



MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: January 2022

Obtained Date: 15 February 2022

Publication Date: 21 February 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 7th March 2018 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month.						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
7 (SD7)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
9 (SD9)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
36 (SD12)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	10/01/22	22:30	2.7	<20	35	<20	45	0.0	No
NM2	10/01/22	23:30	3.9	<20	39	<20	45	0.0	No
NM3	10/01/22	23:40	4.0	IA	35	IA	45	0.0	No
NM4	10/01/22	23:00	2.8	<20	35	20	45	0.0	No
NM5	10/01/22	22:00	2.1	IA	35	IA	45	0.0	No
NM6	10/01/22	23:56	3.8	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore no further assessment of low frequency noise was required to be undertaken.

Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	12	92.5	105.1	120	No
	Vibration	mm/s		12	0.25	1.75	10	No

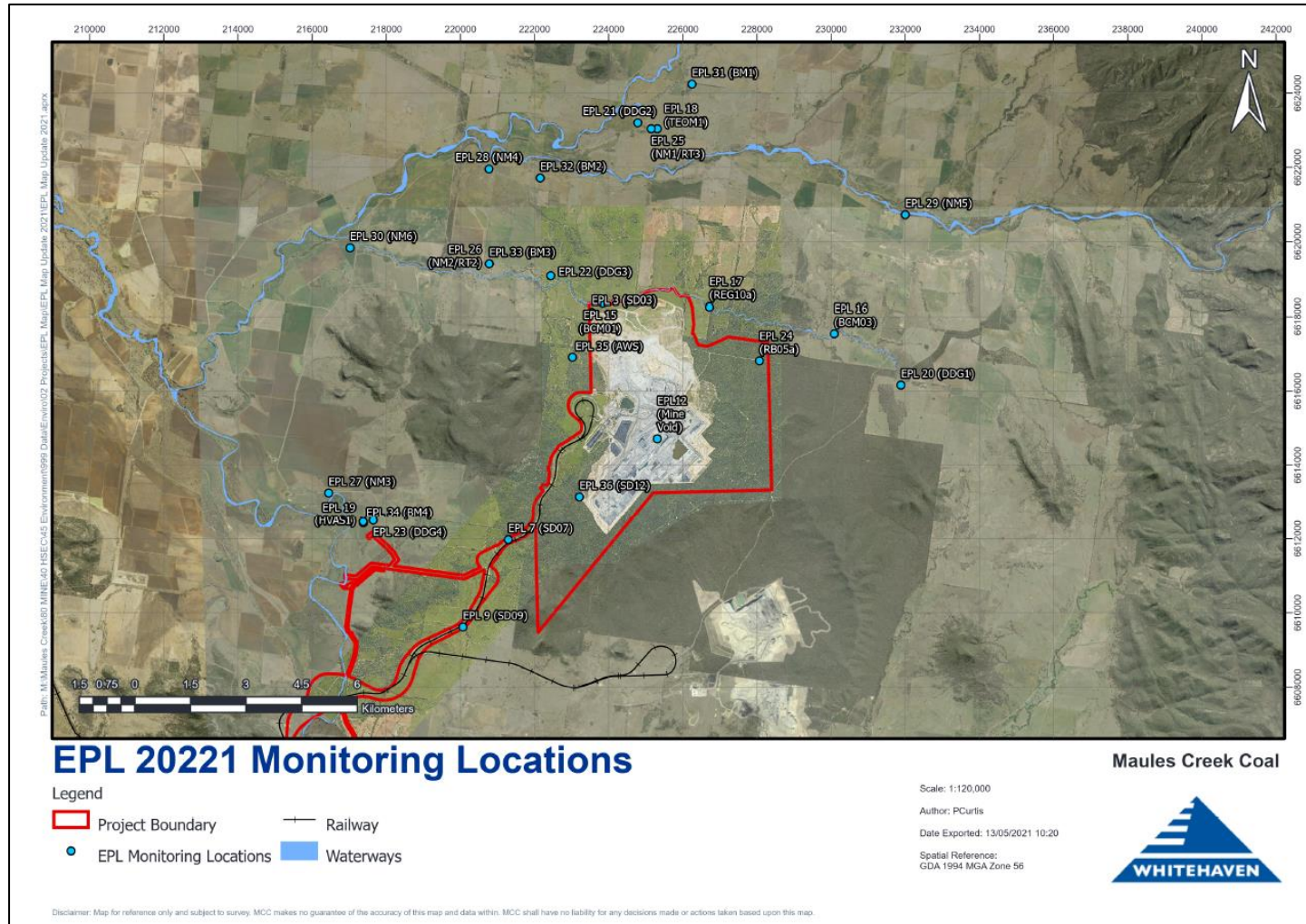
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	6.2	30	No
19 (HVAS)	6 days	µg/m ³	PM ₁₀	9.3	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.5	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	2.0	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.6	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.4	4	No

Figure 1 – EPL 20221 Monitoring Location





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Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: February 2022

Obtained Date: 17 March 2022

Publication Date: 21 March 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 7th March 2018 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month.						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
7 (SD7)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
9 (SD9)	TSS	mg/L	Special Frequency Discharge only	1	25/02/2022	7/03/2022	NA	NA	NA	129
	Conductivity	µs/cm								1220
	Oil & Grease	mg/L								<5
	pH	pH								8.02
36 (SD12)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month.						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	0	Reporting due during March 2022 reporting period.				
	Conductivity	µs/cm							
	Oil & Grease	mg/L							
	pH	pH							

Table 3 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	Next sample March 2022				
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit L _{Aeq} 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit L _{A1} (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	8/02/2022	22:45	0.3	<25	35	<25	45	0.0	No
NM2	8/02/2022	23:15	0.5	<25	39	<25	45	0.0	No
NM3	9/02/2022	00:05	0.6	IA	35	IA	45	0.0	No
NM4	8/02/2022	23:45	0.1	<20	35	<20	45	0.0	No
NM5	8/02/2022	22:00	0.5	25	35	28	45	0.0	No
NM6	8/02/2022	00:09	0.8	<20	35	<20	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore no further assessment of low frequency noise was required to be undertaken. Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	10	96.6	113.2	120	No
	Vibration	mm/s		10	0.19	0.58	10	No

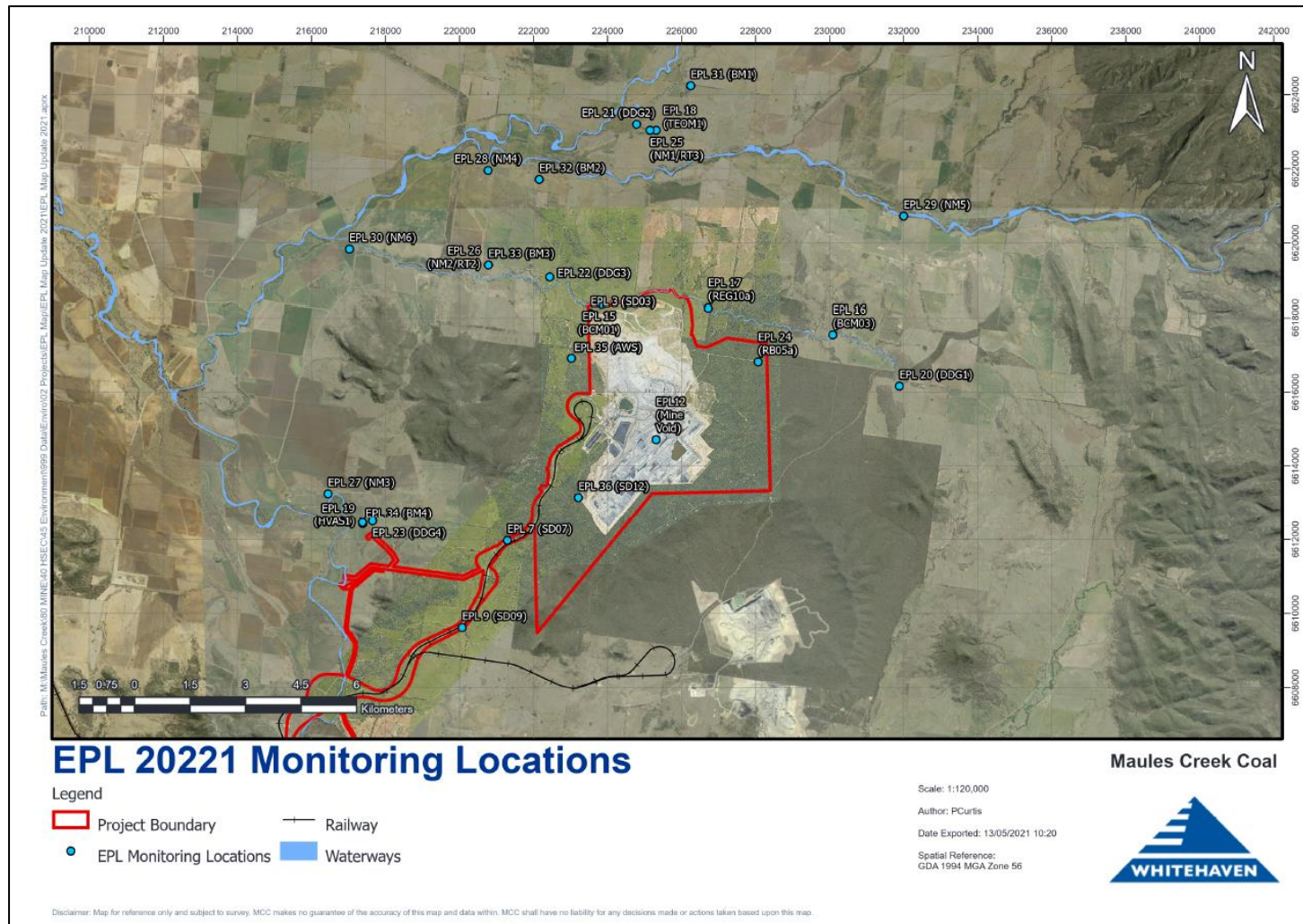
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	6.0	30	No
19 (HVAS)	6 days	µg/m ³	PM ₁₀	9.5	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.5	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	1.7	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.5	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.3	4	No

Figure 1 – EPL 20221 Monitoring Locations





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Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: March 2022

Obtained Date: 14th April 2022

Publication Date: 21st April 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 7th March 2018 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
36 (SD12)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	15/03/2022	Yes			25
	Conductivity	µs/cm							1110
	Oil & Grease	mg/L							<5
	pH	pH							8.26

Table 3 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	Dry – Next sample in June 2022				
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0	Dry – Next sample in June 2022				
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0	Dry – Next sample in June 2022				
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	1	18/03/22	Yes			7.51
	Conductivity	µs/cm							1810
	TDS	mg/L							1070

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit L _{Aeq} 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit L _{A1} (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	7/03/2022	22:30	0.3	20	35	25	45	0.0	No
NM2	7/03/2022	23:30	0.6	25	39	40	45	0.0	No
NM3	7/03/2022	23:33	0.7	IA	35	IA	45	0.0	No
NM4	7/03/2022	23:00	0.6	<20	35	<20	45	0.0	No
NM5	7/03/2022	22:00	1.0	IA	35	IA	45	0.0	No
NM6	7/03/2022	23:56	0.3	<20	35	<20	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore no further assessment of low frequency noise was required to be undertaken.

Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	8	94.3	110.6	120	No
	Vibration	mm/s		8	0.15	0.35	10	No

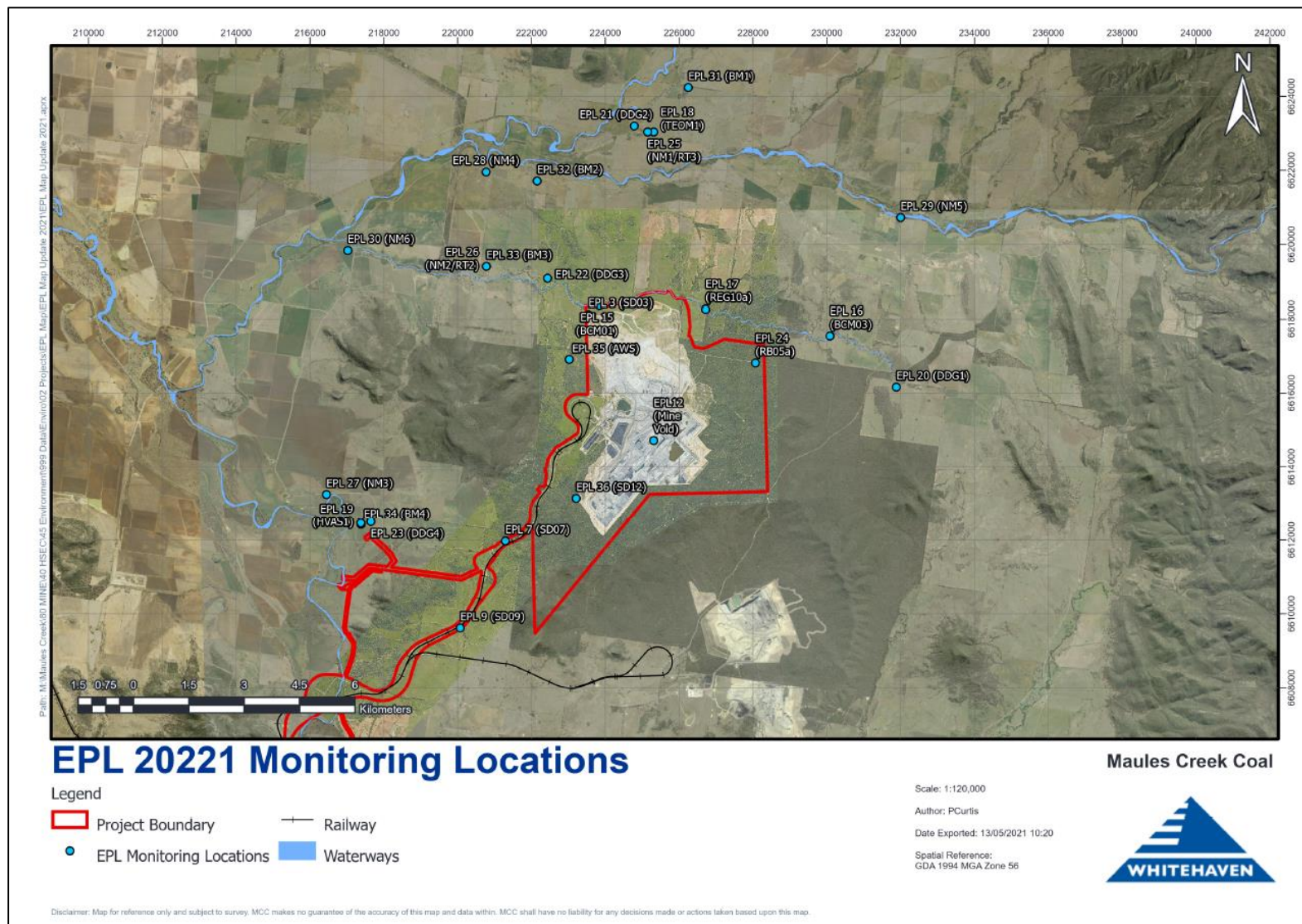
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m³ month	PM ₁₀	5.9	30	No
19 (HVAS)	5 days	µg/m³	PM ₁₀	9.4	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m² month	1.5	4	No
21 (DDG2/MC2)	Monthly	g/m² month	1.6	4	No
22 (DDG3/MC3)	Monthly	g/m² month	1.5	4	No
23 (DDG4/MC4)	Monthly	g/m² month	1.2	4	No

Figure 1 – EPL 20221 Monitoring Locations





MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: April 2022

Obtained Date: 13th May 2022

Publication Date: 16th May 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 7th March 2018 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	Next Sample May 2022					
	Conductivity	µs/cm							
	Oil & Grease	mg/L							
	pH	pH							

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
36 (SD12)	TSS	mg/L	Special Frequency Discharge only							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

Table 3 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	Next sample in June 2022				
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	0					
	Conductivity	µs/cm							
	TDS	mg/L							

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit L _{Aeq} 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit L _{A1} (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	12/04/2022	23:30	0.4	IA	35	IA	45	0.0	No
NM2	12/04/2022	23:00	0.1	28	39	31	45	0.0	No
NM3	12/04/2022	23:32	0.3	IA	35	IA	45	0.0	No
NM4	12/04/2022	22:30	0.8	26	35	32	45	0.0	No
NM5	13/04/2022	00:00	0.6	IA	35	IA	45	0.0	No
NM6	12/04/2022	23:00	0.5	25	35	28	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore no further assessment of low frequency noise was required to be undertaken.

Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	6	93.25	107.9	120	No
	Vibration	mm/s		6	0.13	0.29	10	No

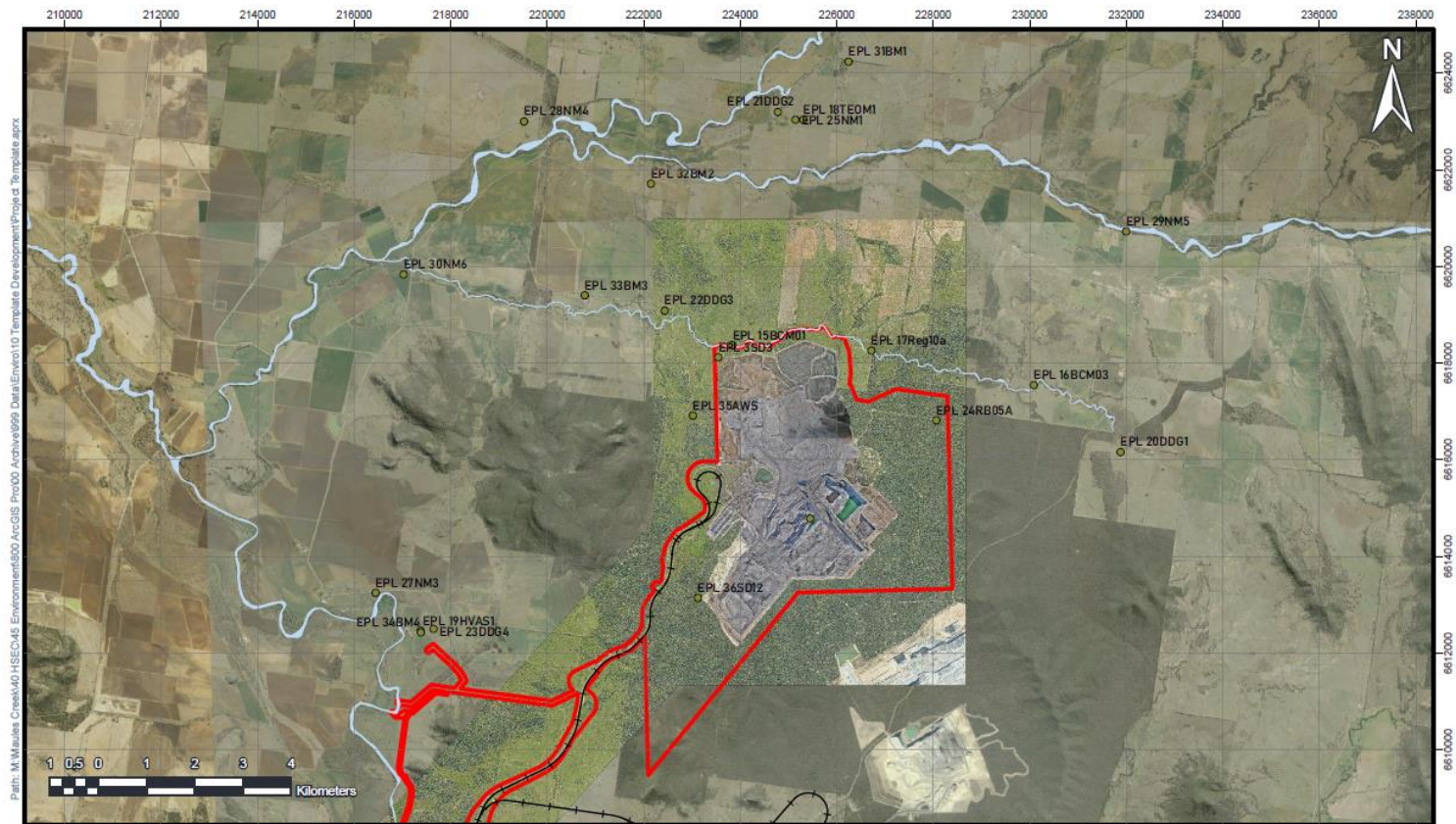
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.6	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.8	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.6	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	1.5	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.6	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.3	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations

Legend

PA Boundary

Project Boundary

EPL Monitoring Locations

Railway

Waterways

Scale: 1:105,390

Author: AFrend

Date Exported: 16/05/2022

Spatial Reference: GDA 2020 MGA Zone 56

Maules Creek Coal



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.



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Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: May 2022

Obtained Date: 16th June 2022

Publication Date: 20th June 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 30th March 2022 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value							
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month													
	Conductivity	µs/cm															
	Oil & Grease	mg/L															
	pH	pH															
36 (SD12)	TSS	mg/L	Special Frequency Discharge only														
	Conductivity	µs/cm															
	Oil & Grease	mg/L															
	pH	pH															

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	12/05/2022	16/06/2022	NA	NA	<5
	Conductivity	µs/cm							1190
	Oil & Grease	mg/L							<5
	pH	pH							8.22

Table 3 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value															
15 (BCM01)	pH	pH	Quarterly	0																				
	Conductivity	µs/cm																						
	TDS	mg/L																						
16 (BCM03)	pH	pH	Quarterly	0																				
	Conductivity	µs/cm																						
	TDS	mg/L																						
17 (REG10A)	pH	pH	Quarterly	0																				
	Conductivity	µs/cm																						
	TDS	mg/L																						
24 (RB05A)	pH	pH	Quarterly	0																				
	Conductivity	µs/cm																						
	TDS	mg/L																						

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	05/05/2022	22:30	1.6	<25	35	28	45	0.0	No
NM2	05/05/2022	23:30	1.4	25	39	30	45	0.0	No
NM3	05/05/2022	23:45	1.3	IA	35	IA	45	0.0	No
NM4	05/05/2022	23:00	1.1	<25	35	<25	45	0.0	No
NM5	05/05/2022	22:00	1.9	IA	35	IA	45	0.0	No
NM6	05/05/2022	23:56	1.6	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

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Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore no further assessment of low frequency noise was required to be undertaken.

Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	9	92.1	102.2	120	No
	Vibration	mm/s		9	0.15	0.9	10	No

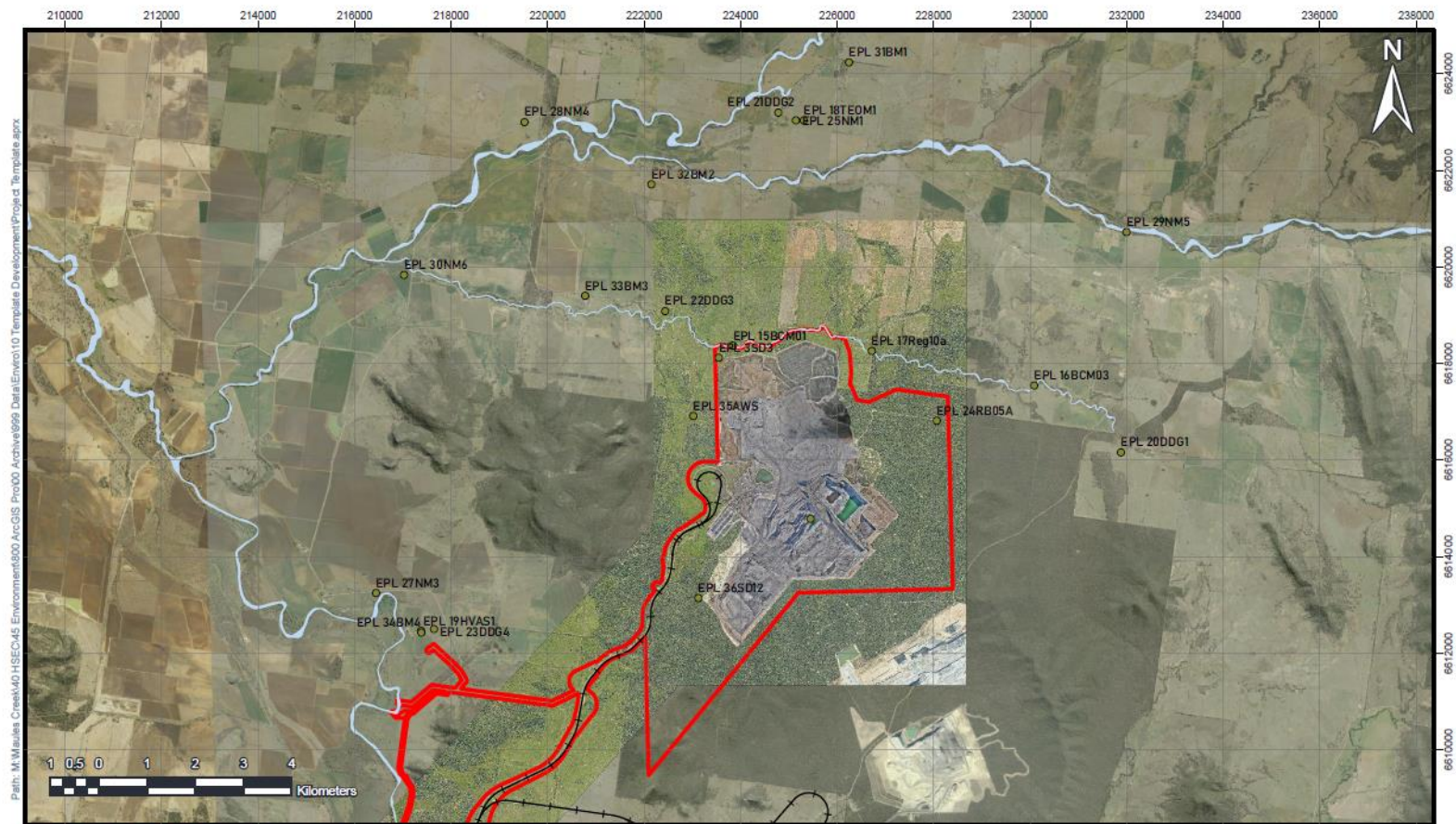
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.5	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.8	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.2	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	1.3	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.6	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.2	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations

Legend

PA Boundary

Project Boundary

EPL Monitoring Locations

Railway

Waterways

Scale: 1:105,390

Author: AFrend

Date Exported: 16/05/2022

Spatial Reference: GDA 2020 MGA Zone 56

Maules Creek Coal



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.



MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: June 2022

Obtained Date: 18th July 2022

Publication Date: 19th July 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 30th March 2022 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Table 1 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value							
3 (SD3)	TSS	mg/L	Special Frequency Discharge only	No discharge at these locations this month													
	Conductivity	µs/cm															
	Oil & Grease	mg/L															
	pH	pH															
36 (SD12)	TSS	mg/L	Special Frequency Discharge only														
	Conductivity	µs/cm															
	Oil & Grease	mg/L															
	pH	pH															

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	Next Sample in July 2022					
	Conductivity	µs/cm							
	Oil & Grease	mg/L							
	pH	pH							

Table 3 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	1	20/06/2022	YES			7.54
	Conductivity	µs/cm							1820
	TDS	mg/L							1070

Table 4 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	08/06/2022	22:30	0.5	<25	35	28	45	0.0	No
NM2	08/06/2022	23:30	0.9	<25	39	<25	45	0.0	No
NM3	08/06/2022	23:37	1	IA	35	IA	45	0.0	No
NM4	08/06/2022	23:00	0.3	<25	35	<25	45	0.0	No
NM5	08/06/2022	22:00	0.3	22	35	25	45	0.0	No
NM6	08/06/2022	23:57	1.3	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 5 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Table 6 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	10	90.23	104	120	No
	Vibration	mm/s		10	0.14	0.62	10	No

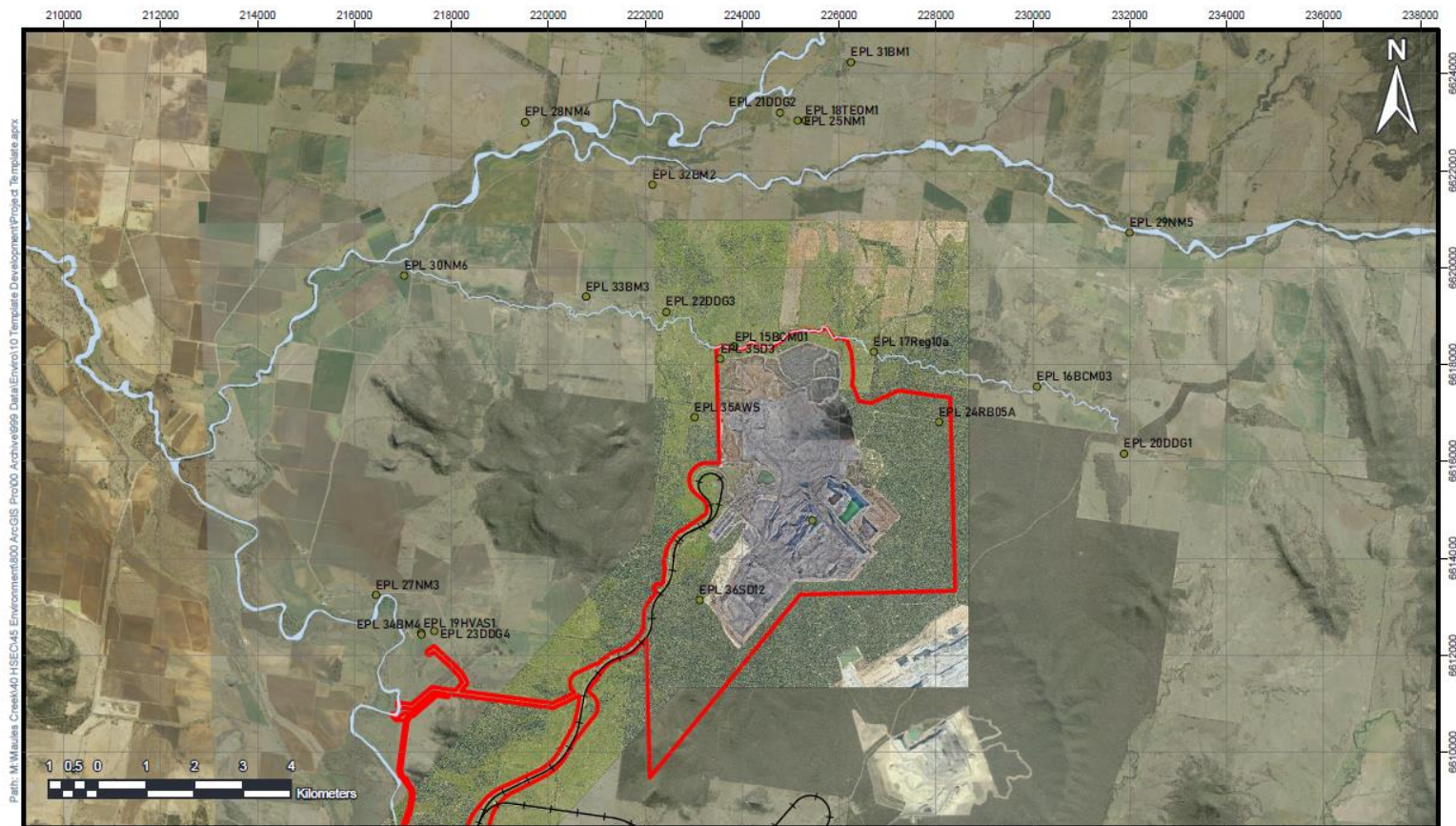
Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Table 7 – Dust Monitoring (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m³ month	PM ₁₀	5.6	30	No
19 (HVAS)	5 days	µg/m³	PM ₁₀	8.7	30	No

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m² month	1.2	4	No
21 (DDG2/MC2)	Monthly	g/m² month	1.4	4	No
22 (DDG3/MC3)	Monthly	g/m² month	1.7	4	No
23 (DDG4/MC4)	Monthly	g/m² month	1.3	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations

Legend

PA Boundary

Project Boundary

EPL Monitoring Locations

Railway

Waterways

Maules Creek Coal

Scale: 1:105,390

Author: AFrend

Date Exported: 16/05/2022

Spatial Reference: GDA 2020 MGA Zone 56



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MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: July 2022

Obtained Date: 15th August 2022

Publication Date: 20th August 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Ground Water Monitoring

Table 1 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	Next sample in September 2022					
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							

Surface Water Monitoring

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	14/07/2022	15/08/2022	NA	NA	<5
	Conductivity	µs/cm							1120
	Oil & Grease	mg/L							<5
	pH	pH							8.23

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Ambient Flow - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
39 (Flow Meter downstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								

Table 5 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge at these locations this month						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
43 (HWD11)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
44 (WCWD)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,							
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
45 (ECWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.							
	pH	pH								
	TSS	mg/L								
46 (WCWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.							
	pH	pH								
	TSS	mg/L								

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	14/07/2022	22:30	0.3	25	35	27	45	0.0	No
NM2	14/07/2022	23:30	0.4	30	39	35	45	0.0	No
NM3	14/07/2022	23:30	0.4	<25	35	27	45	0.0	No
NM4	14/07/2022	23:00	0.5	<20	35	35	45	0.0	No
NM5	14/07/2022	22:00	1.2	IA	35	IA	45	0.0	No
NM6	14/07/2022	23:55	0.3	<25	35	<25	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken. Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	13	94.1	111.1	120	No
	Vibration	mm/s		13	0.14	0.64	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

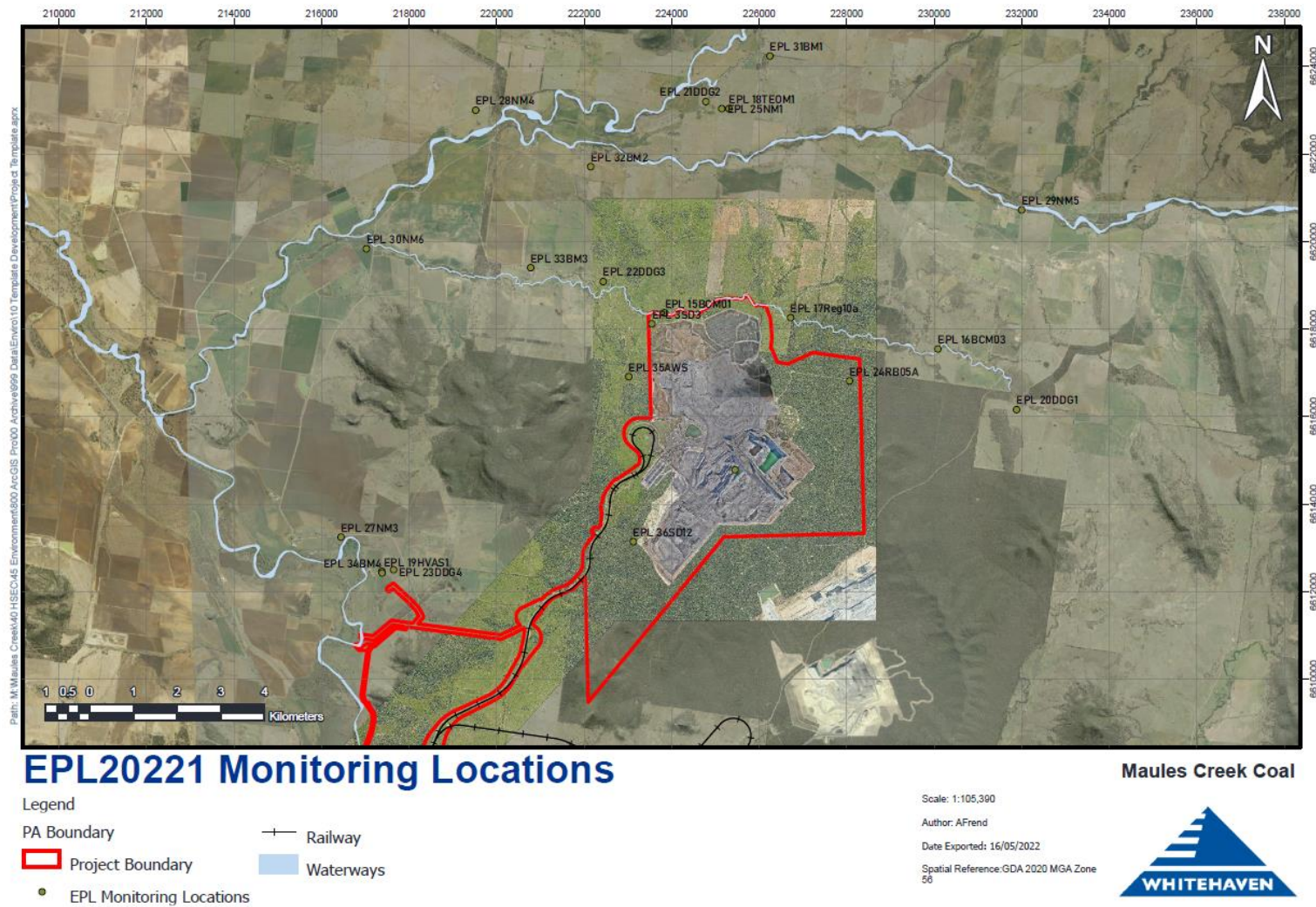
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.6	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	10.6	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.5	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.2	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	1.1	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.8	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.2	4	No

Figure 1 – EPL 20221 Monitoring Locations



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.

MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: August 2022

Obtained Date: 15th September 2022

Publication Date: 22th September 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Ground Water Monitoring

Table 1 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	Next sample in September 2022					
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							

Surface Water Monitoring

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	Next sample in September 2022					
	Conductivity	µs/cm							
	Oil & Grease	mg/L							
	pH	pH							

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 -within 12 hours of discharge from any discharge location.	1	16/08/2022	YES				215
	Nitrate	mg/L								3.73
	Nitrogen (total)	mg/L								6
	Oil & Grease	mg/L								<5
	pH	pH								7.55
	Phosphorous	mg/L								0.19
	Reactive Phosphorous	mg/L								0.02
	TSS	mg/L								13
39 (Flow Meter downstream)	Conductivity	µs/cm	Special Frequency 3 -within 12 hours of discharge from any discharge location.	1	16/08/2022	YES				213
	Nitrate	mg/L								2.98
	Nitrogen (total)	mg/L								5.1
	Oil & Grease	mg/L								<5
	pH	pH								7.67
	Phosphorous	mg/L								0.20
	Reactive Phosphorous	mg/L								0.03
	TSS	mg/L								12
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during August 2022						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								

41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during August 2022						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during August 2022						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
43 (HWD11)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during August 2022						
	Conductivity	µs/cm								
	Oil & Grease	mg/L								
	pH	pH								
44	TSS	mg/L	Special Frequency 2	1	15/08/2022	YES				24

(WCWD)	Conductivity	µs/cm	– prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge.							600
	Oil & Grease	mg/L								<5
	pH	pH								8.07
45 (ECWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.	No discharge occurred from this monitoring location during August 2022						
	pH	pH								
	TSS	mg/L								
46 (WCWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.	1	16/08/2022					<5
	pH	pH								8.01
	TSS	mg/L								40

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	22/08/2022	22:30	1.1	IA	35	IA	45	0.0	No
NM2	22/08/2022	23:30	0.6	IA	39	IA	45	0.0	No
NM3	22/08/2022	23:32	0.7	IA	35	IA	45	0.0	No
NM4	22/08/2022	23:00	0.6	IA	35	IA	45	0.0	No
NM5	22/08/2022	22:00	0.6	IA	35	IA	45	0.0	No
NM6	22/08/2022	23:56	0.3	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	9	89.5	105.1	120	No
	Vibration	mm/s		9	0.17	0.63	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

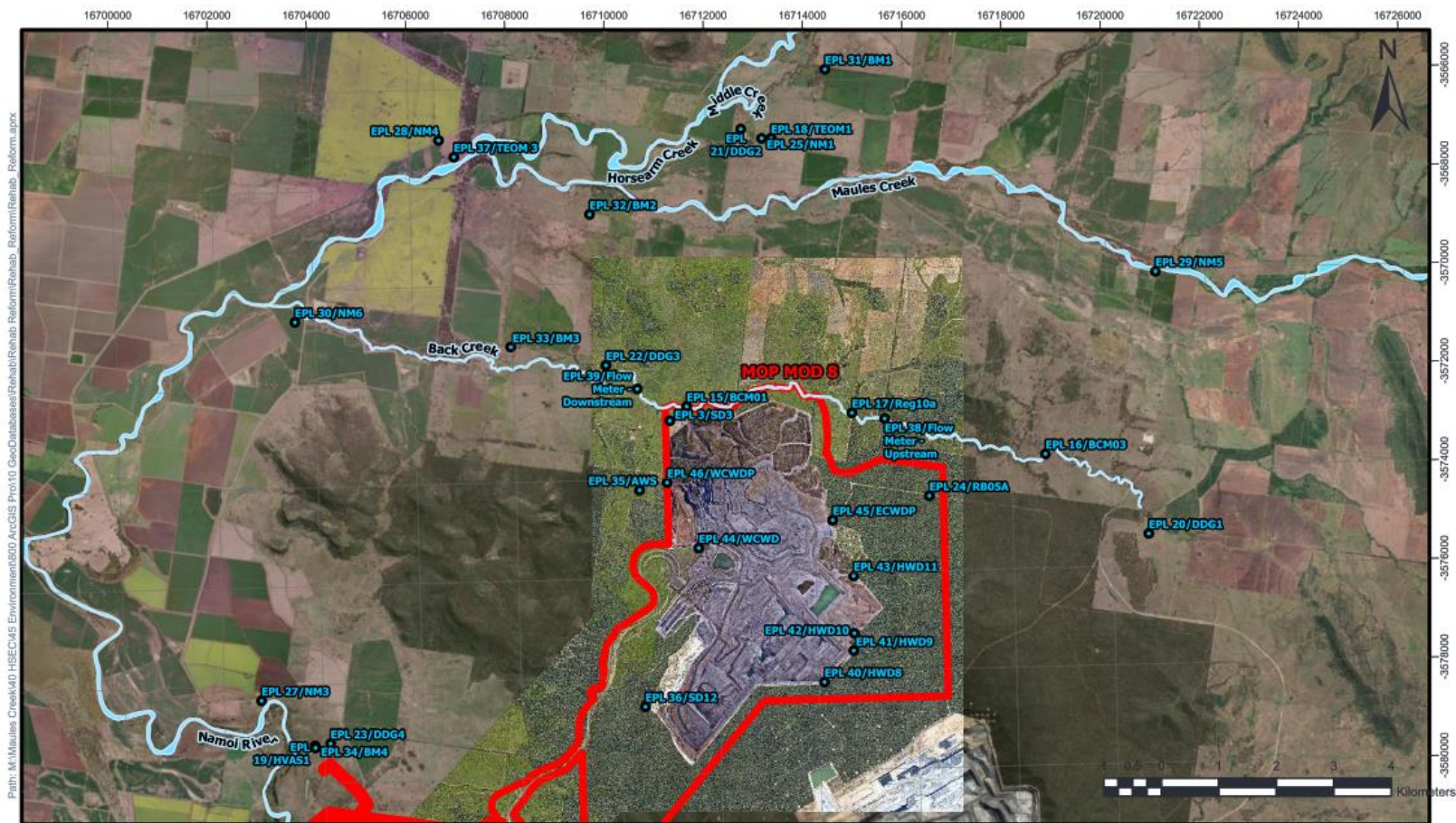
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.5	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	11.1	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.1	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	1.4	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	1.0	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	1.9	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.0	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations - 2/08/2022

Maules Creek Coal

Legend

- EPL Monitoring locations
- 05 Project Boundary_Boundaries
- ▭ MCCM Project Boundary (Mod 8)

Scale: 1:88,442
 Author: shenaneuman
 Date Exported: 16/09/2022 11:51 AM
 Spatial Reference
 Name: GDA2020 MGA Zone 56



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.

MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: September 2022

Obtained Date: 15th October 2022

Publication Date: 25th October 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0	Dry				
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	1	5/09/2022	YES	N/A	N/A	7.59
	Conductivity	µs/cm							1920
	TDS	mg/L							1030

Surface Water Monitoring

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	12/09/2022	15/10/2022	NA	NA	<5
	Conductivity	µs/cm							1110
	Oil & Grease	mg/L							<5
	pH	pH							8.38

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	16/09/2022	YES		NA		105
	Nitrate	mg/L								0.17
	Nitrogen (total)	mg/L								2.1
	Oil & Grease	mg/L								<5
	pH	pH								7.16
	Phosphorous	mg/L								0.27
	Reactive Phosphorous	mg/L								0.04
	TSS	mg/L								152
	Conductivity	µs/cm		1	19/09/2022	YES		NA		160
	Nitrate	mg/L								0.05
	Nitrogen (total)	mg/L								0.5
	Oil & Grease	mg/L								<10
	pH	pH								7.38
	Phosphorous	mg/L								0.1
	Reactive Phosphorous	mg/L								0.03
	TSS	mg/L								27
	Conductivity	µs/cm		1	28/09/2022	YES		NA		181
	Nitrate	mg/L								<0.01
	Nitrogen (total)	mg/L								1.0
	Oil & Grease	mg/L								<5
	pH	pH								7.5
	Phosphorous	mg/L								0.1

	Reactive Phosphorous	mg/L						0.02
	TSS	mg/L						14
39 (Flow Meter downstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	16/09/2022	YES	NA	117
	Nitrate	mg/L						0.29
	Nitrogen (total)	mg/L						1.9
	Oil & Grease	mg/L						<5
	pH	pH						7.43
	Phosphorous	mg/L						0.3
	Reactive Phosphorous	mg/L						0.08
	TSS	mg/L						104
	Conductivity	µs/cm		1	19/09/2022	YES	NA	190
	Nitrate	mg/L						0.32
	Nitrogen (total)	mg/L						0.7
	Oil & Grease	mg/L						<10
	pH	pH						7.54
	Phosphorous	mg/L						0.2
	Reactive Phosphorous	mg/L						0.051
	TSS	mg/L						89
	Conductivity	µs/cm		1	28/09/2022	YES	NA	211
	Nitrate	mg/L						0.23
	Nitrogen (total)	mg/L						1.3
	Oil & Grease	mg/L						<5
	pH	pH						7.41
	Phosphorous	mg/L						0.11
	Reactive Phosphorous	mg/L						0.08

	TSS	mg/L						11
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during September 2022				
	Conductivity	µs/cm						
	Oil & Grease	mg/L						
	pH	pH						
41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 and again within 12hours of discharge,	No discharge occurred from this monitoring location during September 2022				
	Conductivity	µs/cm						
	Oil & Grease	mg/L						
	pH	pH						
42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	16/09/2022	YES	NA	140
	Conductivity	µs/cm						124
	Oil & Grease	mg/L						<5
	pH	pH						7.04
	TSS	mg/L		1	19/09/2022	YES	NA	22
	Conductivity	µs/cm						150
	Oil & Grease	mg/L						<10
	pH	pH						6.74

	TSS	mg/L		1	28/09/2022	YES	NA	27
	Conductivity	µs/cm						116
	Oil & Grease	mg/L						<5
	pH	pH						6.89
43 (HWD11)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	16/09/2022	YES	NA	102
	Conductivity	µs/cm						282
	Oil & Grease	mg/L						<5
	pH	pH						7.12
	TSS	mg/L		1	19/09/2022	YES	NA	21
	Conductivity	µs/cm						180
	Oil & Grease	mg/L						<10
	pH	pH						6.82
	TSS	mg/L		1	28/09/2022	YES	NA	8
	Conductivity	µs/cm						156
	Oil & Grease	mg/L						<5
	pH	pH						7.05
44 (WCWD)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46	1	16/09/2022	YES	NA	374
	Conductivity	µs/cm						308

	Oil & Grease	mg/L	or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period					<5
	pH	pH						7.67
45 (ECWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.	1	16/09/2022		NA	<5
	pH	pH						7.07
	TSS	mg/L						71
	Oil & Grease	mg/L			19/09/2022		NA	<10
	pH	pH						6.97
	TSS	mg/L						45
	Oil & Grease	mg/L		1			NA	<5
	pH	pH						6.91
	TSS	mg/L						11
46 (WCWDP)	Oil & Grease	mg/L	discharge or dewatering occurs after 38.4mL over a 5-day period.	1	16/09/2022		NA	<5
	pH	pH						7.71
	TSS	mg/L						322

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	13/09/2022	22:30	0.5	IA	35	IA	45	0.0	No
NM2	13/09/2022	23:30	0.3	25	39	28	45	0.0	No
NM3	13/09/2022	23:27	0.5	26	35	30	45	0.0	No
NM4	13/09/2022	23:00	0.3	IA	35	IA	45	0.0	No
NM5	13/09/2022	22:00	0.8	IA	35	IA	45	0.0	No
NM6	13/09/2022	23:56	0.4	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	7	91.9	106.8	120	No
	Vibration	mm/s		7	0.15	0.38	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

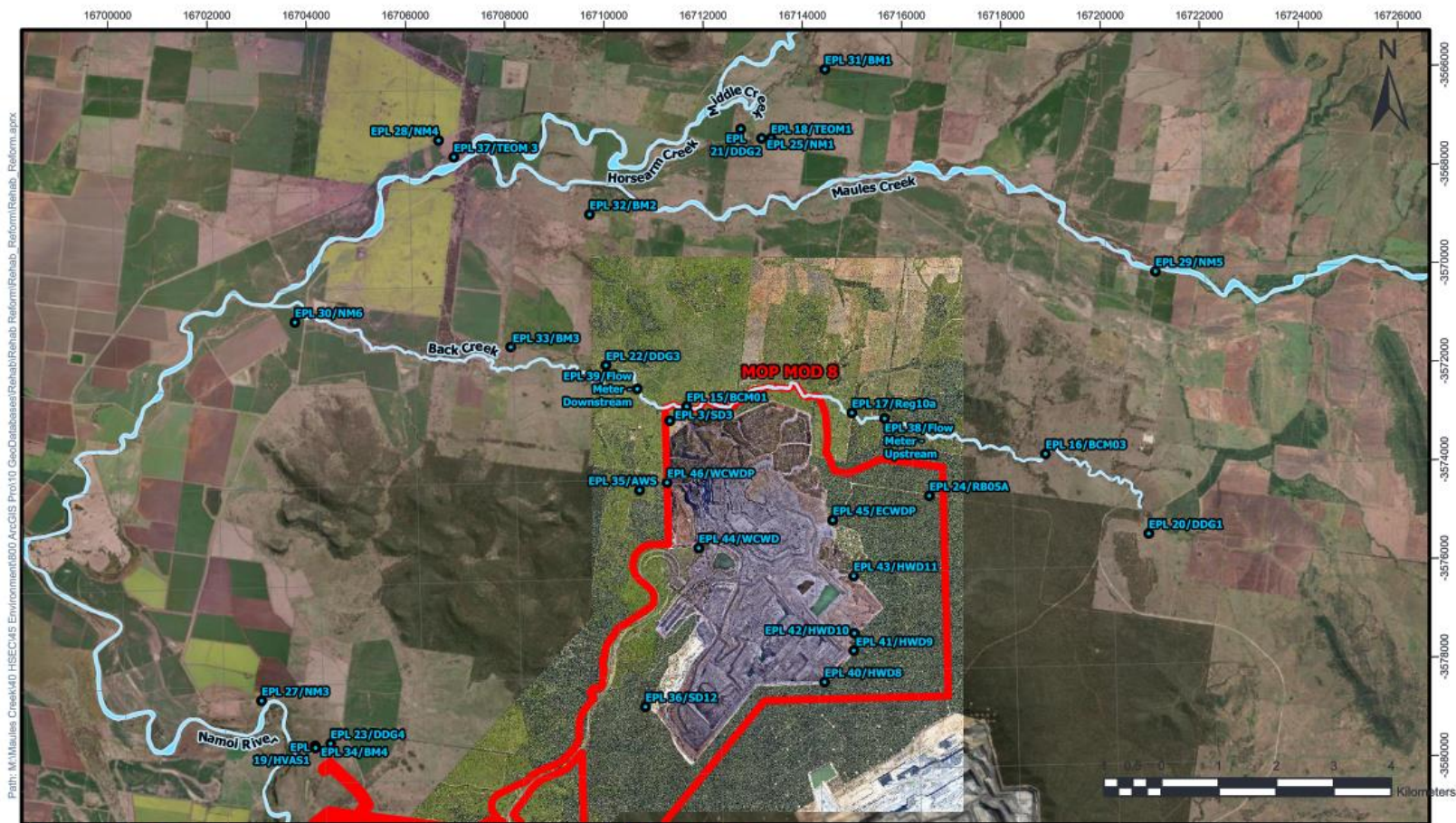
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.4	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	11.8	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.0	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	2.3	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	0.9	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	2.0	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.1	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations - 2/08/2022

Maules Creek Coal

Legend

- EPL Monitoring locations
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- MCCM Project Boundary (Mod 8)

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MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: October 2022

Obtained Date: 15th November 2022

Publication Date: 20th November 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

Monthly Monitoring Summary

Ground Water Monitoring

Table 1 – Groundwater Quality Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	Next sample in December 2022					
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly						
	Conductivity	µs/cm							
	TDS	mg/L							

Surface Water Monitoring

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	13/10/2022	15/11/2022	NA	NA	9
	Conductivity	µs/cm							1080
	Oil & Grease	mg/L							<5
	pH	pH							8.59

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	10/10/2022	YES			NA	174
	Nitrate	mg/L								<0.01
	Nitrogen (total)	mg/L								1.3
	Oil & Grease	mg/L								<5
	pH	pH								7.55
	Phosphorous	mg/L								0.12
	Reactive Phosphorous	mg/L								0.03
	TSS	mg/L								14
	Conductivity	µs/cm		1	18/10/2022	YES			NA	211
	Nitrate	mg/L								0.01
	Nitrogen (total)	mg/L								0.7
	Oil & Grease	mg/L								<5
	pH	pH								7.63
	Phosphorous	mg/L								0.06
	Reactive Phosphorous	mg/L								0.01
	TSS	mg/L								5
	Conductivity	µs/cm		1	21/10/2022	YES			NA	158
	Nitrate	mg/L								0.08
	Nitrogen (total)	mg/L								2.3
	Oil & Grease	mg/L								<5
	pH	pH								7.63
Phosphorous	mg/L	0.66								

	Reactive Phosphorous	mg/L						0.33
	TSS	mg/L						181
39 (Flow Meter downstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	10/10/2022	YES	NA	181
	Nitrate	mg/L						0.04
	Nitrogen (total)	mg/L						1.3
	Oil & Grease	mg/L						<5
	pH	pH						7.36
	Phosphorous	mg/L						0.15
	Reactive Phosphorous	mg/L						0.03
	TSS	mg/L						10
	Conductivity	µs/cm		1	18/10/2022	YES	NA	251
	Nitrate	mg/L						20
	Nitrogen (total)	mg/L						0.60
	Oil & Grease	mg/L						<5
	pH	pH						7.84
	Phosphorous	mg/L						0.09
	Reactive Phosphorous	mg/L						0.03
	TSS	mg/L						5
	Conductivity	µs/cm		1	21/10/2022	YES	NA	110
	Nitrate	mg/L						0.08
	Nitrogen (total)	mg/L						1.7
	Oil & Grease	mg/L						<5
	pH	pH						7.47
	Phosphorous	mg/L						0.30
	Reactive Phosphorous	mg/L						0.10

	TSS	mg/L						88
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	No discharge occurred from this monitoring location during September 2022				
	Conductivity	µs/cm						
	Oil & Grease	mg/L						
	pH	pH						
41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	No discharge occurred from this monitoring location during September 2022				
	Conductivity	µs/cm						
	Oil & Grease	mg/L						
	pH	pH						
42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	10/10/2022	YES	NA	66
	Conductivity	µs/cm						124
	Oil & Grease	mg/L						<5
	pH	pH						6.82
	TSS	mg/L		1	21/10/2022	YES	NA	130
	Conductivity	µs/cm						120
	Oil & Grease	mg/L						<5
	pH	pH						7.22
43 (HWD11)	TSS	mg/L		1	10/10/2022	Yes	NA	34

	Conductivity	µs/cm	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period					166
	Oil & Grease	mg/L						<5
	pH	pH						6.85
	TSS	mg/L		1	18/10/2022	YES	NA	14
	Conductivity	µs/cm						169
	Oil & Grease	mg/L						<5
	pH	pH						6.72
	TSS	mg/L		1	21/10/2022	YES	NA	64
	Conductivity	µs/cm						141
	Oil & Grease	mg/L						<5
	pH	pH						7.26
44 (WCWD)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	10/10/2022	YES	NA	32
	Conductivity	µs/cm						637
	Oil & Grease	mg/L						<5
	pH	pH						7.83
	TSS	mg/L		1	21/10/2022	YES	NA	88
	Conductivity	µs/cm						963
	Oil & Grease	mg/L						<5

	pH	pH						7.70
45 (ECWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences	1	10/10/2022		NA	<5
	pH	pH						6.86
	TSS	mg/L						21
	Oil & Grease	mg/L		1	18/10/2022		NA	<5
	pH	pH						7.12
	TSS	mg/L						5
	Oil & Grease	mg/L		1	21/10/2022		NA	<5
	pH	pH						6.55
	TSS	mg/L						112
46 (WCWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences	1	10/10/2022	YES	NA	<5
	pH	pH						7.77
	TSS	mg/L						26
	Oil & Grease	mg/L		1	21/10/2022	YES	NA	<5
	pH	mg/L						7.91
	TSS	pH						183

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	4/10/2022	23:00	0.9	29	35	34	45	0.0	No
NM2	4/10/2022	23:45	0.3	32	39	35	45	0.0	No
NM3	5/10/2022	00:04	0.3	IA	35	IA	45	0.0	No
NM4	5/10/2022	00:15	0.4	25	35	26	45	0.0	No
NM5	4/10/2022	22:18	0.5	<20	35	<20	45	0.0	No
NM6	5/10/2022	00:46	0.5	<25	35	27	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	8	93.3	106.6	120	No
	Vibration	mm/s		8	0.17	0.81	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

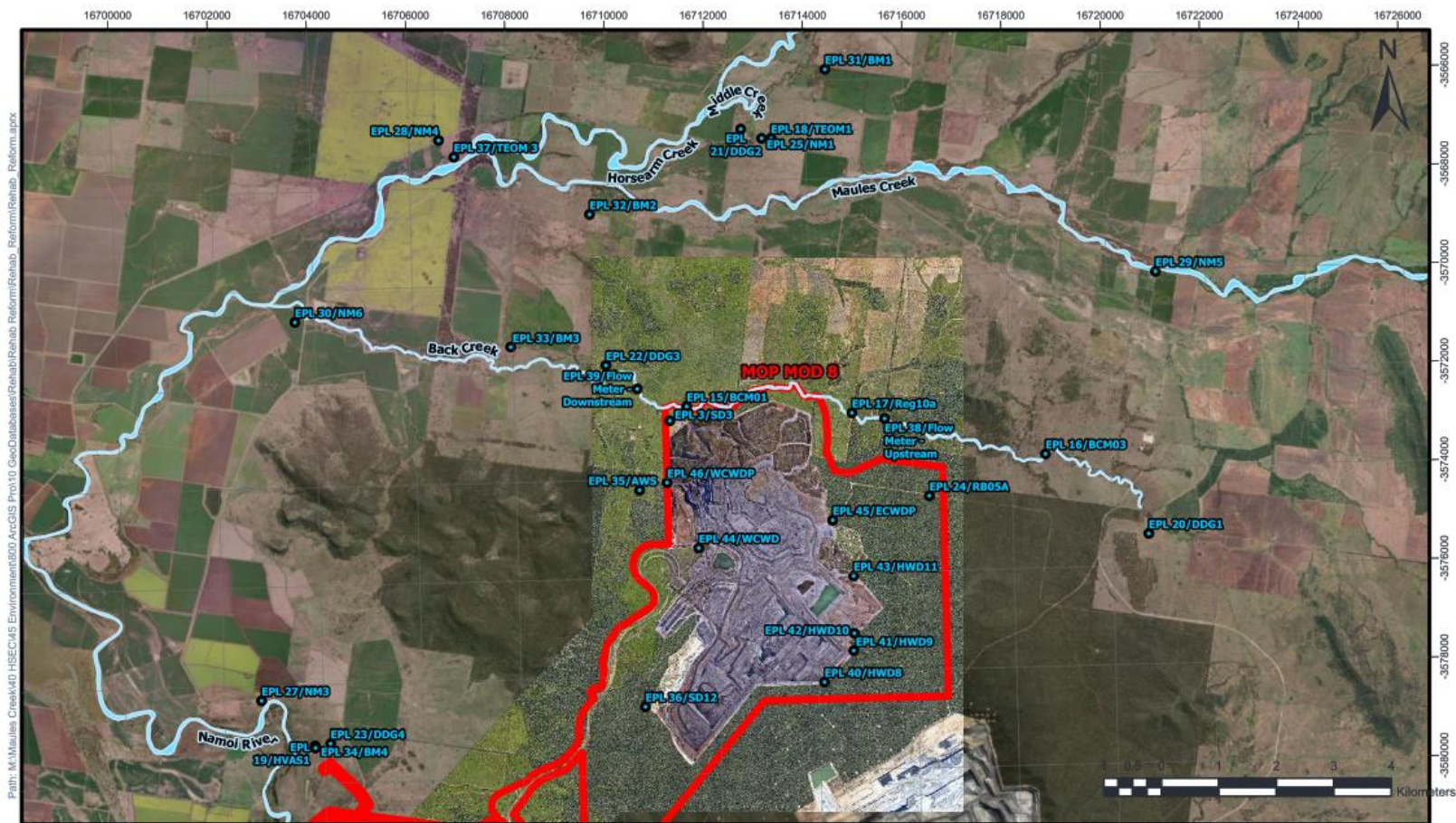
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.1	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	14.2	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	7.9	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	0.8	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	0.9	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	2.1	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.1	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations - 2/08/2022

Maules Creek Coal

Legend

- EPL Monitoring locations
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- MCCM Project Boundary (Mod 8)

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MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: Novemer 2022

Obtained Date: 15th December 2022

Publication Date: 16th December 2022

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.	No discharge at these locations this month						
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value		
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	1/11/2022	YES			NA	130		
	Nitrate	mg/L								0.079		
	Nitrogen (total)	mg/L								0.9		
	Oil & Grease	mg/L								<5		
	pH	pH								7.23		
	Phosphorous	mg/L								0.2		
	Reactive Phosphorous	mg/L								0.072		
	TSS	mg/L								14		
	Conductivity	µs/cm		1	14/11/2022	YES			NA	150		
	Nitrate	mg/L								0.04		
	Nitrogen (total)	mg/L								0.9		
	Oil & Grease	mg/L								<5		
	pH	pH								7.26		
	Phosphorous	mg/L								0.1		
	Reactive Phosphorous	mg/L								0.067		
	TSS	mg/L								89		
	39 (Flow Meter downstream)	Conductivity		µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	1	1/11/2022	YES			NA	140
		Nitrate		mg/L								0.077
Nitrogen (total)		mg/L	1									
Oil & Grease		mg/L	<5									
pH		pH	7.32									
Phosphorous		mg/L	0.2									
Reactive Phosphorous		mg/L	0.071									

	TSS	mg/L						10
	Conductivity	µs/cm		1	14/11/2022	YES	NA	130
	Nitrate	mg/L						0.077
	Nitrogen (total)	mg/L						1.0
	Oil & Grease	mg/L						<5
	pH	pH						7.28
	Phosphorous	mg/L						0.02
	Reactive Phosphorous	mg/L						0.092
	TSS	mg/L						89
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period					No discharge occurred from this monitoring location during November 2022
	Conductivity	µs/cm						
	Oil & Grease	mg/L						
	pH	pH						
41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	1/11/2022	YES	NA	142
	Conductivity	µs/cm						170
	Oil & Grease	mg/L						<5
	pH	pH						7.06
	TSS	mg/L		1	14/11/2022	YES	NA	169
	Conductivity	µs/cm						180
	Oil & Grease	mg/L						<5
	pH	pH						7.09

42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	14/11/2022	YES	NA	62
	Conductivity	µs/cm						100
	Oil & Grease	mg/L						<5
	pH	pH						6.90
43 (HWD11)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	1/11/2022	Yes	NA	118
	Conductivity	µs/cm						113
	Oil & Grease	mg/L						<5
	pH	pH						6.95
	TSS	mg/L		1	14/11/2022	YES	NA	109
	Conductivity	µs/cm						160
	Oil & Grease	mg/L						<5
	pH	pH						6.92
44 (WCWD)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	1	1/11/2022	YES	NA	132
	Conductivity	µs/cm						660
	Oil & Grease	mg/L						<5
	pH	pH						8.32
	TSS	mg/L		1	14/11/2022	YES	NA	80
	Conductivity	µs/cm						180

	Oil & Grease	mg/L						<5
	pH	pH						8.11
45 (ECWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences	1	1/11/2022	YES	NA	<5
	pH	pH						7.17
	TSS	mg/L						157
	Oil & Grease	mg/L		1	14/11/2022		NA	<5
	pH	pH						7.30
	TSS	mg/L						51
46 (WCWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences	1	1/11/2022	YES	NA	<5
	pH	pH						8.09
	TSS	mg/L						144
	Oil & Grease	mg/L		1	14/11/2022	YES	NA	<5
	pH	mg/L						7.29
	TSS	pH						80

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	10/11/2022	22:30	0.9	27	35	30	45	0.0	No
NM2	10/11/2022	23:30	0.8	<20	39	25	45	0.0	No
NM3	10/11/2022	23:51	0.5	<25	35	<25	45	0.0	No
NM4	10/11/2022	23:00	0.3	<20	35	<20	45	0.0	No
NM5	10/11/2022	22:00	0.5	IA	35	IA	45	0.0	No
NM6	10/11/2022	23:56	0.6	IA	35	IA	45	0.0	No

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	7	91.8	102.7	120	No
	Vibration	mm/s		7	0.11	0.25	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

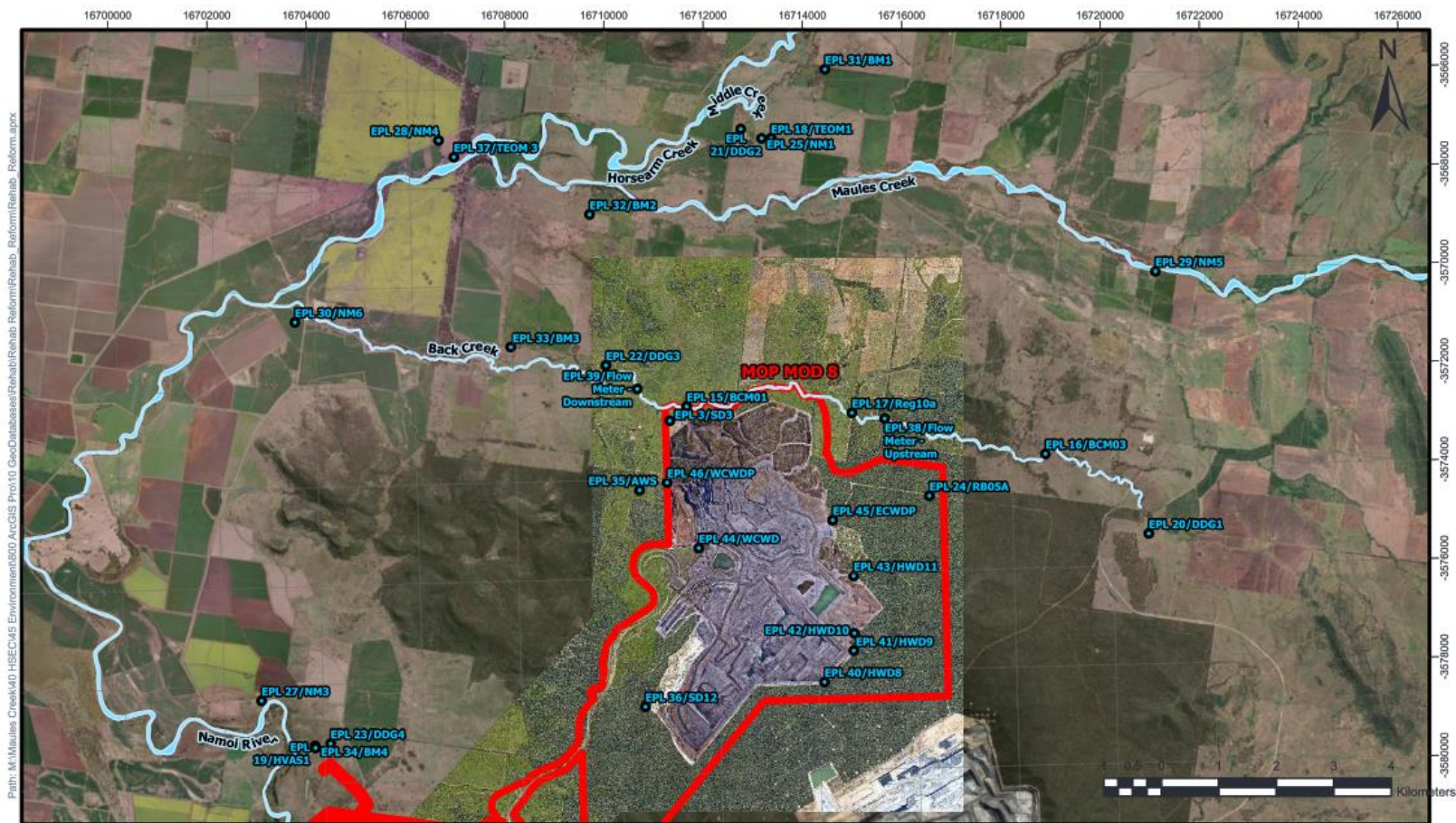
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.1	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	12.1	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.0	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	0.8	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	0.9	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	2.1	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.2	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations - 2/08/2022

Maules Creek Coal

Legend

- EPL Monitoring locations
- 05 Project Boundary_Boundaries
- MCCM Project Boundary (Mod 8)

Scale: 1:88,442
 Author: shenanewman
 Date Exported: 16/09/2022 11:51 AM
 Spatial Reference
 Name: GDA2020 MGA Zone 56



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.

MAULES CREEK COAL MINE – MONTHLY MONITORING SUMMARY

Site Information

EPL No: 20221

EPA Website Link: [Hyperlink to Maules Creek Coal, Environment Protection Licence](#)

Licensee: Maules Creek Coal Mine Pty Ltd

Licensee Address: Maules Creek Coal Mine, Therribri Road, BOGGABRI NSW 2382

EPL Monitoring Points: See Figure 1 below

Sampling Period: December 2022

Obtained Date: 15th January 2023

Publication Date: 20th January 2023

Context: This Monthly Monitoring Summary aligns with the Environment Protection Licence (EPL) No. 20221 – Maules Creek Coal Mine issued 2nd August 2022 by the NSW Environment Protection Authority (EPA).

Ground Water Monitoring

ID EPL (Bore)	Parameters	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
15 (BCM01)	pH	pH	Quarterly	0	5/12/2022	Dry			
	Conductivity	µs/cm							
	TDS	mg/L							
16 (BCM03)	pH	pH	Quarterly	0	6/12/2022	Dry			
	Conductivity	µs/cm							
	TDS	mg/L							
17 (REG10A)	pH	pH	Quarterly	0	5/12/2022	Dry			
	Conductivity	µs/cm							
	TDS	mg/L							
24 (RB05A)	pH	pH	Quarterly	1	2/12/2022	YES	N/A	N/A	7.46
	Conductivity	µs/cm							1800
	TDS	mg/L							1060

Table 2 – Surface Water Monitoring – Mine Void

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min	Mean	Max / Only Value
12 (Mine Void)	TSS	mg/L	Every 2 months	1	9/12/2022	15/01/2022	NA	NA	<5
	Conductivity	µs/cm							1000
	Oil & Grease	mg/L							<5
	pH	pH							8.48

Table 3 – Wet Weather Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value
3 (SD3)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36.							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
36 (SD12)	Conductivity	µs/cm	Special Frequency 1 - within 12 hours of discharge from EPL 3 or 36							
	Nitrate	mg/L								
	Nitrogen (total)	mg/L								
	Oil & Grease	mg/L								
	pH	pH								
	Phosphorous	mg/L								
	Reactive Phosphorous	mg/L								
	TSS	mg/L								
	Conductivity	µs/cm								

Table 4 – Clean Water Discharge - Surface Water Monitoring

ID EPL (Site)	Parameter	Units	Frequency	Samples	Date	Laboratory Results Received	Min Value	Mean Value	Median Value	Max / Only Value							
38 (Flow Meter Upstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.	No discharge occurred from this monitoring location during December 2022													
	Nitrate	mg/L															
	Nitrogen (total)	mg/L															
	Oil & Grease	mg/L															
	pH	pH															
	Phosphorous	mg/L															
	Reactive Phosphorous	mg/L															
	TSS	mg/L															
	Conductivity	µs/cm															
	Nitrate	mg/L															
	Nitrogen (total)	mg/L															
	Oil & Grease	mg/L															
	pH	pH															
	Phosphorous	mg/L															
	Reactive Phosphorous	mg/L															
TSS	mg/L																
39 (Flow Meter downstream)	Conductivity	µs/cm	Special Frequency 3 - within 12 hours of discharge from any discharge location.								No discharge occurred from this monitoring location during December 2022						
	Nitrate	mg/L															
	Nitrogen (total)	mg/L															
	Oil & Grease	mg/L															
	pH	pH															
	Phosphorous	mg/L															
	Reactive Phosphorous	mg/L															
	TSS	mg/L															
	Conductivity	µs/cm															
	Nitrate	mg/L															
	Nitrogen (total)	mg/L															
	Oil & Grease	mg/L															
	pH	pH															
	Phosphorous	mg/L															

	Reactive Phosphorous	mg/L		
	TSS	mg/L		
40 (HWD8)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	
	Conductivity	µs/cm		
	Oil & Grease	mg/L		
	pH	pH		
41 (HWD9)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	
	Conductivity	µs/cm		
	Oil & Grease	mg/L		
	pH	pH		
	TSS	mg/L		
	Conductivity	µs/cm		
	Oil & Grease	mg/L		
	pH	pH		
42 (HWD10)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period	
	Conductivity	µs/cm		
	Oil & Grease	mg/L		
	pH	pH		

43 (HWD11)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period
	Conductivity	µs/cm	
	Oil & Grease	mg/L	
	pH	pH	
	TSS	mg/L	
	Conductivity	µs/cm	
	Oil & Grease	mg/L	
	pH	pH	
44 (WCWD)	TSS	mg/L	Special Frequency 2 – prior to discharging from EPL 45 and/or 46 or within 12hours of discharge caused by 38.4mm in a 5 Day consecutive period
	Conductivity	µs/cm	
	Oil & Grease	mg/L	
	pH	pH	
	TSS	mg/L	
	Conductivity	µs/cm	
	Oil & Grease	mg/L	
	pH	pH	
45 (ECWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences
	pH	pH	

	TSS	mg/L		
	Oil & Grease	mg/L		
	pH	pH		
	TSS	mg/L		
46 (WCWDP)	Oil & Grease	mg/L	not more than 12 hours after discharge commences	
	pH	pH		
	TSS	mg/L		
	Oil & Grease	mg/L		
	pH	mg/L		
	TSS	pH		

Noise Monitoring

Table 6 – Noise Monitoring (Attended – Measured)

MCC ID	Date	Start Time	Wind Speed (m/s)	MCCP LAeq 15min dB	Limit LAeq 15min (dB) Operations Criteria	MCCP LAeq 1min dB	Limit LA1 (1 min) (dB) Operations Criteria	Weather Rain (mm)	Exceedance (Yes / No)
NM1	20/12/2022	22:30	3.3	<20	35	27	45	0.0	NA
NM2	20/12/2022	23:30	2.8	29	39	32	45	0.0	No
NM3	20/12/2022	23:51	3.0	IA	35	IA	45	0.0	No
NM4	20/12/2022	23:00	3.5	26	35	30	45	0.0	NA
NM5	20/12/2022	22:00	4.2	IA	35	IA	45	0.0	NA
NM6	21/12/2022	0:00	3.4	<20	35	23	45	0.0	NA

MCC ID = Locations as per the EPL No.20221.

ND = No data due to high prevailing winds during the attended noise monitoring event.

Italicised text indicates wind speed exceeds the 3.0m/s maximum for noise monitoring.

NM = Not Measurable. If site noise is noted as NM, <20 dB or <30 dB, this means some noise was audible but could not be quantified.

IA = Site noise was inaudible at the monitoring location.

N/A in exceedance column means criterion was not applicable due to atmospheric conditions outside those specified in the project approval.

Table 7 - Noise Monitoring (Attended - Low Frequency Assessment)

None of the measurements satisfied the conditions for further assessment when assessed for the applicability of low frequency modification factors in accordance with the EPA's Noise Policy for Industry. Therefore, no further assessment of low frequency noise was required to be undertaken.

Blast Monitoring

Table 8 – Blast Monitoring (Blasts – Limits Apply)

Location	Parameter	Units	Frequency	Number	Average	Max	100% Limit	Exceedance (Yes / No)
Operations Blasts	Overpressure	Db (Lin Peak)	All	10	93.1	105.3	120	No
	Vibration	mm/s		10	0.11	0.33	10	No

Note: As of March 2018, in accordance with the requirements of the approved variation of EPL 20221; M7.1 blast monitoring results are for four blast monitoring points 31 (BM1), 32 (BM2), 33 (BM3) and 34 (BM4).

Air Quality Monitoring

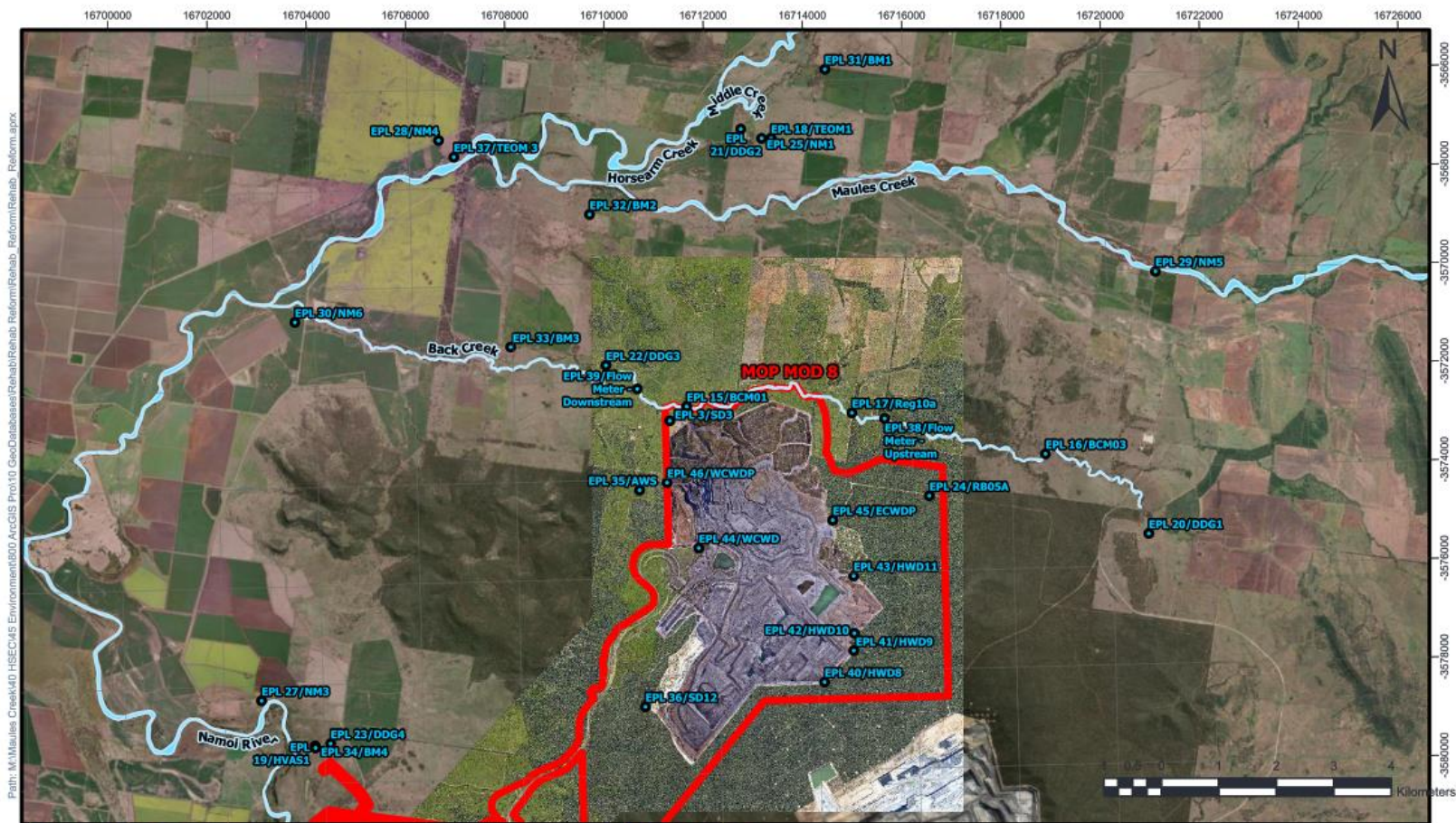
Table 9 – PM₁₀ (Limits Apply)

ID EPL (Site)	Sample period	Unit	Parameter	Rolling Annual Average	NEPM Annual Criteria	Exceedance (Yes / No)
18 (TEOM1)	Continuous	µg/m ³ month	PM ₁₀	5.1	30	No
37 (TEOM3)	Continuous	µg/m ³ month	PM ₁₀	12.5	30	No
19 (HVAS)	5 days	µg/m ³	PM ₁₀	8.0	30	No

Table 10 – Depositional Dust (Limits Apply)

ID EPL (Site)	Sample period	Particulates Deposited Matter	Rolling Annual Average Insoluble Solids	Criteria	Exceedance (Yes / No)
20 (DDG1/MC1)	Monthly	g/m ² month	0.9	4	No
21 (DDG2/MC2)	Monthly	g/m ² month	0.5	4	No
22 (DDG3/MC3)	Monthly	g/m ² month	2.1	4	No
23 (DDG4/MC4)	Monthly	g/m ² month	1.2	4	No

Figure 1 – EPL 20221 Monitoring Locations



EPL20221 Monitoring Locations - 2/08/2022

Maules Creek Coal

Legend

- EPL Monitoring locations
- 05 Project Boundary_Boundaries
- MCCM Project Boundary (Mod 8)

Scale: 1:88,442
 Author: shenanewman
 Date Exported: 16/09/2022 11:51 AM
 Spatial Reference
 Name: GDA2020 MGA Zone 56



Disclaimer: Map for reference only and subject to survey. MCC makes no guarantee of the accuracy of this map and data within. MCC shall have no liability for any decisions made or actions taken based upon this map.

