Vales Point Power Station Monthly Environmental Data Summary

LICENCE NO	761	http://www.epa.nsw.gov.au/prpoeoapp/
LICENCE HOLDER	SUNSET POWER INTERNATIONAL PTY LTD	
REPORTING PERIOD	January 2023	
ADDRESS	VALES ROAD, MANNERING PARK NSW	

POINT 2 **Combined air emissions from boiler 5 via Points 4 to 7 to Point 1 marked and shown as EPA ID 2 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceed 100% Limit (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months							0.2		
Jan-23	Chlorine	(mg/m3)	Every 6 months							20		
Jan-23	Fluorine	(mg/m3)	Every 6 months							30		
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months							50		
Jan-23	Mercury	(mg/m3)	Every 6 months							0.05		
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	93.4%	Jan-23	397	633	730	850	980	No	
Jan-23	Solid Particles	(mg/m3)	Quarterly							50		
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	93.4%	Jan-23	587	854	1277	1400	1700	No	
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months							100		
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months							0.75		
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months							10		

POINT 3 **Combined air emissions from boiler 6 via Points 8 to 11 to Point 1 marked and shown as EPA ID 3 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceed 100% Limit (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months							0.2		
Jan-23	Chlorine	(mg/m3)	Every 6 months							20		
Jan-23	Fluorine	(mg/m3)	Every 6 months							30		
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months							50		
Jan-23	Mercury	(mg/m3)	Every 6 months							0.05		
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	99.6%	Jan-23	289	602	709	850	980	No	
Jan-23	Solid Particles	(mg/m3)	Quarterly							50		
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	99.6%	Jan-23	457	892	1322	1400	1700	No	
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months							100		
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months							0.75		
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months							10		

POINT 4 **Boiler number 5 exhaust - duct A marked and shown as EPA ID 4 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Carbon dioxide	(%)	Every 6 months									
Jan-23	Chlorine	(mg/m3)	Every 6 months									
Jan-23	Fluorine	(mg/m3)	Every 6 months									
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months									

POINT 5 **Boiler number 5 exhaust - duct B marked and shown as EPA ID 5 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									

POINT 6 **Boiler number 5 exhaust - duct C marked and shown as EPA ID 6 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Carbon dioxide	(%)	Every 6 months									
Jan-23	Chlorine	(mg/m3)	Every 6 months									
Jan-23	Fluorine	(mg/m3)	Every 6 months									
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months									

POINT 7 **Boiler number 5 exhaust - duct D marked and shown as EPA ID 7 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									

POINT 8 **Boiler number 6 exhaust - duct A marked and shown as EPA ID 8 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Carbon dioxide	(%)	Every 6 months									
Jan-23	Chlorine	(mg/m3)	Every 6 months									
Jan-23	Fluorine	(mg/m3)	Every 6 months									
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months									

POINT 9 **Boiler number 6 exhaust - duct B marked and shown as EPA ID 9 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									

POINT 10 **Boiler number 6 exhaust - duct C marked and shown as EPA ID 10 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Carbon dioxide	(%)	Every 6 months									
Jan-23	Chlorine	(mg/m3)	Every 6 months									
Jan-23	Fluorine	(mg/m3)	Every 6 months									
Jan-23	Hydrogen chloride	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Sulfuric acid mist and sulfur trioxide (as SO3)	(mg/m3)	Every 6 months									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									
Jan-23	VOC's as n-propane equivalent	(mg/m3)	Every 6 months									

POINT 11 **Boiler number 6 exhaust - duct D marked and shown as EPA ID 11 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Cadmium	(mg/m3)	Every 6 months									
Jan-23	Mercury	(mg/m3)	Every 6 months									
Jan-23	Solid Particles	(mg/m3)	Quarterly									
Jan-23	Type 1 and Type 2 substances in aggregate	(mg/m3)	Every 6 months									

POINT 12 **Boiler number 5 combined exhaust - duct A and B (points 4 and 5) marked and shown as EPA ID 12 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	92.4%	Jan-23	319	596	693			N/A	
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	92.4%	Jan-23	528	785	1168			N/A	

POINT 13 **Boiler number 5 combined exhaust - duct C and D (points 6 and 7) marked and shownas EPA ID 13 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	94.5%	Jan-23	344	670	800			N/A	
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	94.5%	Jan-23	614	922	1385			N/A	

POINT 14 **Boiler number 6 combined exhaust - duct A and B (points 8 and 9) marked and shownas EPA ID 14 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	99.6%	Jan-23	334	650	792			N/A	
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	99.6%	Jan-23	439	913	1350			N/A	

POINT 15 **Boiler number 6 combined exhaust - duct C and D (points 10 and 11) marked and shownas EPA ID 12 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Nitrogen Oxides	(mg/m3)	Continuous	99.6%	Jan-23	244	555	718			N/A	
Jan-23	Sulfur dioxide	(mg/m3)	Continuous	99.6%	Jan-23	475	870	1294			N/A	

POINT 22 **Discharge of cooling water from the cooling water outlet canal to Wyee Bay marked and shown as EPA ID 22 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	98.5 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceed 100% Limit (yes/no)	Comments
Jan-23	Chlorine (free residual)	(mg/L)	Monthly during discharge	1	4/01/2023	<0.1	<0.1	<0.1		**0.2**	**No**	
Jan-23	Copper	(mg/L)	Monthly during discharge	1	4/01/2023	0.002	0.002	0.002		**0.005**	**No**	
Jan-23	Iron	(mg/L)	Monthly during discharge	1	4/01/2023	0.120	0.120	0.120		**0.3**	**No**	
Jan-23	Oil and Grease	Visible	Continuous during discharge	100%	Jan-23	NIL	NIL	NIL				
Jan-23	Selenium	(mg/L)	Monthly during discharge	1	4/01/2023	0.001	0.001	0.001		**0.005**	**No**	
Jan-23	Temperature	(°C)	Continuous during discharge	100%	Jan-23	26.8	31.3	36.2	**35**	**37.5**	**No**	

POINT 23 **Discharge of supernatant water from the ash dam to the cooling water outlet canal to Wyee Bay marked and shown as EPA ID 23 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Monthly during discharge	1	4/01/2023	0.05	0.05	0.05				
Jan-23	Ammonia	(mg/L)	Monthly during discharge	1	4/01/2023	0.2	0.2	0.2				
Jan-23	Arsenic (III)	(mg/L)	Monthly during discharge	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Arsenic (V)	(mg/L)	Monthly during discharge	1	4/01/2023	0.016	0.016	0.016				
Jan-23	Cadmium	(mg/L)	Monthly during discharge	1	4/01/2023	<0.0002	<0.0002	<0.0002				
Jan-23	Chromium (trivalent)	(mg/L)	Monthly during discharge	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Monthly during discharge	1	4/01/2023	0.020	0.020	0.020				
Jan-23	Copper	(mg/L)	Monthly during discharge	1	4/01/2023	0.001	0.001	0.001				
Jan-23	Iron	(mg/L)	Monthly during discharge	1	4/01/2023	0.051	0.051	0.051				
Jan-23	Lead	(mg/L)	Monthly during discharge	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Manganese	(mg/L)	Monthly during discharge	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Nickel	(mg/L)	Monthly during discharge	1	4/01/2023	0.045	0.045	0.045				
Jan-23	Nitrate + nitrite (oxidised nitrogen)	(mg/L)	Monthly during discharge	1	4/01/2023	0.01	0.01	0.01				
Jan-23	Nitrogen	(mg/L)	Monthly during discharge	1	4/01/2023	0.50	0.50	0.50				
Jan-23	pH	pH	Monthly during discharge	1	4/01/2023	8.21	8.21	8.21		**6.5 - 9.5**	**No**	
Jan-23	Phosphorus	(mg/L)	Monthly during discharge	1	4/01/2023	<0.05	<0.05	<0.05				
Jan-23	Reactive Phosphorus	(mg/L)	Monthly during discharge	1	4/01/2023	0.09	0.09	0.09				
Jan-23	Selenium	(mg/L)	Monthly during discharge	1	4/01/2023	0.098	0.098	0.098				
Jan-23	Total Kjeldahl Nitrogen	(mg/L)	Monthly during discharge	1	4/01/2023	0.5	0.5	0.5				
Jan-23	Total Suspended Solids	(mg/L)	Monthly during discharge	1	4/01/2023	<5	<5	<5		**50**	**No**	
Jan-23	Vanadium	(mg/L)	Monthly during discharge	1	4/01/2023	0.15	0.15	0.15				
Jan-23	Zinc	(mg/L)	Monthly during discharge	1	4/01/2023	0.012	0.012	0.012				

POINT 24 Discharge of seepage water from the ash dam rehabilitation area to Mannering Bay marked and shown as EPA ID 24 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	Discharge (yes/no)	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Ammonia	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Arsenic (III)	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Arsenic (V)	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Cadmium	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Chromium (trivalent)	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Chromium (VI) Compounds	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Copper	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Iron	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Lead	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Manganese	(mg/L)	Monthly during discharge	1	4/01/2023				No			No discharge from EPA Point 24 during January 2023
Jan-23	Nickel	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Nitrate + nitrite (oxidised nitrogen)	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Nitrogen	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	pH	pH	Monthly during discharge	1	4/01/2023				No	6.5 - 9.5	No	
Jan-23	Phosphorus	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Reactive Phosphorus	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Selenium	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Total Kjeldahl Nitrogen	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Total Suspended Solids	(mg/L)	Monthly during discharge	1	4/01/2023				No	50	No	
Jan-23	Vanadium	(mg/L)	Monthly during discharge	1	4/01/2023				No			
Jan-23	Zinc	(mg/L)	Monthly during discharge	1	4/01/2023				No			

POINT 25 Discharge of over boarded water from the ash dam to Mannering Bay marked and shown as EPA ID 25 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	Discharge (yes/no)	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Ammonia	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Arsenic (III)	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Arsenic (V)	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Cadmium	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Chromium (trivalent)	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Chromium (VI) Compounds	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Copper	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Iron	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Lead	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Manganese	(mg/L)	Daily for any discharge >2 hrs						No			No discharge from EPA Point 25 during January 2023
Jan-23	Nickel	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Nitrate + nitrite (oxidised nitrogen)	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Nitrogen	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	pH	pH	Daily for any discharge >2 hrs						No	6.5 - 9.5	No	
Jan-23	Phosphorus	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Reactive Phosphorus	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Selenium	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Total Kjeldahl Nitrogen	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Total Suspended Solids	(mg/L)	Daily for any discharge >2 hrs						No	50	No	
Jan-23	Vanadium	(mg/L)	Daily for any discharge >2 hrs						No			
Jan-23	Zinc	(mg/L)	Daily for any discharge >2 hrs						No			

POINT 30	Groundwater quality monitoring bore marked and shown as EPA ID 30 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).											
Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Quarterly	1	4/01/2023	0.15	0.15	0.15				
Jan-23	Ammonia	(mg/L)	Quarterly	1	4/01/2023	4.6	4.6	4.6				
Jan-23	Arsenic (III)	(mg/L)	Quarterly	1	4/01/2023	0.003	0.003	0.003				
Jan-23	Arsenic (V)	(mg/L)	Quarterly	1	4/01/2023	0.004	0.004	0.004				
Jan-23	Cadmium	(mg/L)	Quarterly	1	4/01/2023	0.0002	0.0002	0.0002				
Jan-23	Chromium (trivalent)	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Copper	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Electrical Conductivity	(us/cm)	Quarterly	1	4/01/2023	33000	33000	33000				
Jan-23	Iron	(mg/L)	Quarterly	1	4/01/2023	81.0	81.0	81.0				Next sample scheduled for April 2023
Jan-23	Lead	(mg/L)	Quarterly	1	4/01/2023	0.002	0.002	0.002				
Jan-23	Magnesium	(mg/L)	Quarterly	1	4/01/2023	800	800	800				
Jan-23	Manganese	(mg/L)	Quarterly	1	4/01/2023	6.0	6.0	6.0				
Jan-23	Nickel	(mg/L)	Quarterly	1	4/01/2023	0.027	0.027	0.027				
Jan-23	pH	pH	Quarterly	1	4/01/2023	5.66	5.66	5.66				
Jan-23	Potassium	(mg/L)	Quarterly	1	4/01/2023	110	110	110				
Jan-23	Selenium	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Sodium	(mg/L)	Quarterly	1	4/01/2023	6000	6000	6000				
Jan-23	Standing Water Level	(m)	Quarterly	1	4/01/2023	3.93	3.93	3.93				
Jan-23	Vanadium	(mg/L)	Quarterly	1	4/01/2023	<0.002	<0.002	<0.002				
Jan-23	Zinc	(mg/L)	Quarterly	1	4/01/2023	0.012	0.012	0.012				

POINT 31	Groundwater quality monitoring bore marked and shown as EPA ID 31 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).											
Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Quarterly	1	4/01/2023	2.00	2.00	2.00				
Jan-23	Ammonia	(mg/L)	Quarterly	1	4/01/2023	1.60	1.60	1.60				
Jan-23	Arsenic (III)	(mg/L)	Quarterly	1	4/01/2023	0.001	0.001	0.001				
Jan-23	Arsenic (V)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Cadmium	(mg/L)	Quarterly	1	4/01/2023	<0.0001	<0.0001	<0.0001				
Jan-23	Chromium (trivalent)	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Copper	(mg/L)	Quarterly	1	4/01/2023	0.008	0.008	0.008				
Jan-23	Electrical Conductivity	(us/cm)	Quarterly	1	4/01/2023	24000	24000	24000				
Jan-23	Iron	(mg/L)	Quarterly	1	4/01/2023	220	220	220				
Jan-23	Lead	(mg/L)	Quarterly	1	4/01/2023	0.009	0.009	0.009				Next sample scheduled for April 2023
Jan-23	Magnesium	(mg/L)	Quarterly	1	4/01/2023	680	680	680				
Jan-23	Manganese	(mg/L)	Quarterly	1	4/01/2023	3.1	3.1	3.1				
Jan-23	Nickel	(mg/L)	Quarterly	1	4/01/2023	0.069	0.069	0.069				
Jan-23	pH	pH	Quarterly	1	4/01/2023	5.24	5.24	5.24				
Jan-23	Potassium	(mg/L)	Quarterly	1	4/01/2023	36.0	36.0	36.0				
Jan-23	Selenium	(mg/L)	Quarterly	1	4/01/2023	0.002	0.002	0.002				
Jan-23	Sodium	(mg/L)	Quarterly	1	4/01/2023	4300	4300	4300				
Jan-23	Standing Water Level	(m)	Quarterly	1	4/01/2023	1.73	1.73	1.73				
Jan-23	Vanadium	(mg/L)	Quarterly	1	4/01/2023	0.004	0.004	0.004				
Jan-23	Zinc	(mg/L)	Quarterly	1	4/01/2023	0.46	0.46	0.46				

POINT 32 **Groundwater quality monitoring bore marked and shown as EPA ID 32 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Quarterly	1	4/01/2023	2.70	2.70	2.70				
Jan-23	Ammonia	(mg/L)	Quarterly	1	4/01/2023	0.05	0.05	0.05				
Jan-23	Arsenic (III)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Arsenic (V)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Cadmium	(mg/L)	Quarterly	1	4/01/2023	<0.0001	<0.0001	<0.0001				
Jan-23	Chromium (trivalent)	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Copper	(mg/L)	Quarterly	1	4/01/2023	0.003	0.003	0.003				
Jan-23	Electrical Conductivity	(us/cm)	Quarterly	1	4/01/2023	370	370	370				
Jan-23	Iron	(mg/L)	Quarterly	1	4/01/2023	15	15	15				
Jan-23	Lead	(mg/L)	Quarterly	1	4/01/2023	0.004	0.004	0.004				Next sample scheduled for April 2023
Jan-23	Magnesium	(mg/L)	Quarterly	1	4/01/2023	14	14	14				
Jan-23	Manganese	(mg/L)	Quarterly	1	4/01/2023	0.097	0.097	0.097				
Jan-23	Nickel	(mg/L)	Quarterly	1	4/01/2023	0.003	0.003	0.003				
Jan-23	pH	pH	Quarterly	1	4/01/2023	5.63	5.63	5.63				
Jan-23	Potassium	(mg/L)	Quarterly	1	4/01/2023	2.0	2.0	2.0				
Jan-23	Selenium	(mg/L)	Quarterly	1	4/01/2023	0.001	0.001	0.001				
Jan-23	Sodium	(mg/L)	Quarterly	1	4/01/2023	57	57	57				
Jan-23	Standing Water Level	(m)	Quarterly	1	4/01/2023	3.88	3.88	3.88				
Jan-23	Vanadium	(mg/L)	Quarterly	1	4/01/2023	0.002	0.002	0.002				
Jan-23	Zinc	(mg/L)	Quarterly	1	4/01/2023	0.018	0.018	0.018				

POINT 33 **Groundwater quality monitoring bore marked and shown as EPA ID 33 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Quarterly	1	4/01/2023	11	11	11				
Jan-23	Ammonia	(mg/L)	Quarterly	1	4/01/2023	0.22	0.22	0.22				
Jan-23	Arsenic (III)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Arsenic (V)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Cadmium	(mg/L)	Quarterly	1	4/01/2023	0.0003	0.0003	0.0003				
Jan-23	Chromium (trivalent)	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Copper	(mg/L)	Quarterly	1	4/01/2023	0.014	0.014	0.014				
Jan-23	Electrical Conductivity	(us/cm)	Quarterly	1	4/01/2023	46000	46000	46000				
Jan-23	Iron	(mg/L)	Quarterly	1	4/01/2023	96	96	96				Next sample scheduled for April 2023
Jan-23	Lead	(mg/L)	Quarterly	1	4/01/2023	0.023	0.023	0.023				
Jan-23	Magnesium	(mg/L)	Quarterly	1	4/01/2023	1400	1400	1400				
Jan-23	Manganese	(mg/L)	Quarterly	1	4/01/2023	0.68	0.68	0.68				
Jan-23	Nickel	(mg/L)	Quarterly	1	4/01/2023	0.01	0.01	0.01				
Jan-23	pH	pH	Quarterly	1	4/01/2023	6.28	6.28	6.28				
Jan-23	Potassium	(mg/L)	Quarterly	1	4/01/2023	380	380	380				
Jan-23	Selenium	(mg/L)	Quarterly	1	4/01/2023	0.001	0.001	0.001				
Jan-23	Sodium	(mg/L)	Quarterly	1	4/01/2023	11000	11000	11000				
Jan-23	Standing Water Level	(m)	Quarterly	1	4/01/2023	0.54	0.54	0.54				
Jan-23	Vanadium	(mg/L)	Quarterly	1	4/01/2023	0.019	0.019	0.019				
Jan-23	Zinc	(mg/L)	Quarterly	1	4/01/2023	0.085	0.085	0.085				

POINT 34 **Groundwater quality monitoring bore marked and shown as EPA ID 33 on The Plans ("VX837351-1 AND "VX837351-2" 03/06/2020 EPA REFERENCE DOC20/476695 AND DOC20/476695-1).**

Month	Pollutant	Unit of Measure	Sample/Measurement Frequency	Samples Collected & Analysed	Date Sampled	Lowest Sample Value	Mean of Samples	Highest Sample Value	99 Percentile Concentration Limit	100 Percentile Concentration Limit	Exceedance (yes/no)	Comments
Jan-23	Aluminium	(mg/L)	Quarterly	1	4/01/2023	9.00	9.00	9.00				
Jan-23	Ammonia	(mg/L)	Quarterly	1	4/01/2023	0.02	0.02	0.02				
Jan-23	Arsenic (III)	(mg/L)	Quarterly	1	4/01/2023	0.002	0.002	0.002				
Jan-23	Arsenic (V)	(mg/L)	Quarterly	1	4/01/2023	<0.001	<0.001	<0.001				
Jan-23	Cadmium	(mg/L)	Quarterly	1	4/01/2023	<0.0001	<0.0001	<0.0001				
Jan-23	Chromium (trivalent)	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Chromium (VI) Compounds	(mg/L)	Quarterly	1	4/01/2023	<0.005	<0.005	<0.005				
Jan-23	Copper	(mg/L)	Quarterly	1	4/01/2023	0.020	0.020	0.020				
Jan-23	Electrical Conductivity	(us/cm)	Quarterly	1	4/01/2023	690	690	690				
Jan-23	Iron	(mg/L)	Quarterly	1	4/01/2023	15	15	15				Next sample scheduled for April 2023
Jan-23	Lead	(mg/L)	Quarterly	1	4/01/2023	0.016	0.016	0.016				
Jan-23	Magnesium	(mg/L)	Quarterly	1	4/01/2023	19	19	19				
Jan-23	Manganese	(mg/L)	Quarterly	1	4/01/2023	0.082	0.082	0.082				
Jan-23	Nickel	(mg/L)	Quarterly	1	4/01/2023	0.009	0.009	0.009				
Jan-23	pH	pH	Quarterly	1	4/01/2023	4.51	4.51	4.51				
Jan-23	Potassium	(mg/L)	Quarterly	1	4/01/2023	4	4	4				
Jan-23	Selenium	(mg/L)	Quarterly	1	4/01/2023	0.001	0.001	0.001				
Jan-23	Sodium	(mg/L)	Quarterly	1	4/01/2023	150	150	150				
Jan-23	Standing Water Level	(m)	Quarterly	1	4/01/2023	0.72	0.72	0.72				
Jan-23	Vanadium	(mg/L)	Quarterly	1	4/01/2023	0.05	0.05	0.05				
Jan-23	Zinc	(mg/L)	Quarterly	1	4/01/2023	0.036	0.036	0.036				

GENERAL COMMENTS