

ASF COPPER PTY LIMITED
ABN: 17 154 824 441

TASMANIA

TEMMA PROJECT

EXPLORATION LICENCE: EL44/2011

ANNUAL REPORT FOR THE PERIOD:

03/04/2012 TO 02/04/2013

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Map Sheets:

SK55-3 Burnie 1:250,000

Ordnance 3042 and Temma 3043 1:25,000

Abstract

Exploration in the Temma area since the mid 1960' has identified a number of epigenetic ironstone occurrences in which two stages of mineralisation have been demonstrated; an earlier magnetite-Cu association and a later quartz-Pb-Cu-Ag+/-Au event. Both mineralisation events are spatially associated. The magnetite bodies are developed as steeply, mostly west dipping planar bodies up to 20m thick and up to 1.0-1.5km in strike length. The mineralogy of the magnetite bodies is consistent with an IOCG style of mineralisation.

Despite a long history of exploration, considerable potential exists for significantly mineralised positions within and adjacent to the ironstones as geochemical anomalism remains unclosed at the Strickland and Possum Creek prospects and drilling has tested only approximately 500m of strike in the prospects drilled to date. In addition to the ironstone targets, a number of discrete helicopter borne EM (HEM) conductors remain unexplained and represent potential exploration targets.

Work by ASF Copper Pty Ltd during the period has involved rapid reconnaissance to assess access to the ironstone targets and determine the nature of the regolith for the suitability of further soil sampling. Seven HEM anomalies were briefly visited to determine if there were any obvious sources for the anomalies and to assess access and regolith to determine a practical exploration approach.

As a consequence of this work, an exploration programme has been formulated in involving the compilation of existing data and the extension of the existing geochemical grids at the Strickland and Possum Creek prospects with the objective of defining drill targets during the summer season.

1.0 Introduction

EL 44/2011 is held by ASF Copper Pty Ltd and was granted on 4 April 2012. Despite a long history of exploration dating back to the 1960's, ASF considers the potential for Cu and Au mineralisation associated with well documented magnetite bodies to be high. Previous exploration results indicate that the Cu-Fe-Zn-Pb-Ag-Ag mineralisation intersected by drilling is most probably affiliated with iron oxide copper-gold ("IOCG") style of mineralisation.

Historical drilling has tested three ironstone occurrences; the Strickland, Little Eel and Possum Creek prospects. This drilling has comprised a total of only 7 drill holes over the three ironstone occurrences which have a cumulative strike length of approximately 2.5km, testing approximately 500m of the cumulative extent of the ironstones. Similarly, soil geochemistry at both the Strickland and Possum Creek prospects remains unclosed and there is potential to significantly extend these zones and define additional drill targets. In addition, a number of EM targets defined by previous explorers' co-incident with the ironstones have not been tested.

While ASF's primary focus is on the potential for IOCG mineralisation in untested parts of the ironstones, a number of helimag EM targets identified from a January 2001 Geotech Hummingbird helicopter borne EM (HEM) survey have not been assessed sufficiently to determine a source for the near surface conductors. These remain a secondary priority target for ASF. The source of these anomalies remains unknown but appears not to be associated with magnetic bodies.

Initially, ASF will utilize a combination of geochemistry and drilling to assess the ironstone targets, utilizing the existing magnetic data accumulated by previous explorers.

2.0 Location and Access

EL 44/2011 is located in NW Tasmania, approximately 25km south of Arthur River (Fig.1). The small fishing village of Temma locates in the NW part of the tenement. Road access is limited, with the Sandy Creek Temma track providing access along the coast and the Balfour Track providing east-west access. These tracks are passible by 4WD in dry weather. A number of old tracks developed by previous explorers provide access to the Strickland and Possum Creek prospects, however these are in very poor condition and require upgrading to allow 4WD access to these areas.

The natural vegetation transitions from coastal heathland on the coast and variably throughout the licence area through to dense tea tree scrub and dense mixed tea tree-eucalypt forest.

3.0 Geology and Mineralisation

The regional and local geology of the area has been well described in the Annual Reports of previous explorers, notably; Herman and Sumpton (Geopeko, 1982), Weir (CRAE 1983) and Hughes (Jaguar 2009). L.A. Newnham (Pacific Nevada, 2000) provides detailed petrology and

mineralogy for the Strickland prospect. The following summary is derived from these authors.

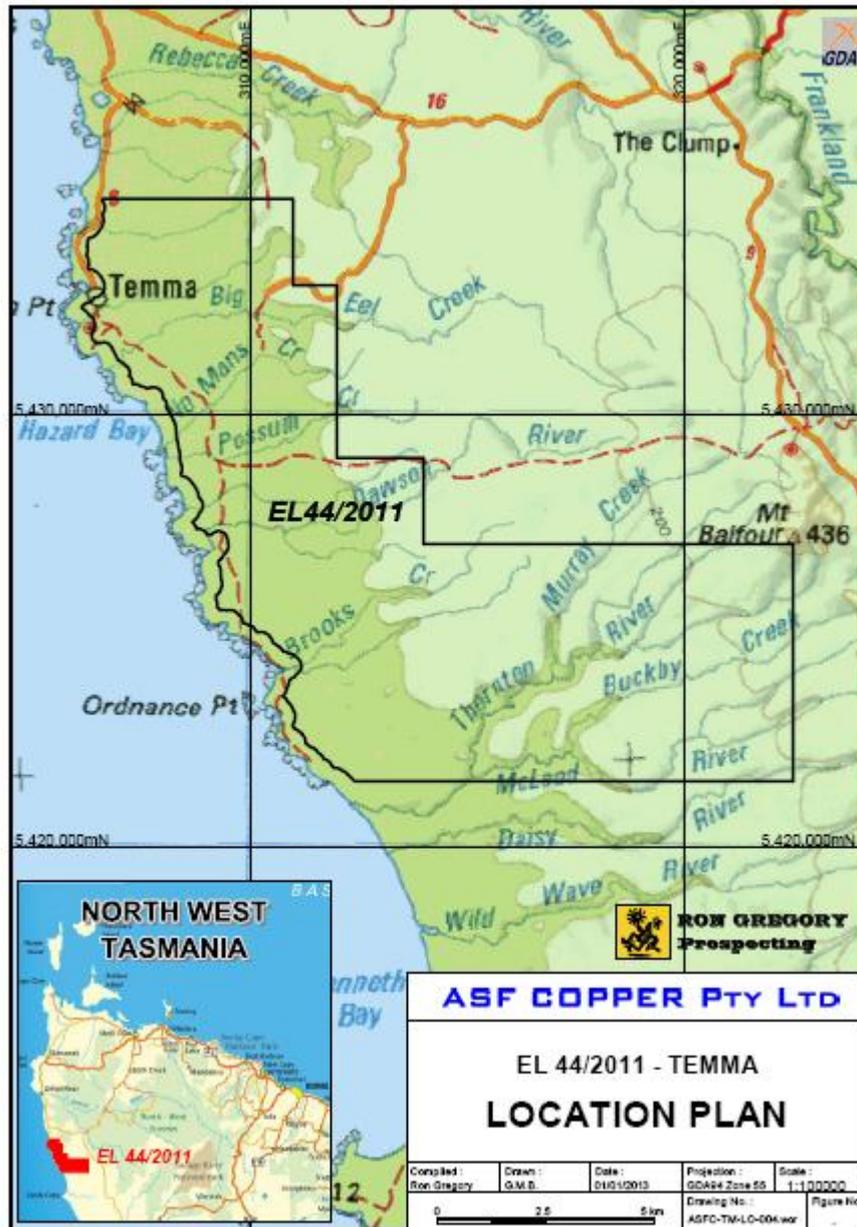


Figure 1: Location of Temma EL 44/2011

3.1 Geology

The regional geology is dominated by the Mesoproterozoic Rocky Cape Group, a thick siliclastic shelf sequence, the oldest rocks in Tasmania and for which the basement is unknown. The lithologies comprise clean, well sorted sandstones and siltstones through to laminated siltstones which may be graphitic and pyritic. The lithologies indicate a range of environments from reasonably high energy oxidizing to low energy reducing conditions.

The Rocky Cape Group has been divided into seven Sub Groups of which the Balfour Sub Group dominates the geology of the Temma area of interest, comprising inter-bedded sandstone and siltstone, chloritic siltstone and carbonaceous, pyritic siltstone and shale. The tectonic history is characterized by two early phases of syndepositional extension followed by at least four deformational events; the most significant being D3, considered being Devonian in age. The D3 deformation is manifested by NW directed folding, cleavage development and major, NE-directed low and high angled thrusts. Reactivated extensional structures during D3 may have provided fluid pathways for mineralisation.

Younger rocks in the Temma area include Tertiary basalt and unconsolidated Pleistocene and Holocene beach and dune deposits. These units are particularly important from an exploration methodology perspective. Tertiary basalt is mapped at both Strickland and Possum Creek prospects but the extent of the basalt with respect to the ironstones is uncertain. The basalt is present on at least part of the magnetic high which defines an ironstone to the west of the main ironstone at Possum Creek and a similar situation is apparent at Strickland. Variable cover of beach and dune sands occurs at both prospects and at Possum Creek is reported to attain 15m in thickness. Both the Tertiary basalt and sand cover has important ramifications for geochemical sampling.

3.2 Mineralisation

A detailed description of mineralisation styles is given by Herrmann and Sumpton (1982). A number of occurrences are evident in the Temma area with a few being prospected by shallow workings including Strickland, Possum Creek and Couta. However there appears to have been little production from these occurrences and these represent prospecting works.

Mapping and drilling have clearly demonstrated that mineralisation is epigenetic, crosscutting both the dip and strike of the host lithologies and there is good evidence to show that the strike of the mineralisation is parallel to cleavage, at least at local scales. This suggests that mineralisation is syn or post D3. There have been suggestions that mineralisation is genetically related to Devonian granite emplacement and while plausible, there are no exposed granite occurrences in the Temma area.

Mineralisation in the area is of two styles:

- Quartz stringer veins and/or massive quartz veins up to 2m wide with pyrite, chalcopyrite and galena. Examples are Grace Creek, Couta, Richardson Point and Sarah Anne Rocks. Selected sampling of this style of mineralisation (Herrmann and Sumpton, 1982) has returned assays of up to 3.3% Cu, 40% Pb, 500g/t Ag and 0.06g/t Au.
- Massive magnetite lodes up to 20m wide comprising magnetite to 70% with high manganese (6% Mn) and titanium (0.5% Ti). Iron rich amphibole, Fe-Mn carbonate, mica, chlorite, quartz and pyrite and chalcopyrite (0.2% Cu) are typical mineral assemblages of the magnetite lodes. This mineral association has strong similarities with many IOCG occurrences globally. There are no geochemically significant levels of Pb, Zn, Ag, Au, Bi, Mo, Sn, W, Cr, Ba or As associated with the magnetite lodes. The magnetite lodes

are characterized by sharp contact boundaries with the enclosing sediments.

There is a close spatial association between the two styles of mineralisation with the quartz stringer mineralisation occurring in close proximity to the magnetite lodes (Grace Creek, Little Eel) and more commonly developed within and crosscutting the magnetite lodes and developed on either the hanging or footwall to the magnetite lodes (Strickland, Possum Creek). However the stringer mineralisation is not consistently developed along the magnetite lodes. Alteration characterized by chloritisation, particularly along cleavage planes and in extreme cases, garnet, typifies both mineralised styles with alteration generally confined within a few meters of the mineralisation.

The relationship between the two styles of mineralisation indicates that the quartz stringer mineralisation is later than the magnetite lodes and that the close special association suggests common fluid pathways (structures). It is postulated here that the magnetite lodes may have acted as both chemical and structural traps (brittle fracturing) for later Pb, Ag, Cu, Ag rich fluids of the quartz stringer mineralisation. A similar genetic model has been proposed for the Cu-Au mineralisation at Tennant Creek (Normandy Mining Ltd pers. comm.).

4.0 Previous Exploration

The area has been the subject of mineral exploration since the mid 1960's, commencing with Picklands Mather Co. International who drilled two diamond drill holes, T301 and T302, into the Strickland prospect targeting magnetite. By far the most comprehensive and extensive exploration in the area was conducted by CRAE under EL 1/77 and Geopeko who entered into a JV with CRAE during the 1980's.

Geopeko undertook extensive geophysical work including airborne and ground magnetics and EM. Work included detailed prospect evaluation at Nelson River (outside of the current EL), Strickland, Little Eel and Possum Creek which included mapping, rock chip and 'C' horizon auger sampling, ground magnetics and EM. CRAE drilled one diamond hole each at Little Eel (DD LE1) and Possum Creek (DD PG1). In addition, Geopeko briefly assessed numerous mineralised occurrences in the district, which included limited rock chip sampling and reconnaissance mapping.

Nevada Pacific Mining Pty under EL 27/97 during 1999-2000, re-logged and resampled the Picklands Mather diamond holes at Strickland and the two CRAE holes at Little Eel and Possum Creek. The company then drilled three holes at Strickland. Two of these holes, S303 and S304 scissored Picklands Mather's diamond drill holes T301 and T302 respectively. The third hole, S305, tested a magnetic anomaly approximately 100m west of the main Strickland ironstone.

Jaguar Minerals Ltd over the period 2006-2010 under EL 27/2005 processed and interpreted a Geotech Hummingbird HEM survey and selected a number of priority targets for follow up. Limited orientation ground magnetics and orientation partial leach geochemistry involving 8 lines were undertaken at Possum Creek. This work conclusively showed that "C" horizontal sampling is the most effective medium to use in the local area. Limited reconnaissance of

selected HEM targets including some geochemistry on three, proved inconclusive.

4.1 Results and Conclusions from Previous Exploration Programmes

An assessment of previous exploration can be summarised as follows:

- The most significant mineralisation in the Temma area is associated with linear, steep, westerly dipping magnetite bodies which are epigenetic in nature, crosscutting both the dip and strike of the host Balfour Group sediments. The magnetite bodies are clearly defined in both aerial and ground magnetics and display discrete EM responses of short strike length at Possum Creek and Strickland.
- Mineralisation is manifest as two styles, both spatially associated. The magnetite bodies up to 20m wide display mineralogy consistent with IOCG style mineralisation and host sulphide mineralisation as pyrite and chalcopyrite. Latter quartz-chalcopyrite-galena-pyrite +/- gold mineralisation is superimposed on the magnetite lodes as stringers through the lode and marginal to the hanging and/or footwall of the magnetite lodes. The stringer mineralisation is not consistently developed along the magnetite lodes.
- Air borne and ground magnetics combined with 'C' horizon soil geochemistry is an effective exploration methodology for drill targeting. The effectiveness of EM as a targeting tool needs to be ascertained as drilling to date has not definitively tested the anomalies.
- Significant but uneconomic intersections have been returned from limited drilling to date as summarised in Table1. Pacific Nevada's hole S303 is considered by them to have failed to intersect the main ironstone body (Newnham,2000).

Anomalous Intersections from Historical Drill holes EL 44/2011

Company	Hole	Prospect	Intercept(m)	Cu%	Zn%	Ag ppm	Au ppm
CRAE	PG1	Possum Creek	2.6	0.43		9	
			3.0			12	
CRAE	LE1	Little Eel	10.0	0.48			
			1.6	1.14	0.17	1	
Pacific Nevada	S304	Strickland	1.6				2.2
Pacific Nevada	S305	Strickland	2.3	1.01			
Picklands Mather	T302*	Strickland	45.1*	0.22		1.7	1.5

* Poor core recovery – random sampling throughout the zone

- Potential for medium sized Cu-Au-Ag economic mineralisation exists where the stringer mineralisation is well developed within the ironstone. Conceptually this may occur in combinations of local thickening of the ironstone at points of flexure and crosscutting structures.

- There is good potential to define these positions at Strickland and Possum Creek and to a lesser extent, Little Eel, as only 6 holes have effectively tested a cumulative strike extent of some 500m 2.5km of the ironstone occurrences. Soil geochemistry at both the Strickland and Possum Creek prospects remains unclosed and there is potential to significantly extend these zones and define additional drill targets.

5.0 Work Conducted

Work by ASF Copper has comprised a thorough review of previous exploration results leading to the identification of target areas and the formulation of an exploration programme.

A reconnaissance trip was undertaken using a helicopter to rapidly traverse the areas of interest. The purpose of the reconnaissance was primarily to ascertain the nature of the regolith for geochemical sampling, locate previous drill holes and to determine requirements for access. In addition, a total of seven HEM targets were briefly visited to inspect the geology, regolith and accessibility of the targets and to determine if any obvious sources for the EM response.

5.1 Results

Vegetation at both Strickland and Possum Creek primarily comprises thick tea tree scrub with areas of dense eucalypt forest. Old grids and cut lines at both prospects are completely regrown and except for the main access tracks to these prospects, no evidence of the former grids could be found. The access tracks are in poor condition. Prior to the proposed work being undertaken, access tracks will require upgrading and the proposed geochemical sampling will require cut lines. The regolith at both Strickland and Possum Creek shows variable thicknesses of recent dune sands and surface sampling is considered inappropriate and will necessitate the use of an auger.

Only two holes were located at Strickland; Pacific Nevada's S302 and S304. The drill collar was located at S302 but not at S304, where the remains of a sump provided some confidence of the correct location of the hole. The main Strickland workings were located but no evidence of mineralised or magnetite lode material was found on the dumps. At Possum Creek, the drill collar of CRAE's DDH PG1 was not located but a possible sump was located in the approximate position of the GPS co-ordinates for the hole.

The Little Eel prospect was visited but no evidence of CRAE's hole DDH LE1 could be found, with the drill site located in very dense tea tree swamp according to the co-ordinates and CRAE's own description. The regolith varies at Little Eel from a large area of outcrop to subdued relief of dune sand cover and black, organic rich soil of localized tea tree swamps. Further geochemical work at this prospect will require a combination of sampling methods.

HEM anomalies 3,4,5,7, 11, 31 and 36 (Jaguar Minerals nomenclature, Busbridge, 2007) were located and a brief reconnaissance conducted over each. The seven HEM anomalies were interpreted by Jaguar to be priority targets and most likely to represent discrete

bedrock conductors. All the anomalies were located in open, low-heath covered ground with good outcrop with a thin and variable cover of dune sand. The lithologies at every site were similar being fine grained highly siliceous sandstones and siltstones with lesser shale. No obvious sources for the EM response were observed except at HEM anomaly 31. This site is located above a deeply incised creek below the plateau of the drainage divide. At the actual location, lithologies comprise the usual white siliceous fine sandstones and siltstone. However an inspection of stream float in the creek immediately north of the site located a significant quantity of black graphitic shale. While not conclusive, the graphitic shale is considered a probable source for the anomaly.

The reconnaissance concluded that the HEM targets can be readily tested by a combination of surface soil geochemistry and rock chip sampling with access possible by quad bike from the main tracks in the area. According to Jaguar's interpretation of the data, the shallow penetration ability of the Hummingbird system used in the HEM survey would place the top of a conductive body at less than 80m.

6.0 Proposed Programme

ASF's primary and initial targets are the Strickland and Possum Creek prospects. The Little Eel prospect holds potential but its location falls within the 2km coastal conservation zone and the practicality of undertaking work at little Eel will require consultation with MRT. The HEM targets are considered lower priority targets worthy of follow up in the future.

6.1 Data Compilation

There is considerable data accumulated by previous explorers at disparate scales and grids. This data will be compiled digitally on GDA to provide practical working plans. This will include acquiring and reprocessing the digital geophysical and geochemical data. It will also be necessary to relate the old local grid data to GDA co-ordinates by triangulation in the field.

6.2 Strickland

Previous work at Strickland has tested approximately 300m of strike of the western (main) ironstones with the drilling of four drill holes (T301, T302, S303, S304) one of which was not definitive. These four holes, being scissored have in fact only tested two positions. One hole, S305 has tested an ironstone at one location 100m to the west of the main ironstone. Similarly, soil geochemistry has only tested 400m of the western ironstone and 200m of the eastern ironstone. Discrete EM targets and the main workings have not been drill tested. There is therefore considerable potential to extend the zones of interest through further geochemistry in conjunction with reprocessing and collating the various magnetic surveys. With the objective of defining new drill targets it is proposed:

- To extend augured 100mx25m spaced 'C' horizon soil geochemistry 400m north of the current extent and 400m south of the current soil sampling. This work relates to northings 9800 – 10600N between 10000 – 10300E on the old grid.

- Undertake three lines of similar sampling on a magnetic feature approximately 400m east of the main ironstone from 9900 – 10100N centered on 10500-10600E.
- This work will involve the cutting of approximately 2600m of access lines, the collection of approximately 125 samples and the rehabilitation of the access track from Temma.

6.3 Possum Creek

Only one drill hole has tested the main ironstone at Possum Creek of the current 900m long 'C' horizon Cu anomaly. Three discrete EM anomalies have not been tested. There is some doubt that previous auger sampling did not reach the 'C' horizon on lines 10000N and 10400N on the old grid. Untested Cu anomalous geochemistry and the EM anomalies currently provide immediate drill targets but it is proposed to resample some questionable lines and extend the geochemical grid before selecting drill targets. It is proposed:

To conduct five lines of 'C' horizon geochemistry from 10100N to 10950N on the old grid to confirm previous questionable results and to extend the zone of anomalism.

To sample one line on a magnetic feature approximately 800m to the east of main ironstone where one line of previous geochemistry has shown anomalism.

The work will involve the clearing of approximately 450m of line clearing and will involve the collection of approximately 25 samples. The access track to the prospect will require upgrading.

7.0 Proposed Budget

Compilation Data	\$10,000.00
Geophysics - Reprocessing	\$6,000.00
Consultants/Contractors -	
Geological	\$45,000.00
Line clearing	\$20,000.00
Sampling	\$25,000.00
Assays	\$5,000.00
Earthmoving – Track Repair	\$8,000.00
Airfares	\$5,000.00
Accommodation/Car Hire etc	\$5,000.00
Surveys (Botanical, Heritage)	\$10,000.00
Total	\$163,5000

8.0 Expenditure during the Reporting Period

Duration: April 2012 to April 2013

Expense Item	Amount (AUD\$)	Remarks
1. Tenement	\$5172.96	
	\$2184.00	Annual Rental 2012-2013

	\$2988.96	Annual Rental 2013-2014
2. Consulting and Service Fee	\$5880.00	
	\$600.00	Data Summary
	\$5280.00	Work Programme & Budget
3. Communication Expenses	\$15.00	Telephone
4. Transportation	\$5690.66	
	\$64.16	Taxi
	\$5626.50	Helicopter
5. Travelling Expenses	\$2055.20	
6. Map & Literature	\$84.00	
7. Liability Insurance Policy	\$651.25	
Total Expenditure	\$19549.07	

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9.0 Environmental

No surface disturbance was involved with activities during the reporting period and no rehabilitation was required.

Key Words

Temma, Rocky Cape Group, Balfour Sub Group, Strickland, Possum Creel, Little Eel, magnetite, ironstones, magnetics, electromagnetics, IOCG, copper, gold, soil geochemistry

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