### 17 April 2023



Iceni Gold Limited (ASX: ICL) (Iceni or the Company) is pleased to provide an exploration update on the Everleigh Well Target Area

# Highlights

- An integrated geophysics campaign at Everleigh Well has identified previously unknown gold structures.
- The significance of these structures is that they correlate with:
  - Everleigh diamond drillhole FMDD0032, which previously revealed numerous anomalous gold intercepts along the entirety of its ~900m length (ASX releases 14 and 20 October 2022)
  - High grade rock chips and gold nuggets discovered at Everleigh (ASX release 22 March 2023)
  - UFF+ soil samples, specimen stones and historic workings

Ongoing exploration fieldwork has identified new outcrop on a structure named by Iceni as the Northern Reflector, on which concentrations of gold nuggets, historic workings and gold bearing rock chip samples have been discovered.

Fieldwork continues at the Everleigh Well area to further define target locations for follow up drilling.

## Technical Director Dave Nixon commented:

"The Everleigh geophysical campaign and new geophysical interpretation consolidate our knowledge of the geology and increase our confidence on the controls on gold mineralisation in the Everleigh target area.

Most of the structures identified by geophysics are hidden beneath transported cover, however, field validation of what the geophysical model was indicating to us has located **outcrop** of one of these structures, known as the Northern Reflector.

At the location where the Northern Reflector outcrop was discovered, concentrations of gold nuggets, historic workings and gold bearing rock chip samples have also been found.

The Northern Reflector structure is interpreted to be intersected by hole **FMDD0032**, which is exciting because it supports the association of this structure with the Castlemaine Fault and gold mineralisation.

Similarly, the **200m long high-grade gold vein** at Everleigh is associated with a modelled contact, so searching along this contact will have an increased probability of discovering extensions of the high-grade gold vein.

The **seismic work** directly detecting structures associated with **gold mineralisation** is a highly positive outcome.

Geological fieldwork is continuing at the **Everleigh target area**, gathering data to further validate the exploration model and to identify targets for follow-up exploration".

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Projects 14 Mile Well Guyer Well **Capital Structure** Shares: 208,571,428 Options: 19,706,857







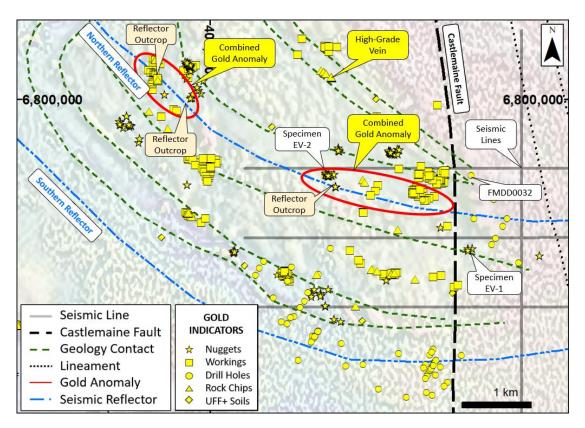


Figure 1. Coincident outcrop of the Northern Reflector and combined gold anomalies along the trace of the Northern Reflector identified by the seismic survey at Everleigh. Combined gold data sets include UFF+ soils, rock chips, drilling, nugget finds and historical workings showing the distribution of gold.

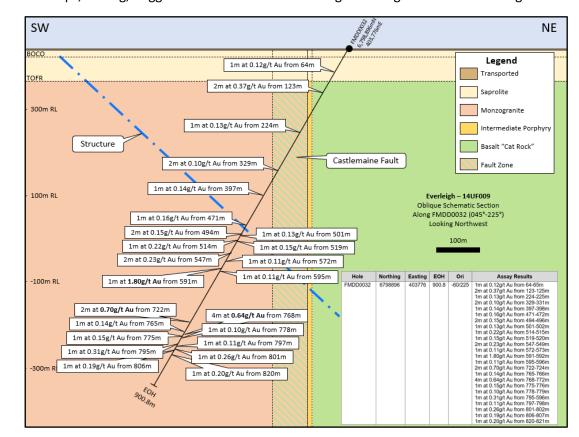


Figure 2. At ~475m in FMDD0032 a structural zone was intersected that may correlate with the Northern Reflector. Numerous anomalous gold intercepts were reported over a broad interval in the footwall of this structure.





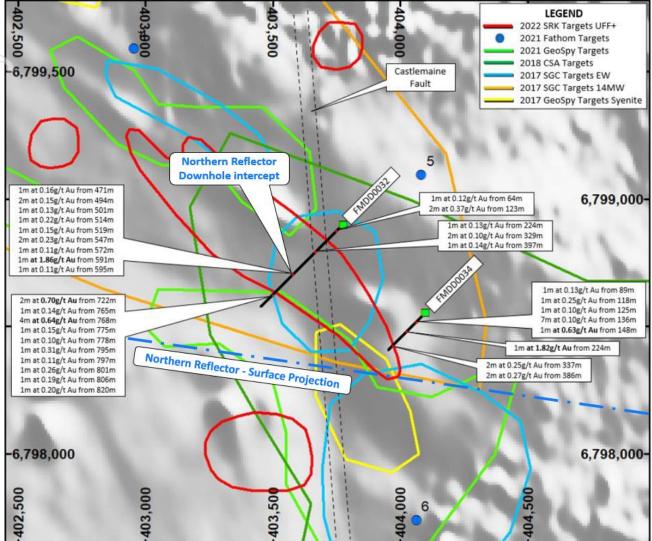


Figure 3. Collar plan showing the location of the DD holes relative to existing targets, the Castlemaine Fault and the Northern Reflector. Background image is magnetics TMI RTP greyscale.



Figure 4. Lode structure at ~116m in drillhole FMDD0032.



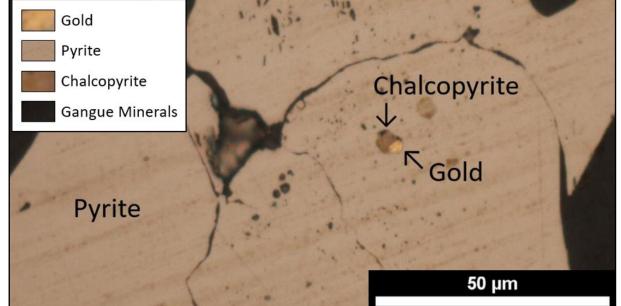


Figure 5. Photomicrograph of gold associated with sulphides at 224.6m in drillhole FMDD0032.



Figure 6. Selection of gold nuggets recovered during this past week in conjunction with rock chip sampling along the Northern Reflector. The nuggets are interpreted to be close to source due to preservation of surface textures and the presence of retained gangue mineral phases.



# **Integrated Geophysical Model**

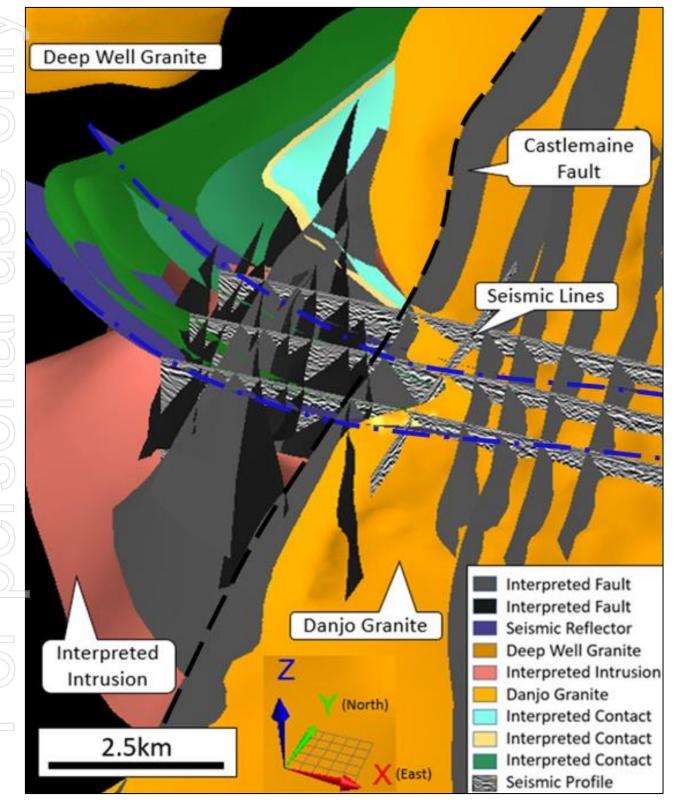


Figure 7. View of the Everleigh integrated geophysical model. The model was generated from the interpretation of multiple data sources, including: Gravity, Magnetics, DGPR, 2D Seismic and DEM. The model will be updated using new data as it becomes available.



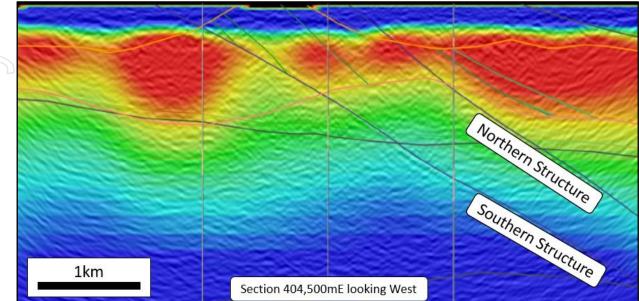


Figure 8. Seismic section with an overlay of the gravity inversion model, along 404,500mE looking west, showing the interpreted north dipping structures on this section.

Iceni has conducted an integrated geophysical campaign to understand the geology and structure of the Everleigh target area. The campaign included acquisition of DGPR, Gravity, DEM and 2D Seismic (31.5 line kms).

The seismic acquisition was undertaken by Ultramag Geophysics Pty Ltd using their eVibe seismic system. The energy source was a Synchro eVibe with data collection on remote wireless nodes.

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		6,798,000mN
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400,000		1.5 km

Figure 9. Plan showing the location of the seismic lines in the Everleigh target area.





Figure 10. Ultramag eVibe Synchro in the field at Everleigh. The device is small and manoeuvrable, thereby greatly reducing the environmental impact of the survey. The system uses an electrical energy source that eliminates the need for the use of explosives that would have been used for a conventional seismic survey.

The results from the geophysical surveys were integrated with existing geophysical data sets to create a 3D structural model known as The Everleigh Integrated Geophysical Model. New geophysical data that was acquired by Ultramag Geophysics Pty Ltd was reprocessed, along with existing data by Southern Geoscience Consultants Pty Ltd (SGC). SGC developed a tomographic velocity model and a gravity inversion model that were used to constrain the seismic interpretation.

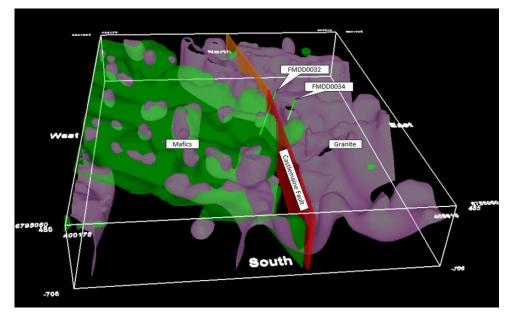


Figure 11. Combined gravity and magnetic inversion models for Everleigh. To the west the area is dominated by higher density rocks (gravity modelled in green) interpreted to be mafic volcanics and to the east the area is dominated by more magnetic rocks (magnetics modelled in pink) interpreted to be granites. The position of the Castlemaine Fault was identified in drilling and was used to constrain the seismic interpretation.



Seismic interpretation and modelling was conducted by Rock Solid Seismic Pty Ltd. Petrophysical data was collected from the deep drillhole FMDD0032 at Everleigh and this data was used to provide constraints for the geophysical modelling.

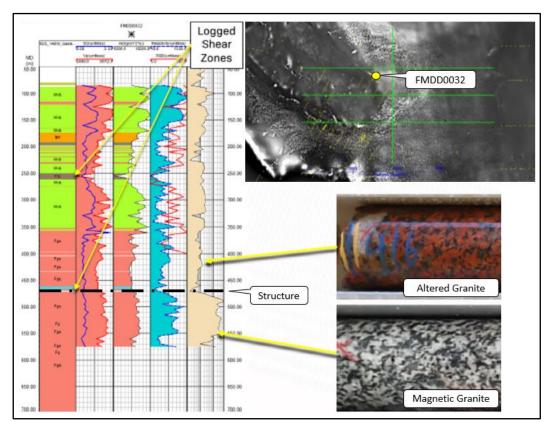


Figure 12. Downhole petrophysics in FMDD0032 was used to constrain the geophysical models. At ~475m the hole intersected a structural zone that may correlate with the Northern Reflector. The geology on either side of this structure has different petrophysical properties.

Interpretation of the model identified the known geological controls in the area, namely the Castlemaine Fault, the Danjo Granite contact and the crosscutting lineaments. A number of unknown faults and other structures were also interpreted from the combined geophysical data sets. Of particular interest was the interpretation of the seismic sections which revealed a pair of arcuate east trending reflectors, which are currently interpreted as faults.

Interrogation of the combined gold data set (including gold nuggets, specimen stone, UFF+ soils, historic workings, gold in drilling and rock chip geochemistry) against the geophysical model revealed that the distribution of gold is strongly associated with these newly identified structures, specifically the Northern Reflector. This structure may have been intersected in hole FMDD0032 at a downhole depth of ~475m. In FMDD0032 anomalous gold was intercepted in numerous intervals along the length of the ~900m hole adjacent to the Castlemaine Fault and the Northern Reflector. The nature of the relationship between these two structures is not fully understood, but it is likely that their interaction has created the necessary pathways for the transport of gold bearing fluids.

At this early stage the data supports the interpretation that the Northern Reflector is continuous along strike, to depth and is associated with gold mineralisation.

The geophysical model is providing active guidance for the exploration field teams and sampling is being focused on outcropping rocks and faults with a higher probability of being gold mineralised.

During the past week gold nuggets have been recovered in conjunction with rock chip sampling along the newly discovered Northern Reflector outcrop.



#### **About Iceni Gold Limited**

Iceni Gold Limited is a Perth based exploration company that operates the 14 Mile Well Gold Project in the Laverton Greenstone Belt.

Iceni Gold Limited (Iceni or the Company) now has 8 key high priority target areas within the 14 Mile Well project area. Iceni is actively exploring the target areas using geophysics, metal detecting, surface sampling, Ultrafine (UFF+) soil sampling, air core (AC) drilling and diamond drilling (DD). The ~800km<sup>2</sup> 14 Mile Well tenement package, the majority of which has never been subject to modern systematic geological investigation, is situated on the western shores of Lake Carey, ~ 50km from Laverton WA.

#### **Competent Person Statement**

The information in this announcement that relates to exploration results fairly represents information and supporting documentation prepared by Mr David Nixon, a competent person who is a member of the Australasian Institute of Mining and Metallurgy. Mr Nixon has a minimum of twenty-five years' 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 Joint Ore Reserves Committee Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr Nixon is a related party of the Company, being the Technical Director, and holds securities in the Company. Mr Nixon has consented to the inclusion in this announcement of the matters based on his information in the form and context in which it appears.

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# 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 (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.</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 (e.g. 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (e.g. submarine nodules) may warrant disclosure of detailed information.</li> </ul>	<ul> <li>Geophysics</li> <li>Geophysical data sets were acquired in the field by contract geophysical service providers.</li> <li>Surface data included: Gravity, Magnetics, DGPR, DEM and 2D Seismic.</li> <li>Downhole petrophysics acquired by the Company's field team included: density, magnetic susceptibility, resistivity, sonic velocity.</li> <li>Seismic data was acquired by UltraMag using their eVibe seismic system.</li> </ul>
Drilling techniques	• Drill type (e.g. core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g. core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).	<ul> <li>No new drilling results being reported</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</li> </ul>	No new drilling results being reported

Criteria	JORC Code Explanation	Commentary
	fine/coarse material.	
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>No new drilling results being reported</li> </ul>
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 or dry.</li> <li>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</li> <li>Quality control procedures adopted for all subsampling stages to maximise representativity of samples.</li> <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 sampling.</li> <li>Whether sample sizes are appropriate to the grain size of the material being sampled.</li> </ul>	No new drilling results being reported
Quality of assay data and laboratory tests	<ul> <li>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</li> <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 quality control procedures adopted (e.g. standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e. lack of bias) and precision have been established.</li> </ul>	No new drilling results being reported
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> <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>	No new drilling results being reported

Criteria	JORC Code Explanation	Commentary
Location of data points	<ul> <li>Accuracy and quality of surveys used to locate drillholes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</li> <li>Specification of the grid system used.</li> <li>Quality and adequacy of topographic control.</li> </ul>	<ul> <li>In the field data points are located using Garmin GPSMAP64csx<sup>™</sup> handsets with nominal accuracy is 3m.</li> <li>No mineral resource estimations form part of this announcement.</li> <li>Grid system is GDA94 zone 51</li> <li>The project has a nominal RL of 440m, a more accurate DTM, provided by geophysical contractors, is used for topographic control.</li> </ul>
Data spacing and distribution	<ul> <li>Data spacing for reporting of Exploration Results.</li> <li>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.</li> <li>Whether sample compositing has been applied.</li> </ul>	<ul> <li>No new drilling results being reported</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>Geophysics</li> <li>Sampling lines were oriented to best image the targeted structures (perpendicular to known trends).</li> </ul>
Sample security	The measures taken to ensure sample security.	No new drilling results being reported
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	<ul> <li>Geophysics</li> <li>Geophysical data were integrated/stitched by contract geophysical service providers</li> <li>Data was assessed for quality and fit for purpose</li> </ul>

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

	Criteria	J	ORC Code Explanation	Comme	entary				
)	Mineral tenement and land tenure	with third parties such as joint ventures,	•	All exploration	is located within Act	Western Austra ivity: Teneme		У	
	status		partnerships, overriding royalties, native title interests, historical sites, wilderness or national		Prospect	Tenement	Grant Date	Status	Owner
)		<ul> <li>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>		Everleigh	P39/5661	1/3/2017	Live	14 Mile Well Gold Pty Ltd	
)				Everleigh	P39/5436	29/1/2014	Live	14 Mile Well Gold Pty Ltd	

	Criteria	JORC Code Explanation	Comme	entary				
				Everleigh	P39/5437	29/1/2014	Live	14 Mile Well Gold Pty Ltd
				Everleigh	P39/5662	1/3/2017	Live	14 Mile Well Gold Pty Ltd
				Everleigh	P39/5663	1/3/2017	Live	14 Mile Well Gold Pty Ltd
				14 Mile Wel	Gold Pty Ltd & G	uyer Well Gold P of Iceni Gold Lir		e wholly owned subsidiaries
	Exploration done by other parties	<ul> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	•	The area bein previous explo Historical ex organisations WAMEX repo	g tested by the ex orers. ploration work h . The reports and	ploration campaigness been comp results are availal n the Independer	gn has b leted by ble in the nt Geolog	held but under-explored for Au. een inadequately drill tested by y numerous individuals and e public domain and all relevant gists Report dated March 2021
	Geology	Deposit type, geological setting and style of mineralisation.	•	Exploration is	targeting Orogeni	ic Gold and Intrus	ion Rela	ted Gold deposit styles.
						Summary of Pro	spects	
				Prospect	Host	Deposit Style		Associations
				Everleigh	Andesite - Monzogranite	Orogenic	Quartz	veining, alteration, sulphides
				Everleigh	Monzogranite - Syenite	Intrusion Related	Quartz	veining, alteration, sulphides
71	Drillhole	A summary of all information material to the	•	No new drillin	g results being rep	oorted		
	Information	<ul> <li>In summary of an minimation matching to the understanding of the exploration results including a tabulation of the following information for all Material drillholes: <ul> <li>easting and northing of the drillhole collar</li> <li>elevation or RL (Reduced Level – elevation above sea level in metres) of the drillhole collar</li> <li>dip and azimuth of the hole</li> <li>down hole length and interception depth</li> <li>hole length.</li> </ul> </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>						

Criteria	JORC Code Explanation	Commentary
Data aggregation methods	<ul> <li>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.</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>	No new drilling results being reported
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 drillhole 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 (e.g. 'down hole length, true width not known').</li> </ul>	<ul> <li>No new drilling results being reported</li> </ul>
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 drillhole collar locations and appropriate sectional views.	<ul> <li>Plan included showing the location and placement of the geophysical survey lines.</li> <li>Plan included in the announcement showing location of nugget finds and rock chip sampling at Everleigh relative to existing drilling and historic workings showing comparison with structures interpreted from integrated geophysical model.</li> </ul>
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.	No new drilling results being reported
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>	<ul> <li>Geological interpretation and review included in prospectus dated 3 Mar 2021.</li> <li>Diamond drilling at Everleigh included in announcement dated 17 Feb 2022.</li> <li>Exploration at Everleigh included in announcement dated 28 Feb 2022.</li> <li>Gold intersected in drilling at Everleigh in announcement dated 21 April 2022.</li> <li>Exploration at Everleigh included in announcement dated 4 May 2022.</li> <li>Exploration at Everleigh included in announcement dated 16 June 2022.</li> <li>Included in Noosa Mining Conference presentation dated 20 July 2022.</li> <li>Strong gold soil anomaly identified at Everleigh in announcement dated 5 Oct 2022.</li> <li>Gold intersected in Everleigh Well drilling in announcement dated 14 Oct 2022.</li> <li>Gold discovered in magnetic dolerite in announcement dated 20 Oct 2022.</li> </ul>

Criteria	JORC Code Explanation	Commentary
		<ul> <li>Nugget finds at Everleigh included in announcement dated 24 Nov 2022.</li> <li>Included in Exploration Update presentation dated 25 Nov 2022.</li> <li>Included in Exploration Update presentation dated 28 Dec 2022.</li> <li>High-grade vein discovered at Everleigh in announcement dated 22 March 2023.</li> </ul>
		<ul> <li>New geophysical data has been acquired over the Everleigh target area.</li> <li>The new data includes 31.5 line km of 2D seismic, gravity, DGPR, DEM.</li> <li>The new geophysical data has been combined with existing geophysical data sets to create an integrated geophysical model.</li> </ul>
		<ul> <li>Interpretation of the model has identified a number of known structures (Castlemaine Fault, Danjo Granite contact) and new previously unidentified structures, including two arcuate east trending seismic reflectors.</li> <li>One of these structures has been named by the Company as the Northern Reflector.</li> <li>Field work has identified a number of locations where the Northern Reflector can be</li> </ul>
		<ul> <li>observed in outcrop.</li> <li>Interrogation of the integrated geophysical model against gold distribution data sets has revealed a correlation between gold and a number of structural trends.</li> </ul>
		<ul> <li>It highlights areas with increased probability for the discovery of gold mineralisation.</li> <li>Specifically where the Northern Reflector outcrops there is a concentration of gold nuggets, historic workings and gold bearing rock chip results.</li> <li>Similarly the 200m long high-grade vein is associated with an interpreted geological</li> </ul>
		<ul> <li>contact, searching along this contact will have an increased probability of discovering extensions to the mineralized vein.</li> <li>These exploration results are highly encouraging and increase the prospectivity of the Everleigh target area.</li> </ul>
		<ul> <li>In relation to the disclosure of visual exploration results, the company cautions that the visual identification or estimates of mineral abundance should never be considered a proxy or substitute for laboratory analyses. Laboratory assay results are required to determine the size and grade of any visible mineralisation reported.</li> </ul>
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>	<ul> <li>Field validation of the integrated geophysical model is underway.</li> <li>Targeted sampling in areas of increased probability for gold mineralisation.</li> <li>Analyse results, design follow up drilling program.</li> </ul>