84-1322 -

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1984 ASSESSMENT REPORT

on the

FAIR, FAIR 3, 4, 5, 6, and 7 CLAIMS

(Geology, Geochemistry, and Geophysics)

Atlin Mining District

N.T.S. 114 P/11

Latitude 59°42'

Longitude 137°10'

By: Wayne Reid

November, 1984.

For: Noranda Exploration Company, Limited
(No Personal Liability)

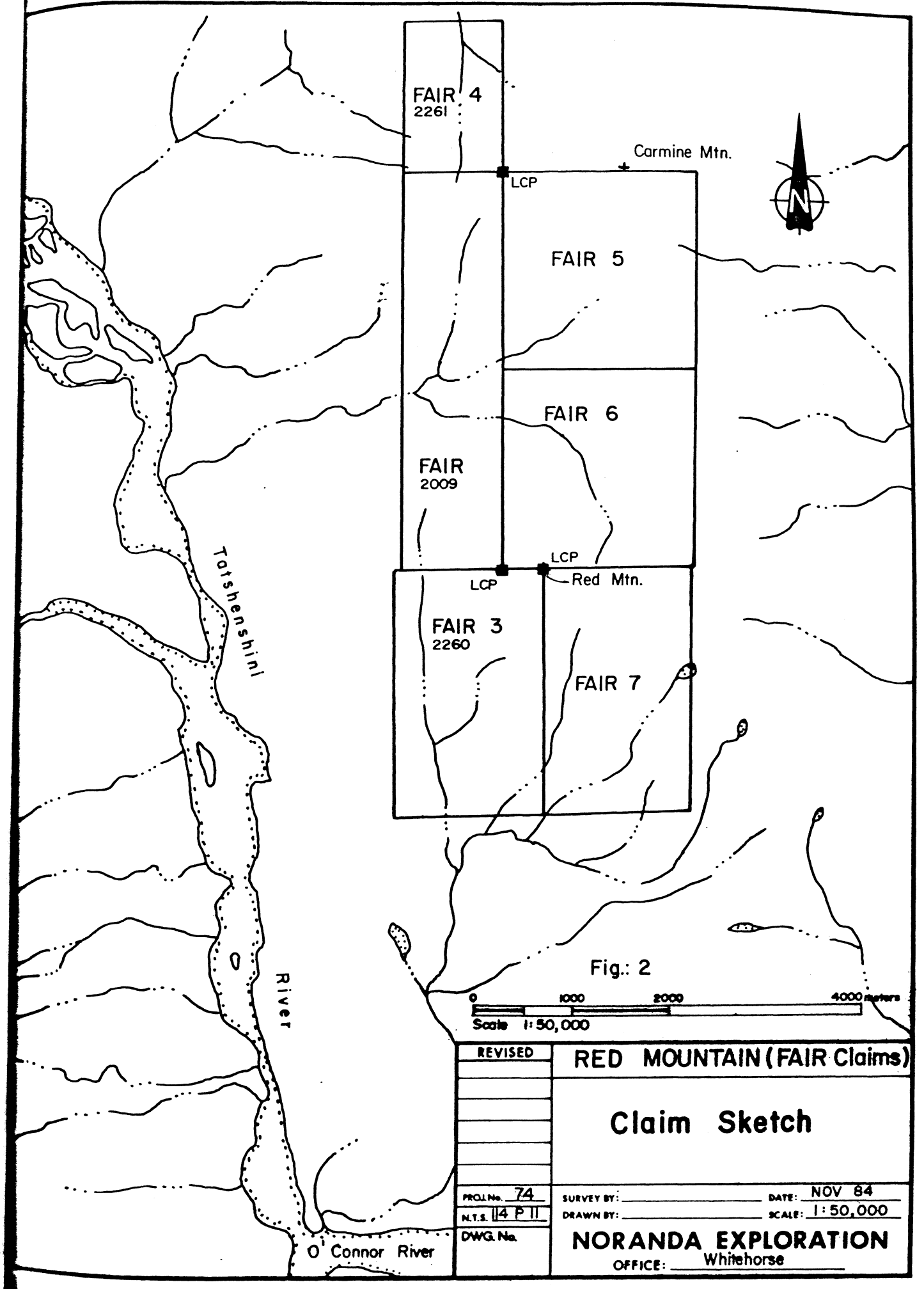

Fig.: 2

REVISED	RED MOUNTAIN (FAIR Claims)
	Claim Sketch
PROJ. No. 74	SURVEY BY: _____ DATE: NOV 84
N.T.S. 114 P 11	DRAWN BY: _____ SCALE: 1:50,000
DWG. No.	NORANDA EXPLORATION
	OFFICE: Whitehorse

I-C: Claim Status

Initially 16 units were staked in August, 1983, to cover the silt anomalies. This claim was called the FAIR claim and was issued Record No. 2009 in September, 1983. Additional staking took place in March, 1984 with FAIR 2, 3, and 4 containing 2, 15, and 6 claims respectively. In late August, 1984 another 3 claims were staked containing a total of 47 units. FAIR 2 was abandoned and restaked at this time.

The following is a list of claims held by Noranda at the time of this writing.

TABLE 1: CLAIM STATUS

Claim Name	No. of Units	Record Number	Date of Record	Owner
FAIR	16	2009	Sept. 16, 1983	Noranda Exploration Company, Ltd. (No Personal Liablity)
FAIR-3	15	2260	March 28, 1984	Noranda Exploration Compnay, Ltd. (No Personal Liability)
FAIR-4	6	2261	March 28, 1984	Noranda Exploration Company, Ltd. (No Personal Liability)
FAIR-5	16	Tag No. 73665	September 1984	Noranda Exploration Company, Ltd. (No Personal Liability)
FAIR-6	16	Tag No. 73666	September 1984	Noranda Exploration Company, Ltd. (No Personal Liability)
FAIR-7	15	Tag No. 73667	September 1984	Noranda Exploration Company, Ltd. (No Personal Liability)

I-D: Previous Work

The only previous work of any detail known to have been done in the area is on the east side of Red Mountain. Claims were staked here off and on since the 1960's when a subhorizontal shear zone containing quartz, sphalerite, galena, and pyrrhotite was discovered outcropping on the east facing cliff. The mineralization proved to be discontinuous and narrow.

JOE showing

The area was mapped by Campbell and Dodds as part of the G.S.C.'s, "Operation Saint Elias", in 1978.

Noranda carried out a regional stream sampling survey throughout the area in 1983. Several strong Pb-As silt anomalies were defined draining the west side of Red Mountain, and this led to the staking of the FAIR claims.

I-E: Work Program

Initial work on the FAIR claims was a recce soil grid using claim lines for control and a sample interval of 50 metres. This work was done in August, 1983 after the claims were staked.

During July and August, 1984, two grids were established to cover the north and south ends of the recce grid. (See Figure 3 for grid location map.)

Soil sampling, prospecting, and geological mapping were done on all lines with the results plotted on 1:2,500 scale base maps.

Genie H.L.E.M. and Proton Magnetometer surveys were performed mainly on the south part of the South Grid.

Once results of these surveys were received, additional staking was done and two flycamps were set up, one on each grid. This work consisted of detailed sampling and geological mapping.

Table 2 lists the number of units for each survey.

Table 2: Total Work Units on FAIR Claims

Survey	Units
Linecutting	23.4 km
Soils	1005 samples
Rocks	98 samples
Genie H.L.E.M.	5.65 km
Magnetometer	7.925 km

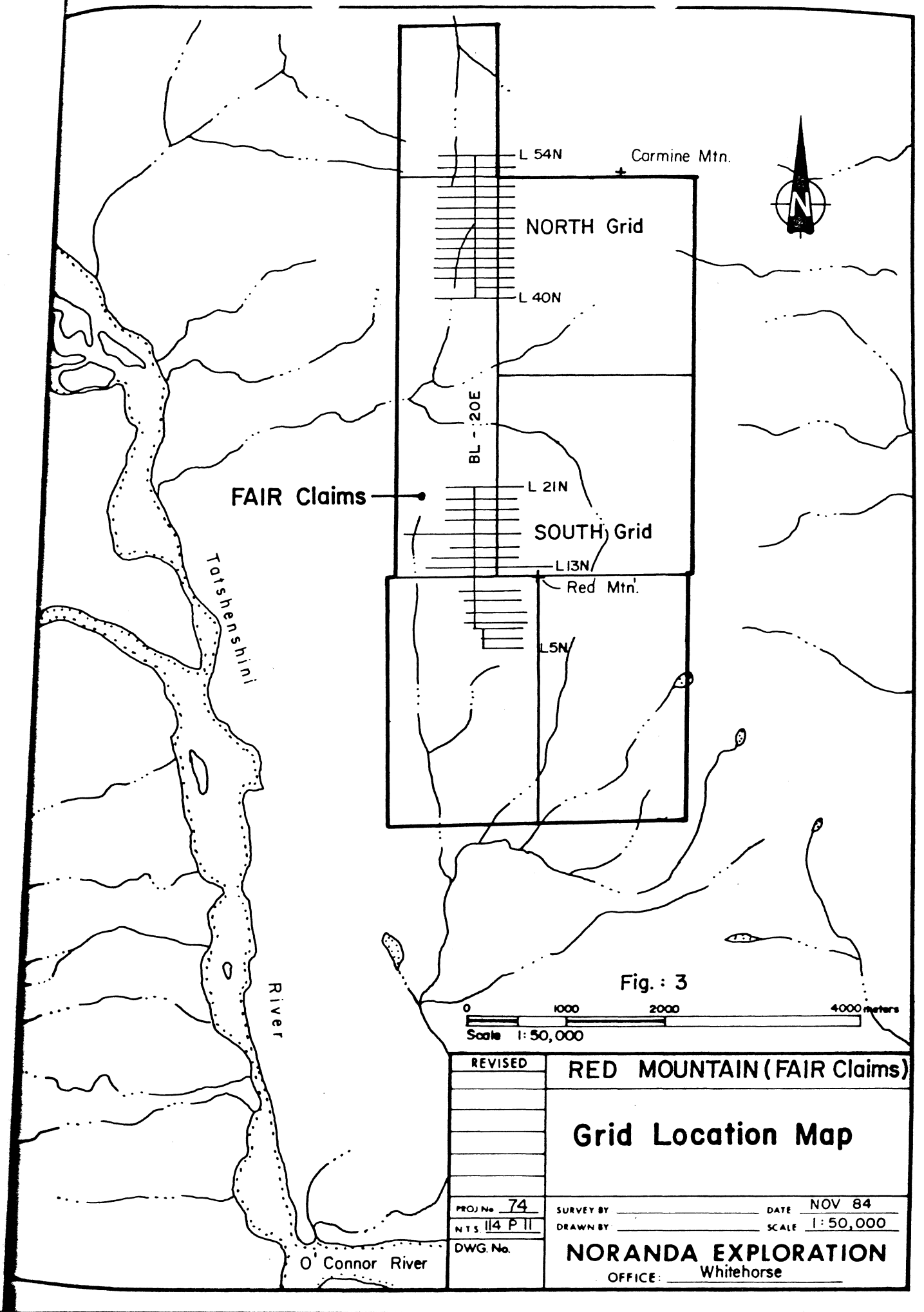

Fig. : 3

REVISED	RED MOUNTAIN (FAIR Claims)
	Grid Location Map
PROJ No 74	SURVEY BY _____ DATE NOV 84
NTS 114 P 11	DRAWN BY _____ SCALE 1:50,000
DWG. No.	NORANDA EXPLORATION
	OFFICE: Whitehorse

II-C: Geology

The general geology underlying the FAIR claims consist of "Kuskawulsh Group" limestones and fine grained clastic rocks. These are overlain (unconformably or structurally?) by a younger group of volcanics and associated intrusive rocks. A feldspar (hornblende) porphyry dyke system cuts both groups (Figures 10 and 11).

The "Kaskawulsh Group" is an informal name proposed by Campbell and Dodds (1979) for an extensive group of Paleozoic sedimentary and volcanic rocks between the Art Lewis fault to the southwest and the Duke River-Denali Fault System to the northeast. In the claim area, these rocks consist of grey fine grained and white crystalline limestone (Unit 2). The carbonates are interbedded with grey cherty argillites (Unit 3) and minor quartzites (Unit 1). Numerous thin veins and dykelets of fine grained siliceous material cut these rocks. The group is open to moderately folded, however, the structure has not been well mapped out. Detailed mapping on the northwest quadrant of the North Grid indicates a series of crosscutting faults have disected the Paleozoic lithologies. Mapping on the other parts of the grids was done at a rather brisk pace to keep up with the soil sampling.

Unconformably overlying or in tectonic contact with the Paleozoic carbonates is a package of submarine volcanics and associated intrusives. These form the prominant topographic feature in the area, Red Mountain, and were mapped only on the east side of the South Grid.

The volcanics are bimodal, consisting of pillowed andesites (Unit 5) and a massive to fragmental dacite (Unit 4). The pillowed volcanics form a fairly continuous 10 to 15 metre wide unit with dacite on either side. A thin argillite (Unit 5A) marks the contacts of the individual flows. The argillites contain disseminated and streaky pyrite (± pyrrhotite), are laminated, and are thought to be exhalitive in origin. Although generally less than 15 cm wide at the pillowed volcanic contact, thicknesses up to 2 metres are seen in two localities at different stratigraphic position.

The contact with the underlying carbonates is covered by a steep blocky talus slope, however, it is exposed on L-8+00N, 23+00E. Here the contact has been masked by a sericite-tremolite-biotite-pyrrhotite alteration zone. The pervasive alteration occupies an irregular area at the contact. Some blocks of limestone are incorporated in it and as the alteration is approached the limestone is altered to dolomite. Overlying this is a rhyolite breccia and fine grained layered tuff (possible flow banding). The breccia matrix is a fine grained siliceous biotite altered material.

Within the underlying limestone, near the contact, fine grained siliceous dykes appear to be feeders to the volcanics or the alteration.

Diabase (Unit 6) within the volcanics are comagmatic and contacts are extremely hard to see in the field. On top of Red Mountain, the "diabase" has a weak columnar jointing (Unit 8) and may be younger than the underlying volcanics.

Cutting all rock types, except the columnar jointed diabase, are a series of sub-parallel feldspar to hornblende-feldspar porphyry dykes (Unit 7). The dykes range in thickness from less than 1 metre to almost 100 metres. The main central dyke is the widest. It is steeply dipping, strikes north-south and outcrops on both grids.

Limited thin section work (12 sections) and whole rock analysis (8 samples) were done on the volcanic and related intrusive rocks (Table 3).

Thin Sections

See Appendix C for a full description by Vancouver Petrographics. The felsic volcanics are described as dacitic tuffs, flows, and breccias. They have a moderately intense pervasive alteration in the fine grained rocks and in the matrix to the fragmentals. Alteration consists of sericite-biotite and tremolite with secondary quartz stringers.

The basic volcanics and "intrusives" are characterized by a mass of plagioclase with pyroxenes being altered to tremolite and minor chlorite. The pillowed andesite has been sericitized and clay altered, however, no mafic silicates were recognized.

Where seen, the mineralization occurs in small patchy zones near or at the contact with the hornblende feldspar porphyry dykes.

All soil anomalies followed up on the North Grid proved to be caused by limited skarn mineralization. Minor skarn has been seen in the carbonates on the South Grid, however, follow-up of the soil results was not done in this area.

Within the volcanics, disseminated arsenopyrite and pyrite occur especially around thin sub-horizontal shear zones. One main shear zone can be traced for up to 1 kilometre and like the Joe showing has limited base metal sulphides. Arsenopyrite-quartz mineralization is associated with this zone.

The soil anomaly down slope is caused by this mineralization.

Appendix E lists the various rock chip, grab, and float samples analyzed from the FAIR claims.

III: SUMMARY and RECOMMENDATIONS

A total of 84 claim units comprise the FAIR Group, located on Red Mountain, 30 kilometres west of the Haines Road in Northern B.C. The claims were staked prior to following up anomalous silt results obtained in 1983. Subsequent geological mapping, prospecting, soil sampling, and geophysics have outlined a number of targets. These targets include:

a) Paleozoic carbonate hosted base metal-Ag skarn mineralization associated with intermediate dykes.

b) Fe-sulphide rich argillite units within a bimodal submarine volcanic sequence. A moderately strong 700 metre long conductor is probably related to this.

c) Base metal-arsenopyrite rich sections of sub-horizontal shear zones. These are similar to the Joe showing on the east side of Red Mountain.

Further work on these claims should include both target testing and additional work outside the existing grid areas to define other targets. The following work plan is recommended:

1. Drill test the 700 metre long H.L.E.M. conductor, both in the magnetic centre, and on the south end.

2. Drill test the best part of the main shear zone from the top of Red Mountain.

3. Induced polarization should be done in the northwest quadrant of the North Grid, followed by trenching.

4. Extend grid coverage to the south and east of the South Grid to cover the extension of the volcanics.

5. Regional geology, prospecting, and geochemistry should be done throughout the claims to completely evaluate their potential.