

17<sup>th</sup> APRIL 2019

# FURTHER SIGNIFICANT GOLD TRENDS EMERGE AT KOUROUFING

#### **SUMMARY**

- ► Latest assay results received from 1,588 shallow geochemical auger holes at the Kouroufing Project reveal further potential gold-bearing structures in favourable northeast and northwest orientations to the immediate south of the previously identified **6km-long gold corridor**.
- ➤ Several new, robust gold anomalies of over 4km in length outlined, including numerous +0.5g/t gold results. Best composite intersections included 11m at 1.09g/t gold from 7m, 6m at 6.97g/t gold from 7m, 4m at 3.59g/t gold from surface, 6m at 1.12g/t gold from surface and 4m at 1.09g/t gold from 12m.
- ▶ Results **enhance potential for further bedrock gold discoveries** at Kouroufing, with multiple anomalies earmarked for deeper aircore (AC) drilling.
- ▶ Oklo's \$5 million 2019 exploration program is continuing:
  - ► **KOUROUFING PROJECT** further assay results pending from AC, reverse circulation (RC) and diamond core (DD) drilling.
  - ► **DANDOKO PROJECT** 2,844m of planned 16,000m drilling program now completed with drilling ongoing.

"These new shallow geochemical results highlight the potential for additional gold-bearing structures along favourable northeast and northwest trends, complementing the recent greenfields discovery within the main Kouroufing gold corridor which has already yielded a number of very significant gold intersections from AC drilling. Planning is underway for a program of follow-up AC drilling on a number of the higher priority geochemical and IP geophysical targets."-said Simon Taylor, Managing Director - Oklo Resources.

**Oklo Resources Limited** ("Oklo" or "the Company"; ASX:OKU) is pleased to announce final auger results from its Kouroufing Project, located 20km southeast of the Company's flagship Dandoko Project in western Mali.

A program of reconnaissance shallow geochemical auger drilling was recently completed over the southern and northern extensions of the previously reported **6km-long auger gold corridor at Kouroufing.** This announcement summarises assay results received from 1,588 shallow auger holes.

The auger drilling forms part of the Company's current 2019 exploration program, with significant progress already made at both the Kouroufing and Dandoko Projects.

Oklo's Dandoko, Moussala, Kouroufing, Kandiole, Kossaya and Sari Projects are located in western Mali, 30km to the east of B2Gold's 7.1Moz Fekola mine and 50km to the south-southeast of Barrick's 12.5Moz Loulo mine (Figure 1). The Company currently holds ~ 500km² of highly prospective ground in this world-class gold region.

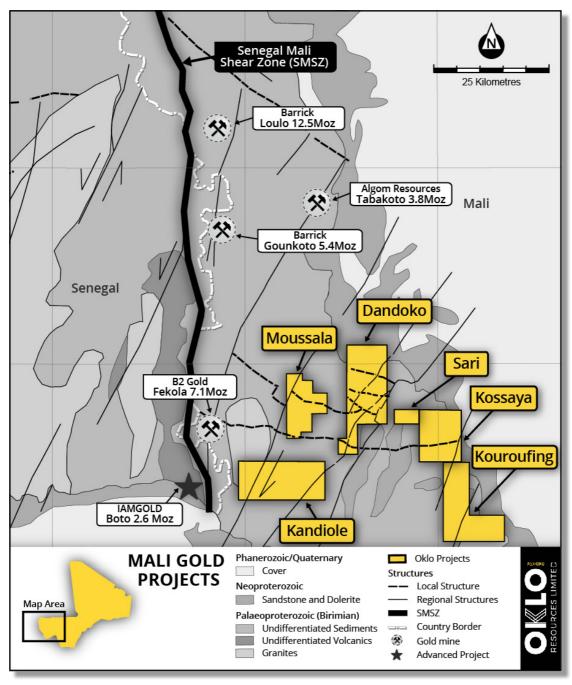


Figure 1: Location of Oklo's Gold Projects in west Mali

#### **KOUROUFING PROJECT**

The Kouroufing Project covers an area of 90.70km<sup>2</sup> within the Kenieba Inlier to the east of the regionally significant Senegal Mali Shear Zone ("SMSZ") over a tract of largely underexplored Proterozoic Birimian greenstones with identified northeast-trending structures in a comparable setting to the 12km-long, northeast-trending gold corridor outlined by auger geochemistry at the Company's Dandoko Project (Figure 1).



#### **AUGER DRILL PROGRAM**

During 2018, Oklo announced that first pass reconnaissance auger geochemical drilling covering 25% of the Kouroufing project area had outlined the 6km-long Kouroufing gold corridor with grades of up to 14.40g/t gold (Figure 2)<sup>1</sup>. Ongoing geochemical drilling in late 2018 and early 2019 defined the Kome anomaly to the immediate southeast, extending over greater than 1km in length with peak composite grades of 6.32g/t gold, 3.32g/t gold and 1.20g/t gold<sup>2</sup>.

Assay results received from follow-up AC drilling at Kouroufing South (Figure 2) were highly encouraging, confirming the presence of wide zones (up to 40m width downhole) of bedrock gold mineralisation including the following significant intersections: 16m at 11.07g/t gold, 30m at 1.15g/t gold, 34m at 1.12g/t gold, 40m at 1.02g/t gold and 34m at 1.06g/t gold, including 2m at 7.31g/t gold<sup>283</sup>.

The recently completed program of auger drilling was designed to extend the original auger program over the Kouroufing gold corridor to the immediate north and south and complete reconnaissance coverage over the remaining permit area. A total of 1,588 shallow geochemical auger holes for 22,650m were completed with the coverage area shown in Figure 2. This announcement summarises assay results received from this program.

The auger holes were drilled to an average hole depth of 15m at 100m centres on 400m spaced lines. Three composite samples of variable thickness were collected from each hole representing the laterite, transition and saprolite horizons.

The location of all completed holes along with assay results are presented in Figure 2 with significant +0.5g/t gold results summarised in Table 1.

The results have defined a series of regional-scale, northeast trends parallel to the Dandoko gold corridor. The most westerly of these structures extends from the southwest corner of the project area and intersects an interpreted north-south trending gold structure as shown on Figure 2. Evidence from field mapping and IP chargeability geophysical data indicates that this structure is dextral in nature with a large number of sheared quartz veins evident along the length of the structure.

In aggregate, these new results have defined a further 5.5km of gold anomalism in multiple trends with significant composite grades including: 6m at 6.97g/t gold, 6m at 1.12g/t gold, 11m at 1.09g/t gold, 4m at 1.09g/t gold and 4m at 3.59g/t gold.

The auger geochemical program has now covered the entire Kouroufing Project area at the initial 400m reconnaissance spacing. Planning is in progress for first pass AC drilling over a number of the high priority auger anomalies as well as follow-up drilling of the significant AC results recently reported from Kouroufing South.



ASX Announcement 12<sup>th</sup> Sep 2018: Kouroufing Reveals 6km Gold Corridor

<sup>&</sup>lt;sup>2</sup> ASX Announcement 30<sup>th</sup> Jan 2019: Wide Zones of Shallow Gold from Kouroufing

<sup>&</sup>lt;sup>3</sup> ASX Announcement 11<sup>th</sup> Apr 2019: Shallow, High-Grade Gold Results from Kouroufing South

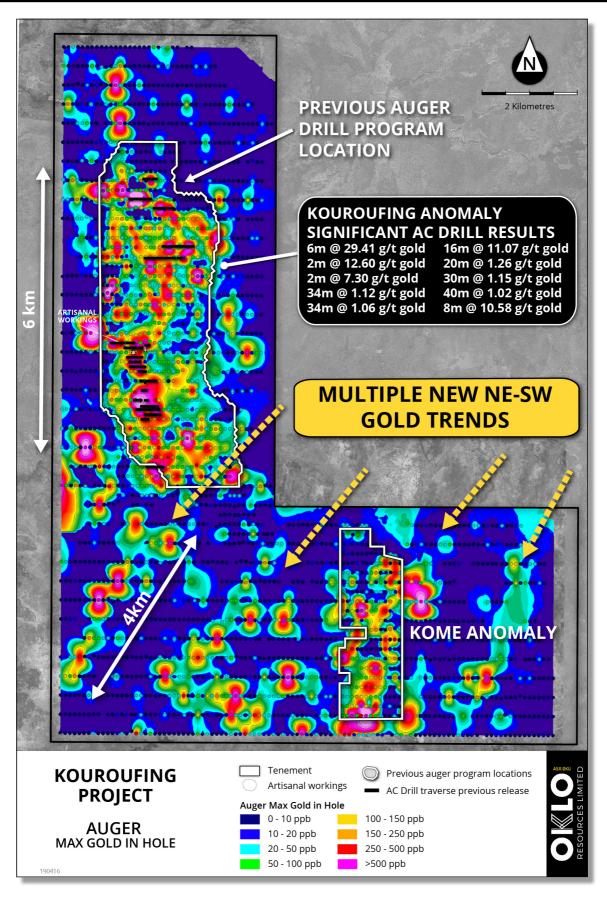


Figure 2: Kouroufing Project - location of previously reported deeper AC drill traverses overlaid on auger drill holes, max gold in hole values and contours.



#### **ONGOING WORK PROGRAMS**

#### **KOUROUFING PROJECT**

- ► First pass AC drilling has been completed over the +1km long Kome auger anomaly with assay results pending from 79 holes (for 4,265m).
- ▶ Assay results from 8 RC and 1 diamond hole over the Kouroufing anomaly are pending.
- ► Field mapping and IP geophysical surveying is ongoing.

#### **DANDOKO PROJECT**

▶ Drilling has recommenced at Dandoko with over 2,800m of the planned 16,000m of combined AC and RC drilling completed to date at Seko, Dabia and Sory and other targets along the 12km-long Dandoko gold corridor. This program will include traverses designed to explore for potential gold mineralisation between SK2 and SK3.

#### **KOSSAYA AND SARI PROJECTS**

► First pass auger drilling over the Kossaya and Sari Projects has now been completed (total of 925 holes for 12,248m) and the four auger rigs demobilised. Assay results will be progressively released in coherent blocks of data as they become available.

- ENDS -

#### For further information, please contact:

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Table 1: Significant shallow auger intersections

HOLE NO	FROM (M)	TO (M)	WIDTH (M)	GOLD (G/T)
S1T0619	12	15	3	0.97
S1T0641	7	13	6	0.87
S1T0644	7	13	6	6.97
S1T0745	12	15	3	0.74
S1T0864	7	9	2	1.50
S1T0919	5	7	2	1.77
S1T0938	0	6	6	1.12
S1T0986	12	16	4	1.09
S1T1011	23	25	2	0.70
S1T1054	0	2	2	0.76
S1T1093	14	17	3	0.52
S1T1180	5	14	9 <sup>2</sup>	0.88
S2T0417	0	2	2	0.57
S2T0497	8	13	5 <sup>2</sup>	0.52
S2T0499	14	17	3	0.92
S2T0546	13	17	<b>4</b> <sup>2</sup>	0.52
S2T0599	9	13	4	0.61
S2T0608	6	9	3	0.75
S2T0665	5	7	2	2.00
S2T0672	13	15	2	0.60
S2T0687	19	21	2	0.59
S2T0690	8	11	3	0.56
S2T0851	12	15	3	0.52
S2T0910	0	9	9	0.81
S2T0933	7	18	11 <sup>2</sup>	1.09
S3T0026	0	4	4	3.59
S4T0033	5	10	5	0.56

NB: Results are based on a single composite sample over the tabulated interval unless denoted by <sup>2</sup> where 2 samples were taken within the interval.



#### **ABOUT OKLO RESOURCES**

Oklo Resources is an ASX listed exploration company with gold, uranium and phosphate projects located in Mali, Africa.

The Company's focus is its large landholding of eight gold projects covering over 1,500km2 in some of Mali's most prospective gold belts. The Company has a corporate office located in Sydney, Australia and an expert technical team based in Bamako, Mali, led by Dr Madani Diallo who has previously been involved in discoveries totalling in excess of 30Moz gold.

In late 2016, Oklo initiated a reconnaissance auger geochemistry program over the Dandoko Project to explore for new targets concealed under the extensive tracts of lateritic cover. The program delivered early success with the delineation of the **12km long Dandoko gold corridor**, including the Seko and more recent Sory and Dabia discoveries. During 2018, Oklo announced that first pass reconnaissance auger geochemical drilling covering 25% of the Kouroufing project area had outlined the **6km-long Kouroufing gold corridor** with grades of up to 14.40g/t gold.

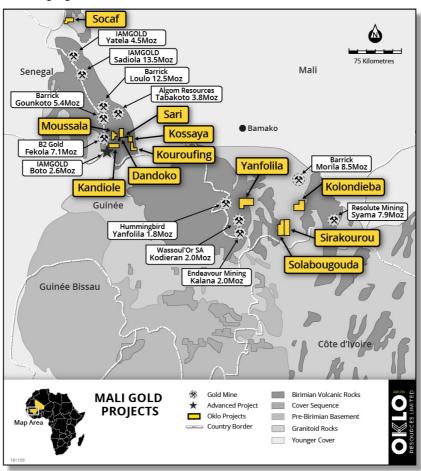


Figure 3: Location of Oklo Projects in West and South Mali

#### Competent Person's Declaration

The information in this announcement that relates to Exploration Results is based on information compiled by geologists employed by Africa Mining (a wholly owned subsidiary of Oklo Resources) and reviewed by Mr Simon Taylor, who is a member of the Australian Institute of Geoscientists. Mr Taylor is the Managing Director of Oklo Resources Limited. Mr Taylor is considered to have sufficient experience deemed relevant to the style of mineralisation and type of deposit under consideration, and to the activity that 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" (the 2012 JORC Code). Mr Taylor consents to the inclusion in this report of the matters based on this information in the form and context in which it appears. This announcement contains information extracted from previous ASX market announcements reported in accordance with the JORC Code (2012) and available for viewing at www.okloresources.com. The Company confirms that it is not aware of any new information or data that materially affects the information included in any original ASX market announcement.



# JORC CODE, 2012 EDITION – TABLE 1 Section 1 Sampling Techniques and Data

	Sampling reciniques and Data	
CRITERIA	JORC CODE EXPLANATION	COMMENTARY
Sampling techniques	<ul> <li>Nature and quality of sampling, measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report.</li> <li>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.</li> </ul>	<ul> <li>All auger holes have been routinely sampled for gold with 3 composite samples per hole being representative of the upper lateritic, lower lateritic and saprolite zones.</li> <li>Composite samples may vary in width depending on the length of geological unit within the hole with a 1m minimum length of sample being taken.</li> <li>1 metre samples are also taken for future assay as required.</li> <li>Samples were collected in situ at the drill site and composited and then spear sampled to provide a 1kg composite sample.</li> <li>Certified reference material and sample duplicates were inserted at regular intervals.</li> <li>All samples were submitted Bureau Veritas, with sample preparation in Bamako Mali and analysis in the Ivory Coast using a 50g Fire Assay gold analysis with a 2ppb Au detection level.</li> </ul>
Drilling techniques	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<br="">other type, whether core is oriented and if so, by what method, etc).</sampling></hole 	Auger drilling was carried out by Sahara Mining Services using a Toyota mounted auger rig.
Drill sample recovery	<ul> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>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.</li> </ul>	<ul> <li>Sample is collected as lifted from the auger flights.</li> <li>Care is taken to ensure that initially lifted material is not due to material falling back into the hole.</li> <li>It is recognized that auger drilling provides a low quality of sample and may suffer from smearing of sample. This is minimized by use of composite samples over the regolith units.</li> </ul>
Logging	<ul> <li>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.</li> <li>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</li> <li>The total length and percentage of the relevant intersections logged.</li> </ul>	<ul> <li>All drill samples were geologically logged by Oklo Resources subsidiary Africa Mining geologists.</li> <li>Geological logging used a standardised logging system recording.</li> </ul>
Sub <sampling techniques and sample preparation</sampling 		<ul> <li>Holes were sampled by taking 3 composite samples representative of the upper, lower laterite and saprock lithological zones.</li> <li>Duplicates were taken every 40 samples</li> <li>A 1kg sample is crushed to 70% &lt;2mm (jaw crusher), pulverized and split to 85 % &lt; 75 um. Gold is assayed by fire assay (50g charge) with an AAS Finish to provide a 2ppb detection level.</li> <li>Sample pulps were returned from the Bureau Veritas laboratory under secure "chain of custody" procedure by Africa Mining staff and are being stored in a secure location for possible future analysis.</li> <li>Sample sizes and laboratory preparation techniques are considered to be appropriate for this early stage exploration and the commodity being targeted.</li> </ul>
Quality of	► The nature, quality and appropriateness of the	► Analysis for gold is undertaken at Bureau Veritas Ivory

assaying and laboratory procedures used and



Coast by 50g Fire Assay with an AAS finish to a lower

assay data

and

CRITERIA	JORC CODE EXPLANATION	COMMENTARY	
laboratory	whether the technique is considered partial or total.	detection limit of 2ppb Au.	
tests	► For geophysical tools, spectrometers, handheld	► Fire assay is considered a "total" assay technique.	
	XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors	No field non assay analysis instruments were used in the analyses reported.	
	<ul> <li>applied and their derivation, etc.</li> <li>Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory</li> </ul>	A review of certified reference material and sample blanks inserted by the Company indicated no significant analytical bias or preparation errors in the reported analyses.	
	checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.	Results of analyses for field sample duplicates are consistent with the style of mineralisation evaluated and considered to be representative of the geological zones which were sampled.	
		Internal laboratory QAQC checks are reported by the laboratory and a review of the QAQC reports suggests the laboratory is performing within acceptable limits.	
Verification of sampling and assaying	The verification of significant intersections by either independent or alternative company personnel.	All drill hole data is paper logged at the drill site and then digitally entered by Company geologists at the site office.	
	<ul> <li>The use of twinned holes.</li> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> </ul>	All digital data is verified and validated by the Company's database consultant in Paris before loading into the drill hole database.	
	Discuss any adjustment to assay data.	No twinning of holes was undertaken in this program which is early stage exploration in nature.	
		Reported drill results were compiled by the company's geologists, verified by the Company's database administrator and exploration manager.	
		► No adjustments to assay data were made.	
Location of data points	Accuracy and quality of surveys used to locate drill holes (collar and down <hole surveys),="" td="" trenches,<=""><td>Drill hole collars were positioned using non- differential GPS.</td></hole>	Drill hole collars were positioned using non- differential GPS.	
	mine workings and other locations used in Mineral Resource estimation.	► Accuracy of the GPS < +/< 5m and is considered appropriate for this level of early exploration	
	<ul><li>Specification of the grid system used.</li><li>Quality and adequacy of topographic control.</li></ul>	► The grid system is UTM Zone 29N	
Data spacing and	<ul> <li>Data spacing for reporting of Exploration Results.</li> <li>Whether the data spacing and distribution is</li> </ul>	Auger holes were located on a nominal 400x100m spaced pattern and infilled to a 200m line spacing.	
distribution	sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied.	Drilling reported in this program is of an early exploration nature has not been used to estimate any mineral resources or reserves.	
	▶ Whether sample compositing has been 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.	Exploration is at an early stage and, as such, knowledge on exact location of mineralisation and its relation to lithological and structural boundaries is not accurately known. However, the current hole	
	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.	orientation is considered appropriate for the program to reasonably assess the prospectivity of known structures interpreted from other data sources.	
Sample security	► The measures taken to ensure sample security.	Auger samples were taken to the Bureau Veritas sample preparation laboratory in Bamako under secure "chain of custody" procedure by Africa Mining staff.	
		Sample pulps were returned from the Bureau Veritas laboratory under secure "chain of custody" procedure by Africa Mining staff and have been stored in a secure location.	
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	There have been no external audit or review of the Company's sampling techniques or data at this early exploration stage.	



### **Section 2 Reporting of Exploration Results**

CRITERIA	JORC CODE EXPLANATION	CRITERIA
Mineral tenement and land tenure status	<ul> <li>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.</li> <li>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.</li> </ul>	<ul> <li>The results in this report are all contained within the Kouroufing Exploration Permit, which Oklo has the option to acquire 100% ownership of.</li> <li>The Kouroufing permit (90.7km²) was granted on the 31/6/2017 with a 3 year period and renewable twice, each for a period of 2 years:</li> </ul>
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	<ul> <li>The area that is covered by the Kouroufing permit was explored intermittently by Kouroufing Gold Corporation between 2010 and 2013.</li> <li>The area was previously explored with soil geochemistry during the 1980's (BRGM and European Fund for Development).</li> <li>Geophysical, aeromagnetic, surveys by the Malian Government has highlighted the presence several cross cutting magnetic dykes and other intrusives (kimberlite?)</li> </ul>
Geology	Deposit type, geological setting and style of mineralisation.	<ul> <li>The deposit style targeted for exploration is orogenic lode gold.</li> <li>This style of mineralisation can occur as veins or disseminations in altered (often silicified) host rock or as pervasive alteration over a broad zone.</li> <li>Deposit are often found in close proximity to linear geological structures (faults &amp; shears) often associated with deep<seated li="" structures.<=""> <li>Lateritic weathering is common within the project area. The depth to fresh rock is variable and may extend up to 50-70m below surface and in this drill program weathering of &gt;80m was encountered</li> </seated></li></ul>
Drill hole Information	<ul> <li>▶ 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:</li> <li>▶ easting and northing of the drill hole collar</li> <li>▶ elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar</li> <li>▶ dip and azimuth of the hole</li> <li>▶ down hole length and interception depth</li> <li>▶ hole length.</li> <li>▶ 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.</li> </ul>	<ul> <li>Location and results for all are posted on plans within the main body of this announcement.</li> <li>Given the reconnaissance nature of the auger drilling for the purpose of enhancing the geochemical understanding of the projects and large number of samples, plan presentation as provided in the body provides a fair understanding of the results and not listing all results does not detract from the understanding of the report.</li> </ul>
Data aggregation methods	<ul> <li>In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut<off and="" are="" be="" grades="" li="" material="" should="" stated.<="" usually=""> <li>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.</li> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </off></li></ul>	<ul> <li>Grade of composite intervals are reported.</li> <li>Results are summarised by showing the best gold value within the hole.</li> <li>No metal equivalent reporting is used or applied</li> </ul>

CRITERIA	JORC CODE EXPLANATION	CRITERIA
Relationship between mineralisation widths and intercept lengths	<ul> <li>These relationships are particularly important in the reporting of Exploration Results.</li> <li>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').</li> </ul>	► The results reported in this announcement are considered to be of an early stage reconnaissance nature in the exploration of the project.
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.	► Drill hole location plans are provided earlier releases
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.	Best gold in hole for all samples are plotted in representative grade bins.
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.	No other exploration data that is considered meaningful and material has been omitted from this report
Further work	<ul> <li>The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large<scale drilling).<="" li="" step<out=""> <li>Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.</li> </scale></li></ul>	Further aircore, RC and diamond drilling is planned to follow up the results reported in this announcement.

