ADDRESS
Level 2, 22 Mount Street
Perth WA 6000
PHONE
+61 (08) 6188 8181

ABN
80 647 829 749

WEBSITE
www.lycaonresources.com

6 May 2022

Julimar HEM Review Complete

Highlights:

- **Review of helicopter electromagnetic survey (HEM) over Julimar Ni-Cu-PGE Project completed by Southern Geoscience Consultants (SGC)**

- **Targets identified represent possible bedrock conductors requiring follow up field work**

Lycaon Resources Ltd (ASX:LYN) (**Lycaon** or the **Company**) is pleased to announce the results of a helicopter electromagnetic survey (HEM) covering 164.5 line-kms over the Julimar Ni-Cu-PGE Project, 45km east of Perth, Western Australia (**Julimar Project**), Figure 1.

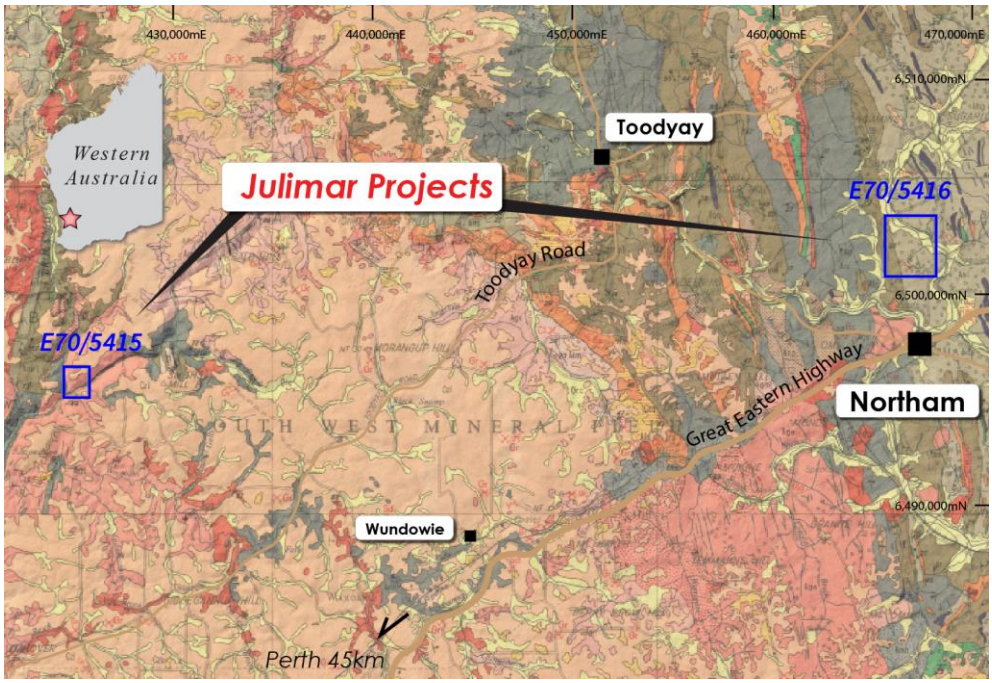

Figure 1. Lycaon Resources Julimar Project location.

Mr Thomas Langley, Technical Director commented "All of the targets delineated by the HEM survey represent possible bedrock conductors (of low priority) and require follow-up firstly with a field visit and then if deemed worthwhile, ground EM surveys in order to better refine conductor geometry and signatures to assist with robust drill targeting."

"With the end of the wet season in the Kimberley, the Company is excited to turn our attention to the Kimberley Gnewing Bore polymetallic prospect where an outcropping gossan has been mapped over 50m at surface."

"The Gnewing Bore Project is an exciting drill ready project, which has historically returned high grade gold and silver results from rock chip sampling at an outcropping gossan. The project has only had very limited exploration to date, with work focusing on the area surrounding a prominent north-northwest-trending, 50m long, significant gossanous outcrop consisting of brecciated quartz material and iron oxides after sulphides. Historical rock chip samples have returned up to 5.10 g/t Au and 105g/t Ag. A small historical drilling program returned a best result of 8m @ 0.52g/t Au from 12m from a hole drilled beneath the gossan, indicating a wide mineralisation system could be present. There remains significant potential down dip and along strike to test for high-grade mineralisation in fresh rock, which warrants further drilling."

HEM Survey Specifications and Interpretation

The airborne electromagnetic and magnetic survey was conducted by NRG using the Xcite™ system over two separate survey blocks forming part of the Julimar Project. The survey was completed during February 2022 and data quality was monitored by Southern Geoscience Consultants (SGC). The primary objective of the survey was to explore for Ni-Cu-PGE mineralisation associated with mafic and ultramafic intrusions. The Xcite™ data has been examined in detail, with key findings outlined below.

The Xcite™ data was examined and interpreted on a line-by-line basis for each area to provide a comprehensive interpretation, thus maximising the chances of identifying and defining potential conductive sources of exploration interest. Anomalies were identified and rated from the profile data and then plotted in plan view, and then conductor axes were interpreted in conjunction with the magnetic data to assist determining the strike direction and continuity of the conductors.

While the data exhibits little anomalism over E70/5415, there is a possible bedrock conductor axis in the southern portion of the block as shown in Figure 2. The conductor runs along the river, road, and rail line and could be associated with these cultural features. The south-eastern portion of the grid contains two, weak, early and mid-time conductors as a low priority target. Selected targets are described in Table 1.

Table 1. E70_5415 Xcite Targets

Target ID	East	North	Priority	Comment
5415_Xcite_1	Start: 416828	Start: 6494397	Medium	Early to mid-time anomalies along a possible bedrock conductor. However is located along drainage/rail/road.
	End: 417665	End: 6494794		
5415_Xcite_2	415618	6494496	low	Weak mid time conductor.

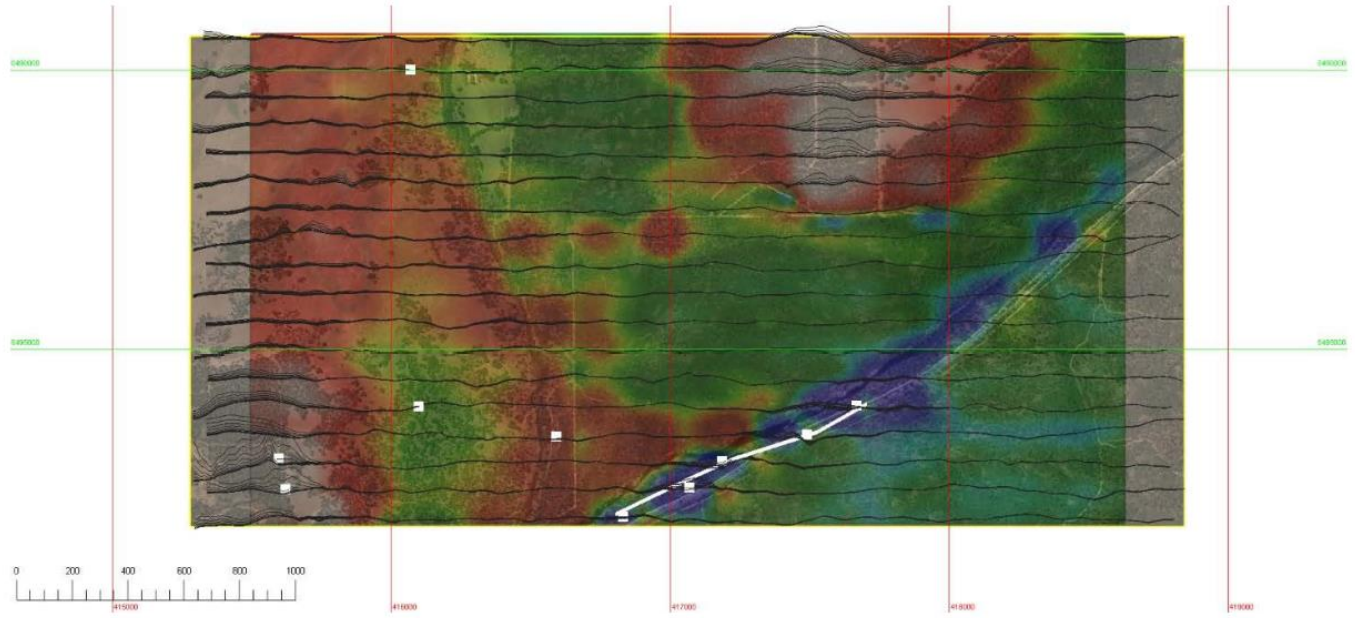

Figure 2. E70_5415 Xcite anomalies in white over dBdt channel 15 imagery.

Reviewing E70/5416, the main features in the EM data are early to mid-time conductors related to drainage and culture. A conductive river/drainage system is apparent striking from ~NW-SE, before wrapping around into the far SE corner of the grid. Figure 3 illustrates an early-time channel dB/dt image with Xcite anomalies in white. Table 2 highlights the primary XCITE anomaly defined.

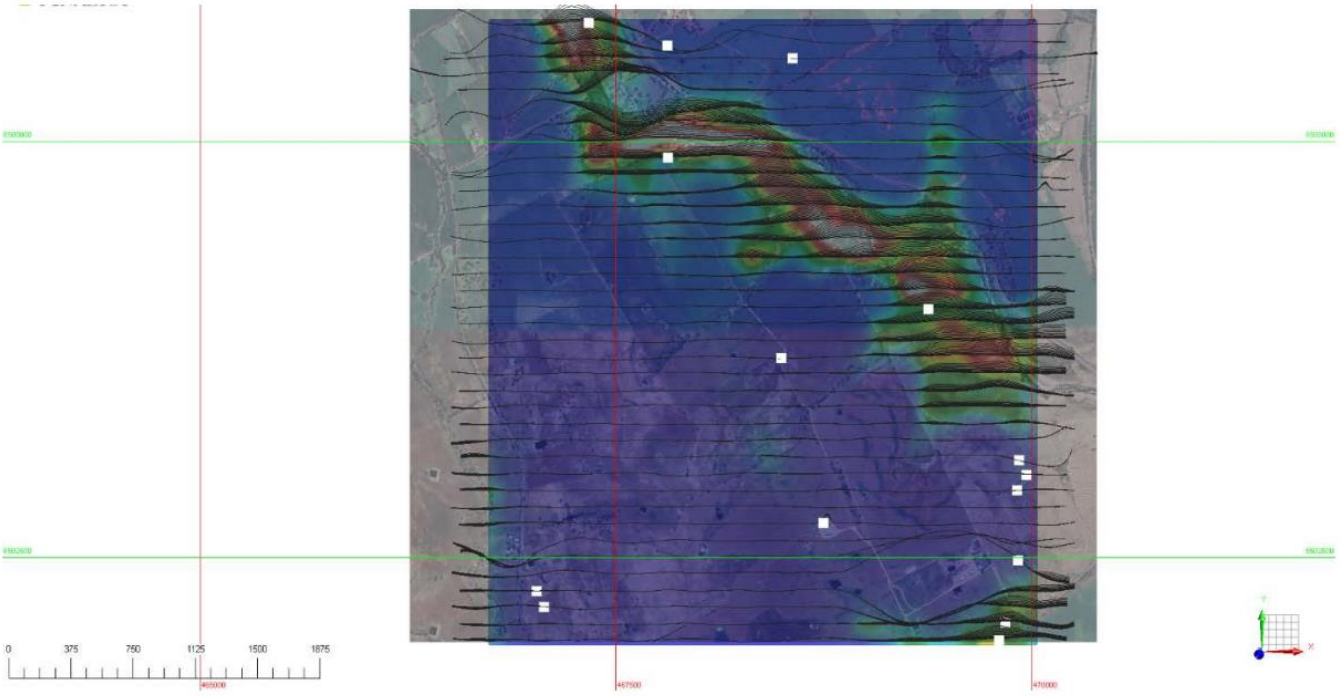

Figure 3. E70_5416 Xcite anomalies in white over dB/dt channel 25 imagery

Table 2. E70_5416 Xcite Target

Target ID	East	North	Priority	Comment
5416_Xcite_1	467062	6502201	Low	Weak, late dual peaked anomaly.

HEM Survey Conclusions and Recommendations

A total of 176 line kilometres of Xcite AEM survey data have been acquired over two separate blocks of the Julimar Project.

The western block (E70/5415), highlighted a possible bedrock conductor axis, although the EM anomaly may be related to the river/drainage/rail-road that runs alongside. Surficial drainage and cultural features dominate the early to mid-channel EM data at eastern survey block (E70/5416).

Xcite AEM surveying is believed to be an effective exploration tool for regional exploration of this style of Ni-Cu-PGE mineralisation assuming that the near surface conductive cover conditions are not limited.

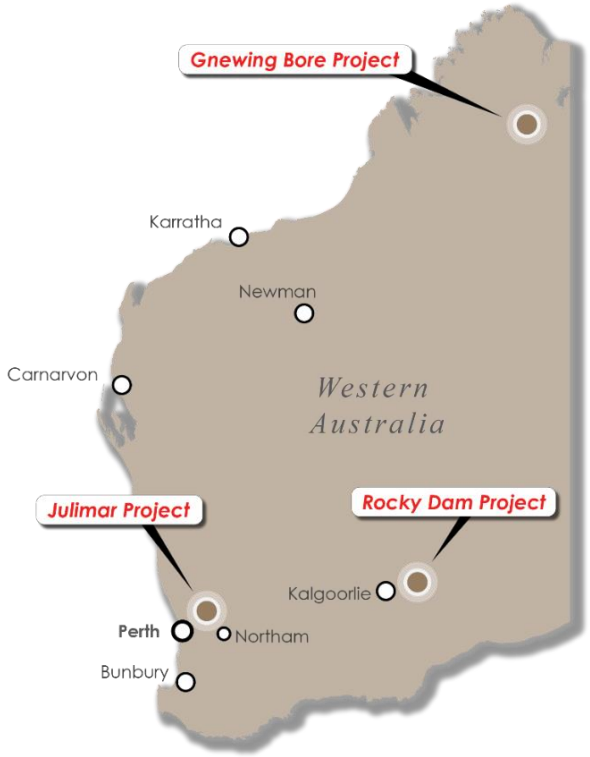

Figure 4. Lycaon Resources three major projects located in Western Australia.

This announcement has been authorised for release by the Directors of the Company.

Thomas Langley - *Technical Director*

For additional information please visit our website at www.lycaonresources.com

Competent Person's Statement

The information in this document that relates to Exploration Results, Mineral Resources or Ore Reserves is based on information compiled by Mr. Thomas Langley who is a member of the Australian Institute of Geoscientists (MAIG) and a member of the Australasian Institute of Mining and

Metallurgy (MAusIMM). Mr. Thomas Langley is a full-time employee of Lycaon Resources Limited, and is a shareholder, however Mr. Thomas Langley believes this shareholding does not create a conflict of interest, and Mr. Langley 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. Langley consents to the inclusion in this presentation of the matters based on his information in the form and context in which it appears.

The Company confirms that it is not aware of any new information or data that materially affects the information in the original reports, and that the forma and context in which the Competent Person's findings are presented have not been materially modified from the original reports.

JORC Code, 2012 Edition – Table 1 report template

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.* • *Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.* • *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.*	• No drilling was completed in this phase of works. • New Resolution Geophysics (NRG) was contracted to complete the electromagnetic and magnetic survey. • Survey data was collected with 100m line spacing. • All data was acquired with the Xcite™ system working at a base frequency of 25 Hz. • The Xcite™ system consisted of an 18.4 m diameter, four turn transmitter loop, energized with 280 A current pulses, providing a peak dipole moment of approximately 300000 NIA. • The Xcite™ system is a symmetric, in-loop type system with a concentric RX/TX geometry. • Single Sensor Scintrex CS3 magnetometer • Visual real time on-screen system monitoring / error messages to limit re-fights due to equipment failure

Criteria	JORC Code explanation	Commentary

Electromagnetic System	
Type	Xcite™
Sensor Configuration	Coincident Tx-Rx
Weight	~450kg
Structure	Fully inflatable frame
Aircraft Type	AS350B Series
Engine Type	Turbine
Fuel Type	JetA1
Transmitter	
Diameter	18.4m
Number of turns	4
Current	280A
Dipole Moment	300,000 NIA
Base Frequency	25Hz
Waveform	Nominal square wave – typically 5.4 mS ontime
Receiver	
Diameter	0.613m (effective) (X), 1.0m (Z)
Number of turns	200 (X), 100 (Z)
Orientation	X & Z axis
Configuration	Concentric to Tx
Recording	Digitally at 625 kbps
Time gates	Extracted from streamed data – Typically 24gates
Time gate windows	0.04ms to >11ms
Measurements	dB/dT & integrated B-field
Acquisition System	
Type	NRG RDAS II
CPU	Dual Core ARM 1.5Ghz
Operation Temperature	-10 to 65 Degrees C
Standard Sampling Rate	20 Hz (capable of >1kHz)
GPS Positioning	
Type	Novatel DL-V3L1L2
Differential Correction	Yes
Code Tracked	C/A
Number of Satellites	12
Recording Rate	20 Hz

<table>
<tr><th>Criteria</th><th>JORC Code explanation</th><th>Commentary</th></tr>
<tr><td></td><td></td><td>
<table>
<tr><th colspan="2">Magnetometer Counter</th></tr>
<tr><td>Type</td><td>NRG RDAC II</td></tr>
<tr><td>Internal System Noise</td><td><0.0001 nT</td></tr>
<tr><td>Adc Inputs</td><td>24</td></tr>
<tr><td>Magnetometer Inputs</td><td>4</td></tr>
<tr><td>Recording Rate</td><td>20 Hz (capable of >1kHz)</td></tr>
<tr><th colspan="2">Magnetometer Sensor</th></tr>
<tr><td>Type</td><td>Single Sensor Scintrex CS3</td></tr>
<tr><td>Measurement Range</td><td>15 000 – 105 000 nT</td></tr>
<tr><td>Gradient Tolerance</td><td>40 000 nT/m</td></tr>
<tr><td>Operating Temperature</td><td>-40 to +50 Degrees C</td></tr>
<tr><td>Recording Rate</td><td>20 Hz (capable of >1kHz)</td></tr>
<tr><th colspan="2">Laser Altimeter</th></tr>
<tr><td>Type</td><td>SF11/C (Loop) and SF00(Helli)</td></tr>
<tr><td>Range</td><td>0 – 60 m and 0 – 250m</td></tr>
<tr><td>Resolution</td><td>1cm</td></tr>
<tr><td>Recording rate</td><td>20 Hz (capable of >1kHz)</td></tr>
<tr><th colspan="2">Base Station Magnetometer</th></tr>
<tr><td>Type</td><td>NRG VER 2</td></tr>
<tr><td>Manufacturer</td><td>NRG Engineering</td></tr>
<tr><td>Range</td><td>15 000 to 105 000nT</td></tr>
<tr><td>Sensitivity Recording Rate</td><td>0.0006 nT √Hz RMS 1Hz</td></tr>
<tr><th colspan="2">Field Data Verification System</th></tr>
<tr><td>Processing Software Platforms</td><td>Geosoft Oasis Montaj and Proprietary Software</td></tr>
</table>
Modelling and interpretation of the electromagnetic and magnetic data was undertaken by Southern Geoscience Consultants Pty Ltd
</td></tr>
<tr><td>Drilling techniques</td><td>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).</td><td>No drilling undertaken.</td></tr>
<tr><td>Drill sample recovery</td><td>Method of recording and assessing core and chip sample recoveries and results assessed.
Measures taken to maximise sample recovery and ensure representative nature of the samples.
Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.</td><td>No drilling undertaken.</td></tr>
</table>

Criteria	JORC Code explanation	Commentary
Logging	• *Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.* • *Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.* • *The total length and percentage of the relevant intersections logged.*	No drilling undertaken.
Sub-sampling techniques and sample preparation	• *If core, whether cut or sawn and whether quarter, half or all core taken.* • *If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.* • *For all sample types, the nature, quality and appropriateness of the sample preparation technique.* • *Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.* • *Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.* • *Whether sample sizes are appropriate to the grain size of the material being sampled.*	No drilling undertaken.
Quality of assay data and laboratory tests	• *The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.* • *For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.* • *Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.*	No drilling undertaken.
Verification of sampling and assaying	• *The verification of significant intersections by either independent or alternative company personnel.* • *The use of twinned holes.* • *Documentation of primary data, data entry procedures, data verification,*	No drilling undertaken.

Criteria	JORC Code explanation	Commentary
	data storage (physical and electronic) protocols. • *Discuss any adjustment to assay data.*	
Location of data points	• *Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.* • *Specification of the grid system used.* • *Quality and adequacy of topographic control.*	• No drilling undertaken. • GDA94 MGA Z50.
Data spacing and distribution	• *Data spacing for reporting of Exploration Results.* • *Whether the data spacing and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied.* • *Whether sample compositing has been applied.*	The high-resolution HEM survey was completed to locate conductors that may be related to massive sulphide Ni-Cu-PGE mineralisation associated with mafic and ultramafic intrusions on the Jimperding Metapmorphic Belt, analogous to Chalice Mining's recent Gonneville discovery.
Orientation of data in relation to geological structure	• *Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.* • *If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material.*	No drilling undertaken.
Sample security	• *The measures taken to ensure sample security.*	Chain of Custody is managed by the Company's geophysical field contractor and geophysical consultants. The data is transferred daily and is QA/QC checked by a qualified geophysicist.
Audits or reviews	• *The results of any audits or reviews of sampling techniques and data.*	No audits have been completed.

Section 2 Reporting of Exploration Results

(Criteria in this section apply to all succeeding sections.)

Criteria	JORC Code explanation	Commentary
Mineral tenement and land tenure status	• *Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.* • *The security of the tenure held at the time of reporting along with any*	• The Julimar Project consists of 2 granted Exploration Licenses (E70/5415 and E70/5416). • All tenements are 100% owned by Lycaon Resources Limited. • The tenement is in good standing with no known impediments. • The Whadjuk People (WC2011/009 and WAD242/2011) Native Title Claim overlies E70/5415 and the Ballardong People (WC2000/007 and

Criteria	JORC Code explanation	Commentary
	known impediments to obtaining a licence to operate in the area.	WAD6181/1998) Native Title Claim overlies E70/5416. Both tenements lie within the jurisdiction of the South West Aboriginal Land and Sea Council. E70/5415 is located on land within the Whadjuk People Indigenous Land Use Agreement (ILUA) and E70/5416 is located on land within the Ballardong People Indigenous Land Use Agreement. There is a registered Aboriginal Heritage Site (registered Aboriginal site 15979) pertaining to the Avon River that traverses both E70/5415 and E70/5416. There are two (2) other Heritage Places within E70/5415; Site 3385 (Brockman River) and 3452 (Bullsbrook Camp). E70/5416 predominately overlies freehold titles associated predominantly with active farming properties (cereal crops, hay and livestock). Under the Mining Act (1978) freehold titles require the negotiation for land access and compensation agreements with the registered landholders prior to conducting of on-ground activities.
Exploration done by other parties	• *Acknowledgment and appraisal of exploration by other parties.*	• Historical exploration within the general project area focused on the evaluation of the region for surface bauxite deposits, little to no exploration has been undertaken for nickel-copper and platinum group elements. Work undertaken by Australian Anglo American and North Flinders Mines (North Flinders) during the 1970s identified various prospects circa the townsite of Northam. This work included the identification of the Newleyine Prospect situated 4km to the southwest of E70/5416 and the Mt Dick Prospect situated 1km north of E70/5416. North Flinders document nickel and copper geochemical anomalies associated the magnetic signatures of mafic and ultramafic rocks at the Mt Dick and Newleyine Prospect. The geochemical samples were not analysed for PGEs. WAMEX Report A018602 During 1992 to 1994, BHP Minerals Pty Ltd (BHP) explored its Northam Project for Boddington-style Au-Cu mineralisation. Initial exploration involved roadside sampling of drainages and infill soil sampling. The data is not in a digital format however it appears that a single sample (DT3736) was taken within the area pertaining to current tenement E70/5416. The area was relinquished due to the sampling returning low level geochemical results. WAMEX Report A041816, A046911 During early 2000s, Sipa Exploration NL (Sipa) explored its Ularring Rock Project (tenement E70/2337). Sipa pegged the tenement on the basis of a single laterite sample anomalous in Au and W taken during a reconnaissance laterite sampling program. Sipa focused on an area to the northeast of E70/5416, referred to as the Centre Forest where they outlined wide intersections of subeconomic Au-Cu-Bi-W mineralisation in a garnet-biotite granulite unit that lies on a granite-granulite-amphibolite contact. Mineralisation was interpreted to be syn peak

Criteria	JORC Code explanation	Commentary
		metamorphism. WAMEX Report A066830
Geology	• *Deposit type, geological setting and style of mineralisation.*	• The Julimar Project is located in the Jimperding Metamorphic belt. • The Julimar Project is considered prospective for magmatic sulphide Ni-Cu-PGE associated with a pipe like dunitic intrusive body
Drill hole Information	• *A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:* o *easting and northing of the drill hole collar* o *elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar* o *dip and azimuth of the hole* o *down hole length and interception depth* o *hole length.* • *If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case.*	No drilling undertaken.
Data aggregation methods	• *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.* • *Where aggregate intercepts incorporate short lengths of high grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail.* • *The assumptions used for any reporting of metal equivalent values should be clearly stated.*	No drilling undertaken.
Relationship between mineralisation widths and intercept lengths	• *These relationships are particularly important in the reporting of Exploration Results.* • *If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.* • *If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not*	No drilling undertaken.

Criteria	JORC Code explanation	Commentary
	known').	
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 figures within this report.
Balanced reporting	• *Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.*	• The accompanying document is a balanced report with a suitable cautionary note.
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.*	• Suitable commentary of the geology encountered are given within the text of this document.
Further work	• *The nature and scale of planned further work (eg tests for lateral extensions or depth extensions or large-scale step-out drilling).* • *Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.*	• Field visit of the low priority anomalies identified from the HEM survey, surface geochemistry and geophysical programs if warranted prior to drilling.