

Table C1 *Summary Table of DO, Turbidity and SS Levels Recorded between 31 October and 24 November 2014*

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
2014/10/31	Mid-Ebb	DS1	5.90	5.95	7.87	9.53
		DS2	5.81	5.94	9.90	9.71
		DS3	5.78	5.80	6.71	5.76
		DS4	5.71	5.85	5.39	8.23
		DS5	5.68	5.81	6.24	7.99
		US1	6.12	6.08	9.71	15.60
		US2	6.28	6.21	17.35	13.87
		MW1	5.68	5.69	3.86	6.49
		THB1	6.06	6.09	12.52	13.30
		THB2	-	6.04	8.85	8.37
		WSR45C	5.61	5.90	5.05	6.09
		WSR46	5.82	6.09	9.11	10.39
	Mid-Flood	DS1	6.12	6.16	9.44	12.73
		DS2	6.12	6.23	12.97	15.70
		DS3	6.07	6.19	15.11	13.76
		DS4	6.30	6.29	11.89	13.28
		DS5	6.47	6.44	9.32	10.57
		US1	5.93	5.94	14.28	17.96
		US2	5.84	6.14	8.44	5.98
		MW1	5.71	5.77	5.79	7.46
		THB1	6.03	6.10	20.41	14.32
		THB2	-	6.20	11.29	11.67
		WSR45C	5.74	5.90	9.87	11.29
		WSR46	5.82	5.97	19.21	17.90
2014/11/03	Mid-Ebb	DS1	5.70	5.92	7.88	12.05
		DS2	5.68	5.88	11.53	14.61
		DS3	5.91	5.95	4.57	8.46
		DS4	5.80	5.93	5.15	7.82
		DS5	5.71	5.89	5.40	6.69
		US1	6.10	6.06	11.29	15.57
		US2	6.16	6.15	7.77	11.12
		MW1	5.76	5.73	3.64	6.10
		THB1	6.08	6.03	6.89	10.27
		THB2	-	5.80	11.22	6.03
		WSR45C	5.69	5.85	6.48	7.76
		WSR46	5.59	5.81	8.60	13.52
	Mid-Flood	DS1	5.83	5.81	9.94	14.25
		DS2	5.62	5.80	20.51	23.80
		DS3	5.98	5.98	34.98	28.10
		DS4	6.09	6.08	11.58	15.77
		DS5	6.02	6.07	6.92	9.54
		US1	5.88	5.86	4.48	7.95
		US2	5.60	5.68	14.79	18.67
		MW1	5.79	5.80	4.13	6.49
		THB1	5.95	5.94	26.19	16.93
		THB2	-	6.43	7.46	8.50
		WSR45C	5.62	5.78	8.72	16.80
		WSR46	5.52	5.76	11.61	12.60

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
2014/11/05	Mid-Ebb	DS1	6.01	6.00	6.41	8.23
		DS2	5.88	5.93	5.07	8.59
		DS3	6.03	6.01	4.01	7.03
		DS4	5.90	5.89	29.24	18.13
		DS5	5.91	5.96	21.54	18.23
		US1	6.15	6.09	5.66	7.55
		US2	6.27	6.29	5.43	9.15
		MW1	5.86	5.88	2.74	5.82
		THB1	5.90	5.98	5.10	6.22
		THB2	-	5.97	6.43	8.13
		WSR45C	5.80	5.95	5.90	9.78
		WSR46	6.24	6.27	9.29	13.09
		Mid-Flood	DS1	5.92	5.96	9.41
	DS2		5.92	5.98	13.94	21.00
	DS3		5.99	5.97	22.25	18.58
	DS4		6.12	6.24	6.50	8.96
	DS5		6.21	6.22	7.45	10.10
	US1		6.20	6.22	9.81	13.28
	US2		6.29	6.11	12.11	15.94
	MW1		5.85	5.86	7.09	10.54
	THB1		5.90	5.95	24.66	20.45
	THB2		-	5.82	11.99	12.83
	WSR45C	5.89	5.95	21.73	17.72	
WSR46	6.14	6.17	7.82	9.13		
2014/11/07	Mid-Ebb	DS1	6.35	6.35	4.60	5.32
		DS2	6.36	6.38	3.95	5.34
		DS3	6.07	6.10	6.62	7.22
		DS4	6.02	6.03	10.71	12.93
		DS5	6.06	6.12	9.32	9.04
		US1	6.37	6.40	4.09	4.85
		US2	6.41	6.41	4.02	5.50
		MW1	5.84	5.90	3.07	5.03
		THB1	6.30	6.32	3.47	10.90
		THB2	-	5.97	4.38	3.27
		WSR45C	5.87	6.08	3.81	4.44
		WSR46	6.23	6.27	6.92	7.79
		Mid-Flood	DS1	6.09	6.14	11.03
	DS2		6.27	6.28	7.37	13.27
	DS3		6.33	6.33	8.84	11.37
	DS4		6.46	6.45	4.56	5.10
	DS5		6.13	6.17	5.19	7.76
	US1		5.97	6.00	5.99	5.85
	US2		6.16	6.19	10.04	13.72
	MW1		5.93	5.94	4.54	6.46
	THB1		4.63	4.51	17.30	16.75
	THB2		-	5.73	4.25	6.10
	WSR45C	6.05	6.17	6.38	7.91	
WSR46	6.18	6.16	8.95	9.12		
2014/11/10	Mid-Ebb	DS1	5.54	5.52	6.82	8.28
		DS2	6.24	6.44	4.98	7.69
		DS3	6.14	6.48	4.37	5.93
		DS4	6.25	6.66	4.09	6.02
		DS5	6.08	6.49	4.21	7.03

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
		US1	5.52	5.53	4.22	5.97
		US2	5.50	5.48	4.84	5.83
		MW1	6.32	6.40	2.16	6.08
		THB1	5.70	5.34	4.27	5.43
		THB2	-	6.31	6.34	6.10
		WSR45C	6.07	6.45	5.04	7.48
		WSR46	6.26	6.44	4.56	7.26
	Mid-Flood	DS1	6.36	6.40	9.46	12.65
		DS2	6.34	6.34	16.83	17.68
		DS3	6.39	6.40	8.16	12.07
		DS4	6.50	6.50	3.79	5.18
		DS5	6.38	6.39	4.70	5.62
		US1	6.50	6.52	5.12	6.80
		US2	6.37	6.42	5.21	7.76
		MW1	6.13	6.12	4.49	8.07
		THB1	6.40	6.38	4.45	6.83
		THB2	-	5.66	3.65	10.80
		WSR45C	6.28	6.30	9.37	7.99
		WSR46	6.38	6.38	7.07	8.18
2014/11/12	Mid-Ebb	DS1	7.50	7.58	3.94	4.22
		DS2	7.89	7.95	3.59	4.48
		DS3	7.83	7.89	2.89	4.86
		DS4	6.72	7.32	3.68	4.32
		DS5	6.73	7.46	3.49	3.19
		US1	7.85	8.14	9.00	9.53
		US2	7.92	8.14	5.17	6.53
		MW1	6.88	6.94	2.26	2.84
		THB1	8.11	8.13	7.25	7.80
		THB2	-	7.17	2.88	9.00
		WSR45C	6.71	7.50	3.37	4.20
		WSR46	7.14	7.25	5.73	6.67
	Mid-Flood	DS1	7.16	7.22	5.35	7.25
		DS2	7.13	7.26	18.71	13.27
		DS3	7.07	7.20	9.71	10.77
		DS4	5.94	5.95	5.67	6.67
		DS5	5.94	5.96	3.67	4.46
		US1	7.61	7.41	4.55	4.57
		US2	7.18	7.27	4.00	4.74
		MW1	6.37	6.49	3.55	4.29
		THB1	7.07	7.28	8.34	10.03
		THB2	-	6.23	5.44	7.27
		WSR45C	6.63	6.94	4.78	4.61
		WSR46	6.90	7.04	5.76	5.68
2014/11/14	Mid-Ebb	DS1	7.45	7.52	8.15	16.08
		DS2	7.25	7.38	6.35	11.94
		DS3	7.26	7.37	3.27	3.91
		DS4	7.04	7.37	3.31	3.86
		DS5	7.26	7.38	2.78	3.17
		US1	7.73	7.73	4.40	3.73
		US2	7.73	7.73	2.58	3.83
		MW1	7.18	7.20	1.70	2.77
		THB1	7.57	7.49	3.39	2.60

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
		THB2	-	6.69	3.15	3.13
		WSR45C	6.93	7.47	2.39	2.60
		WSR46	7.42	7.54	3.87	4.01
	Mid-Flood	DS1	8.06	8.26	5.17	3.72
		DS2	8.83	9.00	7.02	7.67
		DS3	8.82	8.92	5.52	6.87
		DS4	8.37	8.44	4.25	5.18
		DS5	8.34	8.62	2.61	3.72
		US1	7.36	7.48	3.07	3.50
		US2	7.92	8.44	3.05	4.23
		MW1	7.08	7.14	1.50	3.56
		THB1	8.75	8.80	5.47	5.72
		THB2	-	7.58	3.15	4.27
		WSR45C	7.01	7.45	2.67	3.57
		WSR46	6.86	7.69	3.44	4.06
2014/11/17	Mid-Ebb	DS1	8.46	8.48	2.70	7.77
		DS2	8.40	8.43	1.95	4.00
		DS3	8.46	8.52	1.65	3.47
		DS4	8.67	8.69	1.54	4.21
		DS5	8.53	8.71	1.62	3.86
		US1	8.95	9.00	3.29	9.10
		US2	9.81	9.83	2.46	3.17
		MW1	7.71	7.76	1.26	1.98
		THB1	10.23	10.24	2.13	3.43
		THB2	-	9.74	0.65	2.17
		WSR45C	8.01	8.37	2.26	2.49
		WSR46	8.23	8.80	2.95	3.22
	Mid-Flood	DS1	9.42	10.06	5.84	12.58
		DS2	11.29	11.70	3.62	5.47
		DS3	11.72	12.12	5.71	9.88
		DS4	10.95	11.95	4.43	5.92
		DS5	11.51	11.51	1.13	3.36
		US1	11.24	11.79	1.89	2.82
		US2	9.21	10.35	1.76	4.74
		MW1	7.85	7.97	1.50	3.28
		THB1	9.88	10.08	7.53	5.03
		THB2	-	8.36	0.45	19.10
		WSR45C	8.64	8.97	2.77	3.83
		WSR46	8.23	9.16	4.76	4.57
2014/11/19	Mid-Ebb	DS1	8.56	8.61	2.31	3.04
		DS2	8.62	8.90	2.15	3.80
		DS3	8.45	8.76	2.60	2.61
		DS4	8.30	8.55	1.87	2.41
		DS5	8.32	8.58	1.39	3.02
		US1	9.57	9.65	2.13	2.77
		US2	9.89	10.04	1.65	2.33
		MW1	7.87	7.94	1.42	2.20
		THB1	9.86	9.94	1.76	2.83
		THB2	-	9.00	3.62	2.83
		WSR45C	8.14	8.44	1.44	2.69
		WSR46	8.91	9.35	2.31	2.90
	Mid-Flood	DS1	9.40	9.55	3.79	4.87

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
		DS2	9.04	9.42	4.10	5.00
		DS3	10.38	10.27	1.91	2.22
		DS4	10.72	9.99	1.90	3.61
		DS5	9.25	9.40	1.68	3.08
		US1	9.13	9.16	2.47	3.39
		US2	8.98	9.03	2.72	2.99
		MW1	7.62	7.67	2.04	3.08
		THB1	9.54	9.63	9.12	10.73
		THB2	-	8.57	0.95	4.37
		WSR45C	8.47	8.56	5.41	7.13
		WSR46	8.80	9.11	3.55	4.21
2014/11/21	Mid-Ebb	DS1	8.47	8.78	3.02	5.40
		DS2	8.87	9.13	3.06	6.31
		DS3	8.65	8.86	3.18	8.74
		DS4	8.85	9.09	2.20	6.01
		DS5	8.58	9.07	2.33	8.24
		US1	9.44	9.68	2.50	3.78
		US2	9.15	9.13	1.83	7.57
		MW1	7.47	7.55	2.21	7.82
		THB1	9.43	9.29	1.53	5.40
		THB2	-	8.72	0.38	7.63
		WSR45C	8.09	8.44	2.41	4.82
		WSR46	8.66	8.98	1.75	5.70
	Mid-Flood	DS1	8.99	9.50	6.30	7.95
		DS2	9.56	9.52	1.68	5.25
		DS3	9.23	9.22	2.53	5.50
		DS4	8.73	8.97	1.80	5.13
		DS5	8.72	8.84	2.26	6.37
		US1	8.97	9.04	5.87	10.38
		US2	9.16	9.30	5.10	9.14
		MW1	8.04	8.09	3.36	11.77
		THB1	9.92	9.68	1.25	5.13
		THB2	-	9.58	4.52	10.47
		WSR45C	8.93	9.00	4.78	7.89
		WSR46	9.25	9.42	3.93	11.37
2014/11/24	Mid-Ebb	DS1	8.64	8.98	2.08	4.42
		DS2	8.23	8.60	3.99	7.90
		DS3	8.28	8.64	4.75	6.63
		DS4	8.34	8.69	3.26	6.92
		DS5	8.36	8.64	3.88	6.34
		US1	8.97	9.18	3.09	5.10
		US2	8.80	8.95	2.03	2.93
		MW1	8.13	8.60	2.40	11.22
		THB1	9.01	8.97	3.06	4.30
		THB2	-	8.03	2.02	4.43
		WSR45C	8.07	8.93	2.31	3.68
		WSR46	8.30	8.56	4.56	6.98
	Mid-Flood	DS1	8.32	8.37	4.67	6.98
		DS2	8.16	8.26	3.36	14.05
		DS3	8.15	8.21	3.12	4.50
		DS4	7.90	7.93	1.36	4.86
		DS5	7.77	7.81	2.60	4.06
		US1	8.31	8.37	3.20	5.25

Sampling Date	Tidal Period	Station	Average DO Levels (mg/L)		Average Turbidity Level (NTU)	Average SS Level (mg/L)
			Bottom	Surface and Mid Depth		
		US2	8.31	8.57	3.11	8.67
		MW1	8.11	8.18	3.71	9.96
		THB1	7.98	8.02	3.09	4.05
		THB2	-	7.16	1.25	5.13
		WSR45C	8.28	8.41	5.33	10.12
		WSR46	8.28	8.45	4.49	6.49

Notes:

1. Please refer to Table C2 below for the Action and Limit Levels for dredging activities.
2. Cell shaded yellow indicated value exceeding the Action Level criteria.
3. Cell shaded red indicated value exceeding the Limit Level criteria.
4. Only mid-depth water was sampled at Station THB2 because water depth was less than 3m.

Table C2 Action and Limit Levels of Water Quality for Dredging, Backfilling and Capping Activities

Parameter	Action Level	Limit Level
Dissolved Oxygen (DO) ⁽¹⁾	<u>Surface and Mid-depth</u> ⁽²⁾ The average of the impact, WSR 45C and WSR 46 station readings are < 5%-ile of baseline data for surface and middle layer = 4.32 mg L⁻¹	<u>Surface and Mid-depth</u> ⁽²⁾ The average of the impact, WSR 45C and WSR 46 station readings are < 4 mg L⁻¹
	and Significantly less than the reference stations mean DO (at the same tide of the same day)	and Significantly less than the reference stations mean DO (at the same tide of the same day)
	<u>Bottom</u> The average of the impact, WSR 45C and WSR 46 station readings are < 5%-ile of baseline data for bottom layers = 3.12 mg L⁻¹	<u>Bottom</u> The average of the impact station, WSR 45C and WSR 46 readings are < 2 mg L⁻¹
	and Significantly less than the reference stations mean DO (at the same tide of the same day)	and Significantly less than the reference stations mean DO (at the same tide of the same day)
Depth-averaged Suspended Solids (SS) ⁽³⁾⁽⁴⁾	The average of the impact, WSR 45C and WSR 46 station readings are > 95%-ile of baseline data for depth average = 21.60 mg L⁻¹	The average of the impact, WSR 45C and WSR 46 station readings are > 99%-ile of baseline data for depth average = 40.10 mg L⁻¹
	and 120% of control station's SS at the same tide of the same day	and 130% of control station's SS at the same tide of the same day
Depth-averaged Turbidity (Tby) ⁽³⁾⁽⁴⁾	The average of the impact, WSR 45C and WSR 46 station readings are > 95%-ile of baseline data = 25.04 NTU	The average of the impact, WSR 45C and WSR 46 station readings are > 99%-ile of baseline data = 32.68 NTU
	and 120% of control station's Tby at the same tide of the same day	and 130% of control station's Tby at the same tide of the same day

Notes:

- (1) For DO, non-compliance of the water quality limits occurs when monitoring result is lower than the limits.
- (2) The Action and Limit Levels for DO for Surface & Middle layers were calculated from the combined pool of baseline surface layer data and baseline middle layer data.
- (3) "Depth-averaged" is calculated by taking the arithmetic means of reading of all three depths.
- (4) For turbidity and SS, non-compliance of the water quality limits occurs when monitoring result is higher than the limits.

Table C3 *In-situ Monitoring Results for Routine Water Quality Monitoring of CMP 1 in October and November 2014*

Sampling Period	Stations	Temp (°C)	Salinity (ppt)	Turbidity (NTU)	Dissolved Oxygen (%)	Dissolved Oxygen (mg L ⁻¹)	pH (mg L ⁻¹)
October 2014	RFF (Reference)	27.84	29.15	10.22	85.67	5.72	7.85
	IPF (Impact)	27.99	29.43	13.23	82.70	5.50	7.83
	INF (Intermediate)	28.35	30.70	9.47	79.84	5.24	7.84
	Ma Wan	28.30	30.68	9.07	78.27	5.14	7.84
	Shum Shui Kok	27.92	29.55	7.36	81.67	5.43	7.84
	Tai Mo To	28.05	29.54	9.24	81.52	5.41	7.82
	Tai Ho Bay 1	27.87	29.15	11.92	85.08	5.68	7.83
	Tai Ho Bay 2	28.00	28.22	9.46	83.51	5.59	7.78
	WQO	N/A	26.23-32.06 [#]	N/A	N/A	>4	6.5-8.5
November 2014	RFF (Reference)	25.96	30.63	8.58	85.80	5.86	7.92
	IPF (Impact)	26.06	30.59	12.06	83.59	5.70	7.93
	INF (Intermediate)	26.17	30.96	15.00	85.07	5.78	7.96
	Ma Wan	26.21	32.11	3.53	86.30	5.82	7.98
	Shum Shui Kok	26.13	31.45	9.97	85.21	5.78	7.93
	Tai Mo To	25.96	30.54	16.79	85.58	5.85	7.95
	Tai Ho Bay 1	25.91	30.16	23.27	83.63	5.73	7.90
	Tai Ho Bay 2	25.49	28.79	8.02	89.17	6.20	7.84
	WQO	N/A	27.57-33.70 [#]	N/A	N/A	>4	6.5-8.5

Notes:

[#]Not exceeding 10% of natural ambient level which is the result obtained from the Reference Station.

Cell shaded yellow / red indicate value exceeding the Action/Limit levels.

Table C4 Laboratory Results for Routine Water Quality Monitoring of CMP 1 in October and November 2014

Sampling Period	Stations	As (µg/L)	Cd (µg/L)	Cr (µg/L)	Cu (µg/L)	Pb (µg/L)	Hg (µg/L)	Ni (µg/L)	Ag (µg/L)	Zn (µg/L)	NH ₃ (mg/L)	TIN (mg/L)	BOD ₅ (mg/L)	SS (mg/L)
October 2014	RFF	2.40	<LOR	2.30	9.40	2.90	<LOR	2.50	<LOR	15.00	0.03	0.38	2.30	18.38
	IPF	2.04	<LOR	1.23	6.62	1.02	<LOR	1.66	<LOR	17.28	0.03	0.31	2.20	6.90
	INF	1.83	<LOR	<LOR	16.48	1.01	<LOR	<LOR	<LOR	17.17	0.04	0.28	1.22	6.96
	Ma Wan	1.84	<LOR	<LOR	3.55	1.10	<LOR	1.34	<LOR	29.25	0.06	0.31	2.28	12.44
	Shum Shui Kok	1.95	<LOR	<LOR	13.50	1.66	<LOR	<LOR	<LOR	22.88	0.04	0.30	2.28	8.22
	Tai Mo To	1.88	<LOR	<LOR	9.78	<LOR	<LOR	<LOR	<LOR	15.79	0.04	0.35	1.79	8.99
	Tai Ho Bay 1	2.09	<LOR	1.01	3.34	1.11	<LOR	<LOR	<LOR	15.38	0.03	0.30	1.48	11.81
	Tai Ho Bay 2	1.78	<LOR	<LOR	1.31	<LOR	<LOR	<LOR	<LOR	11.80	0.08	0.35	2.04	9.68
November 2014	RFF	2.05	0.48	<LOR	4.57	<LOR	<LOR	<LOR	<LOR	8.40	0.01	0.30	1.70	16.00
	IPF	2.00	<LOR	1.31	4.38	1.05	<LOR	<LOR	<LOR	20.32	0.02	0.34	2.12	13.26
	INF	2.23	<LOR	<LOR	5.16	<LOR	<LOR	<LOR	<LOR	14.87	0.02	0.32	1.93	10.60
	Ma Wan	1.86	0.13	1.34	2.20	1.10	<LOR	3.69	<LOR	7.75	0.02	0.18	1.91	7.61
	Shum Shui Kok	1.83	0.19	<LOR	4.99	1.33	<LOR	<LOR	<LOR	6.40	0.02	0.24	1.70	12.81
	Tai Mo To	2.14	0.66	<LOR	3.46	1.10	<LOR	<LOR	<LOR	11.34	0.03	0.38	1.35	17.23
	Tai Ho Bay 1	2.09	<LOR	2.23	6.93	1.75	<LOR	1.10	<LOR	12.48	0.01	0.38	1.20	20.25
	Tai Ho Bay 2	1.89	0.45	1.39	4.35	1.73	<LOR	1.94	<LOR	12.53	0.01	0.39	1.94	9.18

WQO of TIN: 0.5 mg/L
Wet Season WQO of SS: 11.6 mg/L
Dry Season WQO of SS: 13.8 mg/L

Note: Cell shaded yellow / red indicate value exceeding the Action/Limit levels.

Table C5 Water Column Profiling Results for CMP 1 on 13 November 2014

Stations	Temp (°C)	Salinity (ppt)	Turbidity (NTU)	Dissolved Oxygen (%)	Dissolved Oxygen (mg L ⁻¹)	pH (mg L ⁻¹)	Suspended Solids (mg L ⁻¹)
WCP 1 (Downstream)	24.38	30.80	3.83	105.20	7.37	7.95	4.08
WCP 2 (Upstream)	24.32	30.55	3.98	102.78	7.22	7.95	4.28
WQO (dry season)	N/A	27.61-33.61 [#]	N/A	N/A	>4	6.5-8.5	13.8

Note: [#]Not exceeding 10% of natural ambient level which is the result obtained from the Reference Station.