

AuS-10 Rhyolite - Licence number 12323

Dam 1- EPL Point 1

Licence Discharge Point 1

Guidance range		6.5 - 8.5	<1500us/cm			<30 mg/l	20	10 mg/l		
Month	Number of Samples	PH	electrical Cond	turbidity	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL	Comment
Jul-2014	0								Nil Discharge	No sample
Aug-2014	0								Nil Discharge	No sample
Sep-2014	0								Nil Discharge	No sample
Oct-2014	0								Nil Discharge	No sample
Nov-2014	0								Nil Discharge	No sample
Dec-2014	0								Nil Discharge	No sample
Jan-2015	0								Nil Discharge	No sample
Feb-2015	0								Nil Discharge	No sample
Mar-2015	0								Nil Discharge	No sample
21.04.2015	1	7.31	186	1278	250	1295	<2	<5	Discharge	
22.04.2015	1	7.27	158	1528	158	1455	<2	<5	Discharge	
23.04.2015	1	7.13	313	337	286	366	<2	<5	Discharge	
24.04.2015	1	7.71	436	530	288	188		<5	Discharge	
27.04.2015	1	7.46	358	430	318	274	<2	<5	Discharge	
May-2015	0								Nil Discharge	No sample
Jun-2015	0								Nil Discharge	No sample
Total		36.88	1451	4103	1300	3578	0	0		
Mean		7.38	290.20	820.60	260.00	715.60	#DIV/0!	#DIV/0!		
Lowest		7.13	158.00	337.00	158.00	188.00	0.00	0.00		
Highest		7.71	436.00	1528.00	318.00	1455.00	0.00	0.00		

EPL POINT 2

Month	Number of Samples	PH	electrical Cond	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL
Jul-2014	1	7.87	407	3	266	<10	<2	<5	Nil Discharge
Aug-2014	1	6.6	452	3	164	<10	<2	<5	Nil Discharge
Sep-2014	1	7.9	368	5	160	<10	3	<5	Nil Discharge
Oct-2014	1	7.93	415	2	200	<5	<2	<5	Nil Discharge
Nov-2014	1	7.63	360	8	260	<5	<2	<5	Nil Discharge
Dec-2014	1	7.7	334	9	114	<5	<2	<5	Nil Discharge
Jan-2015	1	7.69	250	179	228	107	<2	<5	Nil Discharge
Feb-2015	1	7.91	430	5	239	<5	3	<5	Nil Discharge
Mar-2015	1	7.81	408	5	268	<5	<2	<5	Nil Discharge
Apr-2015	1	7.62	487	3	<5	274	<2	<5	Nil Discharge
21.04.2015	1	6.89	105	45	122	34	3	38	Discharge
22.04.2015	1	7.45	342	69	230	85	<2	<5	Discharge
23.04.2015	1	7.31	477	21	260	6	<2	<5	Discharge
24.04.2015	1	8.05	451	9	269	23		<5	Discharge
27.04.2015	1	7.77	442	8	290	4	4	<5	Discharge
04.05.2015	1	7.48	338	8	168	<5	<2	<5	Nil Discharge
04.06.2015	1	7.82	395	4	243	<5	3	<5	Nil Discharge
Total		129.43	6461	386	3481	533	16	38	
Mean		7.61	380.06	22.71	217.56	76.14	3.20	38.00	
Lowest		6.60	105.00	2.00	114.00	4.00	3.00	38.00	

Highest

8.05

487.00

179.00

290.00

274.00

4.00

38.00

EPL Point 3

COXS RIVER LOWER CROSSING 6/7/2011

Month	Number of Samples	PH	electrical Cond	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL
Jul-2014	1	8.03	418	2	266	<10	<2	<5	Nil Discharge
Aug-2014	1	7.05	447	2	204	<10	5	<5	Nil Discharge
Sep-2014	1	7.99	350	5	162	<10	3	<5	Nil Discharge
Oct-2014	1	8.22	462	2	208	<5	<2	<5	Nil Discharge
Nov-2014	1	7.78	314	8	228	<5	<2	<5	Nil Discharge
Dec-2014	1	7.91	330	4	154	<5	<2	<5	Nil Discharge
Jan-2015	1	7.74	250	119	196	76	<2	<5	Nil Discharge
Feb-2015	1	7.99	420	5	243	<5	5	<5	Nil Discharge
Mar-2015	1	8.24	414	6	270	<5	<2	<5	Nil Discharge
Apr-2015	1	7.93	484	2	<5	278	3	<5	Nil Discharge
21.04.2015	1	6.97	106	54	98	34	<2	11	Discharge 400KI
22.04.2015	1	7.43	309	72	218	91	3	<5	Discharge 400KI
23.04.2015	1	7.53	445	28	240	<5	6	<5	Discharge 300KI
24.04.2015	1	7.94	449	8	273	30		<5	Discharge 200KI
27.04.2015	1	7.84	417	5	262	3	<2	<5	Discharge 50KI
04.05.2015	1	7.73	325	8	168	<5	<2	<5	Nil Discharge
15.05.2015	1	7.14	382	6	256	<5	4	<5	Nil Discharge
04.06.2015	1	8.09	387	3	262	<5	<2	<5	Nil Discharge
Total		139.55	6709	339	3708	512	29		
Mean		7.75	372.72	18.83	218.12	85.33	4.14	11.00	
Lowest		6.97	106.00	2.00	98.00	3.00	3.00	11.00	
Highest		8.24	484.00	119.00	273.00	278.00	6.00	11.00	

Dust Monitoring

EPL Point 4

Month	Number of Samples	Sawmill	Insoluble Solids	Combustible Matter	Ash
Jul-2014	continuous	Sawmill	0.2	0.1	0.1
Aug-2014	continuous	Sawmill	0.6	0.3	0.3
Sep-2014	continuous	Sawmill	ND	ND	ND
Oct-2014	continuous	Sawmill	2.9	1.9	1
Nov-2014	continuous	Sawmill	1.2	0.6	0.6
Dec-2014	continuous	Sawmill	1	1	ND
Jan-2015	continuous	Sawmill	2.3	1.3	1
Feb-2015	continuous	Sawmill	<0.01	<0.01	<0.01
Mar-2015	continuous	Sawmill	60.6	60.5	0.1
Apr-2015	continuous	Sawmill	0.1	0.01	ND
May-2015	continuous	Sawmill	0.1	0.1	ND
Jun-2015	continuous	Sawmill	<0.1	<0.1	<0.1
			69	65.81	3.1
					ND - Not Detected
	Mean		7.67	7.31	0.52
	Lowest		0.1	0.01	0.1
	Highest		60.6	60.5	1

Dust Monitoring

EPL Point 5

Month	Number of Samples	Baners Lane	Insoluble Solids	Combustible Matter	Ash
Jul-2014	continuous	Baners Lane	0.6	0.3	0.3
Aug-2014	continuous	Baners Lane	0.1	0.1	ND
Sep-2014	continuous	Baners Lane	ND	ND	ND
Oct-2014	continuous	Baners Lane	0.2	0.2	ND
Nov-2014	continuous	Baners Lane	0.9	0.5	0.4
Dec-2014	continuous	Baners Lane	0.4	0.4	ND
Jan-2015	continuous	Baners Lane	0.7	0.4	0.3
Feb-2015	continuous	Baners Lane	46.8	46.8	<0.01
Mar-2015	continuous	Baners Lane	0.3	0.3	<0.01
Apr-2015	continuous	Baners Lane	<0.1	<0.1	<0.1
May-2015	continuous	Baners Lane	<0.1	<0.1	<0.1
Jun-2015	continuous	Baners Lane	0.1	0.1	<0.1
			50.1	49.1	1
Mean			5.57	5.46	0.33
Lowest			0.1	0.1	0.3
Highest			46.8	46.8	0.4

ND - Not Detected

Dust Monitoring

EPL Point 6

Month	Number of Samples	Bald Hill	Insoluble Solids	Combustible Matter	Ash
Jul-2014	continuous	Bald Hill	ND	ND	ND
Aug-2014	continuous	Bald Hill	0.7	0.6	0.1
Sep-2014	continuous	Bald Hill	0.1	0.1	ND
Oct-2014	continuous	Bald Hill	0.3	0.1	0.2
Nov-2014	continuous	Bald Hill	0.5	0.5	ND
Dec-2014	continuous	Bald Hill	ND	ND	ND
Jan-2015	continuous	Bald Hill	0.4	0.3	0.1
Feb-2015	continuous	Bald Hill	0.9	0.9	<0.01
Mar-2015	continuous	Bald Hill	0.2	0.2	<0.01
Apr-2015	continuous	Bald Hill	2.7	0.9	1.8
May-2015	continuous	Bald Hill	<0.1	<0.1	<0.1
Jun-2015	continuous	Bald Hill	<0.1	<0.1	<0.1
			5.8	3.6	2.2
Mean			0.73	0.45	0.55
Lowest			0.1	0.1	0.1
Highest			2.7	0.9	1.8

ND - Not Detected

EPL POINT 8

Month	Number of Samples	PH	electrical Cond	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL	Comment
Jul-2014	0								Nil Discharge	No sample
Aug-2014	0								Nil Discharge	No sample
Sep-2014	0								Nil Discharge	No sample
Oct-2014	0								Nil Discharge	No sample

Nov-2014	0								Nil Discharge	No sample
Dec-2014	0								Nil Discharge	No sample
Jan-2015	0								Nil Discharge	No sample
Feb-2015	0								Nil Discharge	No sample
Mar-2015	0								Nil Discharge	No sample
Apr-2015	0								Nil Discharge	No sample
May-2015	0								Nil Discharge	No sample
Jun-2015	0								Nil Discharge	No sample
		0	0	0	0	0	0	0		
Mean		0.00	0.00	0.00	0.00	0.00	0.00	0.00		
Lowest		0.00	0.00	0.00	0.00	0.00	0.00	0.00		
Highest		0.00	0.00	0.00	0.00	0.00	0.00	0.00		

EPL POINT 9

Month	Number of Samples	PH	conductance	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL	Comment
Jul-2014	0								Nil Discharge	No sample
Aug-2014	0								Nil Discharge	No sample
Sep-2014	0								Nil Discharge	No sample
Oct-2014	0								Nil Discharge	No sample
Nov-2014	0								Nil Discharge	No sample
Dec-2014	0								Nil Discharge	No sample
Jan-2015	0								Nil Discharge	No sample
Feb-2015	0								Nil Discharge	No sample
Mar-2015	0								Nil Discharge	No sample
Apr-2015	0								Nil Discharge	No sample
May-2015	0								Nil Discharge	No sample
Jun-2015	0								Nil Discharge	No sample
		0	0	0	0	0	0	0		
Mean		0.00	0.00	0.00	0.00	0.00	0.00	0.00		
Lowest		0.00	0.00	0.00	0.00	0.00	0.00	0.00		
Highest		0.00	0.00	0.00	0.00	0.00	0.00	0.00		

EPL POINT 10

Dam 1

Month	Number of Samples	PH	conductance	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL	Comment
Jul-2014	0								Nil Discharge	No sample
Aug-2014	0								Nil Discharge	No sample
Sep-2014	0								Nil Discharge	No sample
Oct-2014	0								Nil Discharge	No sample
Nov-2014	0								Nil Discharge	No sample
Dec-2014	0								Nil Discharge	No sample
Jan-2015	0								Nil Discharge	No sample
Feb-2015	0								Nil Discharge	No sample
Mar-2015	0								Nil Discharge	No sample
Apr-2015	0								Nil Discharge	No sample
04.05.2015	1	7.59	663	19	422	10	<2	<5	Nil Discharge	Sample

15.05.2015	1	7.23	914	4	642	<5	<2	<5	2,500,000	Sample
Jun-2015	0								Nil Discharge	No sample
		14.82	1577	23	1064	10	0	0		
Mean		14.82	1577.00	23.00	1064.00	10.00	0.00	0.00		
Lowest		7.23	663.00	4.00	422.00	10.00	0.00	0.00		
Highest		7.59	914.00	19.00	642.00	10.00	0.00	0.00		
Highest		7.59	914.00	19.00	642.00	10.00	0.00	0.00		

EPL POINT 11

Dam 2

Month	Number of Samples	PH	electrical Cond	turb	total dissolved solids	total suspend Solids	oxygen dem	oil/grease	Volume Discharged - KL	Comment
Jul-2014	0								Nil Discharge	No sample
Aug-2014	0								Nil Discharge	No sample
Sep-2014	0								Nil Discharge	No sample
Oct-2014	0								Nil Discharge	No sample
Nov-2014	0								Nil Discharge	No sample
Dec-2014	0								Nil Discharge	No sample
Jan-2015	0								Nil Discharge	No sample
Feb-2015	0								Nil Discharge	No sample
Mar-2015	0								Nil Discharge	No sample
Apr-2015	0								Nil Discharge	No sample
04.05.2015	1	6.99	553	2	338	<5	<2	<5	Nil Discharge	Sample
15.05.2015	1	7.32	752	4	546	<5	<2	<5	1,500,000	Sample
Jun-2015	0								Nil Discharge	No sample
		14.31	1305	6	884	0	0	0		
Mean		14.31	1305.00	6.00	884.00	0.00	0.00	0.00		
Lowest		6.99	553.00	2.00	338.00	0.00	0.00	0.00		
Highest		7.32	752.00	4.00	546.00	0.00	0.00	0.00		

Austen Quarry - Hartley

Blasting	Frequency	Date	Blast Number	Limits	Units of measure	Results	Monitor Location - Hartley Village
Ground Vibration	Per Blast	13.02.2014	60	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	13.02.2014	60	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	25.03.2014	61	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	25.03.2014	61	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	03.02.2014	62	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	30.02.2014	62	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	09.03.2014	63	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	09.03.2014	63	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	04.03.2014	64	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	04.03.2014	64	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	14.04.2014	65	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	14.04.2014	65	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	14.04.2014	66	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	14.04.2014	66	115 - Trigger point >100	dB	Nil Trigger	√

Ground Vibration	Per Blast	04.05.2014	67	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	04.05.2014	67	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	04.05.2014	68	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	04.05.2014	68	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	20.05.2014	69	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	20.05.2014	69	115 - Trigger point >110	dB	Nil Trigger	√
Ground Vibration	Per Blast	20.05.2014	70	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	20.05.2014	70	115 - Trigger point >110	dB	Nil Trigger	√
Ground Vibration	Per Blast	29.05.2014	71	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	29.05.2014	71	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	06.06.2014	72	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	06.06.2014	72	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	08.07.2014	73	5 - trigger point >0.51	mm/s	1.66	√
Overpressure	Per Blast	08.07.2014	73	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	23.07.2014	74	5 - trigger point >0.51	mm/s	0.186	√
Overpressure	Per Blast	23.07.2014	74	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	14.08.2014	75	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	14.08.2014	75	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	02.09.2014	76	5 - trigger point >0.51	mm/s	0.312	√
Overpressure	Per Blast	02.09.2014	76	115 - Trigger point >88	dB	97.5	√
Ground Vibration	Per Blast	11.09.2014	77	5 - trigger point >0.15	mm/s	0.16	√
Overpressure	Per Blast	11.09.2014	77	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	08.10.2014	78	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	08.10.2014	78	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	22.10.2014	79	5 - trigger point >0.56	mm/s	Nil Trigger	√
Overpressure	Per Blast	22.10.2014	79	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	30.10.2014	80	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	30.10.2014	80	115 - Trigger point >100	dB	Nil Trigger	√
Ground Vibration	Per Blast	18.11.2014	81	5 - trigger point >0.1	mm/s	0.176	√
Overpressure	Per Blast	18.11.2014	81	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	16.12.2014	82	5 - trigger point >0.25	mm/s	0.293	√
Overpressure	Per Blast	16.12.2014	82	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	13.01.2015	83	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	13.01.2015	83	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	12.03.2015	84	5 - trigger point >0.51	mm/s	0.243	√
Overpressure	Per Blast	12.03.2015	84	115 - Trigger point >88	dB	Nil Trigger	√
Ground Vibration	Per Blast	27.02.2015	85	5 - trigger point >0.51	mm/s	0.162	√
Overpressure	Per Blast	27.02.2015	85	115 - Trigger point >88	dB	95.9	√
Ground Vibration	Per Blast	27.04.2015	86	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	27.04.2015	86	115 - Trigger point <88	dB	Nil Trigger	√
Ground Vibration	Per Blast	24.03.2015	87	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	24.03.2015	87	115 - Trigger point <88	dB	Nil Trigger	√
Ground Vibration	Per Blast	01.05.2015	88	5 - trigger point >0.51	mm/s	0.58	√

Overpressure	Per Blast	01.05.2015	88	115 - Trigger point <88	dB	94	√
Ground Vibration	Per Blast	26.05.2015	89	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	26.05.2015	89	115 - Trigger point <88	dB	Nil Trigger	√
Ground Vibration	Per Blast	27.05.2015	90	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	27.05.2015	90	115 - Trigger point <88	dB	Nil Trigger	√
Ground Vibration	Per Blast	23.07.2015	91	5 - trigger point >0.51	mm/s	Nil Trigger	√
Overpressure	Per Blast	23.07.2015	91	115 - Trigger point <88	dB	Nil Trigger	√

Grant's Head Quarry - Licence Number 4040

EPL Point 1 - sump		Aluminium	Arsenic	Cadmium	Chromium	Conductivity µS/cm	Copper	Lead	Mercury	Nickel	Nitrate	Oil and Grease	pH (wet) Range 5.3 to 7.0
Month	Number of Samples												
02.07.2014	1	0.23	<0.001	<0.001	<0.001	395	0.13	<0.001	<0.00001	0.004	1.82	<5	5.3
01.09.2014	1	0.28	<0.001	<0.001	0.001	383	0.098	<0.001	<0.00001	0.004	1.86	<5	6.3
17.09.2014	1	0.22	<0.001	<0.001	0.001	364	0.141	<0.001	<0.00001	0.007	0.22	<5	6.0
29.09.2014	1	0.14	<0.001	<0.001	<0.001	382	0.114	<0.001	<0.00001	0.005	1.99	<5	6.1
21.10.2014	1					390						<5	5.9
14.11.2014	1					399						<5	5.7
24.11.2014	1	0.12	<0.001	<0.001	<0.001	409	0.077	<0.001	<0.00001	0.005		<5	5.5
01.12.2014	1					374						<5	6.6
15.01.2015	1					345						<5	6.6
29.01.2015	1					279						<5	6.4
09.02.2015	1					303						<5	5.7
16.02.2015	1					339						<5	6.8
25.02.2015	1					283						<5	5.3
02.03.2015	1	0.72	<0.001	<0.001	0.001	303	0.165	<0.001	<0.00001	0.006		<5	6.6
23.03.2015	1					215						<5	6.5
25.03.2015	1					250						<5	6.7
07.04.2015	1					283						<5	5.9
29.04.2015	1					381						<5	6
13.05.2015	1					302						<5	6.1
27.05.2015	1					326						<5	5.6
05.06.2015	1					360						<5	5.7

EPL Point 1		Total Suspended Solids Max 30 Milligrams per litre	Zinc	Hours of pump operation	Requirement to Monitor Volume or Mass
Month	Number of Samples				

02.07.2014	1	<3	0.032		15	4,266
01.09.2014	1	7	0.022		24	6,825.6
17.09.2014	1	4	0.054		24	1,296
29.09.2014	1	4	0.03		24	6,825.6
21.10.2014	1	<3		3.7	24	6,825.6
14.11.2014	1	3		3.2	24	6,825.6
24.11.2014	1	4	0.035	4.2	24	6,825.6
01.12.2014	1	9		4.2	6	1,706.4
15.01.2015	1	7			24	6,825.6
29.01.2015	1	12			22	6,256.8
09.02.2015	1	4			24	6,825.6
16.02.2015	1	6			22	6,256.8
25.02.2015	1	5			24	6,825.6
02.03.2015	1	7	0.048		24	6,825.6
23.03.2015	1	7			24	6,825.6
25.03.2015	1	6			24	6,825.6
07.04.2015	1	5			24	6,825.6
29.04.2015	1	5			24	6,825.6
13.05.2015	1	5			24	6,825.6
27.05.2015	1	3			24	6,825.6
05.06.2015	1	3			24	6,825.6

Grant's Head Point EPL 2 & 3

Standing Water Level
Metres

Standing Water Level
Metres

Month				
02.05.12	MW05	4.706	MW06	4.802
18.07.12	MW05	4.714	MW06	4.814
17.10.12	MW05	4.401	MW06	4.484
20.02.13	MW05	4.864	MW06	4.924
21.05.13	MW05	4.661	MW06	4.799
07.08.13	MW05	4.649	MW06	4.774
30.10.13	MW05	4.284	MW06	4.199
26.02.2014	MW05	4.304	MW06	4.374
22.05.2014	MW05	4.584	MW06	4.729
02.10.2014	MW05	4.634	MW06	4.764
07.01.2015	MW05	4.504	MW06	4.629
01.04.2015	MW05	4.764	MW06	4.729
12.06.2015	MW05	4.735	MW06	4.874

Grant's Head EPL Point 4

Tested For	Aluminium	Arsenic	Cadmium	Chromium	Conductivity	Copper	Lead	Mercury	Nickel	Nitrate	pH
Units of Measure	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Microsiemens per centimetre μ S/cm	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	pH

Month												
26.02.2014	NW01S	0.03	<0.001	0.0001	0.002	590	<.001	<0.001	<0.0001	0.005	0.03	5.31

	NW01D		0.74	<0.001	0.0001	<0.001	488	0.004	<0.001	<0.0001	0.003	0.01	4.66
22.05.2014	NW01S		0.15	<0.001	<0.0001	<0.001	570	0.002	<0.001	<0.0001	0.002	0.03	4.58
	NW01D		0.06	<0.001	<0.0001	0.003	505	0.005	<0.001	<0.0001	0.003	0.01	4.08
02.10.2014	NW01S						548						5.48
	NW01D						521						5.92
07.01.2015	NW01S		0.57	<0.001	<0.0002	<0.001	542	0.003	0.001	<0.0001	0.002	Not Required	3.89
	NW01D		0.12	<0.001	<0.0002	<0.001	508	0.003	<0.001	<0.0001	0.002	Not Required	3.5
01.04.2015	NW01S						516						4.83
	NW01D						487						4.38
12.06.2015	NW01S						633						5.08
	NW01D						603						4.67

Grant's Head EPL Point 4		Standing Water Level	Zinc
		Metres	Milligrams per Litre
Month			
26.02.2014	NW01S	-0.442	0.28
	NW01D	-0.778	0.011
22.05.2014	NW01S	-0.185	0.75
	NW01D	-0.53	0.008
02.10.2014	NW01S	-0.68	
	NW01D	-1.05	
07.01.2015	NW01S	-0.458	0.07
	NW01D	-0.91	0.011
01.04.2015	NW01S	0.885	
	NW01D	0.356	
12.06.2015	NW01S	1.159	
	NW01D	0.602	

Grant's Head EPL Point 5		Tested For	Aluminium	Arsenic	Cadmium	Chromium	Conductivity	Copper	Lead	Mercury	Nickel	Nitrate	pH
		Units of Measure	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Microsiemens per centimetre μ S/cm	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre
Month													
26.02.2014	NW02S		0.36	<0.001	<0.0001	<0.001	338	0.005	<0.001	<0.0001	<0.001	<0.01	4.04

	NW02D		<0.01	0.005	<0.0001	<0.001	762	<0.001	<0.001	<0.0001	0.015	<0.1	5.86
22.05.2014	NW02S		0.32	<0.001	<0.0001	<0.001	329	0.004	<0.001	<0.0001	<0.001	<0.01	3.75
22.05.2014	NW02D		<0.01	0.005	<0.0001	<0.001	752	<0.001	<0.001	<0.0001	0.013	<0.05	5.51
02.10.2014	NW02S						342						4.53
	NW02D						766						6.18
07.01.2015	NW02S		0.37	<0.001	<.0002	<0.001	338	0.003	<0.001	<0.0001	<0.001		4.03
	NW02D		<0.05	0.005	<0.0002	<0.001	769	<0.001	<0.001	<0.0001	0.015		4.74
01.04.2015	NW02S						338						3.99
	NW02D						753						5.77
12.06.2015	NW02S						410						4.32
	NW02D						913						6.09

Grant's Head EPL Point 5		Standing Water Level	Zinc
		Metres	Milligrams per Litre
Month			
26.02.2014	NW02S	-5.375	0.009
	NW02D	1.545	<0.005
22.05.2014	NW02S	-6.5	0.007
22.05.2014	NW02D	1.602	<0.005
02.10.2014	NW02S	-7.15	
	NW02D	1.32	
07.01.2015	NW02S	-5.895	0.004
	NW02D	1.264	0.006
01.04.2015	NW02S	-5.682	
	NW02D	1.694	
12.06.2015	NW02S	-6.06	
	NW02D	1.857	

Grant's Head EPL Point 6		Tested For	Aluminium	Arsenic	Cadmium	Chromium	Conductivity	Copper	Lead	Mercury	Nickel	Nitrate	pH
		Units of Measure	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Microsiemens per centimetre μ S/cm	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre	Milligrams per Litre
Month													
26.02.2014	NW03S		0.37	<0.001	<0.0001	<0.001	408	0.005	<0.001	<0.0001	<0.001	<0.1	4.12
	NW03D		<0.01	<0.001	<0.0001	<0.001	1200	<0.001	<0.001	<0.0001	0.022	<0.1	6.23
22.05.2014	NW03S		0.41	<0.001	<0.0001	0.001	396	0.11	<0.001	<0.0001	<0.001	<0.05	3.69

22.05.2014	NW03D		<0.01	<0.001	<0.0001	<0.001	1214	0.001	<0.001	<0.0001	0.024	<0.05	6.15
02.10.2014	NW03S						403						4.66
	NW03D						1243						6.5
07.01.2015	NW03S		0.36	<0.001	<0.0002	<0.001	397	<0.001	<0.001	<0.0001	<0.001	Not Required	3.6
	NW03D		<0.05	<0.001	<0.0002	<0.001	1475	<0.001	<0.001	<0.0001	0.033	Not Required	4.8
01.04.2015	NW03S						404						4.13
	NW03D						1347						6.25
12.06.2015	NW03S						510						4.34
	NW03D						1393						6.49

Grant's Head EPL Point 6	Standing Water Level	Zinc
	Metres	Milligrams per Litre

Month			
26.02.2014	NW03S	-8.4	0.007
	NW03D	-2.865	0.031
22.05.2014	NW03S	-9.185	0.008
22.05.2014	NW03D	-3.11	0.025
02.10.2014	NW03S	-9.655	
	NW03D	-3.95	
07.01.2015	NW03S	-9.89	0.008
	NW03D	-3.99	0.029
01.04.2015	NW03S	-9.444	
	NW03D	-4.115	
12.06.2015	NW03S	-10.425	
	NW03D	-4.115	

Grant's Head							
Blasting	Frequency	Date	Limits	Units of measure	Results Bonny Hills 1st House	Results - Sherwood House	Blast No #
Ground Vibration	Per Blast	04.02.2014	5 - trigger point <0.27	mm/s	2.35	0.35	# 102
Overpressure	Per Blast	04.02.2014	115 - Trigger point 100	dB	105.3	90.2	# 102
Ground Vibration	Per Blast	20.05.2014	5 - trigger point <0.27	mm/s	3.22	0.5	# 103
Overpressure	Per Blast	20.05.2014	115 - Trigger point 100	dB	112.5	84.2	# 103
Ground Vibration	Per Blast	01.08.2014	5 - trigger point <0.27	mm/s	1.71	0.57	# 104
Overpressure	Per Blast	01.08.2014	115 - Trigger point 100	dB	99.3	103	# 104
Ground Vibration	Per Blast	03.12.2014	5 - trigger point >0.27	mm/s	3.98	0.3	# 105
Overpressure	Per Blast	03.12.2014	115 - Trigger point >100	dB	102	112.2	# 105
Ground Vibration	Per Blast	26.05.2015	5 - trigger point >0.27	mm/s	4.03	0.46	# 106

Overpressure	Per Blast	26.05.2015	115 - Trigger point >100	dB	106.7	96	# 106

Yarrabee Rd Quarry - Licence Number 11462

Yarrabee Rd Point 3		Pollutant	Total Suspended Solids Max 50 Milligrams per litre	pH (wet) Range 6.5 to 8.5	Oil & Grease - Visible	Requirement to Monitor Volume or Mass	
Month	Number of Samples	Frequency	<24hrs prior to discharge	<24hrs prior to discharge		Daily when wastes (water) discharged Klitres per day	
Oct-2014	Nil		No Record	No Record		Nil	Nil Discharge
Nov-2014	Nil		No Record	No Record		Nil	Nil Discharge
Dec-2014	Nil		No Record	No Record		Nil	Nil Discharge
09.01.2015	1		<3	7.1		2,460,000	Sample Only
04.02.2015	1		6	7.7		2,500,000	
23.03.2015	1		14	6.4		Nil Discharge	
13.04.2015	1		<3	7.4		2952000	
06.05.2015	1		12	7.2		2952000	
25.05.2015	1		14	8		2952000	
Jun-2015	Nil		No Record	No Record		Nil	Nil Discharge
Jul-2015	Nil		No Record	No Record		Nil	Nil Discharge
Number of samples		6					

Mean	11.50	7.30	#DIV/0!	2763200.00
Lowest	6.00	6.40	0.00	2460000.00
Highest	14.00	8.00	0.00	2952000.00

Yarrabee Rd

Blasting	Frequency	Date	Limits	Units of measure	Results	Blast #
Ground Vibration	Per Blast	03.06.2014	5 - trigger point <0.27	mm/s	0.6	#31
Overpressure	Per Blast	03.06.2014	Max 115 - Trigger point 100	dB	84.2	#31
Ground Vibration	Per Blast	08.07.2014	5 - trigger point >0.27	mm/s	0.61	#32
Overpressure	Per Blast	08.07.2014	Max 115 - Trigger point >100	dB	104.7	#32
Ground Vibration	Per Blast	26.08.2014	5 - trigger point <0.27	mm/s	0.35	#33
Overpressure	Per Blast	26.08.2014	Max 115 - Trigger point 100	dB	84.2	#33
Ground Vibration	Per Blast	10.09.2014	5 - trigger point <0.27	mm/s	0.76	#34
Overpressure	Per Blast	10.09.2014	Max 115 - Trigger point 100	dB	114.5	#34
Ground Vibration	Per Blast	30.09.2014	5 - trigger point >0.27	mm/s	0.29	#35
Overpressure	Per Blast	30.09.2014	Max 115 - Trigger point >100	dB	109.8	#35
Ground Vibration	Per Blast	14.10.2014	5 - trigger point >0.27	mm/s	0.57	#36
Overpressure	Per Blast	14.10.2014	Max 115 - Trigger point >100	dB	84.2	#36
Ground Vibration	Per Blast	12.11.2014	5 - trigger point >0.37	mm/s	Below trigger point	#37
Overpressure	Per Blast	12.11.2014	Max 115 - Trigger point >108	dB	Below trigger point	#37
Ground Vibration	Per Blast	18.12.2014	5 - trigger point >0.27	mm/s	0.74	#38

Overpressure	Per Blast	18.12.2014	Max 115 - Trigger point >100	dB	107.4	#38
Ground Vibration	Per Blast	30.01.2015	5 - trigger point >0.27	mm/s	0.83	#39
Overpressure	Per Blast	30.01.2015	Max 115 - Trigger point >100	dB	103.1	#39
Ground Vibration	Per Blast	17.02.2015	5 - trigger point >0.27	mm/s	0.53	#40
Overpressure	Per Blast	17.02.2015	Max 115 - Trigger point >100	dB	109.9	#40
Ground Vibration	Per Blast	18.03.2015	5 - trigger point >0.27	mm/s	0.96	#41
Overpressure	Per Blast	18.03.2015	Max 115 - Trigger point >100	dB	112.4	#41
Ground Vibration	Per Blast	13.05.2015	5 - trigger point >0.27	mm/s	0.68	#42
Overpressure	Per Blast	13.05.2015	Max 115 - Trigger point >100	dB	107	#42
Ground Vibration	Per Blast	23.06.2015	5 - trigger point >0.27	mm/s	0.06	#43
Overpressure	Per Blast	23.06.2015	Max 115 - Trigger point >100	dB	106.7	#43
Ground Vibration	Per Blast	06.07.2015	5 - trigger point >0.27	mm/s	0.64	#44
Overpressure	Per Blast	06.07.2015	Max 115 - Trigger point >100	dB	106.1	#44
Ground Vibration	Per Blast	21.07.2015	5 - trigger point >0.27	mm/s	1.0	#45 SEQ2015-01
Overpressure	Per Blast	21.07.2015	Max 115 - Trigger point >100	dB	114	#45 SEQ2015-01
Ground Vibration	Per Blast	27.07.2015	5 - trigger point >0.27	mm/s	1.0	#46 SEQ2015-02
Overpressure	Per Blast	27.07.2015	Max 115 - Trigger point >100	dB	107.8	#46 SEQ2015-02