

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Action Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	01-Dec-10
Time	3:35 PM
Monitoring Location	Sik Sik Yuen Ho Fung College (I-1)
Parameter	Suspended Solid
Action & Limit Levels (mg/L)	8.85 / 10.17
Measured Level (mg/L)	2.70 (higher than 120% of control station's SS)
Possible reason for Action or Limit Level Non-compliance	A low SS level of 2.20 mg/L was recorded at Control Station (I-1-C)
Actions taken / to be taken	The measured SS level was below the baseline Action Level. It was also within the range of baseline SS concentration (1 - 10.5 mg/L). General site cleaning and housekeeping, rebar fixing at Bay 23, formwork at Bay 23, horizontal drilling and GI monitoring were undertaken during measurement. No direct disturbance was observed from the site. Thus, the exceedance is considered to be contributed by natural variation and no action is required.
Remarks	The following mitigation measures were provided: (1) Waste water was collected and diverted to on-site waste water treatment plant for treatment before discharge; (2) Nullah and site area were separated by sealed concrete block wall and sandbags barrier.

Prepared by: Fan Cheong Tsang  
 Designation: Environmental Team Leader

Signature: 

Date: 14-Dec-10

**Photographic record for exceedance of Suspended Solid recorded at Sik Sik Yuen Ho Fung College (I-1) on 01-Dec-10**



Site photo



Photo taken at I-1



Photo taken at I-1C

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	03-Dec-10
Time	2:33 PM
Monitoring Location	O-1(FT)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.1 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location (mg/L)	7.38
Control Station	O-1-C(FT)
Measured Level (depth averaged) at Control Station (mg/L)	6.13
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(FT) was below the baseline Action/Limit Level but higher than 120% of the control station's SS level (O-1-C(FT)) at the same tide of the same day. Only rock removal was undertaken at Portion E. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed. Frame-type silt curtain had been employed at the derrick barge and marine works was confined in the frame-type silt curtain. In addition, red tide at Tsuen Wan Hoi Hing Road seashore was reported during the week from 26 November 2010 to 3 December 2010 contributing to high SS level. As such, the exceedance is considered to be contributed by natural variation and no further action is required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the derrick barge; (3) Rock removal operation was confined in the inner (frame/floating type) silt curtain; (4) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtain was rested on seabed; (5) Condition of silt curtain had been checked by the on-board supervisor daily before the start of any marine works activity; (6) Operator had been instructed to handle with due care and prevent fast lifting out of the grab from the inner (frame/floating type) silt curtain; (7) Closed grab had been used for dredging operation; and (8) the daily dredging rate was limited to less than 960 m <sup>3</sup> .
Remarks	None

Prepared by: F. C. Tsang

Designation: Environmental Team Leader

Signature: 

Date: 13-Dec-10

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(FT) on 03-Dec-10**



Site photo




Photo taken at O-1-C(ET)

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	01-Dec-10
Time	1:57 PM
Monitoring Location	O-1(FT)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.1 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location	7.93
Control Station	O-1-C(FT)
Measured Level (depth averaged) at Control Station (mg/L)	5.28
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(FT) was below the baseline Action/Limit Level but higher than 130% of the control station's SS level (O-1-C(FT)) at the same tide of the same day. Only rock fill removal from sea bed was undertaken at Portion E. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed. Frame-type silt curtain had been employed at the derrick barge and marine works was confined in the frame-type silt curtain. As such, the exceedance is considered to be contributed by natural variation and no further action is required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the derrick barge; (3) Rock removal operation was confined in the inner (frame/floating type) silt curtain; (4) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtain was rested on seabed; (5) Condition of silt curtain had been checked by the on-board supervisor daily before the start of any marine works activity; (6) Operator had been instructed to handle with due care and prevent fast lifting out of the grab from the inner (frame/floating type) silt curtain; (7) Closed grab had been used for dredging operation; and (8) the daily dredging rate was limited to less than 960 m <sup>3</sup> .
Remarks	None

Prepared by: F. C. Tsang  
 Designation: Environmental Team Leader  
 Signature:   
 Date: 16-Dec-10

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(FT) on 01-Dec-10**



Site photo



Photo taken at O-1-C(ET)

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	13-Dec-10
Time	6:20 PM
Monitoring Location	O-1(ET)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.1 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location	9.2
Control Station	O-1-C(ET)
Measured Level (depth averaged) at Control Station (mg/L)	5.18
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(ET) was below the baseline Action/Limit Level but higher than 130% of the control station's SS level (O-1-C(ET)) at the same tide of the same day. No marine works was undertaken at Portion E during measurement. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed and floating type silt curtain had been employed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang

Designation: Environmental Team Leader

Signature:



Date: 20-Dec-10

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(ET) on 13-Dec-10**




Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	06-Dec-10
Time	1:40 PM
Monitoring Location	Hong Hoi Chee Hong Temple (I-2)
Parameter	Suspended Solid
Action & Limit Levels (mg/L)	7.68 / 8.34
Measured Level (mg/L)	3.2
Possible reason for Action or Limit Level Non-compliance	A low SS level of 2.00 mg/L was recorded at Control Station (I-2-C)
Actions taken / to be taken	The measured SS level was below baseline Action / Limit Level and within the range of baseline SS concentration (1 - 8.5 mg/L) but was more than 130% of the SS level measured at the upstream control station (I-2-C). General site cleaning & housekeeping, excavation (drilling holes) at vortex drop shaft, excavation (drilling holes) at man access shaft, rock breaking for jacking pipe at Portion G and erection of 60 ton temporary steel platform at Portion G were undertaken during measurement. No direct disturbance was observed from the site. Thus, the exceedance was considered to be contributed by natural variation and no action was required.
Remarks	The following mitigation measures had been provided: (1) Waste water was collected and diverted to the on-site waste water treatment facilities before discharge; (2) Existing stream had been diverted and banded by sealed concrete block wall; (3) Existing stream had also been banded off by sand bag to prevent excavated material from washing out from the working area.

Prepared by: Fan Cheong Tsang  
 Designation: Environmental Team Leader  
 Signature:   
 Date: 22-Dec-10

Photographic record for exceedance of Suspended Solid recorded at Hong Hoi Chee Hong Temple (I-2) on 06-Dec-10



Site photo



Site photo



Photo taken at I-2C

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	15-Dec-10
Time	12:55 PM
Monitoring Location	O-1(FT)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.10 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location (mg/L)	5.82
Control Station	O-1-C(FT)
Measured Level (depth averaged) at Control Station (mg/L)	3.67
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(FT) was below the baseline Action/Limit Level but was higher than 130% of the control station's SS level (O-1-C(FT)) at the same tide of the same day. No marine works was undertaken on 15 December 2010. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed and floating type silt curtain had also been employed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang  
 Designation: Environmental Team Leader

Signature:



Date: 24-Dec-10

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(FT) on 15-Dec-10**



Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	15-Dec-10
Time	8:35 AM
Monitoring Location	O-1(ET)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	13.25 / 14.39 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location (mg/L)	5.53
Control Station	O-1-C(ET)
Measured Level (depth averaged) at Control Station (mg/L)	3.97
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(ET) was below the baseline Action/Limit Level but was higher than 130% of the control station's SS level (O-1-C(ET)) at the same tide of the same day. No marine works was undertaken on 15 December 2010. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed and floating type silt curtain had also been employed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang  
 Designation: Environmental Team Leader

Signature: 

Date: 24-Dec-10

Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(ET) on 15-Dec-10



Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	22-Dec-10
Time	9:20 AM
Monitoring Location	O-1(FT)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.10 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location (mg/L)	12.95
Control Station	O-1-C(FT)
Measured Level (depth averaged) at Control Station (mg/L)	10.4
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(FT) was below the baseline Action/Limit Level but was higher than 120% of the control station's SS level (O-1-C(FT)) at the same tide of the same day. Amour rock removal from the sea wall to the derrick barge at Portion E was undertaken during the measurement on 22 December 2010. As observed on site, silt curtains had been deployed along the marine works boundary line and extended from the seawater level to the seabed and floating type silt curtain had also been employed at the inner side to contain any SS dispersion within the construction site. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain was provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had also been employed at the inner side; (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed; and (4) Condition of silt curtains had been checked by the supervisor daily prior to marine works operation.
Remarks	None

Prepared by: F. C. Tsang  
 Designation: Environmental Team Leader  
 Signature:



Date: 30-Dec-10

Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(FT) on 22-Dec-10



Site photo




Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	24-Dec-10
Time	10:55 AM
Monitoring Location	Hong Hoi Chee Hong Temple (I-2)
Parameter	Suspended Solid
Action & Limit Levels (mg/L)	7.68 / 8.34
Measured Level (mg/L)	3.05
Possible reason for Action or Limit Level Non-compliance	A low SS level of 2.10 mg/L was recorded at Control Station (I-2-C)
Actions taken / to be taken	The measured SS level was below baseline Action / Limit Level and within the range of baseline SS concentration (1 - 8.5 mg/L) but was more than 130% of the SS level measured at the upstream control station (I-2-C). General site cleaning and housekeeping, excavation (drilling holes) at vortex drop shaft and excavation (drilling holes) at man access shaft, rock breaking for 16th jacking pipe at Portion G, erection of 60ton temporary steel platform at Portion G and excavation for 750 step channel (SC) and catchpit were undertaken during measurement. No direct disturbance was observed from the site. Thus, the exceedance was considered to be contributed by natural variation and no action was required.
Remarks	The following mitigation measures had been provided: 1) Waste water was collected to waste water treatment plant and treated before discharge; (2) existing stream has been diverted and bunded by sealed concrete block wall; and (3) existing stream had been bunded off by sand bag to prevent excavated material from washing out of the working area.

Prepared by: Fan Cheong Tsang  
 Designation: Environmental Team Leader  
 Signature:   
 Date: 04-Jan-11

**Photographic record for exceedance of Suspended Solid recorded at Hong Hoi Chee Hong Temple (I-2) on 24-Dec-10**



Site photo



Photo taken at I-2




Photo taken at I-2C

**Interim Notifications of Environmental Quality Limits Exceedances**

Incident Report on Action Level or Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	24-Dec-10
Time	10:16 AM
Monitoring Location	Squatters (I-3)
Parameter	Suspended Solid
Action & Limit Levels	6.13 / 7.23
Measured Level	4.15
Possible reason for Action or Limit Level Non-compliance	A low SS level of 2.00 mg/L was recorded at Control Station (I-3-C)
Actions taken / to be taken	The measured SS level was below baseline Action / Limit Level and within the range of baseline SS concentration (1 - 7.5 mg/L) but was more than 130% of the SS level measured at the upstream control station (I-3-C). General site cleaning and housekeeping, PB wall H-pile extension, approach channel extension; and shaft excavation were undertaken during measurement. No direct disturbance was observed from the site. Thus, the exceedance was considered to be contributed by natural variation and no action was required.
Remarks	Following mitigation measures were provided: (1) All waste water was collected and diverted to waste water treatment plant prior to discharge; (2) existing stream has been diverted and bunded by sealed concrete block wall; and (3) excavated area had been bunded and sealed by concrete block wall to prevent any excavated material runoff from working area.

Prepared by: Fan Cheong Tsang  
 Designation: Environmental Team Leader  
 Signature:   
 Date: 04-Jan-11

Photographic record for exceedance of Suspended Solid recorded at Squatters (I-3) on 24-Dec-10



Site photo



Photo taken at I-3



Photo taken at I-3C

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	24-Dec-10
Time	2:24 PM
Monitoring Location	O-1(ET)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.1 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location	9.82
Control Station	O-1-C(ET)
Measured Level (depth averaged) at Control Station (mg/L)	7.87
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(ET) was below the baseline Action/Limit Level but higher than 120% of the control station's SS level (O-1-C(ET)) at the same tide of the same day. No armour rock removal from the sea wall to the derrick barge at Portion E was undertaken during measurement. Silt curtains had been deployed along the dredging boundary line and extended from the seawater level to the seabed and floating type silt curtain had been employed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang

Designation: Environmental Team Leader

Signature:



Date: 04-Jan-11

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(ET) on 24-Dec-10**



Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	29-Dec-10
Time	1:20 PM
Monitoring Location	O-1(FT)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	14.1 / 18.08 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location	3.2
Control Station	O-1-C(FT)
Measured Level (depth averaged) at Control Station (mg/L)	2.37
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(FT) was below the baseline Action/Limit Level but higher than 130% of the control station's SS level (O-1-C(FT)) at the same tide of the same day. Derrick barge was under repair on that day and no marine works was undertaken at Portion E. Silt curtains werer deployed along the dredging boundary line and extended from the seawater level to the seabed. Floating type silt curtain were also deployed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang

Designation: Environmental Team Leader

Signature:



Date: 06-Jan-11

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(FT) on 29-Dec-10**



Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Limit Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	29-Dec-10
Time	6:20 PM
Monitoring Location	O-1(ET)
Parameter	Suspended Solids (SS)
Action & Limit Levels (mg/L)	13.25 / 14.39 (derived from the baseline monitoring data)
Measured Level (depth-averaged) at Monitoring Location	9.07
Control Station	O-1-C(ET)
Measured Level (depth averaged) at Control Station (mg/L)	6.03
Possible reason for Action or Limit Level Non-compliance	The measured SS level (depth-averaged) at O-1(ET) was below the baseline Action/Limit Level but higher than 130% of the control station's SS level (O-1-C(ET)) at the same tide of the same day. Derrick barge was under repair on that day and no marine works was undertaken at Portion E. Silt curtains werer deployed along the dredging boundary line and extended from the seawater level to the seabed. Floating type silt curtain were also deployed at the inner side. As such, the exceedance was considered to be contributed by natural variation and no further action was required.
Actions taken / to be taken	(1) Silt curtain had been provided along the Portion E boundary line and extended from seawater level to the bottom of seabed; (2) Floating type silt curtain had been employed at the inner side; and (3) Sufficient slack of silt curtain was allowed to cope with the wave and tidal action to ensure the curtains (outer and inner) were rested on seabed.
Remarks	None

Prepared by: F. C. Tsang

Designation: Environmental Team Leader

Signature:



Date: 06-Jan-11

**Photographic record for exceedance of Suspended Solids (SS) recorded at O-1(ET) on 29-Dec-10**




Site photo

**Interim Notification of Environmental Quality Limit Exceedance**

Incident Report on Action Level Non-compliance

Project	Tsuen Wan Drainage Tunnel
Date	31-Dec-10
Time	11:05 AM
Monitoring Location	Hong Hoi Chee Hong Temple (I-2)
Parameter	Suspended Solid
Action & Limit Levels (mg/L)	7.68 / 8.34
Measured Level (mg/L)	2.45
Possible reason for Action or Limit Level Non-compliance	A low SS level of 2.00 mg/L was recorded at Control Station (I-2-C)
Actions taken / to be taken	The measured SS level was below baseline Action / Limit Level and within the range of baseline SS concentration (1 - 8.5 mg/L) but was more than 120% of the SS level measured at the upstream control station (I-2-C). General site cleaning, housekeeping and temporary traffic arrangement (TTA), excavation (drilling holes) at vortex drop shaft, excavation (drilling holes and rock spilling) at man access shaft, closed formwork for dry flow channel, rock breaking for 16 <sup>th</sup> jacking pipe at Portion G; erection of 60 ton temporary steel platform at Portion G and excavation for 750 step channel (SC) and catchpit were undertaken during measurement. No direct disturbance was observed from the site. Thus, the exceedance was considered to be contributed by natural variation and no action was required.
Remarks	The following mitigation measures had been provided: (1) Waste water was collected to waste water treatment plant and treated before discharge; (2) existing stream has been diverted and bunded by sealed concrete block wall; and (3) existing stream had been bunded off by sand bag to prevent excavated material from washing out of the working area.

Prepared by: Fan Cheong Tsang  
 Designation: Environmental Team Leader  
 Signature:   
 Date: 07-Jan-11

**Photographic record for exceedance of Suspended Solid recorded at Hong Hoi Chee Hong Temple (I-2) on 31-Dec-10**



Site photo



Photo taken at I-2