

**WAMBO COAL
POLLUTION MONITORING DATA
1 MARCH 2023 – 31 MARCH 2023**

MARCH MONTHLY REPORT

Published 06 April 2023

**Environment Protection Licence Number: 529
Licensee: Wambo Coal Pty Limited, PMB 1, Singleton NSW 2330
Premises: Wambo Coal Pty Limited, Jerrys Plains Road, Warkworth NSW 2330**

The following pollution monitoring data is published as a requirement of the Wambo Environmental Protection Licence (EPL) 529. A link to EPL529 can be found on the Environmental Protection Authority (EPA) Public Register. A link to the EPA's public register can be found at: <https://www.epa.nsw.gov.au/licensing-and-regulation/public-registers/about-prpoeo>

Monthly interim reports will be provided on a fortnightly basis until a final monthly report is produced when all monthly data is available.

The location of each sampling point is provided in 'Plan 2672-2' at the end of this document.

Monitoring Data

Surface and Mine Water Dam Monitoring

Monitoring Frequency: Once per month

Sampling Method: Grab sample

Limits: Nil

Table 1 - WCPL Surface and Mine Water Dam Results

EPL ID	Site ID	Date	pH	EC (µS/cm)	TSS (mg/L)	Comments
Point 24	SW01	28/03/2023	7.14	790	<5	
Point 25	SW02	28/03/2023	7.27	697	8	
Point 26	SW03	28/03/2023	7.28	698	8	
Point 27	SW04	28/03/2023				DRY
Point 28	SW05	28/03/2023				POOL/NO FLOW
Point 29	SW06	28/03/2023	7.02	373	<5	
Point 30	SW07	28/03/2023	7.16	608	19	
Point 31	SW08	28/03/2023	7.90	4990	<5	
Point 33	SW15	14/03/2023	8.85	5860	24	
Point 34	SW27a	28/03/2023				POOL/NO FLOW
Point 36	SW32a	28/03/2023				DRY
Point 39	SW39	28/03/2023				POOL/NO FLOW
Point 40	SW40	28/03/2023	7.41	613	5	
Point 41	SW41	28/03/2023				POOL/NO FLOW

Water Discharge Monitoring

Monitoring Frequency: Continuous during discharge (EC, pH, Turbidity)
 Daily during discharge (TSS, Volume)
 Sampling Method: In line instrumentation (EC, pH Turbidity)
 Grab sample (TSS)
 Limits: pH- 6.5 to 9.5
 TSS – 120
 Volume – 250ML/day
 Date sampled: Continuous
 Date obtained: Continuous

Table 2 - WCPL Discharge Monitoring

Site	Date	pH (Avg)	Conductivity (µS/cm) Avg	TSS (mg/L)	Turbidity (NTU)	Volume (ML/day)	Comments
Point 4	No Discharges in March						
Point 19	No Discharges in March						

Sewerage Treatment Monitoring

Monitoring Frequency: Quarterly during discharge
 Sampling Method: Grab sample
 Limits: Nil
 Date sampled: Not sampled in March
 Date obtained:

Table 3- WCPL Discharge Monitoring

EPL ID	Site ID	Date	pH	Faecal Coliforms (CFU/100mL)	Comments
Point 43	STPD3	-	-	-	No discharge
Point 52	STPD2	-	-	-	Sampled Quarterly
Point 56	STP1	-	-	-	Sampled Quarterly

PM10 Monitoring

Monitoring Frequency: Continuous

Sampling Method: AM22

Limits: Nil

Date sampled: Continuous

Date obtained: Continuous

Table 4 - WCPL PM10 Results

Date	PM02 (D2)- Wambo Road (Caban) (EPA14)		PM03 (D4) - Thelander (EPA15)		PM04 (D1) - Muller (EPA16)		PM05 (D5) - Kelly (EPA 53)	
	PM10 24 Hour Result (ug/m ³)	Annual Average	PM10 24 Hour Result (ug/m ³)	Annual Average	PM10 24 Hour Result (ug/m ³)	Annual Average	PM10 24 Hour Result (ug/m ³)	Annual Average
1/03/2023	15.4	11.11	16.9	8.67	19.3	12.76	21.2	14.86
2/03/2023	17.9	11.14	16.2	8.69	22.0	12.80	9.6	14.87
3/03/2023	13.8	11.17	12.2	8.71	18.7	12.83	16.8	14.90
4/03/2023	11.4	11.18	11.1	8.73	15.6	12.85	13.3	14.92
5/03/2023	22.9	11.23	15.8	8.76	20.2	12.88	19.8	14.97
6/03/2023	20.3	11.26	13.8	8.77	18.8	12.89	46.8	15.06
7/03/2023	30.8	11.33	14.1	8.80	17.2	12.91	54.9	15.19
8/03/2023	24.9	11.38	17.4	8.83	24.0	12.96	48.6	15.30
9/03/2023	34.2	11.47	22.0	8.88	28.5	13.03	28.4	15.38
10/03/2023	26.1	11.53	26.0	8.94	33.3	13.10	17.2	15.41
11/03/2023	15.7	11.55	6.9	8.93	17.1	13.11	19.2	15.42
12/03/2023	19.2	11.57	15.9	8.93	22.6	13.11	13.1	15.42
13/03/2023	14.8	11.59	13.1	8.93	16.4	13.12	15.7	15.43
14/03/2023	13.8	11.60	11.7	8.94	13.5	13.11	14.4	15.44
15/03/2023	19.4	11.63	18.0	8.95	24.0	13.12	24.6	15.49
16/03/2023	18.4	11.66	14.4	8.97	19.6	13.13	28.3	15.53
17/03/2023	32.9	11.72	20.6	8.99	32.7	13.18	33.6	15.59
18/03/2023	28.5	11.77	18.7	9.01	33.2	13.22	24.3	15.62
19/03/2023	21.6	11.79	22.3	9.04	28.5	13.25	29.5	15.66
20/03/2023	20.4	11.83	24.5	9.08	35.4	13.30	25.9	15.68
21/03/2023	13.9	11.84	13.2	9.08	19.7	13.30	24.0	15.72
22/03/2023	13.5	11.85	17.7	9.11	24.6	13.32	15.4	15.73
23/03/2023	14.7	11.85	9.3	9.10	14.5	13.31	17.9	15.72
24/03/2023	11.4	11.83	14.3	9.09	13.2	13.27	13.5	15.72
25/03/2023	8.4	11.84	6.6	9.09	12.3	13.27	17.4	15.76
26/03/2023	11.1	11.85	12.7	9.10	16.2	13.30	20.7	15.77
27/03/2023	8.1	11.85	6.5	9.10	10.5	13.31	9.5	15.77
28/03/2023	10.7	11.86	11.1	9.11	11.3	13.31	15.8	15.80
29/03/2023	9.3	11.87	7.6	9.11	8.2	13.29	14.5	15.82
30/03/2023	6.5	11.87	6.1	9.11	5.4	13.29	9.5	15.82
31/03/2023	9.5	11.87	5.4	9.09	7.4	13.28	15.7	15.84

*NaN >75% of data collected during period

Meteorological Monitoring

Monitoring Frequency: Continuous

Sampling Method: Site Meteorological Station EPA17

Limits: Nil

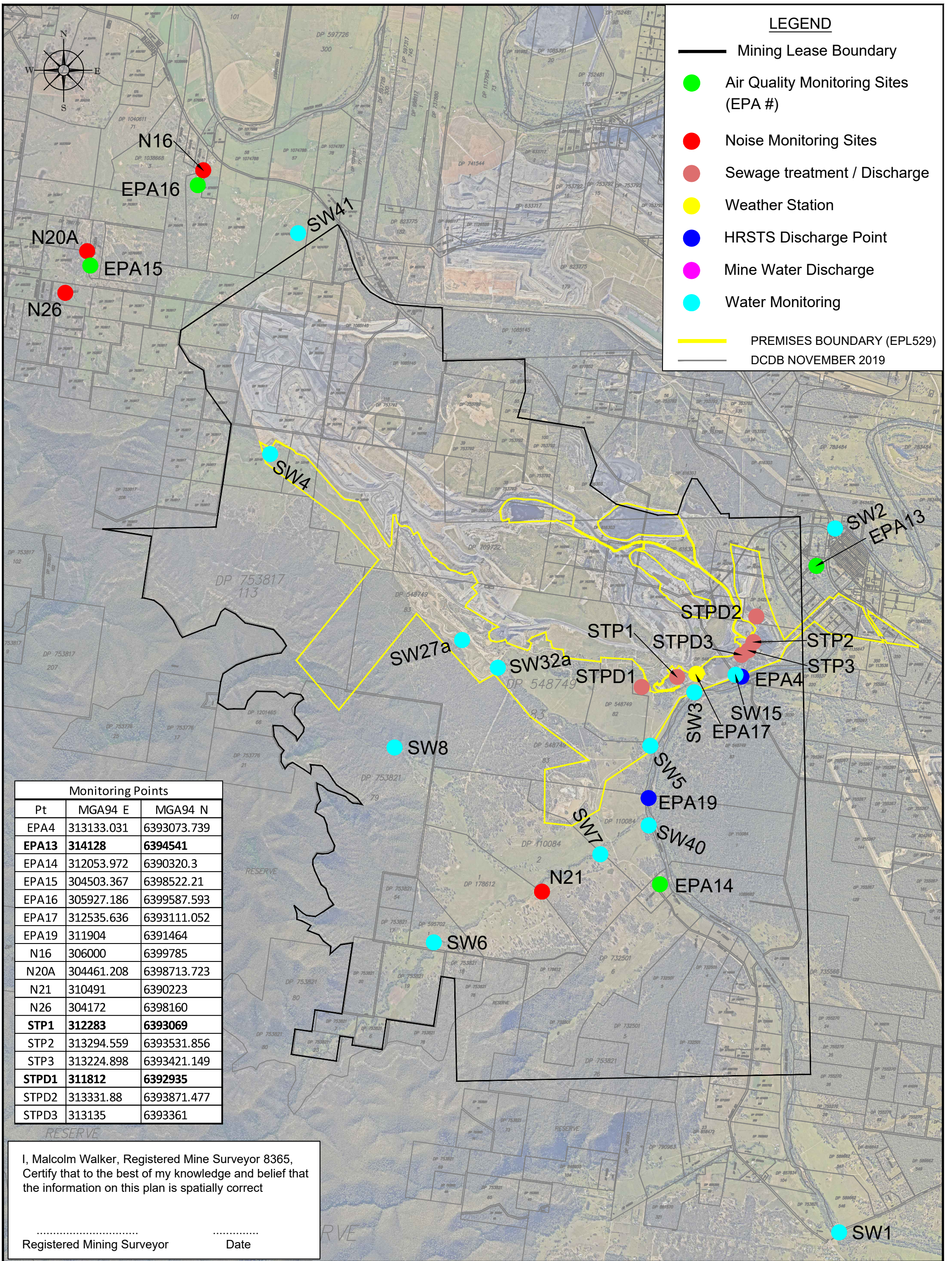
Date sampled: continuous

Date obtained: continuous

Table 5 - WCPL Meteorology

Date	Temperature (2m)			Temperature (10m)			Humidity			Solar Radiation		RAIN	Wind Speed at 10m			Wind Direction at 10m	Sigma Theta		
	Average	Min	Max	Average	Min	Max	Average	Min	Max	Average	Max	Sum (mm)	Average	Min	Max	Average	Average	Max	Min
1/03/2023	25.8	18.7	35	25.3	19	33.6	75.6	33.4	100	319.6	1154.8	0	0.9	0	6	88	24.1	76.7	11.4
2/03/2023	24.1	19.3	29.8	23.6	19.1	28.7	78.5	54.7	100	227.2	1003.6	0	2.1	0.3	5.2	108	18.5	48.3	6.2
3/03/2023	23.3	16.8	29.3	22.9	17	28.2	78.9	53.1	100	256.8	1162.1	0	1.8	0.1	5.5	111	21.7	70.9	5.4
4/03/2023	22.9	18.5	28.2	22.5	18.8	27.2	81.8	55.9	100	195.3	1117.5	0	1.4	0.1	4.6	119	21.9	89.2	6.5
5/03/2023	23.7	14.4	33.3	23.4	15	32.4	75.5	40.8	100	329.3	1039.2	0	0.4	0	4.4	63	31.0	92.1	8.5
6/03/2023	29.5	17.6	39.4	29.5	17.9	38.7	55.7	22.1	100	316.3	1053.3	0	2.3	0	5.4	300	27.6	98.9	9.8
7/03/2023	32	22.7	38.2	31.9	26.3	37	42	29.1	68.3	327.6	1118.3	0	2.6	0.7	5.1	297	21.4	41.7	9.9
8/03/2023	25	13.8	34.6	24.9	14.2	33.5	50.9	18.4	99.5	331.6	1104	0	2	0.2	7	281	25.3	81.5	8.8
9/03/2023	23.2	12.1	31.6	23	12.7	30.2	59	32	100	334.5	1057.5	0	1	0	4.3	287	29.7	95.3	6.3
10/03/2023	23	15.7	31.3	22.7	15.4	30.4	77.6	43.3	100	322.1	1042.4	0	1.4	0.1	5.1	111	27.0	87.7	6.5
11/03/2023	23.6	15.5	34.3	23.2	15.7	32.7	84.1	41	100	232.7	1101.9	5.8	0.7	0.1	5	315	27.7	90.6	7.5
12/03/2023	24.1	18.6	30.3	23.7	18.3	29.2	84.2	55	100	197.9	1099.3	0	1.2	0.2	5.1	129	23.7	83.8	9.1
13/03/2023	21.6	20	24	21.1	19.5	23	93.3	77.9	100	80.1	925.7	4.2	1.8	0.8	3.6	141	16.4	31.2	7.6
14/03/2023	21.7	18.8	26.5	21.2	18.4	25.4	93.5	73.6	100	124.5	675.2	2.6	1.3	0.3	4.8	144	18.8	60.0	7.5
15/03/2023	24	18.7	30.9	23.6	18.5	30.3	83.5	51.5	100	234.1	1077.4	0	0.4	0	2.4	117	29.2	79.9	5.6
16/03/2023	26.1	16.5	37.7	26.1	16.9	36.8	68.1	26	100	308.9	1002.8	0.2	1.1	0.1	4.8	287	24.7	62.1	7.8
17/03/2023	24.7	13.4	34.8	24.9	14	33.9	69.3	29.3	100	309.4	1004.9	0	1.1	0.1	6.1	103	30.4	92.5	7.4
18/03/2023	25.4	18.3	35	25.1	18.5	34	76.3	37.5	100	278	970.5	0	0.3	0.1	3	106	32.2	91.3	8.7
19/03/2023	27.2	14.4	41.2	27.1	14.7	40.5	65	21.3	100	303.1	990.1	0	0.3	0	4	299	27.1	90.8	0.1
20/03/2023	22.8	17.2	28.2	22.7	17.6	27.1	84.1	70.7	100	118.2	738.7	0	2.1	0.1	5.2	141	20.6	85.4	8.3
21/03/2023	21.3	19.9	22.8	20.7	19.5	22	81.9	72.6	90.2	76.8	440.2	0	2.1	0.9	4.3	136	18.8	35.3	11.8
22/03/2023	22.5	15.8	29.7	22	16.1	28.6	82.7	53.5	100	259.8	1059.6	0.6	1.1	0.2	3.5	126	24.5	68.8	5.8
23/03/2023	23.8	18.8	33.9	23.2	18	32.7	84.2	44.2	100	218.9	1020	16	0.9	0.1	5.4	289	29.4	91.7	5.0
24/03/2023	22.6	17.9	27.5	22.1	17.5	26.4	85.1	63.4	100	234.3	1005.9	0.6	1.2	0.2	4.3	136	23.1	72.1	10.2
25/03/2023	21.3	19.9	25.1	20.8	19.6	24	93	72.3	100	82.7	744.7	0	1.9	0.4	5	129	18.2	49.0	9.1
26/03/2023	22.3	19.6	26.2	21.8	19.3	25.3	86	67.1	100	140	648.6	0	1.6	0.6	3.6	136	17.4	29.1	7.8
27/03/2023	19.4	16.8	22.1	19.2	16.8	21.6	100	99.9	100	31.7	277.8	36.2	0.2	0	2.6	333	29.4	91.2	5.4
28/03/2023	21.2	17.8	26.6	20.9	17.5	26	95.1	73.9	100	116.2	554.2	8.8	0.4	0.1	4.5	164	30.2	102.0	8.9
29/03/2023	21.3	16.2	26.6	21	16.7	25.6	93.8	71.8	100	176.1	938.3	17.8	1	0.1	5	306	30.5	99.5	6.3
30/03/2023	18.9	12.9	26	19.1	13.5	25.2	72.7	37.5	100	270.6	1084.9	0.2	1.3	0.2	4.7	268	25.1	90.9	7.9
31/03/2023	18.2	10.4	26.4	18.3	10.8	25.3	69.5	43.9	99.1	288.2	974.4	0	1	0.1	4.2	300	33.0	95.1	11.4
Total	23.4	17.0	30.5	23.1	17.1	29.5	78.0	50.5	98.6	227.18	941.54	3.0	1.25	0.20	4.64	189.3	25.3	102	0.1

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Monitoring Points		
Pt	MGA94 E	MGA94 N
EPA4	313133.031	6393073.739
EPA13	314128	6394541
EPA14	312053.972	6390320.3
EPA15	304503.367	6398522.21
EPA16	305927.186	6399587.593
EPA17	312535.636	6393111.052
EPA19	311904	6391464
N16	306000	6399785
N20A	304461.208	6398713.723
N21	310491	6390223
N26	304172	6398160
STP1	312283	6393069
STP2	313294.559	6393531.856
STP3	313224.898	6393421.149
STPD1	311812	6392935
STPD2	313331.88	6393871.477
STPD3	313135	6393361

I, Malcolm Walker, Registered Mine Surveyor 8365,
 Certify that to the best of my knowledge and belief that
 the information on this plan is spatially correct

.....
 Registered Mining Surveyor Date

Rev.	Drawn	Description	Approved
D	MJW	Water monitoring and discharge sites added	
E	MJW	Monitoring points except water monitoring added to coordinate table	
G	MJW	STPD3 Location amended	
H	MJW	EPA 13, STP 1, STPD1 & EPA 11 Locations amended	JB
I	RE	Opencut related monitors removed	JB

WAMBO COAL PTY LIMITED
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Peabody ENERGY

Prepared by NWU Survey Ph: 02 65 702318

Wambo mine				Drawing No.	
Environment Protection Licence 529				2672-2	
Plan of Premises- Monitoring Sites				Revision No.	
				J_26/11/2020	
Date	Scale:	Drawn	Checked	Approved	Sheet Size
	1:45,000	MJW	JB	PJ	A3