



## 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 2021

**Obtained Date:** 22 September 2021

**Publication Date:** 22 September 2021

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

## Monthly Monitoring Summary

**Table 1 – Wet Weather Discharge - Surface Water Monitoring**

| ID<br>EPL (Site) | Parameter    | Units | Frequency                                 | Samples | Date | Laboratory<br>Results<br>Received | Min | Mean | Median<br>Value | Max /<br>Only<br>Value |
|------------------|--------------|-------|---|---------|------|-----------------------------------|-----|------|-----------------|------------------------|
| 3<br>(SD3)       | TSS          | mg/L  | Special<br>Frequency<br>Discharge<br>only |         |      |                                   |     |      |                 |                        |
|                  | Conductivity | µs/cm |   |         |      |                                   |     |      |                 |                        |
|                  | Oil & Grease | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | pH           | pH    |   |         |      |                                   |     |      |                 |                        |
| 7<br>(SD7)       | TSS          | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | Conductivity | µs/cm |   |         |      |                                   |     |      |                 |                        |
|                  | Oil & Grease | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | pH           | pH    |   |         |      |                                   |     |      |                 |                        |
| 9<br>(SD9)       | TSS          | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | Conductivity | µs/cm |   |         |      |                                   |     |      |                 |                        |
|                  | Oil & Grease | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | pH           | pH    |   |         |      |                                   |     |      |                 |                        |
| 36<br>(SD12)     | TSS          | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | Conductivity | µs/cm |   |         |      |                                   |     |      |                 |                        |
|                  | Oil & Grease | mg/L  |   |         |      |                                   |     |      |                 |                        |
|                  | pH           | pH    |   |         |      |                                   |     |      |                 |                        |

No Discharge this month

**Table 2 – Surface Water Monitoring – Mine Void**

| ID<br>EPL (Site)  | Parameter    | Units | Frequency         | Samples | Date                          | Laboratory Results<br>Received | Min | Mean | Max /<br>Only<br>Value |
|-------------------|--------------|-------|-------------------|---------|-------------------------------|--------------------------------|-----|------|------------------------|
| 12<br>(Mine Void) | TSS          | mg/L  | Every 2<br>months | 0       | Next Sample<br>September 2021 |                                |     |      |                        |
|                   | Conductivity | µs/cm |                   | 0       |                               |                                |     |      |                        |
|                   | Oil & Grease | mg/L  |                   | 0       |                               |                                |     |      |                        |
|                   | pH           | pH    |                   | 0       |                               |                                |     |      |                        |

**Table 3 – Groundwater Quality Monitoring**

| ID<br>EPL (Bore) | Parameters   | Units | Frequency | Samples | Date | Laboratory<br>Results<br>Received | Min | Mean | Max / Only Value              |
|------------------|--------------|-------|-----------|---------|------|-----------------------------------|-----|------|-------------------------------|
| 15<br>(BCM01)    | pH           | pH    | Quarterly | 0       |      |                                   |     |      | Next sample in September 2021 |
|                  | Conductivity | µs/cm |           |         |      |                                   |     |      |                               |
|                  | TDS          | mg/L  |           |         |      |                                   |     |      |                               |
| 16<br>(BCM03)    | pH           | pH    | Quarterly | 0       |      |                                   |     |      | Next sample in September 2021 |
|                  | Conductivity | µs/cm |           |         |      |                                   |     |      |                               |
|                  | TDS          | mg/L  |           |         |      |                                   |     |      |                               |
| 17<br>(REG10A)   | pH           | pH    | Quarterly | 0       |      |                                   |     |      | Next sample in September 2021 |
|                  | Conductivity | µs/cm |           |         |      |                                   |     |      |                               |
|                  | TDS          | mg/L  |           |         |      |                                   |     |      |                               |
| 24<br>(RB05A)    | pH           | pH    | Quarterly | 0       |      |                                   |     |      | Next sample in September 2021 |
|                  | 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)<br>Operations Criteria | MCCP LA1(1min) dB | Limit LA1 (1 min) (dB)<br>Operations Criteria | Rain (mm) | Exceedance (Yes / No) |
|--------|------------|------------|------------------|--------------------|--|-------------------|---|-----------|-----------------------|
| NM1    | 03/08/2021 | 22:30      | 0.1              | 27                 | 35   | 30                | 45  | 0         | Nil                   |
| NM2    | 03/08/2021 | 23:30      | 2.1              | IA                 | 39   | IA                | 45  | 0         | Nil                   |
| NM3    | 03/08/2021 | 23:45      | 2.8              | IA                 | 35   | IA                | 45  | 0         | Nil                   |
| NM4    | 03/08/2021 | 23:00      | 0.2              | IA                 | 35   | IA                | 45  | 0         | Nil                   |
| NM5    | 03/08/2021 | 22:00      | 0.2              | 25                 | 35   | 30                | 45  | 0         | Nil                   |
| NM6    | 03/08/2021 | 23:56      | 2.4              | IA                 | 35   | IA                | 45  | 0         | Nil                   |

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 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      | 95.72   | 111.0 | 120        | No                    |
|                   | Vibration    | mm/s          |           | 8      | 0.32    | 2.78  | 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 <sup>3</sup> month | PM <sub>10</sub> | 7.9                    | 30                   | No                    |
| 19 (HVAS)     | 6 days        | µg/m <sup>3</sup>       | PM <sub>10</sub> | 11.9                   | 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 <sup>2</sup> month        | 2.4                                     | 4        | No                    |
| 21 (DDG2/MC2) | Monthly       | g/m <sup>2</sup> month        | 2.2                                     | 4        | No                    |
| 22 (DDG3/MC3) | Monthly       | g/m <sup>2</sup> month        | 1.8                                     | 4        | No                    |
| 23 (DDG4/MC4) | Monthly       | g/m <sup>2</sup> month        | 1.3                                     | 4        | No                    |

**Figure 1 - EPL 20221 Monitoring Locations**

