



ASX: AMI | 31 October 2019

GROUP EXPLORATION UPDATE

KEY POINTS

- Exceptional gold intercepts returned from infill drilling in the central and upper Kairos lode:
 - o 6 metres at 196.0g/t Au, including 1 metres at 1160g/t Au
 - o 6 metres at 132.0g/t Au, including 2 metres at 395.4g/t Au
- Major new surface diamond drilling program commenced to test depth potential below the Kairos lode.
- Shallow step-out RC drilling at Federation intercepts highest grade polymetallic mineralisation to date:
 - o 18 metres at 24.7% Pb+Zn, 0.7% Cu, 0.3g/t Au & 12g/t Ag, including 7 metres at 45.0% Pb+Zn, 1.4% Cu, 0.5g/t Au & 23g/t Ag
- Further shallow oxide gold mineralisation intercepted in RC drilling at Athena and Federation:
 - o **7 metres at 6.2g/t Au** from 52m down hole (Athena)
 - o **23 metres at 1.3g/t Au** from 9m down hole (Federation)

Aurelia's Executive Chairman & Acting CEO, Cobb Johnstone, commented: "The results from Federation and Kairos are stand outs and are being following up as a priority. We are also encouraged by early indications of mineralisation from Athena which we look forward to progressing. We continue to be very excited by the unrealised exploration potential of our assets and remain strongly committed to unlocking value through organic growth"

Aurelia Metals Limited ("AMI" or the "Company") is pleased to provide an update on current exploration activities in the Kairos area at the Peak Mine and at the Federation and Athena prospects near the Hera Mine.

EXCEPTIONAL GOLD MINERALISATION INTERCEPTED AT KAIROS

In preparation for development and mining access expected in the June Quarter next year, the Company has committed significant additional resources to infill and exploration drilling in the high grade Kairos lode. Recent drilling has focused on the upper Kairos area, close to the existing underground development. Results have shown the upper area to be variably mineralised, with hole UD19PP1563 in particular returning the following exceptionally high grade intercept:

UD19PP1563 6m at **196.0g/t Au, 0.2% Pb+Zn & 13g/t Ag** from 139m, *incl.*1m at **1160g/t Au, 0.1% Pb+Zn & 75g/t Ag** from 139m

This hole is located on the northern edge of the recently completed infill drilling pattern in the upper area (**Figure 1**) and additional drilling is now underway to test the gold potential along strike. Further assay results were also received for infill drilling in the central Kairos part of the Kairos lode, with exceptional gold mineralisation also identified in UD19PP1551:

UD19PP1551 6m at **132.0g/t Au, 0.5% Pb+Zn, 0.3% Cu & 4g/t Ag** from 318m, incl. 2m at **395.4g/t Au, 0.5% Pb+Zn, 0.6% Cu & 9g/t Ag** from 322m

Full drill hole details are given in **Table 1**, and a list of new significant intersections for the Kairos area associated with this release are detailed in **Table 2**.



The Company is also encouraged by the results from hole UD19PK0139A, which is the deepest hole completed in the Kairos area to date. While the final intercept for this hole was outside the most prospective, steeply north-plunging zone at Kairos (**Figure 1**), moderate gold and copper mineralisation of **3 metres at 3.3g/t Au & 0.4% Cu** was returned. As announced in the previous exploration update (ASX release 4 September 2019) nearby hole UD19PK0140 returned **25 metres at 3.0% Cu**, including **12 metres at 4.1% Cu**.

To follow up these intercepts, the Company has commenced a major surface drilling campaign to test the lower Kairos area from the eastern side of the orebody (**Figure 2**). If successful, the surface drilling has the potential to extend the known mineralisation at Kairos by up to 400 metres down-dip.

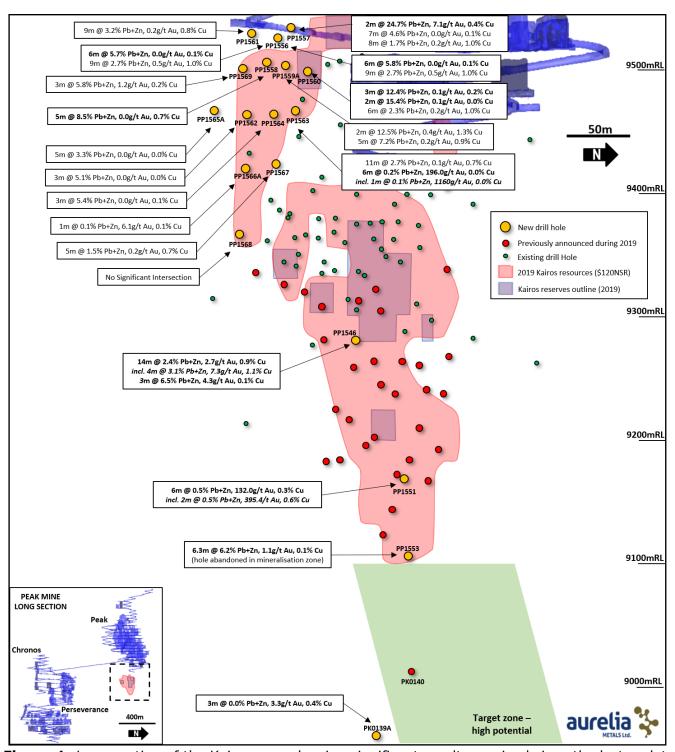


Figure 1. Long section of the Kairos area showing significant results received since the last update (September 2019).



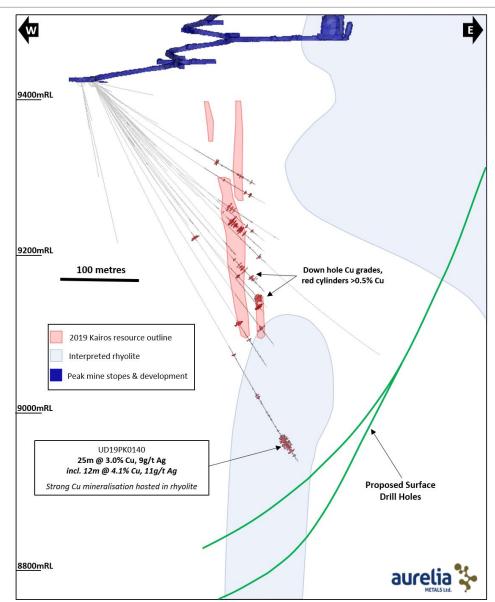


Figure 2. Schematic cross section of the Kairos lode showing the proposed surface drilling from the eastern side of the deposit.

STEP-OUT DRILLING AT FEDERATION RETURNS HIGH GRADE BASE METALS

Significant additional diamond and RC drilling has recently been completed at the Federation prospect, with the mineralised zones now extending over a strike length of 450 metres and to a depth of over 600 metres below surface. Most recently, the company has completed a step-out RC hole along strike to the east-northeast (holes FRC043, see **Figure 3**), intercepting the strongest polymetallic mineralisation at the prospect to date:

FRC043 18 metre at **24.7% Pb+Zn, 0.7% Cu, 0.3g/t Au & 12g/t Au** from 163m, *includes* 7 metres at **45.0% Pb+Zn, 1.4% Cu, 0.5g/t Au & 23g/t Au** from 165m

The intercept is dominated by massive and semi-massive sphalerite and galena mineralisation starting less than 140 metres below surface (**Figure 4**). The intercept in FRC043 extends the high grade mineralisation at Federation well beyond the modelled IP chargeability anomaly and leaves the zone along strike open. While the geometry of the system remains locally complex, the new intercept confirms an overall east-northeast/west-southwest orientation for the lead-zinc mineralisation at Federation.

Immediate follow-up drilling will look to test the strike and depth extents of the mineralisation intercepted in FRC043, along with testing for mineralisation even closer to the surface.



Metallurgical test work has also recently commenced to test the amenability of the Federation mineralisation to the Hera processing plant.

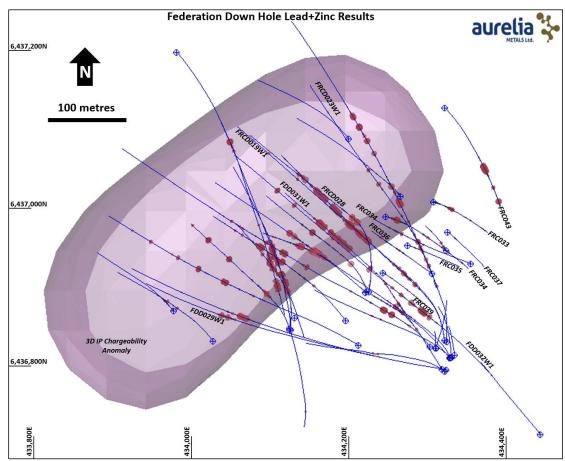


Figure 3. Plan showing IP chargeability anomaly at Federation along with RC and diamond drilling. Red discs on drill holes are Pb+Zn>1%. New holes reported in this release are labelled.



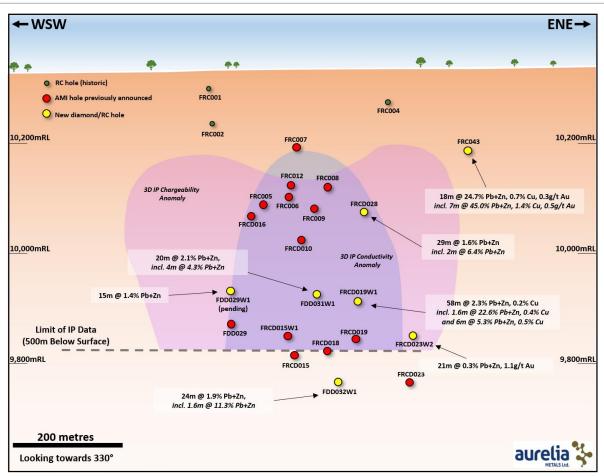


Figure 4. Long section looking towards 330° (NNW) showing the modelled 3D IP chargeability and conductivity anomalies at Federation with recent drilling results.

In addition to the sulphide mineralisation intercepted in FRC043, RC drilling has been completed to follow-up the previously announced shallow gold intercepts in hole FRC027 at Federation (see ASX release 4 September 2019). Results announced for FRC027 included **20 metres at 0.7g/t Au** from 12m down hole and **50 metres at 0.5g/t** from 41m down hole. New RC drilling has intercepted further shallow gold mineralisation including:

FRC035 23 metres at **1.3g/t Au & 0.4% Pb+Zn** from 9m, includes 5 metres at **3.0g/t Au & 0.5% Pb+Zn** from 20m

Hole FRC035 was drilled immediately to the west of FRC027 and confirms the presence of a very shallow oxide gold zone, with mineralisation in FRC035 commencing only seven metres below surface. **Figure 5** shows the extent of current drilling at Federation with gold assays displayed down hole. The new drilling has helped to define a gold-dominant zone at Federation, which is offset to the southeast and trends more northeast-southwest than the lead-zinc mineralisation.

Full drill hole details for the new Federation drill holes are given in **Table 1**, and a list of new significant intersections associated with this release are detailed in **Table 3**.



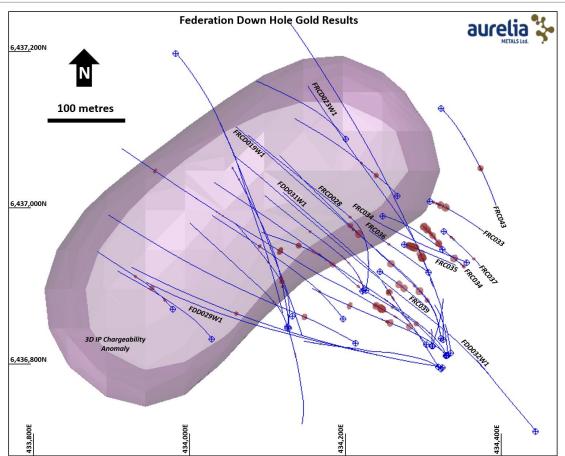


Figure 5. Plan showing IP chargeability anomaly at Federation along with RC and diamond drilling. Red discs on drill holes are Au>0.4g/t. New holes reported in this release are labelled.

RC DRILLING AT ATHENA INTERCEPTS ADDITIONAL SHALLOW GOLD

In June 2019 the Company announced that it had intercepted shallow gold mineralisation at the Athena prospect, 2.5 kilometres southeast of the Hera Mine (ASX release 12 June 2019). Significant results were reported from hole ATRC006, which included **5 metres at 6.2g/t Au** from 112 metres down hole. Since that time a further eleven mostly shallow RC holes have been completed at the prospect, with significant and/or anomalous gold mineralisation identified over a north-south strike exceeding 250 metres (see **Figure 6**). The best result from the recent drilling came from drilling above hole ATRC006:

ATRC012 7 metres at **6.2g/t Au & 1.0% Pb+Zn** from 52m, *includes* 2 metres at **17.8g/t Au & 2.4% Pb+Zn** from 53m

Mineralisation in ATRC012 is entirely within the oxide zone, commencing at only 45 metres below surface. The long section in **Figure 7** shows that a number of surrounding holes also produced narrow but significant gold mineralisation. Encouragingly hole ATRC014, drilled slightly to the west of the Athena gold trend, also produced the first significant lead-zinc sulphide mineralisation at the prospect with **5 metres at 2.6% Pb+Zn** from 123m. A full list of intercepts is given in **Table 4.**

Aurelia's geologists are encouraged by the strike extent and continuity of the gold mineralisation returned from the shallow drilling to date. Deeper exploration with diamond drilling is planned to commence in the coming quarter to test potential for Hera-style mineralisation at depth.



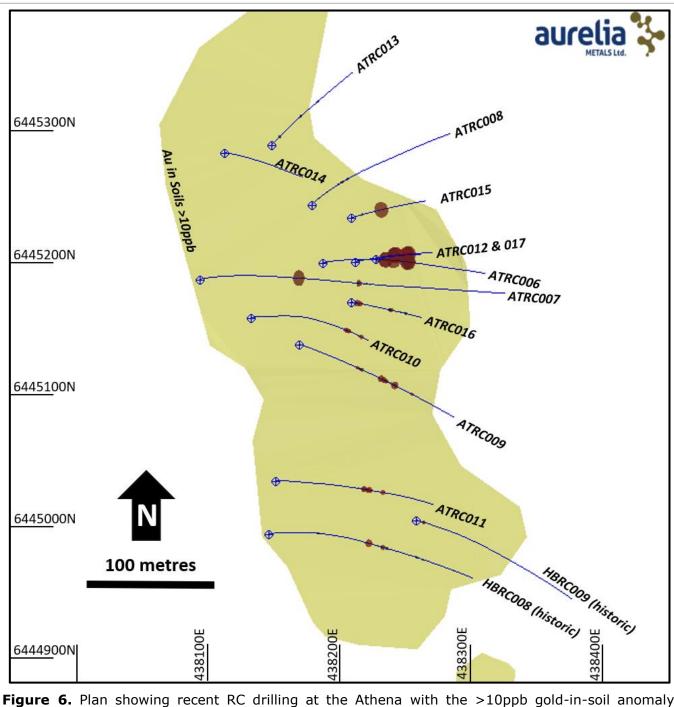


Figure 6. Plan showing recent RC drilling at the Athena with the >10ppb gold-in-soil anomaly (yellow) that characterises the area. Red discs on drill holes are Au>0.4g/t.



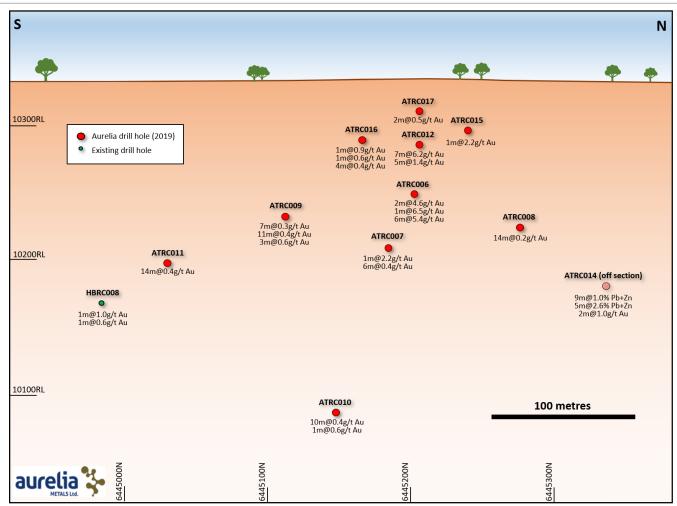


Figure 7. Long section through 438250E showing recent drilling at the Athena prospect.

Further Information

Cobb Johnstone

Executive Chairman and Acting CEO +61 2 6363 5200

COMPETENT PERSONS STATEMENT

The information in this report that relates to Exploration Results is based on information compiled by Adam McKinnon, BSc (Hons), PhD, who is a Member of the Australasian Institute of Mining and Metallurgy. Dr McKinnon is a full-time employee of Aurelia Metals and has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves.' Dr McKinnon consents to the inclusion in this report of the matters based on his information in the form and context in which it appears.



Table 1. Collar summary for the drill holes reported in this release.

Prospect	Туре	Hole ID	Easting	Northing	Local RL	DIP	Azimuth	Total Depth
Prospect	туре	Hole ID	(MGA)	(MGA)	(m)	DIP	(MGA)	(m)
Kairos	UG DDH	UD19PP1546	393325	6507353	9424	-44.5	82	275
Kairos	UG DDH	UD19PP1551	393325	6507353	9424	-56.75	70.5	338.2
Kairos	UG DDH	UD19PP1553	393325	6507353	9424	-63.7	65	382.3
Kairos	UG DDH	UD19PP1556	393413	6507345	9424	36	105	202.6
Kairos	UG DDH	UD19PP1557	393413	6507345	9424	37.5	97.5	179.4
Kairos	UG DDH	UD19PP1558	393413	6507345	9424	23	111	173.1
Kairos	UG DDH	UD19PP1559A	393413	6507345	9424	24.5	104.5	165
Kairos	UG DDH	UD19PP1560	393413	6507345	9424	25.5	97	155.3
Kairos	UG DDH	UD19PP1561	393413	6507345	9424	32	112	180.7
Kairos	UG DDH	UD19PP1562	393415	6507345	9424	5	115.5	165
Kairos	UG DDH	UD19PP1563	393415	6507345	9424	5.5	109	155
Kairos	UG DDH	UD19PP1564	393415	6507345	10318	6	110	145
Kairos	UG DDH	UD19PP1565A	393414	6507345	10326	6	126	163
Kairos	UG DDH	UD19PP1566A	393414	6507345	10326	-17	120	130
Kairos	UG DDH	UD19PP1567	393414	6507345	10326	-13.5	108	160
Kairos	UG DDH	UD19PP1568	393414	6507345	10326	-37	121	160
Kairos	UG DDH	UD19PP1569	393414	6507345	10326	22	116	190
Kairos	UG DDH	UD19PK0139A	393326	6507353	10326	-71	81	690
Federation	RC/DDH	FRCD019W1	434325	6436838	10325.7	-70.4	345.8	658.9
Federation	RC/DDH	FRCD023W2	434327	6436837	10325.8	-66	5	651.5
Federation	RC/DDH	FRCD028	434230	6436899	10322.9	-70	5.3	537.7
Federation	DDH	FDD029W1	434327	6436801	10326.1	-60	279	604
Federation	DDH	FDD031W1	434321	6436803	10325.5	-64.83	326.47	573
Federation	DDH	FDD032W1	434445	6436720	10325.5	-70	320	890.5
Federation	RC	FRC033	434311	6437012	10324	-61.1	110.2	162
Federation	RC	FRC034	434250	6436994	10323.1	-60.6	107.7	252
Federation	RC	FRC035	434278	6436957	10323.5	-61.1	110.2	138
Federation	RC	FRC036	434309	6436922	10324.2	-70.7	300.1	210
Federation	RC	FRC037	434329	6436974	10324.5	-60.7	129.3	126
Federation	RC	FRC038	434357	6436934	10325.3	-67	291	216
Federation	RC	FRC039	434248	6436923	10323	-69.9	126	200
Federation	RC	FRC043	434325	6437130	10324	-60.2	140.3	258
Athena	RC	ATRC007	438095	6445188	10330.7	-60	80	300
Athena	RC	ATRC008	438181	6445245	10332.2	-67.3	47.6	200
Athena	RC	ATRC009	438171	6445139	10330	-60	110	198
Athena	RC	ATRC010	438134	6445159	10330.9	-70.37	87.67	300
Athena	RC	ATRC011	438153	6445035	10326.4	-59.9	92.7	300
Athena	RC	ATRC012	438214	6445202	10334.2	-55.6	81.5	102
Athena	RC	ATRC013	438150	6445291	10332.6	-65.1	43.4	204
Athena	RC	ATRC014	438114	6445285	10332.4	-70.6	100	240
Athena	RC	ATRC015	438211	6445235	10333.4	-55	75	102
Athena	RC	ATRC016	438210	6445171	10332.8	-55	100	102
Athena	RC	ATRC017	438229	6445204	10334.7	-55	81.5	60



Table 2. Significant new intersections for the Kairos drill holes reported in this release.

Table 2. Signific	ant new int		r the Ka	airos ari	ii noies	reported	in this	release.	
Hole ID	Interval (m)	Est. True Width (m)	Pb (%)	Zn (%)	Au (g/t)	Ag (g/t)	Cu (%)	NSR (\$)	From (m)
UD19PP1546	14	10.9	1.4	1.0	2.7	9	0.9	\$167	224
includes	4	3.1	1.8	1.3	7.3	8	1.1	\$392	225
	3	2.3	1.4	4.7	4.3	5	0.1	\$290	251
UD19PP1551	6	3.7	0.3	0.2	132.0	4	0.3	\$6,122	318
includes	2	1.2	0.4	0.1	395.4	9	0.6	\$18,318	322
UD19PP1553	6.3	3.6	2.3	3.9	1.1	30	0.1	\$159	376
UD19PP1556	6	4.4	2.0	3.7	0.0	8	0.1	\$92	97
	9	6.9	0.9	1.8	0.5	6	1.0	\$64	132
UD19PP1557	2	1.4	6.3	18.5	7.1	25	0.4	\$701	91
	7	5.1	1.4	3.2	0.0	6	0.1	\$72	98
	8	6	0.7	1.0	0.2	5	1.0	\$68	131
UD19PP1558	5	3.9	3.1	5.4	0.0	11	0.7	\$138	133
UD19PP1559A	2	1.5	4.2	8.4	0.4	13	1.3	\$212	103
	5	4	2.1	5.1	0.2	8	0.9	\$118	128
UD19PP1560	3	2.6	4.2	8.1	0.1	18	0.2	\$199	65
	2	1.7	5.0	10.4	0.1	15	0.1	\$242	72
	6	5.3	1.0	1.3	0.2	7	1.0	\$46	107
	8	7.1	0.8	1.6	1.0	4	0.1	\$82	131
UD19PP1561	9	6.5	0.8	2.4	0.2	6	0.8	\$58	141
UD19PP1562	3	2.4	1.5	3.7	0.0	8	0.0	\$80	124
UD19PP1563	2	1.8	0.1	0.3	0.5	6	2.4	\$163	64
	9	8.2	0.9	2.1	0.1	4	0.8	\$51	101
	6	5.4	0.1	0.1	196.0	13	0.0	\$9,081	139
includes	1	0.9	0.0	0.1	1160	75	0.0	\$53,741	139
UD19PP1564	3	2.5	1.2	4.3	0.0	6	0.1	\$82	111
UD19PP1565A	5	3.3	1.0	2.3	0.0	2	0.0	\$50	103
UD19PP1566A	1	0.7	0.0	0.1	6.1	1	0.1	\$282	125
UD19PP15667	5	4.3	0.4	1.1	0.2	3	0.7	\$33	112
UD19PP15668			No S	Significa	nt Inter	sections			
UD19PP15669	3	2.2	1.5	4.2	1.2	11	0.2	\$143	143
UD19PK0139A	3	1.6	0.1	0.0	3.3	3	0.4	\$156	569

^{*}Net Smelter Return ('**NSR**') is the Company's estimate based on factors including metals prices, metallurgical recoveries, payabilities and other offsite costs. Full details of the basis of the Company's NSR calculations are set out in the report "Mineral Resource and Ore Reserve Statement – June 2019" released to the ASX on 22 July 2019, a copy of which is available to view at www.aureliametals.com.au.



Table 3. Significant new intersections for the Federation drill holes reported in this release.

Table 3. Significan	Interval	Pb	Zn	Pb+Zn	Au	Ag	Cu	From
Hole ID	(m)	(%)	(%)	(%)	(g/t)	(g/t)	(%)	(m)
FRCD019W1	58	0.6	1.7	2.3	0.0	2	0.2	372
includes	1.6	7.4	15.2	22.6	0.1	9	0.4	387
and	6	0.7	4.6	5.3	0.1	3	0.5	419
FRCD023W2	21	0.1	0.2	0.3	1.1	0	0.0	233
includes	4	0.1	0.6	0.6	3.6	0	0.0	239
FRCD028	29	0.5	1.1	1.6	0.0	1	0.0	251
includes	2	2.1	4.4	6.4	0.1	2	0.0	258
FDD029W1	15	0.6	0.9	1.4	0.0	1	0.0	464
FDD031W1	3	0.0	0.1	0.1	1.3	0	0.0	246
	41	0.2	0.9	1.1	0.0	1	0.1	404
	20	0.6	1.6	2.1	0.0	1	0.0	460
includes	4	1.4	2.9	4.3	0.0	2	0.1	473
FDD032W1	24	0.7	1.2	1.9	0.0	1	0.1	468.9
includes	1.6	4.1	7.2	11.3	0.0	7	0.1	479.8
FRC033	55	0.5	0.1	0.6	0.3	1	0.0	1
includes	1	0.2	0.1	0.3	1.9	0	0.0	29
and	2	0.8	0.1	0.9	2.5	3	0.0	44
FRC034	30	1.1	0.1	1.1	0.1	1	0.0	18
includes	4	2.7	0.1	2.7	0.1	2	0.1	29
	1	0.1	0.5	0.6	2.2	1	0.0	215
FRC035	23	0.3	0.0	0.4	1.3	1	0.0	9
includes	5	0.4	0.0	0.5	3.0	1	0.0	20
FRC036	4	0.3	0.5	0.8	0.0	1	0.0	124
FRC037	12	0.3	0.1	0.4	0.3	1	0.0	22
FRC038	2	1.0	0.6	1.6	0.0	2	0.0	170
FRC039	1	0.1	0.1	0.2	1.9	0	0.0	80
	1	0.2	0.6	0.8	1.9	2	0.0	101
FRC043	18	8.1	16.6	24.7	0.3	12	0.7	163
includes	7	14.8	30.3	45.0	0.5	23	1.4	165

^{*}Down hole widths – true widths are currently undefined.



Table 4. Significant/anomalous intersections for the Athena prospect holes reported in this release.

Table 4. Significa	arrey arriorriane	do interse	CCIOIIS IOI	the Athen	a prospect	поісэ гер	orted iii ti	iis reiease.
Hole ID	Interval* (m)	Pb (%)	Zn (%)	Pb+Zn (%)	Au (g/t)	Ag (g/t)	Cu (%)	From (m)
ATRC006**	6	0.7	0.3	1.0	1.7	8	0.1	86
includes	2	1.7	0.5	2.2	4.6	18	0.1	87
	1	0.0	0.3	0.3	6.5	1	0.0	98
	6	0.2	0.1	0.3	5.4	2	0.0	112
includes	1	0.9	0.1	1.0	25.4	6	0.1	113
ATRC007	1	0.5	0.7	1.3	2.2	5	0.0	117
	6	0.1	0.2	0.3	0.4	2	0.0	171
ATRC008	14	0.1	0.1	0.2	0.2	0	0.0	62
ATRC009	7	0.0	0.1	0.1	0.3	0	0.0	83
	11	0.0	0.1	0.1	0.4	0	0.0	113
	3	0.0	0.0	0.0	0.6	0	0.0	129
ATRC010	10	0.1	0.1	0.2	0.4	1	0.0	236
	1	0.2	0.3	0.5	0.6	1	0.0	280
ATRC011	14	0.1	0.2	0.3	0.4	1	0.0	140
ATRC012	7	0.9	0.1	1.0	6.2	5	0.0	52
includes	2	2.3	0.1	2.4	17.8	8	0.1	53
	1	0.1	0.0	0.1	1.5	0	0.0	63
	5	0.1	0.1	0.2	1.4	1	0.0	68
ATRC013	11	0.2	0.3	0.5	0.1	1	0.0	106
ATRC014	9	0.2	0.7	0.9	0.0	5	0.1	91
	5	1.1	1.5	2.6	0.1	8	0.1	123
ATRC015	1	0.0	0.0	0.0	2.3	0	0.0	41
ATRC016	1	0.0	0.0	0.0	0.9	0	0.0	7
	1	0.0	0.0	0.0	0.6	1	0.0	12
	4	0.0	0.1	0.1	0.4	1	0.0	53
ATRC017	2	0.0	0.0	0.0	0.5	0	0.0	39

^{*}Down hole widths – true widths are currently undefined.
**Previously announced

Kairos

JORC Code 2012 (Table 1) - Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. AusIMM. Section 1 Sampling Techniques and Data (Criteria in this section apply to all succeeding sections)

Criteria	JORC Code explanation	Commentary
Sampling techniques	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 down hole gamma sondes, or handheld XRF instruments, etc.). These examples should not be taken as limiting the broad meaning of sampling.	Underground exploration and resource definition at Peak Gold Mines utilises diamond drill holes in fresh rock with close to 100% recovery. The core is predominantly BQ or LTK48 where resource definition is undertaken and is whole core sampled at metre intervals. NQ2 core is used for underground exploration and evaluation and is half core sampled in metre intervals. PGM has employed Swick Mining Services since 2008 as their preferred underground drilling contractor to maintain quality in core handling. The core is processed in an established core yard with racks, water and cover.
	 Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. 	A continuous series of pre-numbered bags is employed so that duplication of sample numbers is not likely. Computer control of core yard systems for ledger generation and specific gravity. Drilling run errors affecting mark-up are dealt with by the contractor crew responsible ensuring they take more care. All samples are analysed for specific gravity. Sample weights show consistency with regards to core recovery. Standards are submitted at a frequency of 1 in 20 with every submission. A blank is put at the beginning of every job. Silica flushes are used between samples around visible gold observations. Standard fails are subject to re-assay. A selection of pulps is taken yearly from the ore intervals for re-assay at another lab as a comparison of repeatability and lab precision. The core saw equipment is regularly inspected and aligned so the core is cut in even halves.
	 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 30g 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. 	Up to 100% of the core can be sampled but is generally restricted to all intervals which have alteration, mineralisation and shearing. Sampling is continuous and perpendicular to strike of the lodes reported. The entire metre of whole BQ or half NQ is completely crushed to 3mm and 100g is riffle split and pulverised to 90% passing 75 microns. All gold assays are 50g fire assay (Method Au – AA26) with a detection level of 0.01ppm and base metals by 4 acid digest (method ME-ICP61) with detection levels of: Ag-0.5ppm, Cu-0.01ppm, Pb-0.01ppm, Bi-1ppm, Zn-0.01ppm, S-0.01%, Fe-0.01%. Over limit analysis is by OG62- with Sulphur over range by method S-IR08 at ALS laboratories. Every core sample submitted for assay is submitted for specific gravity analysis at PGM by wet balance method (Archemedes method). The SG process is checked with a standard 1 in 20 and water temperature is also recorded.

Drilling techniques	Drill type (e.g. core, reverse circulation, openhole hammer, rotary air blast, auger, Bangka, sonic, etc.) and details (e.g. core diameter, triple or standard tube, depth of diamond tails, facesampling bit or other type, whether core is oriented and if so, by what method, etc.).	The variety of core sizes (LTK48, BQ, NQ2 and HQ) are used at the Peak Mines depending on drill hole spacing, depth and angle of hole. The holes are surveyed every 30m with a 15m survey at the beginning of the hole and end of hole survey. The holes are drilled with a jumbo mounted LM90 diamond rig supplied by SMS drilling.
Drill sample recovery	 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. 	Drillers record core loss whilst drilling with core blocks in the run. The drilling contract indicates an overall 98% recovery should be achieved in difficult drilling. In good drilling 100% recovery is required. The location of loss is also recorded on sample submission sheets. The estimated meterage of the core loss depends on how the core is pieced together. Sample weights of the assayed intervals are assessed to give another quantitative estimate of recovery. Generally good drilling equipment and experience is required to minimise core loss. The core is pieced together where possible, ensuring the core has been placed in the tray the right way around and is a check on the run lengths. At all times the core is handled with care with transportation using proper tie down points. Whole core sampling of the BQ core eliminates sample bias from having to half the core. When sampling NQ core the cut line is perpendicular to structures. There is no known relationship between sample recovery and sample grade in these samples.
Logging	 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. 	Geological domains are much larger than the mineralisation and in most cases it is possible to drill continuously through the ore zone. For mine delineation drilling lithological information is gathered to 10cm intervals into tables defining lithology, mineralisation, alteration and shearing. Mine delineation is not oriented so structural measurements are taken in relation to the regional foliation which is considered to be constantly orientated. Broader stratigraphical and structural units are captured in an interp table. All of the deposits have defined structural zones across strike. Major lithologies are wireframed to ensure continuity of the interpretation. Exploration core is oriented so structural measurements are accurate also magnetic susceptibility is measured at 1m intervals where appropriate. Rock mass quality information, to support engineering considerations, are logged and Q primed is calculated. Further to rock mass quality data, rock strength data is gathered for mining studies. Metallurgical samples are initially recovered as part of exploration or evaluation programs from either half or quarter core. All core is photographed. The core is photographed using a mobile frame over individual trays ensuring that light and focus conditions remain constant. Structural measurements are measured against the dominant regional S2 foliation based on quality of observation. Visual estimates of minerals in percent are checked against assay data. Magnetic susceptibility is recorded for specific intervals during exploration programs. All core and chips are 100% logged for lithology, stratigraphy, mineralisation, alteration, RMQ, structure, and shear using Coreview software.

Sub-san		_
techniq		
sample preparation		

- 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.

LTK48 and BQ core is whole core sampled so no subsampling is done on delineation drilling. NQ2 and HQ core is half core sampled and cut with an almonte automatic saw leaving the other half of the core for possible re-assay or metallurgical use.

No non-core sampling is described in this report

For a sample of core being assayed for grade the same regime is followed as explained in sampling techniques above.

The sampling procedures for quality control are outlined under sampling techniques above.

Twinning holes and second half core sampling is usually adopted during exploration projects. High density drilling is also employed in the main mining areas.

Variability and nugget effects produces complications when sampling for coarse gold have been address by PGM. The sample size of drill core is adequate to capture gold at the micron size range. The ore bodies with the higher CV's are drilled at a closer spacing to minimise risk.

Quality of assay data and laboratory test

- 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

Samples dry for 12 hours at 104°C in oven. Samples are crushed to <3mm and pulverised to 90% passing 75um in and LM5 pulveriser. 250 grams of sample is scooped from the bowl. Sizing tests are performed every 10 samples. Barren wash is used between samples. 50 grams is scooped from the 250 grams for fire assay. 4 acid digest is used to determine base metals. Fire assay and four acid digest are methods considered as total element analysis. Acid leach tests are performed on waste used for surface works where necessary.

The suite of elements assayed and the lad methods used are considered adequate for resource reporting.

No geophysical tools were used in the determination of assay results. All assay results were generated by an independent third-party laboratory as described above.

A blank is submitted at the start of every hole. Standards are submitted at a frequency of 1 in 20. Standard fails are followed up with 10 sample repeats adjacent to the standard that failed. Replicates and duplicates are done by ALS at a frequency of 1 in 20. Standards, replicates and duplicates are graphed at regular intervals to determine accuracy and precision. The standards are supplied by Gannet Holdings Pty Ltd and Geostats. Standards have been both matrix matched and non-matrix matched. Between 300 and 500 pulps are selected from ore samples and sent for check assay at another lab annually.

Verification of sampling and assaying	 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. 	Extreme high grades (>100ppm Au) are repeated as a matter of course. The database is used by all geologist and engineers on the PGM site. A third party audit is performed annually and performs analysis on the data. During annual pulp checks certain intersections are repeated in full. The use of twinned holes is generally restricted to exploration – deeper holes that have resource estimated around them are replaced with grade control drill holes and left out of the data set as this occurs. Physical and electronic copies exist of drill designs, downhole surveys and assay data. Raw laboratory data is filed as it comes from the lab. The assay .CSV file from the lab is manipulated by an excel add-in routine to suit the load query in the geological database "Drillview". The database has a verification sequence which checks end of holes and overlapping intervals. All data entry procedures are documented. Historic hard copies are stored in a fire proof room. Electronic data is backed up weekly, monthly and yearly and stored in a fire proof safe on site.
Location of data points	 Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used Quality and adequacy of topographic control. 	Surface drill hole collars are initially located using hand held GPS to ±5m. Upon completion collars are located with differential GPS to ±5cm. Underground collars are picked up by the mine surveyor (collar position and dip/azimuth) using a Total Station Theodolite. Downhole surveys are taken using a reflex camera. Eastman single shot cameras were phased out in 2007. Readings with abnormal magnetics are flagged unreliable in the database. The reflex camera is used for multi shot where required and giro cameras ore used in highly magnetic ground. Check surveys are done weekly in a test bed on surface. Reliability is checked in Excel. A resurvey is done if out of limits. Two fails and instrument is sent away and replaced. Collar surveys are as accurate as the mine survey which is subject to regulatory re-survey on an interval basis. PGM uses a metric mine grid that is -15° 31′ 38.72201 degrees to MGA grid. There is an additional 10,000.4m added to the AHD. Magnetic drilling surveys are corrected by 25 degrees. The PGM grid was aligned with the state MGA grid in Feb 2009. Existing surface survey control consists of two baselines each with two high order stations registered with SCIMS on both the Peak and New Cobar
Data spacing and distribution	 Data spacing for reporting of Exploration Results. Whether the data spacing and distribution is sufficient to establish the degree of geological 	Underground drill hole spacing for Reserves is between 10m and 30m spacing depending on the type and complexity of the mineralisation. Surface exploration results are replaced by delineation drilling as a mine progresses to depth. Drill spacing away from the main mineralised lodes is generally wider spaced and dependent on the stage of exploration.

	 and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied. 	The resource is classified on the following drill hole centres and search distances depending on the type and complexity of the mineralisation: Measured – range 15mx15m to 25mx25m Indicated – range 30mx30m to 50mx50m Inferred – range 60mx60m to 75mx75m The confidence in classification is considered consistent with the 2012 JORC code. The majority of drill holes are sampled at one metre intervals and compositing is at 1m intervals.
Orientation of data in relation to geological structure	 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. 	All ore bodies are near vertical. The drill hole orientation is designed to be across the width of the lode. This is adequate where the mineralised structures are sub-parallel to the regional foliation. Underground mapping has located some structures that are sub-parallel to the drilling direction. The drilling density off-sets any bias associated with such intercepts and additional drilling from other directions has been done. These structures are generally secondary to the main lode and of short strike length.
Sample security	The measures taken to ensure sample security	Core is stored in a lockable yard within the Peak site. The Peak site has 24 hour manned gates and requires swipe card access given only to Peak personnel. Samples are placed in tied calico bags with sample numbers that provide no information on the location of the sample.
Audits or reviews	The results of any audits or reviews of sampling techniques and data	H&SC audited PGMs core yard in 2008. No concerning issues arose in regards to the procedures of core mark up, photography, RQD measurement, cutting, core density, packaging and dispatch. Continuous improvements have been made by PGM with the implementation of roller racks, air conditioned sampling sheds, re-plumbing of water supply to the racks and the introduction of blue metal as a blank check. Previously PGM was using non mineralised core mainly from the beginnings of New Occidental delineation holes representing the barren Great Cobar Slate. Drill hole data is reviewed by H&SC during the resource audits and measures of drill hole deviation and assay ranges are scrutinised and verified.

Section 2 Reporting of Exploration Results (Criteria listed in the preceding section also apply to this section)

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	 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. 	In August 2012 a notice of application for determination of native title was made in central NSW which encompassed all of Peak Gold Mines mineral tenements. Legal advice indicated that Crown land may be claimable, so exploration has been delayed over this land tenure until it can be established if native title has been extinguished or if an access agreement with the claimants will be required. This effects areas within EL5933 (Wrightville Common & Kaloogleguy Regeneration Reserve) and EL7355 (Cumbine State Forest). The following table is a list of tenements held in full or part by PGM. Tenement Name Ownership CML6 Fort Bourke Hill PGM 100% CML7 Coronation PGM 100% CML8 Peak/Occidental PGM 100% CML9 Queen Bee PGM 100% ML1483 Fort Bourke Hill PGM 100% MPL854 Dam PGM 100% EL5933 Peak PGM 100% EL6401 Rookery East PGM 100% EL6401 Rookery East PGM 100% EL6401 Rookery East PGM 100% EL8523 Margaret vale PGM 100% EL8523 Margaret vale PGM 100% EL8523 Margaret vale PGM 100% EL8548 Narri PGM 100% EL8557 Kurrajong PGM 100% EL8567 Kurrajong PGM 100% EL5982 Norma Vale PGM 75%, Zintoba 25% EL6127 Rookery South PGM 83%, Lydail 17% PGM continues to fulfil all requirements of tenement ownership, including reporting obligations, timely renewals, expenditure commitments, environment permitting and rehabilitation. All tenements are held securely.
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	Exploration has been ongoing since early 1900. No holes pre 1960 remain selected for the current resource estimate. Such holes were drilled by the New Occidental Mining Company and others. Extensive exploration has occurred under CRA, Wheaton River, Goldcorp, Newgold and Aurelia.

Geology	Deposit type, geological setting and style of mineralisation.	The deposits fall under the group of epigenetic "Cobar-Style" mineralisation and are controlled structurally by major fault zones (Rookery Fault System) and subsequent spurs and splays. The faults are within of the Devonian-Nurri Group of sedimentary units displaying lower green schist facies alteration. The economic minerals are contained within quartz stockworks and breccias. The breccia matrix are combinations of quartz, sediment, rhyolite and sulphide. The deposits are often polymetallic with gold, copper, silver, lead and zinc occurring in parallel lenses to the fault zones within the PGM
Drill hole Information	 A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes: easting and northing of the drill hole collar elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar dip and azimuth of the hole down hole length and interception depth hole length. If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent 	All relevant data drill hole data is included in the main body of the report.
Data aggregation methods	 Person should clearly explain why this is the In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g. 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. 	Exploration results reported on a length-weighted basis. No top-cut or grade truncations have been applied to any assay results. Composite intervals are reported using a nominal \$50 NSR cut-off for Kairos results. Higher results that occur internal to the composited intervals as described above are included in this report. Higher grade intervals are only highlighted if there are areas within the composite that differ significantly from the overall grades. Reporting of the shorted intercepts allows a more complete understanding of the grade distribution within the mineralised zone. No metal equivalences are quoted in this report.

Relationship between mineralisation widths and intercept lengths		The extensive exploration and mining history in the Peak Mines means the geometry of the ore zones is very well understood. As such, estimated true widths are included this report.
Diagrams	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 drill hole collar locations and appropriate sectional views.	See body of report.
Balanced reporting	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.	All available new drill results from the recent program are given in this report.
Other substantive exploration data	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.	See body of report.
Further work	 The nature and scale of planned further work (e.g. 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. 	See body of report.

Federation and Athena

JORC Code 2012 (Table 1) - Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. AusIMM. Section 1 Sampling Techniques and Data (Criteria in this section apply to all succeeding sections)

Criteria	JORC Code explanation	Commentary
Sampling techniques	 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 down hole gamma sondes, or handheld XRF instruments, etc.). These examples should not be taken as limiting the broad meaning of sampling. 	 RC chip samples were collected using a rotary cone splitter directly off the drill rig. All samples were collected on a dry basis. Diamond core sampling is by sawn half HQ core. Nominal sample intervals are 1m with a range from 0.5m to 1.5m. Samples are transported to ALS Geochemistry - Orange for preparation and assay.
	 Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used. 	 Assay standards or blanks are inserted at least every 25 samples. Duplicates were extensively used (at least 1 in 20 samples) in the current RC programs to ensure representivity.
	• 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.	• RC drilling was used to obtain representative samples of 1 metre length. Diamond drilling was used to obtain core samples of nominally 1m, but with a range between 0.5 - 1.5m. RC chip samples are dried, crushed and pulverised to 85% passing 75 microns. Core samples are cut in half, dried, crushed and pulverised to 85% passing 75 microns. This is considered to appropriately homogenise the sample. Gold is by 30g fire assay with AAS finish, (method Au – AA25) with a detection level of 0.01ppm. For base metals a 0.5g charge is dissolved using aqua regia digestion (Method ICP41-AES) with detection levels of: Ag-0.2ppm, As-2ppm, Cu-1ppm, Fe-0.01%, Pb-2ppm, S-0.01%, Zn-2ppm. Overlimit analysis is by OG46 - aqua regia digestion with ICP-AES finish.

Drilling techniques	 Drill type (e.g. core, reverse circulation, openhole hammer, rotary air blast, auger, Bangka, sonic, etc.) and details (e.g. core diameter, triple or standard tube, depth of diamond tails, facesampling bit or other type, whether core is oriented and if so, by what method, etc.). 	Drilling by diamond coring generally commences as PQ core until fresh rock is reached. The PQ rods are left as casing then HQ coring is employed. Reverse circulation percussion (RC) method used in this program utilised a face sampling 143 millimetre bit. Pre-collars with RC down to between 100 and 350 metres below surface is employed at Federation
Drill sample recovery	 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. 	 Chip recoveries are generally monitored visually at the rig by the size of the individual bags. Any low recoveries will be noted by the geologist at the rig. Measured diamond core recovery against intervals drilled is recorded as part of geotechnical logging. Recoveries are greater than 95% once in fresh rock. Diamond drill holes use triple tube drilling to maximise recovery. No specific measures are in place to maximise recovery of drilled chips. Poor recoveries will be discussed with the driller as they may be the result of a blockage or otherwise poor ground. The relationship between sample recovery and grade has not been assessed.
Logging	 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. 	Systematic geological and geotechnical logging is undertaken. Data collected includes: Nature and extent of lithologies (RC and core). Relationship between lithologies (RC and core). Amount and mode of occurrence of ore minerals (RC and core). Location, extent and nature of structures such as bedding, cleavage, veins, faults etc. (core only). Structural data (alpha & beta) are recorded for orientated core (core only). Geotechnical data such as recovery, RQD, fracture frequency, qualitative IRS, microfractures, veinlets and number of defect sets. For some geotechnical holes the orientation, nature of defects and defect fill are recorded (core only). Bulk density by Archimedes principle at regular intervals (core only). Both qualitative and quantitative data is collected. All core is digitally photographed.
Sub-sampling techniques and sample preparation	 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 	 Core is sawn with half core submitted for assay. Sampling is consistently on one side of the orientation line so that the same part of the core is sent for assay. PQ core is ¼ sampled. All RC samples were split using a rotary cone sampler directly off the drilling rig. Two samples were collected for every metre to allow for duplicate samples to be taken at any interval. All sampling was on a dry basis.

dry.

- For all sample types, the nature, quality and appropriateness of the sample preparation technique.
- Quality control procedures adopted for all subsampling stages to maximise representivity of samples.
- Measures taken to ensure that the sampling is representative of the insitu 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.

- Samples are dried crushed and pulverised to 85% passing 75 microns. This is considered to appropriately homogenise the sample to allow subsampling for the various assay techniques.
- Certified Standard Reference Materials and blanks are inserted at least every 25 samples to assess the accuracy and reproducibility. The results of the standards are to be within ±10% variance, or 2 standard deviations, from known certified result. If greater than 10% variance the standard and up to 10 samples each side are re-assayed. ALS conduct internal check samples every 20 samples for Au and every 20 for base metals. Assay grades are occassionally compared with mineralogy logging estimates. If differences are detected a re-assay can be carried out using the bulk reject or the assay pulp.
- Systematic duplicate sampling was employed during the Federation and Dominion programs. A regular duplicate was taken at predetermine sample intervals (averaging 1:25 samples). Further, a samples occurring in mineralised zones were duplicated, increasing the duplicate rate to one sample every 15-20 samples. Second-half sampling of the diamond core was not employed in this program.
- Sample sizes are considered appropriate.

Quality of assay data and laboratory test

- 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.

- Standard assay procedures performed by a reputable assay lab (ALS Group) were undertaken. Gold assays are by 30g fire assay with AAS finish, (method Au-AA25). Ag, As, Cu, Fe, Pb, S, Zn are digested in aqua regia then analysed by ICP-AES (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.
- No geophysical tools were used in the determination of assay results. All assay results were generated by an independent third-party laboratory as described above.
- Certified reference material or blanks are inserted at least every 25 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, 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.

Verification of sampling and assaying	 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. 	 The raw assay data forming significant intercepts are examined by at least two company personnel. No twinned holes have been used at this stage. Drill hole data including meta data, any gear left in the drill hole, lithological, mineral, survey, sampling and occasionally magnetic susceptibility is collected and entered directly into an excel spread sheet using drop down codes. When complete the spreadsheet is emailed to a geological database administrator, the data is validated and uploaded into a 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 drillers' plods, invoices and hole planning documents.
Location of data points	 Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation. Specification of the grid system used Quality and adequacy of topographic control. 	 Drill hole collars are initially located using hand held GPS to ±5m. Upon completion collars are located with differential GPS to ±5cm or picked up by the mine surveyors using a Total Station Theodolite (TST). Drill holes are downhole-surveyed from collar to the end of hole by drilling personnel using downhole survey tool (Reflex). Drill holes are surveyed by single shot camera during drilling at intervals ranging between 15-30m. All survey data for every hole is checked and validated by Aurelia Metals personnel before entered into database. All coordinates are based on Map Grid Australia zone 55H Topographic control is considered adequate. There is no substantial variation in topography in the area with a maximum relief of 70m present. Local control within the Hera and Nymagee Mine areas is based on accurate mine surveys.
Data spacing and distribution	 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. 	 As the prospects discussed represent relatively new discoveries, data spacing is extremely variable. Drill hole spacing at Federation ranges from 30 to 150 metres. Drill hole spacing at Athena ranges from 40 to 200 metres. Not applicable as no Ore Resource or Reserve has been completed at Federation or Athena. Sample compositing is not applied.

Orientation of data in relation to geological structure	Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.	 Drilling is orientated to cross the interpreted, steeply dipping mineralisation trend at moderate to high angles. Holes are drilled from both the footwall and hangingwall of the mineralisation where possible. The use of orientated core allows estimates of the true width and orientation of the mineralisation to be made.
	 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. 	No known bias has been introduced due to drilling orientation.
Sample security	The measures taken to ensure sample security	 Chain of custody is managed by Aurelia Metals. Samples are placed in tied calico bags with sample numbers that provide no information on the location of the sample. Samples are transported from site to the assay lab by courier or directly delivered by Aurelia Metals personnel. ?
Audits or reviews	The results of any audits or reviews of sampling techniques and data	 No audit or review of the sampling regime at Federation/Dominion has been directly completed. However, an audit and review of the sampling regime at Hera, which uses identical sampling procedures, was undertaken by H&S Consultants in November 2015. Recommendations from this review form part of the current sampling practices at Hera and regionally.

Section 2 Reporting of Exploration Results (Criteria listed in the preceding section also apply to this section)

Criteria Mineral tenement and land tenure status	 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. 	 Commentary The Federation prospect is located on Exploration Lease 6162, owned 100% by Hera Resources Pty. Ltd. (a wholly owned subsidiary of Aurelia Metals Limited). Athena is located wholly within Mining Lease 1686, owned 100% by Hera Resources Pty. Ltd. At the time of reporting there were no known impediments to operating in these areas.
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	The area has a 50 year exploration history in the Nymagee area involving reputable companies such as Cyprus Mines, Buka, ESSO Minerals, CRAE, Pasminco, Triako Resources and CBH Resources. Previous exploration data has been ground-truthed where possible. Historic drill hole collars have been relocated and surveyed

Geology	Deposit type, geological setting and style of mineralisation.	 All known mineralisation in the area is epigenetic "Cobar" style. Deposits are generally structurally controlled quartz + sulphide matrix breccias grading to massive sulphide. While the exact nature of the mineralisation at Dominion is uncertain (as it is only a new discovery), it is likely upgrading by leaching and supergene-enrichment is an important factor. In a similar fashion to the other Cobar deposits, the Dominion prospect occurs to the west of the Rookery Fault, a major regional structure with over 300km strike length. The deposits are near the boundary of the Devonian Lower Amphitheatre Group and the underlying Roset Sandstone. Both units show moderate to strong ductile deformation with tight upright folding coincident with greenschist facies regional metamorphism. A well-developed sub vertical cleavage is present. Mineralisation identified at Federation includes sphalerite-galena±chalcopyrite-pyrrhotite-pyrite in veins and breccias. Mineralisation at Athena occurs as minor galena and spalerite veins with minor visible gold.
Drill hole Information	 A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes: easting and northing of the drill hole collar elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar dip and azimuth of the hole down hole length and interception depth hole length. If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case. 	All relevant drill hole data is included in the main body of the report.

Data aggregation methods	 In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g. 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. 	 Exploration results have been reported on a length-weighted basis. No top-cut or grade truncations have been applied to any assay results. Composite intervals are reported using a nominal 1% Pb+Zn or 1g/t Au cut-off. Internal dilution of up to 4 metres has been allowed. Higher grade results that occur internal to the composited intervals as described above are included in this report. Higher grade intervals are only highlighted if there are areas within the composite that differ significantly from the overall grades. Reporting of the shorter intercepts allows a more complete understanding of the grade distribution within the mineralised zone. No metal equivalences are quoted in this report.
Relationship between mineralisation widths and intercept lengths	 These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (e.g. 'down hole length, true width not known'). 	 The uncertain nature of the mineralisation orientation/controls for each prospect is discussed in the text of this report. Due to the limited data available to date, only downhole lengths are reported as true widths are not currently known. As far as possible, context as to the size and orientation of the mineralisation has been given in the diagrams provided.
Diagrams	 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 drill hole collar locations and appropriate sectional views. 	See body of report.
Balanced reporting	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.	All drill results and all rock chip samples from the recent program are given in this report, or have been reported in full in previous announcements.

Other substantive exploration data	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.	See body of report.
Furtherwork	 The nature and scale of planned further work (e.g. 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. 	Future work is discussed in the body of the text.