



HENTY RIVER EL 7/2001

**ANNUAL REPORT
FOR THE PERIOD ENDING 27th JUNE 2004**

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CONTENTS

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1. SUMMARY	1
2. INTRODUCTION.....	2
2.1 Attribution	2
3. LAND TENURE	3
4. GEOLOGY.....	3
5. PREVIOUS EXPLORATION.....	5
6. WORK COMPLETED 2003-2004 REPORTING PERIOD.....	7
7. ENVIRONMENT AND REHABILITATION.....	7
8. CONCLUSIONS & RECOMMENDATIONS	7
9. EXPENDITURE	8
10. KEYWORDS & LOCALITY.....	9
11. REFERENCES	9

LIST OF TABLES

Table 1	Previous exploration over the area of EL 7/2001 Henty River
Table 2	Previous exploration on EL 7/2001 Henty River

LIST OF FIGURES

Figure No.	Title	Scale
<i>0701_200406_03_fig1.pdf</i>	Tenement Location Diagram	1:500,000
<i>0701_200406_04_fig2.pdf</i>	Regional Geology	1:30,000

LIST OF APPENDICES

1. SUMMARY

This report details exploration work undertaken on EL 7/2001 Henty River during the period 27th June 2003 to 27th June 2004, year three of the tenement. No fieldwork was completed during the reporting period. The lack of work is a result of financial constraints whilst Pasmafinco was in Administration.

It is recommended that future work concentrate on completing compilation of historic data, re-interpretation of EM data, re-opening and extending the Aberfoyle Henty Valley grid and then ground EM and partial leach soil sampling over this grid.

2. INTRODUCTION

This report details exploration work undertaken on Henty River EL 7/2001 during the period 27 June 2003 to 27 June 2004, the third year of this tenement.

Pasminco's main target on EL 7/2001 is Cambrian Rosebery or Hellyer type, Zn-Pb-Cu-Au-rich VHMS mineralisation hosted by the Mount Read Volcanics (MRV). The tenement covers the Henty Fault Wedge, a "misfit" block of Cambrian volcanics, the central portion of which is considered VHMS prospective (see Section 4 below).

Pasminco plans to systematically explore the EL using a combination of geological mapping, partial leach soil geochemistry and infill time-domain ground EM, where there is no existing coverage, or the work that has been done is considered to have been ineffective.

Access to the tenement is via the Zeehan highway (A10), in the west, and the Anthony Road (B28), to the east. These two roads are joined by Howards Road, which traverses the northern part of the tenement. Howards Road is gated at the HEC White Spur Dam and is also blocked to vehicular access at approximately 375200mE (the western end of the HEC White Spur Canal). A network of 4WD tracks, developed for logging and mineral exploration, extends south from Howard's Road and provides some access to the main area of interest, however, much of the tenement is heavily forested, rugged and difficult to access.

2.1 Attribution

The following personnel were responsible for the work carried out by Zinifex Rosebery Mine on the EL 7/2001 Henty River licence area during the reporting period:

Senior Geologist: Andrew McNeill – Zinifex Rosebery Mine

3. LAND TENURE

EL 7/2001 Henty River (25 sq km) was granted to Pasminco on 27 July 2001 for a period of 5 years. The location of the tenement is shown on Figure 1. EL 7/2001 covers ground that fell vacant on the relinquishment of EL 4/96 (Western Metals/Aberfoyle) in February 2001. On April 5th 2004 the name of Pasminco Australia Limited was changed to Zinifex Australia Limited as part of a float of some Pasminco assets.

Land covered by EL 7/2001 is all crown land designated as Multiple Use State Forest, Unallocated Crown Land, part of the Mt Dundas Regional Reserve and some HEC land all of which are available for exploration under the Mineral Resources Development Act 1995.

4. GEOLOGY

The regional geology of the tenement area is shown on Figure 2, which is derived from the mapping of Corbett (1986). More recent regional mapping of the tenement was completed by Poltock (1992b) and an updated interpretation of the area was presented in Corbett (2002).

The geology of EL 7/2001 Henty River can be divided into three domains, separated by major regional faults:

1. The White Spur Formation (WSF) NW of the North Henty Fault (in the NW of the tenement).
2. The Henty Fault wedge sequence between the North and South Henty Faults in the Central part of the tenement.
3. The Yolande River Sequence and Central Volcanic Complex (CVC) south and east of the South Henty Fault.

Of these three, domains 1 and 2 are considered VHMS prospective and will be discussed in more detail.

1. The WSF is a regionally significant unit extending south from the Rosebery Fault, near the Hercules Mine, to be truncated against the North Henty Fault, in the NW corner of the Henty River tenement. The White Spur Formation comprises mixed terrigenous and volcanoclastic sediments with intrusive feldspar-quartz-phyric rhyolite and quartz-feldspar porphyry bodies at different levels in the sequence. To the north, at Rosebery and Hercules, the WSF forms the hangingwall to the orebodies and the base of the WSF/top of the Central Volcanic Complex is considered to be a highly prospective horizon. On the area of EL 7/2001 the base of the WSF does not crop-out, being truncated by the North Henty Fault, however, it is likely to be present at explorable depths (<500m) beneath north-south trending folds.

2. The Henty Fault Wedge has been described as a “misfit” sequence that can be subdivided into three structural/lithological domains in the area of EL 7/2001 (Poltock, 1992b).

The geology of the northern part of the fault wedge is dominated by the Henty Valley Sequence, tholeiitic basalts, cherts and hematitic greywackes, that are interpreted to have formed from the early Cambrian (contemporaneous with the Crimson Creek Formation) through to mid-Cambrian (contemporaneous with the MRV) (Poltock, 1992b). This lithological domain is not considered prospective for VHMS mineralisation.

The Henty Valley Sequence is conformably overlain by the calc-alkaline Henty Adits and Halls Rivulet Track sequences (lithological domain 2). The Henty Adits Sequence comprises plagioclase-phyric basaltic andesite lavas and volcanoclastics and siltstone units. The andesites have been correlated with the Que-Hellyer footwall andesites (suite 1) by Crawford et al. (1992). However, Poltock (1992b) indicates significant differences and suggests the sequence is transitional between calc-alkaline and tholeiitic and compositionally overlaps suites 1, 3 and 4 (of Crawford et al., 1992). The volcanoclastics and siltstones, at the base of the sequence, host the Henty Adits mineralisation (best intersection; 6 m @ 2.88% Pb, 1.61% Zn, 15 g/t Ag [Meares, 1980]) and have been the target of most intensive exploration in the area (see Section 5). Away from the main mineralisation the siltstones are variably pyritic with lesser pyrrhotite.

The overlying west dipping and facing Halls Rivulet Track Sequence comprises volcanoclastic conglomerate, sandstone and siltstone and plagioclase-augite-phyric basaltic andesite lavas (MRV Suite 1) that have been correlated with the Tyndall Group (Poltock, 1992b).

On the basis of the correlations indicated above, the Henty Adits and Halls Rivulet sequences are considered to be VHMS prospective, however, no significant mineralisation or alteration is known outside the Henty Adits area.

The Halls Rivulet Sequence is truncated by a N-W trending fault (the Howards Tramway Fault of Poltock [1992b]). West of this fault an ophiolitic sequence (lithological domain 3) has been mapped and comprises (from east to west) slivers of cumulate gabbro, dunite and pyroxenite, overlain by an intrusive complex of gabbro and dolerite, with minor intrusive plugs of andesite and tonalite, which pass into extrusive andesitic lavas, and at the western boundary of the current tenement, volcanoclastic siltstone and greywacke. Geochemically the ophiolite complex has both tholeiitic and calc-alkaline affinities and is unlike the earlier allochthonous Cambrian MUC. The complex was interpreted to be Mid-Late Cambrian in age by Poltock (1992b), i.e., contemporaneous with the MRV, and may be VHMS prospective.

5. PREVIOUS EXPLORATION

The area of EL 7/2001 Henty River has a long history of ‘modern’ exploration commencing in the 1960s, as part of ELs 9/66, 42/71, 5/85 and 4/96. Previous exploration has been reviewed in detail by several authors (Purvis et al., 1983; Hicks, 1997). Exploration prior to the granting of EL 7/2001 is summarised on Table 1, and exploration completed by Zinifex/Pasminco on EL 7/2001 is summarised in Table 2.

Table 1 Previous exploration on the area of EL 7/2001 Henty River

Reporting Period	Work Completed
1967-1968 (Newnham, 1968)	West Tyndall: gridding and extending roads, IP surveys with lesser mapping, soil and rock-chip sampling (only 2 lines on current EL area). Recommended extending mapping and soil coverage.
1968-1969 (Newnham, 1969)	West Tyndall: mapping, ground magnetics, soil sampling. Work located ultramafic bodies with Ni soil anomalies. Recommend follow-up for Ni potential.
1969-1971	No field work
1971-1972 (McKibben, 1972; Sheppard, 1972)	West Tyndall: Detailed mapping and rock-chip sampling for Ni (max. 1140 ppm). No further work recommended. Henty River: Reconnaissance mapping relocated old adits.
1972-1977	No field work; review of IP in 1974 (Wells, 1974).
1977-1978 (Meares, 1978)	Henty River: Gridding, mapping, sampling and mapping old workings, detailed soil sampling located major Cu-Pb-Zn-Ag anomaly.
1978-1979 (Drake et al., 1979)	Henty River: Extended grid, detailed mapping, IP, ground magnetics located 3 major anomalies. Detailed soil and rock-chip sampling defined major Ag-Pb-Zn anomalies. Orientation stream sediment and water sampling. 2 x DDH (HR1 and HR2; 602m) intersected Pb>Zn mineralisation. Downhole IP in HR1.
1979-1980 (Hutton et al., 1980)	Henty River: Further grid extensions and mapping, IP and magnetics (no further anomalies); further rock-chip and soil sampling. 1 x DDH (HR3; 617m) intersected minor mineralisation. Completion of MSc thesis on Henty Adits area (Meares, 1980).
1980-1981 (Hutton et al, 1981)	Henty River: 2 drill holes completed (HR4 & 5; 733m total) to test combined soil/IP/mag. anomalies at favourable stratigraphic position; minor mineralisation intersected. Minor rock-chip sampling completed. West Tyndall: re-open grid, mapping, IP and minor soil (data not presented in report) and rock-chip sampling on lines 10 and 12N to follow-up 1968 IP anomaly; conclude some Sn potential.
1983 (Purvis et al., 1983)	No Fieldwork. Reviewed previous exploration over West Tyndall-Henty River area; no further work recommended.
1983-1984 (Fitzgerald and McNaught, 1984)	Halls Rivulet area; re-open old “West Tyndall” grid, mapping, rock-chip and soil sampling, ground magnetics one line of airborne EM; no significant Sn or base metal anomalies.
1985 (Jones, 1985)	Drafting of base maps, re-clearing of part of the RGC Henty Adits grid; EM-37 survey; no significant targets.
1985-1986 (Mathison, 1986)	Cutting of the Henty Valley Grid (extending south from RGC Henty Adits grid); stream sediment and rock-chip sampling and geological mapping.
1986-1987 (Mathison and Ferguson, 1987)	geological mapping, rock-chip and ‘C’ horizon soil sampling and trial VLF-EM and ground magnetic surveys on the EZ Henty Valley Grid.
1987-1988 (Poltock, 1988)	Reconnaissance mapping and stream sediment sampling (-80#) at Henty Valley; no significant anomalies.

Table 1 Previous exploration on the area of EL 7/2001 Henty River cont..

Reporting Period	Work Completed
1988-1989 (Poltock, 1989)	No field work
1989-1990 (Jenkins, 1990)	Work on Henty River Adits and Henty Valley; re-opening access tracks, line cutting (with surveying of base line); mapping and rock-chip sampling; re-assaying (HR2) and Pb isotopes on drill core and two lines of wacker sampling. Review of open file airborne magnetics and completion of a new high resolution airborne magnetic /radiometric survey. Aerial photography and photogrammetry. Lithogeochemical study.
1990-1991 (Poltock and Fitzgerald, 1991)	Report on wacker sampling (see above); Mapping located massive pyrite (to 0.7% Zn, 1.2% Pb) outcrops at Henty Valley Prospect. Mapping, minor stream sediment and rock-chip sampling at Henty River Adits; existing drill holes (HR1-5) all found to be blocked preventing proposed DHEM surveys following review of historical EM data. Collection of physical properties data from HR1-5 core.
1991-1992 (Poltock, 1992a, b)	Gridding, geological mapping, soil and rock chip sampling and UTEM at the Henty Valley Prospect; no significant anomalies. Completion of an M.Econ.Geol. thesis on the "Geology of the Henty Fault Wedge, Western Tasmania" (Poltock, 1992b).
1992-1993 (Quayle, 1993)	DDH YHV1 (65.7m) drilled to test geochemically anomalous gossan associated with andesitic lavas at Henty Valley; mapping around massive pyrite outcrops in the Henty River; further lithogeochemical and physical property sampling completed.
1993-1994 (Quayle, 1994)	Massive pyrite outcrops at Henty Valley Prospect; followed-up by 2.3 line km of pole-dipole IP; results indicate mineralisation continues to N and S; recommend drill testing.
1994-1995 (Quayle, 1995)	Drilling of DDH YHV2 (163.5m) at the Henty Valley Prospect to test beneath massive pyrite and an IP anomaly; no significant mineralisation was intersected.
1996-1997 (Hicks, 1997)	Review previous exploration, core samples (HR2) submitted for Pb Isotopes – gave Cambrian "Rosebery" signature, commenced stream sediment survey.
1997-1998 (Richardson, 1998)	Stream sediment survey abandoned; re-open and extend 1992 Pasmenco grid, partial leach and total digest B horizon soil sampling (277 samples); no significant anomalies
1998-2001 (Hespe, 1999; Henry, 2000)	No further fieldwork; brief review of gold potential indicated further sampling/re-assaying was needed but this was not done; partial relinquishment in April 1999 (Hespe, 2000).

Table 1 Previous exploration on EL 7/2001 Henty River

Reporting Period	Work Completed
2001-2002 (McNeill, 2002)	A single 1 km grid line was cut, surveyed with DGPS and B horizon soil sampled (43 samples collected and analysed, including duplicates) as part of a much larger soil survey on the adjacent EL 5/1996 to the north. A significant multi-element anomaly was located on this line and warrants follow-up by infill sampling to the north and south.
2002-2003 (McNeill, 2003)	2.65 km of new grid line was cut, surveyed with DGPS, geologically mapped and B horizon soil sampled (108 samples, including duplicates, collected and analysed) to follow-up an anomaly on line 5357800mN. 32 previously collected soil samples were re-assayed. Interpretation of the data indicates that there is no significant anomaly in the area sampled and no further work was recommended.

6. WORK COMPLETED 2003-2004 REPORTING PERIOD

No fieldwork was completed during the reporting period.

7. ENVIRONMENT AND REHABILITATION

Planned work in the Henty Gorge area will involve access along sections of the Howard's Road that are heavily infested with Gorse. To prevent the spread of this infestation along the Henty Gorge Track a spraying program was commenced in December 2003, spraying was completed by P&C vegetation control, with funding from Zinifex, Henty Gold Mine, Hydro Tasmania and Greening Australia. Further follow-up spraying will be completed in late 2004 prior to the commencement of exploration in the Henty Gorge area. Additionally, if required, spot spraying will be completed along the Henty Gorge Track to control any Gorse that has spread from Howard's Road.

8. CONCLUSIONS & RECOMMENDATIONS

Due to resource constraints no exploration fieldwork was completed during the third year of the licence, although some work on weed control to facilitate access to the Henty Gorge area was initiated. It is recommended that in the fourth year:

- The 1985 EM-37 ground EM survey be assessed for effectiveness and the presence of any subtle, e.g. current channelling, targets (it is likely that this was done by Aberfoyle, but it is not recorded in any detail in any of their reports).
- The 1997 Aberfoyle grid be re-opened and extended (approximately 16.2 line km of gridding) and surveying with ground EM, and partial leach soil sampling to cover the prospective Henty Adits Sequence, be completed.

9. EXPENDITURE

Expenditure on EL 7/2001 during the 12 month period ending 30th June 2004 was **\$5,529**. A detailed breakdown of this expenditure is presented below.

Personnel	\$1,117
Travel & Accommodation	\$0
Consultants & Contractors	\$919
Geological Consultants	\$0
Geochemical Consultants & Assays	\$0
Geophysical Surveys & Contractors	\$0
Drilling	\$0
Stores & Supplies	\$345
Vehicles Plant & Equipment	\$0
Land	\$825
Computing	\$2,323
Office	\$0
Administration Fee	\$0
Total Tenement Expenditure	\$5,529

10. KEYWORDS & LOCALITY

Keywords

Henty River Prospect, White Spur, geology.

Locality

1:250,000 QUEENSTOWN SK55-5
1:100,000 SOPHIA 8014; PIEMAN 7914
1:25,000 OCEANA 3635

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