

## ASX / Media Announcement

29 September 2017

Further Gold Nuggets at Silica Hills -Karratha, Western Australia-



Figure 1: Specimen quartz/gold nuggets recovered above 1 ounce with a total weight of 609 grams plus a gold bar poured from small vein/quartz gold weighing 1,242 grams. Total weight 1,851 grams (1.851 Kg, 59.5 ounces).

## **Highlights:**

- Since the release on the 7 September 2017, a further 59.5 ounces of specimen gold has been recovered from Artemis's Silica Hills Gold Project (Figure 1).
- Gold is located within quartz reefs/pods within a shear zone at Silica Hills, 12 km north of Purdy's Reward in the Karratha region of WA.
- Artemis highlights to prospectors that the Silica Hills tenements are granted Mining Licenses and no prospecting is permitted.

David Lenigas, Artemis's Executive Chairman, commented;

"The quartz vein stock work and coarse nuggetty gold within a shear zone is becoming more evident as work continues towards the east. We will continue the current work programme, and once a Programme of Work is approved by DMIRS for trenching and pitting, exploration efforts will rapidly expand to the north into our exploration tenement E47/1746. A request for an expanded heritage survey with Ngarluma Aboriginal Corporation over the Silica Hills Mining Licenses and surrounding areas has been requested."

#### Artemis Resources Limited ARBN: 80 107 051 749

Level 3, IBM Building, 1060 Hay Street, West Perth, WA Australia, 6006

PO Box R933 Royal Exchange NSW Australia, 1225

Phone: +61 2 9078 7670 Facsimile: +61 2 9078 7661 Email: info@artemisresources.com.au Website: artemisresources.com.au

#### **Directors:**

**Executive Chairman** David Lenigas

**Executive Directors** Ed Mead Alex Duncan-Kemp

**Company Secretary:** Guy Robertson

### Corporate Information ASX Code: ARV





Artemis Resources Limited ("**Artemis**" or "**the Company**") (**ASX: ARV**) is pleased to announce an update of further gold being recovered from Silica Hills (Figure 5). Exploration at Silica Hills has been ongoing over the past 7 months and this work has increased the Company's confidence in the project. Current work has exposed a quartz vein system style gold deposit within a silicified intrusive environment. Since the ASX release on the 7 September 2017 a further 59.5 ounces of quartz and gold specimen has been recovered via metal detecting from M47/177 (Figure 2). Examples of specimen gold recovered to date can be seen in figures 1.



Figure 2: Map of the Silica Hills area showing distribution of nugget recovery areas and location of known quartz veins and stockwork.

The geology of the project is characterised by a poorly exposed quartz vein system within Archean felsic and mafic rocks, along a shear system, which is becoming more evident as work extends to the east (Figure 3). The work over the past 7 months has helped develop a strategy to further advance Silica Hills and a Programme of Work (POW) has been submitted to the Department of Mines, Industry, Regulation and Safety (DMIRS).

The POW submitted for Silica Hills consists of pitting on a 25 metre by 25 metre grid pattern over the eastern portion of M47/177 and the adjacent E47/1746 at 100m by 100m spacing, Figure 4. The pits are planned to have nominal 2m by 2m by 2m dimensions to reach basement and enable safe sampling conditions.

The work is intended to assist with understanding the gold distribution and structural orientation within quartz vein systems, which will assist in the design of a drill programme. A request for a heritage survey has also been submitted to Ngarluma Aboriginal Corporation. The intended target areas for ground disturbing activities are within areas not previously explored or disturbed by previous operators.





Figure 3: The cleared area, highlighted with red circle, which produced the majority of nuggets, approximately 40m by 20m. Coordinates for the red circle are in Table 1. The location is seen in Figure 2.

Table 1: Coordinates of gold nuggets recovered in the announcement.

Point	MGA East	MGA North	Zone
Quartz Vein to West	492984	7684739	50
Western Limit	493040	7684753	50
Eastern Limit	493053	7684758	50

There is an increasing impression the gold is sourcing from a shear system dipping northward at about 10-15°, this is similar in orientation to the quartz veins hosting the gold reported in November 2016.





Figure 4: Distribution of proposed exploration pits on M47/177 and E47/1747.

Figure 5: Artemis' tenement package in the Karratha Region of Western Australia.





### BACKGROUND INFORMATION ON ARTEMIS RESOURCES:

Artemis Resources Limited is a resources exploration and development company with a focus on its prospective Karratha (Figure 5) (gold, cobalt, base metals, platinum group elements and iron ore) and the Mt Clement Paulsens (gold) project in Western Australia.

Artemis owns the fully permitted 425,000tpa Radio Hill nickel and copper operations and processing plant located 25 km south of Karratha. JORC 2004 compliant resources of Gold, Nickel, Copper PGE's and Zinc, all situated within a 40 km radius of the Radio Hill plant and on 1,536sqkm form the newly consolidated assets of Artemis Resources.

Artemis have signed Definitive Agreements with Novo Resources Corp. ("Novo"), whereby Novo can farm-in to 50% of gold (and other minerals necessarily mined with gold) in conglomerate and/or paleoplacer style mineralization in Artemis' tenements within 100km of the City of Karratha, including at Purdy's Reward ("the Gold Rights"). The Gold Rights do not include (i) gold disclosed in Artemis' existing (at 18 May 2017) JORC compliant Resources and Reserves or (ii) gold which is not within conglomerate and/or paleoplacer style mineralization or (iii) minerals other than gold. Artemis' Mt Oscar tenement is excluded from the Definitive Agreements.

The farm-in commitment now requires Novo to expend AUD \$2 million on exploration within two years of satisfying conditions precedent in the definitive agreements.

The Definitive Agreements cover 38 tenements/tenement applications that are 100% owned by Artemis. On completion of the farm-in commitment, three 50:50 joint ventures will be formed between Novo's subsidiary, Karratha Gold Pty Ltd ("Karratha Gold") and three subsidiaries of Artemis. The joint ventures will be managed as one by Karratha Gold. Artemis and Novo will contribute to further exploration and mining of the Gold Rights on a 50:50 basis. Further definitive agreements covering approximately 19 Artemis tenements/tenement applications that are already subject to third party interests are expected to be signed once all necessary third party consents have been obtained.

#### CONTACTS:

For further information on this update or the Company generally, please visit our website at <u>www.artemisresources.com.au</u> or contact:

#### Investors / Shareholders

Edward Mead Executive Director Telephone: +61 407 445 351 Email: Ed.Mead@artemisresources.com.au

#### COMPETENT PERSONS STATEMENT

The information in this document that relates to Exploration Results and Exploration Targets is based on information compiled or reviewed by Allan Younger, who is a Member of the Australasian Institute of Mining and Metallurgy. Mr Younger is a consultant to the Company, and is employed by Indigo Geochemistry Pty Ltd. Mr Younger 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 Younger consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

#### FORWARD LOOKING STATEMENTS AND IMPORTANT NOTICE

This report contains forecasts, projections and forward looking information. Although the Company believes that its expectations, estimates and forecast outcomes are based on reasonable assumptions it can give no assurance that these will be achieved. Expectations, estimates and projections and information provided by the Company are not a guarantee of future performance and involve unknown risks and uncertainties, many of which are out of Artemis' control. Actual results and developments will almost certainly differ materially from those expressed or implied. Artemis has not audited or



investigated the accuracy or completeness of the information, statements and opinions contained in this presentation. To the maximum extent permitted by applicable laws, Artemis makes no representation and can give no assurance, guarantee or warranty, express or implied, as to, and takes no responsibility and assumes no liability for (1) the authenticity, validity, accuracy, suitability or completeness of, or any errors in or omission from, any information, statement or opinion contained in this report and (2) without prejudice to the generality of the foregoing, the achievement or accuracy of any forecasts, projections or other forward looking information contained or referred to in this report.

Investors should make and rely upon their own enquiries before deciding to acquire or deal in the Company's securities.

# 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	<ul> <li>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.</li> <li>Include reference to 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 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.</li> </ul>	<ul> <li>A metal detector was used to identify anomalous zones and gold nuggets within the near surface profile.</li> <li>The initial surface was prospected then approximately 0.2m of material was scraped off using a D9L bulldozer; this surface was then prospected and the process repeated to a depth of approximately 1m.</li> <li>Total weight of Specimen samples, 26 ounces, was weighed and sent to the Perth Mint for gold recovery.</li> </ul>
Drilling techniques	<ul> <li>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).</li> </ul>	<ul> <li>Drilling not being reported and no drill holes on M47/177 where the gold being reported was recovered.</li> </ul>
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>	• Not drill samples.



Criteria	JORC Code explanation	Commentary
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</li> </ul>	<ul> <li>Samples-specimens were geologically described-logged when collected. These samples are not for the purpose of Mineral Resource estimation, mining studies or metallurgical studies.</li> </ul>
	relevant intersections logged.	
Sub-sampling techniques and sample preparation	<ul> <li>If core, whether cut or sawn and whether quarter, half or all core taken.</li> <li>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet</li> </ul>	<ul> <li>Specimens containing nugget gold and silver of various sizes was collected (approximately 26 ounces in total).</li> <li>The nuggets came from this 40m by 20m area.</li> </ul>
preparation	<ul> <li>or dry.</li> <li>For all sample types, the nature, quality and appropriateness of the sample</li> </ul>	
	<ul> <li>preparation technique.</li> <li>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</li> </ul>	
	<ul> <li>Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half</li> </ul>	
	<ul> <li>sampling.</li> <li>Whether sample sizes are appropriate to the grain size of the material being sampled.</li> </ul>	
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.	<ul> <li>Perth Mint reported 22.8 ounces of fine gold and 3 ounces of fine silver from the submitted specimens (purity of 87.63% gold &amp; 12.27% silver totaling 99.9% precious metals purity).</li> </ul>
tests	<ul> <li>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.</li> <li>Nature of guality control procedures</li> </ul>	
	<ul> <li>Nature of quarty 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.</li> </ul>	
Verification of sampling and assaying	<ul> <li>The verification of significant intersections by either independent or alternative company personnel.</li> <li>The use of twinned holes.</li> </ul>	Not drill samples.
	<ul> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> <li>Discuss any adjustment to assay data.</li> </ul>	
Location of data points	<ul> <li>Accuracy and quality of surveys used to locate drill holes (collar and down-hole</li> </ul>	Handheld GPS unit used to position sampling locations.
	<ul><li>surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</li><li>Specification of the grid system used.</li></ul>	<ul> <li>A specific listing of the nugget sites was not compiled by the prospector, this has been requested for all future situations.</li> </ul>
Data sarat	Quality and adequacy of topographic control.	Des desets and the set of the set
Data spacing and distribution	<ul> <li>Data spacing for reporting of Exploration Results.</li> <li>Whether the data spacing and distribution</li> </ul>	<ul> <li>Randomly spaced reconnaissance sampling by metal detector around 493100mE 7684750mN.</li> <li>Not for ore resource estimation.</li> </ul>
distribution	is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and	<ul><li>No compositing applied.</li></ul>



Criteria	JORC Code explanation	Commentary
	<ul> <li>Ore Reserve estimation procedure(s) and classifications applied.</li> <li>Whether sample compositing has been applied.</li> </ul>	
Orientation of data in relation to geological structure	<ul> <li>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</li> <li>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.</li> </ul>	<ul> <li>Samples have been obtained via the establishment of bulldozer scrapings and metal detecting.</li> <li>At this stage the prospective structure/zone is along a creek system aligned to a major fault; there is no evidence as yet that the gold is derived from the fault system.</li> </ul>
Sample security	The measures taken to ensure sample security.	<ul> <li>The gold samples remained in the custody of the prospector/contactor until delivered to the Perth Mint.</li> </ul>
Audits or reviews	<ul> <li>The results of any audits or reviews of sampling techniques and data.</li> </ul>	<ul> <li>No audit of rock sampling data has been completed to date</li> </ul>

# Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
<i>Mineral tenement and land tenure status</i>	<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>Tenements that make up the Silica Hills Project are M47/177 and M47/288, which are granted and in good standing. The tenements are owned by Western Metals Pty Ltd, a 70% owned subsidiary company of Artemis Resources Limited. A 2% Gross Royalty is payable to Exchange Minerals Limited.</li> <li>Tenement E47/1746 is owned by Armada Mining Pty Ltd, a 100% owned subsidiary company of Artemis Resources Limited.</li> </ul>
Exploration done by other parties	<ul> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	<ul> <li>The project area has a history of alluvial and elluvial mining by prospectors. RC drill holes were drilled in 2005 on M47/288 and have not been digitised. Most historical work has consisted of field reconnaissance and rock chip sampling (a total of some 180 samples including 16 BLEG from the late 1980's). Trenching has been proposed on both M47/177 and M47/288.</li> </ul>
Geology	Deposit type, geological setting and style of mineralisation.	<ul> <li>Archean felsic intrusion. Not enough is known about the primary gold mineralisation at this early stage, other than the gold appears to be primarily associated with a quartz stock work of veins. Gold mineralisation and purity is ~87.6% gold and ~12.3% silver.</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:         <ul> <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> </ul> </li> </ul>	<ul> <li>Not drillholes. No drilling has been completed on M47/177 where the gold was retrieved by metal detector.</li> </ul>



Criteria	JORC Code explanation	Commentary
	<ul> <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>	
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 grades are usually Material and should be stated.</li> <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> </ul>	<ul> <li>No weighted grade results have been reported.</li> </ul>
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>	<ul> <li>Sampling refers to hand specimens collected from costeans and identified by metal detectors</li> <li>No relationship between samples and underlying geological structures is known at this stage</li> </ul>
Diagrams	<ul> <li>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.</li> </ul>	<ul> <li>No diagrams have been drawn up as no drilling has been undertaken.</li> </ul>
Balanced reporting	<ul> <li>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.</li> </ul>	<ul> <li>Factual data of the gold supplied to the Perth Mint has been reported.</li> </ul>
Other substantive exploration data	<ul> <li>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.</li> </ul>	Other extensive work over the years has been carried out (such as airborne geophysics). The results of which are not reported here.
Further work	<ul> <li>The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).</li> <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> </ul>	• The structural setting and orientation of the quartz veins and stock work is to be further investigated with the use of pitting and trenching. A POW has been submitted for extensive pitting on E47/1746, and M47/177 on new undisturbed areas with no previous exploration by previous operators. A drill programme will be designed on a better understanding of structure orientation.