



PARTIAL RELINQUISHMENT REPORT FOR EXPLORATION LICENCE 30730 LAKE MACKAY PROJECT

From 13th of October 2017 to 26th of September 2022

Holder	Prodigy Gold NL
Operator	IGO Limited
ABN:	46 092 786 304
Author	M McGloin
Date	12 th October 2022
Email	matt.mcglain@igo.com.au
Target Commodities	Diamond, Copper, Gold, Zinc, Lead, Nickel, Cobalt
Datum/Zone	GDA94/ MGA Zone 52
250,000 map sheet	Lake Mackay (SF52-11), Mount Rennie (SF52-15), Mount Liebig (SF52-16), Mount Doreen (SF52-12)
100,000 map sheet	Carey (4952), Ehrenberg (4951), Gurner (5052), Kuta (5051).
Distribution:	NT DITT – Digital Prodigy Gold NL – Digital Central Land Council – Digital IGO Limited – Digital



Contents

1	ABSTRACT	4
2	LOCATION, TITLE HISTORY, PHYSIOGRAPHY AND ACCESS	4
3	GEOLOGICAL SETTING, EXPLORATION HISTORY AND EXPLORATION RATIONALE	5
3.1	REGIONAL AND LOCAL GEOLOGY AND MINERALISATION	5
3.2	HISTORICAL REGIONAL EXPLORATION AND EXPLORATION RATIONALE	7
4	RELINQUISHMENT DETAILS	8
5	WORK COMPLETED ON RELINQUISHED GROUND	10
5.1	GEOPHYSICS	10
5.1.1	AEROMAGNETIC AND RADIOMETRIC SURVEY	10
5.1.2	AIRBORNE ELECTROMAGNETIC SURVEYS	10
6	REASON FOR RELINQUISHMENT	11
7	REFERENCES	11

List of Figures

FIGURE 1: EL30730 LOCATION MAP	5
FIGURE 2: MAP SHOWING RELINQUISHED AREAS OF EL30730	9
FIGURE 3: MAP OF AIRBORNE EM COVERAGE OVER RELINQUISHED GROUND	10



Acknowledgement and warranty

1. Subject to 2, the tenure holder acknowledges that this Report, including the material, information and data incorporated in it, has been made under the direction or control of the Northern Territory (the NT) within the meaning of section 176 of the Copyright Act 1968.

2. To the extent that copyright in any material included in this Report is not owned by the NT, the tenureholder warrants that it has the full legal right and authority to grant, and hereby does grant, to the NT, subject to any confidentiality obligation undertaken by the NT, the right to do (including to authorise any other person to do) any act in the copyright, including to:

- use;
- reproduce;
- publish; and
- communicate in electronic form to the public, such material, including any data and information included in the material.

3. Without limiting the scope of 1 and 2 above, the tenure holder warrants that all relevant authorisations and consents have been obtained for all acts referred to in 1 and 2 above, to ensure that the doing of any of the acts is not unauthorised within the meaning of section 29(6) of the Copyright Act.

1 Abstract

This report summarises the partial relinquishment of 66 blocks (203.74 km²) of tenement EL30730 prompted by the approaching fifth anniversary of the tenement grant on the 13th of October 2017.

Tenement EL30730 is located approximately 365 km west-northwest of Alice Springs in the western Aileron Province of central Australia. EL30730 forms part of the Lake Mackay joint venture Project between IGO Limited (IGO) and Prodigy Gold NL (PRX). Since May 2022, ownership of the project has been split 70:30. IGO hold the majority share of tenements (including EL30730) with potential for base metal mineralisation whereas PRX hold the majority share of tenements with potential for gold mineralisation.

During the tenure period (13/10/2017 to 26/09/2022), IGO completed airborne magnetic, radiometric and electromagnetic surveys on the 66 blocks relinquished. This work was part of a wider exploration program across the Lake Mackay project area. The tenement was also subject to a site heritage clearance by the Central Land Council.

IGO have relinquished ground for two main reasons. Relinquished areas covered by airborne geophysical surveys failed to provide any follow-up exploration targets. Some areas were relatively unexplorable with current geophysical and geochemical methods because ground was covered in sand dunes or had significant depth of cover to basement rocks. This made drilling and further exploration impractical with current methods.

No further work is recommended on the relinquished ground.

2 Location, Title History, Physiography and Access

The northeastern boundary of tenement EL30730 is located approximately 28 km southwest of Nyirripi in the Northern Territory and is approximately 365 km west-northwest of Alice Springs (**Figure 1**).

The tenement was granted on the 13th of October 2017 for a period of six years. EL30730 forms part of the Lake Mackay Project joint venture with Prodigy Gold NL (PRX). Since May 2022, ownership of the project has been split 70:30. IGO hold the majority share of tenements with potential for base metal mineralisation (including EL30730), whereas PRX hold the majority share of tenements with potential for gold mineralisation.

Tenement EL30730 is part of an amalgamated reporting arrangement (GR485) with several other Lake Mackay project tenements (ELs 24915, 25146 and 30731). EL30730 underwent reductions in tenement area (partial relinquishments) in 2019 and 2021 pursuant to the Mineral Titles Act on the second- and fourth-year anniversary of the tenement being granted (McGloin 2019, McGloin 2021a).

EL30730 is located on Aboriginal Freehold Land of the Lake Mackay Aboriginal Land Trust. Negotiations with the Land Trust are overseen and managed by the Central Land Council (CLC). The tenement has also been subject to a site heritage clearance organised by the CLC.

The terrain is typically aeolian sand cover and spinifex plains, with occasional low hills and subcrop. Stands of scrubby mulga occur in areas with shallow sand cover.

The tenement can be accessed from Alice Springs north via the Stuart Highway, then west on the

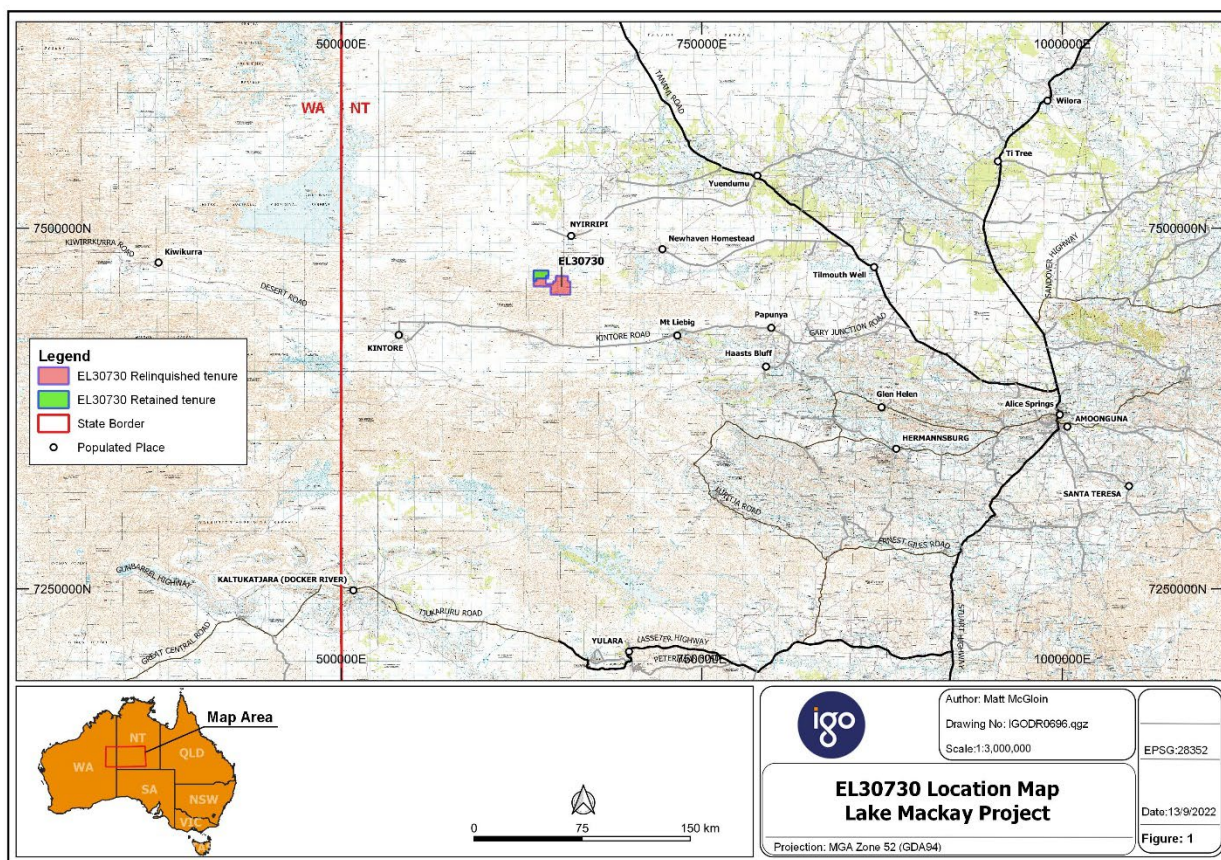


Figure 1: Location map of EL30730.

Tanami Road, before heading west along the well-maintained Newhaven Reserve track (dirt) towards Nyirripi. From Nyirripi, the tenement can be accessed heading west on Emu Bore Road, then south on the Nyirripi-Kalipimbut Road towards Sandy Blight Junction near Kintore. Specific parts of the tenement can then be reached using temporary cross-country tracks off the Nyirripi-Kalipimbut Road.

3 Geological setting, exploration history and exploration rationale

3.1 Regional and local geology and mineralisation

The Lake Mackay Project is located at the southern margin of the Paleoproterozoic North Australian Craton, straddling the Warumpi Province to the south, and the Aileron Province to the north. These provinces are separated by the Central Australian Suture, a major deep crustal-scale structure comprising a series of east-west trending major faults and shear zones (Shaw et al 1992, Scrimgeour et al 2005a, Selway et al 2009, Joly et al 2013).

Outcropping geology across the project area is typically sparse. The terrain comprises low hills of poorly exposed Paleoproterozoic metasedimentary rocks and intrusions, commonly covered by aeolian sand plains and dunes (Close et al 2005). In some locations, Paleoproterozoic rocks are overlain by Neoproterozoic and Paleozoic sedimentary rocks of the Amadeus and Ngalia basins.

Polymetallic base metal and gold mineralisation at Grapple and Bumblebee (Winzar 2016, Reno et al 2018, McGloin et al 2019), and more recently at the Phreaker, Scuba and Raw prospects (Prodigy Gold, ASX Releases, 17 July 2019 and 18 January and 26 May 2021), is located in the western Aileron Province. The ore-forming processes for these prospects remain poorly understood (Reno et al 2018, McGloin et al 2019,

McGloin 2021b, McGloin et al 2022). Nonetheless the observation of weakly magnetic pyrrhotite directly associated with base metal sulfides and gold (Cu-Au-Ag-Co-Zn-Pb), and anomalous enrichment in several trace elements (As, Bi, Te, Sn, Cd, Se, Sb) provides empirical geophysical and geochemical pathfinders that can be used to explore for similar mineralisation regionally.

The host rocks to the sulfide and gold mineralisation are ca 1.84–1.81 Ga metamudstone and metasandstone of the Lander Rock Formation, interpreted as a turbidite sequence (Close et al 2004, Close et al 2005a, Hollis et al 2013, McGloin et al 2019, Kositcin et al 2019). These siliciclastic metasedimentary rocks are strongly deformed and variably metamorphosed and interpreted to be lateral equivalents of similar metasedimentary rocks in the Tanami, Warramunga and Davenport Provinces (e.g., Claoué-Long et al 2008). A regional lithostratigraphy is not established between these provinces however because of a lack of continuous outcrop, few marker horizons, and the high metamorphic grade and deformation of these rocks in many locations.

Between ca 1.84–1.70 Ga, metasedimentary rocks of the Lander Rock Formation were intruded and metamorphosed by several phases of magmatism (Scrimgeour 2013, Hollis et al 2013, Kositcin et al 2019). Such intrusions include phases of the loosely defined ca 1.81–1.77 Ga felsic Carrington Suite and the ca 1.8 Ga Du Faur mafic Suite (Close et al 2005, Edgoose et al 2008, Kirkland et al 2009, Scrimgeour 2013, Hollis et al 2013).

The Du Faur Suite encompasses metadolerite and metapyroxenite sills (typically recrystallised to hornblende amphibolite; Close et al 2005). The Du Faur Suite are low-K tholeiites; this chemistry is interpreted as evidence for their emplacement in an extensional tectonic setting (Close et al 2005, Scrimgeour 2013). The precise timing of emplacement remains unknown due to difficulties sampling mafic rocks for chronology (Beyer et al in prep); nonetheless these sills preserve the same folded regional fabric as the enclosing metasedimentary succession, dated at ca 1.67 Ga at the Grapple prospect (Reno et al 2018), providing a minimum crystallisation age.

The Warumpi Province records a ca 1.69–1.60 Ga history of voluminous, dominantly granitic felsic magmatism, crustal thickening, and high-thermal-gradient metamorphism along the southern margin of the Aileron Province (Scrimgeour et al 2005a,b). Felsic and lesser mafic rocks of the Argilke Igneous Event were emplaced between ca 1.69–1.66 Ga (Close et al 2005, Scrimgeour et al 2005a, Kirkland et al 2009, Hollis et al 2013). Interpreted metasedimentary rocks with minimum ages of ca 1.66–1.64 Ga and 1.64–1.60 Ga (e.g., Yaya Metamorphic Complex) occur adjacent to these older igneous rocks (Scrimgeour 2005a-b, Close et al 2003, Scrimgeour et al 2005b, Hollis et al 2013).

Further felsic and mafic magmatism occurred in the Warumpi Province, and locally in the Aileron Province on Mount Rennie and Mount Doreen map sheets (e.g., Andrew Young Igneous Complex, Walungurru Volcanics, Waluwiya Suite) at ca 1.64–1.63 Ga contemporaneous with high-thermal gradient metamorphism (Wyborn et al 1998, Cross et al 2005, Scrimgeour et al 2005a, Hollis et al 2013, Kositcin et al 2019). The Andrew Young Igneous Complex in particular, is dominated by ultramafic and mafic intrusions, but also contains subordinate biotite-bearing granite and pegmatites (Close et al 2005, Scrimgeour 2013). The mafic and intermediate intrusions include coarse augite-bearing norite, porphyritic micro-crystalline norite, olivine and K-feldspar-bearing norite, biotite-bearing olivine gabbro-norite, quartz-bearing microdiorite, anorthosite, and plagioclase-andradite-clinopyroxene rock.

The origin of the Warumpi Province remains a focus of study; one model based on U–Pb zircon chronology interprets the province as an exotic terrain that collided obliquely with the Aileron Province at ca 1.64 Ga (Close et al 2005b, Scrimgeour et al 2005b). An alternative model based on isotopic and chronological evidence for mantle-derived magmas and crustal inheritance proposes that the Warumpi Province represents a rifted piece of the Aileron Province that was re-attached at some point (Hollis et al 2013, Wong et al 2015). Morrissey et al (2011) and Wong et al (2015) propose that the Warumpi Province was the upper plate to the Aileron Province



during the Paleoproterozoic, and that the province was emplaced along the Central Australian Suture at ca 1.1 Ga during the Grenvillian Orogeny. The timing of development for the Suture remains uncertain (Scrimgeour et al 2005) however it may have formed around the time of (or after) the so-called Liebig Orogeny (ca 1.67–1.63 Ma) and have been re-activated several times since.

Along with the hydrothermal polymetallic sulfide mineralisation, the project area is also considered prospective for both nickel-cobalt-manganese and gold mineralisation.

Ultramafic intrusions of the ca 1.64 Ga Andrew Young Igneous Complex represent a potential economic target for magmatic and lateritic nickel and cobalt mineralisation (Gregory et al 2004, Hoatson et al 2005, Prodigy Gold ASX Releases 26 July 2018, 30 May and 17 July 2019, 18 January 2021). Shallow zones of lateritic nickel-cobalt-manganese mineralisation have been confirmed in duricrust at the Grimlock and Swoop prospects through reverse circulation (RC) and aircore drilling. Further outcrops of weathered ultramafic remain untested in the Warumpi Province, providing additional viable exploration targets.

Orogenic gold has also actively become a valid exploration target across the project area, following the successful greenfields gold discoveries at the Arcee and Goldbug gold prospects in EL31234 and EL31794, respectively. The Arcee gold prospect was discovered in September 2019 (Cornwell 2019). RC drill hole 19LMRC072 tested a coherent gold anomaly (>50 ppb Au) from regional soil sampling. The drill hole intersected a broad zone of gold mineralisation (12 m at 3.6 g/t Au from 112 m) in the centre of an orthoamphibolite sill of the Du Faur Suite, that intrudes metasedimentary rocks of the Lander Rock Formation. The Goldbug prospect was discovered in October 2020. The best intercepts from the discovery hole 20LMRC039 were 16 m at 1.15 g/t Au, 4 m at 0.78 g/t Au and 4 m at 1.54 g/t Au, from 48 m depth, hosted within orthoamphibolite of the Du Faur Suite (Prodigy Gold ASX Release 18 January 2021).

3.2 Historical regional exploration and exploration rationale

Before the discovery of mineralisation at the Bumblebee prospect in 2015, the project area was largely untested for mineral potential using modern exploration methods. The exploration rationale for the Lake Mackay Project is now however largely based on empirical observations from systematic fieldwork and the recent discovery of base metal and gold mineralisation in the area.

Previous theoretical studies have considered the broader Lake Mackay area prospective for nickel mineralisation (Hoatson et al 2005), orogenic and intrusion-related gold, sediment-hosted base metal deposits and uranium mineralisation (Joly et al 2013), and hydrothermal copper-gold mineralisation including IOCG deposits (Skirrow et al 2019).

IGO initially targeted the project for orogenic gold. The area was considered to have the key constituents identified by Joly et al (2013) in the Western Australian part of the Aileron Province. These included ca 1.80–1.70 Ga and 1.64 Ga intrusions that show evidence for local gold enrichment (potential sources), major deep crustal structures (fluid conduits) and potential physico-chemical boundaries (depositional traps). The trends of west-northwest gold anomalism from regional sampling in Western Australia occur parallel to D₁ structures, and the Central Australian Suture, and continue into Lake Mackay JV tenements in the Northern Territory.

Limited historical exploration in the 2000s by BHP Billiton on the nearby tenement EL24915 targeted orthomagmatic nickel mineralisation associated with ultramafic and mafic rocks of the Andrew Young Igneous Complex (Gregory et al 2004). In 2003, two RC drill holes testing electromagnetic anomalies intercepted minor sulfide mineralisation (one of these drill holes was located 3.6 km west of IGO's subsequent Bumblebee discovery). The BHP drilling was never followed-up despite intercepting minor pyrite, pyrrhotite and trace chalcopyrite in tourmaline-bearing quartz veins within a shear zone that cut metasedimentary rocks and hydrothermally altered mafic intrusions.

Between 2002 and 2012, a joint-venture between Teck Australia Pty and Kajeena Mining Company carried out preliminary exploration, including work on historical tenement EL10383 (now part of EL29748), about 300 metres north of the Grapple and Bumblebee prospects (Kalma and Cawood 2009, Lee 2012). This work included field visits to collect rock chips, portable XRF measurements, and spinifex and soil samples; weakly anomalous gold, copper and zinc results were obtained. The Leg Gully anomaly, an east-west trending ironstone within mica schist, returned portable XRF readings of ≤ 1404 ppm Cu and rock chip assays of 323 ppm Cu. With hindsight, these reports from BHP, Kajeena Mining Company and Teck match the setting and observed mineralisation now discovered at Phreaker, Bumblebee and Grapple.

The Bumblebee prospect was discovered by IGO in 2015 after drilling of soil geochemical anomalies (Winzar 2016). The soil sampling program was designed to test for both gold and base metal anomalism using a -50 μm soil sampling method developed specifically for the project. This involved a 10 g cyanide leach for gold and silver and a 0.5 g Aqua Regia digestion for other base metal and pathfinder elements.

Additional soil sampling, along with airborne and ground electromagnetic surveys and geological mapping between 2016 and 2021 enabled discovery of several further polymetallic sulfide and gold prospects (e.g., Grapple, Phreaker, Raw, Scuba, Arcee, Goldbug). Additionally, rock chip sampling and drilling of ultramafic duricrust from the Andrew Young Igneous Complex at the Grimlock and Swoop prospects led to discovery of lateritic Co-Ni-Mn mineralisation (Prodigy Gold ASX Releases 26 July 2018, 30 May and 17 July 2019, 18 January 2021).

The exploration concept for the Lake Mackay project is to target geochemical anomalies and/or electromagnetic conductors that likely relate to:

- 1 “Phreaker-Grapple-style” pyrrhotite and associated base and precious metal mineralisation hosted in the Lander Rock Formation; and
- 2 Orthomagmatic or lateritic Ni-Co-Cu mineralisation hosted within ultramafic intrusions of the Andrew Young Igneous Complex.
- 3 Orogenic gold mineralisation hosted within structures associated with metamafic sills of the Du Faur Suite that intrude metasedimentary rocks of the Lander Rock Formation.

All three mineralisation styles are of interest because deposits of this nature should be readily detectable using both modern airborne and follow-up ground electromagnetic surveys, and geochemical methods, even under shallow cover, and thus could provide economically viable deposits despite the remote location. The Bumblebee and Grapple prospects produced strong geochemical anomalies using soil sampling, and along with the Phreaker prospect, strong electromagnetic conductors using airborne and ground surveys, providing empirical methods to target further mineralisation. Consequently, IGO applied both soil geochemistry and airborne (AEM) and ground (MLEM) geophysical surveys as a way to delineate additional mineralisation across the project (Winzar 2016, Whitford 2019).

These methods successfully generated multiple drilling targets and led to the discovery of the Phreaker, Scuba, Raw, Arcee and Goldbug prospects (Prodigy Gold ASX Releases 26 July 2018, 30 May 2019, 18 January and 26 May 2021). The discovery of these mineralised bodies confirms the mineral potential, and the applicability of these exploration methods, across the project area.

4 Relinquishment details

A voluntary partial relinquishment on EL30730 has been completed approaching the fifth-year anniversary of the tenement being granted. Consequently, EL30730 has been reduced from 84 blocks (265.7 km²) down to 18 blocks (61.96 km²; **Figure 2**).

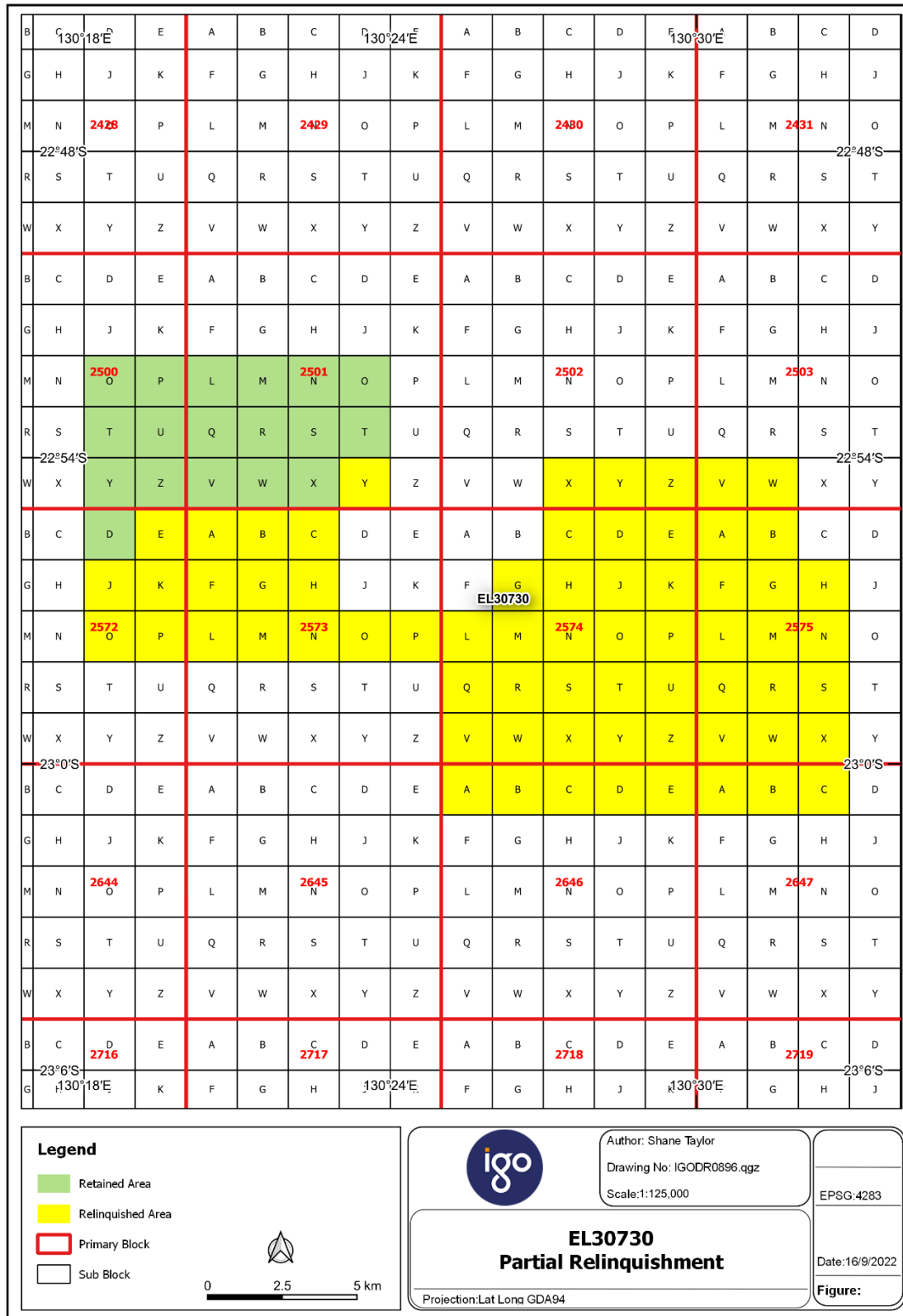


Figure 2. Map showing extent of EL30730 with areas retained (green polygons) and relinquished (yellow polygons) during the 2022 partial relinquishment. 1-minute graticules (black grid). 5-minute graticules (red grid). Coordinates given in GDA94 MGA zone 52.

5 Work Completed on Relinquished Ground

No on-ground exploration activities were conducted on the relinquished ground other than sacred site heritage surveys completed by the Central Land Council.

Airborne geophysical data was previously reported in Winzar (2018) and Cornwell (2019) and are not included.

5.1 Geophysics

5.1.1 Aeromagnetic and radiometric survey

An aeromagnetic and radiometric survey was flown over parts of tenement EL30730 in GR485 prior to granting as part of a co-funded project-wide survey. The details of the survey were outlined in Winzar (2018). The survey was flown as 200 m spaced flight lines oriented north-south. The mean terrain clearance was 35 m.

5.1.2 Airborne electromagnetic surveys

Between 2017 and 2018, 911-line kms of SPECTREM airborne electromagnetic surveying were completed across EL30730, including parts of the relinquished ground in this report (Winzar 2018, Winzar and Whitford 2018). Between 2018 and 2019, an additional 1810.6-line kms were flown across EL30730 (Cornwell 2019).

Figure 3 shows airborne EM coverage within the relinquished ground.

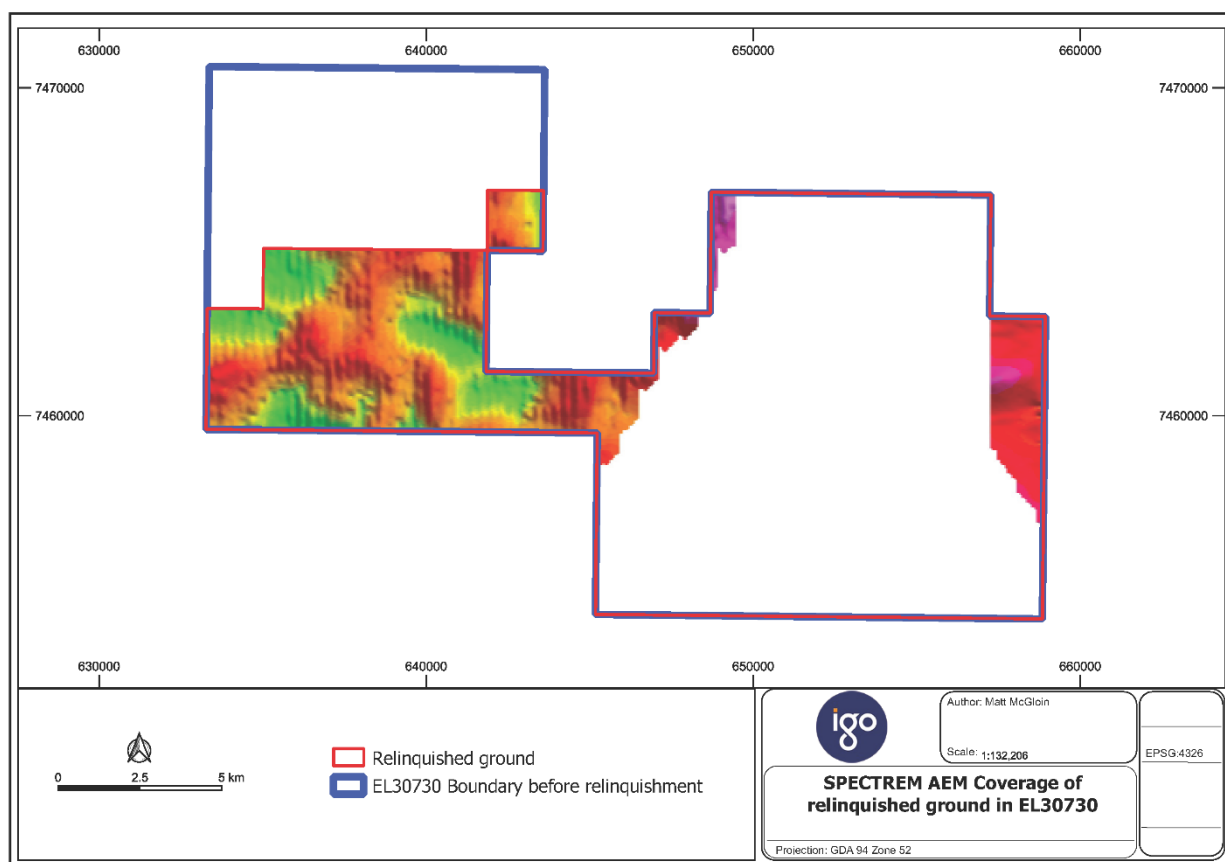


Figure 3. Map showing SPECTREM airborne EM coverage within relinquished areas of EL30730. EM was not flown over the central zone due to a large paleochannel that made detection of conductors in basement rocks difficult.

6 Reason for Relinquishment

Sixty-six blocks of EL30730 were relinquished for two main reasons:

- Relinquished areas covered by airborne geophysical surveys failed to provide any follow-up exploration targets.
- Some areas were relatively unexplorable with current geophysical and geochemical methods because ground was covered in sand dunes or had significant depth of cover to basement rocks. This made drilling and further exploration impractical with current methods.

No further work is recommended on the relinquished ground.

7 References

Beyer EE, McGloin MV, Thompson JL and Meffre S, in prep. Constraints On timing of mafic magmatism at the Grapple Cu–Au–Ag–Zn Prospect, Central Australia: In-situ LA–ICP–MS zircon geochronology of a new Proterozoic greenfields discovery. Northern Territory Geological Survey, Record.

Close DF, Scrimgeour I, Edgoose C, Cross A, Claoué Long J, Kinny P and Meixner T, 2003. Redefining the Warumpi Province. in: 'Annual Geoscience Exploration Seminar (AGES) 2003. Record of Abstracts'. Northern Territory Geological Survey, Record 2003–2011.

Close DF, Scrimgeour IR and Edgoose CJ, 2004. Mount Rennie, Northern Territory (Second Edition). 1: 250 000 geological map series, SF 52-15. Northern Territory Geological Survey.

Close DF, Scrimgeour IR, Edgoose CJ, Wingate MTD and Selway K, 2005. Late Paleoproterozoic oblique accretion of a 1690–1660 Ma magmatic arc onto the North Australian Craton: Geological Society of Australia, Abstracts 81, 36.

Cornwell S, 2019. Group Annual Report for GR485, Lake Mackay Project. From 13 October 2018 to 12 October 2019, Independence Group NL, Closed File Company Report, Northern Territory Geological Survey.

Cross A, Claoué-Long JC, Scrimgeour IR, Close DF and Edgoose CJ, 2005. Summary of results. Joint NTGS–GA geochronology project: southern Arunta Region. Northern Territory Geological Survey Record 2004-003.

Edgoose CJ, Close DF and Scrimgeour, IR 2008. Lake Mackay, Northern Territory (2nd Edition), 1:250 000 geological map series, SF 52–11. Northern Territory Geological Survey, Darwin.

Gregory P, Merrillees J and Christensen A, 2004. Combined annual report for EL 9520, EL 9521, EL 9522, EL 9523 and EL 954 for the year ended 17 July 2004, BHP Billiton Minerals, Southern Tanami Exploration, Northern Territory Geological Survey, Open File Company Report, CR2004-0461.

Hoatson, D, Shen-su and Claoué-Long J, 2005. Proterozoic mafic–ultramafic intrusions in the Arunta Region, central Australia: Part 1: Geological setting and mineral potential. *Precambrian Research*, 142, 93–133.

Hollis JA, Kirkland CL, Spaggiari CV, Tyler IM, Haines PW, Wingate MTD, Phillips C, Sheppard S, Belousova E and Murphy RC, 2013. Zircon U–Pb–Hf isotope evidence for links between the Warumpi and Aileron Provinces West Arunta Region. Geological Survey of Western Australia, Record 2013/9.

Joly A, Denith MC, Porwal A, Spaggiari CV, Tyler IM, and McCuaig TC, 2013. An integrated geological and geophysical study of the west Arunta orogen and its mineral prospectivity. Perth: Geological Survey of Western Australia.

Kalma AJ and Cawood MJ, 2009. Kajeena Mining Company. Combined annual report for the period ending 1 September 2009. Northern Territory Geological Survey, Open File Company Report, CR2009-0805.

Kirkland CL, Wingate MTD, Tyler IM and Spaggiari CV 2009. 184367: metagranodiorite, Dwarf Well; Geological Survey of Western Australia, Geochronology Record 846.

Kositcin N, McGloin MV, Reno BL and Beyer EE, 2019. Summary of results. Joint NTGS–GA geochronology project: Cu–Au–Ag–Zn mineralisation on MOUNT RENNIE, Aileron Province, March–September 2018, Northern Territory Geological Survey, Record 2019-011.

Lee A, 2012. Kajeena Mining Company. Annual and final report, 2 September 2008 to 20 September 2012. Northern Territory Geological Survey, Open File Company Report, CR2012-0881.



McGloin MV, Reno BL, Kositcin N, Cornwell S, Winzar D, Beyer EE, Huston D, Champion DC, and Crawford A, 2019. The greenfield Grapple and Bumblebee discoveries of the western Aileron Province: First constraints on sulfide mineralising processes: in 'Annual Geoscience Exploration Seminar (AGES) Proceedings, Alice Springs, Northern Territory, 19–20 March 2019'. Northern Territory Geological Survey, Darwin.

McGloin M, 2019. Partial Relinquishment Report for EL30730. 13 October 2017 to 12 October 2019. Independence Group NL. Open File Company Report, CR2019-0546.

McGloin M, 2020. Group Annual Report for GR485, Lake Mackay Project. From 13 October 2019 to 12 October 2020, IGO Limited, Closed File Company Report, Northern Territory Geological Survey.

McGloin M, 2021a. Partial Relinquishment Report for Exploration Licence 30730, Lake Mackay Project. From 13th October 2017 to 21st October 2021, IGO Limited, Open File Company Report, Northern Territory Geological Survey.

McGloin M, 2021b. Group Annual Report 485 for Exploration Licences 24915, 25146, 30730, 30731 and 30739, Lake Mackay Project. From 13 October 2020 to 12 October 2021, IGO Limited, Closed File Company Report, Northern Territory Geological Survey.

McGloin M, Lindsey D, Keys E, 2022. Group Annual Report 485 for Exploration Licences 24915, 25146, 30730, 30731 and 30739, Lake Mackay Project. From 13 October 2021 to 12 October 2022, IGO Limited, Closed File Company Report, Northern Territory Geological Survey.

Morrissey L, Payne JL, Kelsey, DE, and Hand M, 2011. Grenvillian-aged reworking in the North Australian Craton, central Australia: Constraints from geochronology and modelled phase equilibria. *Precambrian Research* 191, 141–165.

Prodigy Gold NL, ASX Announcement. Lake Mackay JV Exploration Update, 26th July 2018.

Prodigy Gold NL, ASX Announcement. High grade cobalt intersected at Grimlock, 30 May 2019.

Prodigy Gold NL, ASX Announcement. More copper and cobalt intersected at Lake Mackay and promising new prospect identified, 17th July 2019.

Prodigy Gold NL, ASX Announcement. First bedrock gold intersected at Goldbug Prospect, 18th January 2021.

Prodigy Gold NL, ASX Announcement. Exceptional high grade copper intersections at the Phreaker Prospect within Lake Mackay JV, 26th May 2021.

Reno BL, McGloin MV and Meffre S, 2018. Constraints on The Timing of Sulfide Breccia Formation at The Grapple Cu–Au–Ag–Zn Prospect, Central Australia: In-situ LA–ICP–MS monazite geochronology of a new Proterozoic greenfields discovery. Northern Territory Geological Survey Record 2018-013.

Scrimgeour IR, 2013. Chapter 12. The Aileron Province: in Ahmad M and Munson TJ (compilers). 'Geology and mineral resources of the Northern Territory'. Northern Territory Geological Survey, Special Publication 5.

Scrimgeour IR, Close DF and Edgoose CJ, 2005a. Mount Liebig, Northern Territory. 1:250 000 geological map series explanatory notes, SF 52-16. Northern Territory Geological Survey.

Scrimgeour IR, Kinny PD, Close DF And Edgoose CJ, 2005b, High-T granulites and polymetamorphism in the southern Arunta Region, central Australia: Evidence for a 1.64 Ga accretional event. *Precambrian Research*, 142, 1–27.

Selway K, Hand M, Heinson G and Payne JL, 2009. Magnetotelluric constraints on subduction polarity: reversing reconstruction models for Proterozoic Australia. *Geology* 37, 799–802.

Shaw RD, Zeitler PK, McDougall I and Tingate PR 1992. The Palaeozoic history of an unusual intracratonic thrust belt in central Australia based on ^{40}Ar – ^{39}Ar , K–Ar and fission track dating. *Journal of the Geological Society of London* 149, 937–954.

Skirrow RG, Murr J, Schofield A, Huston DL, van der Wielen S, Czarnota K, Coghlan R, Highet LM, Connolly D, Doublier M, Duan J, 2019. Mapping iron oxide Cu–Au (IOCG) mineral potential in Australia using a knowledge-driven mineral systems-based approach, *Ore Geology Reviews*, 113.

Whitford M, 2019. Application of electrical geophysics to exploration at the Lake Mackay Project: in 'Annual Geoscience Exploration Seminar (AGES) Proceedings, Alice Springs, Northern Territory, 19–20 March 2019'. Northern Territory Geological Survey, Darwin.



Winzar D, 2016. Early indications of a copper-gold belt in the southwestern Aileron Province, Northern Territory: in 'Annual Geoscience Exploration Seminar (AGES) Proceedings, Alice Springs, Northern Territory 15–16 March 2016'. Northern Territory Geological Survey, Darwin.

Winzar D, 2018. Group Annual Report for GR485, Lake Mackay Project. From 13 October 2017 to 12 October 2018, Independence Group NL, Closed File Company Report, Northern Territory Geological Survey.

Winzar D and Whitford M, 2018. IGO Core Geophysics Collaboration Final Report Eastern Contact Airborne Electromagnetic Survey Lake Mackay Project, Independence Group NL Open File Company Report, Northern Territory Geological Survey, CR2018-250.

Wong BL, Morrissey LJ, Hand M, Fields CE, and Kelsey DE, 2015. Grenvillian-aged reworking of late Paleoproterozoic crust of the southern North Australian Craton, central Australia: Implications for the assembly of Mesoproterozoic Australia. *Precambrian Research* 270, 100–123.

Wyborn L, Hazell M, Page R, Idnurm M and Sun S, 1998. A newly discovered major Proterozoic granite-alteration system in the Mount Webb region, central Australia, and implications for Cu–Au mineralisation. *AGSO Research Newsletter*.



Suite 4, Level 5
85 South Perth Esplanade
South Perth WA 6151

PO Box 496
South Perth WA 6951
Western Australia

T. +61 8 9238 8300
F. +61 8 9238 8399
E. contact@igo.com.au

igo.com.au
Independence Group NL
ABN 46 092 786 304