

18 July 2017

Large Porphyry Copper and Epithermal Gold at Kadungle NSW

- **New aeromagnetic survey defines circular zone of magnetite destructive alteration exceeding ~1km in diameter**
- **Drill hole KDD015 within this zone intersected multiple zones of alteration and mineralisation as follows:**
 - Shallow, intermittent epithermal quartz veining within vuggy silica-pyrite alteration with assay results of:
 - 12m at 0.51g/t gold from 8m
 - 25.6m at 0.38g/t gold from 23.4m incl. 1m at 2.78g/t
 - Deeper intermittent quartz-chalcopyrite-pyrite and hematite veins, plus breccia with disseminated chalcopyrite with assay results of:
 - 30m at 0.19g/t gold and 0.24% copper from 117m
 - 21m at 0.19g/t gold and 0.13% copper from 152m
- **New epithermal quartz-hematite veins with highly anomalous geochemistry ranging up to 1.27g/t gold ~2km to the north confirms potential for shallow gold-silver mineralisation in a very large, mineralised porphyry copper-gold and epithermal system**
- **Option exercised with Aurelia Metals and stage 1 (\$300,000 over 3 year) earn-in for a 60% interest commences**

Emmerson Resources Limited ("Emmerson" ASX: ERM) is pleased to announce that our first drill hole at Kadungle in NSW (figure 1) has intersected high level epithermal gold-silver mineralisation and deeper porphyry copper-gold within a very extensive zone of alteration. This drill hole supports the previous historical drilling where high level epithermal veins were intersected with best assays of 12m at 7.7g/t (drill hole KDD002). Similarly, deeper disseminated and veined copper-gold produced intersections of 37m at 0.23% copper including 6m at 1.1% copper (KDD013) and 154m at 0.12% copper and 0.37g/t gold (KRC019) (figure 2).

This recent drill hole not only extends the known mineralisation but points to the potential for both high level (shallow) epithermal gold-silver and deeper porphyry copper-gold mineralisation over a large area. The alteration of upper level quartz-pyrite-hematite grading to chlorite-epidote-quartz and deeper K-feldspar-chlorite-hematite is consistent with a large underlying porphyry copper-gold system (fig 3). Moreover, the discovery of further mineralised, epithermal quartz veins, some 2km east at the Mount Leadley Trig prospect provides some indication that this is a large mineralised system. Recent rock chip sampling at Trig returned highly anomalous gold geochemistry with up to 1.27 g/t Au (Figure 2, Table 3)

Emmerson's Managing Director, Mr Rob Bills commented: *"The recent aeromagnetic survey and drilling is highly encouraging in terms of defining large scale (~4 km²) alteration and mineralisation at Kadungle. Also providing the impetus to exercise the option with Aurelia Metals and commit to the stage 1 earn-in.*

Given we have established the presence of a large mineralised system, exploration will now focus on a systematic program to pinpoint the higher grade zones for both gold and copper. This will include Induced Polarisation surveys to penetrate beneath the lithocap and better define the quartz-pyrite alteration and allow targeting for both deeper copper-gold and shallow, low sulphidation gold-silver mineralisation (see figure 3).

The very positive start to our NSW field season continues where Emmerson currently has five new projects generated from proprietary predictive 2 and 3D targeting models – developed in conjunction with our strategic alliance partner Kenex Limited. The Kadungle project sits to the east of our large Fifield Exploration Lease, while to the west is the Rimfire Pacific Mining NL, Sopresa discovery (7.9Moz Ag and 125Koz Au). Thus we believe that these tenements are highly prospective for both gold and copper, as are our other four projects at Wellington (EL 8463), Parkes (EL 8466), Temora/Sebastopol (EL 8465 & ELA 5481) and Kiola (ELA 5417). Note Kenex can earn up to a 10% interest in these tenements (excluding Kadungle) upon achieving certain predetermined milestones. Emmerson can earn up to 80% of the Kadungle project under an option and JV with Aurelia Metals through spending \$0.5m over a five year period."

The technical and commercial strategy for our NSW projects follows a similar model to our successful Tennant Creek Project in the NT. Where the expertise and technology, instrumental to success at Tennant Creek is leveraged into new underexplored opportunities, but with a focus on high, near term value from epithermal gold-silver within large porphyry copper-gold systems. It is envisaged that ERM will seek suitable JV partners on some of these NSW projects.

About Emmerson Resources

Emmerson is a leading gold and copper gold explorer with projects in the Northern Territory and New South Wales and is led by a board and management group of experienced Australian mining executives including former MIM and WMC mining executive Andrew McIlwain (non-executive chairman), and former senior BHP Billiton and WMC executive Rob Bills (Managing Director and CEO).

The Northern Territory projects are centred around the Tennant Creek Mineral Field (TCMF), which is one of Australia's highest grade gold and copper fields producing >5.5 Mozs of gold and >470,000 tonnes of copper from a variety of deposits including Gecko, Orlando, Warrego, White Devil, Chariot and Golden Forty, all of which are within Emmerson Resources (ASX: ERM) exploration and joint venture portfolio. Emmerson's track record of discovery includes copper and gold mineralisation at Goanna, Monitor, Mauretania and more recently, the discovery of very high grade gold at Edna Beryl - the first discoveries in the TCMF for over a decade.

Emmerson holds 2,500km² of ground in the TCMF, owns the only gold mill in the region and is in the process of monetising a pipeline of small high grade exploration targets via a Tribute Agreement with a specialised small mines company. The first of these small mines will be at Edna Beryl, with production to commence in 2017.

Exploration in the TCMF is funded via a Farm-in agreement with Evolution Mining Limited (EVN), where EVN is sole funding exploration expenditure of \$15 million by 31 December 2017 to earn a 65% interest (Stage 1 Farm-in). EVN then has a further option to sole fund a further \$10 million over two years to earn an additional 10% (Stage 2 Farm-in). Emmerson is the operator and manager during the Stage 1 Farm-in.

Emmerson has recently commenced exploration on new gold-copper projects in NSW, identified (with our strategic alliance partner Kenex Limited) from the application of “big multiple independent datasets” – aimed at increasing the probability of discovery through enhanced predictive capability (particularly important in covered terrains). The highly prospective Macquarie Arc hosts >80Mozs gold and >13Mt copper but with these resources heavily weighted to areas of outcrop or limited cover. Emmerson’s five exploration projects contain many attributes of the known deposits within the Macquarie Arc but remain under explored due to historical impediments, including overlying cover (plus farm lands) and a lack of exploration focus. Kadungle is an option (and potential JV) with Aurelia Metals covering 43km² adjacent to Emmerson’s Fifield project.

About Kenex

Kenex is a Wellington and West Australian based company which was established in 2002 to provide GIS and exploration services and advice for the exploration and mining industries in Australia and New Zealand. Over the last 10 years, Kenex has broadened their international experience through involvement with projects and clients in the Middle East, Africa, Scandinavia, Asia-Pacific and Latin America. Kenex is a group of highly motivated research professionals who have more than 85 years of combined experience and knowledge in exploration and mining, locally (New Zealand/Australia) and abroad, including the Solomon Islands, Africa, Papua New Guinea, Asia and Latin America. Kenex also has growing expertise in the marine minerals sector.

Kenex specialises in predictive modelling for minerals (2D and 3D) where it is at the forefront of providing these services to businesses to generate targets with the greatest geological potential in relation to the mineral system being evaluated. This delivers to our client’s outcomes which can be used for a variety of purposes including regional evaluation of a mineral belt, identification of opportunities for acquisition, the tools for effective exploration work programme planning and in the case of predictive 3D modelling, drill hole targeting.

About Aurelia (ASX: AMI)

Aurelia Metals became a gold producer in 2014 and its flagship asset is the high-grade Hera gold-lead-zinc-silver mine in central NSW.

In FY 2016, the Hera mine produced 46,882 ounces of gold and 25,406 tonnes of lead-zinc concentrates from the processing of 308,118 tonnes of ore.

The Company is pursuing significant further improvements in the Hera operation including improved metal recoveries, increased throughput and operating cost reductions. Aurelia is also pursuing a near mine exploration programme, with a strong view on the capacity for Hera to evolve into a large scale, high-grade ‘Cobar style’ deposit.

Competency Statement

The information in this report which relates to Exploration Results is based on information compiled by Dr Ana Liza Cuison, MAIG, MSEG. Dr Cuison is a Member of the Australian Institute of Geoscientists and has sufficient experience which is relevant to the style of mineralisation and types of deposits under consideration and to the activity which she is undertaking to qualify as a Competent Person as defined in the 2004 edition and the 2012 edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Dr Cuison is a full time employee of the Company and consents to the inclusion in this report of the matters based on her information in the form and context in which it appears.

The information in this report which relates to historical information intercepts at Kadungle (KDD002, KDD013 and KRC019) is extracted from the report “New Gold - Copper Projects in NSW” created on 04 October 2016. Historical information intercepts for PL2 and PL3 is extracted from Open File Exploration Annual Report GS Number: GS1984/361, Company: Seltrust Mining Corporation Pty Ltd, EL2171 Redcliffe Project and can be found in the NSW Department of Industry and Resources website.

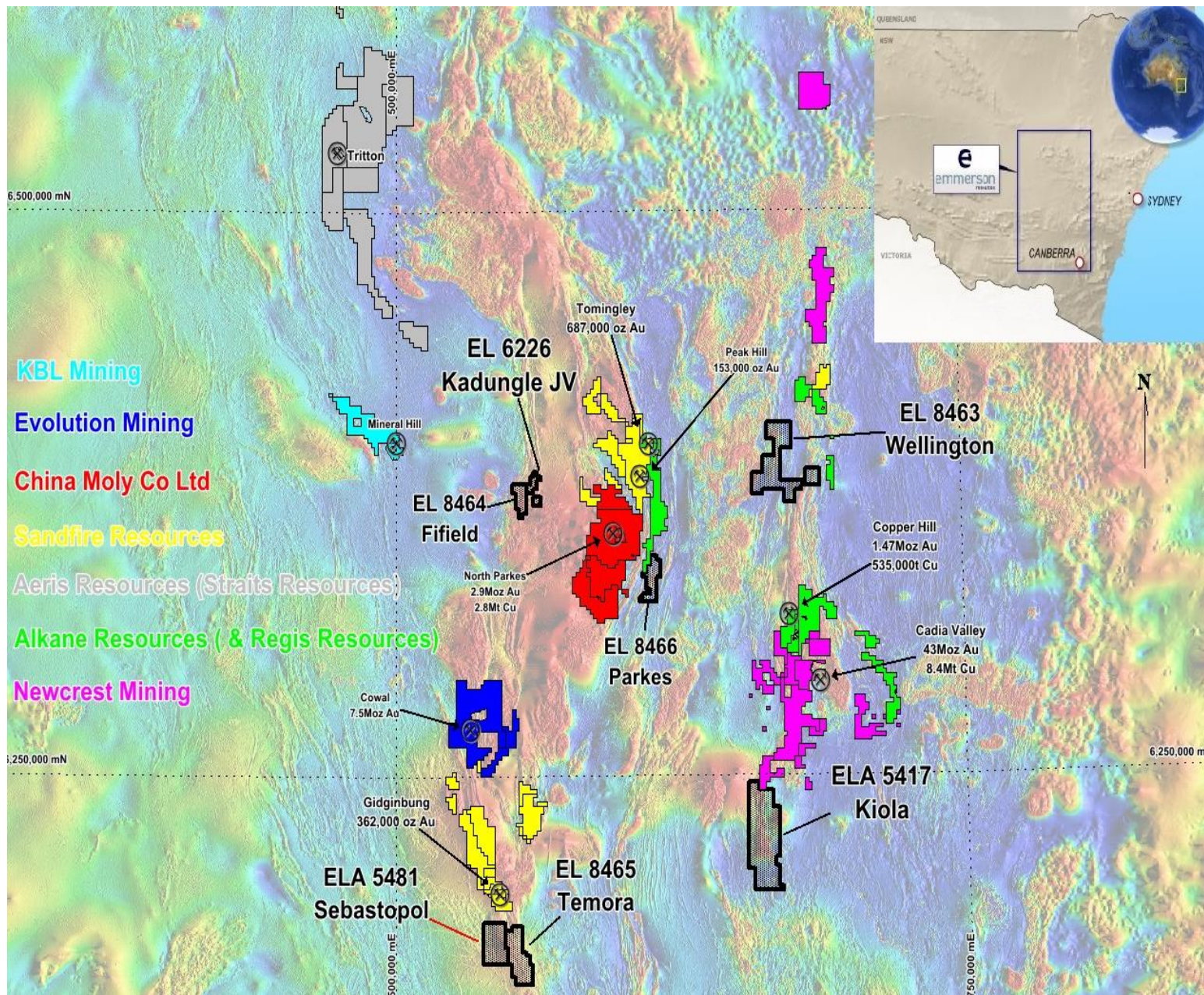


Figure 1: Location of Emmerson Resources NSW Projects (bold black outlines) plus major explorers and deposits within the Macquarie Arc (muted red colour=magnetic signature of the Macquarie Arc).

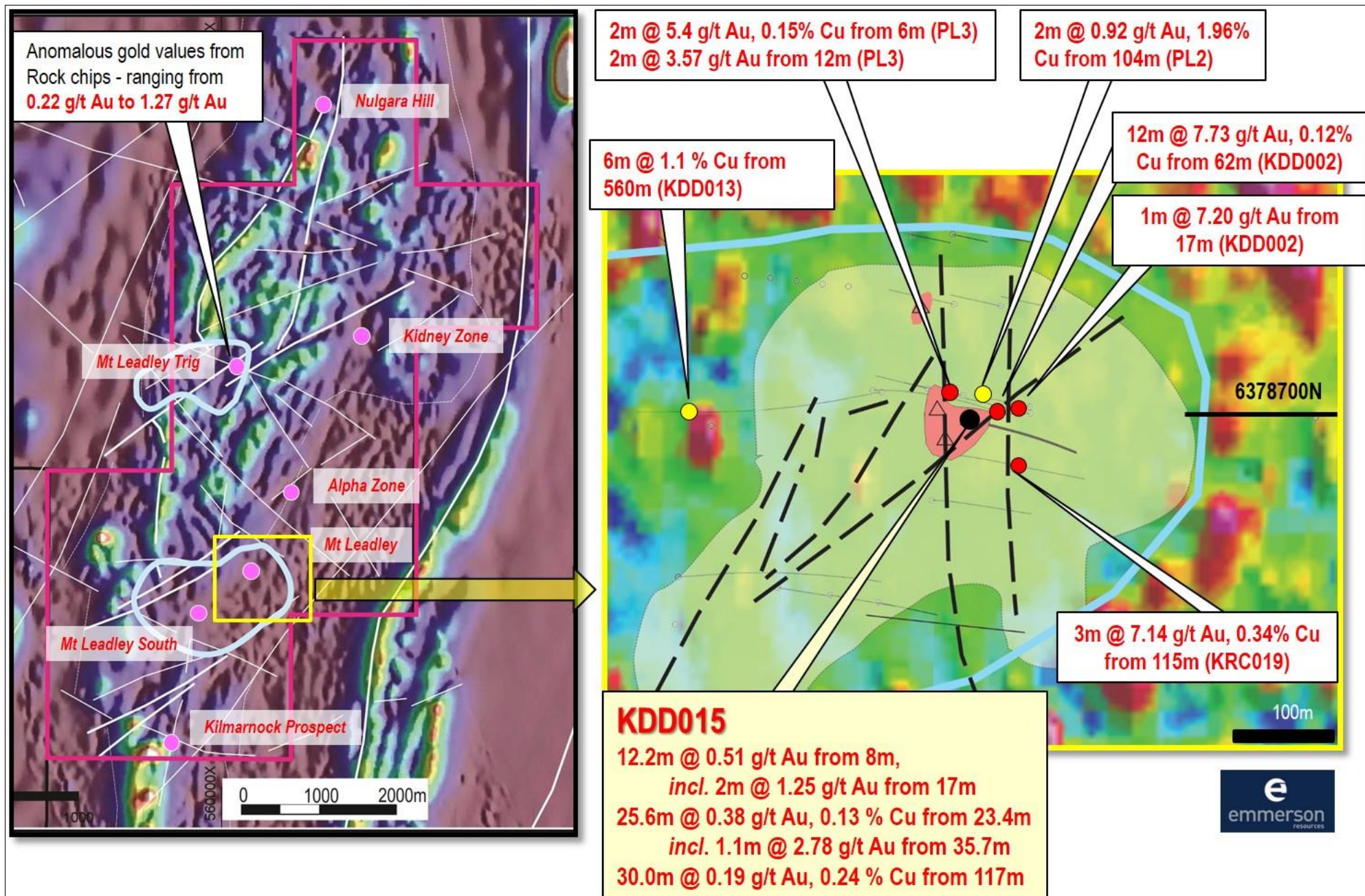


Figure 2: Plan of the Mt Leadley Prospect within the Kadungle Tenement. Note ERM drill hole drill hole KDD015 plus historic intersections. Background is the 1VD of the recent aeromagnetics with blue correlating to possible zones of magnetite destruction associated with the hydrothermal alteration.

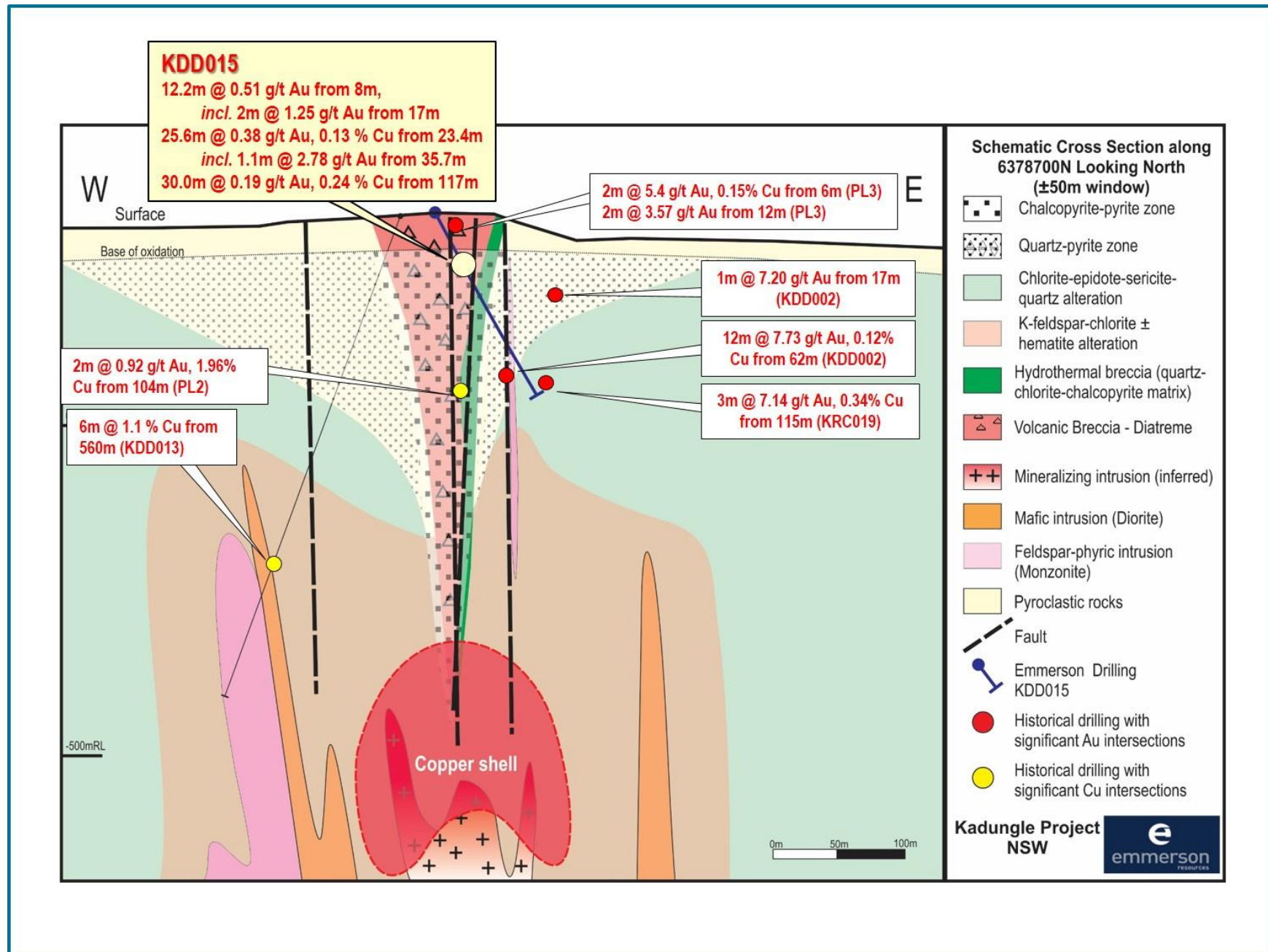


Figure 3: Cross section of the interpreted geology from the recent drill hole (KDD015). Note the extensive chalcopyrite-pyrite and quartz-pyrite zones plus hydrothermal breccia at the margin of the volcanic breccia/diatreme. For reference, the red dots are historic intersections projected onto this section.

Table 1: Kadungle drillhole details.

Hole ID	East (MGA94_53)	North (MGA94_53)	RL AHD	Dip(deg)	AZI mag (deg)	From (metres)	To (metres)	Drill Type	Drill Date	Sample Type	Tenement Number
KDD015	560399.75	6378692.64	319.7	-60	102.7	0.0	35.7	HQ3	24/03/2017	Core	EL6226
						35.7	282.6	NQ3	24/03/2017	Core	EL6226
TOTAL						282.6m					

Table2: Kadungle significant drillhole intersections

Hole ID	East (MGA94_53)	North (MGA94_53)	RL AHD	Dip (deg)	AZI mag (deg)	From (m)	To (m)	Width (m)	Au (g/t)	Ag (ppm)	Bi (ppm)	Cu (ppm)	Fe (%)	Pb (ppm)	Zn (ppm)	Sample Type	Geology	Tenement Number
KDD015	560399.75	6378692.64	319.7	-60	102.7	8.0	20.2	12.2	0.51	5.58	7.9	0.03	4.3	1,555	61	0.5 HQ3	Crystal lithic tuff - brecciated; diatreme breccia - oxidized	EL6226
					<i>Incl.</i>	17.0	19.0	2.0	1.25	3.85	7.0	0.02	5.8	1,260	98	0.5 HQ3		
						23.4	49.0	25.6	0.38	3.50	17.8	0.12	4.1	1,543	910	0.5 HQ3	Diatreme breccia - disseminated pyrite - chalcopyrite	
					<i>Incl.</i>	35.7	36.8	1.1	2.78	2.70	4.0	0.12	3.9	1,551	961	0.5 NQ3	~1 cm pyrite - chalcopyrite - quartz	
						117.0	147.0	30.0	0.19	1.29	5.4	0.24	4.6	42	201	0.5 NQ3	Hydrothermal breccia - quartz-chalcopyrite-chlorite - hematite as breccia matrix	
					<i>Incl.</i>	124.0	125.0	1.0	0.18	2.20	10.0	0.74	6.5	51	201	0.5 NQ3		
	152.0	173.0	21.0	0.19	0.88	3.7	0.13	4.6	45	144	0.5 NQ3	Ignimbrite and lithic tuff, disseminated pyrite - chalcopyrite						

Note:

- (1) KDD015 samples are half HQ3 or NQ3 diamond core samples.
- (2) Au analysis method by 50g Fire Assay with AAS finish.
- (3) Cu analysis method by four acid digestion.
- (4) Multi element analysis method by four acid digestion with ICP-AES finish.
- (5) Intersections are reported as downhole lengths and not true width.
- (6) Minimum cut-off of 0.2 % g/t Au. No maximum cut-off.
- (7) Minimum cut-off of 0.2 % Cu. No maximum cut-off.
- (8) Maximum internal dilution of 6 metres.

Table 3: Selected significant rockchip sample results from Mount Leadley Trig Prospect

Sample ID	Sample Type	East (MGA94_53)	North (MGA94_53)	Au ppm	As ppm	Ba ppm	Bi ppm	Cu ppm	Fe %	Mn ppm	Mo ppm	Pb ppm	Sr ppm	Zn ppm	Lithology
KAD-008	outcrop	560548	6381649	0.49	32	60	2	59	14.5	484	2	3	8	17	Quartz-hematite vein; ~ 10cm, banded
KAD-009	float	560535	6381673	0.41	39	320	4	11	16.3	117	3	5	7	6	Quartz-hematite breccia
KAD-010	outcrop	560978	6381666	0.15	99	3070	5	8	11.5	73	54	3	34	3	Feldspar porphyry; silicified
KAD-018	outcrop	560680	6381732	0.01	98	1100	5	94	3.8	88	6	2	24	65	Silicified tuff cut by quartz stringers
KAD-024	float	560624	6381650	0.08	191	200	6	8	13.1	71	10	<2	13	21	Quartz-hematite-jasper breccia
KAD-025	float	560552	6381638	0.70	38	750	4	14	25.9	139	2	5	19	11	Quartz-hematite breccia
KAD-027	outcrop	560940	6381599	0.03	34	690	3	14	7.8	194	2	5	18	7	Banded quartz - hematite
KAD-029	outcrop	560429	6381564	0.08	228	4100	8	19	14.1	104	11	6	54	8	Quartz-hematite breccia
KAD-030	outcrop	560434	6381543	0.08	138	500	6	774	33.7	262	14	3	26	78	Semi massive hematite vein; brecciated
KAD-031	outcrop	560456	6381451	1.07	201	1710	6	36	16.0	93	11	6	24	44	Quartz-hematite breccia
KAD-032	outcrop	560479	6381408	0.52	72	1620	8	60	9.6	102	6	4	19	12	Quartz-hematite breccia
KAD-037	outcrop	560537	6381606	0.22	18	430	3	15	21.4	99	3	6	6	9	Quartz-hematite breccia
KAD-038	outcrop	560514	6381632	0.09	10	1530	2	31	12.8	216	1	4	16	11	Banded quartz - hematite
KAD-039	outcrop	560523	6381538	0.80	32	140	2	67	15.0	101	2	6	5	15	Quartz-hematite breccia

Table 4: Kadungle drillhole details and ASX announcements (previously released by Aurelia).

Hole ID	East (MGA94_53)	North (MGA94_53)	RL AHD	Dip(deg)	AZI mag (deg)	Depth (metres)	Drill Type	Drill Date	Tenement Number	Relevant ASX Release Date
KRC019	560407.0	6378652.0	324.0	-60	91.0	204.0	11/12/2011	RC	EL6226	23/02/2008
KDD002	560489.3	6378691.9	313.5	-70	270.0	249.5	24/01/2006	DDH	EL6226	13/04/2007
KDD006	560337.0	6378714.5	311.0	-58	90.0	240.8	6/06/2007	DDH	EL6226	30/07/2007
KDD013	560345.1	6378712.7	311.7	-70	258.5	693.9	28/04/2008	DDH	EL6226	4/06/2008

The exploration results contained within the above company release are in accordance with the guidelines of *The Australasian Code for the Reporting of Exploration Results, Mineral Resources and Ore Reserves* (the JORC Code, 2012).

Appendix 1 - Section 1 Sampling Techniques and Data – Kadungle Mount Leadley Target – KDD015 Diamond Drill

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> Nature and quality of sampling (eg cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as downhole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling. Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. Aspects of the determination of mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (eg 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information. 	<ul style="list-style-type: none"> KDD015 was drilled with diamond core to obtain high quality samples that were logged for lithological, structural, geotechnical, density and other attributes. Diamond core were HQ³ and NQ³ sizes. Core was sampled on geological intervals (0.5 m to 1.5 m), cut into half core using a standard brick saw. Sample weights of approximately 3.0kg were crushed, dried and pulverised (Lab) to produce a 50g sub sample for analysis by four acid digest with an ICP-AES (Cu, Fe, Bi) finish & Fire Assay (Au) finish.
Drilling techniques	<ul style="list-style-type: none"> Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc). 	<ul style="list-style-type: none"> See Table 1 in the text. KDD015 has been drilled with HQ³ from collar to 35.7m HQ³ core diameter is 63.1mm. KDD015 has been drilled with NQ³ from 35.7m to 282.6m NQ³ core diameter is 45.0mm. The core was oriented using downhole core orientation equipment provided by the drilling company.
Drill sample recovery	<ul style="list-style-type: none"> Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material. 	<ul style="list-style-type: none"> Recoveries are considered satisfactory. Overall, the recovery for KDD015 is 96.5%. RQD measurements and core loss has been recorded on the original diamond logging sheets and retained for reference. Emmerson do not consider that there is evidence for sample bias that may have occurred due to preferential loss/gain of fine/coarse material.
Logging	<ul style="list-style-type: none"> Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies. Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. The total length and percentage of the relevant intersections logged. 	<ul style="list-style-type: none"> Standard operating procedures are employed for logging KDD015. Drill hole logging data is directly entered into field laptop computer. Standardised code were used for lithology, oxidation, alteration, presence of sulphide information are recorded. Structural logging records orientation of veins, fractures and lithological contacts. Information on structure type, dip, dip direction, alpha angle, beta angle, texture, shape, roughness and fill material is stored in the structure table of the database. RQD logging records core lengths, recovery, hardness and weathering. Magnetic susceptibility data were collected for diamond core every 1m meter as per procedure. All drill core is photographed. Diamond core is stored in Orange, NSW.
Sub-sampling techniques and sample preparation	<ul style="list-style-type: none"> If core, whether cut or sawn and whether quarter, half or all core taken. If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry. For all sample types, the nature, quality and appropriateness of the sample preparation technique. Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples. Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling. Whether sample sizes are appropriate to the grain size of the material being sampled. 	<ul style="list-style-type: none"> Diamond core was halved using an automatic core saw. Half core from the same side was dispatched for analysis. The sample preparation of diamond core followed industry best practice in sample preparation involving oven drying, coarse crushing of the half core followed by pulverisation of the entire sample (total prep) using grinding. Pulverised materials not required by the laboratory (pulp) were returned and are held in Orange, NSW. Areas of geological interest were identified by the company geologist contractor and the halved core samples dispatched for assay.

Criteria	JORC Code explanation	Commentary
Quality of assay data and laboratory tests	<ul style="list-style-type: none"> The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total. For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc. Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established. 	<ul style="list-style-type: none"> Samples were delivered to ALS Chemex, in Orange NSW. Average sample weight was 3 to 4kgs. Samples were crushed and pulverised to 95% passing 75 micron Standard assay procedures performed by a reputable assay lab, (ALS Group), were undertaken. Gold assays are initially by 50g fire assay with AAS finish, (method Au-AA26). For samples with a gold value greater than 0.5ppm the entire remaining sample is screen fire assayed using wet screening to 75 microns. Ag, As, Cu, Fe, Pb, S, Zn are digested in aqua regia then analysed by ICP-AES (method ME-ICP61). Comparison with 4 acid digestion indicate that the technique is considered total for Ag, As, Cu, Pb, S, Zn. Fe may not be totally digested by aqua regia but near total digestion occurs. A final 50 gram split was then fire assayed with an AAS finish. Internal ALS QC results are reported along with sample values in the final analytical report. QAQC protocols are documented and involve the use of certified reference material (CRM's) as assay standards, and include blanks, duplicates. Certified reference material or blanks are inserted at least every 40 samples. Standards are purchased from Certified Reference Material manufacture companies. Standards were purchased in foil lined packets of between 60g and 100g. Different reference materials are used to cover high grade, medium grade and low grade ranges of elements: Au, Ag, Pb, Zn Cu, Fe S and As. The standard names on the foil packages were erased before going into the pre numbered sample bag and the standards are submitted to the lab blind. The sample sizes are considered to be appropriate to correctly represent the mineralisation at the Kadungle Mount Leadley Target based on the style of mineralisation, the thickness and mineral consistency of the intersection(s).
Verification of sampling and assaying	<ul style="list-style-type: none"> The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes. Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols. Discuss any adjustment to assay data. 	<ul style="list-style-type: none"> Original sample data sheets and files have been retained and were used to validate the contents of the company's database against the original assay, down hole survey results and the geological logging. The raw assay data forming significant intercepts are verified by company's Senior Exploration Geologist. Drill Hole Data including: meta data, orientation methods, any gear left in the drill hole, lithological, mineral, structural, geotechnical, density, survey, sampling, magnetic susceptibility is collected and entered directly into an excel spread sheet using drop down codes. When complete the spreadsheet is emailed to the geological database administrator, the data is validated and secured through a relational database. No twin drillholes have been completed at the Kadungle Mount Leadley target.
Location of data points	<ul style="list-style-type: none"> Accuracy and quality of surveys used to locate drillholes (collar and downhole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used. Quality and adequacy of topographic control. 	<ul style="list-style-type: none"> KDD015 collar was surveyed (pick up) using a differential GPS and by a suitably qualified company contractor. Collar survey accuracy is +/- 5m for easting, northing and elevation coordinates. Co-ordinate system GDA_94, Zone 55. Topographic measurements are collected from the final survey drill hole pick up. Downhole survey measurements were collected every 6-12m for diamond drill hole using REFLEX EZ-SHOT This survey camera equipment is quoted by the manufacturer to have an accuracy of <ul style="list-style-type: none"> Azimuth 0 - 360° ± 0.5° Dip ± 90° ± 0.2° If the measurement is considered to be affected by magnetic material then an average from the last non-affected and the next non affected measurement is used.
Data spacing and distribution	<ul style="list-style-type: none"> Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	<ul style="list-style-type: none"> Core sampling is typically defined by geological characteristics and lithological boundaries.

Criteria	JORC Code explanation	Commentary
<i>Orientation of data in relation to geological structure</i>	<ul style="list-style-type: none"> Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type. If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material. 	<ul style="list-style-type: none"> KDD015 drilling was angled, drilled east-southeast to intersect the steeply dipping north-south and north-east striking fault/shear zone.
<i>Sample security</i>	<ul style="list-style-type: none"> The measures taken to ensure sample security. 	<ul style="list-style-type: none"> Samples were delivered to the Laboratory. Digital data was emailed to the Senior Exploration Geologist. Samples were placed in sealed polyweave bags and larger bulka bags for transport to the assay laboratory. The assay laboratory confirms that all samples have been received and that no damage has occurred during transport. Results data was emailed to the Senior Exploration Geologist. While samples are being processed in the Lab they are considered to be secure.
<i>Audits or reviews</i>	<ul style="list-style-type: none"> The results of any audits or reviews of sampling techniques and data. 	<ul style="list-style-type: none"> No formal audit has been completed on the samples being reported.

Section 2 Reporting of Exploration Results – Kadungle Mount Leadley Target – KDD015 Diamond Drill

Criteria	JORC Code explanation	Commentary
<i>Mineral tenement and land tenure status</i>	<ul style="list-style-type: none"> Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings. The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area. 	<ul style="list-style-type: none"> KDD015 Kadungle Mount Leadley target was drilled within EL6226. EL6226 is located between the towns of Tullamore and Trundle and 55kms NW of Parkes in Central Western NSW. Kadungle is situated on map sheet SI55-3 Narromine 1:250,000 and sheet 8432Tullamore 1:100,000. EL6226 is located within regional farm land. The tenement is 100% held by Defiance Resources Pty Ltd. Emmerson Resources are in Joint Venture with Aurelia Metals. EL6226 is in good standing and no known impediments exist.
<i>Exploration done by other parties</i>	<ul style="list-style-type: none"> Acknowledgment and appraisal of exploration by other parties. 	<ul style="list-style-type: none"> Union Miniere Development and Mining Corp Ltd carried out exploration in the 1970's in and around the Kadungle Exploration Target Area. CRA Exploration Pty Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1970 and 1971 and also 1996 – 1998. Mines Exploration Proprietary Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1979 and 1983. Seltrust Gold Pty Ltd – Peko Wallsend Operations Pty Ltd – Paragon Gold Pty Ltd conducted exploration between 1983 – 1993 in and around the Kadungle Exploration Target Area. BHP Gold Mines Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1991 and 1992. LFB carried out exploration between 1997 – 2004 in and around the Kadungle Exploration Target Area and during this time outlined very encouraging gold and copper mineralisation. Big Sky Holdings Pty Ltd carried out exploration in and around the Kadungle Exploration Target Area between 2004 and 2006. YTC Resources carried out exploration in and around the Kadungle Exploration Target Area between 2006 and 2014. Aurelia Metals Ltd carried out exploration in and around the Kadungle Exploration Target Area between 2015 and 2016.
<i>Geology</i>	<ul style="list-style-type: none"> Deposit type, geological setting and style of mineralisation. 	<ul style="list-style-type: none"> The Kadungle Volcanics contain minor historic Au ± Pb ± Ag workings at the Mount Leadley Prospect and anomalous enrichment of Au ± base metals is also recorded at various other localities. Mineralization within the target area has identified five styles of mineralisation: <ol style="list-style-type: none"> Epithermal (chalcedonic) quartz + Au + Ag + Cu veins; Disseminated chalcopryrite ± bornite ± Mo mineralisation; Pervasively silica-pyrite flooded volcanics with low grade Au mineralisation and sporadic quartz veining associated with higher Au grades; Quartz-chalcopryrite vein mineralisation associated with monzodiorite intrusive; and Volcanic hosted base metal mineralisation associated with

Criteria	JORC Code explanation	Commentary
		<p>the top of the volcanic pile.</p> <ul style="list-style-type: none"> The mineralisation style is considered to be Porphyry Copper Gold and/or Epithermal Copper Gold. The Kadungle Volcanics are considered to be highly prospective for shallow marine to sub-aerial mesothermal and epithermal Au ± base metal deposits. Potential also exists for deeper level porphyry style mineralisation and possibly volcanic hosted base metal mineralisation.
Drillhole information	<ul style="list-style-type: none"> A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drillholes: <ul style="list-style-type: none"> easting and northing of the drillhole collar elevation or RL of the drillhole collar dip and azimuth of the hole downhole length and interception depth hole length. 	<ul style="list-style-type: none"> KDD015 drilling information is tabulated in Tables 1 and 2 within the body of this report.
Data aggregation methods	<ul style="list-style-type: none"> In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated. Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail. The assumptions used for any reporting of metal equivalent values should be clearly stated. 	<ul style="list-style-type: none"> Mineralised intersections are reported as downhole drill intervals and not weighted averages. These results are exploration results only and no allowance is made for recovery losses that may occur should mining eventually result, nor metallurgical flow sheet considerations. Cut-off grades applied to results reported in this report are : <ul style="list-style-type: none"> Minimum cut-off of 0.2 g/t Au. No maximum cut-off. Minimum cut-off of 0.2 % Cu. No maximum cut-off. Maximum internal dilution for diamond drilling is 6 metres. No metal equivalent values reported.
Relationship between mineralisation widths and intercept lengths	<ul style="list-style-type: none"> These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drillhole angle is known, its nature should be reported. If it is not known and only the downhole lengths are reported, there should be a clear statement to this effect (eg 'downhole length, true width not known'). 	<ul style="list-style-type: none"> KDD015 Mount Leadley exploration target is from surface and perpendicular to the mineralised structure. KDD015 is inclined at -60° to the east-southeast to allow intersection angles with the mineralised zones approximate to the true width. Mineralised intersections for KDD015 target are reported as downhole lengths and are not true widths.
Diagrams	<ul style="list-style-type: none"> Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported. These should include, but not be limited to a plan view of drillhole collar locations and appropriate sectional views. 	<ul style="list-style-type: none"> Refer to Figures in body of text.
Balanced reporting	<ul style="list-style-type: none"> Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	<ul style="list-style-type: none"> All results are reported as Table 2.
Other substantive exploration data	<ul style="list-style-type: none"> Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances. 	<ul style="list-style-type: none"> Geotechnical logging was carried out recovery, RQD and number of defects (per interval). Information on structure type, dip, dip direction, alpha angle, beta angle, texture, shape, roughness and fill material was stored in the structure table of the database. Magnetic susceptibility was carried out 100% for KDD015. Thin section samples have been collected to assist in refining the geological model.
Further work	<ul style="list-style-type: none"> The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	<ul style="list-style-type: none"> Further work on the reported exploration targets will involve: <ul style="list-style-type: none"> Update of the geological model and geological and structural interpretation of the prospect Proposal of Deep IP to assist and focused next round of drilling Analysis of chlorite geochemistry at various intervals downhole Petrographic and mineragraphic analysis of alteration and mineralization of samples collected from KDD015

Appendix 2 - Section 1 Sampling Techniques and Data – Mount Leadley Trig Prospect – Reconnaissance Rockchip samples

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> Nature and quality of sampling (eg cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as downhole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling. Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. Aspects of the determination of mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (eg 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information. 	<ul style="list-style-type: none"> Rock chip samples were collected during field inspection on the Mount Leadley Trig prospect. Rock chip samples were collected from surface outcrops and floats. Outcrop samples represent the resistant and exposed portions of the local geology. The float samples are inferred to have originated from the local area where they were found, with no evidence of substantial transport. Submitted samples weigh from 0.2 kg to 2 kg. Samples were crushed, dried and pulverised (Lab) to produce a 50g sub sample for analysis by four acid digest with an ICP-AES (Cu, Fe, Bi) finish & Fire Assay (Au) finish.
Drilling techniques	<ul style="list-style-type: none"> Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc). 	<ul style="list-style-type: none"> Not applicable – surface rock chip samples.
Drill sample recovery	<ul style="list-style-type: none"> Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material. 	<ul style="list-style-type: none"> Not applicable – surface rock chip samples.
Logging	<ul style="list-style-type: none"> Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies. Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. The total length and percentage of the relevant intersections logged. 	<ul style="list-style-type: none"> A short geological description of each sample was taken at the time of collection. The description is qualitative: lithology, alteration, mineralisation
Sub-sampling techniques and sample preparation	<ul style="list-style-type: none"> If core, whether cut or sawn and whether quarter, half or all core taken. If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry. For all sample types, the nature, quality and appropriateness of the sample preparation technique. Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples. Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling. Whether sample sizes are appropriate to the grain size of the material being sampled. 	<ul style="list-style-type: none"> The sample preparation of rock chip samples followed industry best practice in sample preparation involving oven drying, coarse crushing of the rocks followed by pulverisation of the entire sample (total prep) using grinding. Where possible, samples were selected to represent different parts of the mineral system as a whole. No field duplicate samples were collected. Sample sizes were sufficiently large to sample a good representation of the local geology
Quality of assay data and laboratory tests	<ul style="list-style-type: none"> The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total. For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc. Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established. 	<ul style="list-style-type: none"> Samples were delivered to ALS Chemex, in Orange NSW. Average sample weight was ~1 kg. Standard assay procedures performed by a reputable assay lab, (ALS Group), were undertaken. Gold assays are initially by 50g fire assay with AAS finish, (method Au-AA26). For samples with a gold value greater than 0.5ppm the entire remaining sample is screen fire assayed using wet screening to 75 microns. Ag, As, Cu, Fe, Pb, S, Zn are digested in aqua regia then analysed by ICP-AES (method ME-ICP61). Comparison with 4 acid digestion indicate that the technique is considered total for Ag, As, Cu, Pb, S, Zn. Fe may not be totally digested by aqua regia but near total digestion occurs. A final 50 gram split was then fire assayed with an AAS finish. Internal ALS QC results are reported along with sample values in the final analytical report. QAQC protocols are documented and involve the use of certified reference material (CRM's) as assay standard.

Criteria	JORC Code explanation	Commentary
		<ul style="list-style-type: none"> Certified reference material or blanks are inserted at least every 40 samples. Standards are purchased from Certified Reference Material manufacture companies. Standards were purchased in foil lined packets of between 60g and 100g. Different reference materials are used to cover high grade, medium grade and low grade ranges of elements: Au, Ag, Pb, Zn Cu, Fe S and As. The standard names on the foil packages were erased before going into the pre numbered sample bag and the standards are submitted to the lab blind. The sample sizes are considered to be appropriate to correctly represent the mineralisation at the Mount Leadley Trig prospect.
Verification of sampling and assaying	<ul style="list-style-type: none"> The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes. Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols. Discuss any adjustment to assay data. 	<ul style="list-style-type: none"> Original sample data sheets and files have been retained and were used to validate the contents of the company's database against the original assay The raw assay data were reviewed and verified by company's Senior Exploration Geologist
Location of data points	<ul style="list-style-type: none"> Accuracy and quality of surveys used to locate drillholes (collar and downhole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used. Quality and adequacy of topographic control. 	<ul style="list-style-type: none"> A handheld GPS was used to locate each sample. GPS accuracy is +/- 5m for easting and northing coordinates. Coordinate system GDA_94, Zone 55. Topographic control is maintained by use of widely available government datasets
Data spacing and distribution	<ul style="list-style-type: none"> Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	<ul style="list-style-type: none"> Only reconnaissance sampling completed – spacing is variable and based on outcrop location and degree of exposure Samples were taken at non-regular intervals according to observations at the time in the field. No sample compositing has been applied.
Orientation of data in relation to geological structure	<ul style="list-style-type: none"> Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type. If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material. 	<ul style="list-style-type: none"> Samples were taken according to geological observations at the time in the field.
Sample security	<ul style="list-style-type: none"> The measures taken to ensure sample security. 	<ul style="list-style-type: none"> Samples were placed in tied calico bags with unique sample numbers. Once delivered from the field the samples were housed in secure premises prior to laboratory submission by Emmerson's contractor. Samples were placed in sealed polyweave bags for transport to the assay laboratory. Digital data was emailed to the Senior Exploration Geologist. The assay laboratory confirms that all samples have been received and that no damage has occurred during transport. Results data was emailed to the Senior Exploration Geologist. While samples are being processed in the Lab they are considered to be secure.
Audits or reviews	<ul style="list-style-type: none"> The results of any audits or reviews of sampling techniques and data. 	<ul style="list-style-type: none"> No formal audit has been completed on the samples being reported.

Section 2 Sampling Techniques and Data – Mount Leadley Trig Prospect – Reconnaissance Rockchip

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	<ul style="list-style-type: none"> Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings. The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area. 	<ul style="list-style-type: none"> Mount Leadley Trig Prospect is within EL6226. EL6226 is located between the towns of Tullamore and Trundle and 55kms NW of Parkes in Central Western NSW. Kadungle is situated on map sheet SI55-3 Narromine 1:250,000 and sheet 8432Tullamore 1:100,000. EL6226 is located within regional farm land. The tenement is 100% held by Defiance Resources Pty Ltd. Emmerson Resources are in Joint Venture with Aurelia Metals. EL6226 is in good standing and no known impediments exist..
Exploration done by other parties	<ul style="list-style-type: none"> Acknowledgment and appraisal of exploration by other parties. 	<ul style="list-style-type: none"> Mines Exploration Proprietary Ltd carried out exploration around the Mount Leadley Trig Prospect between 1979 and 1983. LFB carried out exploration between 1997 – 2004 in and around the

Criteria	JORC Code explanation	Commentary
		Mpunt Leadly Trig Prospect and during this time outlined very encouraging gold and copper mineralisation.
Geology	<ul style="list-style-type: none"> • Deposit type, geological setting and style of mineralisation. 	<ul style="list-style-type: none"> • The mineralization mapped on the surface at Mount Leadley Trig Prospect is currently considered to be a high level epithermal consisting of banded quartz-hematite veins and brecciated quartz-hematite-jasper hosted in the Kadungle Volcanics. Further work, such as drilling, may alter this interpretation. • Minor historic Au ± Pb ± Ag workings at various localities in the Kadungle Exploration Targets have anomalous enrichment of Au ± base. • The mineralisation style is considered to be Porphyry Copper Gold and/or Epithermal Copper Gold. • The Kadungle Volcanics are considered to be highly prospective for shallow marine to sub-aerial mesothermal and epithermal Au ± base metal deposits. Potential also exists for deeper level porphyry style mineralisation and possibly volcanic hosted base metal mineralisation.
Drillhole information	<ul style="list-style-type: none"> • A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drillholes: <ul style="list-style-type: none"> ○ easting and northing of the drillhole collar ○ elevation or RL of the drillhole collar ○ dip and azimuth of the hole ○ downhole length and interception depth ○ hole length. 	<ul style="list-style-type: none"> • All results are reported as Table 3 within the body of this report.
Data aggregation methods	<ul style="list-style-type: none"> • In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated. • Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail. • The assumptions used for any reporting of metal equivalent values should be clearly stated. 	<ul style="list-style-type: none"> • No length-weighting or cut-off grades have been applied. • No metal equivalent values reported.
Relationship between mineralisation widths and intercept lengths	<ul style="list-style-type: none"> • These relationships are particularly important in the reporting of Exploration Results. • If the geometry of the mineralisation with respect to the drillhole angle is known, its nature should be reported. • If it is not known and only the downhole lengths are reported, there should be a clear statement to this effect (eg 'downhole length, true width not known'). 	<ul style="list-style-type: none"> • Not applicable. Only rockchips (point data) is presented.
Diagrams	<ul style="list-style-type: none"> • Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported. These should include, but not be limited to a plan view of drillhole collar locations and appropriate sectional views. 	<ul style="list-style-type: none"> • Refer to Figures in body of text.
Balanced reporting	<ul style="list-style-type: none"> • Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	<ul style="list-style-type: none"> • All results are reported as Table 3
Other substantive exploration data	<ul style="list-style-type: none"> • Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances. 	<ul style="list-style-type: none"> • All meaningful and material information is reported.
Further work	<ul style="list-style-type: none"> • The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling). • Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	<ul style="list-style-type: none"> • Further work on the reported exploration targets will involve: <ul style="list-style-type: none"> - Assess geochemical results; update geological understanding of the prospect - Petrographic and mineragraphic analysis of alteration and mineralization from collected rock chip samples - Review and assess the aeromag, further geophysical method is

Criteria	JORC Code explanation	Commentary
		proposed (i.e Deep penetrating IP) to fully assess the potential of the prospect.

Appendix 3 - Section 1 Sampling Techniques and Data – Kadungle Exploration Target

Criteria	JORC Code explanation	Commentary
Sampling techniques	<ul style="list-style-type: none"> Nature and quality of sampling (e.g. cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as downhole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling. Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. Aspects of the determination of mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (e.g. 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (e.g. submarine nodules) may warrant disclosure of detailed information. 	<ul style="list-style-type: none"> The Kadungle Exploration Target has been sampled using Aircore (AC), Reverse Circulation (RC) and diamond drilling (DD) techniques. 78AC holes for 2,246m, 131 RC/Percussion holes for 7,023m and 19 Diamond holes for 5,188.4m have been completed. RC and DDH holes have been angled to optimally test the target zones with AC drilled vertical. Typically, most drill holes have been drilled towards the East or West at angles (dip) between 50 to 80 degrees from surface. RC chips are either riffle split or speared on site to obtain 3m composite samples from which 2.5 – 3.0kg was pulverised (at the laboratory) to produce a 50g charge for analysis by multi acid digest with an ICP(Cu, Fe, Bi) finish & Fire Assay (Au) finish. Individual 1m samples were pulverised (at the laboratory) to produce a 50g charge for analysis by multi acid digest with an ICP (Cu, Fe, Bi) finish & Fire Assay (Au) finish. RC samples were collected in 1m sample bags, but sampled as 3m composites. Anomalous composites were re-sampled as 1m intervals, being manually by field assistants. Diamond core was used to obtain high quality samples that were logged for lithological, structural, geotechnical, density and other attributes. No assessment of the QC of drill hole sampling methods, after cut by the drill rig can be made from available data, hence the author has to assume no significant errors occurred during or post drilling sampling process. QAQC measures are assumed to be as per industry best practice for the time. Diamond core was typically NQ³ size, however some larger diameter core was also collected (HQ). Core was sampled on geological intervals (0.5 m to 1.5 m), cut into half core using a standard brick saw. Sample weights of approximately 3.0kg were crushed, dried and pulverised (Lab) to produce a 50g sub sample for analysis by multi acid digest with an ICP (Cu, Fe, Bi) finish & Fire Assay (Au) finish.
Drilling techniques	<ul style="list-style-type: none"> Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc). 	<ul style="list-style-type: none"> AC, RC and Diamond drilling accounts for 100% of the current drilling at the Kadungle Exploration Target. RC drilling utilizes a 4.5 inch, face sampling bit. NQ³ core diameter is 45.0mm HQ core diameter is 63.5mm. Drill hole depths range from 1m to 693.9m. Sections of diamond drill core has been oriented to obtain structural measurements however orientation tool type and frequency could not be established with any degree of certainty.
Drill sample recovery	<ul style="list-style-type: none"> Method of recording and assessing core and chip sample recoveries and results assessed. Measures taken to maximise sample recovery and ensure representative nature of the samples. Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material. 	<ul style="list-style-type: none"> Sample recovery considered good and representative. RC samples were visually checked for recovery, moisture and contamination. Any issues or concerns were recorded in the database. Overall recoveries for diamond core are >80% however recovery and RQD information is not complete so caution is required. The cyclone and splitter or spear is routinely cleaned with more attention spent during the drilling of damp or wet samples. It is considered that there is evidence for sample bias that may have occurred due to preferential loss/gain of fine/coarse material. Visible (course) gold is identified in sections of diamond core so caution is required.
Logging	<ul style="list-style-type: none"> Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies. Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography. 	<ul style="list-style-type: none"> Standard operating procedures are employed for logging AC, RC and Diamond core samples. All drill core and AC & RC samples were lithologically logged. No lithological log could be completed in zones were no core was recovered due to voids encountered. Drill hole logging data was transcribed into a database post

Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> The total length and percentage of the relevant intersections logged. 	<ul style="list-style-type: none"> drilling. Standardised codes were used for lithology, oxidation, alteration and presence of sulphide minerals. Structural logging of selected diamond drill core records orientation of veins, fractures and lithological contacts. Information on structure type, dip, dip direction, alpha angle, beta angle, texture, shape, roughness and fill material is stored in the structure table of the database. RQD logging records core lengths, recovery, hardness and weathering however this data was not routinely collected. Magnetic susceptibility data for all individual 1m RC samples was collected. Magnetic susceptibility data for selected diamond core was collected as per procedures. All drill core was digitally photographed. Diamond core is stored in Orange or Londonderry NSW. RC chips are stored in Orange NSW.
Sub-sampling techniques and sample preparation	<ul style="list-style-type: none"> If core, whether cut or sawn and whether quarter, half or all core taken. If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry. For all sample types, the nature, quality and appropriateness of the sample preparation technique. Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples. Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling. Whether sample sizes are appropriate to the grain size of the material being sampled. 	<ul style="list-style-type: none"> Entire sample was delivered to the laboratory. Samples consisted of dust and chips and were all dry. RC samples were either speared or riffle split to obtain a sub-sample No duplicate samples were submitted. Standard operating procedures are used for sampling RC and diamond core samples. Core was cut in half (NQ³ & HQ) using a hand operated brick saw. All samples were collected from the same side of the core and were half core samples. Half core samples are submitted for analysis, unless a field duplicate was required, in which case quarter core samples were submitted. The sample preparation of diamond core for followed industry best practice (at that time) in sample preparation involving oven drying, coarse crushing of the half core followed by pulverisation of the entire sample (total prep) using grinding. The sample preparation for RC samples is identical, without the coarse crush stage. Pulverised material not required by the laboratory (pulp) including duplicate samples were returned, and are held in Orange, NSW. Coarse rejects are disposed of by the Laboratory. RC samples were collected on the rig using and then either speared or riffle split by the field assistants if dry to obtain a 3 kg sample. If samples are wet, they are left to dry before being riffle split.
Quality of assay data and laboratory tests	<ul style="list-style-type: none"> The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total. For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc. Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established. 	<ul style="list-style-type: none"> Samples were delivered to ALS Chemex, in Orange NSW Average sample weight was 3 to 4kgs. Samples were crushed and pulverised to 95% passing 75 micron Standard assay procedures performed by a reputable assay lab, (ALS Group), were undertaken. Gold assays are initially by 30g fire assay with AAS finish, (method Au-AA25). For samples with a gold value greater than 0.5ppm the entire remaining sample is screen fire assayed using wet screening to 75 microns. Ag, As, Cu, Fe, Pb, S, Zn are digested in aqua regia then analysed by ICPAES (method ME-ICP41). Comparison with 4 acid digestion indicate that the technique is considered total for Ag, As, Cu, Pb, S, Zn. Fe may not be totally digested by aqua regia but near total digestion occurs. A final 50 gram split was then fire assayed with an AAS finish. Internal ALS QC results are reported along with sample values in the final analytical report. Samples typically weighed less than 3kg to ensure total preparation at the pulverisation stage. Certified reference material or blanks are inserted at least every 40 samples. Standards are purchased from Certified Reference Material manufacture companies: Ore Research and Exploration, Gannet Holdings Pty Ltd and Geostats Pty Ltd. Standards were purchased in foil lined packets of between 60g and 100g. Different reference materials are used to cover high grade,

Criteria	JORC Code explanation	Commentary
		<p>medium grade and low grade ranges of elements: Au, Ag, Pb, Zn Cu, Fe S and As. The standard names on the foil packages were erased before going into the pre numbered sample bag and the standards are submitted to the lab blind. The sample sizes are considered to be appropriate to correctly represent the mineralisation at the Kadungle Exploration Target based on: the style of mineralisation, the thickness and mineral consistency of the intersection(s).</p>
Verification of sampling and assaying	<ul style="list-style-type: none"> The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes. Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols. Discuss any adjustment to assay data. 	<ul style="list-style-type: none"> Original data sheets and files (when located) have been retained and were used to validate the contents of the database against the original logging. The raw assay data forming significant intercepts are examined by at least two company personnel. Drill Hole Data including: meta data, orientation methods, any gear left in the drill hole, lithological, mineral, structural, geotechnical, density, survey, sampling, magnetic susceptibility is collected and entered directly into an excel spread sheet using drop down codes. When complete the spreadsheet is emailed to the geological database administrator, the data is validated and uploaded into an SQL database. Assay data is provided by ALS via .csv spreadsheets. The data is validated using the results received from the known certified reference material. Using an SQL based query the assay data is merged into the database. Hard copies of the assay certificates are stored with drill hole data such as driller's plods, invoices and hole planning documents. No twin drill holes have been completed at the Kadungle Exploration Target.
Location of data points	<ul style="list-style-type: none"> Accuracy and quality of surveys used to locate drillholes (collar and downhole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used. Quality and adequacy of topographic control. 	<ul style="list-style-type: none"> Approximate sample location is shown on Figure 2. Drill hole collars were surveyed (pick up) using a differential GPS and by a suitably qualified company employee. Collar survey accuracy is +/- 5m for easting, northing and elevation coordinates. Co-ordinate system GDA_94, Zone 55. Topographic measurements are collected from the final survey drill hole pick up. Downhole survey measurements were collected at a minimum of every 30m using an Eastman Single-Shot® camera for RC and every 6-12m for diamond drill holes This survey camera equipment is quoted by the manufacturer to have an accuracy of <ul style="list-style-type: none"> Azimuth 0-360° ± 1 Dip ± 90° ± 0.5° If the measurement is considered to be affected by magnetic material then an average from the last non affected and the next non affected measurement is used.
Data spacing and distribution	<ul style="list-style-type: none"> Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	<ul style="list-style-type: none"> The spacing of drill hole collars is erratic, and identified mineralisation within the Kadungle Exploration Target has been defined by these drill collars. RC sampling is on 1 m intervals that may have originally consisted of 3m composites. Core sampling is generally defined by geological characteristics and controlled by alteration and lithological boundaries.
Orientation of data in relation to geological structure	<ul style="list-style-type: none"> Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type. If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material. 	<ul style="list-style-type: none"> It is considered that the vertical drilling is representative and that no sample bias has been introduced. Exploration drilling is at a high angle to the mineralized bodies and or shear zone. Exploration drilling is perpendicular to mineralized bodies or shear zone. No orientation based sampling bias has been identified at the Kadungle Exploration Target in the data at this point.
Sample security	<ul style="list-style-type: none"> The measures taken to ensure sample security. 	<ul style="list-style-type: none"> Samples were delivered to the Laboratory. Digital data was emailed to the Exploration Manager. Samples were placed in sealed polyweave bags and larger bulka bags for transport to the assay laboratory. The assay laboratory confirms that all samples have been received and that no damage has occurred during transport. Results data was emailed to the Exploration Manager.

Criteria	JORC Code explanation	Commentary
		<ul style="list-style-type: none"> While samples are being processed in the Lab they are considered to be secure.
Audits or reviews	<ul style="list-style-type: none"> The results of any audits or reviews of sampling techniques and data. 	<ul style="list-style-type: none"> No formal audit has been completed on the samples being reported.

Section 2 Reporting of Exploration Results – Kadungle Exploration Target

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	<ul style="list-style-type: none"> Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings. The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area. 	<ul style="list-style-type: none"> The Kadungle Exploration Target lies wholly within Exploration Licence (EL) 6226. The Kadungle Exploration Target is located between the towns of Tullamore and Trundle and 55kms NW of Parkes in Central Western NSW. Kadungle is situated on map sheet S155-3 Narromine 1:250,000 and sheet 8432Tullamore 1:100,000. EL 6226 is located within regional farm land. The tenement is 100% held by Defiance Resources Pty Ltd. Emmerson Resources are in Joint Venture with Aurelia Metals. EL 6226 is in good standing and no known impediments exist.
Exploration done by other parties	<ul style="list-style-type: none"> Acknowledgment and appraisal of exploration by other parties. 	<ul style="list-style-type: none"> Union Miniere Development and Mining Corp Ltd carried out exploration in the 1970's in and around the Kadungle Exploration Target Area. CRA Exploration Pty Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1970 and 1971 and also 1996 – 1998. Mines Exploration Proprietary Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1979 and 1983. Seltrust Gold Pty Ltd – Peko Wallsend Operations Pty Ltd – Paragon Gold Pty Ltd conducted exploration between 1983 – 1993 in and around the Kadungle Exploration Target Area. BHP Gold Mines Ltd carried out exploration in and around the Kadungle Exploration Target Area between 1991 and 1992. LFB carried out exploration between 1997 – 2004 in and around the Kadungle Exploration Target Area and during this time outlined very encouraging gold and copper mineralisation. Big Sky Holdings Pty Ltd carried out exploration in and around the Kadungle Exploration Target Area between 2004 and 2006. YTC Resources carried out exploration in and around the Kadungle Exploration Target Area between 2006 and 2014. Aurelia Metals Ltd carried out exploration in and around the Kadungle Exploration Target Area between 2015 and 2016.
Geology	<ul style="list-style-type: none"> Deposit type, geological setting and style of mineralisation. 	<ul style="list-style-type: none"> The Kadungle Volcanics contain minor historic Au ± Pb ± Ag workings at the Mount Leadley Prospect and anomalous enrichment of Au ± base metals is also recorded at various other localities including Plevna, Alpha Zone, Kilmarnock, Nulgarr Hill, Mount Leadley South and Mount Leadley Trig prospects. Drilling to date at the Mount Leadley Prospect has identified five styles of mineralisation: <ol style="list-style-type: none"> Epithermal (chalcedonic) quartz + Au + Ag + Cu veins; Disseminated chalcopryite ± bornite ± Mo mineralisation; Pervasively silica-pyrite flooded volcanics with low grade Au mineralisation and sporadic quartz veining associated with higher Au grades; Quartz-chalcopryite vein mineralisation associated with

Criteria	JORC Code explanation	Commentary
		<p>monzodiorite intrusive; and</p> <p>5. Volcanic hosted base metal mineralisation associated with the top of the volcanic pile.</p> <ul style="list-style-type: none"> The mineralisation style is considered to be Porphyry Copper Gold and/or Epithermal Copper Gold. The Kadungle Volcanics are considered to be highly prospective for shallow marine to sub aerial mesothermal and epithermal Au ± base metal deposits. Potential also exists for deeper level porphyry style mineralisation and possibly volcanic hosted base metal mineralisation.
Drillhole information	<ul style="list-style-type: none"> A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drillholes: <ul style="list-style-type: none"> easting and northing of the drillhole collar elevation or RL of the drillhole collar dip and azimuth of the hole downhole length and interception depth hole length. 	<ul style="list-style-type: none"> A list of the drill holes and collar detail is provided in the body of this text Table 4.
Data aggregation methods	<ul style="list-style-type: none"> In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated. Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail. The assumptions used for any reporting of metal equivalent values should be clearly stated. 	<ul style="list-style-type: none"> Mineralized RC and Diamond intersections are reported as down hole intervals and not weighted averages. The results discussed are exploration results only and no allowance is made for recovery losses that may occur should mining eventually result, nor metallurgical flow sheet considerations.
Relationship between mineralization widths and intercept lengths	<ul style="list-style-type: none"> These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drillhole angle is known, its nature should be reported. If it is not known and only the downhole lengths are reported, there should be a clear statement to this effect (eg 'downhole length, true width not known'). 	<ul style="list-style-type: none"> The holes drilled within the Kadungle Exploration Target area are perpendicular, to the near, north- and northeast- striking mineralised zone. The holes were designed and drilled aimed at being as perpendicular as possible to the steep dipping mineralised zone, the drill holes are at a high angle therefore making the intercepts larger than true width.
Diagrams	<ul style="list-style-type: none"> Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported. These should include, but not be limited to a plan view of drillhole collar locations and appropriate sectional views. 	<ul style="list-style-type: none"> Refer to Figures in body of text.
Balanced reporting	<ul style="list-style-type: none"> Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results. 	<ul style="list-style-type: none"> Emmerson considers the Kadungle mineralisation to be an Exploration Target. <p>It is uncertain that following evaluation and/or further exploration work that the current identified mineralisation will be able to be reported as Mineral Resources or Ore Reserves in accordance with the requirements in Appendix 5A (JORC Code).</p>
Other substantive exploration data	<ul style="list-style-type: none"> Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances. 	<ul style="list-style-type: none"> Geotechnical logging was carried out on all diamond drill holes for recovery, RQD and number of defects (per interval). Information on structure type, dip, dip direction, alpha angle, beta angle, texture, shape, roughness and fill material was stored in the structure table of the database.
Further work	<ul style="list-style-type: none"> The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive. 	<ul style="list-style-type: none"> It is likely that should the interpretation and assessment of magnetics data, historical drilling and any drilling in the near future results be positive then further drilling will be conducted to look for extensions and define the potential size of the mineralisation. It is likely that additional surface drilling will occur testing for the similar style of mineralisation as reported.