



STELLAR RESOURCES LIMITED
Columbus Metals Ltd

RL 5/1997 ZEEHAN

**ANNUAL REPORT FOR THE PERIOD
20 MAY 2012 – 19 MAY 2013**

Compiled by: R.K. Hazeldene

DATE: May 2013

DISTRIBUTION:

**Mineral Resources Tasmania, a Division of the
Department of Infrastructure, Energy and Resources - Hobart
Stellar Resources Ltd - Melbourne**

**Stellar Resources Limited
(ACN 108 758 961)
Level 17, 530 Collins Street,
Melbourne,
Victoria, 3000.**

ABSTRACT

This Annual Report for RL 5/1997, Zeehan, covers the period from 20 May 2012 to 19 May 2013.

Retention Licence 5/1997 encompasses an area of 6 km² on the western outskirts of Zeehan Township, in NW Tasmania. It covers the historic Queen Hill, Severn and Montana deposits, which form the Heemskirk Tin Project. The deposits are located under or adjacent to Queen Hill immediately northwest of Zeehan.

Exploration from the 1960's through until the mid 1980's identified significant tin mineralisation associated with, and under, old lead/silver deposits mined in the late 1800's and early 1900's. In 1983 the resource estimate for the three deposits, based on 23,000 metres of drilling, was 3 million tonnes of ore (>0.1%Sn cut off) grading 0.7%Sn and 10.9 g/t Ag. Due to depressed tin prices and corporate matters no significant work was undertaken on the project between 1990 and 2009.

Stellar Resources Ltd, through its subsidiary Columbus Metals Ltd, purchased a 60% interest in the 'Gippsland Joint Venture' from Western Metals Ltd early in 2008, so forming a joint venture with the other party, Gippsland Limited. In Feb 2012 Stellar purchased Gippsland Ltd.'s 40% holding for cash and shares. Stellar now has 100% ownership of the licence, with Gippsland Ltd being entitled to a royalty on tin production when the LME tin price exceeds \$25,000/tonne.

During 2010 Stellar drilled 6 diamond drill holes, totalling 585m into the near surface portion of the Queen Hill Deposit. Core from this program provide material for on going metallurgical test work. The results from the drilling, together with historical drilling data, was used by consultants, Mining One, to calculate the first JORC compliant resources estimate for the Heemskirk Tin Project.

Drilling in 2011 comprised three diamond drill holes into the edges of the Queen Hill Deposit, two holes into the Stormsdown Prospect, three holes into the Montana Deposit and one hole with a wedged hole under the Severn Deposit. Drilling was suspended during negotiation for the purchase of Gippsland's interest in the project but recommenced in March 2012 at the Severn Deposit.

During 2012/2013 Stellar drilled 17 diamond drill holes, including 3 wedged daughter holes, at Zeehan, totalling 5,730m. 10 holes (including 2 wedged holes) were drilled into the Severn deposit, 3 holes (including 1 wedged hole) into the Queen Hill deposit and 4 holes targeted proximal geophysical targets.

In February 2013 T. Callaghan, of Resource and Exploration Geology, carried out revised computer modelling of the three deposits utilising all the drill data to that date. Based on this he completed a new resource estimate of the project. The results of this estimate are summarised below:

Table 1. Heemskirk Tin Project: 2013 JORC Mineral Resource Estimate

Classification	Deposit	Tonnes millions	Grade % tin	Contained Tin tonnes
Indicated	All	1.41	1.26	17,790
Inferred	All	4.87	1.10	53,710
Total		6.28	1.14	71,500
Indicated	Queen Hill	1.41	1.26	17,790
Inferred	Queen Hill	0.19	1.63	3,090
	Severn	4.17	0.98	40,900
	Montana	0.51	1.91	9,710
Total		6.28	1.14	71,500

0.6% tin block cut-off grade

Tonnes rounded to reflect uncertainty of estimate

Estimates prepared by Resource and Exploration Geology

Metallurgical studies have continued throughout the year to define the optimum procedure to treat the various ore types at the project. These studies are on going and continue.

Consultants, GR Engineering Services and Mining One, are currently undertaking a Pre-Feasibility Study of the project incorporating the latest resource model and metallurgical data.

Exploration expenditure on RL 5/1997 during 2012/13 by Stellar totalled \$3,171,160.

TABLE OF CONTENTS

ABSTRACT	2
1. INTRODUCTION.....	5
1.1. EXPLORATION RATIONALE.....	5
1.2. GEOLOGICAL SETTING	5
1.2.1. Structure.....	5
1.2.2. Mineralisation	6
1.3. LICENCE	7
1.4. LAND TENURE.....	9
2. REVIEW OF PREVIOUS WORK	14
3. EXPLORATION COMPLETED DURING THE REPORTING PERIOD	16
3.1. MINE GRID ESTABLISHMENT.....	16
3.2. DATA ACQUISITION & ANALYSIS	16
3.3. MINERALOGY / PETROLOGY STUDY	16
3.4. DRILLING	16
3.5. 2013 REVISED RESOURCE ESTIMATE.....	18
3.6. METALLURGICAL TEST WORK.....	19
3.7. PRE-FEASIBILITY STUDY	20
3.7.1. Treatment Plant.....	20
3.7.2. Mine Study	20
3.8. ENVIRONMENTAL STUDIES	21
3.8.1. Surface Waters.....	21
3.8.2. Groundwaters.....	21
3.8.3. Waste Rock / Ore and Tailings Geochemistry	21
4. DISCUSSION	28
4.1. MINERALOGY / PETROLOGY STUDY	28
4.2. DRILLING	28
4.3. 2013 REVISED RESOURCE ESTIMATE.....	29
4.4. METALLURGICAL TEST WORK.....	29
4.5. ENVIRONMENTAL STUDIES	29
5. CONCLUSIONS & PROPOSED WORK	34
5.1. DEVELOPMENT TARGETS	34
5.2. EXPLORATION TARGETS.....	34
5.3. PROJECT STUDIES	34
6. ENVIRONMENT	35
7. EXPENDITURE.....	36
8. REFERENCES.....	37
<i>Keywords.....</i>	<i>39</i>

List of Figures

Figure 1. RL 5/1997, Heemskirk Tin Project: Location Map.....	8
Figure 2. RL5/1997, Heemskirk Tin Project: Land Tenure Map (LIST).....	10
Figure 3. RL5/1997, Heemskirk Tin Project: MRT Geology Map.	11
Figure 4. RL5/1997, Heemskirk Tin Project: Simplified Geology showing deposit locations	12
Figure 5. RL5/1997, Heemskirk Tin Project: Geology, Structure, Deposits & Historic Drilling	13
Figure 6. RL5/1997, Heemskirk Tin Project: Tin Deposits with Historic & Stellar Drilling to date.	23
Figure 7. RL5/1997, Heemskirk Tin Project: Severn Deposit Longitudinal Section	24
Figure 8. RL5/1997, Heemskirk Tin Project: Queen Hill Deposit Longitudinal Section	25
Figure 9. RL5/1997, Heemskirk Tin Project: Stellar Aeromagnetic Survey – RTP 130m Depth Slice ..	26
Figure 10. RL5/1997, Heemskirk Tin Project: Water Catchments & Sampling Stations	27
Figure 11. RL5/1997, Geology Plan showing deposits & drill hole traces on the ZMG grid with GDA grid tags.....	30
Figure 12. RL5/1997, 3750N Zeehan Mine Grid (ZMG) Geology Cross Section showing drill hole traces.....	31
Figure 13. RL5/1997, Heemskirk Tin Project: Queen Hill Deposit Metallurgy Testwork Flow Sheet. ...	32
Figure 14. RL5/1997, Heemskirk Tin Project: Severn Deposit Metallurgy Testwork Flow Sheet.	33

List of Tables

Table 1. Heemskirk Tin Project: 2013 JORC Mineral Resource Estimate	2
Table 2. Heemskirk Tin Project: 2010 JORC Resource Estimate (Mining One Consultants)	15
Table 3. Heemskirk Tin Project: 2012/13 Drilling Assays*	17
Table 4. Heemskirk Tin Project: 2013 JORC Mineral Resource Estimate	18
Table 5. Heemskirk Tin Project: Metallurgical Sample Details.....	19
Table 6. Heemskirk Tin Project: Proportion of the Pea Soup at Corinna Rd load (%) for the different sources within the catchment. Includes the percentage of load unquantified.....	22

APPENDICES

1. Drilling Summary
2. Analytical Methods
3. Zeehan Mine Grid Conversion Spreadsheet (Digital)
4. Drawings (Digital)
5. MRT Basalt Mineralogy / Petrology Report (Digital)
6. Drill Hole Logs (Digital)
7. 2013 Ore Resource Estimate (Digital)
8. Pre-Feasibility Study Progress Report (Digital)
9. Metallurgy Testwork Progress Report (Digital)
10. Annual Water Sampling Report (Digital)
11. Drill Core Photographs (Digital)

1. INTRODUCTION

1.1. EXPLORATION RATIONALE

RL 5/1997 covers the Heemskirk Tin Project, which comprises the structurally controlled cassiterite-sulphide Queen Hill and Severn lodes and stockworks, and the Montana massive sulphide carbonate replacement (Renison style) deposit. All the known tin deposits remain open at depth, with other exploration targets such as Golf Course remaining to be tested.

Mineralisation continues below the base of the existing drilling, particularly at Severn and Montana. There is also room for a depth extension to the north at Queen Hill. It has been demonstrated that cassiterite grain size increases with depth, as does pyrrhotite content, with both grade and metallurgical amenability expected to improve as a result.

All of the prospects are believed to be located above a deep-seated Devonian granite stock. It is likely that beneath the limit of existing drilling, which reached 400m depth, there is a considerable amount of prospective host rocks and structures above, and/or adjacent to the granite.

During 2010/11 work focussed on infill drilling at Queen Hill to obtain samples for metallurgical testing and exploration for near surface extensions to the known mineralisation at Queen Hill, Stormsdown and Montana. During 2011/12/13 exploration activity has focused on the Severn deposit, both infill drilling and testing extensions to the known mineralisation. Other targets defined by detailed by a detailed magnetics survey carried out in March 2012 were also drill tested.

Studies carried out during the year have included on-going metallurgical test work on the Queen Hill and Severn mineralisation, on-going environmental studies. GR Engineering Services and Mining One Consultants are currently undertaking a prefeasibility study based on the resource revision completed in 2013 by Resource & Exploration Geology.

1.2. GEOLOGICAL SETTING

The oldest rocks at RL 5/1997 are the Queen Hill Quartzites, a sequence of sediments and volcanics equivalent to the Neoproterozoic Oonah Formation, the oldest stratigraphy in the Zeehan area. These are predominantly quartzites with some interbedded arenaceous siltstones and shales. The upper part of the Oonah Formation is predominantly pelite and/or carbonate, including some evaporites, mafic volcanic rocks and conglomerate.

Overlying the Quartzites is a sequence of Precambrian dolomites, carbonaceous pyritic slates and minor volcanics equivalent to the Success Creek Group. This group comprises reddish brown siltstones with intercalated limestone's and dolomite being referred to locally as the Poverty Point Beds. These beds correlate to that part of the Success Creek Group, which hosts the Renison replacement tin deposits. The Success Creek Group rocks are overlain by the Cambrian Crimson Creek Formation, comprising basal pyroclastic volcanics overlain by a sequence of greywackes and argillites with minor tuffaceous slates and grits.

Ordovician Gordon Limestone crops out north east of Queen Hill while Siluro-Devonian Eldon Group sandstones and siltstones underlie most of the Zeehan town site. The Devonian Heemskirk Granite outcrops 7 kilometres west of Zeehan, forming Mt Heemskirk, with a ridge of granite believed to extend beneath Queen Hill at depth.

At Zeehan the Oonah Formation and the Success Creek Group both host vein and replacement tin deposits. Tin mineralisation within the dolomitic Poverty Point Beds at Montana is of cassiterite-sulphide replacement style. Mineralisation at Severn may be similar, being due to smeared-out Poverty Point carbonates along the Severn Fault. Refer to Figure 5.

1.2.1. Structure

The structure of the rocks at Queen Hill is complex with intense folding and faulting at all scales. The deformation is thought to be due to the Tabberabberan Orogeny. Broadly the Zeehan tin deposits are associated with the wide hinge zone of the northwest trending Heemskirk Anticlinorium, which is thought to have been the focus of the intrusion of the Heemskirk Granite at depth in this area.

Two major Devonian deformational events are recognised in the project area. The initial D₁ event is expressed as moderately doubly plunging NE-trending tight to isoclinal folds with weak fabric development. The D₂ event produced upright, generally SE-plunging folds with moderate to strong fabric development. A third structural event D_{2L} is recognised and overall these events produced six

sets of faults in the sequence. The southern end of a major D₂ fracture zone between the D₂ Zeehan Syncline and the Heemskirk Anticlinorium appears to be the locus for a late stage intrusive phase of the Heemskirk Granite. Hydrothermal fluids emanating from or around this intrusive have focused along faults, shears and zones of fracturing. Where fluids reached reactive stratigraphy (i.e. sulphide, carbonate or volcanoclastic horizons) cassiterite-bearing tin sulphide bodies have developed. Intersection of the more ductile S2 and S3 sets provided the best sites for mineralisation, as evidenced by the Severn and Queen Hill deposits.

1.2.2. Mineralisation

Tin mineralisation at the Heemskirk Tin Project occurs as cassiterite and minor stannite in the three main deposits: Severn, Queen Hill and Montana, and at a minor outcropping occurrence at Golf Course. The deposits are Renison Bell/Cleveland-type tin deposits in which granite-derived hydrothermal fluids carrying tin, sulphur and other base metals intruded along structural conduits and reacted with suitable lithologies such as dolomite and carbonate rich volcanoclastic horizons to precipitate generally sulphide-rich lodes containing cassiterite. Typical associated gangue minerals include pyrite, pyrrhotite, quartz, tourmaline, carbonates and fluorides. The granite source of the hydrothermal fluids has not been intersected in drill holes in the immediate project area, however based on geophysical evidence and the presence of rare felsic porphyry intrusives a granite stock is interpreted to lie some 900m below the present surface.

The predominance of pyrite over pyrrhotite is a significant point of difference between the Zeehan and Renison Bell deposits, however, at depth pyrrhotite becomes more abundant at Zeehan. In addition to the main high temperature tin-mineralising event, a later stage, cooler fluid event appears to have resulted in the formation of Pb-Zn-Ag sulphide lodes (Taylor's and Clarke's Lodes), which are not significantly tin-bearing. These lodes were the focus of early 20th century silver-lead mining activity.

In all the Zeehan deposits cassiterite occurs as fine grained (20 - 70 microns) disseminations in stockworks and masses of fine-grained gangue comprising siderite, chlorite, silica, pyrite and pyrrhotite. At Queen Hill there is also variable accessory stannite and base metal sulphides. Pyrite now forms about 30% of the sulphides but microscopy indicates that an original major pyrrhotite content has been replaced by pyrite and marcasite. This has resulted in only the pyrrhotitic core of the Severn deposit remaining magnetic.

The **Queen Hill Deposit** comprises a high-grade lens within a single larger lower grade envelope. These lenses are an upper lens, "the hanging wall lens"; relatively narrow (3 to 8 metres), essentially massive sulphide (pyrite dominant), replacement-type mineralisation, dipping at 50° to 80°, and "the lower lens", a wide composite zone containing narrow high-grade mineralisation. Significant tin mineralisation occurs in volcanics, clastic sediments and evaporites. The hanging wall lens is adjacent to a fault zone, which is coincident with Clarke's Ag-Pb lode. The mineralisation may not be closed off at depth. The Queen Hill deposit crops out weakly on the northwestern side of Queen Hill and is hosted by the Poverty Point Beds.

The **Severn deposit** occurs as several parallel pseudoconformable lenses of bedding slip sulphide replacements and stockworks within a 130m wide drag zone in the hanging wall of the Severn Fault. The fault zone has an en-echelon shape resulting from the intersection of northwest and northeast trending fracture sets. The Poverty Point Beds appear to be displaced 500m across the Severn Fault zone by substantial strike slip movement. The resultant geometry of the tin mineralisation at Severn is tabular and is located close to, or at, the apparent angular unconformity between the Oonah beds and the Success Creek and Crimson Creek sequence. At 0.5% Sn cut-off the upper part of Severn deposit is narrow and has a short strike length, but is high grade. Both thickness and strike length increase with depth with the deposit being open at depth.

Montana is a high grade, stratiform carbonate replacement tin deposit comprising cassiterite and massive sulphides hosted by the Poverty Point Bed equivalents of the Success Creek Group, the Montana Beds. Montana is narrow near surface (2.5 to 5.0 metres) and has a strike length of approximately 80m. The upper levels were accessed historically to a depth of approximately 150m. The deepest intersection, in drill hole M76, 300m below surface, is 1.6% Sn over an estimated true width of 6m. The deposit is open at depth.

1.3. LICENCE

Tenement number: RL 5/1997

Tenement name: Zeehan

Tenement location: Located over the western side, and immediately west, of Zeehan Township, with main road access from the Heemskirk Road, the Zeehan Highway and the Trial Harbour Road, which passes generally through the centre of the licence (Figure 1). Numerous town roads and tracks traverse the licence area. The licence covers an area of 6km², which extends west from the council depot on the Zeehan Rivulet for 3.5 kilometres, past the golf course, and north for 3 kilometres from Manganese Hill to Montana Hill. The RL area is a mix of Crown Land and freehold land, including a large portion of the Zeehan Township.

The area comprises both cleared urban or farm land and regrowth forest after logging or burning. Refer to Figure 2.

Reporting period: 20 May 2012 to 19 May 2013.

Tenement holder: Columbus Metals Ltd., a wholly owned subsidiary of Stellar Resources Ltd.

LOCATION OF LICENCE

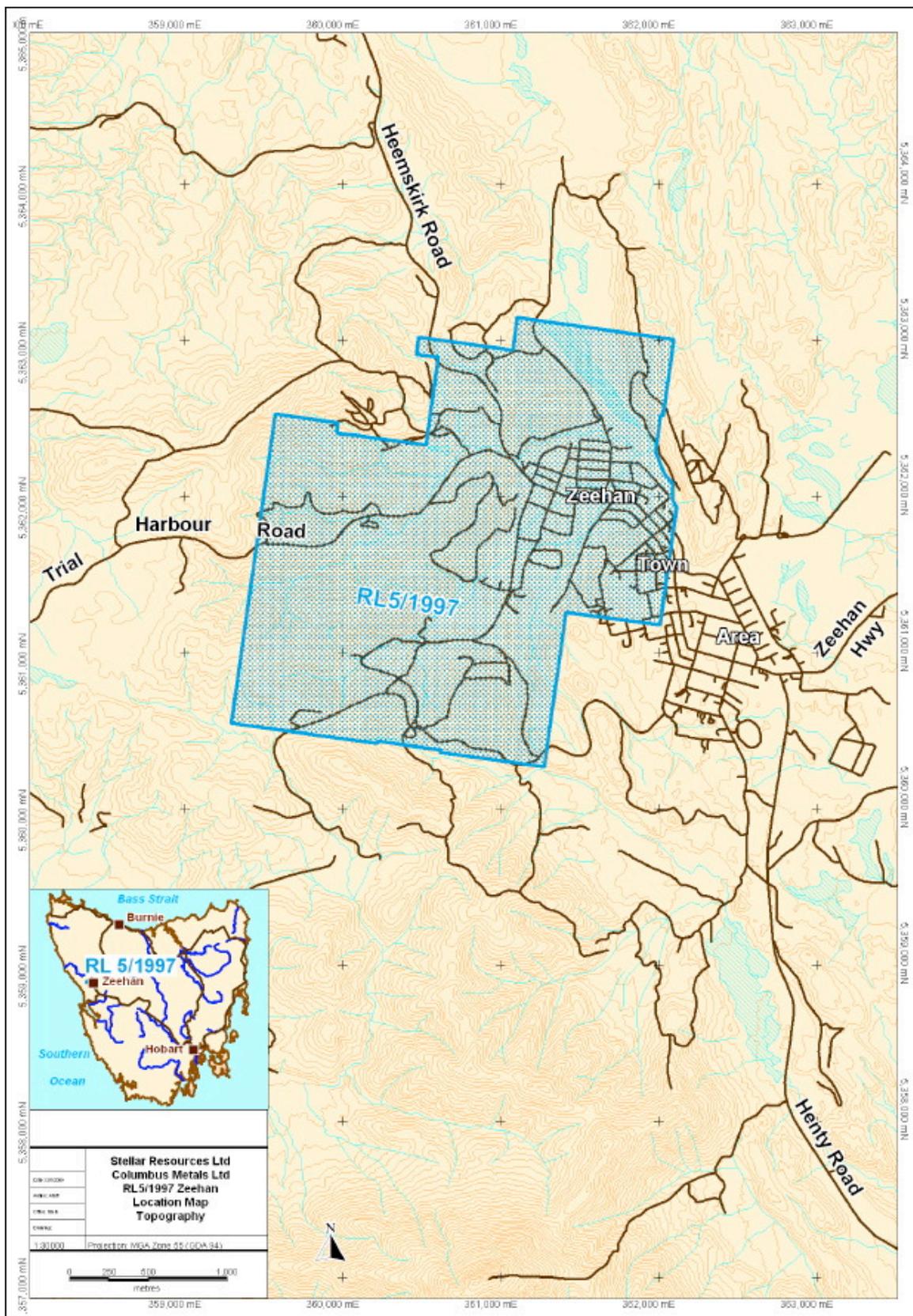


Figure 1. RL 5/1997, Heemskirk Tin Project: Location Map

1.4. LAND TENURE

SCHEDULE:

LAND DISTRICT OF MONTAGU
VICINITY OF ZEEHAN
MUNICIPALITY OF WEST COAST
RETENTION LICENCE 9705 6 SKM
COLUMBUS METALS

Datum: AGD66, Zone 55.

Commencing at the southwest corner at grid coordinates 359,180 metres E 5,360,366 metres N, thence northerly to 359,458 metres E 5,362,347 metres N, easterly to 359,857 metres E 5,362,291 metres N, southerly to 359,848 metres E 5,362,227 metres N, again easterly to 360,412 metres E 5,362,148 metres N, again northerly to 360,491 metres E 5,362,712 metres N, westerly to 360,352 metres E 5,362,731 metres N, again northerly to 360,368 metres E 5,362,840 metres N, again easterly to 360,962 metres E 5,362,757 metres N, again northerly to 360,991 metres E 5,362,965 metres N, again easterly to 361,981 metres E 5,362,825 metres N, again southerly to 361,913 metres E 5,362,335 metres N, again westerly to 361,898 metres E 5,362,337 metres N, again southerly to the Zeehan Rivulet at approximate grid coordinates 361,866 metres E 5,362,113 metres N, thence by that Rivulet in a general southeasterly direction to approximate grid coordinates 362,000 metres E 5,361,738 metres N, again southerly to 361,894 metres E 5,360,995 metres N, again westerly to 361,300 metres E 5,361,079 metres N, again southerly to 361,160 metres E 5,360,088 metres N, again westerly to 360,502 metres E 5,360,181 metres N, again northerly to 360,504 metres E 5,360,196 metres N, again westerly to 360,108 metres E 5,360,251 metres N, again southerly to 360,106 metres E 5,360,237 metres N, thence again westerly to the point of commencement.

The area excludes 4 ha of Crown Reserves. Refer to Figure 2.

LAND TENURE:

The area comprises: Crown Land and Private property.
NB: This land tenure table is a guide only.

EXCLUSIONS:

The area covered by this licence does not include:

- (a) All forms of mineral tenements including mining leases, retention licences and exploration licences, which were applied for or in force prior to the date of application for this licence.
- (b) Land exempt from the provisions of the *Mineral Resources Development Act 1995*.
- (c) Land reserved under the *National Parks and Wildlife Act 1970* including National Parks, Historic Sites, Nature Reserves, Game Reserves and State Reserves shown on the Schedule.
- (d) Crown reservations or other land set apart or dedicated for any public purposes such as public reserves, municipal reserves or roadways unless such areas have been brought under the provisions of the *Mineral Resources Development Act 1995*.

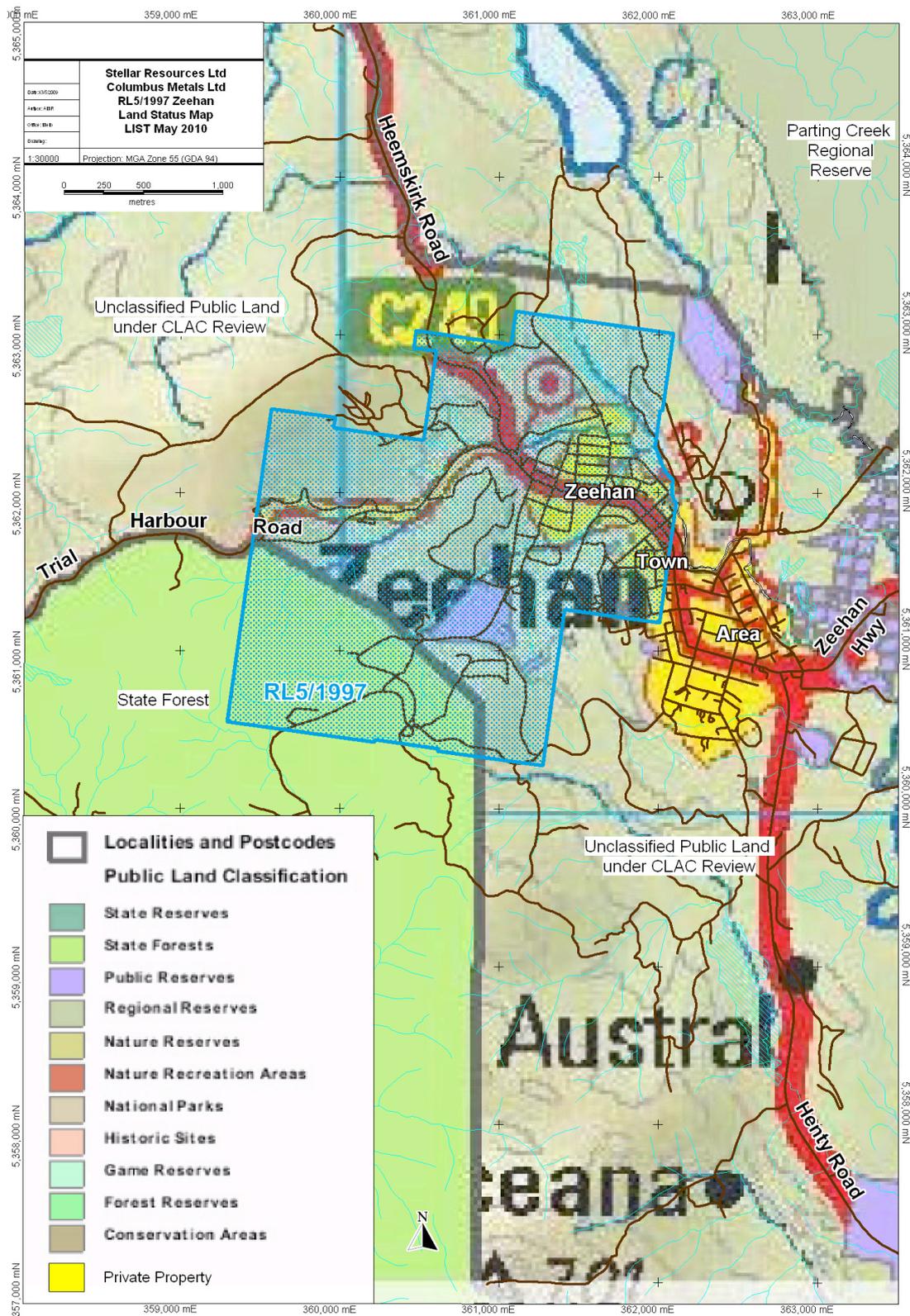


Figure 2. RL5/1997, Heemskirk Tin Project: Land Tenure Map (LIST)

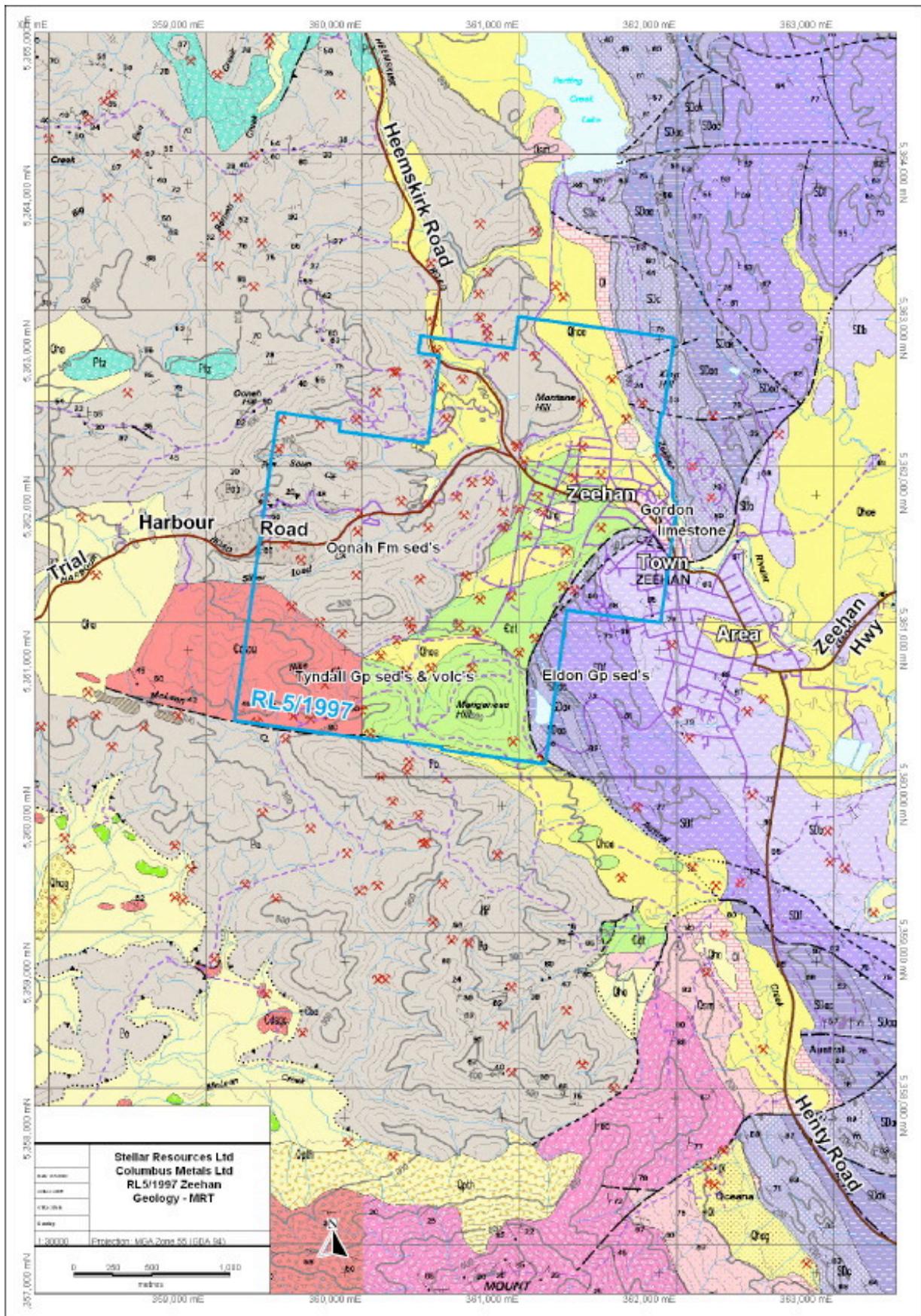


Figure 3. RL5/1997, Heemskirk Tin Project: MRT Geology Map.

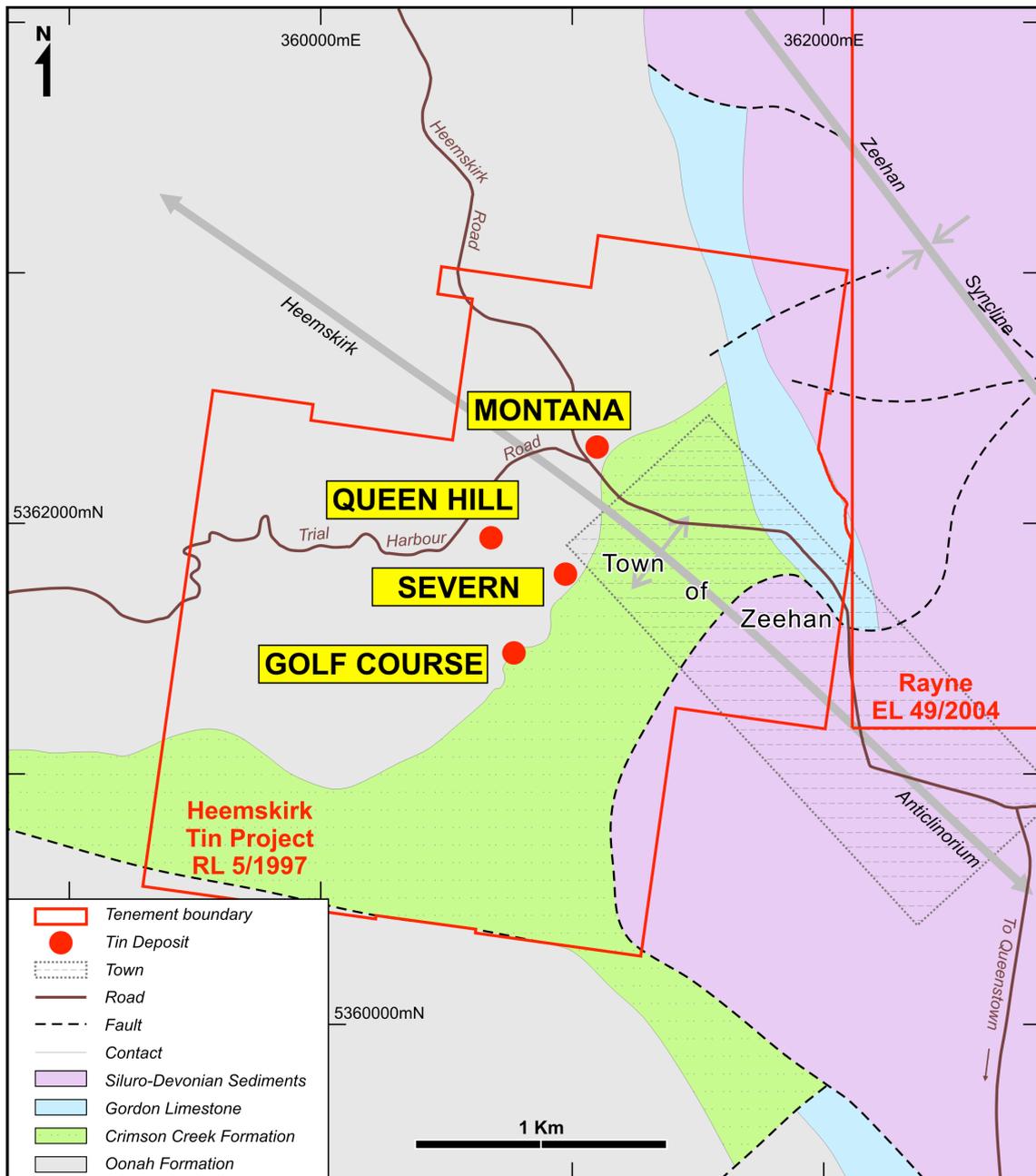


Figure 4. RL5/1997, Heemskirk Tin Project: Simplified Geology showing deposit locations

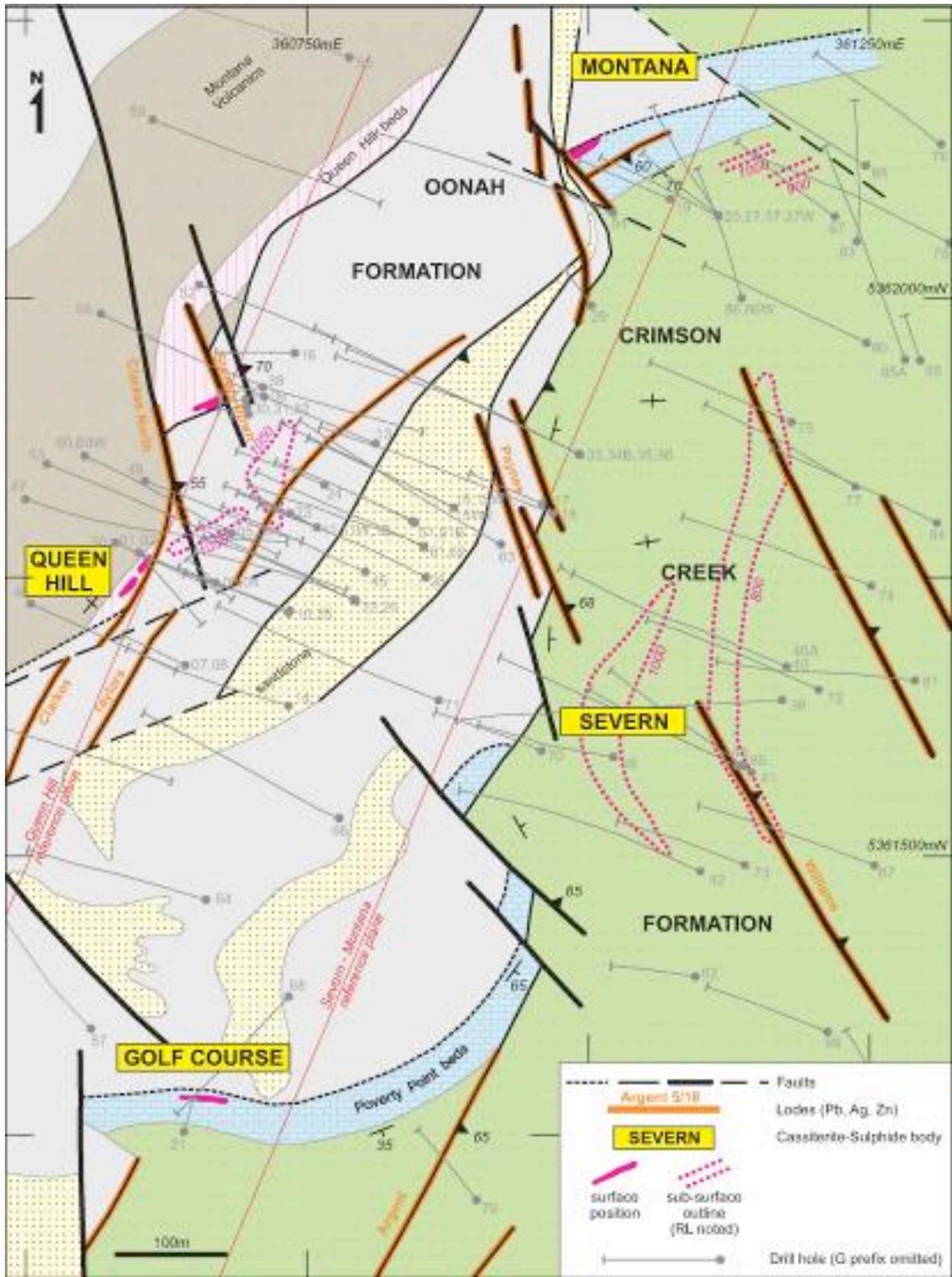


Figure 5. RL5/1997, Heemskirk Tin Project: Geology, Structure, Deposits & Historic Drilling

2. REVIEW OF PREVIOUS WORK

The majority of previous exploration work for tin at Zeehan was carried out by Aberfoyle in the 1970's and 1980's culminating in the delineation of 7.3 million tonnes of mineralisation at an average grade of 0.69% Sn together with 10.9 g/t Ag. Higher-grade zones within this mineralised envelope were reported as 3.61 million tonnes @ 1.21% Sn.

This work was undertaken in a Joint Venture first signed on 27 March 1972 between Cominco Exploration Pty Ltd (Aberfoyle) and Gippsland Oil and Minerals NL (now Gippsland Limited). The JV saw Aberfoyle's interest confirmed at 60% with the right to 70% equity in the project by completing an acceptable feasibility study.

Queen Hill was discovered in the late 1960's, when cassiterite was recognised in massive pyrite mineralisation exposed in old silver-lead mines. The drilling of a magnetic anomaly, located some 300m eastwards from Queen Hill, led to the discovery of the larger Severn deposit in 1976. Early exploration focussed on Queen Hill and continued sporadically throughout the late 1970's and early 1980's. Characterisation of ore from the upper Queen Hill lode showed it to comprise sulphides (mainly pyrite), carbonates, fluorite and silicates. The tin mineral was mainly cassiterite, which occurred in extremely fine particles (15 microns) disseminated throughout the ore, 60% in sulphide and the remainder in other gangue. The most promising route for beneficiation seemed to be standard mineral dressing methods to gain acceptable recoveries of the cassiterite into low grade concentrate and upgrade this by a pyro-metallurgical matte fuming. In June 1980 a bulk sample of ore from Queen Hill (2,892 tonnes) was excavated and sent to the Aberfoyle matte fuming pilot plant at the Kalgoorlie nickel smelter. Test work successfully produced a high-grade tin matte from this material. No further work was done due to the collapse in the tin price in 1985. The pilot plant and technology were subsequently sold to Mt Isa Mines Limited.

On 1 August 1981 an amalgamation of seven previous leases over the Queen Hill area was undertaken and CML 36/M/81 was granted for an area of 564ha for a period of 21 years. In 1997 this mining lease was converted into the 6km² retention licence RL 5/1997.

The exploration program at Queen Hill identified deeper mineralisation below Queen Hill and at Severn and Montana. Metallurgical characterisation test work on these deposits showed them to be more amenable to conventional mineral dressing than the Upper Queen Hill ore. Amenability was judged on cassiterite grain size, ease of liberation, and response to gravity and flotation separation. In particular the Severn ore responded better than some of the fine-grained ores at the Renison Bell Tin Mine when subjected to similar unit processes employed in the Renison Concentrator (Severn has an average grain size of 65 microns while some of the Renison Fault ores have an average grain size of 50 microns). This offers an option to process these ores by standard mineral dressing methods and produce a saleable gravity concentrate for a recovery estimated at 71.5%.

By 1982, Aberfoyle had completed 89 diamond drill holes totalling 23,000m and comprehensive data compilation and resource estimation was undertaken which resulted in a Pre Feasibility Study report issued in May 1983. The report concluded that the Zeehan Tin Project had potential for profitable underground mining. The project was never taken through to a bankable feasibility study however, as work was halted in 1984 due to the imposition of export quotas on tin concentrates by the Association of Tin Producers.

Drilling ceased on the Heemskirk Tin Project in June 1982 but technical assessment by Aberfoyle geologists continued; in particular John Anderson undertook research studies towards a PhD degree. A number of new conceptual targets were generated and resulted in the completion of a series of EM geophysical surveys and two final drill holes for a total of 1,320m in 1989-90. The present conceptual model for the Zeehan Deposits, which illustrates the potential for significant additional resources, is based largely on John Anderson's research work.

Aberfoyle was taken over by Western Metals Limited (Western Metals) in 1998. Over the ensuing years, Western Metals remained heavily focused upon its base metals projects and no work was undertaken at Zeehan. Stellar purchased Western Metals interest in the Zeehan Project in 2008.

Commencing in 2010 Stellar Resources drilled 5 shallow diamond drill holes into the Queen Hill Deposit to both obtain fresh mineralised material for metallurgical testing and to better define the upper extent and nature of the Queen Hill mineralisation. This was followed in 2011 by 3 more holes into Queen Hill, 3 holes into the Stormsdown area, 3 holes into the upper portion of the Montana

Deposit and one hole and wedge below the Severn Deposit. Drilling was then suspended until Stellar acquired Gippsland Minerals 40% equity in the Heemskirk Project early in 2012.

During 2010 mining consultants, Mining One carried out a JORC compliant resource estimation of the Project. Both historic and the 2010 drill results were reviewed and used for this estimate. The results are tabulated below in Table 1.

Table 2. Heemskirk Tin Project: 2010 JORC Resource Estimate (Mining One Consultants)

Mineral Resources		
0.6% Sn cut-off grade		
Indicated Mineral Resources		
Queen Hill	1,600,000 tonnes	1.2% Sn
All Indicated Mineral Resources	1,600,000 tonnes	1.2% Sn
Inferred Mineral Resources		
Montana	360,000 tonnes	1.6% Sn
Severn	2,400,000 tonnes	0.9% Sn
All Inferred Mineral Resources	2,760,000 tonnes	1.0% Sn
Indicated + Inferred Mineral Resources		
All Mineral Resources	4,360,000 tonnes	1.1% Sn

- The estimates of mineral resources were made using diamond drill hole assays within the interpreted mineralisation. All samples were composited to 1metre lengths and no top-cuts were applied. Bulk densities were based on estimated sulphur grade, where this was available, or were set to 3.3 tonnes per cubic metre for Queen Hill, 3.9 tonnes per cubic metre for Zeehan Montana and 3.2 tonnes per cubic metre for Severn. The grade estimates of the Mineral Resources were made using an inverse distance squared algorithm.
- The Mineral Resources were based on a cut-off grade of 0.6% Sn which was based on a tin price of US\$30,000 per tonne and reasonable assumptions for exchange rate, costs and modifying factors including mining recovery, mining dilution and metallurgical recovery.

Stellar acquired Gippland Ltd's interest in the project in early 2012 to gain 100% of the project.

Metallurgical testwork carried out by Burnie Research Laboratory tested Queen Hill core composites. Assessments included analytical, mineralogical and flotation assessments for each and was based on a Renison style flowsheet. This initial metallurgical test work showed that the process required to treat upper Queen Hill mineralisation is compatible with that operating 18 kilometres away at the Renison Bell mill. Testwork is ongoing.

During 2012/2013 Stellar drilled 17 diamond drill holes, including 3 wedged daughter holes, at Zeehan, totalling 5,730m. 10 holes (including two wedged holes) were drilled into the Severn deposit, 2 holes, and one wedge, into the Queen Hill deposit and 4 holes targeted proximal geophysical targets.

3. EXPLORATION COMPLETED DURING THE REPORTING PERIOD

3.1. MINE GRID ESTABLISHMENT

Both the Queen Hill and the Severn deposit strike at approximately 67° relative to GDA 1994 (and AGD 66), which result in both cross sections and longitudinal sections of the deposits displaying with distorted grid line spacing. To remedy this situation, and following normal mine practice, the Zeehan Mine Grid (ZMG), oriented parallel to the deposits, has been established to cover the project area.

The base point for ZMG is survey station SPM9721 which has the following co-ordinates:

• AGD 66:	361,587.187mE,	5,361,806.945mN	RL 174.667m AHD
• GDA 1994:	361,698.759mE,	5,361,989.755mN	RL 174.667m AHD
• ZMG:	61,698.759mE	3,989.752mN	RL 1,174.667m ML

The ZMG is a rotated planar grid oriented at 23 degrees to GDA94. Conversion factors are:

$$X \text{ ZMG} = ((0.92050485345244 * X_{\text{GDA}}) + (-0.390731128489274 * Y_{\text{GDA}})) + 1823849.603$$

$$Y \text{ ZMG} = ((0.390731128489274 * X_{\text{GDA}}) + (0.92050485345244 * Y_{\text{GDA}})) - 5073074.803$$

Levels in ZMG are recorded as MSL + 1000m.

3.2. DATA ACQUISITION & ANALYSIS

During the reporting period Stellar has continued to review historic data from Western Metals Ltd and other sources including privately held Aberfoyle historic data. Refer to Appendix 4 for maps generated from this data.

Recently a series of old Zeehan mine plans have been acquired from the MRT database. These have been field verified and spatially located in MGA so that they can be incorporated into the 3D mine / geological model.

3.3. MINERALOGY / PETROLOGY STUDY

Early in 2013 R. Bottrill, mineralogist with Mineral Resources Tasmania, was commissioned to carry out a study of the basaltic rocks at the Heemskirk Project. Six basalt samples were selected from drill core for the study.

The Bottrill study, utilising microscopy, X-ray diffraction and X-ray fluorescence, found that there are two distinct basalts at the Heemskirk Project. The Queen Hill basalts, which are highly vesicular basalts, altered to sericite-chlorite-quartz-dolomite assemblages, and the Severn basalts altered to albite-chlorite-calcite-quartz assemblages. The Severn basalts are MORB-type tholeiitic basalts most consistent with many of the Neoproterozoic basalts of NW Tasmania, especially the Ahrberg Group and Bowry Group basalts, or possibly the Spinks Creek or Crimson Creek basalts. The Queen Hill basalts are somewhat more alkaline (Zr-rich) and best fit with the Oonah Formation basalts of Late Proterozoic age.

3.4. DRILLING

Drilling at the Heemskirk Project continued throughout 2012 and 2013. Stellar has drilled 17 diamond drill holes, including 3 wedged daughter holes, at Zeehan, totalling 5,730m.

- 10 holes (ZS112, ZS112W, ZS113, ZS113W, ZS115, ZS116, ZS119, ZS120, ZS123 & ZS124) were drilled into the Severn deposit,
- 3 holes (ZQ117, ZQ125 & ZS125W) drilled into the Queen Hill deposit and
- 4 holes (ZM114, ZQ118, ZS121 & ZS122) drilled into geophysical targets (refer to Figure 6).

The 2012/13 program has focussed on testing the Severn Deposit at depth and infill drilling of the known deposit. Holes ZS112, ZS112W, ZS115, ZS123 and ZS124 were infill holes. Hole ZS120 tested the deposit at depth and holes ZS113, ZS113W, ZS116 and ZS119 tested the upper edge of the deposit. Refer to Figures 6 & 7.

The Queen Hill deposit was tested at depth by hole ZQ117 whilst holes ZQ125 and ZQ125W infilled a significant gap in the deposit near its lower edge. Refer to Figures 6 & 8.

Drill Holes ZM114, ZQ118, ZS121 and ZS122 tested various magnetic anomalies around the periphery of the known deposits. ZM114 & ZQ118 tested magnetic anomalies north of Queen Hill while ZS121 tested the South Severn Anomaly up dip of ZS91 and ZS122 the Severn South Anomaly up dip of ZS92. Refer to Figures 6 & 9.

Table 3. Heemskirk Tin Project: 2012/13 Drilling Assays*

Hole No.	From (m)	To (m)	Int. (m)	Sn %	AS Sn %	Cu %	Pb %	Zn %	Ag ppm	Comment
ZS112	329.0 406.0	332.0 411.0	3.0 5.0	1.46 0.87	<50 171	0.07 0.06	0.20 0.00	0.02 0.00	6 2	329.9 – 412.0m Pyrite & Pyrrhotite Stockwork
ZS112W	328.0 339.0 355.0	330.0 344.0 357.0	2.0 5.0 2.0	1.22 0.81 1.41	60 82 50	0.08 0.04 0.09	0.09 0.01 0.00	0.05 0.01 0.01	5 2 1	326.0 – 413.0m Pyrite & Pyrrhotite Stockwork
ZS113	276.0 292.0	288.0 304.0	12.0 12.0	0.74 2.58	1.72 158	0.07 0.14	0.07 0.00	0.01 0.00	8 2	266.8 – 279.7m Py S/W 279.7 – 306.8m Py & Po Stockwork
ZS113W	266.0 272.0 282.0 294.0	269.0 279.0 288.0 297.0	3.0 7.0 7.0 4.0	1.85 1.60 1.78 0.73	<50 200 160 117	0.08 0.13 0.07 0.13	0.00 0.01 0.00 0.00	0.01 0.01 0.01 0.01	2 10 2 2	250.0 – 285.3m Py S/W 285.3 – 317.5m Py & Po Stockwork
ZS115	465.0 475.0	472.0 481.0	7.0 6.0	0.79 0.63	<50 50	0.01 0.06	0.00 0.02	0.01 0.02	<1 4	387.2 – 480.6m Py Stockwork
ZQ117	105.0 384.0 396.0	111.0 386.0 399.0	6.0 2.0 3.0	0.39 1.16 0.56	227 1215 <50	0.00 0.03 0.01	16.71 0.00 0.01	2.19 0.00 0.01	729 1 2	100.5 – 1124m Py & Gn veined Breccia 320.2 – 401.2m Py S/W
ZS120	514.0 535.0 548.0	517.0 543.0 555.0	3.0 8.0 7.0	1.04 0.82 0.65	<50 <50 <50	0.06 0.05 0.02	0.00 0.00 0.00	0.00 0.00 0.00	<1 <1 <1	514.0 – 535.3m Py S/W 535.3 – 575.9m Py & Po Stockwork
ZS123	288.0 299.0 322.0	293.7 309.0 324.0	5.7 10.0 2.0	1.10 1.01 2.13	130 <50 50	0.09 0.03 0.10	0.02 0.00 0.00	0.04 0.01 0.01	13 1 1	288.2 – 298.8m Py S/W 298.8 – 308.7m Py & Po S/W 308.7 – 374.7m Py S/W
ZS124	257.0 268.0	262.0 272.0	5.0 4.0	0.81 1.20	246 165	0.05 0.06	0.06 0.01	0.11 0.02	7 3	251.7 – 286.6 Py S/W 286.6 – 290.1m Py & Po Stockwork
ZQ125	201.0 211.0 226.0 238.0 254.0	204.0 221.0 233.0 248.0 258.0	3.0 10.0 7.0 10.0 5.0	0.19 0.01 1.67 2.54 2.49	337 261 540 150 <50	0.17 0.06 0.06 0.02 0.01	4.67 3.11 2.60 0.11 0.02	0.30 2.56 7.37 0.12 0.00	136 58 67 109 4	201.7 – 257.3m Massive Sulphides & HA rock
ZQ125W	199.0 212.0 231.0 252.0	205.0 230.0 244.0 262.0	6.0 18.0 13.0 10.0	0.60 0.24 2.27 0.73	787 302 345 135	0.18 0.28 0.02 0.02	5.02 1.13 0.10 0.05	0.72 2.91 0.18 0.02	175 28 12 10	199.0 – 263.0 HA rock & Massive Sulphides

* Fused beads XRF; **reported interval is down hole.

Refer to Figure 6 for hole locations and to Table 3 for significant intersection summary. Refer to Appendix 2 for drill hole summaries. All drill hole specifications, logs and core photos appended in digital form (Appendices 6 & 11). A full set of cross sections and longitudinal sections are appended in digital form in Appendix 4.

3.5. 2013 REVISED RESOURCE ESTIMATE

In February 2013 T. Callaghan, of Resource and Exploration Geology, carried out revised computer modelling of the three Heemskirk Project deposits utilising all the drill data to that date. Based on this he completed a new resource estimate of the project. The results of this estimate are summarised below and the complete resource report is appended in digital form as Appendix 7.

Table 4. Heemskirk Tin Project: 2013 JORC Mineral Resource Estimate

Classification	Deposit	Tonnes millions	Grade % tin	Contained Tin tonnes
Indicated	All	1.41	1.26	17,790
Inferred	All	4.87	1.10	53,710
Total		6.28	1.14	71,500
Indicated	Queen Hill	1.41	1.26	17,790
Inferred	Queen Hill	0.19	1.63	3,090
	Severn	4.17	0.98	40,900
	Montana	0.51	1.91	9,710
Total		6.28	1.14	71,500

0.6% tin block cut-off grade

Tonnes rounded to reflect uncertainty of estimate

Estimates prepared by Resource and Exploration Geology

This Heemskirk Tin Project Mineral Resource estimation is based on 100 historic diamond drill holes for 25537.7m and 35 recent diamond drill holes for 10428.5m. Drill core was analysed at commercial laboratories for a range of elements by fused disc and pressed powder XRF. SG was measured using a combination of pynctometer and the Archimedes method on drill core samples.

Previous resource estimations were completed by consultants Mining One (refer to Table 2) on historic drilling data in 2011 (McKeown, 2011), BM Geological Services (Brewsher, 2007) and Aberfoyle Resources (Palmer, 1982).

The 2013 Resource Estimation includes additional diamond drill results from systematic resource extension drilling completed by Stellar Resources since 2010. The estimation was completed with all drilling data available up to and including drill hole ZS123. Exploration and resource infill drilling is ongoing.

Geological domaining was based on a 0.4% Sn boundary on mineralization demonstrating sectional continuity within a broader zone of low grade Sn mineralisation. The domains are considered geologically robust in the context of the classification applied to this estimate. All samples within geological domains were composited to 1m lengths.

Top cuts were only applied to the Severn Deposit. Variogram models displayed moderate nugget effect and short ranges of about 10-15m for 1m composited Sn. Block-modeled Sn, S, acid soluble Sn and SG for the Severn and Queen Hill resources were estimated using an ordinary kriging algorithm.

Block-modeled Sn, S, acid soluble Sn and SG for the Montana resource was estimated using an inverse distance squared algorithm. The estimation was validated by visually checking the interpolation results against drill hole data in plan and section, comparing input and output statistics and comparing with previous estimates. The estimate is considered to be robust on the basis of the above checks.

Classification of the Heemskirk Tin Deposits takes into account data quality and distribution, spatial continuity, confidence in the geological interpretation and estimation confidence.

The estimated resource, reported above a 0.6% Sn cutoff as Inferred and Indicated Resource in accordance with the 2012 edition of JORC Code is listed in Table 4.

Mineralisation is strongly zoned with higher acid soluble Sn and Pb towards the top of the Queen Hill and Severn Ore bodies. All deposits appear to have higher-grade zones and grade tonnage data suggests the deposits may be mined at higher cutoff grades if required.

3.6. METALLURGICAL TEST WORK

In the early part of the year the focus was on further improving recoveries and grades achievable by gravity and flotation for the Upper Queen Hill Deposit ores.

The performance of each of the unit processes included in the process flow sheet; Heavy Media Separation (HMS), Sulphide Flotation, Gravity Separation and Tin Flotation were reviewed during the period. In most cases changes were made and tested to gauge their effect on grades and/or recoveries of tin into concentrate. Some improvements in performance were noted, particularly in terms of tin recovery from sulphide flotation. Achieving acceptable final tin concentrate grade continued to be a problem when treating the Upper Queen Hill ore.

At the completion of this part of the testing samples of Upper Queen Hill ore for lab testing were almost exhausted, consequently testing moved on to the Severn Deposit ore (Composites 1, 2, 3 and 4 in Table 5).

During the period the Severn ore was tested against the same flow sheet as Queen Hill. Results were superior in terms of grade and recovery of tin to concentrate from all of the unit processes, except tin flotation.

Four composites of Severn ore were tested over the period. During the testing some optimization of the chemicals and procedures was achieved. This included the use of more re-grinding and cleaning in sulphide flotation and the use of different collectors and depressants in both sulphide and tin flotation. The results showed above target performance for grades and recoveries for the Severn ores.

Other methods of separating unwanted mineral species from tin bearing minerals were also tested including pre-flotation, complexing ions and separating ultra fine particles from tin flotation feed. Some of these alternative approaches yielded good results and will be followed up in the next period.

In the final part of the period another parcel of Queen Hill core became available (See ZQ125 in Table 5). This time the core was drilled from the lower part of the Queen Hill orebody. In earlier testing by Aberfoyle it was postulated that this ore would be easier to treat than the upper portion of the orebody. Current testing is underway to test that assertion.

Table 5. Heemskirk Tin Project: Metallurgical Sample Details

Diamond Drill Hole	BRL Project	Sample Numbers		Interval		Metres	Weight kg	Grade %Sn
		From	To	From	To			
QUEEN HILL Composite 1	Upper Tin Load							
ZQ93	T0587/T0630	94327	94332	75.7	80.0	4.3	25.4	0.92
ZQ94	T0587/T0630	94360	94365	64.0	70.0	6.0	37.8	1.30
ZQ95	T0587/T0630	94385	94385	62.0	62.7	0.7	3.8	0.60
ZQ97	T0587/T0630	94466	94467	57.0	58.2	1.2	3.2	0.70
QUEEN HILL Composite 2	Lower Tin Load							
ZQ96	T0587/T0630	94423	94444	85.5	107.0	21.5	77.5	0.90
ZQ98	T0587/T0630	94504	94509	95.0	100.0	5.0	28.7	1.56
QUEEN HILL Composite 3	Clarks Load							
ZQ96	T0587	94405	94412	68.0	76.0	8.0	23.3	0.71
QUEEN HILL Composite 4	Lower Tin Load							
ZQ125	T0819	573371	573390	201.0	220.0			
QUEEN HILL Composite 5	Lower Tin Load							
ZQ125	T0819	573391	573612	221.0	232.0			
QUEEN HILL Composite 6	Lower Tin Load							
ZQ125	T0819	573613	573637	233	258			
SEVERN Composite 1								
ZS107W	T0714	94974	94979	531.0	537.0	6.0	10.4	1.09
SEVERN Composite 2 and Composite 4								
ZS110	T0714	5695	5762	255.0	263.0	8.0	20.2	0.92
	T0714	5809	5815	324.0	331.0	7.0	10.0	0.80
	T0714	5821	5828	336.0	344.0	8.0	12.3	1.77
ZS110W	T0714	5855	5861	324.0	331.0	7.0	6.6	1.20
	T0714	5885	5890	361.0	367.0	6.0	5.1	1.21
SEVERN Composite 3								
ZS113	T0714	6072	6099	276.0	304.0	28.0	40.5	1.46

3.7. PRE-FEASIBILITY STUDY

3.7.1. Treatment Plant

Stellar Resources Ltd have commissioned GR Engineering Services Ltd (GRES) to carry out a pre-feasibility study (PFS) of the Heemskirk Tin Project. Work commenced in August 2012 and has been progressing at a steady pace.

Since commencing the PFS, GRES has utilised testwork conducted by the client to define, along with Asther Pty Ltd, (the client's metallurgist consultant) the process and plant design for the Heemskirk Tin Project.

The definition process takes the metallurgical testwork and produces a project design criteria that best represents the full-scale operation of the process plant. These key design parameters produce the following project documents:

- Process design criteria;
- Process flow sheets;
- Mass balance;

Some of this data still remains in a preliminary state and parts of the flow sheet are still to be fully defined, however GRES has used this information along with industry experience to define the key equipment selections for the process plant, including the following:

- Major mechanical equipment list;
- Process plant layout (Preliminary);

Using this information and an internal database of projects that have been designed and constructed recently by GRES, the following FS deliverables have been able to be completed to a preliminary state:

- Take-offs for structures and concrete;
- Take-offs and sizing of major pipelines;
- Process pumps and tanks sizing and selection;
- Major equipment tenders for some items, establishment of data base inputs for minor items;
- Capital costs;
- Operating costs;

At the time of writing this update the FS report is at a stage of being 45 to 50% complete in terms of GRES deliverables with a number of sections of the report nearing completion.

3.7.2. Mine Study

In January 2013 Mining One Consultants commenced work on the mining section of the Pre-Feasibility Study for the Heemskirk Tin Deposit. Mining One are completing the Underground Geotechnical and Mining components of the Pre-Feasibility Study, which is to be completed in mid-2013. Mining One completed site visits to the Zeehan in January 2013 to view drill core, site layout, rock exposures and begin underground infrastructure planning.

The main components of the work are:

- Review and validate geological block model (BM), from the 2013 Resource Estimate,
- Collect and analyses geotechnical and hydrogeological data,
- Conceptual mine design, mine production schedule, mine ventilation, mine dewatering and related infrastructure.
- Complete Pre-Feasibility (PFS) report sections, comprising
 - Geotechnical,
 - Mining

To date the mining and geotechnical components of the Pre-Feasibility Study are nearing completion with the final geotechnical stress modeling about to be completed and the geotechnical section of the report nearing review stage a draft level. Hydrogeological information that is relevant to the underground mine has been derived from other operations on the West Coast. The mining part of the study has completed the underground mine design and production schedule. Financial modeling of the mining schedule is underway. Ventilation modeling is yet to be completed.

3.8. ENVIRONMENTAL STUDIES

During the period, Stellar Resources consultant John Miedecke and Partners continued baseline environmental studies.

These studies include:

- Surface water quality and hydrology;
- Groundwater quality; and
- Waste rock, ore and tailings geochemistry

Stellar also had discussions with the EPA regarding the project and can commenced preparing a Notice of Intent and commencing other environmental studies required for Project approvals.

3.8.1. Surface Waters

The surface water studies have commenced and include the following:

- Collation of all historical data and design of the program;
- Quarterly water and flow sampling in the Pea Soup catchment
- Identification and documentation of contamination sources;
- Documentation of existing pollutant loads from the catchment as a basis of existing conditions; and
- In the last quarter the sampling was expanded to include a potential tailings dam site.

Seven surface water-monitoring stations have been established in the catchment likely to be the site of mine facilities (Refer to Figure 10). Four sample events have been conducted to date.

All water quality data has been placed in a database and preliminary examination has demonstrated that a major proportion of the contamination loads in the catchment have not been quantified and occur in the catchment to the north of Queen Hill. These are possibly historical tailings, waste rock and old mine workings (Montana, Oonah, etc.). Further work is proposed to quantify these sources.

Table 6 shows a summary of the results to date and the proportion of the loads

3.8.2. Groundwaters

Recent drill holes have been monitored for standing water levels. Several holes have been artesian. Select holes will be used for testing for groundwater inflows and water quality and standing water levels.

3.8.3. Waste Rock / Ore and Tailings Geochemistry

The deposit is sulphidic, with the primary sulfides present being pyrite and pyrrhotite, and therefore this project has a risk of producing acid generating materials.

Ten samples, including tailings samples and drill-hole samples representing the waste rock and ore from the deposit have been submitted for testing as a preliminary program.

The objectives of this study are to:

- Determine the acid forming characteristics of the provided tailings and drill-hole samples.
- Determine the chemical composition of the provided tailings and drill-hole samples and their water extracts in order to determine the presence of significantly enriched elements and identify any toxic element concerns for revegetation or water resources.
- Provide a report, which presents the results and findings of the test work, and identifies any potential geochemical implications for the project. This report will also provide recommendations for additional geochemical test work, if required.

Table 6. Heemskirk Tin Project: Proportion of the Pea Soup at Corinna Rd load (%) for the different sources within the catchment. Includes the percentage of load unquantified.

Parameter	Aberfoyle Dam	Dene Creek	Upper Pea Soup Ck	QH Adit 6	QH Shaft 4	Silver Lead Ck	Stormsdown Pit	Winter Drain	% Unquantified
Acidity (CaCO ₃ eq)	1.1	6.4	21.1	0.18	20.0	10.4	0.03	0.18	40.5
Sulphate (Total)	0.6	4.7	8.6	0.09	11.4	8.4	0.01	0.08	66.0
Aluminium (Total)	1.7	8.8	30.2	0.29	11.1	10.8	0.02	0.19	36.8
Copper (Total)	1.4	19.4	63.0	0.01	3.9	10.8	0.01	0.09	1.5
Iron (Total)	1.5	4.8	24.2	0.39	40.9	16.6	0.03	0.14	11.4
Manganese (Total)	0.1	2.5	1.0	0.06	8.6	16.7	0.00	0.00	71.0
Lead (Total)	0.2	5.4	3.5	0.10	3.3	3.7	0.03	0.29	83.5
Zinc (Total)	0.1	5.3	1.2	0.17	11.1	7.3	0.02	0.11	74.6

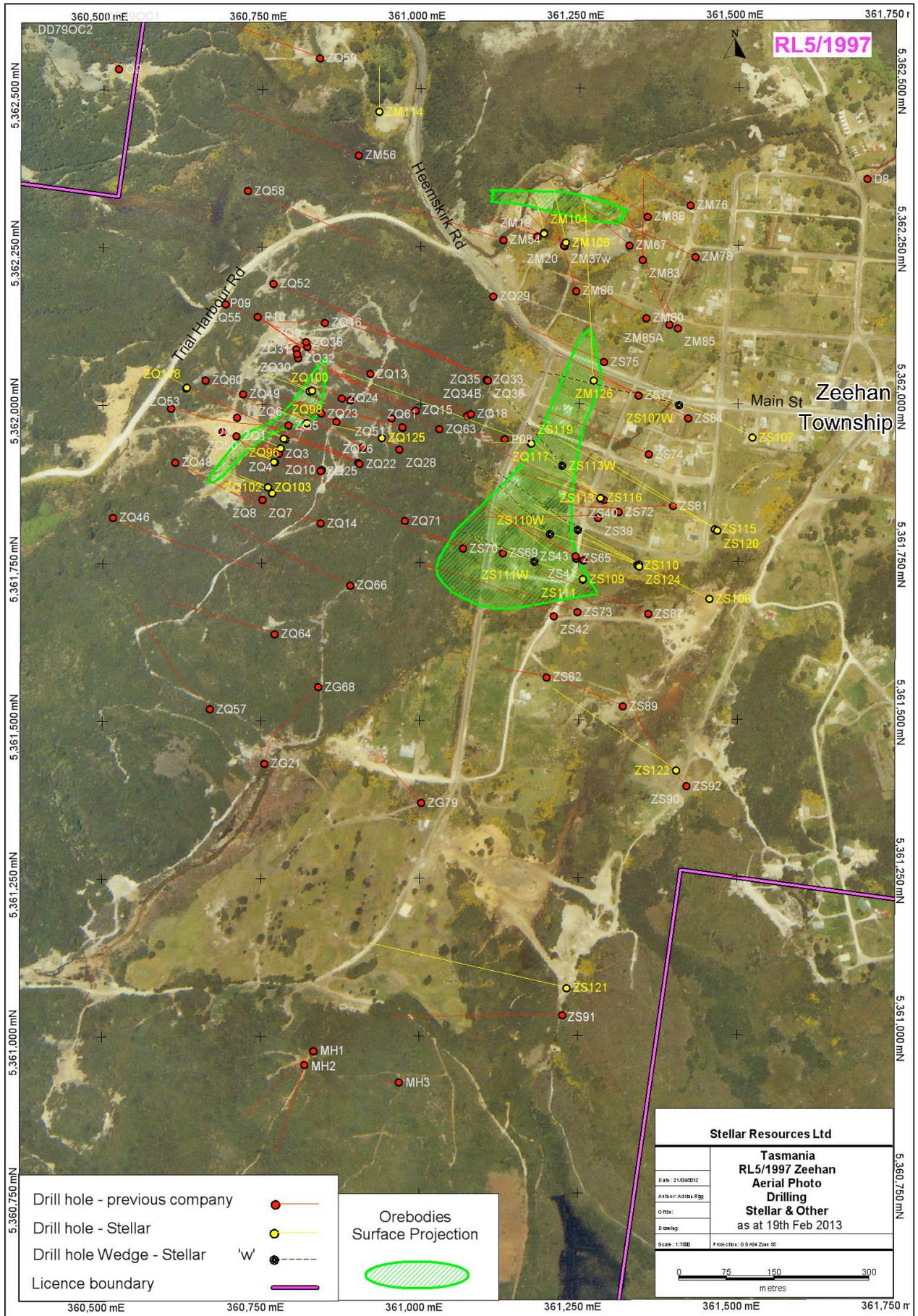


Figure 6. RL5/1997, Heemskirk Tin Project: Tin Deposits with Historic & Stellar Drilling to date.

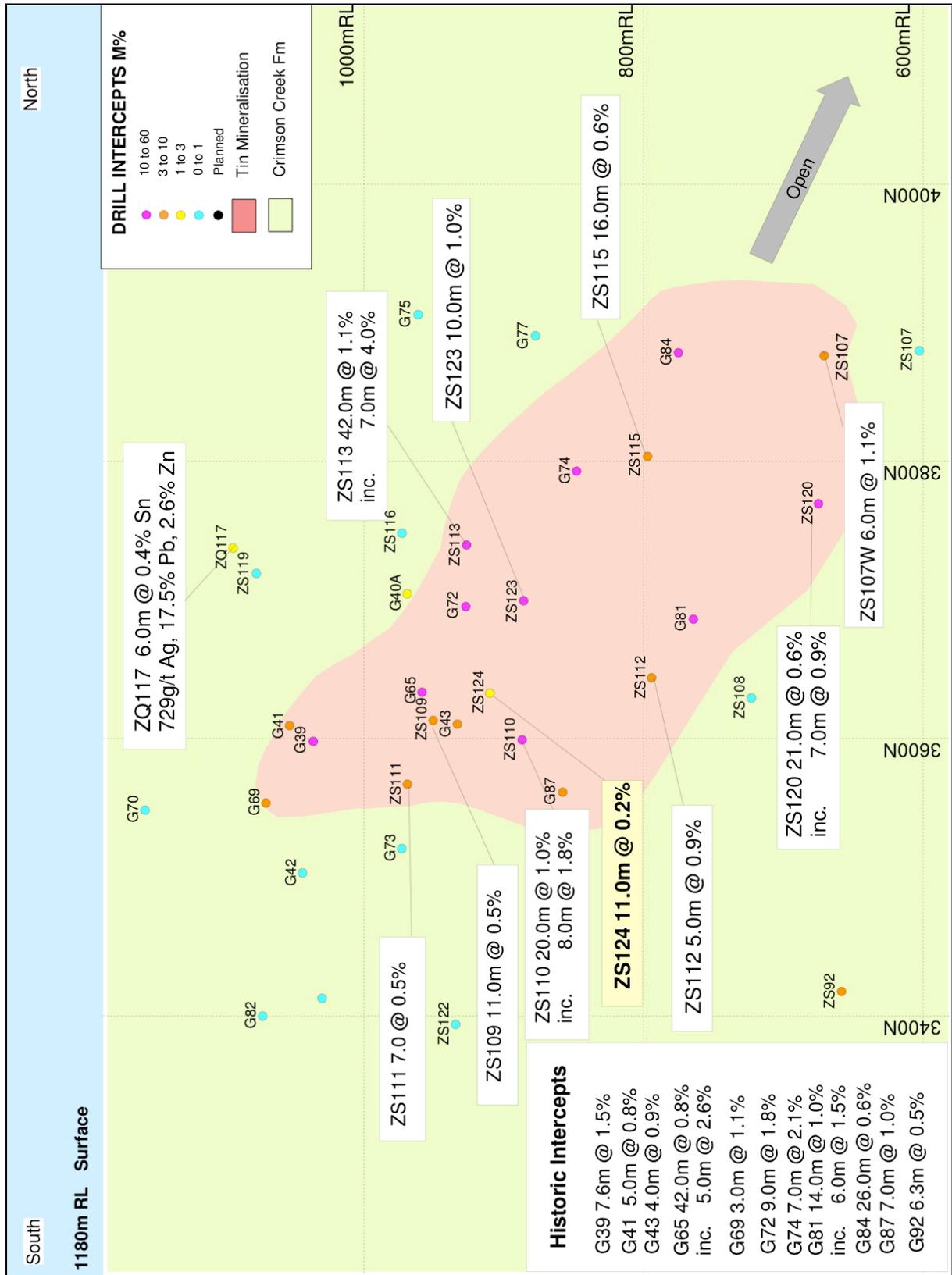


Figure 7. RL5/1997, Heemskirk Tin Project: Severn Deposit Longitudinal Section

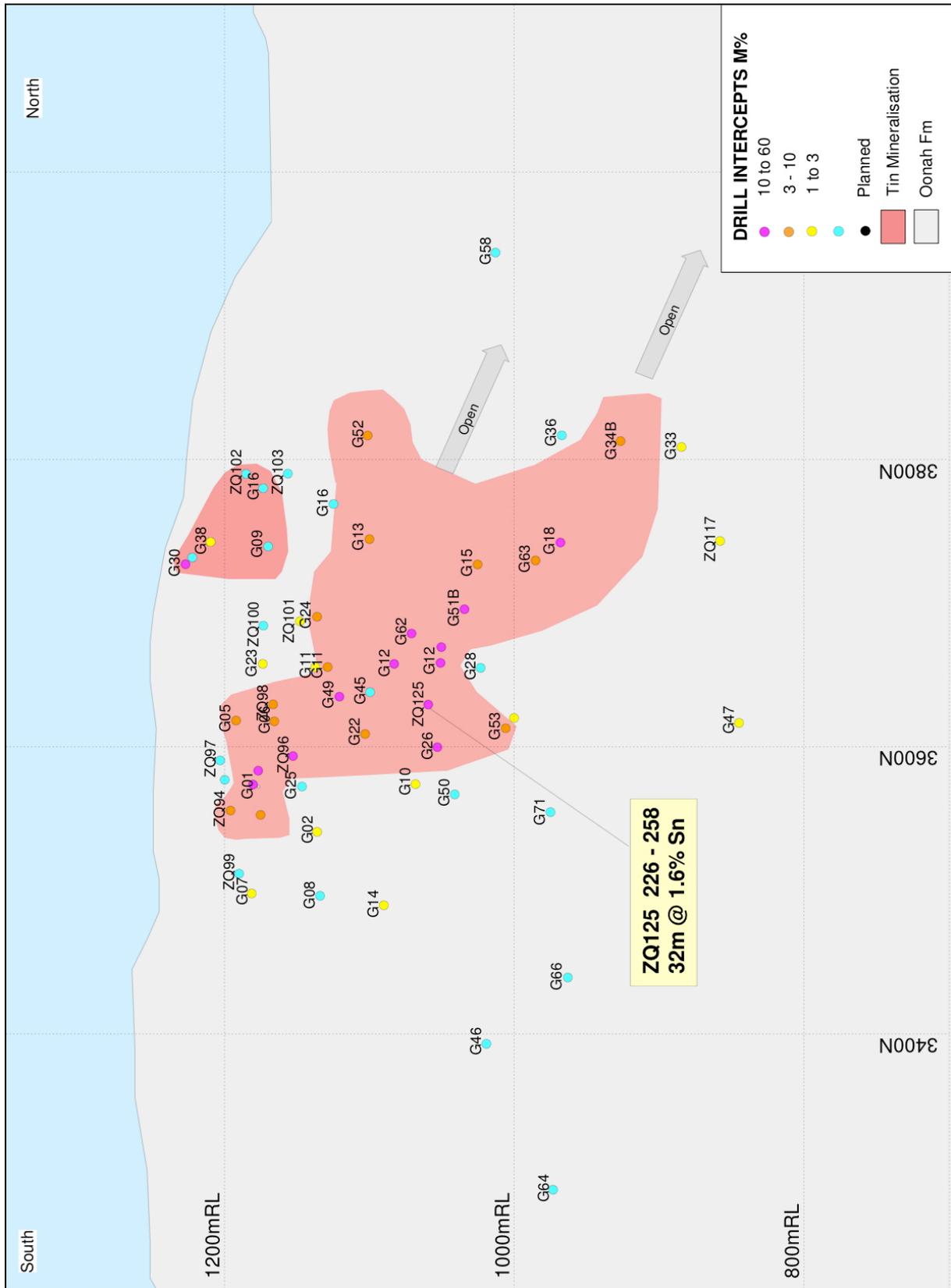


Figure 8. RL5/1997, Heemskirk Tin Project: Queen Hill Deposit Longitudinal Section

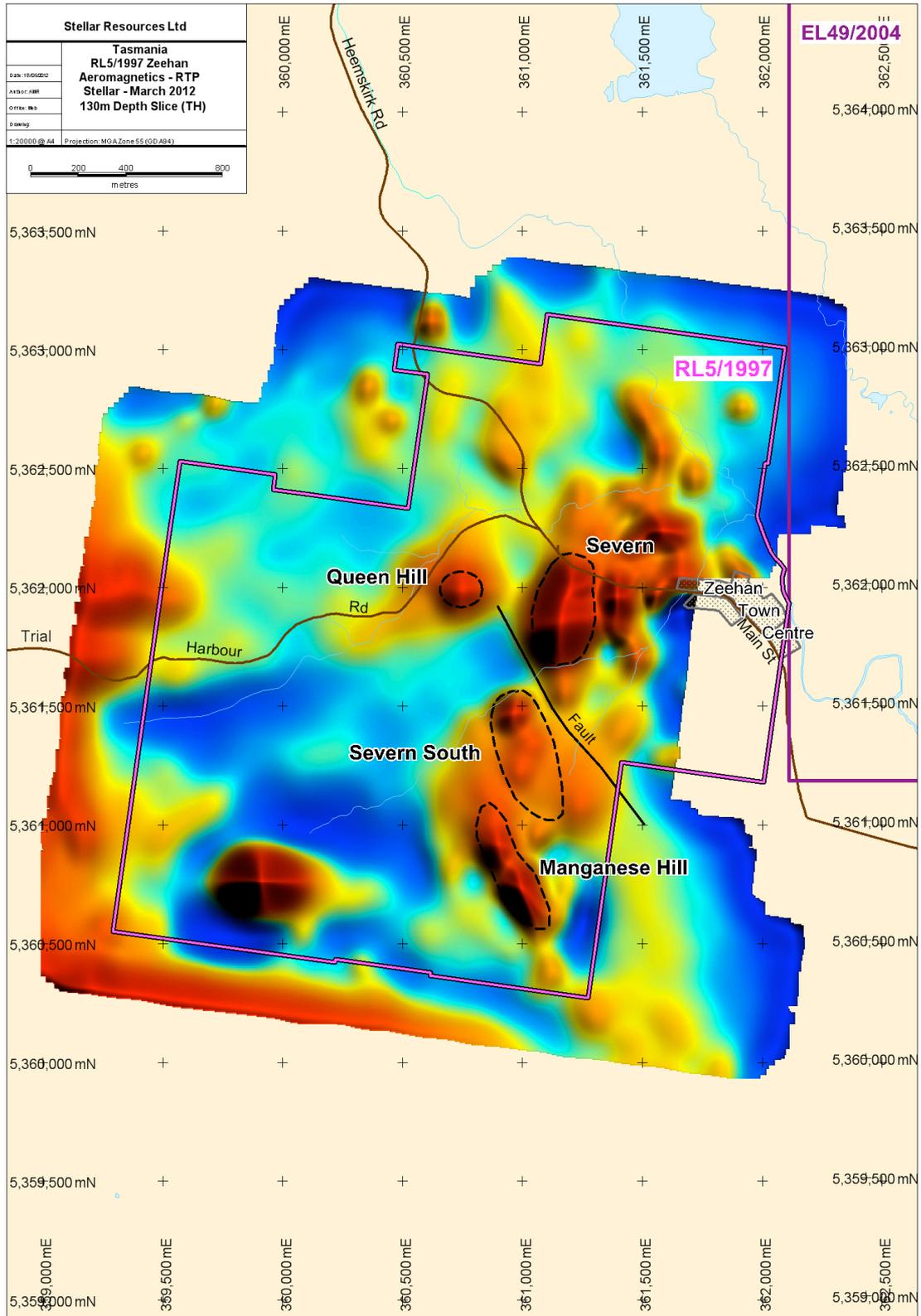


Figure 9. RL5/1997, Heemskirk Tin Project: Stellar Aeromagnetic Survey – RTP 130m Depth Slice

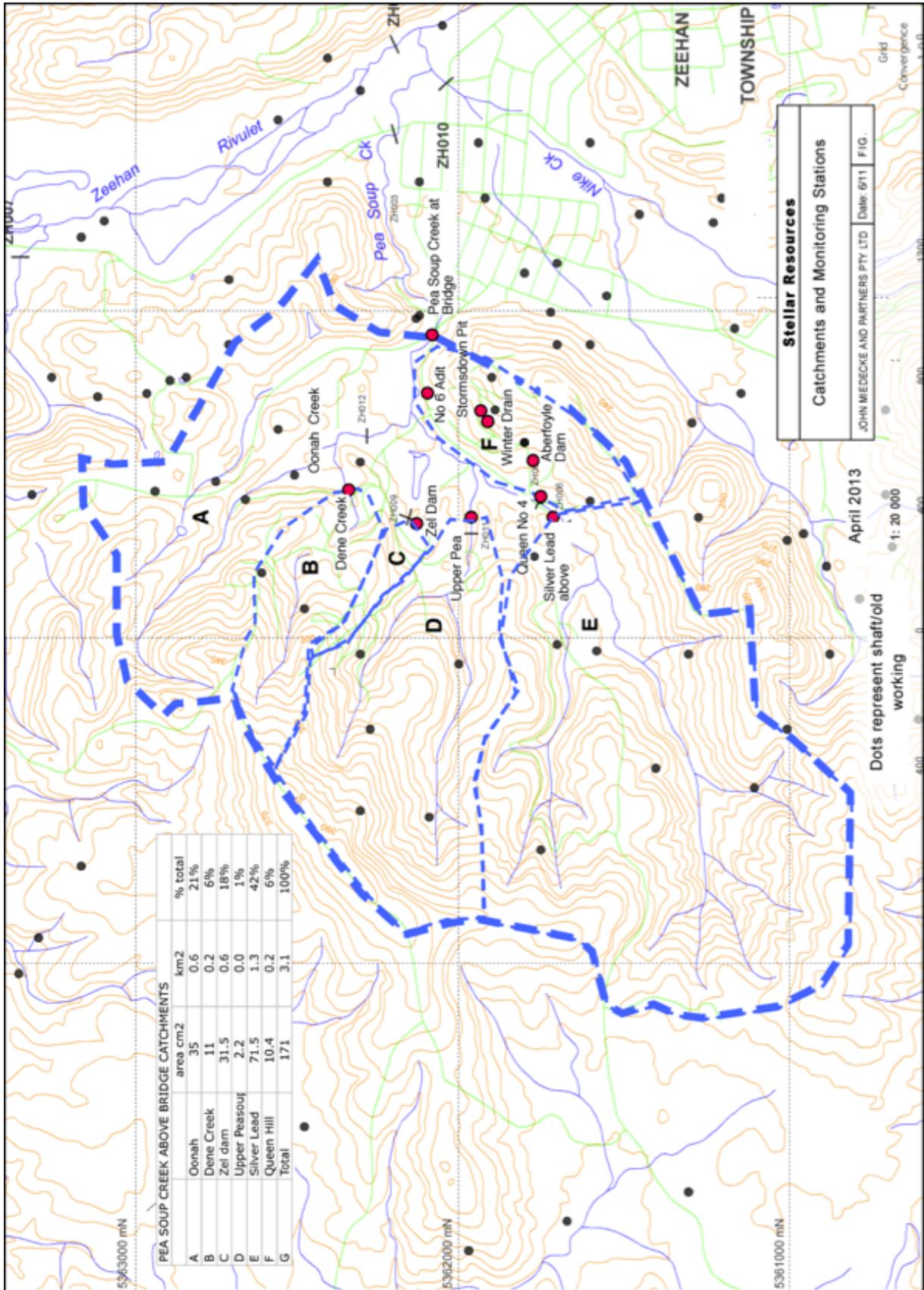


Figure 10. RL5/1997, Heemskirk Tin Project: Water Catchments & Sampling Stations

4. DISCUSSION

4.1. MINERALOGY / PETROLOGY STUDY

The Queen Hill deposit is located immediately above a lapilli volcanoclastic / spillitic basalt sequence (the Queen Hill Volcanics) whilst the Severn deposit is located immediately below the Crimson Creek Formation which comprises sediments, ash volcanoclastics and basalts. The similarities between the two volcanic sequences led to the theory (Lutley, 1975) that the whole sequence maybe folded around the Queen Hill Quartzite so that both the Queen Hill and Severn deposits are located at the same stratigraphic position. If this is so then the Queen Hill Volcanics and volcanics in the Crimson Creek Formation would be of the same age and source.

The Bottrill study findings support the conventional theory that the sequence at Queen Hill young to the southeast with the oldest rocks being the Oonah Queen Hill Volcanics in the northwest and the youngest the Cambrian Crimson Creek Formation to the southeast. The study does not support Lutley's structural theory of an overturned anticline. Refer to Figures 11 & 12.

4.2. DRILLING

Holes ZS112 and ZS112W were drilled on Section 3650mN intersecting the bottom edge of the Severn deposit at 800m ML. They were drilled up dip of ZS108, which was barren, and between G87 and G81 which both intersected mineralisation.

MS113 and ZS113W were drilled on Section 3750mN targeting the upper edge of the Severn Deposit. Both holes intersected wide zones of high grade mineralisation and are the best Severn Deposit intersections to date. Refer to Figures 11 & 12.

ZM114 was drilled into a magnetic target north of Queen Hill, near the old Montana Mine. It intersected mainly lapilli volcanoclastics (Queen Hill Volcanics) and was barren.

ZS115 was drilled on Section 3800mN under G74. It intersected the Seven Deposit at 800m ML.

ZS116 was drilled on Section 3750mN, immediately up dip of ZS113 and ZS113W. It was barren.

ZQ117 was drilled on Section 3750 above ZS116 but was designed to test the Queen Hill deposit at depth. It intersected significant Sn-Pb-Zn-Ag mineralisation at 105m depth which corresponds with the stratigraphic Severn Deposit position. At 396m depth it intersected a narrow zone of tin mineralisation which is thought to be the down dip extension of the Queen Hill Deposit. Refer to Figures 11 & 12.

ZQ118 was drilled into a small, shallow magnetic anomaly immediately north of Queen Hill. It intersected only Queen Hill Volcanics and was barren.

ZS119 was drilled near ZQ113 to test the extent of shallow Sn-Pb-Zn-Ag mineralized zone intersected in that hole. It intersected only minor narrow vein mineralization.

ZS120 was drilled down dip of ZS113 on Section 3750mN. It intersected the Severn Deposit between the ZS107W and G81 intercepts and serves to extend the Severn Deposit to depth.

ZS121 was drilled into the south end of the Severn South Magnetic Anomaly, up dip of ZS91. It did not intersect any significant mineralisation.

ZS122 was drilled into the northern end of the Severn South Magnetic Anomaly, up dip of ZS92. It intersected a weak pyrite stockwork zone at 220m depth but there was no significant mineralisation.

ZS123 is a Severn Deposit infill hole drilled on Section 3700mN between G72 and G81. It intersected three significant mineralised zones.

ZS124 is a Seven Deposit infill hole drilled on Section 3650mN between G65 and ZS112. It intersected two mineralised zones of which only the upper zone was economic.

ZQ125 and ZQ125W were drilled on Section 3650mN into the Lower Queen Hill Deposit to obtain samples for metallurgical testing and to test the zone around hole G45 which is a barren hole in the centre of the Queen Hill Deposit. Both holes intersected a significant mineralised zones including some hanging wall Pb-Zn-Ag lenses.

4.3. 2013 REVISED RESOURCE ESTIMATE

The 2013 Resource Estimate has resulted in a 49% increase in contained tin to 71,500 tonnes from the 2010 Resource Estimate. The Severn deposit accounted for 78% of the increase and now makes up 57% of the total resource. Queen Hill makes up 29% of the resource and Montana 14%. Results of the new resource estimate are set out below:

- JORC compliant Mineral Resource upgraded to 6.28 million tonnes @ 1.14% tin from 4.36 million tonnes @ 1.10% tin (March 2010).
- 49% increase in contained tin from 48,000 tonnes to 71,500 tonnes.
- 44% increase in resource tonnes to 6.28 million tonnes.
- 3% increase in average grade to 1.14% tin.
- 82% increase to 40,900 tonnes of contained tin at Severn deposit.
- 74% increase to 4.26 million tonnes at Severn
- 4% increase in Severn grade to 0.98% tin.

4.4. METALLURGICAL TEST WORK

The flow sheets presented as Figures 13 and 14 were developed as metallurgical testing progressed. They are the result of extensive testing in each of the circuit areas. Further refinements are in progress and the flow sheets for each ore type continue to evolve.

4.5. ENVIRONMENTAL STUDIES

The old MRT data and data from the four sample periods conducted to date have confirmed that significant contamination exists in the Pea Soup catchment from old mine workings, probably the Montana and Oonah workings. Data further highlighted the main sources of contamination as being to the north of Queen Hill and the recommended location for project facilities

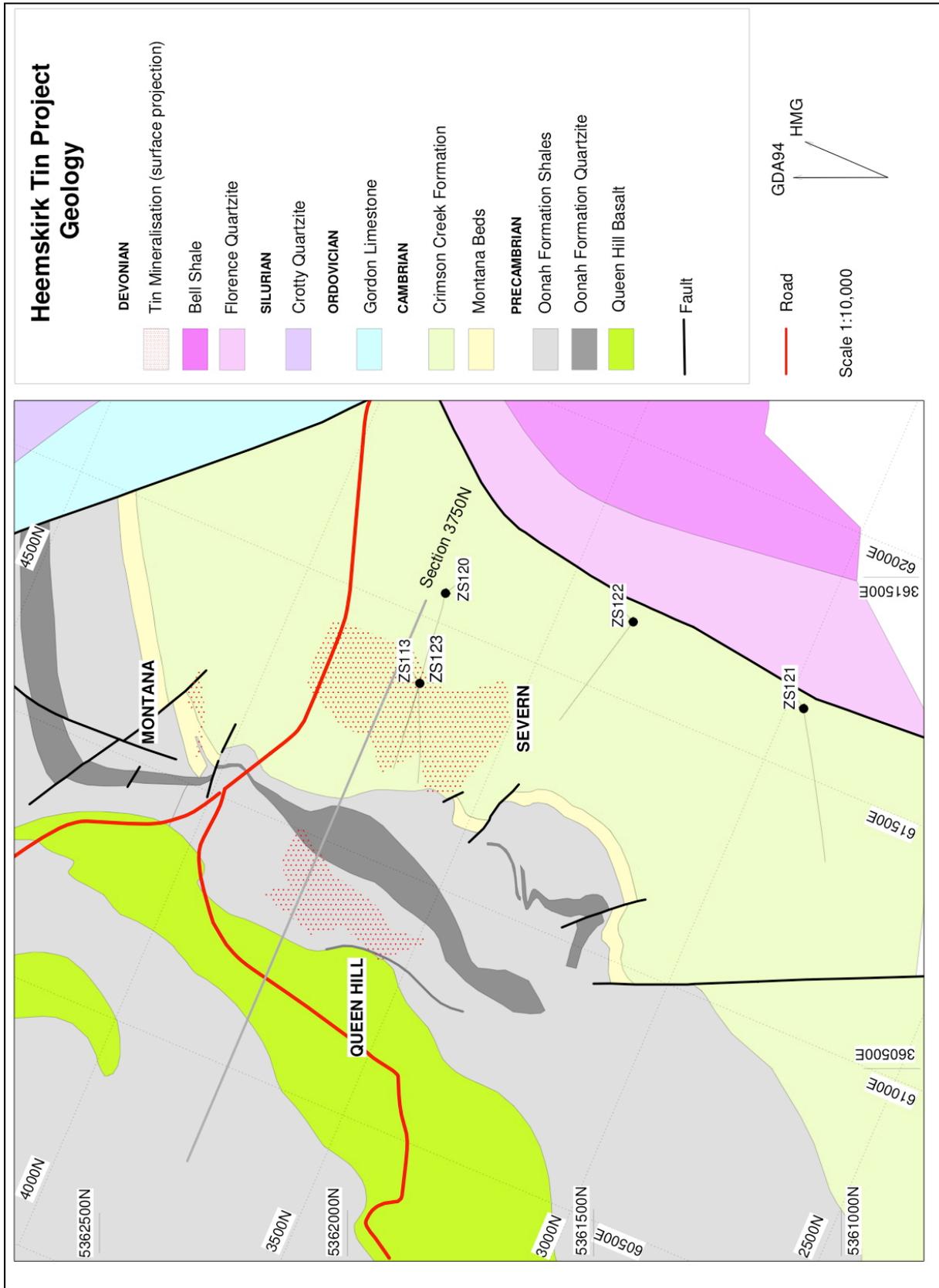


Figure 11. RL5/1997, Heemskirk Tin Project: Geology Plan showing deposits & drill hole traces on the ZMG grid with GDA grid tags.

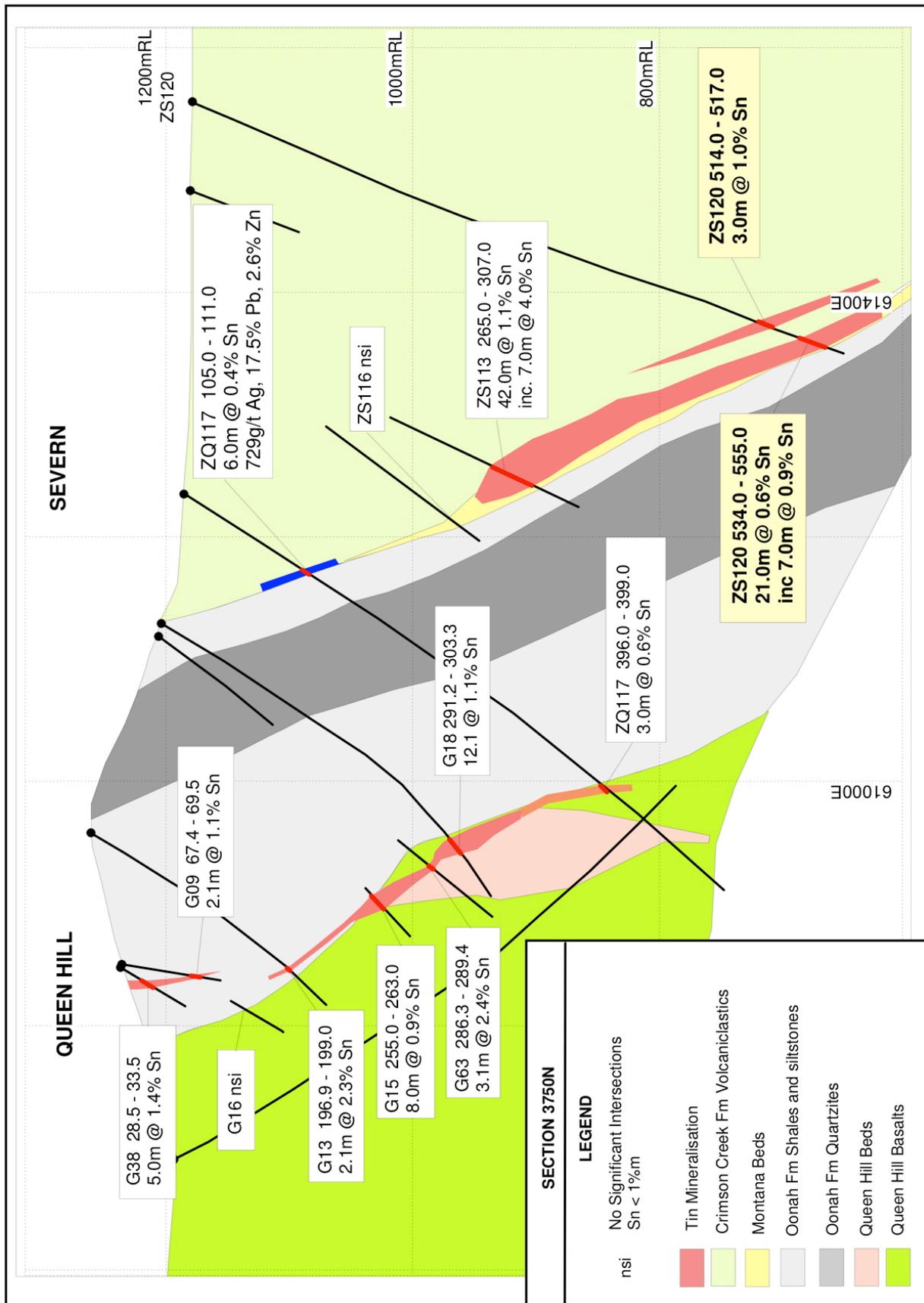


Figure 12. RL5/1997, Heemskirk Tin Project: 3750N Zeehan Mine Grid (ZMG) Geology Cross Section showing drill hole traces.

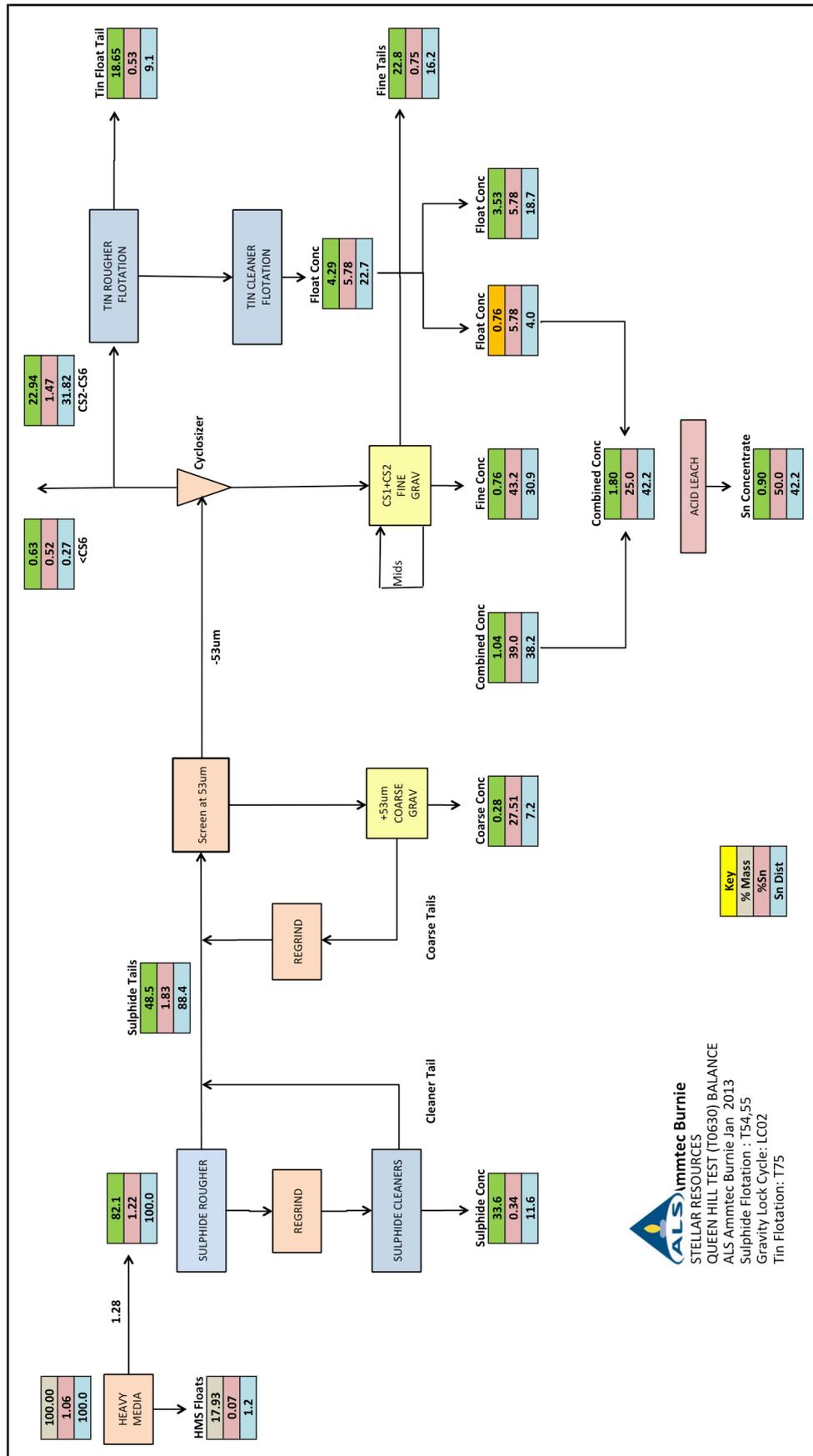


Figure 13. RL5/1997, Heemskirk Tin Project: Queen Hill Deposit Metallurgy Testwork Flow Sheet.

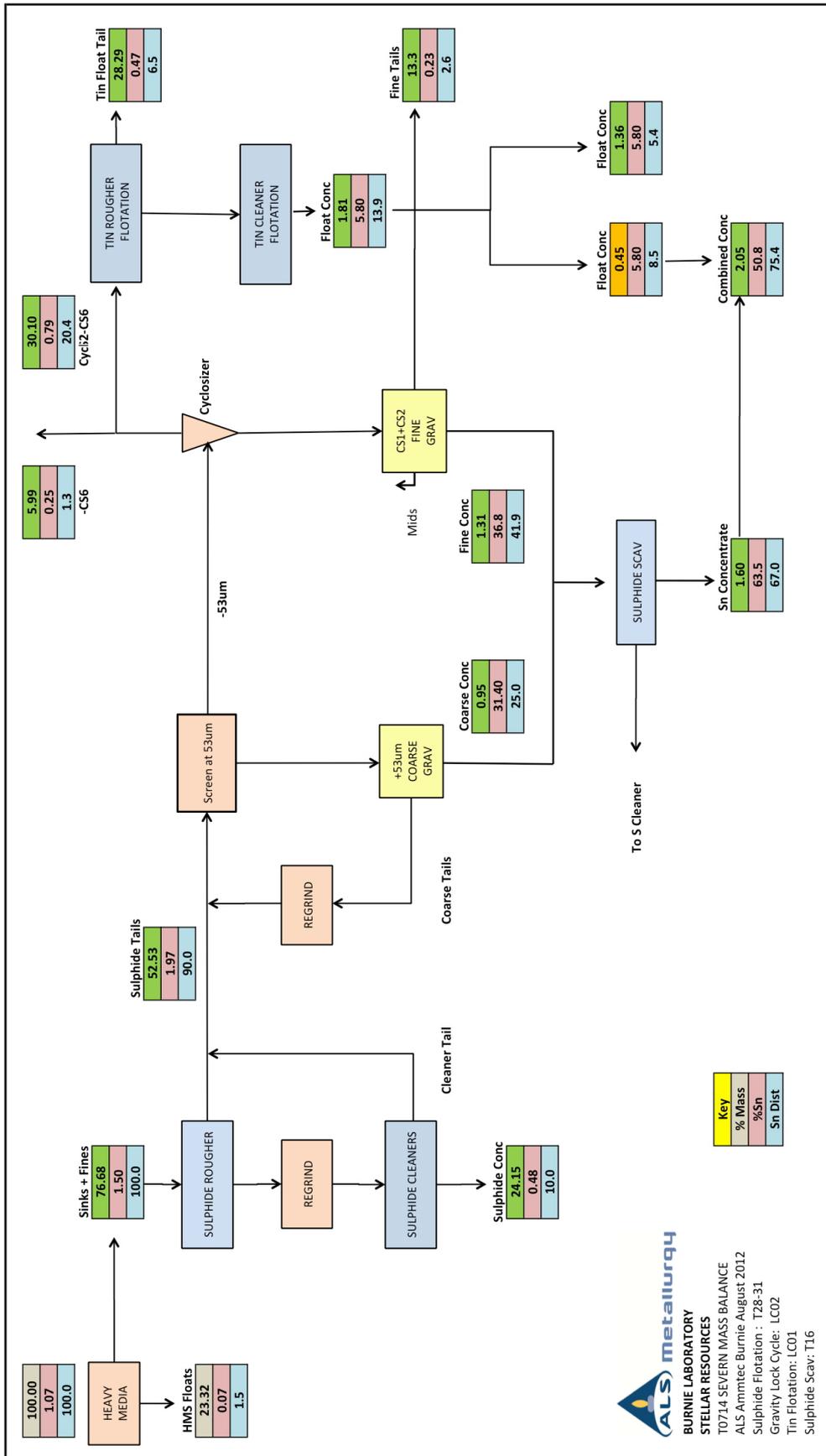


Figure 14. RL5/1997, Heemskirk Tin Project: Severn Deposit Metallurgy Testwork Flow Sheet.

5. CONCLUSIONS & PROPOSED WORK

The Heemskirk Tin Project comprises three structurally controlled and replacement tin deposits with substantial scope to both increase the size and quality of the known deposits and to add to this resource through the discovery of additional mineralisation at depth.

5.1. DEVELOPMENT TARGETS

Severn Deposit

The Severn Deposit will be subject to more infill drilling during the coming year to increase drill density and facilitate an increase in JORC resource status from inferred to indicated. More drilling will test the extremities of the known deposit, particularly down plunge.

Lower Queen Hill Deposit

The results from drill holes ZQ117 and ZQ125 indicate that there is significant depth potential at the Queen Hill Deposit. Ongoing metallurgical test work indicates that the deeper mineralization is also more amenable to mineral extraction than that near surface. The lower Queen Hill Deposit is considered highly prospective and will be drilled further in the coming year.

Montana

The Montana Deposit although high grade is the smallest of the known Heemskirk Project deposits. It is open to the west and down dip. The western edge of the deposit is currently being tested via two diamond drill holes (ZM126 & ZM126W). Future drilling of this deposit will depend upon the results of the current program.

5.2. EXPLORATION TARGETS

Detailed old mine modeling in 3D is being developed and incorporated into the project 3D model. Due to spatial relationship between Pb-Zn-Ag and tin mineralisation observed at Queen Hill and Severn it is likely that similar relationships exist adjacent to the past mined Pb-Zn-Ag deposits.

It is therefore planned to develop new exploration targets from this old mine modeling. Targets thus developed will be drill tested.

5.3. PROJECT STUDIES

The Pre Feasibility Study is due for completion by July 2013.

Metallurgical test work continues with further testing of Severn, Lower Queen Hill and Montana mineralization as it becomes available from drilling.

Environmental studies will continue throughout the year and be expanded to thoroughly evaluate rock geochemistry and the groundwater regime.

6. ENVIRONMENT

None of the 2012/13 Severn or Queen Hill drill sites have been rehabilitated as most continue to be reused on a regular basis. Sumps are immediately filled in as individual holes are completed for safety reasons. When sites are reused sumps are re-excavated.

The four exploration drill holes (ZM114, ZQ118, ZS121 & ZS122) have been plugged and the sites rehabilitated.

Most of the drill holes have been plugged with Van Ruth plugs and concrete but due to groundwater monitoring and sampling requirements the later holes were cased with slotted PVC pipe and fitted with a grouted steel collar pipe and pressure valves where possible.

7. EXPENDITURE

Printed At: 21/05/2013 16:13:57		Transaction Report Columbus Metals Limited		Page: 1
Job No	Job Details	Department		
Tran. Date		Doc Ref - Description	Amount	
Job Code: GIP901	ZeehanTin - RL 5/1997	D1		
	1053	Technical	\$42,780.78	
	1054	Labour	\$81,573.38	
Phase Total	105	STAFF COSTS	\$124,354.16	
	1061	Professional Technical	\$55,404.21	
	1062	Labour	\$800.00	
Phase Total	106	CONTRACT PERSONNEL	\$56,204.21	
	1072	Geoscientist	\$308,320.68	
	1073	Engineering	\$128,985.00	
	1074	Other	\$12,744.50	
	1075	Environmental	\$9,400.00	
Phase Total	107	CONSULTANT PERSONNEL	\$459,450.18	
	1151	Site Preparation	\$96,560.00	
	1153	RC	\$27,500.00	
	1154	Diamond	\$1,212,742.49	
Phase Total	115	DRILLING	\$1,336,802.49	
	1161	Assays	\$273,949.89	
Phase Total	116	ASSAYS	\$273,949.89	
	1251	Vehicle Costs All	\$51,648.73	
	1252	Office Costs	\$7,067.18	
	1253	Field Operations Consumables	\$91,900.06	
	1254	Safety Equipment	\$988.56	
	1255	Equipment Hire	\$11,418.05	
Phase Total	125	SUPPORT COSTS	\$163,022.58	
	1501	Purchase Costs / Stamp Duties	\$158,688.00	
	1503	Pegging Application Forms	\$1,231.20	
	1504	Legal Costs	\$1,175.64	
	1505	Rents/ Other Utilities	\$14,817.60	
Phase Total	150	TENEMENT COSTS	\$175,912.44	
	1551	Meals and Accomodation	\$19,815.71	
	1552	Airfares	\$4,454.61	
	1553	Vehicle Hire	\$767.30	
	1554	General Expense	\$957.82	
Phase Total	155	TRAVEL	\$25,995.44	
	1601	Rehabilitation Costs	\$8,730.00	
Phase Total	160	REHABILITATION COSTS	\$8,730.00	
	1651	Administration	\$546,739.00	
Phase Total	165	OVERHEADS	\$546,739.00	
Job Total : GIP901	Class GIP		\$3,171,160.39	
Report Total:			\$3,171,160.39	

8. REFERENCES

- Anderson, J.A., 1990. Consolidated Mineral Lease 36M/81 Queen Hill, Progress Report Queen Hill Joint Venture for year ended 30 April 1990. Aberfoyle Resources Limited. Mineral Resources Tasmania Open File Report 90-3123.
- Anderson, J. A., 1990. Potential Targets at Zeehan. Internal Memo dated 13 May 1990.
- Brown, A.V., 1986. Geology of the Dundas-Mt Lindsay-Mt Youngbuck region. Tasmanian Department of Mines, Geological Survey Bulletin 62.
- Bull, L.A., 2001. Retention Licence 9705, Zeehan, Annual report to 18 May 2001. Western Metals Ltd
- Callow, K.J., 1971. Report on Exploration Licence 28/71, Heemskirk, Tasmania, Australia and New Zealand Exploration Company. MRT Open File Report.
- Crossing, D.J.F. 1992. EL 47/82 Zeehan Partial Relinquishment Report for the period 1987 to 1992. RGC Exploration Pty. Limited. Mineral Resources Tasmania Open File Report 92-3379.
- Gippsland Oil and Minerals NL. 1986. Exploration Licence 2/85 North Heemskirk, Tasmania. Report for Period August 11th, 1985 - May 10th, 1986 and Final Report. MRT Open File Report.
- Hazeldene, R.K. 2008 EL 46/2003, Heemskirk, Annual Report for the Period 3 January 2007 – 2 January 2008.
- Hazeldene, R.K. 2009 EL 46/2003, Heemskirk, Annual Report for the Period 3 January 2008 – 2 January 2009
- Hazeldene, R.K. 2009 RL 5//1997, Zeehan, Annual Report for the Period 20 May 2008 – 20 May 2009.
- Hazeldene, R.K. & Rigg. A.M. 2012. RL 5//1997, Zeehan, Annual Report for the Period 20 May 2011 – 20 May 2012
- Hazeldene, R.K. & Rigg. A.M. 2011. RL 5//1997, Zeehan, Annual Report for the Period 20 May 2010 – 20 May 2011.
- Hazeldene, R.K. & Rigg. A.M. 2010. RL 5//1997, Zeehan, Annual Report for the Period 20 May 2009 – 20 May 2010.
- Kilpatrick, D.J., 1985. Annual Report EL 42/71, West Argent Area. Renison Limited July 1985. Mineral Resources Tasmania Open File Report 85-2450.
- Leaman, D.E. 1990. An interpretation form of Heemskirk Granite, Zeehan EL 42/87 for RGC Exploration Pty Limited. Dr D. E. Leaman, Leaman Geophysics. Mineral Resources Tasmania, Open File Report 92-3379.
- Mineral Resources Tasmania, 2003. Mineral exploration opportunities in Tasmania. A summary of opportunities for mineral exploration and mineral resource development in Tasmania. February 2003.
- Noonan, D.J. 1990. Consolidated Mineral Lease 36M/81 Queen Hill, Progress Report Queen Hill Joint Venture for year ended 30 April 1990, Aberfoyle Resources Limited. Mineral Resources Tasmania, Open File Report 90-3123.
- Oxenford, R. A., 1981. Proposed Exploration Programme, EL 47/71 for the Six Months to December 21st, 1981. Aberfoyle Exploration Proprietary Limited, Gippsland Minerals NL. Mineral Resources Tasmania, Open File Report 81-1597.

- Palmer, K. G., 1982. Zeehan Project Geological Resource Assessment 31 August 1982. Aberfoyle Exploration Pty Ltd. Mineral Resources Tasmania Open File Report 97- 4072.
- Palmer, K. G., 1983. Zeehan Project Pre-Feasibility Study Report. Aberfoyle Limited. Mineral Resources Tasmania Open File Report 97- 4070.
- Rombouts, M.J., 1983. Annual Report Exploration Licence 47/71, Queen Hill, Tasmania for year ended December 21, 1982. Aberfoyle Exploration Pty Limited, Gippsland Oil and Minerals NL. Mineral Resources Tasmania Open File Report 83-1942.
- Rombouts, M.J., 1983. Annual Report Exploration Licence 47/71, Queen Hill, Tasmania for 12 Months to December 21, 1983. Aberfoyle Exploration Proprietary Limited, Gippsland Oil and Minerals NL. Mineral Resources Tasmania Open File Report 84-2087.
- Seymour, D. B., Green, G. R. and Calver, C. R., 2007. The Geology and Mineral Deposits of Tasmania: a summary. Mineral Resources Tasmania Geological Survey Bulletin 72.
- Sise, J. R., 1981. Progress Report Queen Hill Joint Venture, EL 47/71 Tasmania, Quarter to March 9, 1981. Aberfoyle Exploration Proprietary Limited, Gippsland Minerals NL. Mineral Resources Tasmania Open File Report 81-1547.
- Sise, J. R., 1981. Progress Report Queen Hill Joint Venture, EL 47/71 Tasmania, Quarter to June 1, 1981. Aberfoyle Exploration Proprietary Limited, Gippsland Minerals NL. Mineral Resources Tasmania Open File Report 81-1571.
- Sise, J. R., 1981. Progress Report Queen Hill Joint Venture, EL 47/71 Tasmania, Quarter to December 21, 1981. Aberfoyle Exploration Proprietary Limited, Gippsland Minerals NL. Mineral Resources Tasmania Open File Report 82-168
- Sise, J. R., 1986. Exploration Licence 47/71 Queen Hill Tasmania Final Report, including Report on Exploration for the Period January 1985 to November 1986. Aberfoyle Exploration Proprietary Limited, Gippsland Oil and Minerals NL. Mineral Resources Tasmania Open File Report 97-5001.
- Wells, Keith. 1978. Geology and Mineralisation in the South Heemskirk Tin Field, West Tasmania. Dissertation for Master of Science Degree, Faculty of Science, James Cook University of North Queensland.
- Young, C.H. 1980. Annual Report – May 2008, Retention Licence RL 5/1997 - ZEEHAN, Period Ending June 2008. Columbus Metals Limited,

Keywords

Location: Zeehan
Mineralisation environment: Sulphide Skarn
Minerals: Cassiterite, Stannite, Pyrite, Pyrrhotite, Magnetite
Exploration methods: Historic Research, Drilling, Metallurgical Testwork
Mine/prospect name: Heemskirk Tin Project, Queen Hill deposit, Severn deposit, Montana deposit
Stratigraphic name: Oonah Formation, Success Creek Group, Crimson Creek Formation, Gordon Limestone, Eldon Group, Heemskirk Granite
Lithologic name: quartzite, volcanoclastic, basalt, siltstone, shale, limestone, dolomite, granite
Geological Province: Dundas Trough
Geological age: Lower Neoproterozoic, Palaeozoic

STELLAR RESOURCES LTD

May 2013

RL 5/1997 Zeehan – Report on 2013 program

APPENDICES

STELLAR RESOURCES LTD

May 2013

RL 5/1997 Zeehan – Report on 2013 program

Appendix 1: Drilling Summary

Hole No.	Collar Co-ordinates (MGA)			ZMG Section No.	Azimuth (MGA)	Dip°	Start Date	End Date	Depth (m)	Core Size	Av. Rec	Geology & Mineralisation		Intercept Assay							Int. Rec.							
	Easting	Northing	R.L.									Interval (m)	Geology & Mineralisation	Interval (m)	Width (m)	% Sn	ASSn (ppm)	% Cu	% Pb	% Zn		Ag (ppm)						
ZS112	361344.65	5361746.72	180.56	3650	300°	70°	31/5/2012	17/07/12	551.6	HQ/NQ3	96%	0 - 250.9	Rolled															
												250.9 - 409.0	Black Shale, Shale & Ash Volcaniclastic															
												326.9 - 412.0	Pyrite & Pyrrhotite Stockwork	329.0 - 332.0	3.00	1.46	<50	0.07	0.20	0.02			6	100%				
												409.0 - 450.0	Shale & Dolomite	344.0 - 345.0	1.00	1.95	<50	0.07	0.00	0.01			4	90%				
												412.0 - 466.3	Pyrite Stockwork	355.0 - 357.0	2.00	1.31	<50	0.04	0.00	0.00			2	100%				
												450.0 - 538.0	Silicified Shale, Dolomite & Quartzite	362.0 - 363.0	1.00	2.45	<50	0.02	0.00	0.00			1	100%				
												538.0 - 551.6	Silicified Shale & Quartzite	386.0 - 388.0	2.00	1.27	50	0.12	0.00	0.00			1	100%				
						406.0 - 411.0	5.00	0.87	171	0.06	0.01	0.00		2	100%													
ZS112W	Wedged off ZS112 @ 313.4m			3650	305°	68°	18/7/2012	2/08/12	455.5	BQ	99%	313.4 - 367.5	Ash Volcaniclastics & Black Shale															
	326.0 - 413.3	Pyrite & Pyrrhotite Stockwork	328.0 - 330.0									2.00	1.22	60	0.08	0.09	0.05			5	100%							
	367.5 - 392.0	Ash Volcaniclastics & Dolomite	339.0 - 344.0									5.00	0.81	82	0.04	0.01	0.01			2	100%							
	392.0 - 427.8	Ash Volcaniclastics, Black Shale & Shale	355.0 - 357.0									2.00	1.41	50	0.09	0.00	0.01			1	100%							
	413.3 - 455.5	Pyrite Stockwork	369.0 - 370.0									1.00	1.21	<50	0.03	0	0.01			<1	100%							
	427.8 - 455.5	Dolomite & Shale																										
ZS113	361284.39	5361851.87	180.68	3750	310°	65°	7/6/2012	29/06/12	350.4	HQ/NQ3	99%	0 - 180	Rolled															
												180.0 - 256.4	Ash Volcaniclastics & Shale															
												256.4 - 279.7	Black Shale															
												266.8 - 279.7	Pyrite Stockwork	276.0 - 288.0	12.00	0.74	172	0.07	0.07	0.01			8	100%				
												279.7 - 317.1	Volcaniclastics															
												279.7 - 306.8	Pyrite & Pyrrhotite Stockwork	292.0 - 304.0	12.00	2.58	158	0.14	0.00	0.00			2	100%				
												317.1 - 340.6	Silicified Shale & Quartzite															
340.6 - 350.4	Quartzite																											
ZS113W	Wedged off ZS113 @ 192.8m			3750	320°	61°	2/07/12	6/07/12	322.0	BQ	100%	192.8 - 250.0	Ash Volcaniclastics & Shale															
	250.0 - 278.0	Black Shale																										
	250.0 - 285.3	Pyrite Stockwork	266.0 - 269.0									3.00	1.85	<50	0.08	0.00	0.01			2	100%							
	278.0 - 314.0	Ash Volcaniclastics & Dolomite	272.0 - 279.0									7.00	1.60	200	0.13	0.01	0.01			10	100%							
	285.3 - 317.5	Pyrite & Pyrrhotite Stockwork	282.0 - 288.0									7.00	1.78	160	0.07	0.00	0.01			2	100%							
	314.0 - 322.0	Shale & Black Shale	294.0 - 297.0									4.00	0.73	117	0.13	0.00	0.01			2	100%							
ZM114	360934.25	5362464.77	190.50		000°	60°	4/07/12	17/07/12	143.3	HQ/NQ3	94%	0.0 - 5.0	Rolled															
												5.0 - 119.2	Volcanics & Lapilli Volcaniclastics															
												119.2 - 133.9	Black Shale															
												133.9 - 143.3	Lapilli Volcaniclastics															
ZS115	361464.01	5361802.32	177.88	3800	300	55°	6/07/12	22/09/12	509.3	RC/HQ/NQ3	99%	0.0 - 223.8	Rolled															
												223.8 - 331.7	Volcanic Shale & Ash Volcaniclastics															
												331.7 - 492.4	Black Shale, Ash Volcaniclastics & Dolomite															
												387.2 - 480.6	Pyrite Stockwork	465.0 - 472.0	7.00	0.79	<50	0.01	0.00	0.01			<1	100%				
												492.4 - 509.3	Quartzite & Shale	475.0 - 481.0	6.00	0.63	50	0.06	0.02	0.02			4	91%				

STELLAR RESOURCES LTD

May 2013

RL 5/1997 Zeehan – Report on 2013 program

Appendix 2: Analytical Methods



ALS Minerals Burnie
39 River Rd, Wivenhoe, Tasmania, 7320, Australia
Phone: 61 3 6431 6333

PRIVATE & CONFIDENTIAL

29th May 2013

Mr. Ray Hazeldene
CI- Stellar Resources

Dear Ray,

RE: ALS Analysis Methods

Please find below a summary of analysis methods employed for the analysis of Stellar Resources samples.

ME-XRF15d (XRF fused bead analysis for Sn, WO₃, Fe & S)

The sample is mixed with a borate flux, pre-oxidised @ 700°C then fused @ 1200°C. The homogenous glass bead is presented to the Axios X-ray spectrometer for measurement against a calibration constructed from synthetic standards & verified using Certified Reference Materials.

ME-ICP41a (ICP analysis for Soluble Sn, Cu, Pb, Zn, Ag, Bi, Ni & As)

High Grade aqua-regia digestion and ICP-AES for 30 elements. Quantitatively dissolves base metals for the majority of geological materials. Major rock forming elements and more resistive metals are only partially dissolved.

QA-GRA08 (Specific Gravity)

Specific Gravity for bulk samples using the weight in air versus weight in water method.

Yours Sincerely,

Rocky Gelston
Chief Chemist
ALS Minerals Burnie