



Bluescope Steel (AIS) Pty Ltd
ABN 19 000 019625
Port Kembla Steelworks
Five Islands Road
Port Kembla 2505
PO Box 1854
Wollongong NSW 2500

BLUESCOPE STEEL (AIS) PTY. LTD.
Port Kembla Steelworks
Licence 6092

[Link to Environment Protection Licence EPL6092](#)

LICENCE MONITORING DATA
MONTHLY SUMMARY REPORT

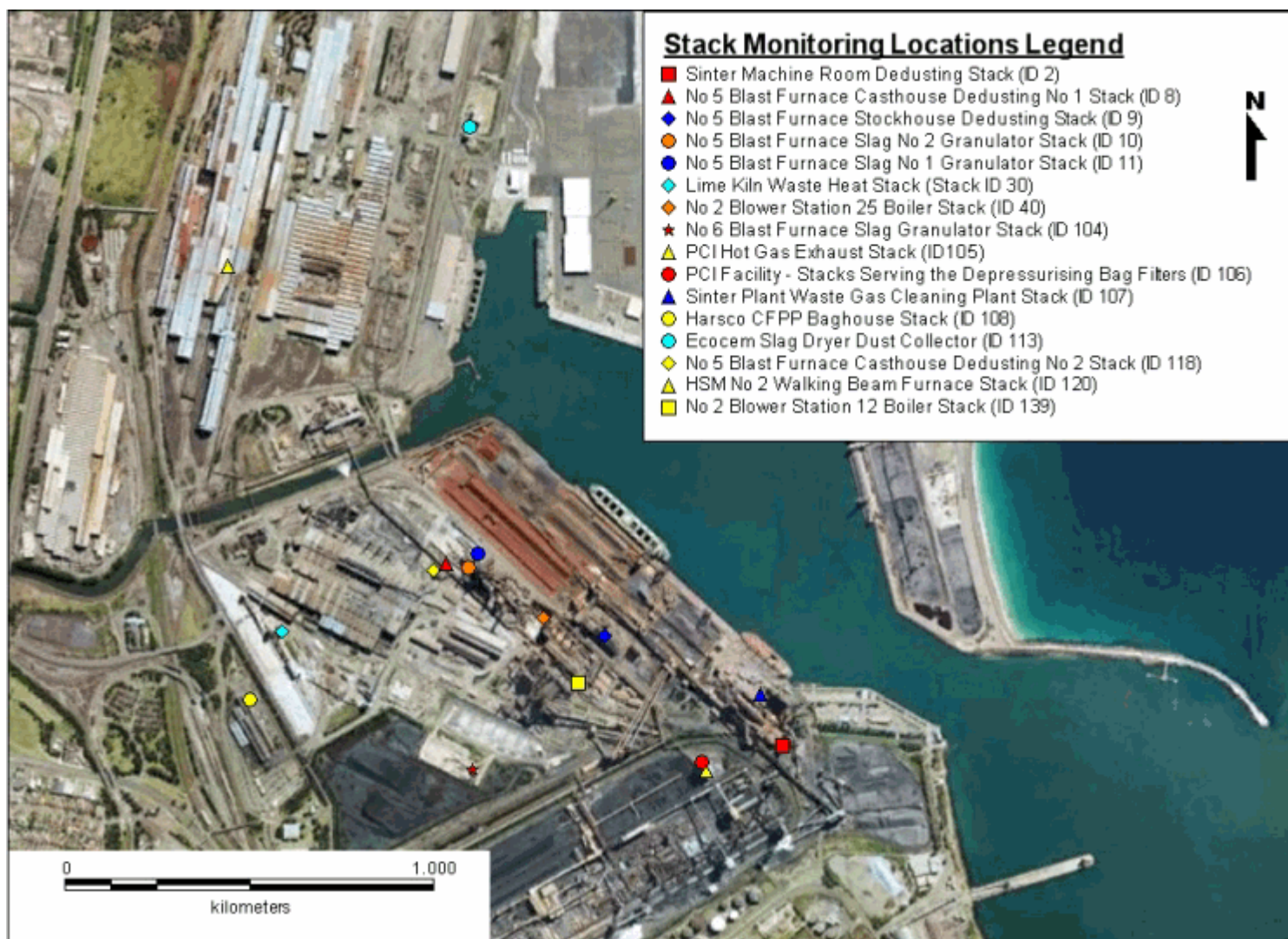
for

1 Jul 2016 to 31 Jul 2016

Monthly (July 2016) Report Published: 19, September, 2016

Stack Air Monitoring Requirements

EPL6092 Conditions M2.2/M2.3/M8.2/E1.4/O4.14/O4.15





Bluescope Steel (AIS) Pty Ltd
 ABN 19 000 019625
 Port Kembla Steelworks
 Five Islands Road
 Port Kembla 2505
 PO Box 1854
 Wollongong NSW 2500

Point 2:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 Percentile Limit	Exceedance (yes / no) *
Solid Particles	Milligrams per cubic metre	Quarterly	1	4.10	4.10	50.00	no
Comment:							

Point 107:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 Percentile Limit	Exceedance (yes / no) *
Arsenic	Milligrams per cubic metre	Quarterly in duplicate	2	0.00019	0.00030		no
Cadmium	Milligrams per cubic metre	Quarterly in duplicate	2	0.00025	0.00027		no
Chromium (hexavalent)	Milligrams per cubic metre	Yearly in duplicate	2	0.00200	0.00200		no
Dioxins & Furans (15.7% Oxygen correction)	Nanograms per cubic metre	Quarterly in duplicate	2	0.003000	0.003900	0.300000	no
Dry Gas Density	Kilograms per cubic metre	Quarterly in duplicate	10	1.32	1.34		no
Hydrogen Chloride	Milligrams per cubic metre	Quarterly in duplicate	2	22.00	22.00		no
Hydrogen Fluoride	Milligrams per cubic metre	Quarterly in duplicate	2	0.9800	1.1000		no
Lead	Milligrams per cubic metre	Quarterly in duplicate	2	0.0110	0.0200		no
Manganese	Milligrams per cubic metre	Quarterly in duplicate	2	0.0065	0.0077		no
Moisture	Percent	Quarterly in duplicate	10	9.50	11.00		no
Molecular Weight of stack gases	grams per gram mole	Quarterly in duplicate	10	29.60	30.00		no
Nickel	Milligrams per cubic metre	Quarterly in duplicate	2	0.00049	0.00071		no
Sulfuric acid mist and sulphur trioxide (as SO ₃)	Milligrams per cubic metre	Quarterly in duplicate	2	1.90	2.20	100.00	no
Temperature	Degrees Celcius	Quarterly in duplicate	10	133.00	136.00		no
Velocity	Metres per second	Quarterly in duplicate	10	14.00	17.00		no
Volumetric flowrate	Cubic metres per second	Quarterly in duplicate	10	270.00	330.00		no
Comment:							

Point O4.14:

Pollutant	Monitoring frequency required by licence	No of significant emissions measured during month	100 Percentile Limit	Exceedance (yes/no) *
Emission - KISH Tipping DER 5	Monthly	0	4	no
Comment:				

Point O4.15:

Pollutant	Monitoring frequency required by licence	No of significant emissions measured during month	100 Percentile Limit	Exceedance (yes/no) *
Emission - Torpedo Ladle DER>43	Monthly	0	4	no
Comment:				

Point 2:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max Value
Opacity	%	Continuous	Continuous	0.4	2.5	2.1	8
Comment: Elevated results associated with analyser calibration checks.							

Point 107:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max Value
Total Solid Particles	Milligrams per cubic metre	Continuous	Continuous	0.9	3.7	3.3	36.3
Comment: Elevated results associated with Plant start-up.							



Bluescope Steel (AIS) Pty Ltd
ABN 19 000 019625
Port Kembla Steelworks
Five Islands Road
Port Kembla 2505
PO Box 1854
Wollongong NSW 2500

Ambient Air Monitoring Requirements

EPL6092 Condition M2.2 (Cont.)

Point 141: Receiver 1 (located south of licensed site)

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max. Value
Fine Particulates	Micrograms per cubic metre	Continuous	Continuous	5	9.3	8.8	15.1
Benzene	Parts per billion	Every 6 days	4 *	0.0500	0.0778	0.0830	0.0950
Iron	Micrograms per cubic metre	Every 6 days	5	0.13	0.90	0.40	2.50
Lead	Micrograms per cubic metre	Every 6 days	5	<0.05	0.03	0.03	0.06
Particulates - Deposited Matter	Grams per square metre per month	Monthly	1	0.29	0.29	0.29	0.29
Polycyclic aromatic hydrocarbons	Nanograms per cubic metre	24 hour period every 6 days.	5	0.60	0.92	0.68	1.50
Total suspended particles	Micrograms per cubic metre	Every 6 days	5	6.80	12.74	8.10	21.00
Type 1 and Type 2 substances in aggregate	Micrograms per cubic metre	Quarterly	1	0.18	0.18	0.18	0.18
Zinc	Micrograms per cubic metre	Every 6 days	5	<0.11	0.12	0.06	0.23
Comment: *The sampler failed due to heavy rain. A new cover has been installed.							

Point 152: Receiver 2 (located north of licensed site)

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max. Value
Fine Particulates	Micrograms per cubic metre	Continuous	Continuous	5.4	12.4	12.7	19.4
Benzene	Parts per billion	Every 6 days	5	<0.0100	0.1258	0.1200	0.3500
Iron	Micrograms per cubic metre	Every 6 days	5	0.74	1.29	1.10	1.80
Lead	Micrograms per cubic metre	Every 6 days	5	<0.05	0.03	0.03	<0.06
Particulates - Deposited Matter	Grams per square metre per month	Monthly	1	0.11	0.11	0.11	0.11
Polycyclic aromatic hydrocarbons	Nanograms per cubic metre	24 hour period every 6 days.	5	0.61	1.09	0.85	1.70
Total suspended particles	Micrograms per cubic metre	Every 6 days	5	19.00	26.80	27.00	40.00
Type 1 and Type 2 substances in aggregate	Micrograms per cubic metre	Quarterly	1	0.07	0.07	0.07	0.07
Zinc	Micrograms per cubic metre	Every 6 days	5	<0.11	0.14	0.12	0.35
Comment:							

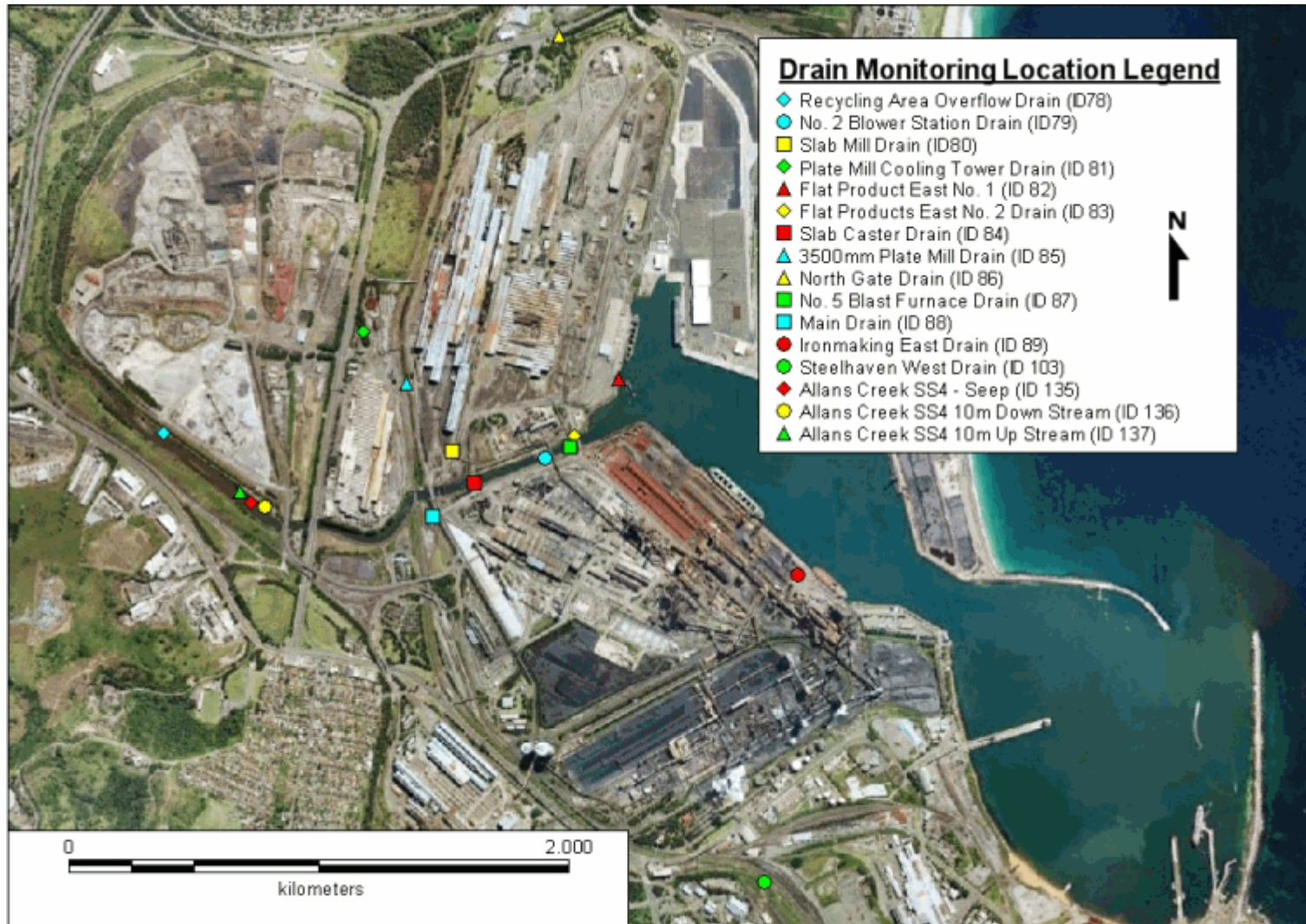


Point 153: Receiver 3 (located west of licensed site)

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max. Value
Iron	Micrograms per cubic metre	Every 6 days	5	0.28	1.14	1.00	1.90
Lead	Micrograms per cubic metre	Every 6 days	5	<0.05	0.03	0.03	<0.06
Total suspended particles	Micrograms per cubic metre	Every 6 days	5	8.50	20.10	22.00	24.00
Type 1 and Type 2 substances in aggregate	Micrograms per cubic metre	Quarterly	1	0.11	0.11	0.11	0.11
Zinc	Micrograms per cubic metre	Every 6 days	5	<0.11	0.08	0.06	0.18
Comment:							

Water and/or Land Monitoring Requirements

EPL6092 Condition M2.5/M8.1/M8.3



Point 78:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max. Value
Total Suspended Solids	Milligrams per litre	Daily during any discharge which is not due to Wet Weather Conditions	0 *				
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	0.00	14.81	0.00	445.00
Comment: *No flow at time of sampling.							

Point 79:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Ammonia	Milligrams per litre	Every 8 days	4	<0.0600	<0.0600	5.0 (5.0)	no
Cyanide	Milligrams per litre	Every 8 days	4	<0.0200	<0.0200	0.30 (0.30)	no
Filtrable Iron	Milligrams per litre	Every 8 days	4	<0.0100	0.0100	0.3 (0.3)	no
Oil and Grease	Milligrams per litre	Every 8 days	4	<5.0000	<5.0000	20 (50)	no
pH		Every 8 days	4	8.00	8.20	6.5-9.0 (6.5-9.0)	no
Temperature	Degrees Celcius	Every 8 days	4	25.00	26.00	40 (40)	no
Total Iron	Milligrams per litre	Every 8 days	4	0.1500	0.3700	3 (50)	no
Total Suspended Solids	Milligrams per litre	Every 8 days	4	6.40	22.00	50 (500)	no
Total Zinc	Milligrams per litre	Every 8 days	4	<0.0500	<0.0500	3 (3)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	519,891.00	585,148.00		
Comment:							



Point 80:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Cyanide	Milligrams per litre	6/yr. Min 50 days apart.	1	<0.0200	<0.0200	0.10 (0.00)	no
pH		6/yr. Min 50 days apart.	1	8.10	8.10	6.5-9.0 (0.0-0.0)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	4,053.00	6,698.00		
Comment:							

Point 82:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Cyanide	Milligrams per litre	Quarterly grab sample. Min 80 days apart	1	<0.0200	<0.0200	0.30 (0.00)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	17.00	4,817.00		
Comment:							

Point 83:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Cyanide	Milligrams per litre	Quarterly grab sample. Min 80 days apart	0 *			0.15 (0.00)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	0.00	1,522.00		
Comment: *No flow at time of sampling.							

Point 85:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 Percentile Limit	Exceedance (yes / no) *
Oil and Grease	Milligrams per litre	24/year. Min 15 days apart	2	<5.0000	<5.0000	20.0000	no
pH		24/year. Min 15 days apart	2	8.00	8.10	6.5-9.0	no
Temperature	Degrees Celcius	24/year. Min 15 days apart	2	15.00	21.00	35.00	no
Total Suspended Solids	Milligrams per litre	24/year. Min 15 days apart	2	5.20	6.00	50.00	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	25,608.00	36,284.00		no
Comment:							



Point 87:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Ammonia	Milligrams per litre	Every 8 days	4	<0.0600	<0.0600	10.0 (10.0)	no
Cyanide	Milligrams per litre	Every 8 days	4	<0.0200	<0.0200	0.30 (0.30)	no
Filtrable Iron	Milligrams per litre	Every 8 days	4	<0.0100	0.0300	1.5 (1.5)	no
Lead	Milligrams per litre	Every 8 days	4	<0.020	<0.020	0.5 (0.5)	no
Mercury	Micrograms per litre	Every 8 days	4	<0.50	<0.50	1.5 (1.5)	no
pH		Every 8 days	4	8.00	8.10	6.5-11.0 (6.5-11.0)	no
Temperature	Degrees Celcius	Every 8 days	4	18.00	21.00	40 (40)	no
Total Iron	Milligrams per litre	Every 8 days	4	0.1100	0.3600	7 (100)	no
Total Suspended Solids	Milligrams per litre	Every 8 days	4	<3.00	18.00	70 (500)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	1,974.00	2,428.00		
Comment:							

Point 88:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Ammonia	Milligrams per litre	Every 8 days	4	<0.0600	<0.0600	7.5 (7.5)	no
Ammonia	Tonnes per day	Every 8 days	4	0.0	0.0	1.200	no
Cyanide	Kilograms per day	Every 8 days	4	0.0	0.0	27.00	no
Cyanide	Milligrams per litre	Every 8 days	4	<0.0200	<0.0200	0.30 (0.30)	no
Oil and Grease	Milligrams per litre	Every 8 days	4	<5.0000	<5.0000	20 (50)	no
Oil and Grease	Tonnes per day	Every 8 days	4	0.0	0.0	2.50	no
pH		Every 8 days	4	8.00	8.10	6.5-9.0 (6.5-9.0)	no
Phenol	Kilograms per day	Every 8 days	4	0.0	0.0	35.00	no
Phenol	Milligrams per litre	Every 8 days	4	<0.2000	<0.2000	0.45 (0.45)	no
Temperature	Degrees Celcius	Every 8 days	4	17.00	19.00	40 (40)	no
Total Suspended Solids	Milligrams per litre	Every 8 days	4	<3.00	8.00	100 (200)	no
Total Suspended Solids	Tonnes per day	Every 8 days	4	0.0	1.17	12.00	no
Total Zinc	Kilograms per day	Every 8 days	4	0.0	13.24	35.00	no
Total Zinc	Milligrams per litre	Every 8 days	4	<0.0500	0.0900	3 (3)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	142,054.00	205,779.00		
Comment:							

Point 89:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Max Value	100 percentile Dry limit (Wet limit)	Exceedance (yes / no) *
Ammonia	Milligrams per litre	Every 8 days	16	<0.0600	0.3700	7.0 (7.0)	no
Copper	Milligrams per litre	Every 8 days	16	<0.010	0.030	1.000	no
Cyanide	Milligrams per litre	Every 8 days	16	<0.0200	<0.0200	0.20 (0.20)	no
Filtrable Iron	Milligrams per litre	Every 8 days	16	<0.0100	0.0800	0.5 (0.5)	no
Fluoride	Milligrams per litre	Every 8 days	16	1.80	3.40	50 (50)	no
pH		Every 8 days	16	7.50	8.30	6.5-9.0 (6.5-9.0)	no
Temperature	Degrees Celcius	Every 8 days	16	17.00	22.00	45 (45)	no
Total Iron	Milligrams per litre	Every 8 days	16	0.1900	50.0000	7 (20)	yes *
Total Suspended Solids	Milligrams per litre	Every 8 days	16	3.20	100.00	100 (200)	no *
dry Total Zinc	Milligrams per litre	Every 8 days	16	<0.0500	0.3300	3 (3)	no
Volume of Liquids Discharged	Kilolitres per day	Daily	Continuous	8,187.00	13,768.00		

Comment:* During wet weather conditions, one sample taken 7/7/16 exceeded the Total Iron wet weather limit. The sample did not exceed the Total Suspended Solids wet weather limit.

Point 135:

Pollutant	Units of Measure	Monitoring frequency required by licence	No. of times measured during month	Min. Value	Mean Value	Median Value	Max. Value
Ammonia	Milligrams per litre	1 sample in Licence. Q1. 1 sample in Q3. 1 sample following a rainfall event of more than 10mm in a 24 hour period.	1	<0.0600	0.0300	0.0300	<0.0600
pH		1 sample in Licence. Q1. 1 sample in Q3. 1 sample following a rainfall event of more than 10mm in a 24 hour period.	1	8.60	8.60	8.60	8.60
Temperature	Degrees Celcius	1 sample in Licence. Q1. 1 sample in Q3. 1 sample following a rainfall event of more than 10mm in a 24 hour period.	1	14.00	14.00	14.00	14.00
Comment:							