mid-Flood	F2	18:05	Surface	2.7	117.5	7.74	1.0				
2018-Aug-25	Mid-Flood	F2	18:05	Middle	5.2	70.0	4.88	2.6				
2018-Aug-25	Mid-Flood	F2	18:05	Middle	5.0	70.0	4.88	2.6				
2018-Aug-25	Mid-Flood	F2	18:05	Bottom	6.2	69.8	4.87	2.6				
2018-Aug-25	Mid-Flood	F2	18:05	Bottom	6.4	69.9	4.87	2.6				
2018-Aug-25	Mid-Flood	C6	17:32	Surface	3.9	97.6	6.50	0.9	5.62	**4.68**	2.1	4.90
2018-Aug-25	Mid-Flood	C6	17:32	Surface	4.5	97.4	6.49	0.9				
2018-Aug-25	Mid-Flood	C6	17:32	Middle	4.8	69.2	4.75	2.0				
2018-Aug-25	Mid-Flood	C6	17:32	Middle	3.7	69.2	4.75	2.0				
2018-Aug-25	Mid-Flood	C6	17:32	Bottom	6.1	67.3	4.68	3.4				
2018-Aug-25	Mid-Flood	C6	17:32	Bottom	6.4	67.3	4.68	3.4				
2018-Aug-25	Mid-Flood	C7	17:41	Surface	3.8	130.7	8.42	0.8	6.66	**4.66**	2.4	4.28
2018-Aug-25	Mid-Flood	C7	17:41	Surface	3.6	130.7	8.42	0.9				
2018-Aug-25	Mid-Flood	C7	17:41	Middle	4.0	72.7	4.89	1.4				
2018-Aug-25	Mid-Flood	C7	17:41	Middle	4.2	72.6	4.89	1.4				
2018-Aug-25	Mid-Flood	C7	17:41	Bottom	4.8	67.4	4.66	4.8				
2018-Aug-25	Mid-Flood	C7	17:41	Bottom	5.3	67.4	4.66	4.8				
2018-Aug-25	Mid-Flood	C8	18:45	Surface	2.8	129.9	8.47	0.9	6.62	**4.91**	2.4	4.17
2018-Aug-25	Mid-Flood	C8	18:45	Surface	2.5	129.9	8.47	0.9				
2018-Aug-25	Mid-Flood	C8	18:45	Middle	3.7	68.9	4.77	2.7				
2018-Aug-25	Mid-Flood	C8	18:45	Middle	4.5	68.9	4.77	2.7				
2018-Aug-25	Mid-Flood	C8	18:45	Bottom	5.8	70.4	4.91	3.6				
2018-Aug-25	Mid-Flood	C8	18:45	Bottom	5.7	70.4	4.91	3.7				
2018-Aug-25	Mid-Flood	C9	18:36	Surface	3.5	122.4	8.02	0.9	6.49	**4.83**	1.5	**6.25**
2018-Aug-25	Mid-Flood	C9	18:36	Surface	4.1	122.4	8.02	1.0				
2018-Aug-25	Mid-Flood	C9	18:36	Middle	5.7	73.1	4.96	1.3				
2018-Aug-25	Mid-Flood	C9	18:36	Middle	6.0	73.1	4.96	1.3				
2018-Aug-25	Mid-Flood	C9	18:36	Bottom	9.0	69.9	4.83	2.3				
2018-Aug-25	Mid-Flood	C9	18:36	Bottom	9.2	69.9	4.83	2.3				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-25	Mid-Flood	C11	18:20	Surface	2.8	128.9	8.46	1.1	6.82	**5.27**	2.1	4.47
2018-Aug-25	Mid-Flood	C11	18:20	Surface	3.1	128.8	8.45	1.2				
2018-Aug-25	Mid-Flood	C11	18:20	Middle	3.6	75.7	5.18	1.2				
2018-Aug-25	Mid-Flood	C11	18:20	Middle	3.9	75.6	5.18	1.2				
2018-Aug-25	Mid-Flood	C11	18:20	Bottom	6.1	74.8	5.27	4.1				
2018-Aug-25	Mid-Flood	C11	18:20	Bottom	7.3	74.8	5.27	4.1				
2018-Aug-25	Mid-Flood	C13	17:19	Surface	3.0	100.6	6.60	0.9	5.66	**5.11**	1.9	4.53
2018-Aug-25	Mid-Flood	C13	17:19	Surface	3.5	100.6	6.60	0.9				
2018-Aug-25	Mid-Flood	C13	17:19	Middle	4.6	68.9	4.72	1.9				
2018-Aug-25	Mid-Flood	C13	17:19	Middle	5.3	68.9	4.73	1.9				
2018-Aug-25	Mid-Flood	C13	17:19	Bottom	5.7	75.4	5.10	2.9				
2018-Aug-25	Mid-Flood	C13	17:19	Bottom	5.1	75.5	5.11	3.0				
2018-Aug-25	Mid-Flood	G2	19:14	Surface	3.0	127.6	8.33	0.9	6.53	**4.85**	2.1	4.57
2018-Aug-25	Mid-Flood	G2	19:14	Surface	3.3	127.6	8.33	0.9				
2018-Aug-25	Mid-Flood	G2	19:14	Middle	4.4	68.2	4.73	2.3				
2018-Aug-25	Mid-Flood	G2	19:14	Middle	3.8	68.2	4.73	2.3				
2018-Aug-25	Mid-Flood	G2	19:14	Bottom	6.2	69.2	4.85	3.1				
2018-Aug-25	Mid-Flood	G2	19:14	Bottom	6.7	69.2	4.85	3.1				
2018-Aug-25	Mid-Flood	G3	18:55	Surface	4.3	108.3	7.29	1.5	5.95	**4.72**	2.4	6.18
2018-Aug-25	Mid-Flood	G3	18:55	Surface	3.8	108.3	7.29	1.5				
2018-Aug-25	Mid-Flood	G3	18:55	Middle	6.3	66.6	4.61	2.7				
2018-Aug-25	Mid-Flood	G3	18:55	Middle	6.6	66.6	4.61	2.7				
2018-Aug-25	Mid-Flood	G3	18:55	Bottom	7.9	67.5	4.72	3.0				
2018-Aug-25	Mid-Flood	G3	18:55	Bottom	8.2	67.5	4.72	3.1				
2018-Aug-25	Mid-Flood	M3	19:21	Surface	2.9	124.6	8.18	1.1	6.46	**4.84**	2.7	3.68
2018-Aug-25	Mid-Flood	M3	19:21	Surface	2.7	124.6	8.19	1.1				
2018-Aug-25	Mid-Flood	M3	19:21	Middle	3.4	67.9	4.73	1.6				
2018-Aug-25	Mid-Flood	M3	19:21	Middle	3.0	67.9	4.73	1.6				
2018-Aug-25	Mid-Flood	M3	19:21	Bottom	4.9	69.1	4.84	5.4				
2018-Aug-25	Mid-Flood	M3	19:21	Bottom	5.2	69.1	4.84	5.5				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-28	Mid-Ebb	E2	14:20	Surface	3.3	102.1	6.85	0.3	5.98	**5.03**	1.0	4.10
2018-Aug-28	Mid-Ebb	E2	14:20	Surface	2.9	102.1	6.85	0.3				
2018-Aug-28	Mid-Ebb	E2	14:20	Middle	3.7	74.3	5.11	1.0				
2018-Aug-28	Mid-Ebb	E2	14:20	Middle	5.2	74.1	5.09	1.0				
2018-Aug-28	Mid-Ebb	E2	14:20	Bottom	4.7	70.4	5.01	1.6				
2018-Aug-28	Mid-Ebb	E2	14:20	Bottom	4.8	70.9	5.05	1.6				
2018-Aug-28	Mid-Ebb	F2	13:05	Surface	4.1	88.8	6.05	0.3	**5.32**	**4.79**	0.4	6.08
2018-Aug-28	Mid-Ebb	F2	13:05	Surface	4.2	88.6	6.04	0.3				
2018-Aug-28	Mid-Ebb	F2	13:05	Middle	5.7	64.6	4.59	0.3				
2018-Aug-28	Mid-Ebb	F2	13:05	Middle	6.2	64.6	4.59	0.3				
2018-Aug-28	Mid-Ebb	F2	13:05	Bottom	8.0	66.8	4.78	0.5				
2018-Aug-28	Mid-Ebb	F2	13:05	Bottom	8.3	67.0	4.79	0.5				
2018-Aug-28	Mid-Ebb	C6	13:40	Surface	3.3	98.8	6.59	0.2	**5.53**	**4.78**	2.0	4.35
2018-Aug-28	Mid-Ebb	C6	13:40	Surface	3.6	98.5	6.57	0.2				
2018-Aug-28	Mid-Ebb	C6	13:40	Middle	4.0	63.2	4.47	2.7				
2018-Aug-28	Mid-Ebb	C6	13:40	Middle	4.7	63.2	4.47	2.7				
2018-Aug-28	Mid-Ebb	C6	13:40	Bottom	5.5	66.8	4.77	3.0				
2018-Aug-28	Mid-Ebb	C6	13:40	Bottom	5.0	67.1	4.79	2.9				
2018-Aug-28	Mid-Ebb	C7	13:31	Surface	4.4	82.6	5.66	0.8	**5.17**	**4.84**	1.5	5.03
2018-Aug-28	Mid-Ebb	C7	13:31	Surface	4.3	82.5	5.65	0.8				
2018-Aug-28	Mid-Ebb	C7	13:31	Middle	5.1	66.3	4.68	2.0				
2018-Aug-28	Mid-Ebb	C7	13:31	Middle	5.5	66.3	4.68	2.0				
2018-Aug-28	Mid-Ebb	C7	13:31	Bottom	5.6	68.0	4.83	1.6				
2018-Aug-28	Mid-Ebb	C7	13:31	Bottom	5.3	68.1	4.84	1.6				
2018-Aug-28	Mid-Ebb	C8	12:24	Surface	2.9	90.2	6.08	0.6	**5.34**	**4.82**	0.9	3.60
2018-Aug-28	Mid-Ebb	C8	12:24	Surface	3.2	90.0	6.07	0.6				
2018-Aug-28	Mid-Ebb	C8	12:24	Middle	4.0	65.1	4.60	1.2				
2018-Aug-28	Mid-Ebb	C8	12:24	Middle	3.7	65.2	4.61	1.2				
2018-Aug-28	Mid-Ebb	C8	12:24	Bottom	3.7	67.6	4.81	1.0				
2018-Aug-28	Mid-Ebb	C8	12:24	Bottom	4.1	67.8	4.82	1.0				
2018-Aug-28	Mid-Ebb	C9	12:33	Surface	2.8	92.9	6.28	0.6	**5.47**	**4.93**	1.1	4.93
2018-Aug-28	Mid-Ebb	C9	12:33	Surface	3.5	92.8	6.26	0.6				
2018-Aug-28	Mid-Ebb	C9	12:33	Middle	4.9	65.8	4.67	1.1				
2018-Aug-28	Mid-Ebb	C9	12:33	Middle	5.6	65.8	4.67	1.1				
2018-Aug-28	Mid-Ebb	C9	12:33	Bottom	6.3	68.4	4.92	1.6				
2018-Aug-28	Mid-Ebb	C9	12:33	Bottom	6.5	68.6	4.94	1.6				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-28	Mid-Ebb	C11	12:47	Surface	3.8	85.4	5.83	0.5	**5.16**	**4.69**	1.0	4.32
2018-Aug-28	Mid-Ebb	C11	12:47	Surface	4.2	85.3	5.82	0.5				
2018-Aug-28	Mid-Ebb	C11	12:47	Middle	3.9	63.6	4.50	0.8				
2018-Aug-28	Mid-Ebb	C11	12:47	Middle	4.3	63.6	4.50	0.8				
2018-Aug-28	Mid-Ebb	C11	12:47	Bottom	4.7	65.2	4.68	1.6				
2018-Aug-28	Mid-Ebb	C11	12:47	Bottom	5.0	65.3	4.69	1.6				
2018-Aug-28	Mid-Ebb	C13	13:54	Surface	3.4	81.4	5.59	0.4	**5.02**	**4.56**	1.1	3.72
2018-Aug-28	Mid-Ebb	C13	13:54	Surface	3.1	81.3	5.58	0.4				
2018-Aug-28	Mid-Ebb	C13	13:54	Middle	3.4	62.8	4.45	1.3				
2018-Aug-28	Mid-Ebb	C13	13:54	Middle	3.9	62.8	4.45	1.3				
2018-Aug-28	Mid-Ebb	C13	13:54	Bottom	4.4	64.0	4.56	1.7				
2018-Aug-28	Mid-Ebb	C13	13:54	Bottom	4.1	64.1	4.56	1.7				
2018-Aug-28	Mid-Ebb	G2	12:04	Surface	3.8	92.4	6.22	0.6	**5.37**	**4.74**	1.1	4.68
2018-Aug-28	Mid-Ebb	G2	12:04	Surface	4.4	92.1	6.20	0.6				
2018-Aug-28	Mid-Ebb	G2	12:04	Middle	4.5	64.4	4.53	1.2				
2018-Aug-28	Mid-Ebb	G2	12:04	Middle	4.9	64.4	4.53	1.3				
2018-Aug-28	Mid-Ebb	G2	12:04	Bottom	5.1	65.9	4.73	1.5				
2018-Aug-28	Mid-Ebb	G2	12:04	Bottom	5.4	66.1	4.74	1.5				
2018-Aug-28	Mid-Ebb	G3	12:17	Surface	3.9	83.4	5.73	0.6	**5.25**	**5.05**	1.0	4.73
2018-Aug-28	Mid-Ebb	G3	12:17	Surface	3.8	83.2	5.72	0.6				
2018-Aug-28	Mid-Ebb	G3	12:17	Middle	4.4	68.2	4.78	1.3				
2018-Aug-28	Mid-Ebb	G3	12:17	Middle	4.0	68.2	4.78	1.3				
2018-Aug-28	Mid-Ebb	G3	12:17	Bottom	6.3	70.8	5.03	1.0				
2018-Aug-28	Mid-Ebb	G3	12:17	Bottom	6.0	71.3	5.06	1.0				
2018-Aug-28	Mid-Ebb	M3	11:52	Surface	3.6	100.7	6.74	0.4	5.64	**4.35**	1.6	4.60
2018-Aug-28	Mid-Ebb	M3	11:52	Surface	3.4	100.6	6.73	0.4				
2018-Aug-28	Mid-Ebb	M3	11:52	Middle	4.0	64.5	4.54	1.8				
2018-Aug-28	Mid-Ebb	M3	11:52	Middle	4.4	64.4	4.53	1.9				
2018-Aug-28	Mid-Ebb	M3	11:52	Bottom	6.2	60.6	4.35	2.6				
2018-Aug-28	Mid-Ebb	M3	11:52	Bottom	6.0	60.7	4.35	2.6				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-28	Mid-Flood	E2	18:14	Surface	1.8	103.8	6.92	0.3	5.77	**4.88**	1.3	2.02
2018-Aug-28	Mid-Flood	E2	18:14	Surface	1.5	103.2	6.88	0.3				
2018-Aug-28	Mid-Flood	E2	18:14	Middle	2.0	67.3	4.64	1.4				
2018-Aug-28	Mid-Flood	E2	18:14	Middle	2.1	67.2	4.63	1.5				
2018-Aug-28	Mid-Flood	E2	18:14	Bottom	2.2	68.4	4.87	2.1				
2018-Aug-28	Mid-Flood	E2	18:14	Bottom	2.5	68.6	4.89	2.1				
2018-Aug-28	Mid-Flood	F2	19:16	Surface	4.0	79.6	5.47	0.6	**5.02**	**4.67**	0.6	3.73
2018-Aug-28	Mid-Flood	F2	19:16	Surface	4.3	79.3	5.45	0.6				
2018-Aug-28	Mid-Flood	F2	19:16	Middle	3.3	64.0	4.57	0.6				
2018-Aug-28	Mid-Flood	F2	19:16	Middle	3.7	64.0	4.57	0.6				
2018-Aug-28	Mid-Flood	F2	19:16	Bottom	3.3	65.0	4.67	0.7				
2018-Aug-28	Mid-Flood	F2	19:16	Bottom	3.8	65.1	4.67	0.7				
2018-Aug-28	Mid-Flood	C6	18:45	Surface	3.1	93.1	6.32	0.6	**5.38**	**4.72**	2.0	2.88
2018-Aug-28	Mid-Flood	C6	18:45	Surface	2.9	92.3	6.27	0.6				
2018-Aug-28	Mid-Flood	C6	18:45	Middle	2.9	62.4	4.46	2.7				
2018-Aug-28	Mid-Flood	C6	18:45	Middle	2.4	62.4	4.46	2.7				
2018-Aug-28	Mid-Flood	C6	18:45	Bottom	2.8	65.7	4.71	2.6				
2018-Aug-28	Mid-Flood	C6	18:45	Bottom	3.2	65.8	4.72	2.6				
2018-Aug-28	Mid-Flood	C7	18:54	Surface	2.8	111.8	7.45	0.3	6.00	**4.97**	1.9	3.98
2018-Aug-28	Mid-Flood	C7	18:54	Surface	3.4	111.4	7.42	0.3				
2018-Aug-28	Mid-Flood	C7	18:54	Middle	3.7	64.0	4.56	2.7				
2018-Aug-28	Mid-Flood	C7	18:54	Middle	4.2	64.0	4.56	2.8				
2018-Aug-28	Mid-Flood	C7	18:54	Bottom	5.0	69.4	4.96	2.7				
2018-Aug-28	Mid-Flood	C7	18:54	Bottom	4.8	69.7	4.98	2.6				
2018-Aug-28	Mid-Flood	C8	20:11	Surface	4.2	108.3	7.28	0.2	6.57	**4.90**	1.2	4.80
2018-Aug-28	Mid-Flood	C8	20:11	Surface	4.7	108.2	7.27	0.2				
2018-Aug-28	Mid-Flood	C8	20:11	Middle	5.3	86.4	5.87	0.6				
2018-Aug-28	Mid-Flood	C8	20:11	Middle	4.9	86.4	5.87	0.6				
2018-Aug-28	Mid-Flood	C8	20:11	Bottom	4.5	68.4	4.90	2.7				
2018-Aug-28	Mid-Flood	C8	20:11	Bottom	5.2	68.4	4.90	2.7				
2018-Aug-28	Mid-Flood	C9	19:55	Surface	3.6	105.6	7.10	0.3	5.92	**5.00**	1.1	4.35
2018-Aug-28	Mid-Flood	C9	19:55	Surface	4.0	105.4	7.08	0.3				
2018-Aug-28	Mid-Flood	C9	19:55	Middle	4.3	67.0	4.74	1.3				
2018-Aug-28	Mid-Flood	C9	19:55	Middle	3.9	67.0	4.74	1.3				
2018-Aug-28	Mid-Flood	C9	19:55	Bottom	5.3	70.2	4.99	1.7				
2018-Aug-28	Mid-Flood	C9	19:55	Bottom	5.0	70.3	5.01	1.8				

					TSS (mg/L)	DO Saturation (%)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Surface and Mid-depth Dissolved Oxygen (mg/L)	Bottom Dissolved Oxygen (mg/L)	Depth-Averaged Turbidity (NTU)	Depth-Averaged SS (mg/L)
Action Level									<5.76	<5.84	>9.28	>5.69
Limit Level									**<5.56**	**<5.64**	**>10.77**	**>6.23**
Red dot to the left of data point indicates trigger of Limit Level. Values also shown in bold.												
Yellow dot to the left of data point indicates trigger of Action Level. Values also underlined.												
Green dot to the left of data point indicates no exceedance.												
Date	Round	Station	Time	Level								
2018-Aug-28	Mid-Flood	C11	19:31	Surface	5.0	98.7	6.65	0.5	5.76	**5.13**	0.8	5.63
2018-Aug-28	Mid-Flood	C11	19:31	Surface	5.3	98.2	6.61	0.5				
2018-Aug-28	Mid-Flood	C11	19:31	Middle	6.1	69.5	4.88	0.9				
2018-Aug-28	Mid-Flood	C11	19:31	Middle	5.6	69.5	4.89	0.9				
2018-Aug-28	Mid-Flood	C11	19:31	Bottom	6.1	72.5	5.12	1.0				
2018-Aug-28	Mid-Flood	C11	19:31	Bottom	5.7	72.7	5.13	1.0				
2018-Aug-28	Mid-Flood	C13	18:33	Surface	4.2	101.0	6.75	0.4	5.65	**5.02**	1.6	5.18
2018-Aug-28	Mid-Flood	C13	18:33	Surface	4.1	100.4	6.70	0.4				
2018-Aug-28	Mid-Flood	C13	18:33	Middle	5.1	64.0	4.57	2.3				
2018-Aug-28	Mid-Flood	C13	18:33	Middle	5.4	64.1	4.58	2.3				
2018-Aug-28	Mid-Flood	C13	18:33	Bottom	5.9	70.0	5.01	2.2				
2018-Aug-28	Mid-Flood	C13	18:33	Bottom	6.4	70.3	5.03	2.2				
2018-Aug-28	Mid-Flood	G2	20:42	Surface	2.3	106.8	7.18	0.3	6.54	**5.01**	1.2	3.00
2018-Aug-28	Mid-Flood	G2	20:42	Surface	2.1	106.7	7.18	0.3				
2018-Aug-28	Mid-Flood	G2	20:42	Middle	2.4	87.4	5.92	0.9				
2018-Aug-28	Mid-Flood	G2	20:42	Middle	3.3	87.1	5.89	0.9				
2018-Aug-28	Mid-Flood	G2	20:42	Bottom	3.6	69.9	4.99	2.4				
2018-Aug-28	Mid-Flood	G2	20:42	Bottom	4.3	70.4	5.02	2.4				
2018-Aug-28	Mid-Flood	G3	20:19	Surface	2.6	106.1	7.12	0.5	5.76	**4.48**	2.9	3.75
2018-Aug-28	Mid-Flood	G3	20:19	Surface	2.8	105.9	7.10	0.5				
2018-Aug-28	Mid-Flood	G3	20:19	Middle	4.4	62.0	4.40	3.6				
2018-Aug-28	Mid-Flood	G3	20:19	Middle	4.8	61.9	4.40	3.7				
2018-Aug-28	Mid-Flood	G3	20:19	Bottom	4.2	62.2	4.47	4.6				
2018-Aug-28	Mid-Flood	G3	20:19	Bottom	3.7	62.5	4.49	4.6				
2018-Aug-28	Mid-Flood	M3	20:50	Surface	4.3	103.1	6.93	0.5	5.76	**4.59**	3.2	5.60
2018-Aug-28	Mid-Flood	M3	20:50	Surface	4.9	103.0	6.93	0.5				
2018-Aug-28	Mid-Flood	M3	20:50	Middle	5.7	65.4	4.59	3.0				
2018-Aug-28	Mid-Flood	M3	20:50	Middle	5.4	65.4	4.59	2.9				
2018-Aug-28	Mid-Flood	M3	20:50	Bottom	6.4	64.3	4.59	6.3				
2018-Aug-28	Mid-Flood	M3	20:50	Bottom	6.9	64.3	4.58	6.2				

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