

26 September 2023 ASX Release

AIRBORNE MAGNETIC SURVEY AT COPPERHEAD PROJECT IDENTIFIES POTENTIAL COPPER, RARE EARTH & Ni-Cu-PGE TARGETS

Survey Highlights Potential New Copper-REE and Ni-Cu-PGE styles of Mineralisation

HIGHLIGHTS

- Aeromagnetic and radiometric survey over E08/3369 and E08/3001 has identified extensive basemetal and rare earth potential targets.
- Numerous faults have been identified which are similar in occurrence to the Money Intrusion Dyke
 which hosts Ni-Cu-PGE occurrences to the southeast of the project, which is being explored by
 Dreadnought Resources Ltd (ASX:DRE). The largest NE-SW striking fault has a length over 17.8km
 spanning both Exploration Licence areas.
- Fourteen (14) extensive copper anomalies defined from examination of the magnetic, radiometric and wide spaced AEM in comparison to the historical copper occurrences and recent rock chip sampling.
- Eight (8) prospective rare earth (REE) anomalies have been defined. These are all radiometric (uranium) anomalies associated with magnetic responses representing potential ironstone dykes or ironstones.
- The impressive results from the survey are listed below:
 - Several NE-SW striking faults are more evident across the project and represent late-stage features. These may also be preferential sites for dolerite and or intrusive gabbroic dykes, similar to the Money Intrusion which hosts Ni-Cu-PGE occurrences.
 - Majority of the known copper occurrences are associated with or close to anomalous uranium responses which has been used to define more prospective targets for copper mineralisation.
 - Anomaly C (a) and (b) copper prospects are located in close proximity to a strong stratigraphic magnetic response within the Discovery Formation and close to a NE-SW trending structure.
 - Distinct uranium responses are evident around and extending from the Prospect Anomaly A and C copper occurrences defining clear zones up to 1km in length. These along with additional anomalous uranium zones correlate with the Discovery Formation, and recent rock chip samples from local ironstones which returned anomalous copper and zinc.
 - Untested Copper Targets south from the Anomaly A Copper Prospect range between 1,000m to 1,700m in length and will be systematically followed up during the next reconnaissance program.
- Argent will be completing a detail rock chip sampling over E08/3463 to further investigate the high tenor lithium anomalies defined by the July 2023 sampling within the classified LCT-enriched pegmatites.



Argent Minerals Limited (ASX: ARD) ("Argent" or "the Company") is pleased to announce the results of the aeromagnetic and radiometric survey completed over its 100%-owned Copperhead Ag-Cu-Pb-Zn and Rare Earth Project in Western Australia. A detailed 50m line spaced aeromagnetic survey was commissioned over adjacent tenements E08/3369 and E08/3001 to improve the resolution of magnetic and radiometric data over the area and to assist in defining copper and REE targets within the project.

Argent Managing Director Mr Pedro Kastellorizos commented:

"We are pleased to have completed the first closely spaced airborne geophysics survey over our Copperhead Project. The results have highlighted potential and previously unknown base-metal, REE and Ni-Cu-PGE (Money Intrusion Dyke style of mineralisation) target anomalies. Based on the new findings from the geophysics program, we have now refined our targets based on geophysics, geochemistry, geology and structural interpretation. The results have further expanded and upgraded the prospectivity which further supports ongoing ground exploration to systemically explore these areas".

"During our next ground exploration program, we will complete further testing on the different styles of mineralisation varying from SEDEX deposits, Sediment-hosted Stratiform Copper (SSC) deposits and LCT style lithium-tantalum mineralisation throughout our Project areas".

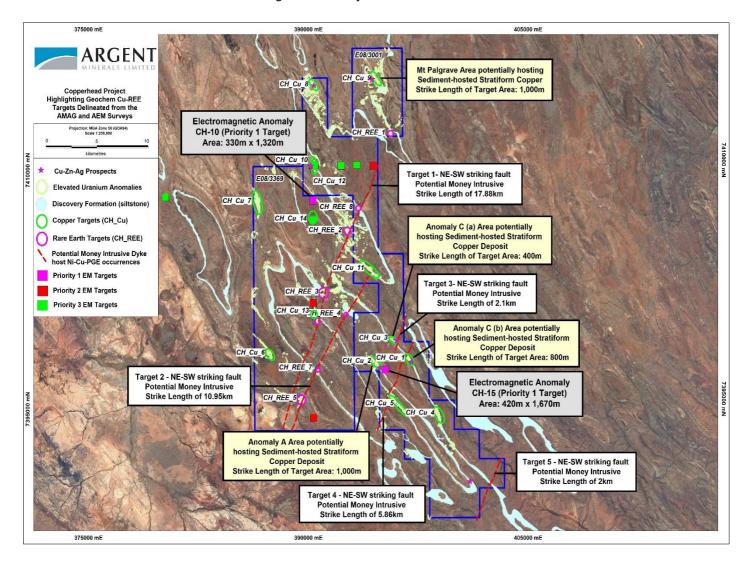


Figure 1 – Highlighting the various Sediment hosted Stratiform Copper, REE, potential Money Intrusive Dykes and Electro-magnetic targets zones

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Geology and Prospectivity

The Discovery Formation is considered a regional marker horizon with a dominant primary lithology comprising silicified carbonaceous siltstone (Martin et al, 2005). The lithologies are regionally deformed into a number of open and tight folds as anticlines and synclines and has been called the Edmund Fold Belt in some historical papers (Muhling et al 1985).

The Kiangi Creek and Discovery Formations are major targets for sediment-hosted stratiform base-metal deposits, and hosts strata-bound copper and zinc mineralisation at Mount Palgrave and Illirie Bore, which are both contained within the Project tenements. The most common copper minerals are malachite and azurite, which are mainly present in thin bedding- parallel seams and along late-stage fractures. The late-stage fractures appear to feed stratiform zones in siltstone and fine to very fine grained planar-laminated sandstone. Copper mineralization is also associated with thin beds rich in hematite and goethite pseudomorphs after pyrite (Martin et al, 2005).

The northwest project tenement contains a monzogranite of the Duralcher Supersuite, which is also hosts Hastings Technology Metals' (ASX: HAS), Yangibana REE deposit located adjacent to the Project tenements in the south. This northwestern tenement also contains mapped pegmatite dykes which are considered prospective for REE. There are no known nickel occurrences within the Project however there may be potential for Ni-Cu-PGE mineralisation similar to Dreadnought's Money Intrusion located 25km to the southwest.

AMAG Survey Details

The project area has not previously been subject to high resolution AMAG surveys, with only partial coverage from 200m company and 400m government line spaced surveys. The new AMAG survey was completed by Magspec Airborne Surveys from 13th to 19th July 2023, using Maroonah Station, WA as a base. The survey flight lines were flown at 50m spacings oriented 060-240° with tie lines at 500m spacings at 150-330° at a nominal 30m flying height AGL.

Results from the AMAG Survey

The Discovery Formation generally provides a uranium rich response with some intermixing of potassium resulting in blue to pinky/purple colours. Elevated potassium may reflect potassic alteration which can be an indicator of base metal mineralisation or reflect a likely igneous source of the basin sediments.

Several NE-SW striking faults are more clearly evident across the project and represent late-stage features. These may also be preferential sites for dolerite and or intrusive gabbroic dykes similar to the Money Intrusion, which hosts Ni-Cu-PGE occurrences to the southeast of the project and is being explored by Dreadnought Resources (Figure 1).

The known copper occurrences within the project appears to be preferentially located along carbonaceous and pyritic shales of the Discovery and Kiangi Creek Formations oriented along or close to faults. The occurrences are not generally associated with magnetic anomalies, however Anomaly C (a) and (b) Prospects are located in close proximity to a strong stratigraphic magnetic response within the Discovery Formation and close to a NE-SW trending structure. This horizon is considered prospective along its length with recent sampling returning elevated silver, copper and zinc (CH104 & CH106) from ironstone outcrops (Figure 2). Other copper occurrences within the project (Mt Palgrave SW, Prospect 3A, Anomaly A) lie close to weak magnetic trends and responses that define lithological boundaries between the Discovery and underlying Kiangi Creek Formation, and possible zones of alteration (Prospect 1).



The known Copper occurrences generally are located within higher uranium responses of the Discovery and Kiangi Creek Formations. This may reflect shales/carbonaceous rich rocks scavenging uranium and be representative of base metal alteration. Distinct uranium responses are evident around and extending from the Anomaly A and copper occurrences define clear zones up to 1,000m in length (Figure 2), along with additional anomalous uranium zones which correlate with the Discovery Formation, and recent rock chip samples from local ironstones which have returned anomalous copper. The historical copper occurrences in the north of the project tenements also display an affinity to elevated uranium anomalism, with the strongest response in a fold nose to the north of Prospect 1 and adjacent to Mt Palgrave (Figure 1). As such the combination of structure, magnetic and uranium responses may provide a targeting tool for base metal mineralisation.

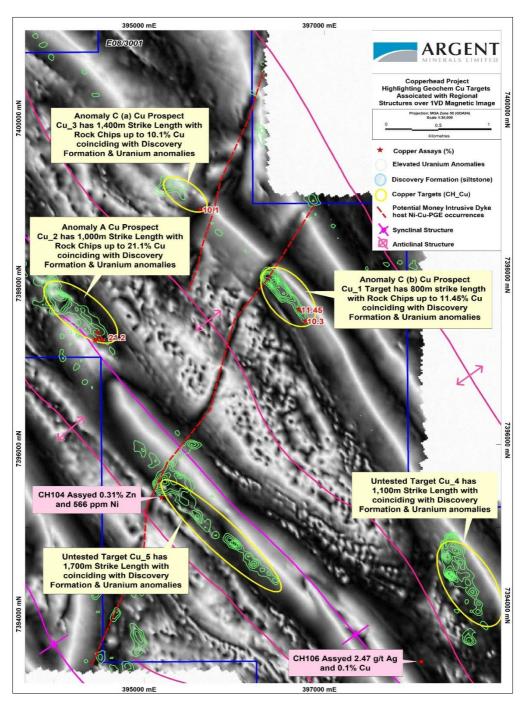


Figure 2 - TMI RTP 1VD image with Copper Targets, Uranium anomaly contours and Discovery Formation, regional structures, and recent copper rock chip assays

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Targets

Examination of the magnetic, radiometric and wide spaced airborne electromagnetic (AEM) targets in comparison to the historical copper occurrence and recent rock chip sampling has defined 14 anomalies of interest (Refer to Table 1 and Figure 1).

The high rank targets are associated with the known copper occurrences which have returned high-grade copper in rock chips along with anomalous Pb and Zn. The 2022 reconnaissance sampling at Mt Palgrave also returned 21.1% Cu in rock chips sampling at Mt Palgrave (ARD ASX Announcement 1 February 2023: High-grade copper confirmed at Gascoyne Copper Project). Mt Palgrave SW and Prospect 3A are considered the most prospective as they are also associated with Airborne EM responses.

In addition to the base metal targets, 8 anomalies considered prospective for REE have been defined. These are all radiometric anomalies (uranium) associated with magnetic responses representing potential ironstone dykes or ironstones (refer to Table 2 and Figures 1 and 3).

Table 1 – Copperhead Copper Target Anomalies							
Target	Easting	Northing	Rank	Length of Anomaly	Geology	Anomaly	Prospect Id
CH_Cu_1	396599	7397787	1	800m	Kiangi Creek/Discovery Formation	Uranium, Magnetic	Anomaly C (b)
CH_Cu_2	394298	7397604	1	1,000m	Kiangi Creek Formation	Uranium, Magnetic	Anomaly A
CH_Cu_3	395457	7399026	1	400m	Kiangi Creek/Discovery Formation	Uranium, Magnetic	Anomaly C (a)
CH_Cu_4	398613	7394315	2	1,100m	Discovery Formation	Uranium along strike Anomaly C	NA
CH_Cu_5	395855	7394898	2	1,700m	Kiangi Creek/Discovery Formation	1.6km Uranium trend/Magnetic	CH104 on NW
CH_Cu_6	387082	7398096	3	700m	Gooragoora Formation	Uranium fold nose	
CH_Cu_7	386214	7407666	3	1,500m	Blue Billy Formation	Uranium along magnetic unit	NA
CH_Cu_8	390050	7415053	2	850m	Discovery Formation	Uranium weak AMAG alteration	Prospect 1
CH_Cu_9	394311	7415440	2	1,040m	Discovery Formation	Uranium/Magnetic	Mt Palgrave
CH_Cu_10	390017	7410273	1	400m	Kiangi Creek/Discovery Formation	AEM, Uranium	Mt Palgrave SW
CH_Cu_11	393858	7403475	2	1,400m	Discovery Formation	Uranium, Magnetic	NA
CH_Cu_12	390032	7409774	1	200m	Kiangi Creek/Discovery Formation	AEM, Uranium	Prospect 3A
CH_Cu_13	390002	7400672	2	700m	Discovery Formation	Uranium, Magnetic	CH101
CH_Cu_14	389997	7406485	3	200m	Devil Creek Formation	AEM	NE of CH093

Table 2 – Copperhead REE Target Anomalies			
Target	Easting	Northing	Comment
CH_REE_1	395298	7412000	Discrete uranium response close to ironstone and CH080
CH_REE_2	392348	7405872	Discrete uranium response along NE dyke/structure
CH_REE_3	390739	7401978	Discrete uranium response along NE dyke/structure, Air photo Colour Anomaly
CH_REE_4	392264	7400615	Discrete uranium response along NE dyke/structure
CH_REE_5	389222	7395262	Discrete uranium response along NE dyke/structure close to ironstone CH078
CH_REE_6	390294	7400205	Discrete uranium response along NE dyke/structure, down strike from CH101
CH_REE_7	390344	7397148	Discrete uranium response along NE dyke/structure,
			Air photo Colour Anomaly
CH_REE_8	393104	7407305	Discrete uranium response along NE dyke/structure,
			Air photo Colour Anomaly



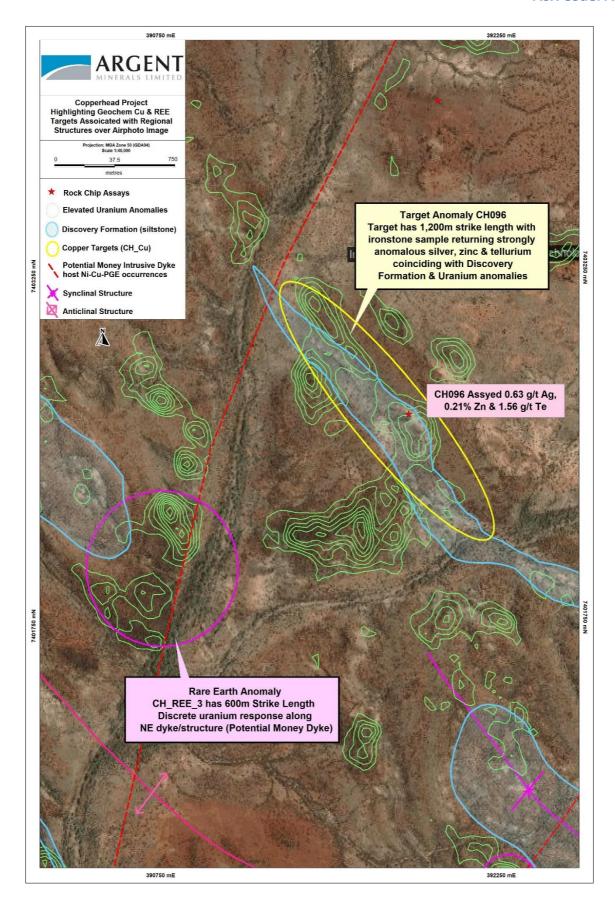


Figure 3 – Rare earth and copper Targets closely associated with uranium anomalies hosted Discovery Formation, regional structures, and recent rock chip assays

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Forward Plan and Next Steps

The new aeromagnetic survey has greatly improved the magnetic and radiometric resolution within the project area. The results indicate the known copper occurrences are not generally associated with magnetic anomalies; however, they always appear to be preferentially located within or bounded by the Discovery and Kiangi Creek Formations which provides a distinct radiometric response.

All target areas will be further investigated by ground follow up through helicopter support in the upcoming weeks. The company is seeking to expand the copper and rare earth footprint by surface rock chip testing over all defined anomalies and verifying the uranium anomalism associated with copper mineralisation. Also, detail rock chip sampling over E08/3463 will further investigate the high tenor lithium anomalies defined by the July 2023 sampling within the classified LCT-enriched pegmatites.

This ASX announcement has been authorised for release by the Managing Director of Argent Minerals Limited.

-ENDS-

For further information, please contact:

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Competent Persons Statement

The information in this report that relates to Exploration Targets and Exploration Results is based on information compiled by Pedro Kastellorizos. Mr. Kastellorizos is the Managing Director/CEO of Argent Minerals Limited and is a Member of the AuslMM of whom have sufficient experience relevant to the styles of mineralisation under consideration and to the activity being reported 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. Kastellorizos has verified the data disclosed in this release and consent to the inclusion in this release of the matters based on the information in the form and context in which it appears.

Forward Statement

This news release contains "forward-looking information" within the meaning of applicable securities laws. Generally, any statements that are not historical facts may contain forward-looking information, and forward looking information can be identified by the use of forward-looking terminology such as "plans", "expects" or "does not expect", "is expected", "budget" "scheduled", "estimates", "forecasts", "intends", "anticipates" or "does not anticipate", or "believes", or variations of such words and phrases or indicates that certain actions, events or results "may", "could", "would", "might" or "will be" taken, "occur" or "be achieved." Forward-looking information is based on certain factors and assumptions management believes to be reasonable at the time such statements are made, including but not limited to, continued exploration activities, commodity prices, the estimation of initial and sustaining capital requirements, the estimation of labour costs, the estimation of mineral reserves and resources, assumptions with respect to currency fluctuations, the timing and amount of future exploration and development expenditures, receipt of required regulatory approvals, the availability of necessary financing for the project, permitting and such other assumptions and factors as set out herein.

Forward-looking information is subject to known and unknown risks, uncertainties and other factors that may cause the actual results, level of activity, performance or achievements of the Company to be materially different from those expressed or implied by such forward-looking information, including but not limited to: risks related to changes in commodity prices; sources and cost of power and water for the Project; the estimation of initial capital requirements; the lack of historical operations; the estimation of labour costs; general global markets and economic conditions; risks associated with exploration of mineral deposits; the estimation of initial targeted mineral resource tonnage and grade for the project; risks associated with uninsurable risks arising during the course of exploration; risks associated with currency fluctuations; environmental risks; competition faced in securing experienced personnel; access to adequate infrastructure to support exploration activities; risks associated with changes in the mining regulatory regime governing the Company and the Project; completion of the environmental assessment process; risks related to regulatory and permitting delays; risks related to potential conflicts of interest; the reliance on key personnel; financing, capitalisation and liquidity risks including the risk that the financing necessary to fund continued exploration and development activities at the project may not be available on satisfactory terms, or at all; the risk of potential dilution through the issuance of additional common shares of the Company; the risk of litigation.

Although the Company has attempted to identify important factors that cause results not to be as anticipated, estimated or intended, there can be no assurance that such forward-looking information will prove to be accurate, as actual results and future events could differ materially from those anticipated in such information. Accordingly, readers should not place undue reliance on forward-looking information. Forward looking information is made as of the date of this announcement and the Company does not undertake to update or revise any forward-looking information this is included herein, except in accordance with applicable securities laws.

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References

For further information please refer to previous ASX announcement from Argent Minerals Ltd

ARD ASX Announcement 1 February 2023: High-grade copper confirmed at Gascoyne Copper Project
ARD ASX Announcement 8 February 2023: More High-Grade Copper Delineated at Copperhead Project
ARD ASX Announcement 20 April 2023: New EM Targets Enhances Exploration at Copperhead
ARD ASX Announcement 14 September 2023: Exploration Potential Confirmed at Copperhead

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Core Geophysics: Copperhead Project, WA – Geophysics Review. October Memorandum to Argent Minerals October 2022.

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Muggeridge, M. 2009. Ullawarra Project E09/1020, 1448 and E08/1405. Combined Annual Report Year Ending 31 December 2008. Paramount Mining Corporation. DMIRS Open File Report A81105.

Martin, D. McB., Sheppard, S., and Thorne, A. M., Geology of the Maroonah, Ullawarra, Capricorn, Mangaroon, Edmund, and Elliott Creek 1:100 000 sheets: Western Australia Geological Survey, 1:100 000 Geological Series Explanatory Notes, 65p

Muhling, P. C., and Brakel, A. T., 1985, Geology of the Bangemall Group — the evolution of an intracratonic Proterozoic basin: Western Australia Geological Survey, Bulletin 128, 266p.



About Argent Minerals Ltd (ASX: ARD)

Argent Minerals Limited is an ASX listed public company focused on creating shareholder wealth through the discovery, extraction, and marketing of precious and base metals. Currently, Argent has over 1,734km² of exploration ground in NSW, 1,038km² in Western Australia and 104km² in Tasmania, totalling 2,876 km² within 3 Australian States.



Kempfield Project EL5645, EL5748 (100% ARD) NSW

The Kempfield Project is located 60km SSW of Cadia Newcrest Gold and Copper Mining Operations in Central West New South Wales, 250 kilometres west of Sydney. This is the Company's flagship project and is registered as a New South Wales State Significant Development Project. Kempfield Silver Deposit Mineral Resource estimate for all categories has been upgraded 38.9Mt @ 102 g/t silver equivalent for 127.5 million ounces Ag Eq, containing of 42.8Moz silver, 149,200 oz gold, 181,016t lead & 426,900t zinc (ASX Announcement 6 September 2023: Updated Mineral Resource Estimate for Kempfield).

Trunkey Creek Project EL5748 (100% ARD) NSW

The Trunkey Creek Gold Project is located 5 kms east of the Kempfield in Central West region New South Wales. The Project lies within the Trunkey Creek Mineral Field which extends for 5.5 km by 500 m wide with over 2,900 oz of gold extracted from small scale mining. New IP model has delineated three distinct resistive/chargeable zones. Sub-parallel main quartz reefs are spaced 30m to 50m apart over a strike length of 2 km.

Pine Ridge Project EL8213 (100% ARD), NSW

The Project is located in the Central Tablelands in New South Wales approximately 65 kilometres south of the township of Bathurst and 10 km south-west of Trunkey. Gold mining commenced in 1877 and continued sporadically until 1948, producing a total of 6,864t ore with variable gold grades. Current 2012 JORC Resource is 416,887t @ 1.65 g/t Au containing 22,122 oz Gold (ASX Announcement 20 April 2022: Pine Ridge Inferred Resource)

Mt Dudley Project EL5748 (100% ARD), NSW

The Project is located 5 km northwest of the township of Trunkey, near Blayney NSW. The Mt Dudley mine was worked between 1913-1922 and 1928-1931, with the mine's records indicating an average mined grade of approximately 25 g/t of gold. Current 2012 JORC Resource is **882,636t** @ **1.03** g/t Au containing **29,238** oz Gold (ASX Announcement 13 September 2022: Maiden JORC Resource Over Mt Dudley Prospect)

Copperhead Project (100% ARD), WA

The Copperhead Project is located NE of Carnarvon and SW of Karratha in Western Australia Gascoyne Region. The project is proximal to major REE deposits and is considered Elephant country based on its untapped potential.

Helicopter rock-chip sample program has confirmed the extensive copper mineralisation over the Mount Palgrave Prospect. High-grade stratiform copper assays include 2.42%, 4.14%, 5.92%, 8.8%, 14.96% and 21.1% Cu.

The Project is also considered highly prospective for potential ironstone/carbonatite Rare Earth mineralisation. Over Fifty (50) high priority potential ironstone/carbonatite rare earth targets have been delineated and are currently being assessed (ASX Announcement 1 February 2023: High-grade copper confirmed at Gascoyne Copper Project)



Ringville Project (100% ARD), TAS

The Project Ringville Project is strategically positioned between world class mines Rosebery (high grade polymetallic deposit) and Renison Bell Tin Mine (one of the world's largest and highest-grade tin mines) in Tasmania. The Project contains 52 recorded mineral occurrences, including three deposits featuring silver, copper, lead, zinc and tin. Broad, high-grade zones of silver-copper-lead-zinc mineralisation varying from 3m to 23.6m from shallow to moderate depths from diamond drilling.





JORC Code, 2012 Edition - Table 1 report

Section 1 Sampling Techniques and Data

(Criteria in this section apply to all succeeding sections)

Criteria	JORC Code explanation	Commentary
Sampling techniques 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 (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.	The new AMAG survey was completed by Magspec Airborne Surveys from 13 th to 19 th July 2023, based from Maroonah Station, WA. The survey flight lines were flown at 50m spacings oriented 060-240° with tie lines at 500m spacings at 150-330° at a nominal 30m flying height AGL. Total line kilometres flown was 5,620km. The aircraft used for the survey was a Cessna 210, specially modified for geophysical survey with a tail boom and various other survey configuration modifications. The magnetic geophysical sampling was collected via a stinger mounted G823A caesium vapour magnetometer. Nominal traverse separation of 50m, with an average ground clearance of 30m. Sampling rate was at approximately 20Hz. Base station was a GSM-19 Overhauser & Scintrex EnviMag proton precession unit sampling at 1 Hz intervals. For the radiomentric spectrometer an RSI RS-500 gammaray spectrometer incorporating 2x RSX-4 detector packs, 32 litre crystal, sampling interval of 2 Hz was
Drilling	Drill type (e.g., core, reverse circulation,	used. N/A – no drilling was completed in this program.
techniques	open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g., core diameter, triple or standard tube, depth of diamond tails, facesampling bit or other type, whether core is oriented and if so, by what method, etc).	N/A no drining was completed in this program.
Drill sample recovery	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.	N/A – no drilling was completed in this program.





Criteria	JORC Code explanation	Commentary
	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.	
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.	N/A – no drilling was completed in this program.
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.	N/A – no drilling was completed in this program.
	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.	
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 (e.g., standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e., lack of bias) and precision have been established.	N/A – no drilling was completed in this program.
Verification of sampling and assaying	The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes.	N/A – no drilling was completed in this program.
	Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.	
	Discuss any adjustment to assay data.	





Criteria	JORC Code explanation	Commentary
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.	Integrated Novatel OEM719 DGPS receiver was used to provide navigation information to the pilot via an LCD steering indicator. All data were synchronised to a one pulse per second triggered by the GPS time.
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.	Line spacing of the airborne survey is 50m which is considered appropriate for the level of geological and structural interpretation that was completed.
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.	The airborne survey was flown based on the NW-SE geological features running through E08/3001 and E08/3369 – the flight lines are running parallel with the Discovery Formation Siltstone which hosts the Cu-Zn-Ag mineralisation.
Sample security	The measures taken to ensure sample security.	N/A – no drilling was completed in this program.
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	N/A – no drilling was completed in this program.

Section 2 Reporting of Exploration Results

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

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 known impediments to obtaining a licence to operate in the area.	All granted tenure are held within Copperhead Pty Ltd which is 100% owned subsidiary of Argent Minerals Ltd. There are no other material issues affecting the tenements. All granted tenements are in good standing and there are no impediments to operating in the area.
Exploration done by other parties	Acknowledgment and appraisal of exploration by other parties.	From 1966 to 1967, Westfield Minerals (WA) NL conducted regional exploration in the area surrounding Mt Palgrave Cu Prospect down to Illirie Creek Cu Prospect area which incorporated rock chip sampling, trenching, and drilling. At Mount Palgrave Prospect, rock chip sampling included copper assays including 1.12% Cu, 4.6% Cu, 6.8% Cu and 14.2% Cu. Trench 1 intersected 13m@3.35% Cu along with first pass RAB drilling intersecting copper mineralisation at a shallow depth. Drillhole PDH19, 8.7m @ 2.44% Cu from 10.4m, Drillhole PDH17A, 8.7m @ 0.76% Cu from 10.4m and



Criteria	JORC Code explanation	Commentary
		Drillhole P17 @ 0.74% Cu from 1.7m. This was never followed up through further ground exploration.
		Anomaly A Prospect yielded high-grade copper mineralisation from 3 trenches varying from 2.7% Cu to 5.6% Cu. The location of these areas is hosted within a north-western trending syncline proximal to the fold hinge hosted within the Discovery Formation Siltstone/Chert. Anomaly C (b) Prospect trenching has also yielded high grade copper mineralisation varying from 0.3% Cu to 11.3% hosted within the Discovery Formation Siltstone/Chert. Approximately 1km NNW from Anomaly C (b) Prospect, Anomaly C (a) trenching has also yielded high grade copper mineralisation from the surface varying from 1.35% to 12.6% Cu with RAB drillhole C (a) 5 intersecting 10.97m @ 2.47% Cu from 3.66m. Ilirie Creek Prospect is also hosted within the Discovery Formation Siltstone with 3 trenches intersecting stratabound secondary copper mineralisation varying from 0.77% Cu to 6.27% Cu.
		All the mineralization delineated in these copper prospect areas have been classified as sedimentary stratiform zinc-copper mineralization occurs in black carbonaceous, pyritic shale of the Discovery Siltstone and Chert, located in a syncline of Jillawarra Formation. Gossans contain chrysocolla, malachite and goslarite. In drill cuttings, sphalerite and covellite are the main sulfides of interest in the generally pyritic shale/siltstone. Both sphalerite and covellite occur in the matrix of the rock, but most sphalerite is contained, with pyrite, in late-stage siliceous veins. Traces of chalcopyrite, chalcocite and galena are also present.
		The exposed mineralized horizons vary from malachite-bearing gossans to well-developed ironstone gossans, all with strong evaluated base-metal values. Drill intersections below the gossans in fresh bedrock revealed the presence of pyritic and carbonaceous shale, siltstone, or chert with minor sphalerite–galena–chalcopyrite. Copper values in the surface gossans are up to 10–12%. The pyrite mineralization has a bedding-parallel, banded appearance (syngenetic), but has been locally remobilized in discordant veins and fractures. The main stratigraphic horizon for this mineralization is at the top of the Jillawarra Formation and in the overlying Discovery Chert.
Geology	Deposit type, geological setting, and style of mineralisation.	There are potential for multiple style deposits within the Copperhead Project. They include:
		 Stratabound copper-zinc mineralisation hosted within the Discovery Formation Siltstone. The potential "Yangibana carbonatite" style and is considered prospective for carbonatite hosted REE mineralisation, with targets identified in the southern portion of the tenure.
		The project geology comprises a significant portion of exposed Proterozoic sedimentary rocks of the Edmund Basin which forms part of the greater Bangemall Supergroup of the Capricorn Orogeny.
		The Edmund Basin corresponds to the present-day outcrop of the Edmund Group that together make up the Bangemall Supergroup. The Project is cut by northeast trending dolerite dykes belonging to the 755 Ma Mundine Well dyke swarm, north-north-westerly trending dolerite dykes that pre- or post-date the Mundine Well dyke swarm, and by quartz veins of various





Criteria	JORC Code explanation	Commentary
		orientations. Significant regional folding is evident as a series of anticlines and synclines.
		The Kiangi Creek and Discovery Formations are major targets for sediment-hosted base-metal deposits and hosts stratabound copper and zinc mineralization at Mount Palgrave and Illirie Bore, which are both contained with the Project tenements.
		The most common copper minerals are malachite and azurite, which are mainly present in thin bedding- parallel seams and along late-stage fractures. The late-stage fractures appear to feed stratiform zones in siltstone and fine to very fine grained planar-laminated sandstone. Copper mineralization is also associated with thin beds rich in hematite and goethite pseudomorphs after pyrite. The northwest project tenement contains a monzogranite of the Duralcher Supersuite, which is also hosts Hastings Technology Metals, Yangibana REE deposit located adjacent to the Project tenements in the south. This north-western tenement also contains mapped pegmatite dykes which are considered prospective for REE. The project area is also considered prospective for diamonds as it contains anomalous kimberlite mineralogy, known kimberlite dykes, and is proven to be diamond-bearing.
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:	N/A no drilling undertaken
	 easting and northing of the drill hole collar elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar dip and azimuth of the hole down hole length and interception depth 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.	
Data aggregation methods	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. 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	Not Applicable
	should be clearly stated.	



Criteria	JORC Code explanation	Commentary
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 (e.g., 'down hole length, true width not known').	Not Applicable
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.	Figures 1 to 3 and Table 1 to 2 have been presented within the announcement outlining locations of the target samples sites.
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.	Not Applicable
Other substantive exploration data	Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; bulk samples—size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential deleterious or contaminating substances.	Metallurgical, groundwater, and geotechnical studies have not commenced as part of the assessment of the project.
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.	Further ground reconnaissance mapping and rock chip sampling programme will be implemented. Also, the company is planning a helicopter borne EM survey over all the known copper project with a view of potentially delineating ground drill targets.