



# SHREE MINERALS LTD

ASX Announcement  
15<sup>th</sup> January 2021

**Quarterly Activity Report**  
**Period ending**  
**31<sup>st</sup> December 2020**

## Highlights

ASX Code SHH

ACN 130 618 683

### COMPANY DIRECTORS

Sanjay Loyalka  
Director and  
Company Secretary

Davide Bosio  
Non-Executive  
Director

Amu Shah  
Non-Executive  
Director

### CONTACT DETAILS

Principal &  
Registered Office  
Unit 38  
18 Stirling Highway  
NEDLANDS WA 6009

[www.shreeminerals.com](http://www.shreeminerals.com)

T +61 8 6118 1672

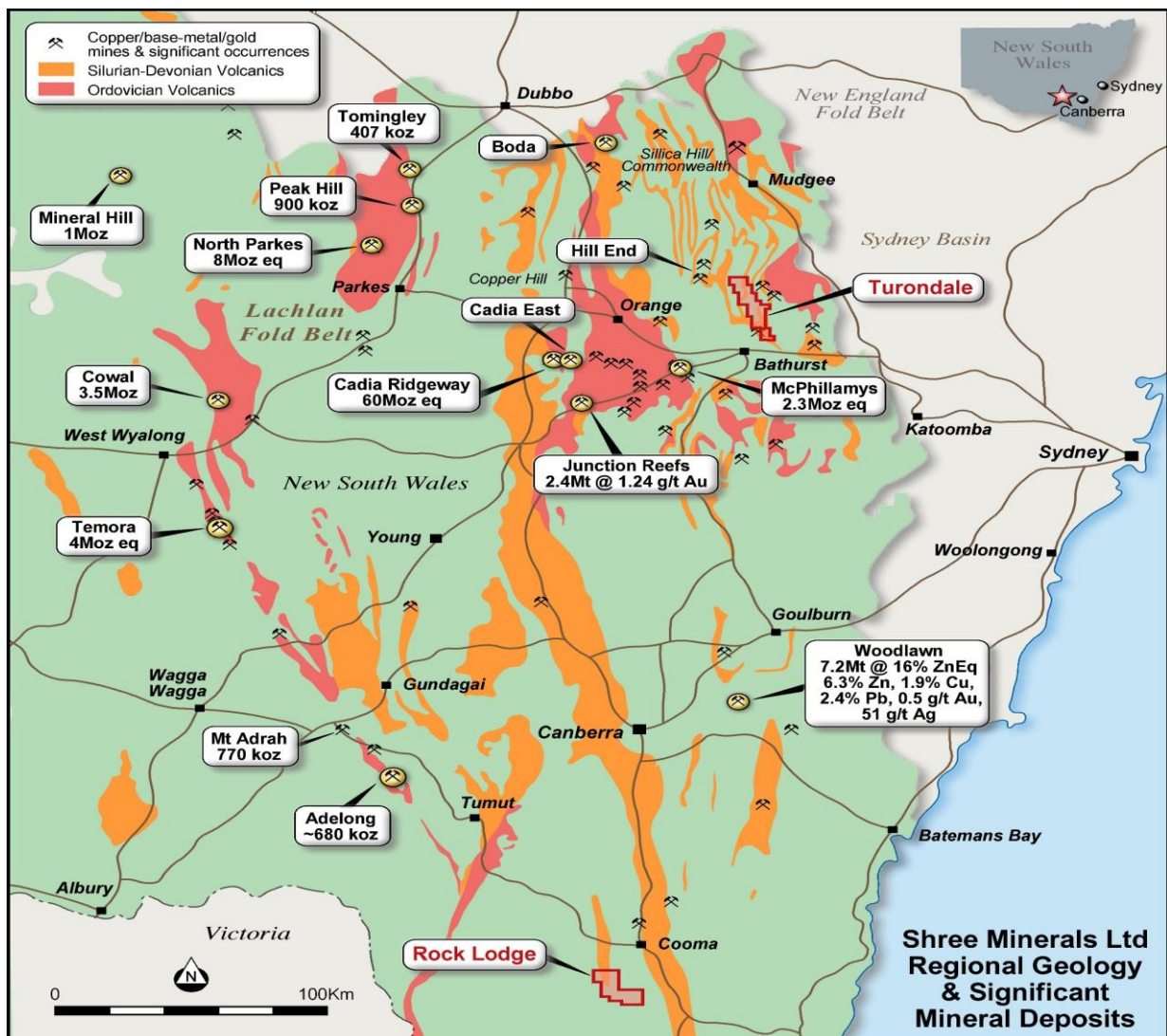
- **Exploration Licence (EL9017) Granted at the Turondale Project in the World Class Lachlan Fold Belt, NSW**
- **New Exploration Licence Application (ELA 6147) lodged over historical gold workings in the Lachlan Fold Belt - Rock Lodge Project.**
  - Previous RC drilling and ground geophysics at the highly prospective Rock Lodge prospect indicates potential below and along strike of the historic gold workings.
  - Previous drill results include up to **5.36 g/t Au, 55.6 g/t Ag, 0.12% Bi, 0.8% Cu and 1.46% Zn.**
  - Rock chip sampling of outcropping quartz veins returned gold values up to **11.1g/t Au.**
  - Reported rock chip sampling 100m west of previous drilling identified a parallel gossan with up to **2.52g/t Au, 10.2g/t Ag and a coincident IP anomaly** that remains undrilled.
  - The polymetallic sulphide rich mineralisation has possible affinity with Intrusion Related Gold Systems (IRGS).
- **Exploration Licence E40/384 granted at the Ulysses South Project**
- **Exploration studies including Management plans at the Dundas Project**
- **Substantial Progress in re-permitting efforts of the direct shipping Iron ore (“DSO”) project at Nelson Bay River Iron Project (“NBR”)**
  - Firm Iron Ore prices with favourable outlook.
  - Mine in ready state to recommence production at short notice with existing development in place.

## Turondale Project

Shree Minerals Ltd (“Shree” or the “Company”) has during the quarter received grant of Exploration Licence 9017(formerly ELA 6044) at Turondale Project.

The Turondale Project covers an area of 129.9 km<sup>2</sup> and is located 15km north of Bathurst. It is prospective for orogenic, porphyry and skarn related gold mineralisation.

This was the first exploration licence application by the Company in the highly prospective Lachlan Fold Belt of New South Wales in July 2020. A second tenement application was made for the Rock Lodge Project (ELA 6147) in October 2020, which is expected be granted during the 1<sup>st</sup> quarter of 2021.



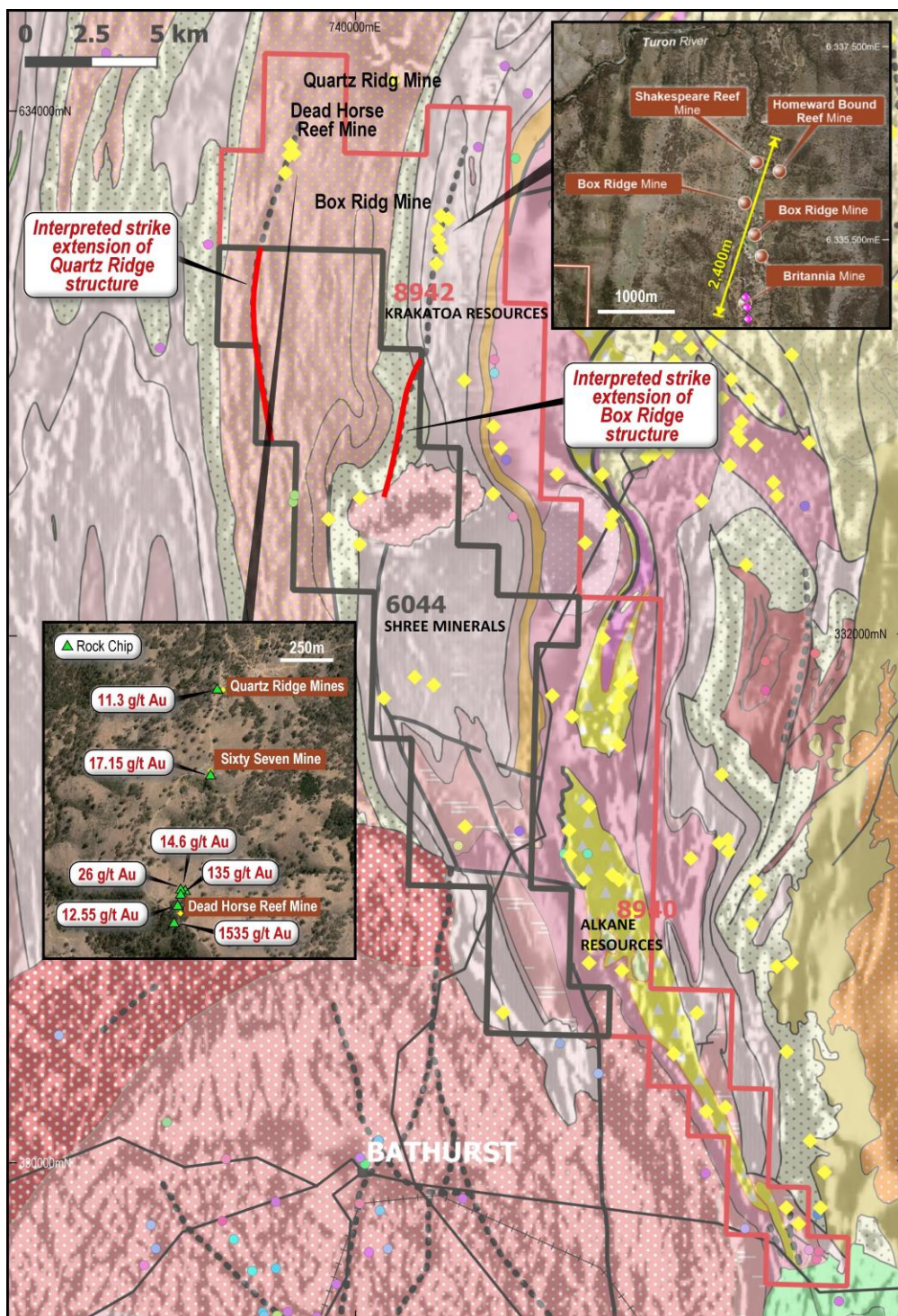
**Figure 1.** Regional location of Shree’s tenements within the East Lachlan Fold Belt.

The Company anticipates commencement of field activities once the land access agreements with respective parties are made, in early 2021. Shree plans to commence fieldwork on the highest priority targets identified by the literature review, interpretation and target generation study (Refer ASX announcement of 8<sup>th</sup> September 2020).

The southern strike extensions of both the Quartz Ridge and the Box Ridge prospects represent priority targets for Shree Minerals. Initial field work will comprise reconnaissance geological mapping and stream sediment sampling (Refer Figure 2). The tenement is well drained by many



streams and tributaries so the exploration program may include regional geochemical stream-sediment sampling to provide systematic coverage of the tenement.

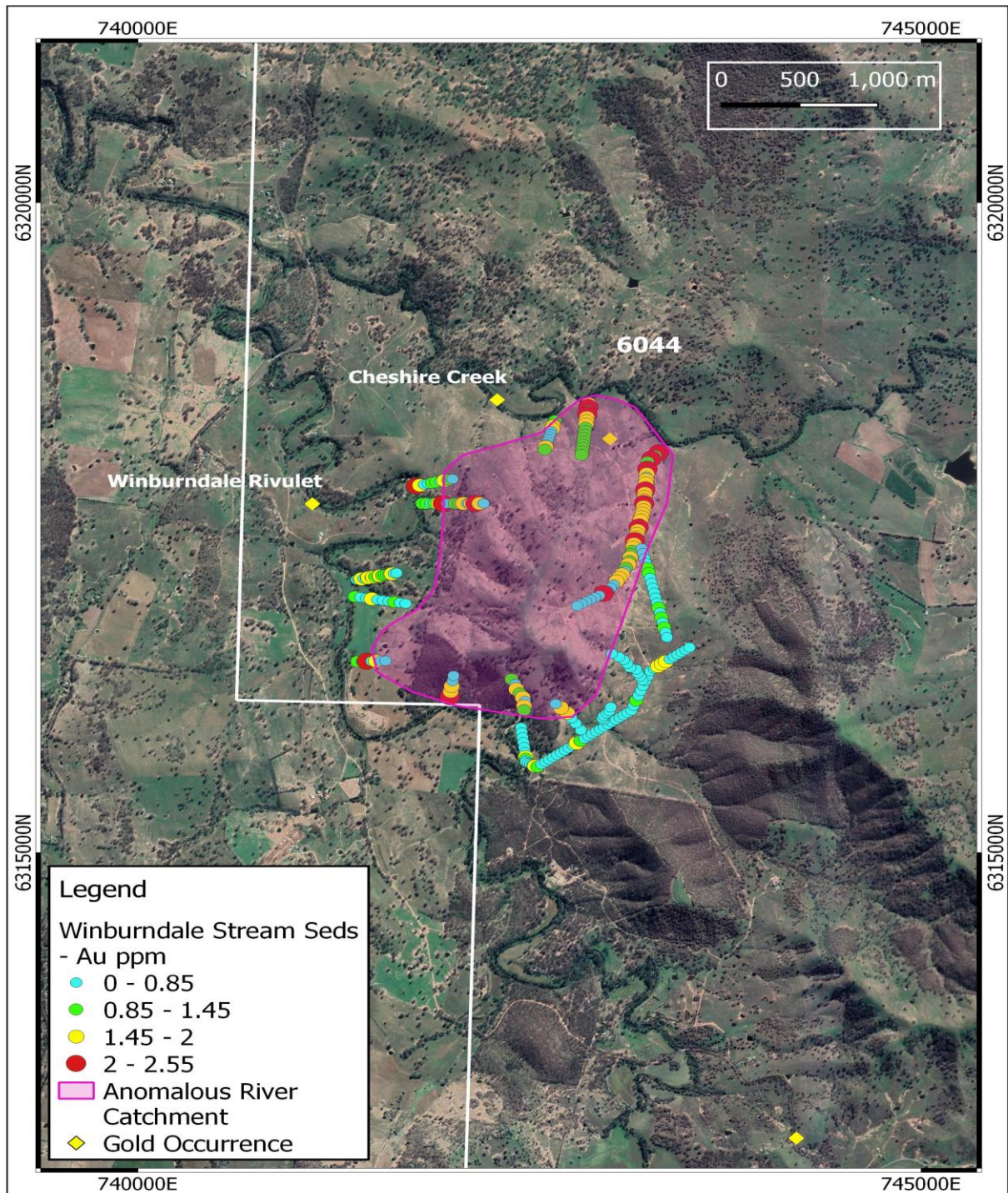


**Figure 2.** Composite image showing both the shaded geology and aeromagnetic structure.

Both the Quartz Ridge and Box Ridge reefs structures can be interpreted from the magnetics to strike southwards into Shree’s ELA6044. The geology also suggests the volcano-sedimentary sequence is continuous into ELA6044. Also shown are gold occurrences (yellow diamonds).

Another priority target area is located near the historic workings at Cheshire Creek and Winburndale where highly encouraging geochemical results were reported by Nickel Mines Ltd. Additional stream-sediment sampling, soil sampling and geological mapping is planned (Refer Figure 3).





**Figure 3.** Open File soil and stream-sediment geochemistry (Nickel Mines Ltd., 1972) collected within Shree's ELA6044. An anomalous river catchment area has been outlined.

### Rock Lodge Project

During the quarter, the Company lodged a new Exploration Licence Application (**ELA 6147**) over the historic Rock Lodge gold workings near Cooma in NSW (Figure 1). **The Rock Lodge Project** covers an area of 75 km<sup>2</sup> and is located 35km south of Cooma. It is prospective for orogenic, Intrusion Related Gold Systems (IRGS) and skarn related gold mineralisation.

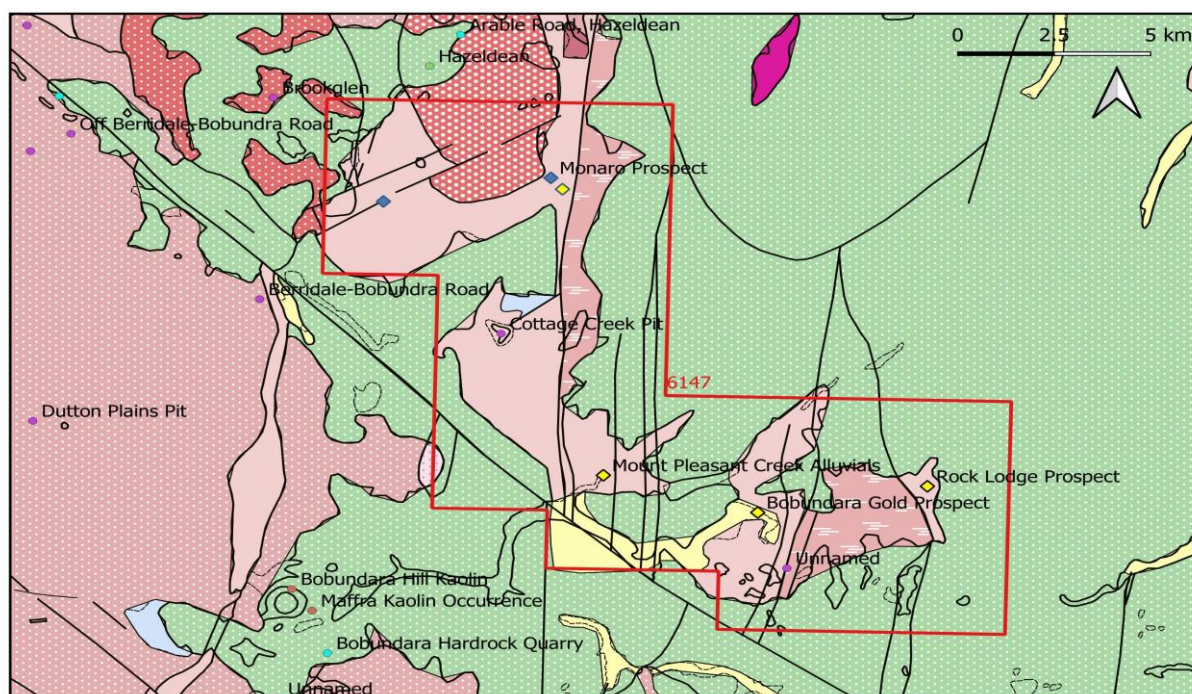


The Rock Lodge prospect exhibits high-grade gold mineralisation associated with structurally controlled epigenetic massive sulphide veins. The grades intercepted during historical drilling show the area to be highly mineralised and the mineral assemblages are synonymous with other major mineral deposits within the Canberra to Cooma region of the Lachlan Fold Belt.

The Rock Lodge Project (ELA6147) covers a folded sequence of Ordovician aged Adaminaby Group shales/siltstones and Gungoandra Siltstones (Figure 4). At the Rock Lodge prospect there is a steeply dipping sequence of predominantly siltstone with sandstone interbeds to the west and strongly carbonaceous shales to the east, Figure 5. The siltstones and shales have been locally silicified and disseminated pyrite is common throughout the rocks.

### Previous Exploration at Rock Lodge

The Rock Lodge prospect has been explored by only two companies in the last fifty years. Their exploration programs progressed to RC and diamond drilling but significant intersections were not followed up. In addition, consideration was not given to the regional geology away from the old workings and several target areas generated from geochemical and geophysical surveys at Rock Lodge were also not followed up.



**Figure 4.** Regional geology and mineral occurrences within the application area.

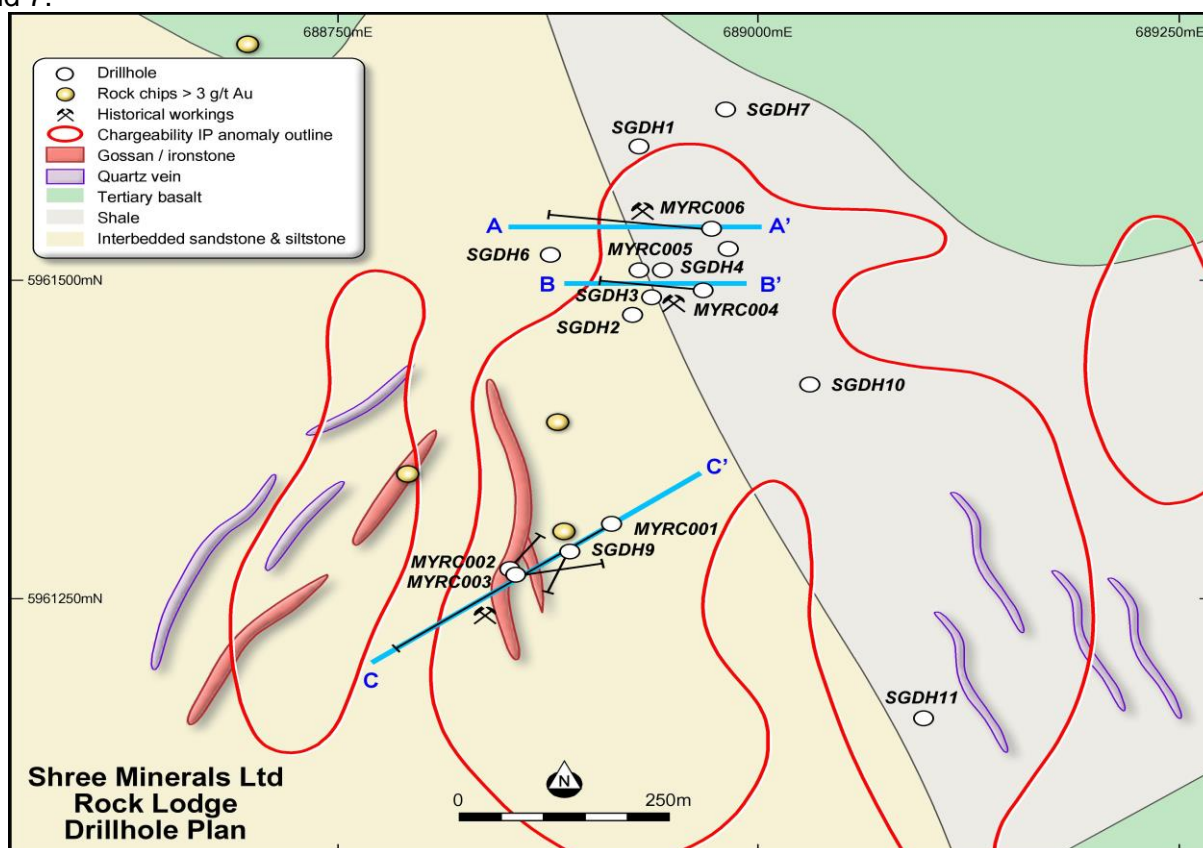
Rock chip sampling of outcropping quartz veins at Rock Lodge by Southern Gold NL returned assay results of up to **11.1g/t Au**. Follow up diamond drilling (SGDH01 to SGDH011) in 1985 targeted the historic workings. The holes intersected up to 8m of massive sulphide with recorded grades up to **4.28g/t Au, 35g/t Ag, 0.79% Cu and 13.5% Zinc**. Diamond hole SGDH08 intersected **12m @ 1.2 g/t Au, 9.8 g/t Ag and 0.2% Cu**. The location of these holes is illustrated in Figure 5.

The mineralisation is associated with massive and disseminated pyrite-arsenopyrite-chalcopyrite-sphalerite sulphides and quartz, within host phyllites and sandstone of the Adaminaby group. This is exposed on the surface as a distinct gossan and ironstone. Sulphide mineralisation is associated with silica alteration and minor quartz veining, indicating that a significant volume of mineralising fluid has passed through the rock.

Six RC holes (MYRC001 to MYRC006) were also drilled underneath old workings at Rock Lodge by Alt Resources in 2018. This drilling is illustrated in Figure 5. Their drilling also intercepted massive sulphides in four holes. Significant drilling intercepts by Alt Resources included:

- **MYRC001, 3m @ 2.1 g/t Au, 3.7 g/t Ag and 174 g/t Bi from 17m and 2m @ 2.7 g/t Au, 11.8 g/t Ag, 300 g/t Bi and 0.48% Cu from 62m.**
- **MYRC003, 1m @ 5.4 g/t Au, 55.6 g/t Ag, 212 g/t Bi and 0.11% Zn.**
- **MYRC005, 2m @ 1.6 g/t Au, 9.5 g/t Ag, 903 g/t Bi from 19m and 1m @ 1.4 g/t Au, 375 g/t Ag, 163 g/t Bi, 1.6% Pb from 23m and 1m @ 4.8 g/t Au, 0.48% Pb, 1.46% Zn from 57m.**

Cross sections of the drilling by Alt Resources and Southern Gold NL are illustrated in Figures 6 and 7.

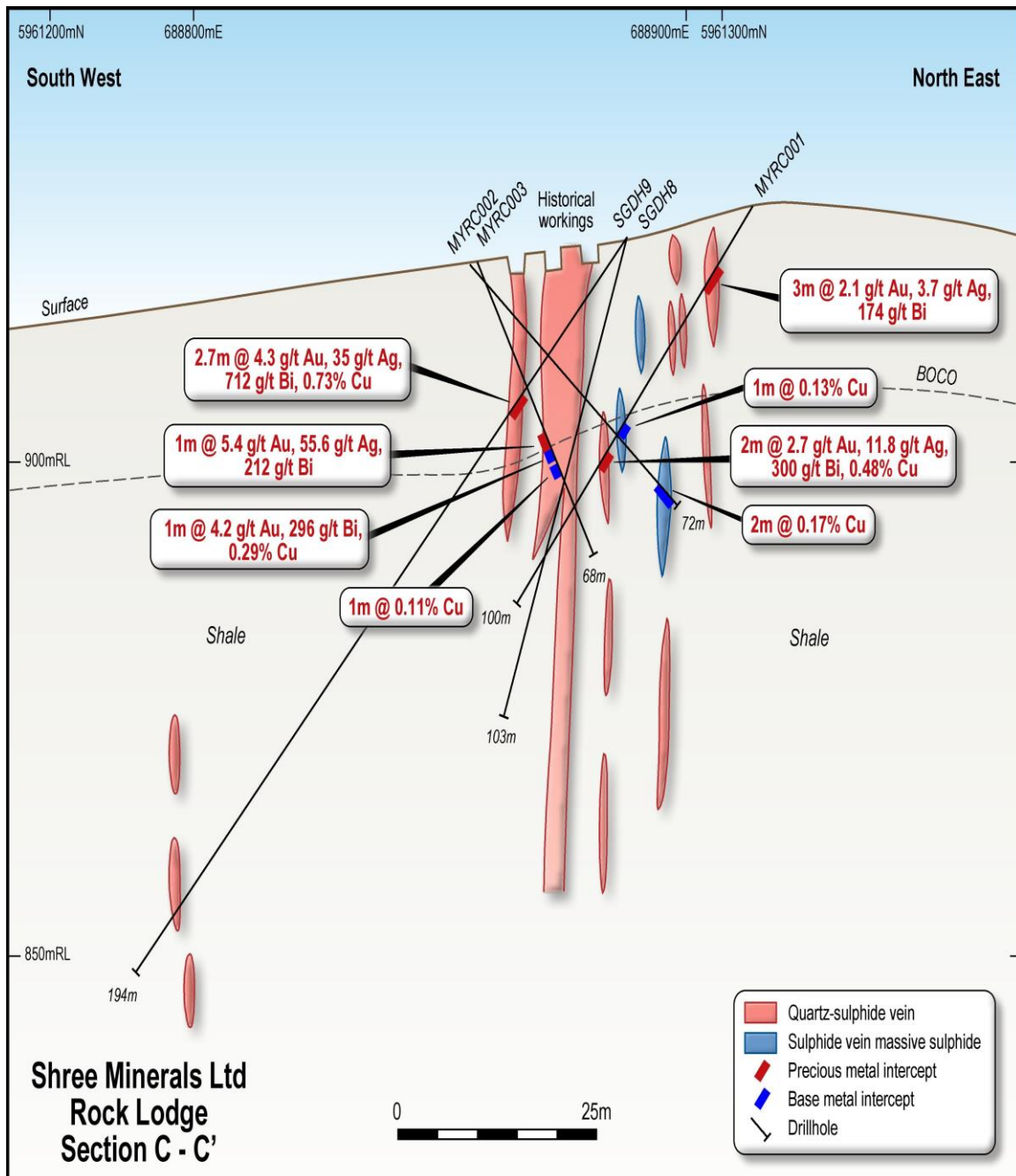


**Figure 5.** Historical exploration summary diagram showing the main geological features of the Rock Lodge prospect. Past drill hole locations, anomalous rock chip sampling and IP chargeability anomalies are also illustrated.

Geophysical surveys (IP and EM) by Alt Resources in 2016-2017, outlined deeper and parallel targets that were not tested by the drilling program. The IP data, as illustrated in Figure 5, defined both the eastern zone of gossan and sulphide mineralisation as a chargeability anomaly, along with a second (western) zone of similar extent and width to the eastern zone. Follow up field investigation of this zone identified a zone of outcropping, but narrow boxwork gossans and ironstones, to the west of cross section C – C' (Figure 5).

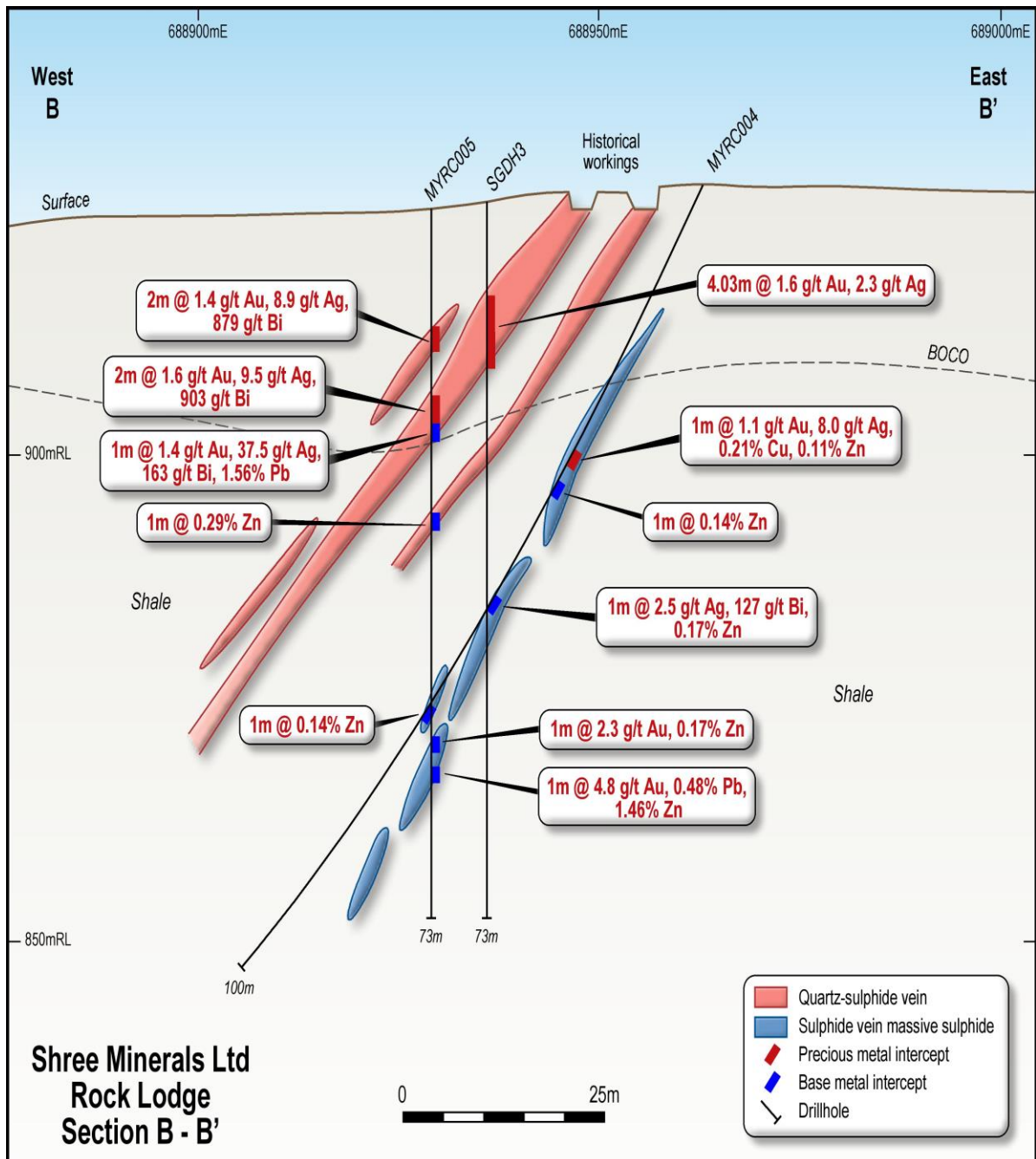
A number of rock chips were taken from the length of this western zone with assays up to **2.52 g/t Au, 10.2 g/t Ag**, as well as anomalous arsenic, bismuth and copper. These results stand out from anomalous background levels of 0.2 g/t Au. This western gossan zone remains undrilled and represents an outstanding drill ready target. There are numerous other rock chip samples with anomalous gold assays recorded throughout the prospect, as illustrated in Figure 5.

The historical workings at nearby Bobundara (Figure 4) have a recorded production of 575g Au (18.5oz) with an average grade of 21 g/t Au (Herzberger and Barnes, 1978). Mining occurred during two periods from 1928-30 and 1948-49. The mineralisation occurs as disseminated sulphide minerals in a narrow, discontinuous quartz-chlorite lode parallel to the host slates' cleavage. The workings consist of 3 or 4 shafts, an adit and shallow pits.



**Figure 6.** Cross sections of historical drilling at Rock Lodge. Section locations are shown in Figure 5.





**Figure 7.** Cross sections of historical drilling at Rock Lodge. Section locations are shown in Figure 5.

### IRGS Models.

The polymetallic sulphide rich mineralisation at Rock Lodge has possible affinity with the Intrusion Related Gold System (IRGS) group of deposits, indicated by anomalous Au, Ag, Bi, Cu, Pb, Zn. Trace element enrichment may include Sn, W, Mo, As, Te, Sb ± (Pb, Cu). Alt Resources noted the elevated bismuth (<0.12%) in drill holes MYRC001-6 as evidence for an affinity with the IRGS group. A NSW Government radiometric survey in 2003 also raised the possibility of intrusive rocks to the southwest of the project area.

IRGS deposits are commonly within a large hydrothermal system with potential for large tonnage, low grade (1 – 2 g/t) gold mineralisation in disseminated systems or higher grades in vein systems.



Deposit sizes range from 700K ozs at Timbara in NSW to 140 tonnes Au at Kidston in North Queensland. Production is typically for gold only. Metallurgical credits can include Ag, Cu and Zn, (e.g., Red Dome). Many mines overseas typically contain greater than 3 Moz. High-grade examples include Pogo (9.98 Mt at 17.8 g/t Au; quoted in Lang et al., 2000).

Preferred economic targets include greisens, veins, breccias and skarns associated with high level felsic volcanics and granites. Plutons are usually only just being unroofed or still shallowly buried.

### ULYSSES SOUTH PROJECT

During the quarter, Exploration Licence E40/384 was granted (Ulysses South Project). The project occupies an area of 65.4km<sup>2</sup> and is located 30km south of Leonora, and 6 kms north of Shree's Golden Chimney exploration licence (E40/378). The new tenement is located 5 kms south of the Ulysses Group of gold mines, where an indicated resource of 867,000 ozs Au has been announced by Genesis Minerals (ASX:GMD). (Figure 8).

The Ulysses South project occurs within the prolifically mineralised Leonora Geological Terrain (Figure 8). Significant gold deposits in the area include the Sons of Gwalia Gold mine (1.9 Moz Au in reserve at a grade of 7.5 g/t Au), the King of the Hills Mine (resources of 380,000oz Au), Tower Hill (625,000oz Au in resources) and Ulysses.

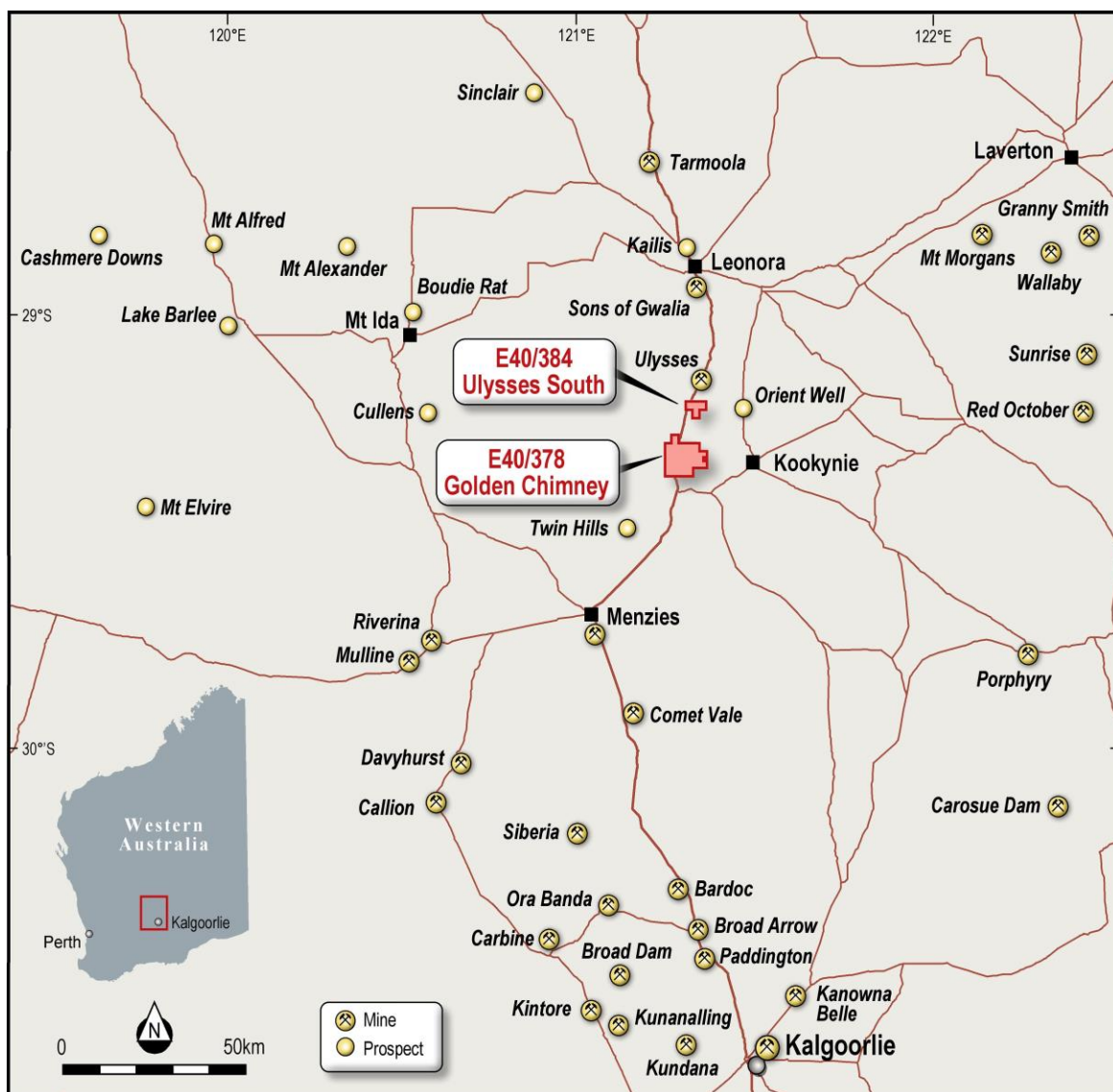


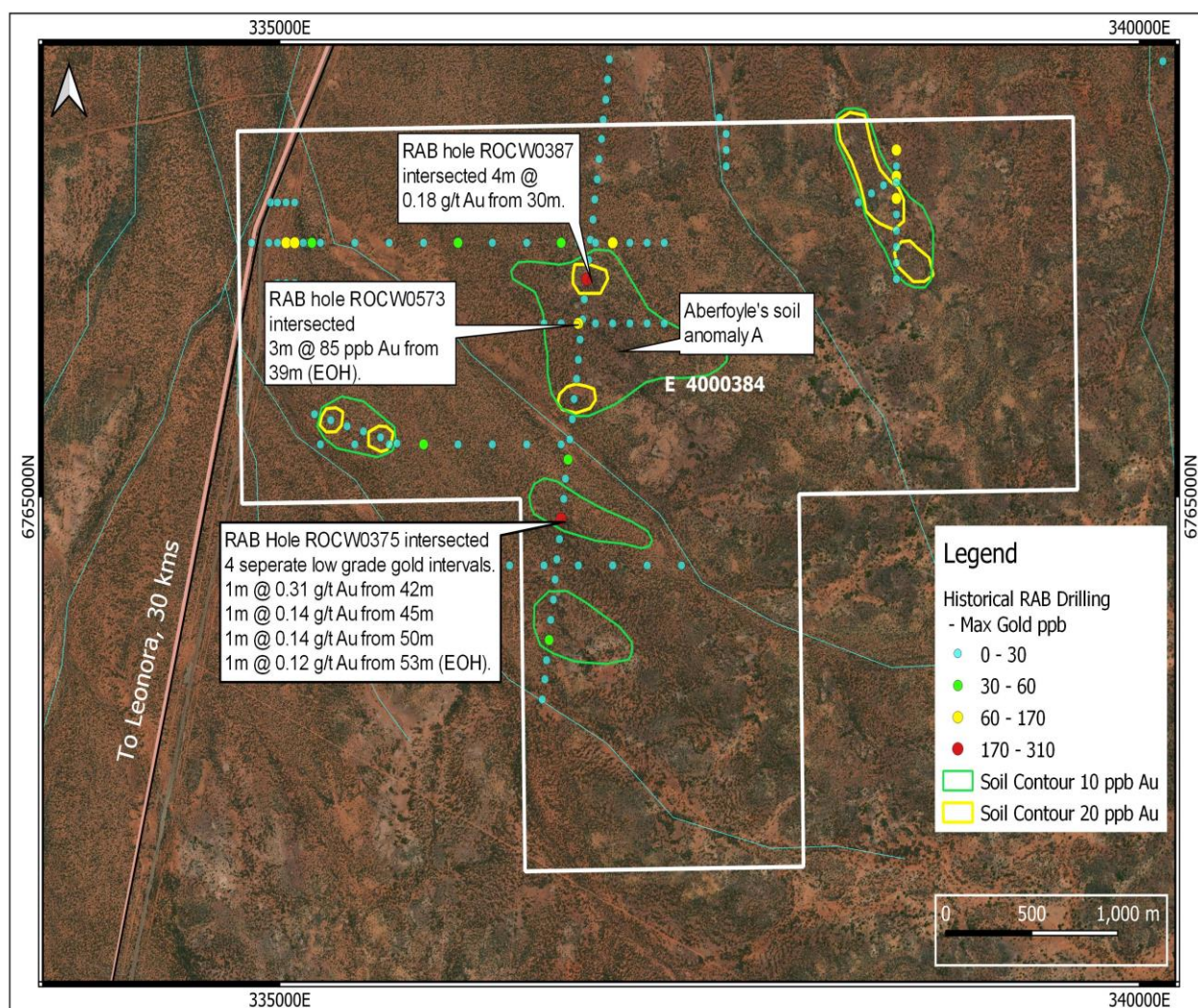
Figure 8. Regional location of the Ulysses South Project, E40/384

Exploration of any consequence within the area of E40/384 was conducted by Aberfoyle Resources Ltd during the period from 1995-1996. Soil sampling by Aberfoyle was conducted on a 400m x 100m pattern. Soils were sieved to – 2 mesh and analysed for gold to a 1 ppb detection limit. Several geochemical anomalies were outlined, including anomaly A, as illustrated in Figure 9.

One initial north-south traverse of vertical RAB drilling was drilled in 1996 by Aberfoyle to investigate soil anomaly A and other adjacent anomalies, outlined in Figure 2. Four separate low-grade gold intervals in **ROCW0375** including anomalous gold at the bottom of hole (54m) suggest follow up drilling by Shree is warranted (Figure 9).

RAB hole **ROCW0387** is also anomalous to the north. Both holes are spatially related to soil anomaly A, outlined by the > 10 ppb Au soil geochemical contour, illustrated in Figure 9.

Regolith mapping by Aberfoyle and drilling has shown this new tenement is mostly underlain by laterite and weathered transported overburden, sometimes up to 60m deep in the western edge of the tenement. As such, subtle soil anomalies may be more significant here than in a shallow covered terrain dominated by outcropping rocks.

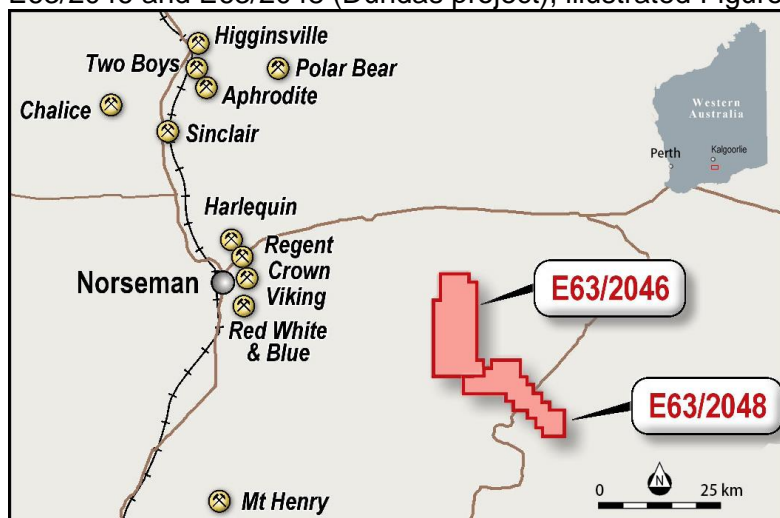


**Figure 9.** Summary of historical exploration within E40/384, showing maximum gold assay (ppb) in RAB drilling and soil geochemistry contours.



## Dundas Project

During the quarter, the Company has conducted desktop studies, management plans & discussions with various stake holders regarding access in anticipation of grant of the licenses of its two Exploration Licences (ELA), 60 kms east of Norseman Western Australia, E63/2046 and E63/2048 (Dundas project), illustrated Figure 10.



**Figure 10.** Regional Location of the Dundas Project

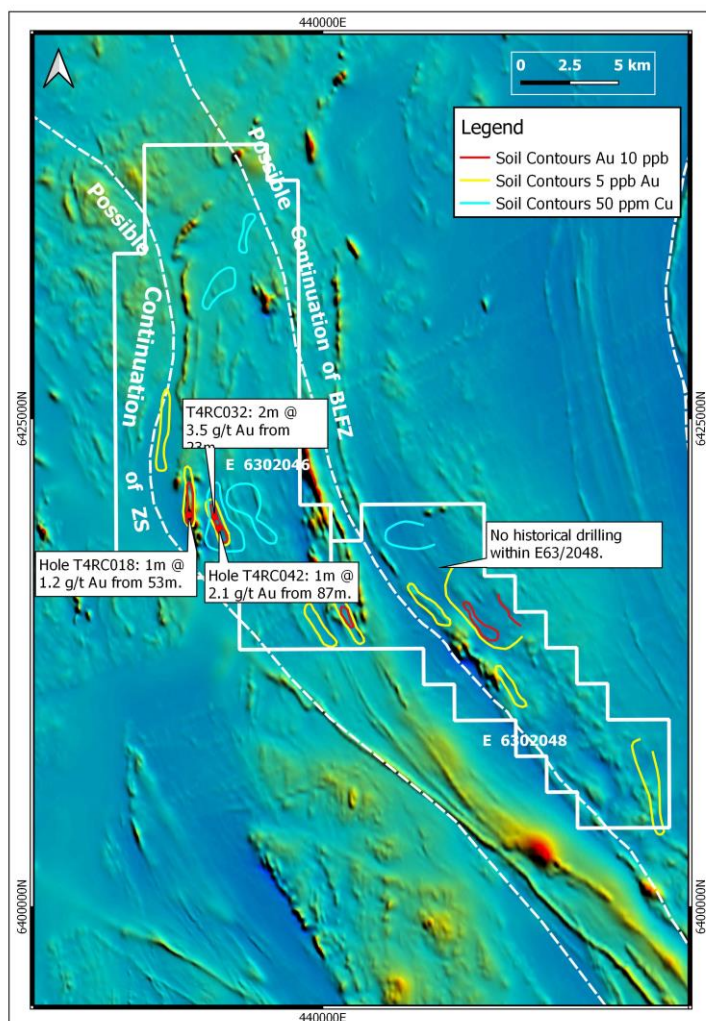
Within the tenement areas, aeromagnetic images display linear features very suggestive of Archaean greenstone stratigraphy – mafic, ultramafic or Banded Iron Formation rock types, illustrated in Figure 11.

Only very limited historical exploration has been carried out in the area due to the thin blanket (usually 5 – 10m) of transported cover. One km spaced auger soil traverses undertaken by AngloGold Ashanti Australia (AngloGold) and a localised RAB/RC drilling program by Pan Australian Resources during the 1990's has identified the presence of gold mineralisation hosted by mafic rocks in E63/2046. Reported intersections include:

- T4RC032** 2m @ 3.5g/t Au from 23m
- T4RC042** 1m @ 2.1g/t Au from 87m
- T4RC0018** 1m @ 1.2g/t Au from 53m

The mineralisation remains open and the associated Au and Cu soil geochemistry (AngloGold's data) suggests the mineralisation is much more extensive than indicated by drilling. Several large and robust gold in soil geochemical anomalies, up to 6 kms in length, are spatially associated with the interpreted BLFZ in E63/2048 and represents a high priority for drilling .

**Figure 11.** Soil geochemical contours and anomalous drilling intersections of the exploration licence applications.



## Nelson Bay River Iron Project

During the quarter, the Company has actively been advancing the Direct Shipping Ore (“DSO”) project at Nelson Bay River Project (“NBR” or the “Project”).

Shree’s wholly owned NBR Project (Mining Lease 3M/2011), is engaged in the mining and shipment of iron ore. The NBR Project is located in the far North-West of Tasmania, an area that has substantial infrastructure devoted to major mining activities and is approximately 100 kilometres by mostly sealed road to Port Latta and approximately 150 kilometres to the Burnie Port.

The Project is within an established mineral province in the region. Operating mines include Grange Resources’ (ASX: GRR) Savage River Iron Ore and MMG’s Rosebery Mine.



Figure 12 : Location Plan of the Nelson Bay River Iron Project showing access route to the port at Burnie

NBR previously produced a direct shipping product until being placed on care and maintenance in June 2014 following sharp iron ore price falls. Following the ongoing improvement in Iron Ore Prices since mid-2018, the Company has been actively engaged in re-permitting activities at NBR. The strategic aim of the re-permitting has been to recommence the development and ultimate production of the existing DSO resources at NBR by extracting, processing (crushing and screening) and shipping the remaining hematite ore.



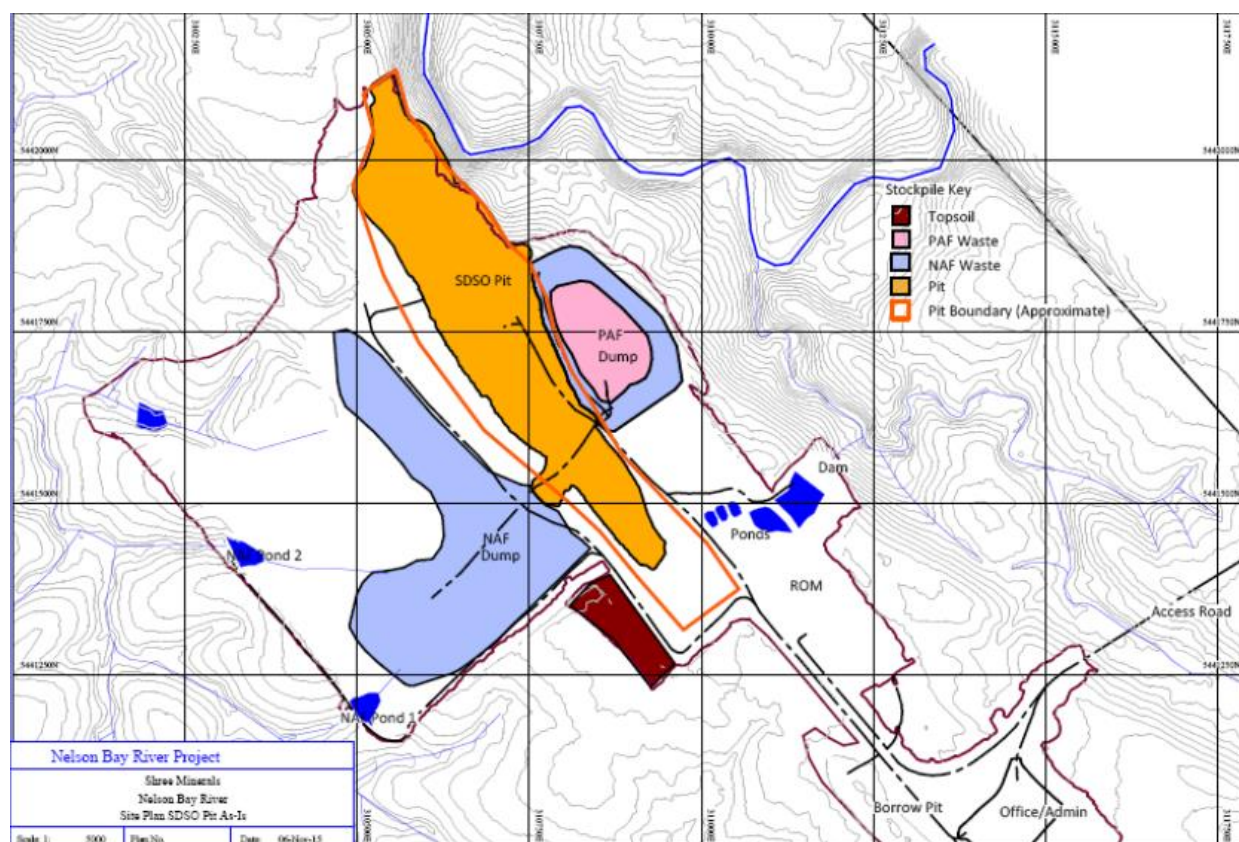
As previously reported in various Company announcements, to resolve the legal issues with the current permits, the Company applied for a new Tasmanian environmental permit for direct shipping iron operations. After public consultation in November 2018, the Environmental Protection Agency (“EPA”) issued guidelines for the preparation of a Development Proposal & Environment Management Plan (“DPEMP”).

Consequently, Shree has worked towards adopting this framework and has initiated the requisite technical studies to develop a working draft of the DPEMP. As part of the process, Shree has been working with the Government & technical experts to incorporate a number of changes to our initial plan to capitalise on the expert recommendations. Consequently, Shree has in recent few months been progressing further technical studies, surveys, laboratory test work, modelling and engineering. These studies have been completed during the quarter and the Company now hopes to finalise & submit the draft DPEMP soon to enable the EPA assessment process to follow. On that basis, the company hopes to be in a position in 2021 to consider a formal decision for commencement of the mine.

The NBR operation was previously developed as an all-contract mining, processing and haulage operation using local contractors in the region. The DSO requires no major processing beyond crushing and screening following which, the ore is then trucked to the port and shipped. The South DSO pit (“SDSO”) was developed in 2013 with production successfully commencing in November 2013 with the first shipment of ore leaving the Port of Burnie in January 2014.

Demand from historic customers was driven by positive metallurgy, specifically low impurities like alumina (Al<sub>2</sub>O<sub>3</sub>) and phosphorus (P).

The SDSO pit is approximately 25% complete, with waste rock materials deposited in two dumps designated as the Non-Acid Forming (“NAF”) waste rock dump and the Potentially Acid Forming (“PAF”) waste rock dump.



**Figure 13:** Existing site plan of the Nelson Bay River Project

Figure 13 shows the existing mine development on site. The main features are the SDSO pit and waste dumps. Other elements are the mine water treatment dams, ROM stockpile area and the facilities area. Figure 14 shows the Google Image of the NBR mine.



**Figure 14.** Satellite image of the Nelson Bay River Iron Project Source: Google Images

The next stage after completion of SDSO pit will be mining of the north pit that targets the main magnetite ore body. At the top of this pit, there is an approximate 20 metre section of higher-grade ore - the beneficial oxide resource ("BFO"). This will require only dry magnetic separation in addition to crushing and screening before shipping. The BFO operation is a transition between the DSO operation and the magnetite production stage. The BFO circuit will require only a nominal capital expenditure of circa A\$1 million. The BFO section is fed by a -3mm size ore stream, which is upgraded by dry Low Intensity Magnetic Separation ("LIMS"). Test work has included crushing and passing the ore over a coarse LIMS unit at 600 gauss pass and produced an upgraded product with grades Fe 57.5%, SiO<sub>2</sub> 11.5% and Al<sub>2</sub>O<sub>3</sub> 1.55% at 82.3% mass recovery.

For the magnetite project, completed studies have comprised of mine planning for an open pit able to extract ore for processing through a local plant. The Plant will include circuits to grind, mill and magnetically separate ore to produce high grade magnetite concentrate for Blast Furnace Pellets ("BFP") and Dense Media Magnetite ("DMM"). Magnetite pellets earn a premium to hematite iron ore as they are higher grade and allow for less energy consumption in a blast furnace.



## Tenements

- **The mining tenements held at the end of quarter and their location.**

<u>Mine Lease/ Exploration License</u>		<u>Locality</u>	<u>Remarks</u>
3M/2011	ML	Nelson Bay River	100% Shree Minerals Ltd
E40/378	EL	Golden Chimney	100% Shree Minerals Ltd
E40/384	EL	Ulysses South	100% Shree Minerals Ltd
E63/2046	ELA	Dundas	100% Shree Minerals Ltd
E63/2048	ELA	Dundas	100% Shree Minerals Ltd.
EL9017 (formerly ELA6044)	EL	Turondale	100% Shree Minerals Ltd.
ELA 6147	ELA	Rock Lodge	100% Shree Minerals Ltd.
EL31225	EL	Bruce Project	Part of farm-in & JV agreement with Territory Lithium Pty Ltd (Arunta JV) *
EL 32420	ELA	Edwards Creek	Part of farm-in & JV agreement with Territory Lithium Pty Ltd (Arunta JV) *
EL 32419	ELA	Box Hole	Part of farm-in & JV agreement with Territory Lithium Pty Ltd (Arunta JV) *

ELA: Exploration Licence Application

- **The mining tenement interests relinquished during the quarter and their location**

NIL

- **The mining tenements interests acquired and disposed of during the quarter and their location**

EL9017 (formerly ELA 6044) granted  
EL 40/384 granted  
ELA 6147

- **The beneficial percentage interests held in farm-in or farm-out agreements at the end of the quarter**

NIL. Please refer to details of Arunta Joint Venture as below. The Company is yet to earn an interest.

- **The beneficial percentage interests in farm-in or farm-out agreements acquired or disposed of during the quarter**

NIL

\* The Company has a farm-in and joint venture agreement (Arunta Joint Venture whose principal terms include:

- SHH can earn a 50% equity interest in the Joint Venture through the total expenditure of \$50,000.
- Once SHH has earned a 50% equity interest, further Joint Venture expenditure contributions will be pro-rata, or else a non-contributing party's equity will be diluted using the standard industry dilution formula.
- If SHH were doing sole expenditure, its share of equity in the Joint Venture would increase to 90% by it making a total expenditure of \$450,000.
- Should a party's equity in the Joint Venture fall to 10%, its share will be automatically acquired by the other party in exchange for a 1% NSR Royalty.
- SHH will manage the Joint Venture during the earn-in stage, and while ever it holds majority equity.

## CORPORATE

### Business Development.

Shree is continuing to identify and assess exploration and early development opportunities throughout Australia in Gold and Base Metals projects.

During the Quarter, a total sum of \$41,250 was paid to related parties and their associates. The Company advises that this relates to executive directors' salaries, non-executive director's fees and superannuation.

Exploration and Evaluation Expenditure during the Quarter was \$79,797. Details of exploration activity as included in this Quarterly Activities Report.

Mining Development activities during the Quarter was \$62,422 as per details of permitting efforts for NBR project as included in this Quarterly Activities Report. There were no substantive mining production activities during the Quarter.

### **Competent Person Statement**

The review of historical exploration activities and results contained in this report is based on information compiled by Michael Busbridge, a Member of the Australian Institute of Geoscientists and a Member of the Society of Economic Geologists. He is a consultant to Shree Minerals Ltd. He has sufficient experience which is relevant to the style of mineralisation and types of deposits under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (the JORC Code).

Michael Busbridge has consented to the inclusion in the report of the matters based on his information in the form and context in which it appears.

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

Where the Company refers to the Mineral Resources in this report (referencing previous releases made to the ASX), it confirms that it is not aware of any new information or data that materially affects the information included in that announcement and all material assumptions and technical parameters underpinning the Mineral Resource estimate with that announcement continue to apply and have not materially changed.

### **Cautionary Statement (for Turondale, Rock Lodge Dundas and Ulysses South Gold Projects)**

- The Exploration Results for Turondale, Rock Lodge and Ulysses South Gold Projects have been reported by former owners;
- The source and date of the Exploration Results reported by the former owners have been referenced in the company's announcement to ASX dated 23/12/2020, 15/7/2020, 3/11/2020 and 25/11/2020;
- The historical Exploration Results have not been reported in accordance with the JORC Code 2012;
- A Competent Person has not done sufficient work to disclose the historical Exploration Results in accordance with the JORC Code 2012;
- It is possible that following further evaluation and/or exploration work that the confidence in the prior reported Exploration Results may be reduced when reported under the JORC Code 2012;
- That nothing has come to the attention of the acquirer that causes it to question the accuracy or reliability of the historical Exploration Results; but
- Shree has not independently validated the historical Exploration Results and therefore is not to be regarded as reporting, adopting or endorsing those results
- A summary of the work programs on which the Exploration Results quoted in this announcement are included as Appendices in the company's previous announcements to ASX;



- There are no more recent Exploration Results or data relevant to the understanding of the Exploration Results;
- An assessment of the additional exploration or evaluation work that is required to report the Exploration Results in accordance with JORC Code 2012 will be undertaken following acquisition & will be funded by the Company.

The release of this document to the market has been authorised by the Board.