



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

**QC CERTIFICATE AD16155835**

Project: Stokes Yard

This report is for 7 Rock samples submitted to our lab in Adelaide, SA, Australia on 16-SEP-2016.

The following have access to data associated with this certificate:

PAUL BURTON	KIM GREY
-------------	----------

SAMPLE PREPARATION	
ALS CODE	DESCRIPTION
WEI-21	Received Sample Weight
LEV-01	Waste Disposal Levy
CRU-21	Crush entire sample >70% -6 mm
LOG-22	Sample login - Rcd w/o BarCode
PUL-23	Pulv Sample - Split/Retain
PUL-QC	Pulverizing QC Test

ANALYTICAL PROCEDURES		
ALS CODE	DESCRIPTION	INSTRUMENT
ME-ICP61a	High Grade Four Acid ICP-AES	ICP-AES
PGM-ICP24	Pt, Pd, Au 50g FA ICP	ICP-AES

To: ENIGMA MINING LIMITED  
 ATTN: KIM GREY  
 PO BOX 1126  
 SUBIACO WA 6904

This is the Final Report and supersedes any preliminary report with this certificate number. Results apply to samples as submitted. All pages of this report have been checked and approved for release.

\*\*\*\*\* See Appendix Page for comments regarding this certificate \*\*\*\*\*

**Signature:**   
 Cameron Brosnan, Laboratory Manager, Perth



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Sample Description	Method Analyte Units LOR	PGM-ICP24	PGM-ICP24	PGM-ICP24	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	
		Au	Pt	Pd	Ag	Al	As	Ba	Be	Bi	Ca	Cd	Co	Cr	Cu	Fe
		ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	%
		0.001	0.005	0.001	1	0.05	50	50	10	20	0.05	10	10	10	0.05	
<b>STANDARDS</b>																
AMIS0282		0.184	0.945	1.385												
Target Range - Lower Bound		0.178	0.907	1.325												
Upper Bound		0.202	1.035	1.495												
BP-13		0.369	<0.005	0.001												
Target Range - Lower Bound		0.336	<0.005	<0.001												
Upper Bound		0.380	0.010	0.002												
GBM908-10					3	6.67	90	1080	<10	<20	3.79	<10	30	140	3520	5.49
Target Range - Lower Bound					<1	5.26	<50	970	<10	<20	3.52	<10	<10	120	3440	5.10
Upper Bound					5	6.54	160	1230	30	40	4.16	20	40	160	3820	5.98
MRGeo08					4	5.18	<50	1020	<10	<20	2.52	<10	20	90	610	3.68
Target Range - Lower Bound					2	5.48	<50	970	<10	<20	2.39	<10	<10	70	590	3.63
Upper Bound					7	6.80	130	1220	20	40	2.87	20	40	110	670	4.29
OREAS-45e		0.054	0.112	0.078												
Target Range - Lower Bound		0.049	0.098	0.070												
Upper Bound		0.057	0.122	0.081												
<b>BLANKS</b>																
BLANK					<1	<0.05	<50	<50	<10	<20	<0.05	<10	<10	<10	<10	<0.05
Target Range - Lower Bound					<1	<0.05	<50	<50	<10	<20	<0.05	<10	<10	<10	<10	<0.05
Upper Bound					2	0.10	100	100	20	40	0.10	20	20	20	20	0.10
BLANK		<0.001	<0.005	<0.001												
Target Range - Lower Bound		<0.001	<0.005	<0.001												
Upper Bound		0.002	0.010	0.002												
<b>DUPLICATES</b>																
SY16006		0.053	<0.005	<0.001												
DUP		0.051	<0.005	<0.001												
Target Range - Lower Bound		0.048	<0.005	<0.001												
Upper Bound		0.056	0.010	0.002												



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Method Analyte Units LOR	ME-ICP61a Ga ppm	ME-ICP61a K %	ME-ICP61a La ppm	ME-ICP61a Mg %	ME-ICP61a Mn ppm	ME-ICP61a Mo ppm	ME-ICP61a Na %	ME-ICP61a Ni ppm	ME-ICP61a P ppm	ME-ICP61a Pb ppm	ME-ICP61a S %	ME-ICP61a Sb ppm	ME-ICP61a Sc ppm	ME-ICP61a Sr ppm	ME-ICP61a Th ppm
Sample Description	50	0.1	50	0.05	10	10	0.05	10	50	20	0.05	50	10	10	50
<b>STANDARDS</b>															
AMISO282															
Target Range - Lower Bound															
Upper Bound															
BP-13															
Target Range - Lower Bound															
Upper Bound															
GBM908-10	<50	2.0	<50	1.72	800	60	2.05	2220	990	1990	0.35	<50	20	270	<50
Target Range - Lower Bound	<50	1.5	<50	1.41	780	40	1.95	2090	850	1900	0.27	<50	<10	230	<50
Upper Bound	150	1.9	150	1.73	920	80	2.35	2430	1090	2230	0.49	100	30	290	120
MRGeo08	<50	2.4	<50	1.08	540	20	1.86	680	950	1030	0.28	<50	10	280	<50
Target Range - Lower Bound	<50	2.8	<50	1.17	510	<10	1.78	630	920	980	0.20	<50	<10	280	<50
Upper Bound	120	3.4	140	1.45	610	40	2.16	750	1170	1180	0.41	100	30	340	120
OREAS-45e															
Target Range - Lower Bound															
Upper Bound															
<b>BLANKS</b>															
BLANK	<50	<0.1	<50	<0.05	<10	<10	<0.05	<10	<50	<20	<0.05	<50	<10	<10	<50
Target Range - Lower Bound	<50	<0.1	<50	<0.05	<10	<10	<0.05	<10	<50	<20	<0.05	<50	<10	<10	<50
Upper Bound	100	0.2	100	0.10	20	20	0.10	20	100	40	0.10	100	20	20	100
BLANK															
Target Range - Lower Bound															
Upper Bound															
<b>DUPLICATES</b>															
SY16006															
DUP															
Target Range - Lower Bound															
Upper Bound															



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Sample Description	Method Analyte Units LOR	ME-ICP61a Ti %	ME-ICP61a Tl ppm	ME-ICP61a U ppm	ME-ICP61a V ppm	ME-ICP61a W ppm	ME-ICP61a Zn ppm
		0.05	50	50	10	50	20
<b>STANDARDS</b>							
AMIS0282							
Target Range - Lower Bound							
Upper Bound							
BP-13							
Target Range - Lower Bound							
Upper Bound							
GBM908-10		0.65	<50	<50	140	<50	1090
Target Range - Lower Bound		0.55	<50	<50	120	<50	980
Upper Bound		0.77	150	150	160	150	1180
MGeo08		0.46	<50	<50	110	<50	790
Target Range - Lower Bound		0.39	<50	<50	90	<50	730
Upper Bound		0.61	100	110	130	110	880
OREAS-45e							
Target Range - Lower Bound							
Upper Bound							
<b>BLANKS</b>							
BLANK		<0.05	<50	<50	<10	<50	<20
Target Range - Lower Bound		<0.05	<50	<50	<10	<50	<20
Upper Bound		0.10	100	100	20	100	40
BLANK							
Target Range - Lower Bound							
Upper Bound							
<b>DUPLICATES</b>							
SY16006							
DUP							
Target Range - Lower Bound							
Upper Bound							



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Page: 3 - A  
 Total # Pages: 3 (A - C)  
 Plus Appendix Pages  
 Finalized Date: 22-SEP-2016  
 Account: HALCON

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Sample Description	Method Analyte Units LOR	PGM-ICP24	PGM-ICP24	PGM-ICP24	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	ME-ICP61a	
		Au ppm	Pt ppm	Pd ppm	Ag ppm	Al %	As ppm	Ba ppm	Be ppm	Bi ppm	Ca %	Cd ppm	Co ppm	Cr ppm	Cu ppm	Fe %
		0.001	0.005	0.001	1	0.05	50	50	10	20	0.05	10	10	10	10	0.05
<b>DUPLICATES</b>																
SY16007		0.047	<0.005	<0.001	32	1.25	<50	70	<10	40	7.57	10	20	<10	2980	3.56
DUP		0.045	<0.005	<0.001	30	1.19	<50	70	<10	40	7.14	10	10	<10	2800	3.37
Target Range - Lower Bound		0.043	<0.005	<0.001	29	1.11	<50	<50	<10	<20	7.05	<10	<10	<10	2810	3.29
Upper Bound		0.049	0.010	0.002	33	1.33	100	100	20	60	7.66	20	20	20	2970	3.64

\*\*\*\*\* See Appendix Page for comments regarding this certificate \*\*\*\*\*



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Page: 3 - B  
 Total # Pages: 3 (A - C)  
 Plus Appendix Pages  
 Finalized Date: 22-SEP-2016  
 Account: HALCON

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Sample Description	Method Analyte Units LOR	ME-ICP61a Ga ppm	ME-ICP61a K %	ME-ICP61a La ppm	ME-ICP61a Mg %	ME-ICP61a Mn ppm	ME-ICP61a Mo ppm	ME-ICP61a Na %	ME-ICP61a Ni ppm	ME-ICP61a P ppm	ME-ICP61a Pb ppm	ME-ICP61a S %	ME-ICP61a Sb ppm	ME-ICP61a Sc ppm	ME-ICP61a Sr ppm	ME-ICP61a Th ppm
		50	0.1	50	0.05	10	10	0.05	10	50	20	0.05	50	10	10	50
<b>DUPLICATES</b>																
SY16007		<50	0.1	<50	10.95	8970	<10	0.13	20	770	10400	<0.05	<50	<10	10	<50
DUP		<50	0.1	<50	10.40	8460	<10	0.13	20	750	9830	<0.05	<50	<10	10	<50
Target Range - Lower Bound		<50	<0.1	<50	10.25	8400	<10	0.08	<10	680	9740	<0.05	<50	<10	<10	<50
Upper Bound		100	0.2	100	11.10	9030	20	0.18	30	840	10500	0.10	100	20	20	100

\*\*\*\*\* See Appendix Page for comments regarding this certificate \*\*\*\*\*



Australian Laboratory Services Pty. Ltd.  
 32 Shand Street  
 Stafford  
 Brisbane QLD 4053  
 Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
 www.alsglobal.com

Page: 3 - C  
 Total # Pages: 3 (A - C)  
 Plus Appendix Pages  
 Finalized Date: 22-SEP-2016  
 Account: HALCON

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

Sample Description	Method Analyte Units LOR	ME-ICP61a Ti %	ME-ICP61a Ti ppm	ME-ICP61a U ppm	ME-ICP61a V ppm	ME-ICP61a W ppm	ME-ICP61a Zn ppm
		0.05	50	50	10	50	20
		<b>DUPLICATES</b>					
SY16007		0.05	<50	<50	30	<50	29500
DUP		<0.05	<50	<50	30	<50	27700
Target Range - Lower Bound		<0.05	<50	<50	20	<50	27600
Upper Bound		0.10	100	100	40	100	29600

\*\*\*\*\* See Appendix Page for comments regarding this certificate \*\*\*\*\*



Australian Laboratory Services Pty. Ltd.  
32 Shand Street  
Stafford  
Brisbane QLD 4053  
Phone: +61 (7) 3243 7222 Fax: +61 (7) 3243 7218  
www.alsglobal.com

Project: Stokes Yard

**QC CERTIFICATE OF ANALYSIS AD16155835**

	<b>CERTIFICATE COMMENTS</b>
Applies to Method:	<p style="text-align: center;"><b>LABORATORY ADDRESSES</b></p> <p>Processed at ALS Perth located at 31 Denninup Way, Malaga, Australia. NATA Accreditation does not cover the performance of ALS Perth Sample Preparation which is processed at 79 Distinction Road, Wangara, WA, Australia ME-ICP61a PGM-ICP24</p> <p>Processed at ALS Adelaide located at Unit 1, 1 Burma Road, Pooraka, Adelaide, SA, Australia. Applies to Method: CRU-21 LEV-01 LOG-22 PUL-23 PUL-QC WEI-21</p>