

TMCLK - Northern Connection Sub-Sea Tunnel Section

Contract Dates

Site Possession Date				
Portions: X1,(N10,11,13 & 14) - Sth Landfall	0	06-Aug-15		0%

General Submissions

Environmental

Environmental Permit Submissions

Supplementary WMP of C&C Tunnel at Sth.Landfall				
Supplementary WMP of C&C Tunnel at Sth.Landfall	0		28-Jun-14	0%

Sediment Quality Report/Dumping Permit

Southern Landfall

Southern landfall - Commencement of Shaft & C&C Tunnel Dwall	0	03-Oct-15		0%
Southern Landfall - Retrieval Shaft Excavation to tentative MD layer	0	15-Apr-16		0%
Southern Landfall - Commencement of C&C Tunnel to tentative MD layer	0	02-Apr-16		0%

Sediment Sampling & Testing Plan (SSTP) - if required

Complete SSTP and Obtain EPD's approval	24	17-Feb-15	23-Mar-15	50%
---	----	-----------	-----------	-----

Sediment Quality Report (SQR) - if required

Advance Ground Investigation works for Sediment sampling	24	24-Mar-15	24-Apr-15	90%
Sediment Sample Testing & Report preparation	120	25-Apr-15	16-Sep-15	0%

Dumping Permit for Load Dumping (Loading Permit) - if required

Finalize the application document and submit to EPD - for Dwall	24	20-Jan-15	16-Feb-15	0%
Notify the results and issue Loading Permit for Local & Cross Boundary Crossing - for Dwall	24	17-Feb-15	23-Mar-15	0%

General Design Submissions

(G6) IFA for Tunnel GBP

SO's Review	35	29-Apr-14	02-Jun-14	93.94%
SO Approval with Condition Received	0		03-Jun-14	0%

PAYMENT MILESTONE

Design and Design Checking of the Works

MS 2.6 Approve AIP for seawall modification works at Southern Landfall by the Supervising Officer	0		29-Apr-17	100%
MS 2.20.3 Approve DDA for Cross Passages by the Supervising Officer by the Supervising Officer	0		31-Mar-15	0%
MS 2.32 Approve DDA for Approach Ramp Structures to Cut-and-cover Tunnels by the Supervising Officer	0		30-Apr-15	0%
MS 2.44 Approve DDA for South Ventilation Building by the Supervising Officer	0		30-Jun-15	0%
MS 2.48 Approve DDA for North Ventilation Building by the Supervising Officer	0		31-Jan-15	0%
MS 2.51 Submit DDA for Facilities Provision for TCSS	0		29-Nov-14	0%
MS 2.52 Approve DDA for Facilities Provision for TCSS by the Supervising Officer	0		28-Feb-15	0%
MS 2.56 Approve DDA for Drainage, Sewerage, Waterworks and Utilities at Southern Landfall by the Supervi	0		30-Apr-15	0%
MS 2.60 Approve DDA for Drainage, Sewerage, Waterworks and Utilities at Northern Landfall by the Supervi	0		31-Dec-14	0%
MS 2.69 Submit draft Operation and Maintenance Manual for all Tunnels and Cross Passgaes	0		29-Feb-16	0%
MS 2.70 Accept Operation and Maintenance Manual for all Tunnels and Cross Passgaes by the Supervising	0		30-Jun-16	0%
MS 2.71 Submit draft Operation and Maintenance Manual for all works except Tunnels and Cross Passgaes	0		29-Feb-16	0%
MS 2.72 Accept Operation and Maintenance Manual for all works except Tunnels and Cross Passgaes by the	0		30-Jun-16	0%

TBM Tunnel

MS 3.3.4 Complete walls of retrieval shaft	0		30-Jan-16	100%
MS 3.3.7 Completion of excavation, support and permanent lining for 1% of the total length (measured on pla	0		31-Dec-15	100%
MS 3.3.8 Completion of excavation, support and permanent lining for 2% of the total length (measured on pla	0		31-Dec-15	100%
MS 3.3.9 Completion of excavation, support and permanent lining for 3% of the total length (measured on pla	0		31-Dec-15	100%
MS 3.3.10 Completion of excavation, support and permanent lining for 4% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.11 Completion of excavation, support and permanent lining for 5% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.12 Completion of excavation, support and permanent lining for 6% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.13 Completion of excavation, support and permanent lining for 7% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.14 Completion of excavation, support and permanent lining for 8% of the total length (measured on pl	0		29-Feb-16	100%
MS 3.3.15 Completion of excavation, support and permanent lining for 9% of the total length (measured on pl	0		29-Feb-16	0%
MS 3.3.16 Completion of excavation, support and permanent lining for 10% of the total length (measured on p	0		29-Feb-16	0%
MS 3.3.17 Completion of excavation, support and permanent lining for 11% of the total length (measured on p	0		29-Feb-16	0%
MS 3.3.18 Completion of excavation, support and permanent lining for 12% of the total length (measured on p	0		31-Mar-16	0%
MS 3.3.19 Completion of excavation, support and permanent lining for 13% of the total length (measured on p	0		31-Mar-16	0%
MS 3.3.20 Completion of excavation, support and permanent lining for 14% of the total length (measured on p	0		31-Mar-16	0%
MS 3.3.21 Completion of excavation, support and permanent lining for 15% of the total length (measured on p	0		31-Mar-16	0%
MS 3.3.22 Completion of excavation, support and permanent lining for 16% of the total length (measured on p	0		31-Mar-16	0%
MS 3.3.23 Completion of excavation, support and permanent lining for 17% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.24 Completion of excavation, support and permanent lining for 18% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.25 Completion of excavation, support and permanent lining for 19% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.26 Completion of excavation, support and permanent lining for 20% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.27 Completion of excavation, support and permanent lining for 21% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.28 Completion of excavation, support and permanent lining for 22% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.29 Completion of excavation, support and permanent lining for 23% of the total length (measured on p	0		30-Apr-16	0%
MS 3.3.30 Completion of excavation, support and permanent lining for 24% of the total length (measured on p	0		31-May-16	0%
MS 3.3.31 Completion of excavation, support and permanent lining for 25% of the total length (measured on	0		31-May-16	0%
MS 3.3.32 Completion of excavation, support and permanent lining for 27.5% of the total length (measured o	0		31-May-16	0%
MS 3.3.33 Completion of excavation, support and permanent lining for 30% of the total length (measured on p	0		31-May-16	0%
MS 3.3.34 Completion of excavation, support and permanent lining for 32.5% of the total length (measured o	0		30-Jun-16	0%
MS 3.3.35 Completion of excavation, support and permanent lining for 35% of the total length (measured on p	0		30-Jun-16	0%
MS 3.3.36 Completion of excavation, support and permanent lining for 37.5% of the total length (measured o	0		30-Jun-16	0%
MS 3.3.37 Completion of excavation, support and permanent lining for 40% of the total length (measured on p	0		30-Jul-16	0%
MS 3.3.38 Completion of excavation, support and permanent lining for 42.5% of the total length (measured o	0		30-Jul-16	0%
MS 3.3.39 Completion of excavation, support and permanent lining for 45% of the total length (measured on p	0		30-Jul-16	0%
MS 3.3.40 Completion of excavation, support and permanent lining for 47.5% of the total length (measured o	0		30-Jul-16	0%
MS 3.3.41 Completion of excavation, support and permanent lining for 50% of the total length (measured on p	0		31-Aug-16	0%
MS 3.3.42 Completion of excavation, support and permanent lining for 52.5% of the total length (measured o	0		31-Aug-16	0%
MS 3.3.43 Completion of excavation, support and permanent lining for 55% of the total length (measured on p	0		31-Aug-16	0%
MS 3.3.44 Completion of excavation, support and permanent lining for 57.5% of the total length (measured o	0		31-Aug-16	0%
MS 3.3.45 Completion of excavation, support and permanent lining for 60% of the total length (measured on p	0		31-Aug-16	0%
MS 3.3.68 Completion of excavation, support and permanent lining for 7% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.69 Completion of excavation, support and permanent lining for 8% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.70 Completion of excavation, support and permanent lining for 9% of the total length (measured on pl	0		30-Jan-16	100%
MS 3.3.71 Completion of excavation, support and permanent lining for 10% of the total length (measured on p	0		29-Feb-16	100%

Legend:
█ Planned Bar
█ Planned Bar - Critical
◆ Planned Milestone
█ Progress bar
◆ Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16

Dragages Hong Kong
 A member of the Bouygues Construction group
 Dragages - Bouygues Joint Venture 寶嘉 - 布依格聯營

BOUYGUES
 CONSTRUCTION

Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJGEN/PRG/98507	WYu	SPo
08-Apr-14	TMCLKDBJGEN/PRG/98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJGEN/PRG/98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJGEN/PRG/98507 Rev.F	WYu	

Box Culvert Extension					2016							
Construction					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov
Ch000-010 Culvert Outfall												
Installation of temporary bulk head	26	10-Aug-15	08-Sep-15	100%								
Removal of public fill at outfall area	4	09-Sep-15	12-Sep-15	0%								
Cut sheet pile wall below water level by diver	18	14-Sep-15	06-Oct-15	0%								
CH000-150 Land Section												
ELS & Structure												
Pile A43/A41 CJ to Pile A41/A39 CJ												
Box Culvert Structure												
Pile cap construction	10	27-May-15	06-Jun-15	100%								
Base slab construction including kicker	6	19-Jun-15	26-Jun-15	0%								
Removal of strut S1	4	27-Jun-15	02-Jul-15	0%								
System formworks delivery & setup	14	03-Jul-15	18-Jul-15	0%								
Walls & top slab construction	6	20-Jul-15	25-Jul-15	0%								
Removal of strut S2 & Backfilling up to required level	6	03-Aug-15	08-Aug-15	0%								
Pile A45/A43 CJ to Pile A43/A41 CJ												
Box Culvert Structure												
Pile cap construction	10	08-Jun-15	18-Jun-15	100%								
Base slab construction including kicker	6	27-Jun-15	04-Jul-15	100%								
Removal of strut S1	4	06-Jul-15	09-Jul-15	100%								
Walls & top slab construction	6	27-Jul-15	01-Aug-15	0%								
Removal of strut S2 & Backfilling up to required level	6	10-Aug-15	15-Aug-15	0%								
Pile A47/A45 CJ to Pile A45/A43 CJ												
Box Culvert Structure												
Pile cap construction	10	19-Jun-15	02-Jul-15	100%								
Base slab construction including kicker	6	06-Jul-15	11-Jul-15	100%								
Removal of strut S1	4	13-Jul-15	16-Jul-15	100%								
Walls & top slab construction	6	03-Aug-15	08-Aug-15	0%								
Removal of strut S2 & Backfilling up to required level	6	17-Aug-15	22-Aug-15	0%								
Pile A49/A47 CJ to Pile A47/A45 CJ												
Box Culvert Structure												
Pile cap construction	10	03-Jul-15	14-Jul-15	100%								
Base slab construction including kicker	6	15-Jul-15	21-Jul-15	100%								
Removal of strut S1	4	22-Jul-15	25-Jul-15	100%								
Walls & top slab construction	6	10-Aug-15	15-Aug-15	100%								
Removal of strut S2 & Backfilling up to required level	6	24-Aug-15	29-Aug-15	0%								
Pile A52/A49 CJ to Pile A49/A47 CJ												
Box Culvert Structure												
Pile cap construction	10	22-Jul-15	01-Aug-15	100%								
Base slab construction including kicker	6	03-Aug-15	08-Aug-15	100%								
Removal of strut S1	4	10-Aug-15	13-Aug-15	100%								
Walls & top slab construction	6	17-Aug-15	22-Aug-15	100%								
Removal of strut S2 & Backfilling up to required level	6	31-Aug-15	05-Sep-15	0%								
Preparation for Temp Access Road for N8 handvoer	24	07-Sep-15	06-Oct-15	0%								
Ch150-250 Marine Section												
ELS & Structure												
Dewatering well installation Ch180-250	12	19-Jun-15	04-Jul-15	100%								
Dewatering well installation Ch100-180	12	06-Jul-15	18-Jul-15	100%								
1st Pumping test	18	20-Jul-15	08-Aug-15	100%								
Toe grouting Ch100-250	95	07-Sep-15	31-Dec-15	94%								
2nd Pumping test Ch100-250	29	02-Jan-16	04-Feb-16	0%								
Pile A41/A39 CJ to Pile A39/A37 CJ												
ELS												
Excavation to 0.5m below strut S2	4	05-Feb-16	16-Feb-16	0%								
Installation of strut S2	6	17-Feb-16	23-Feb-16	0%								
Excavation to 0.5m below strut S1	5	24-Feb-16	29-Feb-16	0%								
Installation of strut S1	5	01-Mar-16	05-Mar-16	0%								
Excavation to FEL	5	07-Mar-16	11-Mar-16	0%								
Box Culvert Structure												
Pile cap construction	10	18-Mar-16	01-Apr-16	0%								
Base slab construction including kicker	6	15-Apr-16	21-Apr-16	0%								
Removal of strut S1	4	22-Apr-16	26-Apr-16	0%								
Sliding formworks 1st assembly	18	27-Apr-16	19-May-16	0%								
Walls & top slab construction	6	20-May-16	26-May-16	0%								
Removal of strut S2 & Backfilling up to required level	6	03-Jun-16	10-Jun-16	0%								
Pile A39/A37 CJ to Pile A37/A35 CJ												
ELS												
Excavation to 0.5m below strut S2	4	17-Feb-16	20-Feb-16	0%								
Installation of strut S2	6	22-Feb-16	27-Feb-16	0%								
Excavation to 0.5m below strut S1	5	01-Mar-16	05-Mar-16	0%								
Installation of strut S1	5	07-Mar-16	11-Mar-16	0%								
Excavation to FEL	5	12-Mar-16	17-Mar-16	0%								
Box Culvert Structure												
Pile cap construction	10	02-Apr-16	14-Apr-16	0%								
Base slab construction including kicker	6	22-Apr-16	28-Apr-16	0%								
Removal of strut S1	4	29-Apr-16	04-May-16	0%								
Walls & top slab construction	6	27-May-16	02-Jun-16	0%								
Removal of strut S2 & Backfilling up to required level	6	11-Jun-16	17-Jun-16	0%								
Pile A37/A35 CJ to Pile A35/A33 CJ												
ELS												
Excavation to 0.5m below strut S2	4	22-Feb-16	25-Feb-16	0%								
Installation of strut S2	6	26-Feb-16	03-Mar-16	0%								
Excavation to 0.5m below strut S1	5	07-Mar-16	11-Mar-16	0%								
Installation of strut S1	5	12-Mar-16	17-Mar-16	0%								
Excavation to FEL	5	18-Mar-16	23-Mar-16	0%								
Box Culvert Structure												

	Planned Bar
	Planned Bar - Critical
	Planned Milestone
	Progress bar
	Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016											
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov				
Pile cap construction	10	15-Apr-16	26-Apr-16	0%	[Gantt chart bar for Pile cap construction]											
Base slab construction including kicker	6	29-Apr-16	06-May-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	07-May-16	11-May-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	03-Jun-16	10-Jun-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	18-Jun-16	24-Jun-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile A35/A33 CJ to Pile A33/P117 CJ																
ELS																
Excavation to 0.5m below strut S2	4	26-Feb-16	01-Mar-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S2]											
Installation of strut S2	6	02-Mar-16	08-Mar-16	0%	[Gantt chart bar for Installation of strut S2]											
Excavation to 0.5m below strut S1	5	12-Mar-16	17-Mar-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	18-Mar-16	23-Mar-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	24-Mar-16	01-Apr-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Pile cap construction	10	27-Apr-16	09-May-16	0%	[Gantt chart bar for Pile cap construction]											
Base slab construction including kicker	6	10-May-16	17-May-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	18-May-16	21-May-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	11-Jun-16	17-Jun-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	25-Jun-16	02-Jul-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile A33/P117 CJ to Pile P113/P109 CJ																
ELS																
Excavation to 0.5m below strut S1	9	09-Mar-16	18-Mar-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	19-Mar-16	24-Mar-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	02-Apr-16	08-Apr-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	18-May-16	24-May-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	25-May-16	28-May-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	18-Jun-16	24-Jun-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	04-Jul-16	09-Jul-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile P113/P109 CJ to Pile P105/P101 CJ																
ELS																
Excavation to 0.5m below strut S1	9	17-Mar-16	30-Mar-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	31-Mar-16	06-Apr-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	09-Apr-16	14-Apr-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	25-May-16	31-May-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	01-Jun-16	04-Jun-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	25-Jun-16	02-Jul-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	11-Jul-16	16-Jul-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile P105/P101 CJ to Pile P97/P93 CJ																
ELS																
Excavation to 0.5m below strut S1	9	29-Mar-16	08-Apr-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	09-Apr-16	14-Apr-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	15-Apr-16	20-Apr-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	01-Jun-16	07-Jun-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	08-Jun-16	13-Jun-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	04-Jul-16	09-Jul-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	18-Jul-16	23-Jul-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile P97/P93 CJ to Pile P89/P85 CJ																
ELS																
Excavation to 0.5m below strut S1	9	07-Apr-16	16-Apr-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	18-Apr-16	22-Apr-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	23-Apr-16	28-Apr-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	08-Jun-16	15-Jun-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	16-Jun-16	20-Jun-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	11-Jul-16	16-Jul-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	25-Jul-16	30-Jul-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile P89/P85 CJ to Pile P81/P77 CJ																
ELS																
Excavation to 0.5m below strut S1	9	15-Apr-16	25-Apr-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	26-Apr-16	30-Apr-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	03-May-16	07-May-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	16-Jun-16	22-Jun-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	23-Jun-16	27-Jun-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	18-Jul-16	23-Jul-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	01-Aug-16	06-Aug-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Pile P81/P77 CJ to Pile P73/P69 CJ																
ELS																
Excavation to 0.5m below strut S1	9	23-Apr-16	04-May-16	0%	[Gantt chart bar for Excavation to 0.5m below strut S1]											
Installation of strut S1	5	05-May-16	10-May-16	0%	[Gantt chart bar for Installation of strut S1]											
Excavation to FEL	5	11-May-16	17-May-16	0%	[Gantt chart bar for Excavation to FEL]											
Box Culvert Structure																
Base slab construction including kicker	6	23-Jun-16	29-Jun-16	0%	[Gantt chart bar for Base slab construction including kicker]											
Removal of strut S1	4	30-Jun-16	05-Jul-16	0%	[Gantt chart bar for Removal of strut S1]											
Walls & top slab construction	6	25-Jul-16	30-Jul-16	0%	[Gantt chart bar for Walls & top slab construction]											
Removal of strut S2 & Backfilling up to required level	6	08-Aug-16	13-Aug-16	0%	[Gantt chart bar for Removal of strut S2 & Backfilling up to required level]											
Ch250-380 Marine Section																
Installation of Dewatering & Observation Well Ch 250-380	23	04-Nov-15	30-Nov-15	0%	[Gantt chart bar for Installation of Dewatering & Observation Well Ch 250-380]											
1st Pumping Test & Analysis	17	01-Dec-15	19-Dec-15	0%	[Gantt chart bar for 1st Pumping Test & Analysis]											
Toe Grouting	106	21-Dec-15	07-May-16	0%	[Gantt chart bar for Toe Grouting]											
2nd Pumping test & Analysis	25	08-Apr-16	07-May-16	0%	[Gantt chart bar for 2nd Pumping test & Analysis]											
Remaining toe grouting Ch250-380	51	09-May-16	09-Jul-16	0%	[Gantt chart bar for Remaining toe grouting Ch250-380]											
Miscellaneous works																
Inspection Manhole (IM)																
Inspection Manhole IM-05 to IM-08 & backfilling to +6.0mPD	18	15-Aug-16	03-Sep-16	0%	[Gantt chart bar for Inspection Manhole IM-05 to IM-08 & backfilling to +6.0mPD]											

- Planned Bar
- Planned Bar - Critical
- ◆ Planned Milestone
- Progress bar
- ◆ Progress Milestone



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016								
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	
Balance Hole (BH)													
BH-01 to BH-03 & backfilling to +6.0mPD	18	07-Sep-15	26-Sep-15	0%									
BH-04 to BH-06 & backfilling to +6.0mPD	18	05-Sep-16	26-Sep-16	0%									
North Launching Shaft													
Design Submission													
(C1) DDA for North Approach Ramp Permanent Structure													
IPs Review	28	23-Oct-14	19-Nov-14	92%									
IP's No Objection Received	0		19-Nov-14	0%									
SO's Review	35	23-Oct-14	26-Nov-14	91%									
SO Approval with Condition Received	0		26-Nov-14	0%									
North Ventilation Shaft													
Construction													
North Ventilation Shaft Structure													
NVS - ML03 Tunnel Structure	47	24-May-16	20-Jul-16	0%									
NVS - ML02 Tunnel Structure	44	05-Apr-16	27-May-16	1%									
TMCLK VO-008 - Construction of Viaduct Foundations at Portion N6A													
Viaduct Pile Cap													
Construction													
Pier G1c													
Pile Cap G1c - Preparation for ELS	6	24-Oct-14	30-Oct-14	0%									
Pile Cap G1c - Removal of Existing ground slab	6	31-Oct-14	06-Nov-14	0%									
Pile Cap G1c - Excavation & ELS Installation	12	07-Nov-14	20-Nov-14	0%									
Pile Cap G1c - Blinding Concrete	3	21-Nov-14	24-Nov-14	0%									
Pile Cap G1c - Rebar & Concreting	18	25-Nov-14	15-Dec-14	0%									
Pile Cap G1c - Backfilling & Temp Reinstatement	6	16-Dec-14	22-Dec-14	0%									
Pier H1c													
Pile Cap H1c - Preparation for ELS	6	02-Nov-15	07-Nov-15	0%									
Pile Cap H1c - Removal of Existing ground slab	6	09-Nov-15	14-Nov-15	0%									
Pile Cap H1c - Excavation & ELS Installation	12	16-Nov-15	28-Nov-15	0%									
Pile Cap H1c - Blinding Concrete	3	30-Nov-15	02-Dec-15	0%									
North Approach TBM Tunnelling & Cross Passage													
Construction													
North Approach Tunnel Internal Structure - NB													
NB - North TBM Tunnel - Invert Backfilling (Ch6688 to 6560 - 128m) Stage 1	54	01-Apr-16	26-May-16	100%									
NB - North TBM Tunnel - Invert Precast Gallery Installation (Ch6870 to 6688 - 182m)	77	29-Dec-15	18-Mar-16	100%									
NB - North TBM Tunnel - Invert Precast Gallery Installation (Ch6688 to 6560 - 128m)	54	13-Apr-16	07-Jun-16	100%									
NB - North TBM Tunnel - Invert Backfilling (Ch6870 to 6688 - 182m) Stage 2	77	19-Jan-16	11-Apr-16	100%									
NB - North TBM Tunnel - Invert Backfilling (Ch6688 to 6560 - 128m) Stage 2	54	28-Apr-16	23-Jun-16	100%									
CP55 - Excavation & Lining completion	0		14-Jun-16	0%									
CP54 - Excavation & Lining completion	0		31-Aug-16	0%									
CP53 - Excavation & Lining completion	0		16-Mar-16	100%									
CP52 - Excavation & Lining completion	0		22-Apr-16	100%									
CP50 - Excavation & Lining completion	0		26-Jul-16	0%									
NB - North TBM Tunnel - Corbel & Cable Trough installation	42	31-Aug-16	22-Oct-16	0%									
NB - North TBM Tunnel - OHVD Slab installation	42	07-Sep-16	29-Oct-16	0%									
NB - North TBM Tunnel - Fire proofing and Provision to E&MS and TCSS Contract for KD1	42	14-Sep-16	05-Nov-16	0%									
North Approach Tunnel Internal Structure - SB													
SB - North TBM Tunnel - Invert Backfilling (Ch6870 to 6688 - 182m)	77	01-Jan-16	21-Mar-16	100%									
SB - North TBM Tunnel - Invert Backfilling (Ch6688 to 6560 - 128m)	54	21-Mar-16	18-May-16	100%									
North Approach Cross Passage													
CP55 - Traditional Method													
CP Setup	6	21-Mar-16	31-Mar-16	100%									
1st Segment Opening	7	31-Mar-16	09-Apr-16	50%									
CP Excavation	14	09-Apr-16	26-Apr-16	0%									
CP Lining	14	26-Apr-16	13-May-16	0%									
2nd Segment Opening	7	13-May-16	23-May-16	0%									
CP Finishing & Demobilization	18	23-May-16	14-Jun-16	0%									
CP54 - Traditional Method													
CP Setup	6	14-Jun-16	21-Jun-16	100%									
1st Segment Opening	7	21-Jun-16	29-Jun-16	100%									
CP Excavation	14	29-Jun-16	16-Jul-16	100%									
CP Lining	14	16-Jul-16	02-Aug-16	100%									
2nd Segment Opening	7	02-Aug-16	10-Aug-16	100%									
CP Finishing & Demobilization	18	10-Aug-16	31-Aug-16	90%									
CP53 - Pipe Jacking Method													
CP - Pipe Jacking Method - Break out & Pipe Jacking TBM Removal	10	10-Feb-16	20-Feb-16	100%									
CP - Waterproofing, Finishing	21	20-Feb-16	16-Mar-16	0%									
CP52 - Pipe Jacking Method													
CP - Pipe Jacking TBM - Delivery, Assembly & Setup	23	01-Feb-16	05-Mar-16	100%									
CP - Pipe Jacking Method - Break-in, Excavation & Lining Installation	9	05-Mar-16	14-Mar-16	100%									
CP - Pipe Jacking Method - Break out & Pipe Jacking TBM Removal	10	14-Mar-16	24-Mar-16	100%									
CP Finishing & Demobilization	21	24-Mar-16	22-Apr-16	0%									
CP51 - Traditional Method													
CP51 Platform Available from ML03 North Approach Tunnel Backfilling	0	31-Mar-16		100%									
CP Setup	6	31-Aug-16	07-Sep-16	100%									
1st Segment Opening	7	07-Sep-16	14-Sep-16	100%									
CP Excavation	14	14-Sep-16	28-Sep-16	100%									
CP Lining	14	28-Sep-16	12-Oct-16	100%									
2nd Segment Opening	7	12-Oct-16	19-Oct-16	100%									
CP Finishing & Demobilization	18	19-Oct-16	09-Nov-16	0%									
CP50 - Pipe Jacking Method													
CP50 Platform Available from ML03 North Approach Tunnel Backfilling	0	16-May-16		100%									
CP50 Platform Available from ML02 North Approach Tunnel Backfilling	0	09-Apr-16		100%									
CP Setup	23	16-May-16	11-Jun-16	100%									
CP - Pipe Jacking Method - Break-in, Excavation & Lining Installation	9	12-Jun-16	21-Jun-16	56%									
CP - Pipe Jacking Method - Break out & Pipe Jacking TBM Removal	10	22-Jun-16	01-Jul-16	0%									
CP Finishing & Demobilization	21	02-Jul-16	26-Jul-16	0%									

■ Planned Bar
■ Planned Bar - Critical
◆ Planned Milestone
■ Progress bar
◆ Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

North Ventilation Building				
Design Submission				
(A11) Submissions to Design Advisory Panel of ArchSD				
ArchSD's comment	30	10-Jun-14	09-Jul-14	93%
(I1) DDA for North Vent.Bldgs. GBP & Arch.Submission				
IPs Review	28	21-Aug-14	17-Sep-14	92%
IP's No Objection Received	0		17-Sep-14	0%
SO's Review	35	21-Aug-14	24-Sep-14	94%
SO Approval with Condition Received	0		24-Sep-14	0%
(I1) DDA for North & South Vent.Bldg. ABWF works				
Preparation of DDANorth & South ABWF	18	25-Sep-14	17-Oct-14	100%
Review & Comment by JV	24	18-Oct-14	14-Nov-14	91%
Designer prepare DDA	15	15-Nov-14	02-Dec-14	0%
Formal Submission of DDA to ICE/ IPs	0		02-Dec-14	0%
Advanced Submission to SO	0		02-Dec-14	0%
IPs/ SO's Advance Comments/ ICE Comments	28	03-Dec-14	30-Dec-14	0%
Comments Received	0		30-Dec-14	0%
Designer to Reply RfC + Update Submission	21	31-Dec-14	24-Jan-15	0%
Submit Updated DDA to SO/ ICE/ IPs	0	26-Jan-15		0%
ICE Approval & Issue Check Cert	18	26-Jan-15	14-Feb-15	0%
IPs Review	28	26-Jan-15	22-Feb-15	0%
SO's Review	35	26-Jan-15	01-Mar-15	0%
(I2) DDA for North Vent.Bldgs.Structural Design incl.Vent.Connections				
IPs Review	28	24-Dec-14	20-Jan-15	92%
IP's No Objection Received	0		20-Jan-15	0%
SO's Review	35	24-Dec-14	27-Jan-15	92%
SO Approval with Condition Received	0		27-Jan-15	0%
(I3) DDA for North & South Vent.Bldgs. Service and E&M Provision				
Designer to Reply RfC + Update Submission	21	18-Dec-14	14-Jan-15	90%
Submit Updated DDA to SO/ ICE/ IPs	0	15-Jan-15		0%
ICE Approval & Issue Check Cert	12	15-Jan-15	28-Jan-15	0%
Submit ICE Check Cert to SO	6	29-Jan-15	04-Feb-15	0%
IPs Review	28	15-Jan-15	11-Feb-15	0%
IP's No Objection Received	0		11-Feb-15	0%
SO's Review	35	15-Jan-15	18-Feb-15	0%
SO Approval with Condition Received	0		18-Feb-15	0%
(C3) DDA for North Vent Shaft & Duct Permanent Structure				
ICE Approval & Issue Check Cert	12	22-Nov-14	05-Dec-14	100%
Submit ICE Check Cert to SO	6	06-Dec-14	12-Dec-14	100%
IPs Review	28	22-Nov-14	19-Dec-14	100%
IP's No Objection Received	0		19-Dec-14	100%
SO's Review	35	22-Nov-14	26-Dec-14	100%
SO Approval with Condition Received	0		27-Dec-14	100%

Construction

Substructure	120	04-Jul-16	24-Nov-16	0%
--------------	-----	-----------	-----------	----

North Surface Roadworks, Utility & Drainage works

Design Submission				
(A20) DDA for Traffic Sign, Road Marking, Street Furnitures, Sign Gantry & etc				
SO's Review	35	11-Dec-14	14-Jan-15	100%
SO Approval with Condition Received	0		14-Jan-15	100%
(C2) DDA for Sewerage, Drainage, Waterworks & Utility works for North Landfall				
IPs Review	28	08-Nov-14	05-Dec-14	92%
IP's No Objection Received	0		05-Dec-14	0%
SO's Review	35	08-Nov-14	12-Dec-14	94%
SO Approval with Condition Received	0		12-Dec-14	0%

Sub-sea Tunnel

Sub-sea TBM Tunnelling

Major Procurement

Precast Segment ID12.40 - Production for Sub-sea TBM Tunnel				
ID12.40 TBM Segment Ring Fabrication - 12 rings per day	300	22-Nov-14	19-Dec-15	67%

Design Submission

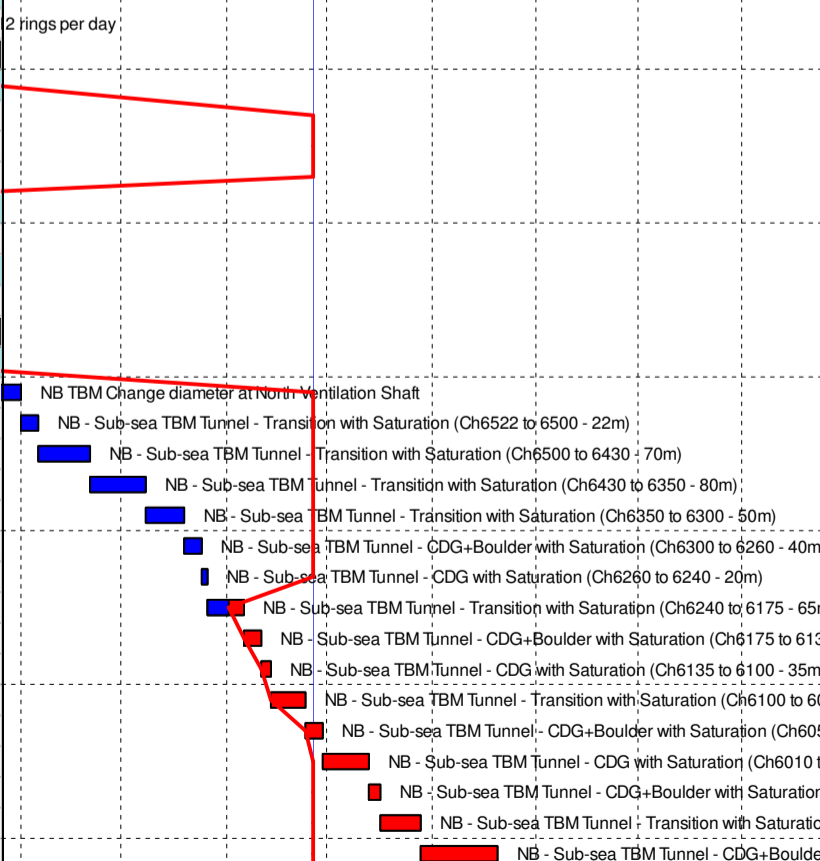
(B6) Risk Assessment of Submarine Cable - Tunnelling Works				
CLP Review (4 weeks)	28	17-Mar-15	13-Apr-15	100%
CLP Comment Received	0		13-Apr-15	100%
SO's Condition Approval	35	12-Mar-15	15-Apr-15	100%

(G1) DDA for TBM Tunnel Lining Structural Design - Sub-sea tunnel				
Sub-sea TBM Tunnel Segment - Fabrication	265	06-Oct-14	29-Aug-15	71%

(G3) DDA for TBM Tunnel Internal Structures (Sub-sea)				
Sub-sea Tunnel - Precast Gallery Fabrication	244	22-Jan-15	21-Nov-15	38%

Construction

Sub-sea TBM Tunnel - NB ID12.2m - S881				
NB TBM Change diameter at North Ventilation Shaft	87	30-Dec-15	01-Apr-16	100%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6522 to 6500 - 22m)	5	01-Apr-16	06-Apr-16	100%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6500 to 6430 - 70m)	15	06-Apr-16	21-Apr-16	100%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6430 to 6350 - 80m)	17	21-Apr-16	08-May-16	100%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6350 to 6300 - 50m)	10	08-May-16	19-May-16	100%
NB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6300 to 6260 - 40m)	5	19-May-16	24-May-16	100%
NB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6260 to 6240 - 20m)	2	24-May-16	26-May-16	100%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6240 to 6175 - 65m)	11	26-May-16	06-Jun-16	17%
NB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6175 to 6135 - 40m)	5	06-Jun-16	11-Jun-16	0%
NB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6135 to 6100 - 35m)	3	11-Jun-16	14-Jun-16	0%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6100 to 6050 - 50m)	9	14-Jun-16	24-Jun-16	0%
NB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6050 to 6010 - 40m)	5	24-Jun-16	29-Jun-16	0%
NB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6010 to 5830 - 180m)	14	29-Jun-16	13-Jul-16	0%
NB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch5830 to 5810 - 20m)	2	13-Jul-16	16-Jul-16	0%
NB - Sub-sea TBM Tunnel - Transition with Saturation (Ch5810 to 5740 - 70m)	12	16-Jul-16	28-Jul-16	0%
NB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch5740 to 5550 - 190m)	22	28-Jul-16	20-Aug-16	0%








■ Planned Bar
■ Planned Bar - Critical
◆ Planned Milestone
■ Progress bar
◆ Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
Detailed Works Programme (Rev. F)
Three Months Rolling Programme
Progress as of 26-Jun-16



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016												
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov					
NB - Sub-sea TBM Tunnel - CDG with Saturation (Ch5550 to 5330 - 220m)	18	20-Aug-16	07-Sep-16	0%													
NB - Sub-sea TBM Tunnel - CDG with Saturation (Ch5330 to 4950 - 380m)	30	07-Sep-16	07-Oct-16	0%													
Sub-sea TBM Tunnel - SB ID12.2m - S882																	
SB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6451 to 6371 - 80m)	17	30-Jan-16	19-Feb-16	100%													
SB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6321 to 6281 - 40m)	5	29-Feb-16	05-Mar-16	100%													
SB - Sub-sea TBM Tunnel - Steel Bell dismantling & Reconnect for NVS supply	27	05-Mar-16	04-Apr-16	100%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6281 to 6261 - 20m)	2	04-Apr-16	06-Apr-16	100%													
SB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6261 to 6196 - 65m)	11	06-Apr-16	17-Apr-16	100%													
SB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6196 to 6156 - 40m)	5	17-Apr-16	22-Apr-16	100%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6156 to 6121 - 35m)	3	22-Apr-16	25-Apr-16	100%													
SB - Sub-sea TBM Tunnel - Transition with Saturation (Ch6121 to 6071 - 50m)	9	25-Apr-16	04-May-16	100%													
SB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch6071 to 6031 - 40m)	5	04-May-16	09-May-16	100%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch6031 to 5851 - 180m)	14	09-May-16	24-May-16	100%													
SB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch5851 to 5831 - 20m)	2	24-May-16	26-May-16	100%													
SB - Sub-sea TBM Tunnel - Transition with Saturation (Ch5831 to 5761 - 70m)	12	26-May-16	07-Jun-16	100%													
SB - Sub-sea TBM Tunnel - CDG+Boulder with Saturation (Ch5761 to 5571 - 190m)	22	07-Jun-16	30-Jun-16	100%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch5571 to 5351 - 220m)	18	30-Jun-16	19-Jul-16	0%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch5351 to 4971 - 380m)	30	19-Jul-16	19-Aug-16	0%													
SB - Sub-sea TBM Tunnel - CDG with Saturation (Ch4971 to 4891 - 80m)	6	19-Aug-16	25-Aug-16	0%													
SB - Sub-sea TBM Tunnel - ALLUVIUMS silty with Trimix (Ch4891 to 4771 - 120)	8	25-Aug-16	02-Sep-16	0%													
SB - Sub-sea TBM Tunnel - ALLUVIUMS sandy with Trimix (Ch4771 to 4621 - 150m)	10	02-Sep-16	12-Sep-16	0%													
SB - Sub-sea TBM Tunnel - ALLUVIUMS sandy with Trimix (Ch4621 to 4421 - 200m)	13	12-Sep-16	25-Sep-16	0%													
SB - Sub-sea TBM Tunnel - ALLUVIUMS silty with Trimix (Ch4421 to 4321 - 100m)	6	25-Sep-16	01-Oct-16	0%													
Sub-sea TBM Tunnel - NB - Precast Invert Gallery																	
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP48	16	26-May-16	11-Jun-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP47	12	11-Jun-16	24-Jun-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP46	9	24-Jun-16	03-Jul-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP45	10	03-Jul-16	13-Jul-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP44	14	13-Jul-16	28-Jul-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP43	11	28-Jul-16	08-Aug-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP42	11	08-Aug-16	20-Aug-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP41	9	20-Aug-16	29-Aug-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP40	9	29-Aug-16	07-Sep-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP39	3	07-Sep-16	10-Sep-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP38	8	12-Sep-16	20-Sep-16	0%													
NB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP37	8	20-Sep-16	28-Sep-16	0%													
Sub-sea TBM Tunnel - SB - Precast Invert Gallery																	
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP48	14	04-Apr-16	18-Apr-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP47	11	18-Apr-16	29-Apr-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP46	11	29-Apr-16	10-May-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP45	8	10-May-16	19-May-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP44	8	19-May-16	27-May-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP43	15	27-May-16	11-Jun-16	100%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP42	13	11-Jun-16	25-Jun-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP41	10	25-Jun-16	05-Jul-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP40	8	05-Jul-16	13-Jul-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP39	9	13-Jul-16	23-Jul-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP38	7	23-Jul-16	30-Jul-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP37	8	30-Jul-16	07-Aug-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP36	8	07-Aug-16	16-Aug-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP35	7	16-Aug-16	23-Aug-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP34	7	23-Aug-16	30-Aug-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP33	16	30-Aug-16	15-Sep-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP32	6	15-Sep-16	21-Sep-16	0%													
SB - Sub-sea TBM Tunnel - Precast Invert Gallery - Completion to CP31	10	21-Sep-16	01-Oct-16	0%													

	Planned Bar
	Planned Bar - Critical
	Planned Milestone
	Progress bar
	Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYU	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYU
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYU
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYU	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016											
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov				
CP - Pipe Jacking Method - Break-in & Excavation	10	13-Aug-16	23-Aug-16	0%												
CP - Pipe Jacking Method - Break-out & Demobilization	12	23-Aug-16	04-Sep-16	0%												
CP - Remaining Internal Structure & Finishing	21	05-Sep-16	29-Sep-16	0%												
CP44 - ML03 - Ch6095																
CP - Pipe Jacking Method - Setup & Assembly	23	06-Aug-16	02-Sep-16	0%												
CP - Pipe Jacking Method - Break-in & Excavation	10	02-Sep-16	12-Sep-16	0%												
CP - Pipe Jacking Method - Break-out & Demobilization	12	12-Sep-16	24-Sep-16	0%												
CP - Remaining Internal Structure & Finishing	21	24-Sep-16	21-Oct-16	0%												
CP43 - ML03 - Ch5996																
CP - Pipe Jacking Method - Setup & Assembly	23	11-Aug-16	07-Sep-16	0%												
CP - Pipe Jacking Method - Break-in & Excavation	10	07-Sep-16	17-Sep-16	0%												
CP - Pipe Jacking Method - Break-out & Demobilization	12	17-Sep-16	29-Sep-16	0%												
CP42 - ML03 - Ch5898																
CP - Pipe Jacking Method - Setup & Assembly	23	29-Aug-16	26-Sep-16	0%												
CP41 - ML03 - Ch5800																
CP - Pipe Jacking Method - Setup & Assembly	23	02-Sep-16	30-Sep-16	0%												
CP40 - ML03 - Ch5703																
CP - Pipe Jacking Method - Setup & Assembly	23	10-Sep-16	11-Oct-16	0%												
CP39 - ML03 - Ch5607																
CP - Pipe Jacking Method - Setup & Assembly	23	20-Sep-16	19-Oct-16	0%												
Sub-sea TBM Tunnel - NB - Remaining Internal Structure																
NB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP48	5	08-Aug-16	13-Aug-16	0%												
NB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP47	5	13-Aug-16	19-Aug-16	0%												
NB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP46	5	30-Aug-16	04-Sep-16	0%												
NB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP45	5	05-Sep-16	09-Sep-16	0%												
NB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP44	5	24-Sep-16	29-Sep-16	0%												
NB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP48	4	13-Aug-16	18-Aug-16	0%												
NB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP47	4	19-Aug-16	23-Aug-16	0%												
NB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP46	4	04-Sep-16	08-Sep-16	0%												
NB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP45	4	10-Sep-16	13-Sep-16	0%												
NB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP48	4	18-Aug-16	22-Aug-16	0%												
NB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP47	4	23-Aug-16	27-Aug-16	0%												
NB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP46	4	08-Sep-16	12-Sep-16	0%												
NB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP45	4	14-Sep-16	17-Sep-16	0%												
Sub-sea TBM Tunnel - SB - Remaining Internal Structure																
SB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP48	5	08-Aug-16	13-Aug-16	0%												
SB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP47	5	13-Aug-16	19-Aug-16	0%												
SB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP46	5	30-Aug-16	04-Sep-16	0%												
SB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP45	5	05-Sep-16	09-Sep-16	0%												
SB - Sub-sea TBM Tunnel - Corbel & Cable Trough - Completion to CP44	5	24-Sep-16	29-Sep-16	0%												
SB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP48	5	13-Aug-16	19-Aug-16	0%												
SB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP47	5	19-Aug-16	24-Aug-16	0%												
SB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP46	5	04-Sep-16	09-Sep-16	0%												
SB - Sub-sea TBM Tunnel - OHVD Slab installation - Completion to CP45	5	10-Sep-16	14-Sep-16	0%												
SB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP48	5	19-Aug-16	24-Aug-16	0%												
SB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP47	5	24-Aug-16	29-Aug-16	0%												
SB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP46	5	09-Sep-16	14-Sep-16	0%												
SB - Sub-sea TBM Tunnel - Fire Proofing - Completion to CP45	5	14-Sep-16	19-Sep-16	0%												

Southern Landfall				
South Cut & Cover Tunnel				
Design Submission				
(E2) DDA for South C&C Box & Approach Ramp				
Review & Comment by JV	18	09-Dec-14	31-Dec-14	88%
Designer prepare DDA	10	02-Jan-15	13-Jan-15	0%
Formal Submission of DDA to ICE/ IPs	0		13-Jan-15	0%
Advanced Submission to SO	0		13-Jan-15	0%
IPs/ SO's Advance Comments/ ICE Comments	28	14-Jan-15	10-Feb-15	0%
Comments Received	0		10-Feb-15	0%
Designer to Reply RfC + Update Submission	21	11-Feb-15	13-Mar-15	0%
Submit Updated DDA to SO/ ICE/ IPs	0	14-Mar-15		0%
ICE Approval & Issue Check Cert	18	14-Mar-15	08-Apr-15	0%
Submit ICE Check Cert to SO	6	09-Apr-15	15-Apr-15	0%
IPs Review	28	14-Mar-15	10-Apr-15	0%
SO's Review	35	14-Mar-15	17-Apr-15	0%
Method Statement Submission				
Method Statement of Construction Methodology of C&C Tunnels				
Preparation Method Statement for C&C Tunnels	25	28-Mar-15	30-Apr-15	0%
Submit Method Statement to SO	0		30-Apr-15	0%
SO Reviews & Comments	28	01-May-15	28-May-15	0%
Re-submission	18	29-May-15	18-Jun-15	0%
SO's Review	28	19-Jun-15	16-Jul-15	0%
Construction				
C&C Tunnel - 1st 85m - Excavation by ramp	23	03-Mar-16	01-Apr-16	0%
C&C Tunnel - 1st 85m - Excavation by vertical mean	11	02-Apr-16	15-Apr-16	0%
C&C Tunnel - 1st 85m - Tunnel Structure	95	16-Apr-16	09-Aug-16	0%
C&C Tunnel - 1st 85m - Backfilling	4	10-Aug-16	13-Aug-16	0%
C&C Tunnel - 2nd 85m - Excavation by ramp	17	30-Apr-16	21-May-16	0%
C&C Tunnel - 2nd 85m - Excavation by vertical mean	18	23-May-16	13-Jun-16	0%
C&C Tunnel - 2nd 85m - Tunnel Structure	83	14-Jun-16	20-Sep-16	0%
C&C Tunnel - 2nd 85m - Backfilling	9	21-Sep-16	30-Sep-16	0%
C&C Tunnel - 3rd 85m - Excavation by ramp	18	23-May-16	13-Jun-16	0%
C&C Tunnel - 3rd 85m - Excavation by vertical mean	25	14-Jun-16	13-Jul-16	0%
C&C Tunnel - 3rd 85m - Tunnel Structure	83	26-Jul-16	02-Nov-16	0%
C&C Tunnel - 4th 85m - Excavation by ramp	21	30-Jun-16	25-Jul-16	0%
C&C Tunnel - 4th 85m - Excavation by vertical mean	35	26-Jul-16	03-Sep-16	0%
C&C Tunnel - 4th 85m - Tunnel Structure	83	05-Sep-16	13-Dec-16	0%
C&C Tunnel - 5th 85m - Excavation by ramp	23	26-Jul-16	20-Aug-16	0%

	Planned Bar
	Planned Bar - Critical
	Planned Milestone
	Progress bar
	Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16

Dragages - Bouygues Joint Venture 寶嘉 - 布依格聯營

Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016									
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov		
C&C Tunnel - 5th 85m - Excavation by vertical mean	44	22-Aug-16	14-Oct-16	0%										
C&C Tunnel - 6th 85m - Excavation by ramp	27	22-Aug-16	22-Sep-16	0%										
C&C Tunnel - 6th 85m - Excavation by vertical mean	52	23-Sep-16	24-Nov-16	0%										
South Retrieval Shaft														
Design Submission														
(F4) Gantry Crane Support/Foundations in Southern Landfall														
Preparation of IFA Gantry Crane / Foundation	18	27-Jul-15	15-Aug-15	0%										
Review & Comment by JV	18	17-Aug-15	05-Sep-15	0%										
Designer prepare IFA	10	07-Sep-15	17-Sep-15	0%										
Formal Submission of IFA to ICE/ IPs	0		17-Sep-15	0%										
Advanced Submission to SO	0		17-Sep-15	0%										
IPs/ SO's Advance Comments/ ICE Comments	28	18-Sep-15	15-Oct-15	0%										
Method Statement Submission														
Method Statement of Construction Methodology of Retrieval Shaft														
Preparation Method Statement for Retrieval Shaft	25	24-Aug-15	21-Sep-15	0%										
Submit Method Statement to SO	0		21-Sep-15	0%										
SO Reviews & Comments	28	22-Sep-15	19-Oct-15	0%										
Re-submission	18	20-Oct-15	10-Nov-15	0%										
SO's Review	28	11-Nov-15	08-Dec-15	0%										
Construction														
South Landfall GI Works/DW Setting Up	48	06-Aug-15	02-Oct-15	0%										
South Retrieval Shaft - Diaphragm Wall	98	03-Oct-15	29-Jan-16	0%										
Retrieval Shaft - Excavation - Soft by vertical mean (Fill material)	52	03-Feb-16	14-Apr-16	0%										
Retrieval Shaft - Excavation - Soft (other than Fill)	140	15-Apr-16	30-Sep-16	0%										
South Approach Ramp														
Construction														
Approach Ramp (CH1580-1850) - Pipe Pile/Sheet Piles Wall	126	03-Oct-15	09-Mar-16	0%										
Approach Ramp (CH1580-1850) - Tension Piles	103	03-Oct-15	04-Feb-16	0%										
South Ventilation Building														
Design Submission														
(I1) DDA for South Vent.Bldg. GBP & Arch.Submission														
ICE Approval & Issue Check Cert	18	22-Dec-14	14-Jan-15	100%										
Submit ICE Check Cert to SO	6	15-Jan-15	21-Jan-15	100%										
IPs Review	28	22-Dec-14	18-Jan-15	88%										
IP's No Objection Received	0		18-Jan-15	0%										
SO's Review	35	22-Dec-14	25-Jan-15	91%										
SO Approval with Condition Received	0		26-Jan-15	0%										
(I2) DDA for South Vent.Bldg. Foundation Design														
Review & Comment by JV	18	27-Apr-15	18-May-15	88%										
Designer prepare DDA	10	19-May-15	30-May-15	0%										
Formal Submission of DDA to ICE/ IPs	0		30-May-15	0%										
Advanced Submission to SO	0		30-May-15	0%										
IPs/ SO's Advance Comments/ ICE Comments	28	31-May-15	27-Jun-15	0%										
Comments Received	0		27-Jun-15	0%										
Designer to Reply RiC + Update Submission	21	29-Jun-15	23-Jul-15	0%										
Submit Updated DDA to SO/ ICE/ IPs	0	24-Jul-15		0%										
ICE Approval & Issue Check Cert	18	24-Jul-15	13-Aug-15	0%										
IPs Review	28	24-Jul-15	20-Aug-15	0%										
SO's Review	35	24-Jul-15	27-Aug-15	0%										
(I2) DDA for South Vent.Bldg. Structural Design incl. Vent. Connections														
Review & Comment by JV	18	18-Feb-15	17-Mar-15	76%										
Designer prepare DDA	10	18-Mar-15	28-Mar-15	0%										
Formal Submission of DDA to ICE/ IPs	0		28-Mar-15	0%										
Advanced Submission to SO	0		28-Mar-15	0%										
IPs/ SO's Advance Comments/ ICE Comments	28	29-Mar-15	25-Apr-15	0%										
Comments Received	0		25-Apr-15	0%										
Designer to Reply RiC + Update Submission	21	27-Apr-15	21-May-15	0%										
Submit Updated DDA to SO/ ICE/ IPs	0	22-May-15		0%										
ICE Approval & Issue Check Cert	18	22-May-15	12-Jun-15	0%										
IPs Review	28	22-May-15	18-Jun-15	0%										
SO's Review	35	22-May-15	25-Jun-15	0%										
(J1) DDA Temp. works for Construction of Sth. Vent. Bldg.														
Designer to Reply RiC + Update Submission	21	24-Aug-15	16-Sep-15	90%										
Submit Updated DDA to SO/ ICE/ IPs	0	17-Sep-15		0%										
ICE Approval & Issue Check Cert	12	17-Sep-15	02-Oct-15	0%										
Submit ICE Check Cert to SO	6	03-Oct-15	09-Oct-15	0%										
IPs Review	28	17-Sep-15	14-Oct-15	0%										
IP's No Objection Received	0		14-Oct-15	0%										
SO's Review	35	17-Sep-15	21-Oct-15	0%										
SO Approval with Condition Received	0		22-Oct-15	0%										
Construction														
Mobilization & Setting Up Piling Rigs	64	06-Aug-15	22-Oct-15	0%										
S - Piling (Socket H-piles)	132	23-Oct-15	08-Apr-16	0%										
S - Pile Test	24	09-Apr-16	07-May-16	0%										
S - Sheet Piling	48	23-Oct-15	17-Dec-15	0%										
S - Excavation	100	09-May-16	05-Sep-16	0%										
Substructure	95	06-Sep-16	30-Dec-16	0%										
South Surface Roadworks, Utility & Drainage works														
Design Submission														
(E1) AIP - Southern Landfall Seawall Modification														
SO Review (35 Days)	35	03-Mar-17	06-Apr-17	100%										
SO Approval with Condition Received	0		06-Apr-17	100%										
(E1) DDA - Southern Landfall Seawall Modification														
Preparation of DDA Modification of Seawall at Sth Landfall	18	07-Apr-17	02-May-17	100%										
Review & Comment by JV	18	04-May-17	24-May-17	100%										
Designer prepare DDA	10	25-May-17	06-Jun-17	100%										
Formal Submission of DDA to ICE/ IPs	0		06-Jun-17	100%										

- Planned Bar
- Planned Bar - Critical
- ◆ Planned Milestone
- Progress bar
- ◆ Progress Milestone

TMCLK - Northern Connection Sub-Sea Tunnel Section
 Detailed Works Programme (Rev. F)
 Three Months Rolling Programme
 Progress as of 26-Jun-16



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBJEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBJEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBJEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBJEN.PRG.98507 Rev.F	WYu	

Activity Name	Orig Dur	DWPF Start	DWPF Finish	% Comp	2016							
					Apr	May	Jun	Jul	Aug	Sep	Oct	Nov
Advanced Submission to SO	0		06-Jun-17	100%								
IPs/ SO's Advance Comments/ ICE Comments	28	07-Jun-17	04-Jul-17	83%								
Comments Received	0		04-Jul-17	0%								
Designer to Reply RiC + Update Submission	21	05-Jul-17	28-Jul-17	0%								
Submit Updated DDA to SO/ ICE/ IPs	0	29-Jul-17		0%								
ICE Approval & Issue Check Cert	12	29-Jul-17	11-Aug-17	0%								
Submit ICE Check Cert to SO	6	12-Aug-17	18-Aug-17	0%								
IPs Review	28	29-Jul-17	25-Aug-17	0%								
IP's No Objection Received	0		25-Aug-17	0%								
SO's Review	35	29-Jul-17	01-Sep-17	0%								
SO Approval with Condition Received	0		01-Sep-17	0%								
(E3) DDA for Sewerage, Drainage, Waterworks & Utility works for South Landfall												
Designer to Reply RiC + Update Submission	21	02-Feb-15	04-Mar-15	100%								
Submit Updated DDA to SO/ ICE/ IPs	0	05-Mar-15		100%								
ICE Approval & Issue Check Cert	12	05-Mar-15	18-Mar-15	100%								
Submit ICE Check Cert to SO	6	19-Mar-15	25-Mar-15	100%								
IPs Review	28	05-Mar-15	01-Apr-15	88%								
IP's No Objection Received	0		01-Apr-15	0%								
SO's Review	35	05-Mar-15	08-Apr-15	91%								
SO Approval with Condition Received	0		08-Apr-15	0%								
Method Statement Submission												
Method Statement of Ground Treatment for TBMs Passing under Southern Landfall Seawall												
Preparation Method Statement for Ground Improvement in South Landfall	9	20-Jul-15	29-Jul-15	0%								
Submit Method Statement to SO	0		29-Jul-15	0%								
SO Reviews & Comments	28	30-Jul-15	26-Aug-15	0%								
Re-submission	6	27-Aug-15	02-Sep-15	0%								
SO's Review	28	03-Sep-15	30-Sep-15	0%								
SO's Approval	0		30-Sep-15	0%								
Construction												
Temporary Platform for Ground Treatment for TBM passing under Southern Seawall	48	06-Aug-15	02-Oct-15	0%								
Grouting Treatment for TBM passing under Southern Seawall	339	03-Oct-15	25-Nov-16	0%								
Testing & Commissioning/Inspection & Handover												
Final Inspection & Handover												
Design Submission												
(A12) Maintenance Matrix												
Prepare Re-submission	18	12-Mar-16	06-Apr-16	88%								
2nd Submission	0		06-Apr-16	0%								
SO's Condition Approval	35	07-Apr-16	11-May-16	0%								
(A13) Operation & Maintenance Manual												
Preparation of Operation and Maintenance Manual	48	24-Dec-15	27-Feb-16	0%								
1st Submission	0		27-Feb-16	0%								
SO's Comments for 1st Submission	35	28-Feb-16	02-Apr-16	0%								
Prepare Re-submission	24	05-Apr-16	03-May-16	0%								
2nd Submission	0		03-May-16	0%								
SO's Condition Approval	35	04-May-16	07-Jun-16	0%								
(A14) As-built & As-fabricated Drawings												
Preparation of As-built and As-fabricated Drawings	48	24-Dec-15	27-Feb-16	0%								
1st Submission	0		27-Feb-16	0%								
SO's Comments for 1st Submission	35	28-Feb-16	02-Apr-16	0%								
Prepare Re-submission	24	05-Apr-16	03-May-16	0%								
2nd Submission	0		03-May-16	0%								
SO's Condition Approval	35	04-May-16	07-Jun-16	0%								
(A15) Health & Safety File incl. As-built Dwg's & Records, Maintenance Schedules, O&M Manual												
Preparation of Health and Safety File including as-built drawings and records, maintenance schedules, operation and maintenance manual	48	24-Dec-15	27-Feb-16	0%								
1st Submission	0		27-Feb-16	0%								
SO's Comments for 1st Submission	35	28-Feb-16	02-Apr-16	0%								
Prepare Re-submission	24	05-Apr-16	03-May-16	0%								
2nd Submission	0		03-May-16	0%								
SO's Condition Approval	35	04-May-16	07-Jun-16	0%								

- Planned Bar
- Planned Bar - Critical
- ◆ Planned Milestone
- ▬ Progress bar
- ◆ Progress Milestone



Date	Revision	Checked	Approved
12-Feb-14	TMCLKDBUGEN.PRG.98507	WYu	SPo
08-Apr-14	TMCLKDBUGEN.PRG.98507 Rev.B	SPa	WYu
28-Aug-14	TMCLKDBUGEN.PRG.98507 Rev.C	CLa	WYu
30-Oct-15	TMCLKDBUGEN.PRG.98507 Rev.F	WYu	