# New High-Grade 'Blind' Discovery at Bepkong East

- Semi-continuous 93m mineralised zone grading 2.33g/t Au from 261m (BRCD487. EOH 460m)
- Includes 9.9m at 8.42g/t Au from 295m and 2.16m at 21.17g/t Au from 303m
- A new 'blind' discovery at Bepkong East adding to the already substantial near-surface Bepkong mineralisation
- Infers presence of a mineralising fluid conduit system that is likely to extend to considerable depth
- Complementary holes, BRDC485 (EOH 381m) and BRDC486 (EOH 444m), completed with visible gold observed in former at a depth of 180.9m. Awaiting results
- Volume of mineralised rock at Bepkong has been substantially increased, as has the likelihood of underground mining
- BRCD487 is the first hole in a 40,000m drilling campaign that will continue well into 2019
- Drill rig now at Kunche deposit to follow-up May 2018 intercepts which included 44m at 5.37g/t Au from 99m
- Ore Reserves and Feasibility Study update now due January 2019

West African gold explorer and developer Azumah Resources Limited (ASX: AZM) ("Azumah") advises that the first of three RC/DDH holes, BRCD487, drilled beneath the Bepkong deposit at its Wa Gold Project, Ghana ('Project') has discovered a new 'blind' high-grade eastern lode having intersected a semi-continuous, 93m mineralised zone grading 2.33g/t Au from 261m (no lower cut-off applied) including 9.9m at 8.42g/t Au from 295m, and 2.16m at 21.17g/t Au from 303m (1.0g/t Au cut off applied)(Figs 1, 2 and 3)(Appendix).

The Bepkong East lode is associated with a major structurally controlled 'fluid conduit' system that could extend mineralisation to considerable depth. Its discovery adds to the already substantial near-surface mineralisation at Bepkong (201,100oz Measured and Indicated; 44,000oz Inferred; 113,000oz Proved and Probable)(Refer Table 1 and 2 for details).



ASX & Media Release 12 December 2018 ASX: AZM www.azumahresources.com.au

# Wa Gold Project:

## Value

2.5Moz Mineral Resource 2,400km<sup>2</sup> fertile terrain 624,000oz, 2.14g/t Au Ore Reserve

# Upside

Growing resources and reserves Widespread anomalism Numerous priority targets

## Activity

~40,000m drilling and Feasibility update underway

# **Fully Funded**

<A\$17M over 2yrs

Ibaera Capital earning 47.5% directly in Project

## Issued Capital:

782M ordinary shares 35M 3c opts exp 13.11.2021 3M 3c opts exp 30.06.2020 1.5M 3c opts exp 31.01.2021

## Directors & Management:

Chairman: Michael Atkins

Managing Director: Stephen Stone

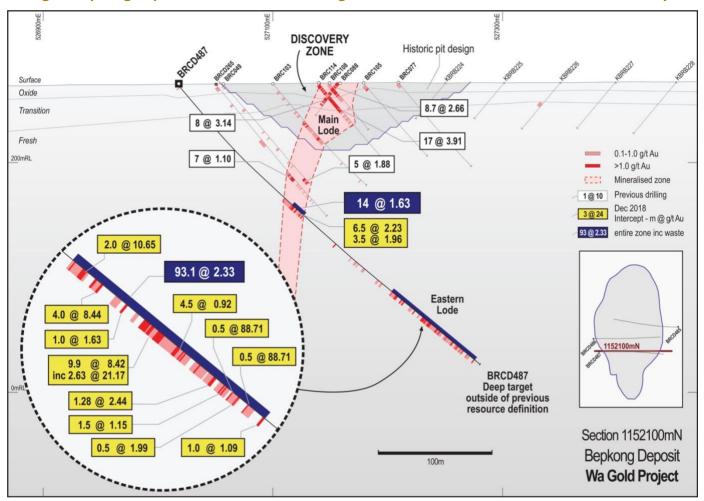
Non-Executive Director: Debra Bakker Linton Putland

## Contact:

Stephen Stone Mb: +61 (0) 418 804 564 stone@azumahresources.com.au



At present, the Bepkong East mineralisation remains unconstrained at depth and along strike. Two additional holes (BRCD485 and BRCD486 - drilled 50m and 100m north of BRCD487) designed with the same objective of testing for down-plunge extensions to high-grade mineralisation intersected in historic drillholes BRCD451 and BRCD452A, have just been completed. Visible gold was observed in the latter at a depth of 180.9m (Photo 1).



## Fig 1: Bepkong Deposit - Cross Section showing BRCD487 and location of Eastern Lode discovery

Combined with historic drillholes, the volume of mineralised rock identified at Bepkong has been substantially increased. This is likely to have a materially positive impact on the overall Project including increasing the likelihood of underground mining.

Azumah Managing Director, Stephen Stone, said **"This magnificent drill intercept, from the very first hole** drilled of a new 40,000m multi-target drilling campaign, is further proof that the Wa Gold Project has so much more to deliver as it transitions towards development. It is a credit to our entire geological team.

"In the short term, we are looking forward to obtaining the drilling results from two other complementary deep-targeted holes just completed at Bepkong, along with two others underway at the Kunche deposit, where last April we also demonstrated the presence of high-grade mineralisation at depth.

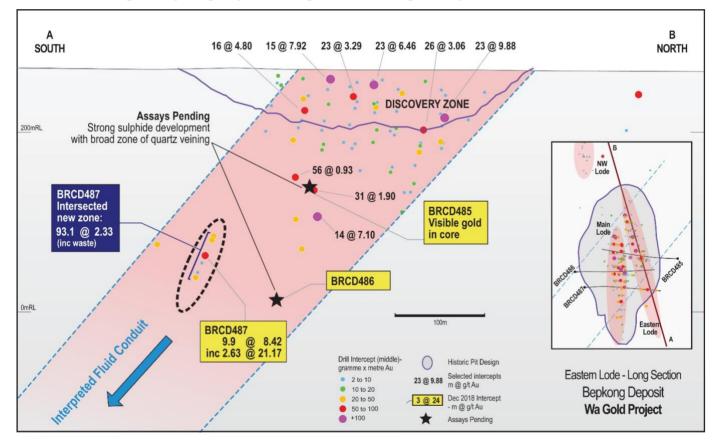
"This is all consistent with the structurally controlled orogenic-style of mineralisation that hosts the Wa Gold Project and which we know can extend to considerably greater depths than we have been drilling."

## 40,000m drilling campaign

The current drilling is part of a recently commenced 40,000m, A\$4 million multi-target drilling campaign aimed at lifting Mineral Resources and Ore Reserves at the Project where the primary objective is to deliver a commercially robust, development-ready Project by Q3 2019.

The drill rig has now moved to the Kunche deposit where it is drilling two deep holes to follow-up recent highgrade intercepts including 44m at 5.37g/t Au from 99m (refer ASX release 8 May 2018).

The exploration programme has been developed by renowned orogenic gold specialist, Dr Jon Hronsky, and Exploration Manager, Paul L'Herpiniere, who are founding partners of Azumah's joint venture partner, Ibaera Capital. Ibaera is sole-funding and managing the Project through to a development decision, expected to be delivered in Q3 2019.

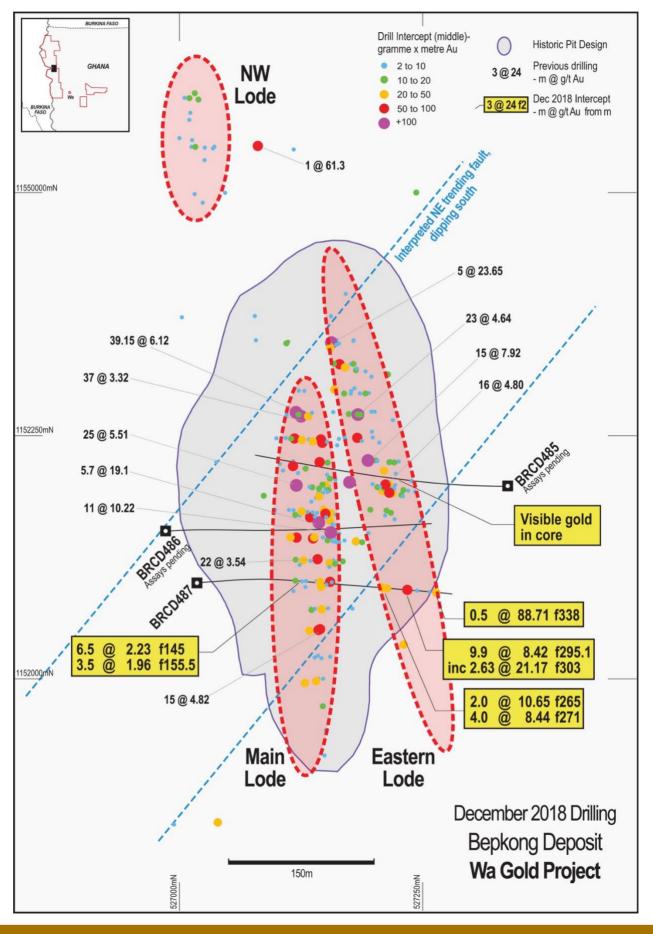


## Fig 2: Bepkong Deposit - Long Section through interpreted Eastern Lode zone

## Geology

This new deep mineralisation at Bepkong is associated within an intercalated shale and siltstone unit which has provided a rheological contrast that has focussed the mineralising fluids. This results in a visibly intense set of translucent quartz veins with associated strong wallrock sulphide development within the higher grade zones of the conduit and moderate to weakly veined and disseminated sulphide wallrock alteration in the footwall to the higher grade mineralised zones. The emplacement of the veins at Bepkong appears to have been controlled by the pre-existing graphitic ductile shear zone. Mineralisation is associated with arsenopyrite and a calcium carbonate-graphite-silica alteration assemblage.







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#### Photo 1: BRCD485 – Visible gold at 180.9m. Awaiting assays.

## **Ore Reserves and Feasibility Study progress**

The Ore Reserves and Feasibility Study progress update is now likely to be released in January 2019.

#### For further information please contact:

Stephen Stone Managing Director Mb 61 (0) 418 804 564 stone@azumahresources.com.au Media: Peter Harris Peter Harris & Associates Mb 61 (0) 412 124 833





#### **About Azumah Resources Limited**

Azumah Resources Limited is a Perth-based, ASX-listed (ASX: AZM) company focused on exploring and developing its regional-scale Wa Gold Project in the Upper West Region of Ghana, West Africa.

Three main deposits have been discovered and extensively drilled at Kunche and Bepkong, adjacent to the Black Volta River and Ghana's border with Burkina Faso, and at Julie approximately 80km to the east.

Several satellite deposits including Aduane, Kunche Northwest, Yagha, Julie West, Danyawu, Alpha/Bravo, Josephine and Collette have also been discovered and delineated.

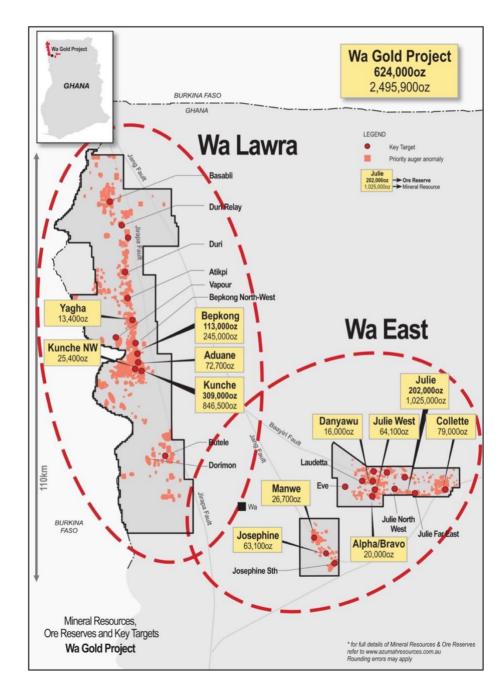


To date, the Company has estimated a JORC 2012 Mineral Resource of 2.5Moz of gold grading 1.6g/t Au, including 1.6Moz Measured and Indicated grading 1.8g/t Au, with these evenly distributed between the Kunche-Bepkong and Wa East (Julie deposit etc) camps.

A 2015 Feasibility Study defined an Ore Reserve of 624,000oz Au (9.1Mt at 2.14g/t Au)(JORC 2012). The Feasibility Study is being updated with delivery scheduled for Q3 2019.

Extensive metallurgical test work has confirmed a high average overall gold recovery of ~92% for the combined Kunche, Bepkong and Julie deposits.

Mineral Resources have been progressively grown through a focused, systematic approach to exploration of the Company's 2,400km<sup>2</sup> licence holdings. These encompass large tracts of prospective Birimian terrain, the rocks that host the majority of West Africa's gold mines.



## Wa Gold Project: Deposits, Prospects, Mineral Resources and Ore Reserves



Much of the tenure is covered in soil, alluvium or laterite so most discoveries have been 'blind'. Azumah anticipates Mineral Resources will grow substantially as it continues to generate and test its large pipeline of targets.

Azumah's current exploration strategy is primarily driven by its aim to materially increase its existing Ore Reserve base and demonstrate attractive project economics. This will enhance funding capability and solidly underpin a development decision.

Azumah has two 15-year Mining Leases over its key deposits (Ghana government holds a 10% free carried interest in their 'rights and obligations' and is also entitled to a 5% gross gold royalty).

No technical, social or environmental impediments to development have been identified, no communities need to be relocated and rehoused and there is strong support from key stakeholders for the Project.

The Project benefits from excellent regional infrastructure including grid power to site, good quality bituminised and non-bituminised roads, easy access to water, a 2km sealed airstrip at the regional centre of Wa and good general communications.

## Ibaera Funding Transaction

All of Azumah's Ghana interests are held through its wholly owned Ghana subsidiary, Azumah Resources Ghana Limited (AZG).

On 1 September 2017 Azumah executed a transformative Earn-In and Shareholders Agreement (EISA) with Perth managed private equity group, Ibaera Capital GP Limited (Ibaera), whereby Ibaera can initially earn a 42.5% interest in AZG and therefore the Wa Gold Project by spending US\$11.5M over two years.

If Azumah elects not to co-contribute pro-rata thereafter, Ibaera may increase its interest to a maximum of 47.5% for a total minimum expenditure of US\$13.5 million (~A\$17M).

Ibaera is backed by a US-based +US\$1 billion natural resources focused investment fund. Prior to committing to the Project, Ibaera reviewed many other international resource projects and, having selected the Azumah Project, undertook an extremely thorough due diligence prior to committing to the EISA.

The terms of the EISA set out the basis for the parties to boost Mineral Resources, Ore Reserves and to deliver a feasibility level study supporting a decision to proceed to production (refer ASX release dated 2 September 2017).

Ibaera's owners, principals and management are all very experienced geologists, engineers and financiers and, pursuant to the EISA, are now managing all facets of the Project.

## References

All references to Mineral Resources and Ore Reserves pertain to ASX releases dated 2 September 2014, 23 March 2015 and 12 October 2016 respectively. Also refer to Tables 1 and 2 herein. The Company confirms that all material assumptions underpinning the production targets and forecast information continue to apply and have not materially changed other than a positive material reduction in capital costs (refer ASX release dated 9 May 2016). For further information on Azumah Resources Limited and its Wa Gold Project please visit its website at www.azumahresources.com.au which contains copies of all continuous disclosure documents to ASX, Competent Persons' Statements and Corporate Governance Statement and Policies.

## 'Competent Persons' Statements

The scientific and technical information in this report that relates to the geology of the deposits and exploration results is based on information compiled by Mr Stephen Stone, who is an executive employee of Azumah Resources Limited. Mr Stone is a Member of the Australian Institute of Mining and Metallurgy 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'. Mr Stone is the Qualified Person overseeing Azumah's exploration projects and has reviewed and approved the disclosure of all scientific or technical information contained in this announcement that relates to the geology of the deposits and exploration results.



#### Table 1: Ore Reserves Summary – JORC Code 2012

	Proved		Probable		Tota	al	Gold To Mill	
(As at August 2014)	Tonnes (Mt)	Grade g/t Au	Tonnes (Mt)	Grade g/t Au	Tonnes (Mt)	Grade g/t Au	Gold oz	
Kunche	4.91	1.92	0.05	3.11	4.97	1.94	309,000	
Bepkong	1.79	1.84	0.11	1.97	1.90	1.85	113,000	
Julie	0.29	2.45	1.93	2.89	2.21	2.84	202,000	
Total	7.00	1.92	2.09	2.85	9.08	2.14	624,000	

Values have been rounded.

#### Table 2: Mineral Resource Estimate – JORC Code 2012 – Updated September 2018

			Measure	ł		Indicated			Inferred			Grand Tot	al
Deposit	Cutoff Au g/t	Tonnes (Kt)	Grade g/t Au	Gold oz									
						Wa-Lav	wra						
Kunche	0.5	8,835	1.6	446,000	3,404	1.4	145,000	7,616	1	255,700	19,855	1.3	846,500
Bepkong**	0.5	2,220	1.8	128,000	1,700	1.3	73,000	1,170	1.2	44,000	5,090	1.5	245,000
Aduane	0.5				322		12,800	1,491	1.3	59,900	1,812	1.3	72,700
Kunche NW	0.5					1.6		694	1.1	25,400	694	1.1	25,400
Yagha	0.5					4.2		333	1.3	13,400	333	1.3	13,400
						Wa-Ea	ist						
Julie*	0.5	1,490	2.1	101,000	9,300	1.9	572,100	6,360	1.7	352,000	17,150	1.9	1,025,000
Collette**	0.5							1,690	1.5	79,000	1,690	1.5	79,000
Julie West	1				455	4	58,900	68	2.4	5,100	523	3.8	64,100
Danyawu	1				105	4.2	14,200	38	1.5	1,800	143	3.5	16,000
Alpha/Bravo	1							148	4.2	20,000	148	4.2	20,000
Josephine	1				709	1.5	34,500	580	1.5	28,600	1,290	1.5	63,100
Manwe	1				257	2.1	17,300	192	1.5	9,400	450	1.9	26,700
Total		12,545	1.7	675,000	16,252	1.8	927,800	20,380	1.4	894,300	49,178	1.6	2,496,900

Note: Values have been rounded. A lower cut-off of 0.5g/t Au was used for Kunche, Bepkong, Aduane, Julie and Collette, and a lower cut-off of 1.0g/t Au was used for Julie West and Danyawu

The information in this report that relates to a Mineral Resource estimate for the Julie deposit is based on and fairly reflects information compiled by Mr David Williams, a Competent Person, who is an employee of CSA Global Pty Ltd and a Member of the Australian Institute of Geoscientists (#4176) and Mr Mark Glassock, a Competent Person, who is an employee of Extomine Pty Ltd and a member of the AusIMM (#202048). Mr Williams assumes responsibility for the interpretation and the grade estimation and Mr Glassock assumes responsibility for the input data. Mr Williams and Mr Glassock have sufficient experience relevant to the style of mineralisation and type of deposit under consideration and to the activity which they are undertaking to qualify as a Competent Persons as defined in the 2012 edition of the Australasian Code for the Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC Code). Mr Williams and Mr Glassock consent to the disclosure of information in this report in the form and context in which it appears.

The information in this report that relates to a Mineral Resource estimate for the Kunche, Aduane, Kunche NW, Yagha, Julie West, Danyawu, Alpha/Bravo, Josephine and Manwe deposits is based on and fairly reflects information compiled by Mr Mark Glassock, a Competent Person, who is an employee of Extomine Pty Ltd and a member of the AusIMM (#202048). Mr Glassock has sufficient experience 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 Persons as defined in the 2012 edition of the Australasian Code for the Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC Code). Mr Glassock consents to the disclosure of information in this report in the form and context in which it appears.

Statements of Competent Persons for the various Mineral Resource Estimates, Ore Reserve Estimates and Process Metallurgy can all be found on the Company's website at: <u>http://www.azumahresource.com.au/projects-competent persons.php</u>

#### **Forward-Looking Statement**

All statements other than statements of historical fact included on this website including, without limitation, statements regarding future plans and objectives of Azumah, are forward-looking statements. Forward-looking statements can be identified by words such as 'anticipate", "believe", "could", "estimate", "expect", "future", "intend", "may", "opportunity", "plan", "potential", "project", "seek", "will" and other similar words that involve risks and uncertainties. These statements are based on an assessment of present economic and operating conditions, and on a number of assumptions regarding future events and actions that are expected to take place. Such forward-looking statements are not guarantees of future performance and involve known and unknown risks, uncertainties, assumptions and other important factors, many of which are beyond the control of the Company, its directors and management of Azumah that could cause Azumah's actual results to differ materially from the results expressed or anticipated in these statements.

The Company cannot and does not give any assurance that the results, performance or achievements expressed or implied by the forward-looking statements contained on this website will actually occur and investors are cautioned not to place any reliance on these forward-looking statements. Azumah does not undertake to update or revise forward-looking statements, or to publish prospective financial information in the future, regardless of whether new information, future events or any other factors affect the information contained on this website, except where required by applicable law and stock exchange listing requirements.



# Appendix: Wa Gold Project - JORC Code 2012 Edition – Table 1

## 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 (eg 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.	<ul> <li>The following information relates to reverse circulation (RC) and diamond (DD) drilling conducted in November and December 2018.</li> <li>A total of 3 holes were drilled for 1185m. This included 430m of RC pre-collar, and 755m diamond tails.</li> <li>Currently, assays are only available for BRCD487.</li> </ul>
	Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.	Drillholes were located by handheld GPS, using coordinate system WGS84 UTM Zone30N RC samples were collected at 1m intervals. Each 1m RC sample was split into two 1 kg samples. The remaining sample was collected in large green bags and used to create a 4m composite sample. RC sample weights averaged 20 kg in oxide material and 30 kg in fresh material. DD samples were taken at 0.1–1.1m intervals. The sample quality and recovery of DD core from fresh and oxidised rock was good. Appropriate quality assurance/quality control (QAQC) protocols were followed, including submission of field duplicates and insertion of commercial standards for all types of drilling. RC and DD samples are analysed by fire assay method FA50/AAS
	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> <li>which has a detection level of 0.001 ppm Au.</li> <li>Appropriate quality assurance/quality control (QAQC) protocols were followed, including submission of field duplicates and insertion of commercial standards for all types of drilling.</li> <li>RC holes were drilled with a 5.25 inch hammer bit and collected via cyclone. Every metre drilled was collected via cyclone into a plastic bag, then placed in rows of 20. The samples were composited into 4m composites using a PVC spear, then sent to the laboratory for analysis, except in zones of obvious mineralisation, where the single metre rifle split sample was sent for analysis.</li> <li>DD holes were drilled at NQ size (47.6mm). Sampling intervals were based on lithology and/or alteration changes. The core was cut in half longitudinally using a core saw.</li> <li>Laboratory Sample preparation of samples included:</li> <li>Drying the sample at 105°C for 4 hours.</li> <li>Grinding the sample to less than -6mm.</li> <li>Splitting the sample for 4 minutes to achieve 85% of sample passing -75µm in grain size.</li> </ul>



Criteria	JORC Code explanation	Commentary
		Gold analysis was carried out by fire assay with atomic absorption spectroscopy method (FA50/AAS) which has a detection level of 0.001 ppm Au.
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 other type, whether core is oriented and if so, by what method, etc).	RC and DD drilling was conducted by Geodrill Ghana Limited with a 900-15 or 900-16 multi-purpose rig.
Drill sample recovery	Method of recording and assessing core and chip sample recoveries and results assessed.	Drill sample recovery was visually assessed and considered to be acceptable within the mineralised zones.
	Measures taken to maximise sample recovery and ensure representative nature of the samples.	The quality of drill samples was very good.
	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.	Sample recovery is generally very high within the mineralised zones. No significant bias is expected, and any potential bias is not considered material.
Logging	Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resources	All drilling has been geologically logged in detail over the entire hole length (at 1m intervals for RC & AC drilling). Colour, lithology, degree of oxidation and water table depth etc were recorded. DD was geotechnically logged for recovery and rock quality designation. Structure type and orientation are recorded in the database. DD core and RC chip trays are stored in the Kalsegra Exploration Base and the Julie Field Camp for Julie and Collette drilling.
	Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.	Geological logging is qualitative in nature based on a qualified geologists observation. This includes records of lithology, oxidation state, colour, mineralisation, alteration and veining.
	The total length and percentage of the relevant intersections logged.	All holes were geologically logged in full.
Sub- sampling	If core, whether cut or sawn and whether quarter, half or all core taken.	Diamond drilling core samples were sawn in half, with half the sample sent for analysis and half kept on site.
techniques and sample preparation		The entire length of BRCD487 core was analysed by the laboratory. Sampling of the core of BRCD486 and BRCD485 was based on the visual observations of the mineralised zones.
	If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.	RC samples were collected on the rig using a cyclone, then passed through a riffle splitter to collect a smaller sub-sample in a calico bag. The remaining sample was collected in a plastic bag and placed in rows of 20. Samples were dry.
	For all sample types, the nature, quality and appropriateness of the sample preparation technique.	Samples were dried and ground to 85% passing 75 microns using laboratory mills for fire assay (FA50 or FA51) analysis. The resultant prill is dissolved in aqua regia and gold content is determined by flame atomic absorption spectroscopy (AAS).



Criteria	JORC Code explanation	Commentary
	Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.	Field QA/QC procedures included insertion of field duplicates and commercial standards of Certified Reference Material (CRM) in every batch (1 per 50 samples).
		Laboratory QA/QC procedures included:
		<ul> <li>Every 50th sample was screened to check grinding results (% passing 2mm and 75 microns).</li> <li>1 reagent blank was inserted every 50 samples, 1 preparation process blank was inserted every 50 samples and 1 weighed replicate was inserted every 50 samples.</li> <li>1 preparation duplicate (re-split) every 50 samples and 2 certified reference materials (CRMs) every 50 samples.</li> </ul>
		Repeat analyses are completed whenever an analytical batch fails to meet the laboratory standards or when requested by a client. No repeats were warranted on this sampling.
	Measures taken to ensure that the sampling	Duplicate samples are taken for all drilling except DD.
	is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling	Where the duplicate versus original sample differ, both samples were re-assayed to check the analysis.
	Whether sample sizes are appropriate to the grain size of the material being sampled	Sample size is considered appropriate.
Quality of assay data and laboratory	The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.	The analytical technique used was fire-assay with an atomic- absorption finish (FA50 or FA51/AAS) which is industry standard for Au.
tests	For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis	Downhole samples have been scanned with a hand-held XRF device. This data is qualitative and used as a guide to potential mineralisation.
	including instrument make and model, reading times, calibrations factors applied and their derivation, etc.	The device used is an Innovex Delta XRF with 40Kv Tube and silicon drift detector (SDD). It is used in soil test mode for 90 seconds per test at 30 seconds for each beam. No calibration factors are applied.
	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.	Field QA/QC procedures included the insertion of field duplicates, blanks and CRM at a rate of 1 to 50.
Verification of sampling and	The verification of significant intersections by either independent or alternative company personnel.	The verification of significant intersections by independent or alternative company personnel has not occurred.
assaying	The use of twinned holes.	No twinned holes were drilled.
	Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.	Field data was all recorded as hard copies. Geological logging and sample intervals were recorded in digital form using a logging computer or Excel templates. This data was imported into a SQL database for validation and QC. The analytical data was imported into SQL database with all related metadata and QA/QC information.



Criteria	JORC Code explanation	Commentary
	Discuss any adjustment to assay data.	No adjustments were made, other than for values below the assay detection limit. These values have been entered as the negative of the detection limit.
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.	The collar locations of all holes were located using a hand-held GPS (accurate to ±2m).
	Specification of the grid system used.	The grid system is WGS84 Zone 30 North.
	Quality and adequacy of topographic control.	The topographic surfaces of all properties were created using a GeoEye image and Digital Surface Model. This was corrected and validated using DGPS drill hole points collected in the field.
Data spacing and distribution	Data spacing for reporting of Exploration Results.	The RC/DD drill holes at Bepkong were planned individually to test for a proposed depth extension of the Eastern Lode
	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.	The RC drilling at Kunche, Kunche Northwest, Bepkong, Aduane and Yagha North was at variable spacing, based on increasing confidence in the ore body interpretation to allow an upgrade in Resource Estimation calculation.
	Whether sample compositing has been applied.	For the RC pre-collars, samples were assayed in 1m intervals in zones of interpreted mineralisation, or 4m composites. Diamond core was sampled based on visual observations, with sample lengths of 1m or less.
Orientation of data in relation to geological	Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.	Drilling fences are orientated perpendicular to the interpreted strike of the mineralisation.
structure	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 orientation based sampling bias has been identified in the data based on the interpreted mineralised structures.
Sample security	The measures taken to ensure sample security.	Chain of Custody is managed by Azumah staff (geologists and technicians). Samples are stored on site and delivered to the Intertek Laboratory at Tarkwa Samples submission sheets are in place to track the progress of every batch of samples.
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	Sampling techniques are consistent with industry good practice. Data was validated by CSA Global during loading into the database. Checks included Depth from Depth to, sample interval hole depth and overlapping sample intervals. Any data which failed the checking process is returned to Azumah for validation. Global consistency was also checked at a later stage by plotting holes on sections using the database and reconciling assays against the geology.



## Section 2 Reporting of Exploration Results

# (Criteria listed in the preceding section also apply to this section.)

Criteria	JORC Code explanation	Commer								
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.	corner of All leases	f Ghana. s are held :	located in 100% by A Phoenix Re	zumah	Reso		-		
	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.	The tene	ments are	e in good s	tandin	g with	n no kno	own imp	pedimer	nts.
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	(1990's),	AGEM (la	and explor te 1990's) n complet	and Se	emafo	o (late 1	990's).		
Geology	Deposit type, geological setting and style of mineralisation.	Palaeopr the Wa-l	oterozoic Lawra gre	Project Upper and enstone b e Project o	d Lowe elt, wi	er Birii thin C	mian ur Ghana. (	nits, typi	cally kr	iown as
		mineralis	sation ass	uartz lod ociated w opyrite ar	ith zor	nes of	f intens	-	-	
		of quart	z veins. G	ne: Increater that veins and	an 1g/	∕t Au	minera	-		
		mineralis	sation is	ng and loo associatec and haem	l with	silicif	ication	-		
		is assoc	iated wit	eining with h silicific sy translue	ation,	arse	nopyrit			
Drill Hole	A summary of all information	Collar De	tails:							
Information	material to the understanding of	Hole	East	North	RL	Az	Dip	Depth	RC	DD
	the exploration results including a	BRCD485 BRCD486		1152198	267 267	270 90	-50	381m	130m 150m	251m
	tabulation of the following	BRCD486 BRCD487	-	1152152 1152099	267	90	-60 -50	444m 360m	150m 150m	294m 210m
	information for all Material drill holes:		nt Intercer							
	• easting and northing of the drill		Hole_ID	mFrom	mTo		Intercep	t Descript	ion	
	hole collar		BRCD487	145	151.	.5 6.	50m @ 2.	.23g/t		
	• elevation or RL (Reduced Level –		BRCD487	155.5	15		50m @ 1			
	elevation above sea level in		BRCD487	195.8	196.	.8 1.	00m @ 1	.79g/t		
	metres) of the drill hole collar		BRCD487	265	26		00m @ 1			
	• dip and azimuth of the hole		BRCD487	271	27		00m @ 8	-		
	• down hole length and		BRCD487	286	28		00m @ 1	-		
	interception depth		BRCD487	295.1	30		90m @ 8			
	hole length.		BRCD487	311	315.		50m @ 0			



Criteria	JORC Code explanation	Commentary				
Data aggregation methods	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. In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade	BRCD487329330.281.28m @ 2.44g/tBRCD487334335.51.50m @ 1.15g/tBRCD487338338.50.50m @ 88.71g/tBRCD4873463471.00m @ 1.39g/tBRCD4873533541.00m @ 1.09g/tBased on assays greater than 1g/t gold, with maximum internal di of 2m consecutive waste.All assays greater 1g/t Au have been averaged based on a wei average, with a maximum of 2m consecutive internal waste. N cut has been used.	eighted			
	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.	Not relevant.				
	The assumptions used for any reporting of metal equivalent values should be clearly stated.	Not relevant.				
Relationship between mineralisation widths and	These relationships are particularly important in the reporting of <i>Exploration Results</i> .	All holes were designed to be drilled perpendicular to the interport orientation of mineralisation.	preted			
intercept lengths	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 (eg 'down hole length, true width not known').	Mineralisation Bepkong striking North-south and is vertical to vertical. All drillholes are oriented east or west – perpendicular strike of mineralisation, and angled at -50° or -60°				
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.	Refer to diagrams in body of text.				
Balanced reporting	Where comprehensive reporting of all Exploration Results is not practicable, representative	Summary results of drilling to date is presented in the body of th and in the tables above.	he text			

Criteria	JORC Code explanation	Commentary
	reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.	
Other substantive exploration data	Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.	All meaningful and material exploration data has been referred to in the body of the text or on accompanying figures. Induced Polarisation: SAGAX Afriques completed a gradient induced polarisation survey (IP) over the Kunche and Bepkong deposits. The anomalies were interpreted to be caused by disseminated sulphides and quartz veining. The IP survey outlined several linear zones with a similar geophysical response, particularly a prominent linear anomaly west of Kunche. Three dominant orientations were interpreted as a dextral reverse shear model. Several other geophysical targets were identified and require drill testing. Metallurgical Test Work: Extensive metallurgical test work has been undertaken on the Kunche, Bepkong and Julie deposits. There has been only minor work completed on Collette and no work on Aduane. Metallurgical test work performed on the Kunche, Bepkong and Julie ores has included: Comminution. Gravity concentration. Direct cyanide leaching. Carbon kinetics. Thickening. Rheelogy. Oxygen uptake. Cyanide detoxification. Variability testing. In addition for Julie ore test work has included: Bulk sulphide flotation. Ultra-fine grinding (UFG) of concentrate. Cyanide leaching of UFG flotation concentrate and of flotation tailings. QEM*SCAN* analysis of Julie concentrate products. Collette testing only includes: Gravity concentration. Direct cyanide leaching. Cellette testing only includes: Gravity concentration. Ultra-fine grinding (UFG) of concentrate. Cyanide leaching of UFG flotation concentrate and of flotation tailings. QEM*SCAN* analysis of Julie concentrate products. Collette testing only includes: Gravity concentration. Direct cyanide leaching. Potential Deleterious Substances: Both Kunche and Bepkong mineralisation contains small quantities of organic carbon, arsenic in the form of arsenopyrite, and other sulphide mineralisation.



Criteria	JORC Code explanation	Commentary
		In general, this does not appear to have a significant deleterious effect on gold extraction. The limited number of Kunche primary variability composites that do exhibit a reduction in extraction have been included in the correlation equation for gold recovery.
		Preliminary testing indicates the flotation/regrind circuit designed for the Julie primary ore may also benefit some of the Kunche primary ore and further test work is planned on some Kunche primary ore samples.
		Julie mineralisation contains sulphides which is predominantly pyrite and relatively unreactive. Approximately 35% of the gold is associated with pyrite which can be recovered by flotation and fine grinding of concentrate prior to extraction by cyanide.
Further work	The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or	Diamond drilling at Bepkong has identified a significant intercept of mineralization that has not previously been included in resource calculations.
	large-scale step-out drilling).	Assays from the Diamond Tails of the next two holes drilled at Bepkong are expected within the coming weeks.
		Follow up infill and extension drilling will be planned to test the geometry and extensions of this zone.
	Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.	Refer to diagrams in body of text.