

**ASX Announcement** | **ASX: CPM**

26 April 2024

## Follow up RC Drilling finished on multiple Cu-Au prospects at Mt Isa East

### Highlights

- The Company has completed RC drilling on four regional Cu-Au prospects at the Mt Isa East Project including Raven, Mafic Sweats North, Mafic Sweats South and Yarraman
- In total, 12 RC drill holes for approximately 1,800m were completed, with 523 one metre samples sent to the laboratory in Mt Isa. The bulk of the samples have come from the Mafic Sweats South Prospect
- This recent round of drilling was following up a significant thickness of copper oxide mineralisation including 65m @ 0.34% Cu from surface (23MERC014) that was intersected at Mafic Sweats South in 2023<sup>1</sup>.
- The recent drilling was also designed to test for extensions to Cu-Au mineralisation intersected in 2023 at Raven and a coincident induced polarisation survey (IP) chargeability anomaly and a copper soil geochemistry anomaly at Yarraman Cu-Au Prospect<sup>1</sup>



Plate 1: RC drilling in April

**Cooper Metals Managing Director Ian Warland commented:**

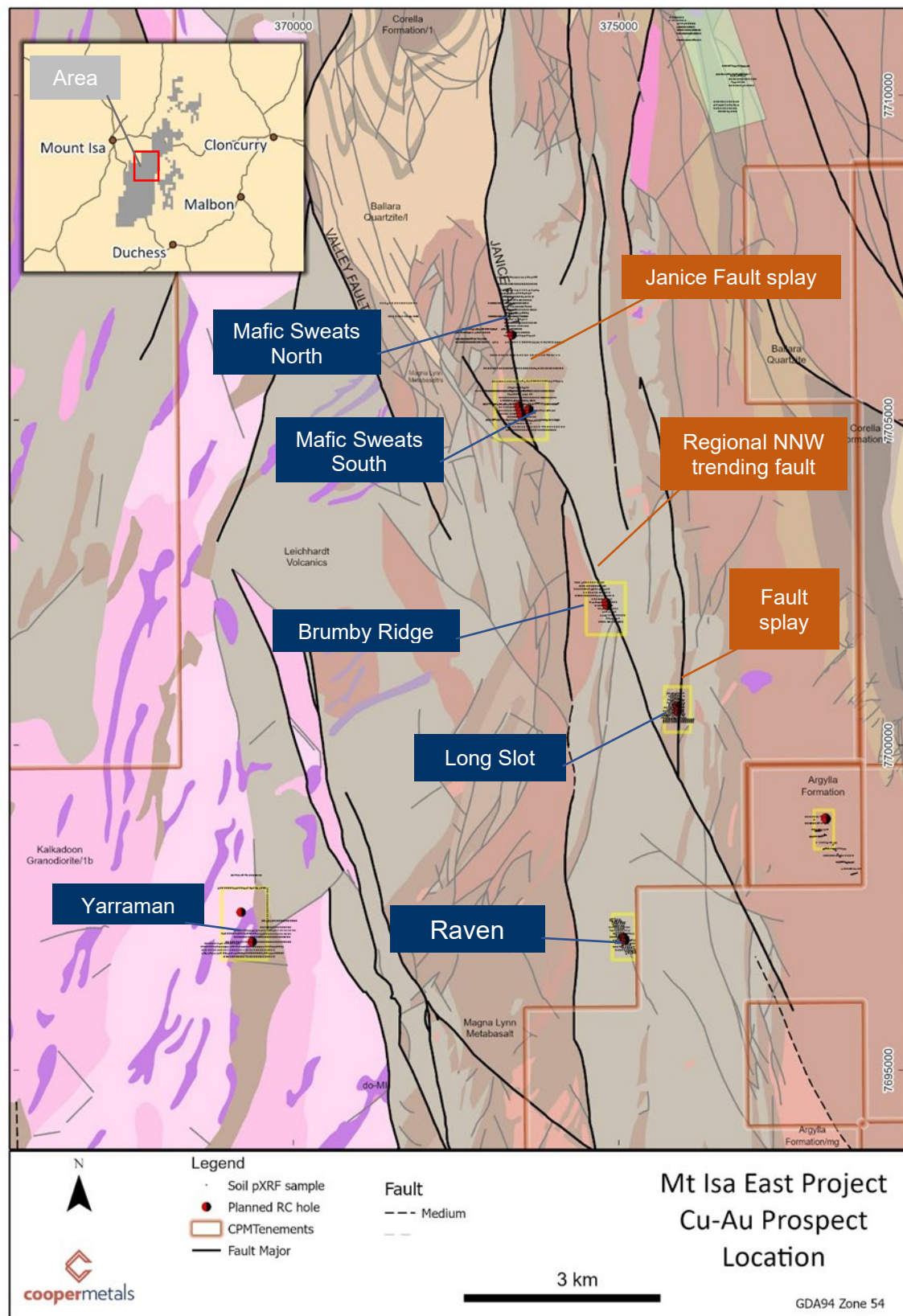
*“RC drilling was completed on all four prospects completing 12 RC holes for around 1,800m in total. Over 500 one metre samples have been selected for laboratory assay based on the presence of anomalous copper in pXRF and visual logging by a Company geologist. I’m pleased with the progress of the drilling and look forward to updating the market with the assay results once the data has been received and analysed.”*





## Background

Following on from the significant RC drilling results from 2023<sup>1</sup>, Cooper has finished follow up RC drilling at four Cu-Au Prospects (Figure 1).



**Figure 1: Prospect Location Map Mt Isa East Project**



## Regional RC Drilling Overview

In total twelve drill holes for around 1,800m were completed at four Cu-Au prospects. For more detailed information on the prospects see [ASX: CPM: 12 April 2024](#). Five hundred and twenty-three one metre samples (including QAQC) have been selected for laboratory assay based on the presence of anomalous copper (>1,000ppm Cu) in the portable XRF and/or visual logging by a company geologist. A breakdown of the drilling including the number of holes, metres and samples per prospect appears in table 1 below:

**Table 1: Drilling Summary for RC Drilling**

Prospect	Holes	Metres	Samples
Mafic Sweats North	4	444	32
Mafic Sweats South	3	519	293
Raven	4	606	72
Yarraman	1	216	126
Total	12	1785	523

The bulk of the samples have come from Mafic Sweats South Prospect where previous drilling intersected low grade copper oxide mineralisation from surface including **65m @ 0.34 % Cu<sup>1</sup>**. The follow-up drilling was testing deeper and along strike from the 2023 drill holes<sup>1</sup>.

## Next Steps

- Interpret assays and plan follow-up exploration
- Ongoing investigation into Brumby Ridge prospectivity

The Board of Cooper Metals Limited has approved this announcement and authorised its release on the ASX.

## For further information:

Ian Warland

Managing Director

[ian@coopermetals.com.au](mailto:ian@coopermetals.com.au)

M: 0410 504 272

[www.coopermetals.com.au](http://www.coopermetals.com.au)

## COMPETENT PERSON'S STATEMENT:

*The information in this report that relates to Geological Interpretation and Exploration Results is based on information compiled by Ian Warland, a Competent Person who is a Member of The Australian Institute of Geoscientists. Mr Warland is employed by Cooper Metals Limited. Mr Warland has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken 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 Warland consents to the inclusion in the report of the matters based on his information and the form and context in which it appears.*

## Reference

1. ASX CPM: 12 April 2024: Follow up RC Drilling commences on multiple Cu-Au prospects at Mt Isa East

## About Cooper Metals Limited

Cooper Metals Ltd (ASX: CPM) is an ASX-listed explorer with a focus on copper and gold exploration. CPM aims to build shareholder wealth through discovery of mineral deposits. The Company has three projects all in proven mineralised terrains with access to infrastructure. The Projects are detailed briefly below:

### Mt Isa East Project (Qld)

Cooper Metal's flag ship Mt Isa East Cu-Au Project covers ~1600 sq.km of tenure with numerous historical Cu-Au workings and prospects already identified for immediate follow up exploration. The Mt Isa Inlier is highly prospective for iron oxide copper gold (IOCG), iron sulphide copper gold (ISCG) and shear hosted Cu +/- Au deposits.







**APPENDIX 1: The following tables are provided to ensure compliance with JORC Code (2012) requirements for exploration results for the Mt Isa East Project in Qld.**

**1.1. Section 1 Sampling Techniques and Data to update**

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

Criteria	JORC Code explanation	Commentary
<b>Sampling techniques</b>	<ul style="list-style-type: none"> <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 30 g charge for fire assay'). In other cases more explanation may be required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information.</li> </ul>	<p><b>CPM RC Drilling</b></p> <ul style="list-style-type: none"> <li>No drill assays are available for this drill program yet and hence no assay results are reported.</li> <li>The drilling was conducted by Bullion Drilling Pty Ltd</li> </ul> <p><b>Sample Representativity</b></p> <ul style="list-style-type: none"> <li>No assay results are reported in this release.</li> <li>A Niton XL5 portable XRF is available to aid geological interpretation and sample selection. No XRF results are reported for drilling.</li> </ul>
<b>Drilling techniques</b>	<ul style="list-style-type: none"> <li>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).</li> </ul>	<ul style="list-style-type: none"> <li>The RC drilling was completed using a Schramm 450WS rotary drill rig, with maximum air 350psi/900cfm was used to drill holes reported herein. An auxiliary IR air compressor 350psi/1070cfm was also utilised.</li> <li>Drilling diameter is 5.75-inch RC hammer.</li> <li>Face sampling bits are used.</li> </ul>
<b>Drill sample recovery</b>	<ul style="list-style-type: none"> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.</li> </ul>	<ul style="list-style-type: none"> <li>Sample recovery, and contamination are noted in a Toughbook computer by CPM field personnel.</li> <li>No significant sample loss, contamination or bias has been noted in the current drilling. A cone splitter is mounted beneath the cyclone to ensure representative samples are collected.</li> <li>The cyclone and cone splitter are cleaned as necessary to minimise contamination.</li> <li>No significant sample loss, contamination or bias has been noted in the current drilling.</li> </ul>
<b>Logging</b>	<ul style="list-style-type: none"> <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> </ul>	<ul style="list-style-type: none"> <li>Geological logging has been routinely undertaken by suitably qualified geologists on all RC and diamond holes along the entire length of the hole recording lithology, mineralogy, veining, alteration, weathering, structure, and other sample features as appropriate to the style of deposit. Observations were recorded in a Toughbook computer appropriate to the drilling and sample return method and is quantitative, based on visual field estimates.</li> <li>Observations were recorded appropriate to the sample type based on visual field estimates of sulphide content and sulphide mineral species.</li> </ul>



Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> <li>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</li> </ul>	<ul style="list-style-type: none"> <li>During the RC logging process Copper Metals Ltd routinely retained representative samples (stored in chip trays) for future reference. The RC chip trays are photographed and electronically stored.</li> </ul>
	<ul style="list-style-type: none"> <li>The total length and percentage of the relevant intersections logged.</li> </ul>	<ul style="list-style-type: none"> <li>Every metre sample of RC and diamond drilling is logged by the geologist.</li> <li>Observations were recorded appropriate to the sample type based on visual field estimates.</li> </ul>
<b>Sub-sampling techniques and sample preparation</b>	<ul style="list-style-type: none"> <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 sub-sampling stages to maximise representivity 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>	<ul style="list-style-type: none"> <li><b>Note assays are pending, no assay results in this release.</b></li> </ul>
<b>Quality of assay data and laboratory tests</b>	<ul style="list-style-type: none"> <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 (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.</li> </ul>	<ul style="list-style-type: none"> <li>A Niton XL5 portable XRF is available to aid geological interpretation and sample selection. No XRF results are reported for drilling.</li> <li><b>No assays reported in this release, method described below for submitted samples to ALS</b></li> </ul>
<b>Verification of sampling and assaying</b>	<ul style="list-style-type: none"> <li>The verification of significant intersections by either independent or alternative company personnel.</li> </ul>	<ul style="list-style-type: none"> <li>A complete record of logging, sampling and assays were stored within an Access Database including digital assay sheets obtained from ALS.</li> </ul>
	<ul style="list-style-type: none"> <li>The use of twinned holes.</li> </ul>	<ul style="list-style-type: none"> <li>No specific twinning program has been conducted, given the early-stage of the project.</li> </ul>
	<ul style="list-style-type: none"> <li>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</li> </ul>	<ul style="list-style-type: none"> <li>The sample data has been validated against the logging for all RC holes and were directly input onto electronic spread sheets and validated by the database manager. All data is digitally recorded</li> </ul>
	<ul style="list-style-type: none"> <li>Discuss any adjustment to assay data.</li> </ul>	<ul style="list-style-type: none"> <li>No adjustments to the data.</li> </ul>
<b>Location of data points</b>	<ul style="list-style-type: none"> <li>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.</li> <li>Specification of the grid system used.</li> <li>Quality and adequacy of topographic control.</li> </ul>	<ul style="list-style-type: none"> <li>A hand-held GPS has been used to determine all collar locations at this stage.</li> <li>The grid system is MGA_GDA94, zone 54 for easting, northing and RL.</li> <li>Down hole surveying is routinely employed through the drilling campaign. All holes were downhole surveyed by Axis champ</li> </ul>



Criteria	JORC Code explanation	Commentary
		<p>gyro tool at nominal 30m spacing down hole. Drill core is orientated using a reflex Act III orientation tool operated by the drillers.</p> <ul style="list-style-type: none"> <li>At this stage the RL of the collar is taken from the handheld GPS, this will be corrected with the local topographic surface (SRTM 1m topographic data) will be used to generate the RL of most of the collars, given the large errors obtained by GPS (<math>\pm 10</math>m). Zone 54.</li> </ul>
<b>Data spacing and distribution</b>	<ul style="list-style-type: none"> <li>Data spacing for reporting of Exploration Results.</li> </ul>	<ul style="list-style-type: none"> <li>Drill spacing is determined by the stage of exploration of the prospect. The prospect has been drilled with a wide drill hole spacing required at this stage to determine the merit of the prospect and produce a reliable interval.</li> <li>No sample compositing has been applied to the data.</li> </ul>
	<ul style="list-style-type: none"> <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> </ul>	<ul style="list-style-type: none"> <li>The drillhole spacing is appropriate for early-stage exploration only, and not considered sufficient for Resource or Reserve estimation.</li> <li>The true thickness, grade continuity along strike and down dip is unknown at this time and will require more detailed drilling.</li> </ul>
	<ul style="list-style-type: none"> <li>Whether sample compositing has been applied.</li> </ul>	<ul style="list-style-type: none"> <li>No sample compositing applied.</li> </ul>
<b>Orientation of data in relation to geological structure</b>	<ul style="list-style-type: none"> <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 style="list-style-type: none"> <li>Generally, the orientation is considered appropriate. No sampling bias is considered to have been introduced, however the geological model is still evolving, and localised orientation of mineralisation may vary along strike.</li> </ul>
<b>Sample security</b>	<ul style="list-style-type: none"> <li>The measures taken to ensure sample security.</li> </ul>	<ul style="list-style-type: none"> <li>Sample security adopted by Cooper Metals Ltd was based on responsibility and documentation of site personal with the appropriate experience and knowledge to maintain sample chain of custody protocols from site to lab.</li> </ul>
<b>Audits or reviews</b>	<ul style="list-style-type: none"> <li>The results of any audits or reviews of sampling techniques and data.</li> </ul>	<ul style="list-style-type: none"> <li>No audits or reviews undertaken.</li> </ul>

## Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
<b>Mineral tenement and land tenure status</b>	<ul style="list-style-type: none"> <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> </ul>	<ul style="list-style-type: none"> <li>The Mt Isa East project is centred around 50 km south-east of Mount Isa. The drilling reported here took place at the Yarraman, Mafic Sweats South and Mafic Sweats Northa and Raven Prospects which are located within EPM 27700.</li> <li>The tenements (specifically EPM 27700) referred to in this release are held jointly by Revolution Mining Pty Ltd (15%) and Cooper Metals Ltd (85%).</li> </ul>



Criteria	JORC Code explanation	Commentary
	<ul style="list-style-type: none"> <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 style="list-style-type: none"> <li>The tenements are secure under Qld legislation.</li> </ul>
<b>Exploration done by other parties</b>	<ul style="list-style-type: none"> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	<ul style="list-style-type: none"> <li>There has been limited previous exploration of copper-gold mineralisation has occurred on these prospects.</li> </ul>
<b>Geology</b>	<ul style="list-style-type: none"> <li>Deposit type, geological setting and style of mineralisation.</li> </ul>	<ul style="list-style-type: none"> <li>The Mt Isa East Project is located within the Mt Isa Inlier. The EPM 27700 tenement straddles a major geological boundary between the Kalkadoon-Leichhardt Belt to the west and the Eastern Fold Belt to the east.</li> <li>The adopted exploration model for the Mt Isa East tenements targets the IOCG model and low-tonnage, high grade, shear-hosted deposits.</li> </ul>
<b>Drill hole Information</b>	<ul style="list-style-type: none"> <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 style="list-style-type: none"> <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> <li>If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case.</li> </ul>	<ul style="list-style-type: none"> <li>No assay information is available at time of writing</li> </ul>
<b>Data aggregation methods</b>	<ul style="list-style-type: none"> <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> </ul>	<ul style="list-style-type: none"> <li>No assay results reported</li> </ul>
	<ul style="list-style-type: none"> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>	<ul style="list-style-type: none"> <li>No assay results reported</li> </ul>
<b>Relationship between mineralisation widths and intercept lengths</b>	<ul style="list-style-type: none"> <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 (e.g., 'down hole length, true width not known').</li> </ul>	<ul style="list-style-type: none"> <li>No assay results reported</li> <li>The azimuth and dip data for all holes is presented in Appendix 1. Most holes have been drilled at angles approximating -55° dip on the interpretation of steeply dipping mineralised horizon and approximately perpendicular to the strike of the expected mineralised zone.</li> <li>The nature and dip of the mineralisation are still being evaluated.</li> <li>True widths and downhole widths are not reported in this release.</li> </ul>
<b>Diagrams</b>	<ul style="list-style-type: none"> <li>Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being</li> </ul>	<ul style="list-style-type: none"> <li>No drill hole locations are reported in this release</li> </ul>





Criteria	JORC Code explanation	Commentary
	reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views.	
<b>Balanced reporting</b>	<ul style="list-style-type: none"> <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 avoiding misleading reporting of Exploration Results.</li> </ul>	<ul style="list-style-type: none"> <li>No drill hole information is reported in this release as assays are pending</li> </ul>
<b>Other substantive exploration data</b>	<ul style="list-style-type: none"> <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 style="list-style-type: none"> <li>First pass geochemical sampling (rock chip) was conducted by Cooper Metals under the current tenure in 2023.</li> <li>RC drilling was conducted in 2023 at Yarraman, Mafic Sweats South and Raven.</li> <li>DHEM was completed at Raven in 2023</li> <li>An induced polarisation survey was completed at Yarraman in early 2024</li> <li>Assay results from the drilling will be reported on receipt of the results</li> </ul>
<b>Further work</b>	<ul style="list-style-type: none"> <li>The nature and scale of planned further work (e.g., tests for lateral extensions or depth extensions or large-scale step-out drilling).</li> </ul>	<ul style="list-style-type: none"> <li>Early-stage exploration and follow-up of identified Cu and Au anomalies including additional interpretation of geophysical data, reviews and assessments of regional targets, and infill geochemical sampling of ranked anomalies in preparation for future drill testing.</li> <li>Assay results are pending se main body of this report</li> </ul>
	<ul style="list-style-type: none"> <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 style="list-style-type: none"> <li>Refer to the figures in this report.</li> </ul>