

091429

ASSESSMENT REPORT
ICE CLAIMS
TRENCHING; ICE 40 (YA 42462)

MAYO MINING DISTRICT

NTS 105 0/11

LATITUDE: 63°36'N
LONGITUDE: 131°17'W

JULY 22 to AUGUST 19, 1982



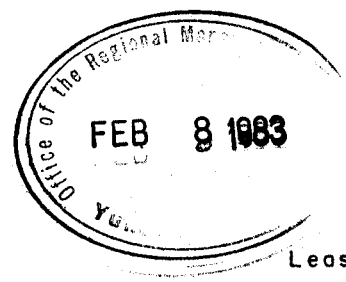
By: T. Garagan

January, 1983

FROM: Mining Recorder at Mapo

TO: Supervising Mining Recorder at Whitehorse, Y.T.

FOR ACTION ARE:



NEW APPL'N for PLACER LEASE to PROSPECT: Name: _____

Lease No.

RENEWAL APPL'N PLACER LEASE to PROSPECT: Name: _____

Lease No.

AFFIDAVIT of EXPENDITURE on PLACER LEASE. Name: _____

ASSIGNMENT of PLACER LEASE No.

From: _____ To: _____

GROUPING APPL'N UNDER SEC. 52(2) PLACER MINING ACT.

Owner: _____

~~DIAMOND DRILL LOGS~~
TREASURING PROGRAMME

Claims: **ICE # 40**

Claim sheet no:
105-0-11

QUARTZ ASSESSMENT REPORT:

Claims: _____

Claim sheet no. _____

Type of report: _____

Submitted by: _____

ALIP CANADA LTD.

Cls. work performed on: _____

\$ Req. for ren. application

Signature

REPLY ACTION:

Date Ret. _____

CC GEOLOGY

091429

Signature

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1. INTRODUCTION

1.1 General Statement

This report describes the work carried out on the ICE 40 claims (YA 42462) from July 22nd to August 19th, 1982. The work consisted of blasting two trenches, followed by mapping and sampling of the excavated areas. Trenching was carried out by 2 blasters, assisted by one climber, all contracted from Bema Industries of Langley, B.C. Supervision, mapping and sampling were by personnel of Agip Canada Ltd. Crews were set out by helicopter from a base camp at Emerald Lake. The helicopter was a Hughes 500 D on contract from Canwest Aviation, Okotoks, Alberta. A Terr-Air Hughes 500 D helicopter was used for two and one-half days while the contract helicopter was undergoing maintenance.

1.2 Location, Access and Physiography

The ICE and FIRE claims are located in the Mayo Mining District (claim sheet 105 0/11), latitude 63°36'N and longitude 131°21'W (Figure 1). The location of the claims with respect to local topographic features is shown in Figure 1 (topography from claim map 105 0/11). The claim group is situated in the central part of the Rogue Range (Hess Mountains).

Access to the Emerald lake area is by float-equipped aircraft from Ross River (190 kilometers to the southwest) or by helicopter from the MacMillan Pass airstrip (65 kilometers to the southeast). During the summer months, supplies can be trucked from Ross River to MacMillan Pass via the North Canol Road and regularly scheduled aircraft service the Whitehorse-Ross River-MacMillan Pass route.

The Emerald Lake camp, at an altitude of 1050 meters, is the lowest point near the claim group. To the northwest,

relief increases greatly, particularly within the area of the Emerald lake syenite intrusion. The highest peak in the main massif reaches 2400 meters elevation; ridges and valleys lead off this peak in all directions. Ridges are sharp, with many pinnacles and towers, and separate a series of cirques with high cliffs and small alpine-type glaciers. Valleys are typically broad, U-shaped, glacial features with steep walls. At lower elevations there are extensive areas of coarse active talus, and lateral and terminal moraines; snowfields are common on north-facing slopes. Vegetation is present only at lower elevations in the main valleys of the claim group below approximately 1500 meters.

2. WORK PROGRAM

2.1 General Statement

During the 1981 field season, chip sampling carried out on a partially exposed veined dyke system in the northwestern part of the intrusion located several anomalous base and precious metal zones. Two trenches were blasted across this zone during the 1982 field season to expose the full width of the zone and to permit systematic sampling.

2.2 Geology and Trench Dimensions

Trenches #5 and #6 are both located in the ICE 40 claim (YA 42462). Trench #5 is 12 meters long, 1 meter deep and averages 1 meter across with a total volume of 12 cubic meters of rock removed (15.69 cubic yards). Trench #6, located 65 meters south of Trench #5, is 10 meters long, averaging 50 centimeters in depth and 2.5 meters in width. The total volume of the trench is 12.5 cubic meters (16.3 cubic yards) (Figure 2).

The trenches are located across the Mount Soleil Zone, a sub-horizontal vein and dyke system 5 to 7 meters wide and 500 meters long, which is exposed on a cliff on the west side of Mount Soleil, located on the northwest side of the ICE claims. The probable extension of this system, seen on the east side of the ridge, carried only minor amounts of tourmaline, quartz, potash feldspar and pyrrhotite as coatings on the surfaces of flat-lying joints. On the west side, the recessive weathering of the dyke causes a prominent ledge to be formed so that the dyke and veins are largely obscured by talus accumulation. The two trenches were blasted across this zone to expose the vein/dyke system (Figures 3 and 4). The dyke consists of a partially altered (quartz and muscovite), fine-grained quartz monzonite with up to 10-15% disseminated chalcopyrite and pyrrhotite. Several veins and veinlets of chalcopyrite, pyrrhotite, potassium feldspar, quartz, scheelite, pyrite and arsenopyrite cut the dyke. Veins vary from a few millimeters to 10-15 centimeters in thickness and are usually parallel to contacts. The most intense veining occurs near the upper contact of the zone.

The width of the vein/dyke system exposed in Trench #5 is approximately 5.5 meters, whereas in Trench #6, it is approximately 4 meters thick. The average width of the system appears to be 5-6 meters and it pinches out to the south.

2.3 Geochemistry

In both trenches, chip samples were collected at 1 meter intervals perpendicular to the contacts of the dyke. One sample (0140464) was collected along a chalcopyrite vein to determine the precious metal content of the vein. All samples were analysed for gold, silver, tungsten and copper, and results are plotted in Figures 3 and 4. As to be expected, the best results are from the sample taken along

the chalcopyrite vein with 310 ppb gold, 81.6 ppm silver, >2000 ppm W and >20,000 ppm copper. In Trench #5, a sample taken across 1 meter of veined intrusive near the top of the zone contains 100 ppb gold, 27 ppm silver, >2000 ppm W and 16,400 ppm copper. In Trench #6, the top 3 samples average 177 ppb gold, 11.5 ppm silver, 503 ppm W and 4880 ppm copper across 3 meters.

3. DISCUSSION

Mineralization within this flat-lying zone occurs as veins and veinlets of chalcopyrite with minor amounts of arsenopyrite, pyrite and scheelite. In general the veins and veinlets are sub-parallel to the contact with the best mineralization developed at the upper contact. The precious metals appear to be related to the sulphide mineralization, but the values are too low to be worth further follow-up work. The tungsten-copper mineralization is too limited in extent to warrant follow-up work and no further exploration is recommended for this zone.

APPENDIX A

ANALYTICAL METHODS

Rock chip samples are pulverized and a split of the minus 100 mesh fraction is analysed.

Copper and silver are analysed by atomic absorption techniques; for most elements the sample is dissolved in hot aqua regia. Silver analyses require a correction for background. Silver values greater than 4.0 ppm are checked using a nitric acid digestion.

Tungsten analyses are by basic oxidizing fusion followed by a colorimetric determination.

Gold analyses are by fire assay techniques using a 10 g sample, but after preparation of the lead bead, the bead is dissolved in acid and the gold content determined by atomic absorption spectrophotometry.

APPENDIX B
STATEMENT OF COSTS

1. Analytical Costs (Analyses by Bondar-Clegg and Co. Ltd.
Whitehorse and Vancouver)

Trenches #5 and #6

19 rock samples @ \$15.80	\$ 300.20
1 silver assay @ \$6.00	<u>6.00</u>
Total Analytical costs for Trenches #5 and #6	\$ 306.20

2. Helicopter Costs

a) July 23-30, August 5-19 - Hughes 500 D on contract from
Canwest Aviation, Okotoks, Alberta

8.1 hours @ \$450 per hour	\$ 3,645.00
plus fuel at 25 gallons/hour @ \$2.77/gallon	560.92

b) August 3-4 - Hughes 500 D on contract from Terr-Air Rotary
Helicopters, Ross River.

1.1 hours @ \$500 per hour	\$ 550.00
plus fuel at 25 gallons/hour @ \$2.77/gallon	<u>76.17</u>

Total helicopter costs	\$ 4,832.09
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3. Fixed Wing Costs

July 22, Pilatus Porter from Nahanni Air based in Ross River
with mobilization from Whitehorse

\$ 2,342.46

4. Agip Labour Costs

R. Robertson, Senior Geologist, .5 days @ \$170/day	\$ 85.00
T. Garagan, Project Geologist, field 1 day @ \$110/day	110.00
T. Garagan, Project Geologist, office 1.5 days @ \$100/day	150.00
R. Hulstein, Senior Assistant, 2 days @ \$95/day	<u>190.00</u>
Total Agip Labour Costs	\$ 535.00

5. Contract Labour and Equipment Costs

Mountaineer on contract from Bema Industries of Langley, B.C.

2 days @ \$200/day \$ 400.00

Blasters: Two blasters on contract from Bema Industries of Langley, B.C.

a) 10 days @ \$440/day 4,400.00

b) 4 bad weather days @ \$330/day 1,320.00

Equipment rental (drill, etc.)

14 days @ \$75/day 1,050.00

Climbing equipment

1 day @ \$50/day 50.00

Total Contract costs \$ 7,220.00

6. Explosives

Purchased from Yukon Explosives, Whitehorse

Total Costs \$ 1,024.14

7. Food Costs

Estimated at #20/manday (including share of cook's wages) for
33.5 mandays \$ 670.00

Total Costs of Physical Work for assessment
purposes \$16,929.89

APPENDIX C

STATEMENT OF QUALIFICATIONS

I, THOMAS GARAGAN, of the City of Calgary, in the Province of Alberta, hereby certify:

That I am a geologist employed by Agip Canada Ltd. and that I caused to be performed the work described in this report.

That I obtained a Bachelor of Science degree with Honours in Geology from the University of Ottawa, Ontario in 1980.

That I have been engaged in mineral exploration and geological survey mapping on a full and part-time basis for six years of which three have been on mineral exploration programs in the Yukon Territory.

That I am an associate member of the Geological Association of Canada and the Mineralogical Association of Canada.

Signed at Calgary, Alberta, this 20 day of January, A.D., 1983.



THOMAS GARAGAN

