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GEOPHYSICAL REPORT ON THE MAY 2 9 1996

PAW CLAIMS

OMINECA MINING DIVISION, B.C.

093F/3W

BY

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GEOPHYSICAL REPORT ON THE PAW CLAIMS OMINECA MINING DIVISION, B.C.

SUMMARY

This report summarizes exploration work which took place on the PAW claims from November 17 to 21, 1995. The PAW claims comprise 83 modified grid units and 5 two-post claims for a total The claims were staked at or near the terminus of of 88 units. glacially transported anomalous multi-element till geochemical samples as reported by the Geological Survey Branch of the Ministry of Energy, Mines and Petroleum Resources of B.C. Work took place on the PAW 1 and PAW 2 claims, and consisted of magnetometer qeophysical surveying. The survey was designed to collect ground magnetic data from an area of magnetic low response as outlined in regional government airborne surveys. The results of the ground survey suggests that an area of relative magnetically low response underlies areas of the PAW 1 and PAW 2 claims. These magnetically low areas correspond to areas of low relief (bogs) suggesting that the magnetic low may be related to bedrock alterations within porphyry style mineralization seen on the PAW claims.

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GEOPHYSICAL REPORT ON THE PAW CLAIMS OMINECA MINING DIVISION, B.C.

1.0 INTRODUCTION

The PAW claims were initially staked in July 1992, following a brief prospecting survey of the area by Perry Grunenberg. The original claim, PAW 1, was staked to cover two sulphide mineralized roadcut outcroppings thought to be porphyry related. Additional claims were later staked based on new regional till geochemistry, lake sediment and water geochemistry sample releases from the Ministry of Energy, Mines and Petroleum Resources. A regional airborne magnetometer survey was also completed by the Geological Survey of Canada as part of a NATMAP project detailing this area of the Interior Plateau. This report summarizes a follow-up ground magnetometer survey carried out in November 1995.

1.1 LOCATION AND ACCESS

The property is located in central British Columbia on the Nechako Plateau near the Entiako Spur at 53°09' N, 125°21' W (NTS 093F/3W, Omineca Mining Division). The property lies near the current terminus of the Kluskus-Malaput Forest Service Road (between kilometres 19 and 25). The claims cover an area of 22 square kilometres over south facing slopes north of Fawnie Creek, and northeast of Johnny Lake. The general location of the claims is shown on Figure 1, and a claim map is presented as Figure 2.

Access to the claims is provided by all weather gravel road from Vanderhoof. Travel south following the Kluskus Forest Service Road to the Kluskus logging camp at kilometre 99.5, then west on the Kluskus-Ootsa road to kilometre 142, then further west on the Kluskus-Malaput road to kilometre 19. The east boundary of the claims is located near this point.

1.2 TOPOGRAPHY, CLIMATE AND PHYSIOGRAPHY

The claims are in the physiographic division known as the Nechako Plateau which is a subdivision of the Interior Plateau. Topography is dominated by the Fawnie and Nechako mountain ranges which reach maximum elevations of 1852 metres at Mount Davidson, and 1781 metres at Kuyakuz Mountain. The Entiako Spur is an east west trending area of hills of roughly 1500 metres elevation which passes near the north end of the PAW claims. Physiographic regimes range from subalpine areas near mountain peaks to flat laying bogs



at lower elevations along major and minor drainages. Several larger east west elongate lakes are present near the claims (Johnny, Cow, Moose and Laidman Lakes), with dimensions up to 9 kilometres length and 1 kilometre width, and elevations around 1000 metres. Smaller lakes are contained along drainages into Fawnie, Mathews and Van Tine creeks.

Tree cover is extensive and consists mostly of lodgepole pine, which is well spaced and movement through forested areas is easy. The forests have been partially infested by mountain pine beetle and tracts of standing dead pines are visible. To control the infestation, parts of the region are currently being logged. Areas of clear-cut logging, with the associated road networks, provides easy access to and around the claim block. Areas of boggy grassland occur around some lakes and flat drainages. These grasslands are in places used for cattle grazing.

The climate in this portion of interior British Columbia is generally warm and dry with a moderately long, cold winter. Frost may occur at any time; however, day time temperatures in excess of 10° C are normal from early May until mid to late October. Temperatures in excess of 25° C are common during the summer months, while winter lows below -40° C are rare. The greatest accumulation of moisture occurs during the fall, winter and early spring mostly in the form of snow. The remainder of the year is generally dry. Moisture in the form of rainfall is confined to afternoon showers during the warmer months.

1.3 PROPERTY STATUS

The property is composed of 5 modified grid claims consisting of 83 units, and five 2-post claims, for a total of 88 units (Figure 2). All of these claims were staked in 1994. The claims, record numbers, size and anniversary dates are listed in Table I.

TABLE I

CLAIM NAME	#UNITS	RECORD #	ANNIVERSARY DATE
PAW 1	16	323440	FEBRUARY 2
PAW 2	12	326407	JUNE 4
PAW 3	20	326430	JUNE 6
PAW 4	15	326431	JUNE 7
PAW 5	20	326432	JUNE 7
PAW 8	1	326424	JUNE 10
PAW 10	1	326425	JUNE 10
PAW 11	1	326426	JUNE 10
PAW 12	1	326427	JUNE 10
PAW 13	1	326428	JUNE 10



1.4 HISTORY AND PREVIOUS EXPLORATION

The area has seen sporadic exploration over the years as has most of the Interior Plateau. This is partly due to surface restrictions such as thick glacial overburden, and until recently, limited road access. Regional surveys were conducted through the area by several companies during the late 1960's and early 70's in search of copper and molybdenum porphyry systems. This exploration led to the discovery of several different deposit types, including the CHU porphyry Cu-Au prospect explored by Placer Dome Inc. (minfile 93F001), the NED porphyry Cu-Mo prospect worked by Granges Inc. (minfile 93F039), the Blackwater-Davidson (PEM) transitional Aq-Au prospect currently being explored by Granges Inc. (minfile 93F037), and the WOLF epithermal Au-Ag deposit (minfile 93F045) explored by Metall Mining Corporation under option from Lucero Resource Corporation. Interest in the area has recently been renewed with the completion of regional till, lake sediment and water geochemical surveys, and geological surveys by the Geological Survey Branch of the Ministry of Energy, Mines, and Petroleum Resources (open files 1994-18,19 and paper 1993-1), and regional airborne geophysical surveys completed by the Geological Survey of Canada (open file #2785).

1.5 WORK COMPLETED ON THE CLAIMS IN 1995

Magnetometer surveying was carried out on the PAW 1 and 2 claims between November 17 and 21, 1995. This survey was designed to cover an area of swampy ground, south of previous magnetic surveys carried out during 1994. The winter survey was required in order to cross these swamps while frozen. Snow conditions at the time of the survey hampered the quantity of line work completed. A total of 2 kilometres of magnetic survey was completed on the property.

2.0 GEOLOGY

2.1 REGIONAL GEOLOGY

The geology of the Fawnie Creek map area (93F/3) has recently been compiled at a 1:50,000 scale by the Geological Survey Branch of the Ministry of Energy Mines and Petroleum Resources (Larry Daikow et al, open file 1994-2). In general, the region has similarities to the Basin and Range structural province in Nevada (extensional block faulting), and also has a similar structural style of the Babine area to the northwest (Schroeter and Lane).

The oldest rocks mapped in the area belong to the middle Jurassic Hazelton Group, locally called Naglico Formation. These rocks are composed of volcanic derived sandstone, siltstone, and conglomerates, basalt and andesite flows, and andesite, dacite, and rhyolitic tuffs. The Hazelton Group is characterized by open folding with dips up to 45 degrees. The Hazelton Group rocks are overlain by Eocene Ootsa Lake rocks. These rocks are composed of andesitic, dacitic and rhyolitic flows and lapilli tuffs which overlay a basal conglomerate. In the vicinity of the PAW claims Ootsa Lake Group rocks unconformably overlay the Jurassic Hazelton Group rocks.

The youngest rocks mapped in the area are represented by the Miocene and Pliocene Chilcotin Group basalt flows. These rocks are mostly confined to the southern areas of the 93F/3 sheet south of Johnny Lake. Mafic dykes mapped on the PAW claim may be feeders to the Chilcotin volcanic flows.

Intrusive rocks in the area are composed of Middle Cretaceous augite porphyry plugs, dikes and sills, Late Cretaceous to Tertiary quartz monzonites and granodiorites (Capoose Batholith), quartz porphyry dikes and plugs, quartz diorite, and felsic sills and dikes.

Rocks of the Interior Plateau are characterized by low grade regional metamorphism. Contact metamorphism around plutons is often pronounced leading to thermally altered zones within Naglico Formation rocks.

3.0 GEOPHYSICAL SURVEY

3.1 MAGNETOMETER SURVEY PROCEDURE

A Geometrics G816 Proton Magnetometer was utilized to carry out magnetometer surveys on the Paw claims. The G816 magnetometer is designed for precise mapping of very small or large amplitude anomalies. Total field measurements can be read with a resolution of 1 gamma throughout the instrument's measuring range. In order to correct for diurnal and day to day variations caused by outside influences (eg. solar flares), a base station reading was taken at the start and end of each survey day. Data was not corrected for variations, as variations caused by outside influences were negligible during completion of the survey.

A total of 2 line kilometres of magnetometer survey was completed on the property over 2 parallel lines run in a northsouth orientation, with a line separation of 400 metres. The previous ground survey (1994 PAW assessment) grid coordinate system was continued to the south, with lines being labelled L0+00 (corresponding to the previous baseline) and L4+00E. Both lines were surveyed from 22+00S to 32+00S. Readings were taken at 25 metre intervals along these lines.

3.2 MAGNETOMETER SURVEY RESULTS AND DISCUSSION

Results of magnetometer surveying is shown on Figure 3. This data shows a gradual gradient decrease towards the south of the PAW claims. This trend is open to the south and east. Magnetic responses over the surveyed lines ranged from a high of 57,199

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gammas to a low of 56,731 gammas for a total relative change of 468 gammas.

L0+00 fairly consistent magnetic responses shows (approximately 57,100 gammas) for its northern 800 metres, except for a zone of about 100 gammas lower around 25+00 to 26+00S. The southern 200 metres of L0+00 gives a sharper decline in magnetic responses with the reading at station 32+00S being 56,859 gammas. L4+00S gives gradually declining magnetic responses for the northern 150 metres (from 57,055 gammas to 56,967 gammas), then levels out around 56,900 gammas from station 23+50S to station 30+50S where a second decline in magnetic responses, to 56,731 gammas, occurs at the southernmost end of the line.

These areas of low magnetic values correlate to areas of low elevation (i.e. bogs), which may represent areas of strongly altered bedrock. The porphyry style mineralization visible elsewhere on the PAW claims indicates that the highly altered core zone for the mineralization may lie to the south, where the lowered magnetic values were obtained.

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T IN GAMMAS	P & L GEOLOGICAL SERVICES
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56,000 gammas = 0 \int_{920}^{900}	OMINECA MINING DIVISION NTS: 93F/3W
- 920	PAW 1 & 2 CLAIMS
SCALE 1: 5,000 <u>1</u> 859	MAGNETOMETER SURVEY MAP
	BY: L.D.
	DATE: APRIL 1996 FIGURE: 3

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4.0 CONCLUSIONS AND GENERAL DISCUSSION

The PAW claims were staked to cover source regions for anomalous till multi-element geochemical results as reported by Ministry of Energy, Mines and Petroleum Resources. Fracture controlled and disseminated sulphide mineralization was discovered along a road access to the claims. This mineralization, containing molybdenite and chalcopyrite, is hosted within medium grained granodiorite, and has a porphyry style appearance at this location. In 1994, a work program was designed to further explore the mineral potential of this system. One of the conclusions from the 1994 work is that much of the potential of the property lies in areas not yet covered by exploration, in areas partly covered by thick glacial overburden and swamp.

The 1995 magnetometer survey extended the 1994 grid for one kilometre to the south across low lying, swampy ground. Results of this survey correspond well to the Geological Survey of Canada's regional airborne survey results which show a zone of lower magnetic responses to the south. It is believed that this area of lower magnetic responses may represent the altered core of the porphyry mineralization seen elsewhere on the PAW property. More detailed magnetic surveys, combined with I.P. surveys are recommended to fully explore this area.

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5.0 REFERENCES

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RESUME

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PROFESSIONAL: Fellowship, Geological Association of Canada, 1987 Membership, Association of Professional Engineers and Geoscientists of B.C., 1992, REG #19246

EXPERIENCE (SHORT SUMMARY)

MAY 1990 - PRESENT;	P AND L GEOLOGICAL SERVICES: Consulting to the mineral industry, Smithers Exploration Group, and Ministry of EMPR.	
FEB — MAY 1990;	CHENI GOLD MINES: Mine Geologist Lawyers Mine, Toodoggone	
MAY 1984 - JUNE 1989;	HUGHES LANG EXPLORATION: Project Geologist Yukon (Dawson), and various BC locations	
FEB - AUG 1983;	STRATO GEOLOGICAL ENG.: Project Geologist Nevada, Washington, Southern BC	
APR - AUG 1982;	P AND L GEOLOGICAL SERVICES: Project Geologist, Tulameen and Barkerville placer projects	
MAY - DEC 1981;	MARK MANAGEMENT LTD: Assistant to Project Geologist, Quesnel Trough	
MAY 1978 - AUG 1980;	Summer Student employment; 2 seasons with RIOCANEX, and 1 season with KENNCO EXPL.	

7.0 QUALIFICATIONS

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B.Sc. in Geology, University of British Columbia, 1981

PROFESSIONAL:

Fellowship, Geological Association of Canada, 1987

Membership, Association of Professional Engineers and Geoscientists of B.C., 1992

EXPERIENCE:

NOV 1989 - PRESENT; P AND L GEOLOGICAL SERVICES: Consulting and Contracting to the mineral industry and government in all aspects of mineral exploration, reclamation, and education

- MAY 1984 NOV 1989; HUGHES LANG EXPLORATION: Project Geologist involved in all aspects of mineral and placer exploration throughout BC, Yukon and USA locations
- **APR AUG 1982;** P AND L GEOLOGICAL SERVICES: Project Geologist, Tulameen and Barkerville placer projects

MAY - DEC 1981MARK MANAGEMENT LTD: Geologist, Quesnel TroughSEPT - DEC 1982and Atlin, B.C., and Dawson City, YukonMAY 1983 - APR 1984

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7.0 COST STATEMENT

GEOLOGIST 4 mandays @ \$300	\$ 1200
ASSISTANT 4 mandays @ \$150	600
VEHICLE 4X4 TRUCK 4 days @ \$50	200
992 kilometres @ \$.30	300
fuel	125
ACCOMMODATION - TRAILER 4 days @ \$25	100
propane	35
FOOD 8 mandays @ \$35	280
EQUIPMENT RENTAL - MAGNETOMETER 4 days @ \$30	120
SUPPLIES (thread, flagging)	50
REPORT PREPARATION 1 manday @ \$300	300
TOTAL EVDENCES	\$ 2210
	\$ 3310