A GEOLOGICAL AND GEOCHEMICAL REPORT

ON THE HOT CLAIM GROUP

Dawson and Mayo Mining Districts

Yukon Territory

N.T.S. 116-A-13

Latitude: 64°59' N

Longitude: 137°46' W

By:

L. McLennan

CYPRUS ANVIL MINING CORPORATION

November, 1975

Office of the Superintending Mining Engineer
DEC 22 1975
WHITEHORSE
Yukon Territory

This report has been examined by the Geological Evaluation Unit and is recommended to the Commissioner to be considered as representation work in the amount of $ 2400.00

D B Craig

Resident Geologist or
Resident Mining Engineer

Considered as representation work under Section 53 (4) Yukon Quartz Mining Act.

for Commissioner of Yukon Territory

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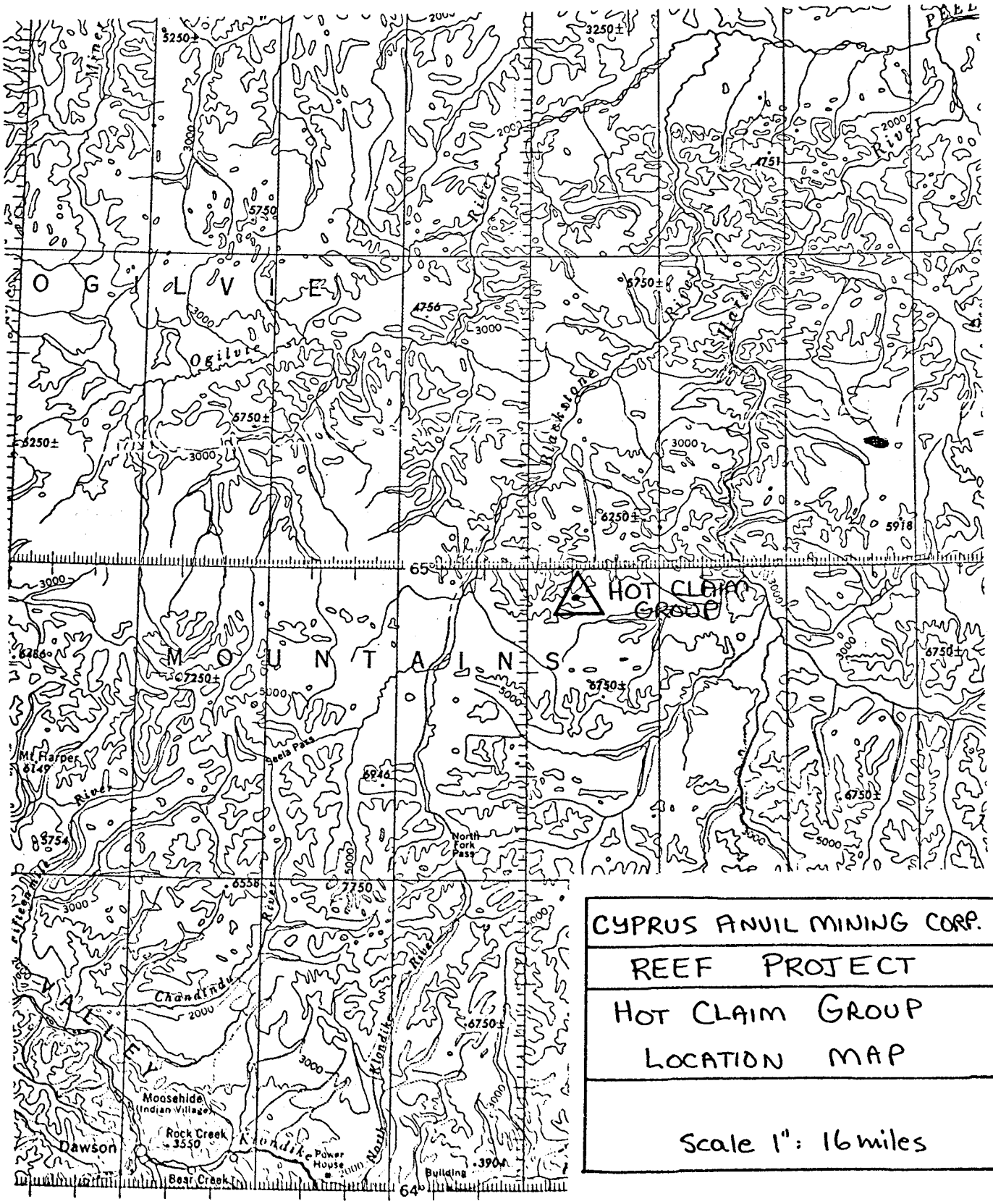
Figure 1



CYPRUS ANVIL MINING CORP.
REEF PROJECT
HOT CLAIM GROUP LOCATION MAP
Scale 1": 16 miles

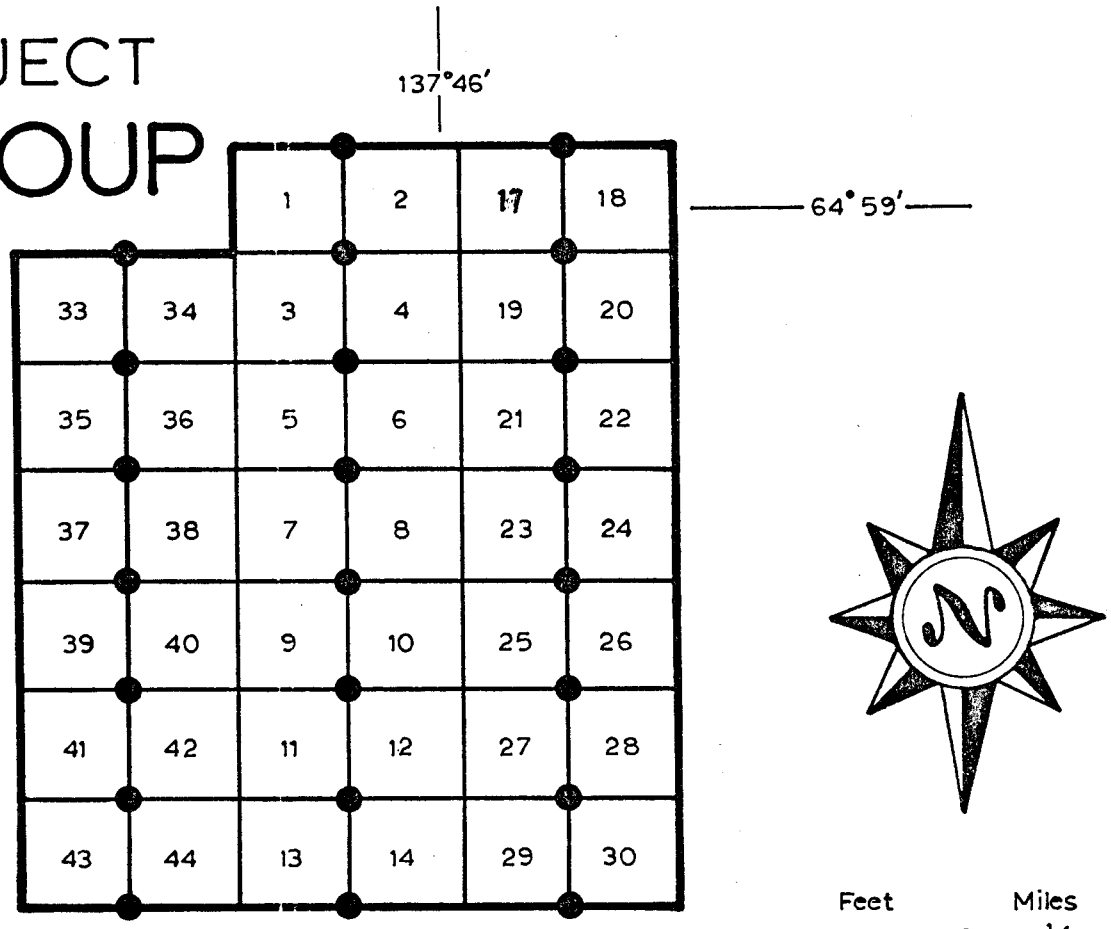
LIST OF CLAIMS

Claims	Grant Nos.	Recording Dates
DAWSON M.D.		
HOT 1 - 8	Y82879 - Y82886	July 12, 1974
17 - 20	Y82893 - Y82896	July 12, 1974
33 - 44	Y82907 - Y82918	July 12, 1974
MAYO M.D.		
HOT 9 - 14	Y97498 - Y97503	July 12, 1974
21 - 30	Y97504 - Y97513	July 12, 1974

DYNASTY EXPLORATIONS LTD.

REEF PROJECT

HOT GROUP



LEGEND

- claim outline
- claim post
- claim line , name

116A - 13

FIG. 2

Cyprus Anvil Mining Corporation

330, 355 Burrard Street
Vancouver, British Columbia
V6C 2G8
Telephone (604) 687-2586

Telex 04508594

A GEOLOGICAL AND GEOCHEMICAL REPORT ON THE HOT CLAIM GROUP

INTRODUCTION

The Hot claim group was staked in June of 1974 to cover lead and zinc silt geochemical anomalies discovered earlier in the season. Subsequent work in 1974 included preliminary geological mapping, prospecting and hand trenching. Results from this work warranted further investigation of the property for the 1975 field season. Work in the 1975 season consisted of detailed contour sampling, mapping and trenching.

The Hot group is located near longitude 137°46' W and latitude 64°59' N, approximately five miles north of Michelle Creek in the central Ogilvie Range of west-central Yukon. Access to the property is by helicopter, with vehicle support from the Dempster Highway, 13.5 miles to the west.

SUMMARY AND CONCLUSIONS

Two mineral zones occur on the Hot claim group. One, situated in the northern half of the claim group, extends more or less continuously from east to west for 6,000 feet. The control for this mineralization seems to be a fault zone. The float from this zone shows the tectonic brecciation which might be expected from a fault zone.

Several small anomalous zones occur on the southern half of the claim

... 2

group. These appear to occur at the same bedding horizon but there is no continuity between them.

Trenching in the main north showing indicates a mineralized thickness of about 10 to 15 feet, but assays across this width are below economic grade.

The geologic mapping and hand trenching on the Hot claims has indicated that the best and most continuous mineralized zone on the claims is related to a zone of faulting, and the mineralization is therefore likely to be narrow in width and erratic in grade. No more work is recommended for the claim group.

GEOLOGY

Regional Geology (from G.S.C. Mem. 364, 1972 and accompanying Map 1283A, Larsen Creek, Y.T., 1972)

The central Ogilvie Ranges consist of intensely folded, thinly bedded Proterozoic argillites, shales and quartzites of Unit 1, unconformably overlain by essentially undeformed, thick bedded, Unit 8 limestones and dolomites of Ordovician and Silurian age.

Property Geology (Figure 3)

Both Units 1 and 8 are present on the property. Unit 1 covers the northern edge of the claim area and is easily distinguished from Unit 8 by its characteristic buff weathering color. Unit 8 comprises the vast majority of the claim area. All the lead-zinc mineralization is contained within this unit. Bedding orientations indicate that the structure of Unit 8 is dominated by an east-west trending fold series with perhaps a minor north-east - south-west trending fold.

... 3

TABLE OF GEOLOGICAL FORMATIONS

Age	Formation	Description
Ordovician	Unit 8	Grey, massive bedded limestone and dolomite.
	- - - - Unconformable Contact - - - -	
Proterozoic	Unit 1	Thin bedded, orange to buff weathering argillites, shales and quartzites.

Mineralization

The primary mineralization consists of galena and sphalerite, with some minor pyrite. Most showings, however, are highly oxidized, and the most common ore mineral found on the claims is smithsonite.

A zone of brecciated, mineralized float extends about 6,000 feet more or less continuously in an east-westerly direction in the northern portion of the claim area. The linear trend of this mineralized zone, coupled with the brecciated nature of the mineralization, suggests that a fault zone is probably the main control for the majority of the mineralization. It is possible that a low-grade, bedded mineralized zone exists within Unit 8, that could have acted as the source for the high-grade mineralization in the fault zone, but no low-grade sedimentary-style mineralization was seen on the claims.

Geochemistry and prospecting have also located several anomalous lead-zinc areas in the southern half of the claim area. These anomalous areas approximately follow the strike of bedding, supporting the possibility that bedding may control some of the mineralization on the claims.

On the southwest corner of the claim area, there is a showing of massive, dark oxide mineralization which may be related to folding or faulting. A geochemical anomaly, high in both lead and zinc, occurs in the valley directly below this outcrop. Small drag folds with axial planes paralleling the plane of the mineralized material and the lack of varying bedding attitudes, suggest that faulting, rather than folding, is the main control for this particular occurrence.

... 4

Joints paralleling the main mineralized zone are filled with smithsonite or other oxide mineralization.

In this same area, smithsonite occurs on fractures within Unit 8 dolomite. This mineralization may have resulted from the remobilization of primary mineralization controlled by bedding. The various mineral showings on the southern portion of the claims appear to be isolated occurrences. Geochemical values drop off sharply between the anomalies and most anomalies extend only over a few hundred feet.

GEOCHEMISTRY (Figure 4 and Figure 5)

A total of 286 soil and silt samples were taken on the Hot claim group during the 1975 field season. These were taken from two contour lines done around the base of the mountains and halfway up the mountains. All samples were analysed geochemically by Acme Analytical Laboratories Ltd., Dawson City, Y.T. Anomalous values for lead and zinc are contoured on two separate maps (Maps Nos. 1 and 2). All anomalous zones are contained within or downslope from soils overlying Unit 8.

TRENCHES

Two trenches were extended and one new trench was dug. Assay results from these may be seen in Table 1. The trenches are all located on the northern high-grade showing (see Figure 3).

Trench	Description
No. 1	15' long, extending north-south across zone - rock is a very brecciated dolomite with some visible galena and pyrite - outcrop is overlain by a highly gossanous material one to two feet thick with residual

... 5

Trench	Description
	unoxidized galena and sphalerite blebs. The trench ended in frozen ground.
No. 2	25' long, across bedding in a generally north-south direction. The outcrop exposed is a calcareous dolomite with disseminated pyrite. Fractures in the rock have been filled in with limonitic gossan material, including secondary lead and zinc mineralization.
No. 3	12' long, across the mineralized zone. The trench exposed a bed of solid galena about 1.5' wide at the contact of a calcite-rich dolomite within a brecciated, highly oxidized smithsonite zone. The trench ended in frozen ground.

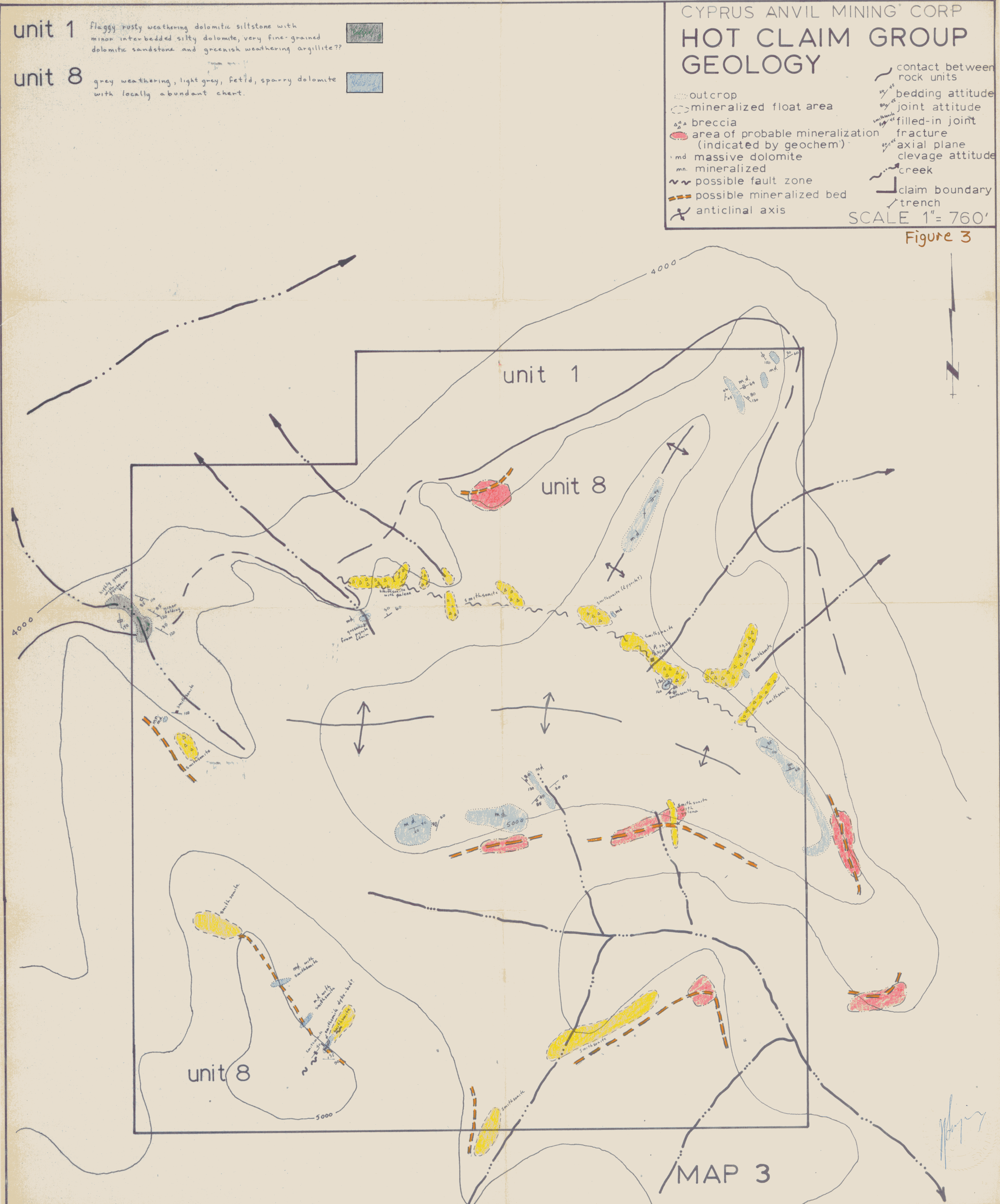
TABLE 1

Assay No.	Ag Oz/Ton	Pb % ~~Oz/Ton~~	Zn % ~~Oz/Ton~~	Cu % ~~Oz/Ton~~	Description
4377	0.12	0.17	1.18	-	Length of Trench 1 - 15 feet.
4378	0.12	0.19	1.18	0.01	Length of Trench 1 - 15 feet.
4379	0.06	0.13	0.52	-	Length of Trench 2 - 35 feet.
4380	1.76	3.98	7.32	-	Length of Trench 3 - 12 feet.

All assays were done by Whitehorse Assay Office Ltd., Box 4518, Whitehorse, Y.T.

Respectfully submitted,

L. McLENNAN


unit 1
flaggy rusty weathering dolomitic siltstone with minor interbedded silty dolomite, very fine-grained dolomitic sandstone and greenish weathering argillite??
unit 8
grey weathering, light grey, fetid, sparry dolomite with locally abundant chert.
CYPRUS ANVIL MINING CORP
HOT CLAIM GROUP
GEOLOGY
outcrop
mineralized float area
breccia
area of probable mineralization (indicated by geochem)
md massive dolomite
mn. mineralized
possible fault zone
possible mineralized bed
anticlinal axis
contact between rock units
bedding attitude
joint attitude
filled-in joint fracture
axial plane clevage attitude
creek
claim boundary
trench
SCALE 1"= 760'
Figure 3
4000
unit 1
unit 8
highly gossaned with pyrite stain
minor folding
smithsonite with galena
smithsonite
md
gossaned from pyrite stain
smithsonite (& pyrite?)
5000
Smithsonite with galena
md. with smithsonite
smithsonite dyke-bed?
unit 8
MAP 3

CYPRUS ANVIL MINING CORP

HOT CLAIM GROUP LEAD GEOCHEM CONTOURS

• SAMPLE SITE

10,150,500 RESULTS (ppm) FOR Cu, Pb, Zn

RIVER

150 150 ppm Pb

500 500 ppm Pb

1000 1000 ppm Pb

2500 2500 ppm Pb

5000 5000 ppm Pb

10000 10000 ppm Pb

SCALE 1"= 760'

Figure 4

MAP 1

CYPRUS ANVIL MINING CORP

HOT CLAIM GROUP ZINC GEOCHEM CONTOURS

10,150,500 assay results (ppm) Cu, Pb, Zn

500 ppm Zn

1000 ppm Zn

2500 ppm Zn

5000 ppm Zn

creek

claim outline

SCALE 1"= 760'

Figure 5

MAP 2