97-4017 (R)

259001

LYNCH MINING PTY. LTD.

CONFIDENTIAL

MICROFILMED
FICHE No. 014327-

PRELIMINARY DEVELOPMENT PROPOSAL

MINERAL RESOURCES
RL8807 P2
17 JUL
Surfolio 11

AMG REFERENCE POINTS ADDED

97-4017

PRELIMINARY DEVELOPMENT PROPOSAL
MT BISCHOFF - RL8807
LYNCH MINING

MT. BISCHOFF PROJECT

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MT. BISCHOFF PROJECT

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MT. BISCHOFF PROJECT

1. INTRODUCTION

Lynch Mining Pty Ltd has acquired an option to purchase the Mt. Bischoff Tenements (refer 2.) from Metals Exploration Limited and its partners.

This preliminary document deals in brief with the environmental background of the Mt Bischoff site, including the scope of the proposed Base Line Study, the resource base and a summary of the draft mine design as it affects the major environmental considerations.

Possible site designs are discussed and the options available are presented and assessed in relation to the final site decommissioning.

The heritage value of the site is considered and an outline of proposals is stated.

The liability the company will be exposed to in the development of this site with regard to the environmental requirements is a major concern and must be thoroughly investigated before the site is developed.

2. TENEMENTS

Retention Licence	8807
Area:	5 sq.km.
Expiry Date:	14.10.94
Mining Lease	ML 43M/77
Area:	8 Ha.

3. LOCATION

Mt Bischoff is within 2km of the township of Waratah in North West Tasmania. The project area is approximately 50km SSW of Burnie. Mt. Bischoff is in the Waratah River drainage which is a tributary of the Arthur River.

4. EXISTING ENVIRONMENTAL BACKGROUND

Mining at Mt. Bischoff has a long history commencing soon after its discovery by "Philosopher" James Smith and continuing almost uninterrupted until 1947. The last operator of the mine at any sizeable scale was the Commonwealth Government who ran the mine from 1942 to 1947. The mine had produced 7.45 million tonnes of ore up until 1931 and almost all of that ore was concentrated on the Waratah River below the falls.

A marked affect on the environment would be expected from an historic operation of this scale, given the mining & concentrating techniques of the time.

Mt. Bischoff mine site has approximately 35 ha of disturbed area on the southern side of the Mt. Bischoff escarpment. This assessment does not account for any downstream acid mine drainage (AMD), nor does it account for any remnant disturbance near the concentrator plants closer to the township of Waratah. The disturbed area assessed is indicated on Attachment I.

Brief Environment Summary

Based only on one brief site visit and a study of data and aerial photography.

A. **Top Soil** - Almost devoid in the study area except for isolated pockets.

B. **Vegetation** - This area is mapped as wet scterophyll forest however where mining has occurred as indicated in Attachment I it is virtually devoid of vegetation except for isolated pockets.

4. EXISTING ENVIRONMENTAL BACKGROUND (cont'd)

C. **Land Form** - The disturbed area appears virtually as mined and the resultant landform is highly subject to erosion causing local stream turbidity during high rainfall periods and stream sedimentation.

D. **AMD** - One site visit has confirmed a considerable AMD problem which has not as yet been quantified.

E. **Conclusion** - The biological diversity of the study area is extremely depleted. This is the combined result of AMD, lack of topsoil and the current landform.

Any Base Line Study used to assess the current status of the area would need to include:

i) The extent of the AMD problem and isolate the "hot spots" within the system.

ii) Survey the existing landform. (This data may already be available or available in part).

iii) Both downstream and upstream water quality surveys.

iv) Determination of NAPP (Nett Acid Producing Potential) of proposed waste and ore.

v) Determination of ANC (Acid Neutralising Capacity) of the in situ dolomite and other on site resources.

vi) Vegetation survey (to include any present noxious weeds)

5. PRELIMINARY MINING PROPOSAL

A draft mine design is currently being finalised which is summarised in the following table:

	Proposed Pit		
Total Pit	m^3		tonnes
Total Volume	757,220		2,249,459
Ore	140,588		492,057
Waste	616,632		1,757,402
Overburden			
Waste	93,020	- Dolomite	-
		- Sub Ore (Sulphide)	-
Ore	8,571		30,000

Ore Stock piles

Approximate area required 0.5 ha.

Issues for consideration:

1. Operation of ore stock pile with regard to possible AMD-drainage design
2. Placement of dolomite and its ANC characteristics (is it a resource?) (marketable or a rehabilitation tool?)
3. Disposal of sub ore and mine waste
4. Pit decommissioning - permanent water storage?

There will be no treatment of ore on site at Mt Bischoff. This proposal assumes ore will be hauled by road to Zeehan for concentration by Rennison Limited.

The expected life of this operation is 4 years with further Porphyry resources yet to be assessed.

6. REHABILITATION OPTIONS

Until the Base Line Study and the preliminary mine design are finalised it will not be possible to complete a site design and rehabilitation design which will qualify projected final environmental parameters and possible post mining land use.

However at this early stage we can identify several possibilities which now require further investigation.

WASTE

Option I

Investigate the possibility of sealing the old "Glory Pit" (Brown Face) and utilising this to dispose of (or store) waste (or sub grade ore). Much of the waste may be a resource (<0.8% Sn). Permanent flooding of this pit should then solve much of the potential and some of the past AMD problem. With a positive annual precipitation of approximately 1.0 metres for the area and some water harvesting this would be more than possible.

Option II

As in I except instead of flooding the pit cap the sulphide with dolomite if ANC shows it to be suitable.

Option III

Impervious encapsulation of sulphide waste or sub ore on a prepared site.

6. **REHABILITATION OPTIONS** (cont'd)

PIT

Flood

ORE STOCK/PILE

During operation

Drain site to collection area or to flood an existing pit?

Decommission

Dolomite cap

OTHER EXPOSED SULPHIDE

Can the AMD potential of this be reduced?

Exclusion of oxygen by flooding of acid generating sources and potential acid generating sources may be an effective and economic method of controlling AMD but requires further investigation.

7. ARCHAEOLOGICAL ASSESSMENT

In consideration of the large mining history of Mt. Bischoff and its important role in the development of NW Tasmania both for mining and other industries, the historic value of the area cannot be overlooked and the impact of any mining must be considered and carefully assessed.

Lynch Mining Pty Ltd will examine the available information and assess and discuss the impact of mining and the means of minimising any impact on the archaeological history of Mt. Bischoff.

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8. ENVIRONMENTAL LIABILITY

The environmental liability will depend largely on the size and position of any proposed Mining Lease. The Lease will not be any larger than is necessary to successfully run the proposed operation.

The application for an Operating Licence will define the extent of any possible improvement in the pre existing environmental conditions.

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MT. BISCHOFF PROJECT

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Attachment 1

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AMG REFERENCE POINTS ADDED

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