BC Geological Survey Assessment Report 31976

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(Owners & Operators)

TECHNICAL ASSESSMENT REPORT

(Event 4777271 & 4831536)

on a

PROSPECTING PROGRAM

Work done on

Tenures 555365 & 555370

of the 2 Claim

Wel 555365 Claim Group

Similkameen Mining Division

BCGS Map 092H.038

Centre of Work 5470600N, 652200E

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INTRODUCTION

At the request Mr. L. R. Sostad the writer prepared this prospecting report on the Wel 555365 Claim Group. The results of the work on which this report is based, which included the prospecting of portions of the two claims of the Wel 555365 Claim Group and the trenching of three prospective locations, were supplied to the writer by Mr. L. R. Sostad.

Additional information for this report was obtained from sources as cited under Selected References and from personal reports the writer has written on mineral properties located in the general area.

SUMMARY

The Wel 555365 property is comprised of two contiguous grid claims for a total area of 715.12 hectares located 30 kilometres west-southwest of Princeton, an historic mining centre in south-western British Columbia, Canada. The Property is also located 13 kilometres west of the former productive Similco and Ingerbelle mines, which is currently being readied for production as a super pit enveloping three former open pits. The mineral deposits are associated with the Nicola Volcanics, the Copper Mountain stock, and other minor intrusives. The mineral deposits also occur at the intersection of regional fault systems.

The Wel 555365 property is situated within a batholith of Late Jurassic tonalite rocks which on the ground covered by the Property are locally reported as a biotite granodiorite, variations thereof with late stage differentiates which include pegmatites, aplites, microgranites, and monzonites. Previous exploration work completed over various areas of the Property resulted in the delineation of several copper and/or molybdenite geochemical anomalies which were related to known mineral showings include molybdenite grains up to 5mm occurring with pyrite and chalcopyrite in a 30 cm wide quartz vein.

A mineral zone on the Ash mineral claim is reportedly over 500 metres long, with mineralization hosted by irregular masses of milky white quartz and muscovite up to 24 metres wide with mineral values up to 3% molybdenite and averaging about 0.50 %. On the Wel mineral claim a zone of copper-molybdenum mineralization 1000 metres long and 550 metres wide reportedly hosts numerous quartz veins mineralized with pyrite, chalcopyrite, and sporadic molybdenite. A sample from a quartz vein reportedly returned 0.89% copper and 0.0245% molybdenum.

The 2010 prospecting program which covered a southern portion of the two claims resulted in the discovery of numerous areas of propylitic and argillic alteration with commonly associated limonite and variably altered pyrite. Three localized zones of moderate to heavy limonitic alteration associated with shear zones up to one metre wide hosting quartz veins and/or a stockwork of quartz veins were trenched.

Although the quartz veins were variably limonitic, there was neither evidence of contained pyrite nor any mineralization. As a result, samples were not taken.

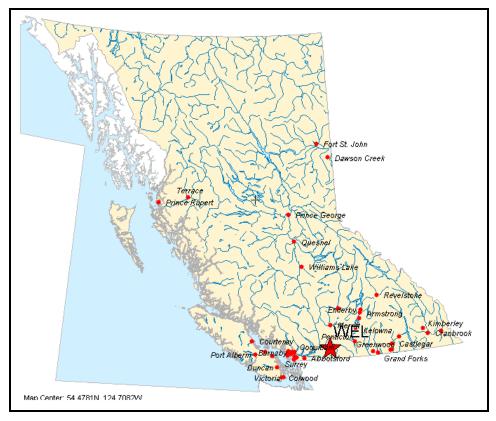


Figure 1. Location Map

PROPERTY DESCRIPTION, LOCATION & ACCESS

The property consists of two contiguous claims covering an area of 715.1235 hectares. Particulars are as follows:

Tenure Number	<u>Type</u>	Claim Name	Good Until	Area (ha)
<u>555365</u>	Mineral	WEL	20120501	336.5448
<u>555370</u>	Mineral	ASH 2	20120501	378.5787

Total Area: 715.1235 ha

The property is located 150 kilometres east of Vancouver, 22 kilometres east of Hope, 30 kilometres west-southwest of Princeton, and two kilometres northeast of the Tulameen River in south-western British Columbia, Canada. The Property is within BCGS 092H.038 with the centre of the work program on the Property at 5470600N 652200E (WGS 84).

The property is accessible from Princeton, B.C. southward via the paved Hope-Princeton Highway for 11 kilometres to a forestry road branching to the southwest at Whipsaw Creek. The forestry road is taken south-westward for 12 kilometres, westward for seven kilometres, and north-westward for 12 kilometres for a total distance of 31 kilometres to the eastern boundary and the to the centre of the Wel mineral claim. An alternate access is westward from Princeton to Tulameen thence southward via a paved and gravelled road to the western boundary of the Ash mineral claim. The road extends through the southern portion of the claim to the area of the Wel Minfile location.

WEL 555365
CLAIM GROUP

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Figure 2. Claim Location

PHYSIOGRAPHY, CLIMATE, AND VEGETATION

The property is located about 13 kilometres northeast of the Hozameen Range of the Cascade Mountains. The property area is one of gentle mountainous slopes with moderate sloped valleys. Elevations range from high central and southern south-westward trending ridges with elevations of up to 1685 metres to lower elevations within south-westward trending valleys of 1380 metres at the western boundary of the Ash mineral claim.

Water for all phases of the exploration and development program could be available from the many watercourses, or from the alpine lakes within the Wel mineral claim. Water may be at a premium during the colder months.

Temperatures during the summer months could reach a high of 85° F with an average of 40°; the winter temperatures could reach a low of -20° with an average of 15° F. On the property, snow cover on the ground could last for up to eight months and would be a hindrance to a year-round exploration and/or development program.

The Property is 95% forest covered with local clear, logged areas.

INFRASTRUCTURE

Princeton, an historic mining centre, could be a source of experienced and reliable exploration and mining personnel and a supply for most mining related equipment. Princeton and Hope have non-commercial airports that could be used to fulfill the immediate requirements for an active exploration and/or development program on the property. Otherwise, commercial airline services are provided at Penticton, some 80 kilometres distant.

Vancouver, a port city on the southwest corner of, and the largest city, in the Province of British Columbia, is 150 kilometres west of the property and less than one hour by air from Penticton.

WATER AND POWER

Sufficient water for all phases of the exploration program could be available from the many creeks and alpine lakes that are located within the confines of the property. Electrical power may be available from a high voltage transmission line that is within twenty miles east of the property.

Diesel-electrical power would be required in the initial stages of development and production.

HISTORY: AREA

The history on some of the most significant mineral reported past producers peripheral to the Wel 555365 Claim Group are the former Ingerbelle and Copper Mountain mining operations which are now designated as the Similco. The Similco resource is to be developed as one major open-pit which incorporates the former Ingerbelle and the Copper Mountain open-pits. The following is the history of the mining operations.

SIMILCO past producer (Porphyry, Hydrothermal) MINFILE 092HSE001 Thirteen kilometres east

Development by Granby Consolidated Mining, Smelting and Power Company Ltd. during the 1950's and by Newmont Mining Corporation of Canada during 1968-69, outlined two areas of economic grade mineralization centred on Pit 1 and Pit 2.

Most of the ore from the Copper Mountain mine came from glory hole and underground mining, but also included production from several open pits mined from 1952 to 1957. The mine closed in 1957. From 1959 through 1962 the mine was leased and small amounts of ore shipped.

In 1977-1978 the Ingerbelle mine (092HSE004) and Copper Mountain mine consolidated operations (the Ingerbelle open pit and mill are across the Similkameen River, west of the Copper Mountain mine). Production from the Ingerbelle orebody commenced in 1972 and mining in the Ingerbelle pit was completed in August 1981. With the installation of an ore conveyor across the Similkameen River canyon, the delivery of Copper Mountain ore from Pit 2 to the Ingerbelle mill began on a limited scale in October 1980, but full production was not implemented until September 1981 after the Ingerbelle orebody was depleted. The mining operation is currently called the Similco mine.

In 1995, with support from the Explore B.C. Program, Similco Mines Ltd. completed a modest program of geophysical survey and trenching on the P-4 zone located immediately east of Wolf Creek. This program, consisting of 9.82 kilometres of ground IP, 45 rock samples and 344 metres of excavations in 14 trenches, was designed to ground test airborne geophysical anomalies from earlier surveys. Results were disappointing in that IP anomalies were found to be due to 1-3 per cent disseminated pyrite in mildly propylitically altered Nicola volcanics. No trace was found of potassic or albitic alteration, or of Lost Horse intrusions, commonly associated with economic copper mineralization (Explore B.C. Program 95/96 - A100).

In June 1996 copper prices took a sudden and unpredictable fall as a result of events involving trading irregularities on world markets. This, coupled with the inability of Similco to obtain attractive forward prices for its 1997 production and significant capital investment required to commence mining operations on the Copper Mountain side, resulted in the decision to proceed with an orderly shutdown and to place the operation on a care and maintenance basis. Similco ceased mining operations on November 8, 1996 and milling of residual ore was completed by November 12, 1996. Production compared favourably with 1995 in spite of the shutdown. The operation went on care and maintenance status on November 15, 1996.

HISTORY: AREA (cont'd)
SIMILCO past producer (cont'd)

Recent targets for exploration are the Oriole (092HSE024), which is 330 metres southeast of Pit 3. The Oriole was mined in 1955 yielding 20,863 tonnes grading 0.8 per cent copper plus 9978 tonnes grading 0.5 per cent copper (George Cross News Letter #18, 1990). Drilling in the Oriole pits defined a vertically dipping linear sulphide zone grading 0.5 per cent copper. Average thickness of the portions drilled is 45 metres with a 182-metre strike length, open to depth (George Cross News Letter #118, 1990). The Oriole zone has been mapped over a 1219 metre length along the Main fault and is up to 304 metres wide.

In the Lost Horse Gulch area, 1200 metres north of Pit 1, recent drilling has indicated that the Alabama (092HSE013) and Virginia (092HSE242) zones are connected. The Virginia deposit contains indicated (probable) reserves of 13.6 million tonnes grading 0.40 per cent copper and 0.21 grams per tonne gold. The Alabama deposit, located 579 metres to the northwest of the Virginia deposit, contains inferred (possible) reserves of 9 million tonnes grading 0.32 per cent copper (George Cross News Letter #212, 1990). Also in the Lost Horse Gulch area, there are the Mill, Voigt and Wolf Creek East zones which carry gold and copper values (George Cross News Letter #148, 1990). In 1999, the Similco operations were mining the Pit 1 and 3 orebodies.

The Copper Mountain Project is currently in a development stage with production proposed from a "super pit" which includes the old open pits 1, 2, & 3. In a 2009 resource report for Copper Mountain Mining Corp., Giroux calculates a measured and indicated resource of 359,560,000 tonnes at a cut-off grade of 0.30% copper

HISTORY: PROPERTY

A chronological history of exploration work on ground covered by the Wel 555365 Claim Group as summarized from assessment reports is as follows:

1971: Hanna Mining Co. under option from Copper Range Exploration Co. Inc. completed localized geochemical surveys over an area within the northeastern portion of the current Ash mineral claim (Tenure 555370). The program was conducted in the vicinity of the large "bull-quartz" occurrences that were trenched by Copper Range Exploration, Inc.

The soil-sampling survey failed to disclose any anomalous zones in which three or more adjacent samples have a copper content greater than 70 P.P.M. (Bullis, 1971: AR 03182).

1974: Canadian Occidental Petroleum Ltd. completed geology, geochemistry and ground magnetometer surveys over ground presently covered by the southeast portion of the Wel mineral claim (Tenure 555365).

The geological results of the survey are reported in the Geology section of this report; the magnetometer survey results were reported (Murray, 1974) as magnetic anomalies did not coincide well with geochemical anomalies except in the cases of Anomalies 1, 3, and 13, nor did they have any particular association with mineral showings except at the pit at L12N-08E; from the geochemical survey, the results defined 16 geochemical anomalies, some Cu and Mo and some only isolated Cu or Mo.

1975: Canadian Occidental Petroleum Ltd. completed a geochemical survey over 22 legacy claims located west and south of Wells Lake and over ground presently covered by the southeast portion of the Wel mineral claim (Tenure 555365).

Macdonald (1975) reports that the soil geochemistry outlined two major coincident anomalies and two contour trends which probably reflect fracture control of vein sets. However, the anomalies are not sufficiently better than those from the 1974 survey which are known to be due to uneconomic vein mineralization, so no further work is recommended.

HISTORY: PROPERTY (cont'd)

1979: Canadian Occidental Petroleum Ltd. under option from Karma Ventures Ltd. completed a work program consisting of line cutting, geological mapping, geochemical soil sampling, a ground magnetometer survey, and induced polarization surveying over areas west and north of Wells Lake and over ground presently covered by the Ash mineral claim (Tenure 555370).

Sawyer, 1979 (AR 7974) reports on the results as follows.

The following conclusions are drawn from the work completed, which is described in brief in the foregoing report.

- (1) Molybdenite and minor copper mineralization occurs in association with quartz veins and quartz intrusions which cut gneissic rocks of the Eagle Granodiorite Complex, in the northwestern part of the Ash Claims Group.
- (2) The most prominent geochemical anomalies are related to the known surface showings, which in places are quite spectacular, and the pattern of these anomalous values, both in copper and in molybdenum, fairly accurately reflect the limited extent of the known showings.
- (3) Other anomalous values in molybdenum in soils have been detected at the extreme northwestern part of the property and beyond the property boundary. This zone of anomalous molybdenum values has not been completely defined and will require further work to establish its limits and significance.
- (4) The source of the anomalous molybdenum in these most northwesterly soils cannot be the known showings on the Ash claims, because of considerations of topography and drainage. The most likely source for these anomalous values is the rocks occupying the higher ridge to the northwest of the property.
- (5) Limited geological observation in the area of these geochemical values suggest an increase in the amount of alteration in the granodiorite gneisses and other rocks and an increase in general sulphide content.
- (6) The magnetic survey was of little use in adding to our knowledge with regard to the mineralization and as an aid to mapping.
- (7) The IP survey results were in one sense disappointing in that the amplitude of the responses obtained was low. However the weak responses obtained are thought to be due to the same type of mineralization that is exposed in the main showings, i. e. predominantly molybdenite mineralization in quartz which, because of its physical characteristics, would not be expected to give a strong response.
- (8) The anomalous zone indicated by the IP survey to the west and northwest of the main showings and geochemically anomalous zones is probably caused by molybdenite mineralization in quartz veins or a quartz vein stockwork and as such may be part of a general porphyry molybdenum system.
- (9) Some further exploration more fully to investigate this possibility is warranted, but is perhaps better carried out by a group whose resources are more oriented towards primary exploration.

HISTORY: PROPERTY (cont'd)

1979: Canadian Natural Resources Ltd. completed a magnetic survey and an I.P. survey on ground presently covered by the Ash mineral claim (Tenure 555370)

Walcott, (1979) reports (AR 4947B) that the magnetic survey did little except suggest the overburden to be generally shallow and that the I.P. survey did outline the presence of two weak anomalous zones.

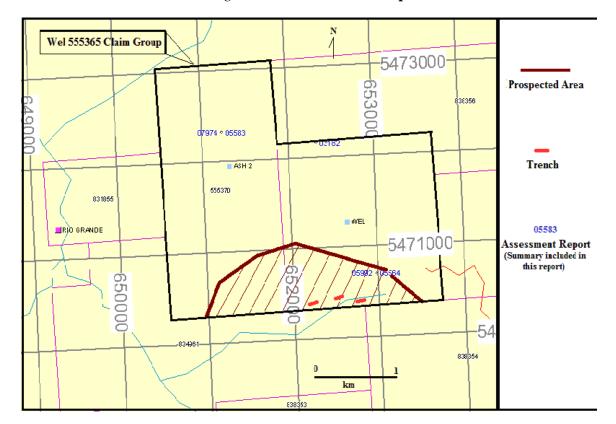


Figure 3. Claim & Index Map

GEOLOGY: PROPERTY & AREA

From a geological map downloaded from MapPlace, the Property is indicated as located within a northwesterly band of Late Jurassic tonalite intrusive rock (LJto). A topographically indicated major structures trend north-northwesterly within one kilometre west, with subordinate structures trending east-northeast and indicated as bounding the northwestern corner and within and adjacent to the southern boundary (Figure 3).

The geology of a portion of the ground covered by the Property is described by Murray, 1974 as, "The most abundant rock on the property is foliated biotite granodiorite with end members ranging from a biotite metasediment to an unfoliated coarse-grained granodiorite. Late stage differentiates include pegmatites, aplites, microgranites, and monzonites. Numerous vein systems align with and cross cut all rock types and are thought to include a post "gneiss-complex" Cu-Mo-Py hydrothermal system. The associated economic minerals are concentrated in a northwesterly band through the southwest part of the property. Pyrite, chalcopyrite and molybdenite occur as disseminations and fracture fillings usually directly associated with quartz veins." (AR5564A).

The geology on some of the more significant mineral *MINFILE* reported showings, prospects, and past producers on the Property and peripheral to the Property are reported as follows. The distance is from the Wel 555365 Claim Group.

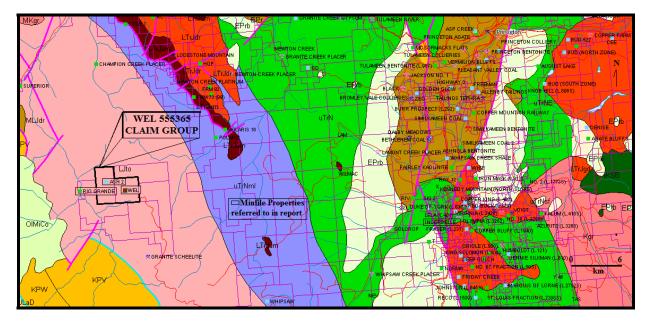


Figure 4. Geological Map

GEOLOGY: PROPERTY & AREA (cont'd)

SIMILCO past producer (Porphyry, Hydrothermal)
MINFILE 092HSE001
Thirteen kilometres east

The regional geological setting is characterized by major north-striking high-angle faults which form an ancient, long-lived rift system that extends from the United States border to at least 160 kilometres north. This system was the locus of a long, narrow marine basin in which Nicola Group rocks were deposited during Triassic time, and it then accommodated basins of continental volcanism and sedimentation in Early Tertiary time. The central part of the Nicola basin is marked by an abundance of high-energy, proximal volcanic rocks and contains a large number of coeval, comagmatic, high-level plutons with several associated copper deposits. A group of such plutons, some of which are differentiated, are known as the Copper Mountain Intrusions.

The copper deposits of the Copper Mountain camp occur chiefly in a northwest-trending belt of Upper Triassic Nicola Group rocks, approximately 1100 metres wide and 4300 metres long, that is bounded on the south by the Copper Mountain stock, on the west by a major normal fault system known as the Boundary fault, and on the north by a complex of dioritic to syenitic porphyries and breccias known as the Lost Horse complex. Copper mineralization diminishes markedly to the east, where the Copper Mountain stock and Lost Horse complex diverge sharply.

The Nicola rocks in the vicinity of Copper Mountain are andesitic to basaltic and are composed predominantly of coarse agglomerate, tuff breccia and tuff, with lesser amounts of massive flow units and some lensy layers of volcanic siltstone. These rocks were previously included with the Wolf Creek Formation (Geological Survey of Canada Memoir 171). The coarse fragmental rocks, which locally contain clasts up to 35 centimetres in diameter, rapidly grade to the southeast and south into massive flows, abundant water lain tuff and some pillow lava.

GEOLOGY: PROPERTY & AREA (cont'd)

SIMILCO (cont'd)

This distribution of coarse fragmental volcanics and their spatial association with the porphyry breccia complex and with the copper deposits indicate that one or more Nicola volcanic centres were localized close to the Lost Horse complex. It also indicates the close relationship between copper mineralization and Nicola magmatism in this camp.

West of the Boundary fault, the Nicola Group consists of intercalated volcanic and sedimentary rocks that include massive and fragmental andesites, tuff and generally well-bedded calcareous shale, siltstone and sandstone.

The Copper Mountain Intrusions include the Copper Mountain, Smelter Lake and Voigt stocks. These plutons form a continuous alkalic-calcic rock series ranging in composition from pyroxenite to perthosite pegmatite and syenite. The Copper Mountain stock is a concentrically differentiated intrusion, elliptical in plan, and approximately 17 square kilometres in area. Its major axis is 10 kilometres long and strikes 300 degrees. The stock is zoned, with diorite at its outer edge grading through monzonite to syenite and perthosite pegmatite at the core. The two smaller satellites, the Smelter Lake and Voigt stocks, show no differentiation, but are similar in composition to the outer phase of the Copper Mountain stock.

The Lost Horse complex is approximately 4300 metres long and 760 to 2400 metres wide, and consists of porphyries and porphyry breccias which range in composition from diorite to syenite, showing widespread but variable albitization, saussuritization and pink feldspar alteration. These porphyries are not a continuous mass, but are a complex of dykes, sills and irregular bodies. Some phases of the complex are mineralized, but others, such as some major dykes, are clearly post-mineral.

Radiometric age dates on the Lost Horse complex, the Smelter Lake and Voigt stocks, and on sulphide-bearing pegmatite veins indicate that the apparent age of these intrusions and of the associated mineralization is Early Jurassic (Bulletin 59, page 43; Canadian Journal of Earth Sciences, Volume 24, page 2533).

Nicola Group rocks near Copper Mountain exhibit secondary mineral assemblages which are characteristic of greenschist facies, or of albite-epidote hornfels. The volcanic rocks have widespread epidote, chlorite, tremolite-actinolite, sericite, carbonate and locally biotite and prehnite. In the immediate vicinity of the Copper Mountain stock, a narrow aureole of contact metamorphism, generally less than 60 metres wide, overprints the above assemblages and is characterized by a widespread development of granoblastic diopsidic pyroxene, green hornblende, brown to reddish biotite, abundant epidote, intermediate plagioclase and some quartz.

In the narrow belt of Nicola rocks, between the Ingerbelle mine (092HSE004) to the west and Copper Mountain, the alteration differs and, where best developed, involves widespread development of biotite, followed by albite-epidote, with subsequent local potash feldspar and/or scapolite metasomatism in both Nicola rocks and Lost Horse intrusions. The feldspar and scapolite metasomatism is characterized by intense veining and is controlled by the presence and intensity of fractures and by the proximity of large bodies of Lost Horse intrusive rocks.

GEOLOGY: PROPERTY & AREA (cont'd)

SIMILCO (cont'd)

The area near Copper Mountain is characterized by brittle deformation which produced a large number of faults and locally, intense fracturing. Very broad, northerly trending folds have been recognized or postulated at widely-spaced localities, but these folds decrease quickly in amplitude and down section. The area is dominated regionally by well-developed, northerly striking, high-angle faults which are best described as forming a rift system. Copper Mountain is dominated by strong easterly and north-westerly faulting. The narrow belt of Nicola rocks between Ingerbelle and Copper Mountain confined between the Copper Mountain stock and the Lost Horse complex, is highly faulted and fractured, but does not appear appreciably folded. The strata are mostly flat-lying or very gently dipping where marker beds exist, and the few areas of steep dips can best be explained as blocks tilted by faulting. Faults in this area have been grouped in order of decreasing relative age of their latest movement into: easterly faults (Gully, Pit), "mine breaks", northwest faults (Main), northeast faults (Tremblay, Honeysuckle) and the Boundary fault. Of these, the Boundary fault is part of the regional rift system; the others appear to be local structures, the genesis and history of which are closely related to the evolution of the Copper Mountain Intrusions (Canadian Institute of Mining and Metallurgy Special Volume 15).

The well-differentiated Copper Mountain stock is thought to have been emplaced at the roots of an active volcanic centre. The various phases of the Lost Horse complex were intruded, with rapid uplift and erosion, as a series of separate injections from a differentiating magma. Their shallower, subvolcanic level of emplacement is indicated by their finer grained porphyritic texture, their highly variable contact relationships, including chilled margins, and the pipes and irregular bodies of breccia. The various characteristics of the orebodies suggest that they formed during the later stages of this magmatism. The Copper Mountain stock was probably not the immediate source of hydrothermal fluids at that time, but it most likely was still a hot mass and could easily have provided a temperature gradient as well as a physical and chemical barrier to the sulphide-bearing fluids which probably came from the same source as the Lost Horse rocks. This hypothesis might explain, at least in part, the crude sulphide zoning noted at the mine, which is characterized by a predominance of bornite and chalcopyrite near the Copper Mountain stock, and by a sharp decrease of bornite and an increase of pyrite toward the Lost Horse complex.

RIO GRANDE showing (Polymetallic Veins)

MINFILE 092HSE075

Two kilometres west of property

A shear zone, 1.5 metres wide, is developed in granodiorite in the western margin of the Eagle Plutonic Complex.

ASH prospect (Magmatic, Hydrothermal, Epigenetic)

MINFILE 092HSE100)

Within property

The showing is hosted in biotite gneiss (gneissic granodiorite) of the Late Jurassic to Early Cretaceous Eagle Plutonic Complex. The complex is locally intruded by northeast-striking andesite and syenite dykes, 0.6 to 3.0 metres wide.

WEL prospect (Porphyry Cu +/- Mo +/- Au)

MINFILE 092HSE136

Within property

This area in the vicinity of Wells Lake is underlain by biotite granodiorite of the Late Jurassic to Early Cretaceous Eagle Plutonic Complex.

MINERALIZATION: PROPERTY & AREA

On ground covered by the southeast portion of the Wel mineral claim Murray, 1974 (AR 5564A) reports that copper and molybdenum mineralization is not extensive but the presence of a post "gneiss-complex" Cu-Mo-Py hydrothermal system does seem promising. Pyrite, the most common sulphide, is most often found on the west half of the property, although there are four occurrences east of Wells Lake. Pyrite is frequently found as small blebs in granodiorite or metasediments and often occurs as small irregular seams, usually less than one millimetre thick in quartz-rich rocks. Vuggy quartz veins in particular commonly have pyrite crystals and blebs. Limonite is present at almost every pyrite occurrence, occasionally completely replacing pyrite grains in granodiorite, metasediments or quartz veins.

Chalcopyrite has a similar mode of occurrence to pyrite although much less frequent. It is the only primary copper mineral and is restricted in occurrence to the southwest quadrant of the WEL property. Strongly associated with quartz and pyrite, chalcopyrite is found as blebs along fracture planes and as disseminations. Malachite is found as a powder, coating irregular fractures and can be seen in some rocks as just a greenish tinge. It is always associated with chalcopyrite. Occurrences of copper are not widespread and usually correspond with trench locations. Molybdenite occurrences are restricted to two areas.

At the lake trench at 28+100'N 08W, molybdenite grains up to 5 rnm. occur with pyrite and chalcopyrite in a quartz vein about 1 foot thick. The second molybdenite occurrence was at L00N within 300 feet east or west of the base line. Here the molybdenite occurred as very fine grains in quartz along with pyrite and chalcopyrite. Numerous mineralized samples were analysed for Cu and Mo. Samples containing quartz veins and chalcopyrite commonly had high Cu values with one sample at the lake trench on 24N reaching 8900 ppm (0.89% Cu). This same sample yielded 245 ppm Mo. Samples with disseminated chalcopyrite not in a quartz vein usually had a few hundred ppm.

The Mo occurrence on L00N had a Mo content of 42 ppm. In some areas, up to 3 different directions of quartz veins are found to intersect each other, with each vein containing varying amounts of chalcopyrite and pyrite. Some selected specimens would have an overall grade of copper reaching 0.5%. Quartz vein association with sulphides is particularly strong south of L32N whereas to the north pyrite is often found near epidote-covered fractures with no quartz veins directly associated.

In general, copper mineralization tends to trend approximately 320° over the property in a band approximately 1800' wide corresponding with the foliation trend and a strong physiographic trend. If this is the case, it is suggested that this band of mineralization might further correspond to regional foliation by dipping steeply to the northeast.

The mineralization on some of the more significant mineral *MINFILE* reported showings, prospects, and past producers on the Property and peripheral to the Property are reported as follows. The distance is from the Wel555365 Claim Group.

SIMILCO past producer (Porphyry, Hydrothermal) MINFILE 092HSE001 Thirteen kilometres east

Development by Granby Consolidated Mining, Smelting and Power Company Ltd. during the 1950's and by Newmont Mining Corporation of Canada during 1968-69, outlined two areas of economic grade mineralization centred on Pit 1 and Pit 2. The Pit 1 (Princess May) orebody lies in a chalcopyrite zone immediately northwest of the underground mine. It is 700 metres long and up to 300 metres wide, with open pit ore extending to a maximum depth of 170 metres. The bulk of the ore was emplaced along the Main fault in massive and fragmental volcanic rocks above the lower bedded tuff horizon. Recognizable pre-ore porphyritic intrusive rocks are scarce. Sulphides occur mainly as fine disseminations of chalcopyrite and pyrite and only rarely as blebs and stringers. Mineralization at the west end of the orebody, between the stock contact and the fault, consists typically of thin fracture coatings of bornite and chalcopyrite in the fine-grained tuff bed. Pits 1 and 7 are developed in this orebody.

The Pit 2 orebody is 900 metres long, 90 to 360 metres wide and appears to have a maximum mineable depth of 170 metres. It is located 240 metres northeast of Pit 1. It lies along an indistinct and irregular contact of volcanic rocks with Lost Horse intrusive rocks, both rock types being host to ore. Faults control the boundaries of the orebody to a considerable degree. The northern boundary is formed in part by a zone of faulting and crushing; the southern boundary, although relatively straight, has not been related to any structure to date. To the west, the ore diminishes in grade in the vicinity of a strong northerly fault; to the east, the outline of the orebody becomes most irregular and mineralization grades to predominant pyrite with minor chalcopyrite. Within the orebody, ore-grade material is distributed irregularly, but several local trends and centres of copper mineralization occur. The sulphides are predominantly chalcopyrite and pyrite; bornite is rare. The largest known breccia pipe in the area, 90 metres in diameter and at least 150 metres deep, lies in the north-central part of the orebody. Although fine disseminations and fracture coatings of sulphide are common, the Pit 2 orebody has a much greater proportion of coarse blebs and veinlets than Pit 1.

The Pit 3 (Sunset) orebody begins 200 metres southeast of the Pit 1 orebody and continues southeast, along the eastern margin the Copper Mountain stock, for 1200 metres. This zone is located over old caved and collapsed workings of the underground mine and is therefore also referred to as the Subsidence Area zone (Bulletin 59, page 68). The orebody is 120 to 250 metres wide over most of its length, and is hosted almost entirely in the Nicola Group volcanics. Mineralization occurs along the northwest-striking intrusive contact, along major faults such as the Main fault or the "Mine breaks" or at the intersection of a series of steeply-dipping, west-striking, Lost Horse porphyry dykes with northeast-striking breaks and pegmatite-sheeted zones. Mineralization penetrates only a metre or so into the diorite of the stock. The form of the orebody segments is pipe-like in many places, as a result of their control by steep planar elements and division by a series of barren north-striking felsite dykes. The diameter of the segments that were mined ranged from about 15 to 60 metres. The contact orebody, which produced about half of the underground ore, was mined over widths of 9 to 38 metres, along a length of 900 metres and a maximum depth of 400 metres. The most productive areas of the mine consisted mainly of sequences of fine-grained bedded tuffs.

SIMILCO (cont'd)

These rocks, being more brittle than the adjacent flows, tuffs and agglomerates, shattered readily and yielded more "ore fractures". The lower bedded unit warped downward near the contact of the stock, so that it also formed a hostrock on deeper levels of the orebody. In addition, Lost Horse Intrusions which occur within the less favourable massive flows and coarse tuffs contained more fractures, and copper mineralization was concentrated in the contact areas of these irregular masses. Ore minerals are bornite and chalcopyrite in roughly equal proportions, with most of the bornite occurring within 60 metres of the stock contact. Minor chalcocite occurs with the best bornite ore. Pyrite exists in areas of chalcopyrite mineralization, but was absent in areas where bornite was present. The sulphide content of the rocks generally decreases sharply at the limits of the mine area. This orebody has been mined from the Nos. 3, 5 and 6 pits over a vertical elevation of 450 metres and from an elaborate system of underground workings.

Concentric patterns of rock alteration about individual orebodies at Copper Mountain are not evident. Alteration appears to be related mainly to the intrusive bodies and also controlled in distribution by faults and fractures. Biotite is well-developed along the stock contact in the underground mine and appears to be associated with the orebodies, and also forms selvages on bigger veins. Pale green bleaching of both volcanic and intrusive rocks is best developed at Pit 2, but also occurs and is locally intense at several other localities throughout the camp, such as along the Lost Horse contact, in portions of Pit 1 and in the outer part of the underground mine. It appears to follow the biotite stage and involves the development of albitic plagioclase and epidote, and the destruction of biotite and disseminated magnetite. Pink potash feldspar developed along fractures in the latest stage of alteration and is often accompanied by pegmatite veins. These "veins", found in most orebodies and elsewhere at Copper Mountain, consist of potash feldspar, biotite, calcite, fluorite, apatite and also some chalcopyrite and bornite. They are usually less than 0.3 metre wide and have formed in part by replacement of the wallrock. Closely-spaced thin pegmatite veins form the northeast sheeted zones of ore fractures. As at the Ingerbelle mine, copper mineralization appears to have occurred during the intermediate and late stages of alteration (Canadian Institute of Mining and Metallurgy Special Volume 15).

The well-differentiated Copper Mountain stock is thought to have been emplaced at the roots of an active volcanic centre. The various phases of the Lost Horse complex were intruded, with rapid uplift and erosion, as a series of separate injections from a differentiating magma. Their shallower, subvolcanic level of emplacement is indicated by their finer grained porphyritic texture, their highly variable contact relationships, including chilled margins, and the pipes and irregular bodies of breccia. The various characteristics of the orebodies suggest that they formed during the later stages of this magmatism. The Copper Mountain stock was probably not the immediate source of hydrothermal fluids at that time, but it most likely was still a hot mass and could easily have provided a temperature gradient as well as a physical and chemical barrier to the sulphide-bearing fluids which probably came from the same source as the Lost Horse rocks. This hypothesis might explain, at least in part, the crude sulphide zoning noted at the mine, which is characterized by a predominance of bornite and chalcopyrite near the Copper Mountain stock, and by a sharp decrease of bornite and an increase of pyrite toward the Lost Horse complex.

SIMILCO (cont'd)

Magnetite-rich parts of the Copper Mountain orebodies demonstrate textures of magmatic origin; the elevated PGE (platinum group elements) content of sulphide ore supports a mantle source similar to that of coeval and possibly cogenetic PGE-rich zoned Alaskan-type intrusions in eastern Quesnellia (e.g. Tulameen Ultramafic Complex, Polaris Intrusive Complex). Analyses of sulphide concentrate from the mine yielded up to 2.8 grams per tonne palladium and 0.155 gram per tonne platinum. A sample of a bornite- chalcopyrite vein from the glory hole yielded 3.25 grams per tonne palladium (Property File - Cordilleran Roundup 1991, Program and Abstracts Volume).

Most of the ore from the Copper Mountain mine came from glory hole and underground mining, but also included production from several open pits mined from 1952 to 1957. The mine closed in 1957. From 1959 through 1962 the mine was leased and small amounts of ore shipped.

In 1977-1978 the Ingerbelle mine (092HSE004) and Copper Mountain mine consolidated operations (the Ingerbelle open pit and mill are across the Similkameen River, west of the Copper Mountain mine). Production from the Ingerbelle orebody commenced in 1972 and mining in the Ingerbelle pit was completed in August 1981. With the installation of an ore conveyor across the Similkameen River canyon, the delivery of Copper Mountain ore from Pit 2 to the Ingerbelle mill began on a limited scale in October 1980, but full production was not implemented until September 1981 after the Ingerbelle orebody was depleted. The mining operation is currently called the Similco mine.

Recent targets for exploration are the Oriole (092HSE024), which is 330 metres southeast of Pit 3. The Oriole was mined in 1955 yielding 20,863 tonnes grading 0.8 per cent copper plus 9978 tonnes grading 0.5 per cent copper (George Cross News Letter #18, 1990). Drilling in the Oriole pits defined a vertically dipping linear sulphide zone grading 0.5 per cent copper. Average thickness of the portions drilled is 45 metres with a 182-metre strike length, open to depth (George Cross News Letter #118, 1990). The Oriole zone has been mapped over a 1219 metre length along the Main fault and is up to 304 metres wide.

In the Lost Horse Gulch area, 1200 metres north of Pit 1, recent drilling has indicated that the Alabama (092HSE013) and Virginia (092HSE242) zones are connected. The Virginia deposit contains indicated (probable) reserves of 13.6 million tonnes grading 0.40 per cent copper and 0.21 grams per tonne gold. The Alabama deposit, located 579 metres to the northwest of the Virginia deposit, contains inferred (possible) reserves of 9 million tonnes grading 0.32 per cent copper (George Cross News Letter #212, 1990). Also in the Lost Horse Gulch area, there are the Mill, Voigt and Wolf Creek East zones which carry gold and copper values (George Cross News Letter #148, 1990).

RIO GRANDE showing (Polymetallic Veins) MINFILE 092HSE075 Two kilometres west of property

The zone contains narrow stringers of massive galena and sphalerite, 2.5 to 10 centimetres wide, in a sheared matrix of kaolin, sericite, crushed quartz and oxidized pyrite. A chip sample taken across the zone assayed trace gold, 14 grams per tonne silver, nil lead and 1.2 per cent zinc, and a selected sample of galena assayed 0.7 gram per tonne gold, 463 grams per tonne silver, 28 per cent lead and 2 per cent zinc (Minister of Mines Annual Report 1928, page 267)/

ASH prospect (Magmatic, Hydrothermal, Epigenetic) MINFILE 092HSE100) Within property

Mineralization outcrops sporadically along the southeast bank of Packers Creek over a length of 500 metres. Most of the mineralization is contained in several large, irregular masses of milky white quartz and muscovite, up to 24 metres wide, that may have formed as late differentiates in the Eagle Plutonic Complex. These bodies are enclosed in kaolinite and/or chlorite-epidote alteration envelopes. They are irregularly mineralized with molybdenite and ferrimolybdenite, occurring as fine disseminations and along fractures in quartz. Minor disseminated pyrite and chalcopyrite are developed in the surrounding gneiss. The molybdenite content of these bodies varies up to 3 per cent and is reported to average about 0.50 per cent (Assessment Report 5583, page 2).

The syenite dykes contain minor malachite and disseminated chalcopyrite.

WEL prospect (Porphyry Cu +/- Mo +/- Au) MINFILE 092HSE136 Within property

A zone of copper-molybdenum mineralization, 550 metres wide, trends 145 degrees for at least 1000 metres, roughly paralleling the regional foliation of the area. The zone contains numerous quartz veins mineralized with pyrite and chalcopyrite, and sporadic molybdenite. Intersecting pyrite-chalcopyrite-bearing veins are noted to strike in three distinct directions. Chalcopyrite also occurs as disseminations and as blebs along fractures in the enclosing granodiorite. A sample from a quartz vein with pyrite, chalcopyrite and molybdenite analysed 0.89 per cent copper and 0.0245 per cent molybdenum (Assessment Report 5564, page 16, sample 8456).

2010 PROSPECTING PROGRAM

The 2010 prospecting program covered portions of the two tenures, 555365 & 555370, of the Wel 555365 Claim Group as indicated on Figure 3. Twelve man days plus one day travel were attributed to the program.

The purpose of the prospecting was to locate surficially indicated geological indicators of potentially sub-surface economic porphyritic mineral zones associated with the Late Jurassic tonalite intrusive (LJto).

Results of the prospecting were as follows:

- The area is underlain by textural variations of tonalite or quartz diorite.
- The texture of the tonalite varies from a porphyritic-fine grained matrix to coarse grained.
- Localized areas of minor alteration include propylitic and argillic.
- The propylitic alteration is reflected by epidote, carbonate and pyrite.
- The argillic alteration is reflected in the alteration of the feldspars to clay.
- The heaviest alteration, which is predominantly evident as limonite, occurs in the intrusive associated with quartz veins and/or quartz stockworks.
- Three localized zones of moderate to heavy limonitic alteration were trenched as indicated on Figure 3.

2010 PROSPECTING PROGRAM

Results (cont'd)

- The alteration zones occur in a general association with a significant topographically expressed east-northeast trending structure
- The quartz veins are indicated to occur within shear zones up to one metre wide trending north-northwesterly hosting quartz veins of up to two centimeters wide
- The limonite occurs as stains on the intrusive and as replacement of pyrite which is confined to the intrusive.
- Although the quartz veins were variably limonitic, there was neither evidence of contained pyrite nor any mineralization. As a result, samples were not taken.

CONCLUSIONS

The prospected portion of the Wel 555365 Claim Group contains minor surficial indications of potential sub-surface mineralization. The surface indicators include;

- The quartz veins which to the northeast contain copper and molybdenite mineralization.
- The alteration which to the northeast geochemical values correlate with an increase in the amount of alteration and an increase in general sulphide content in the intrusive.
- Potential molybdenite mineralization in quartz veins or a quartz vein stockwork that could be part of a general porphyry molybdenum system as reflected by anomalous IP surveys to the west and northwest of the mineral showings on the Ash claim.
- It appears that the alteration correlates with a significant structure which alteration may be a surficial indication of sub-surface mineralization; the structure providing and controlling surface access to hydrothermal fluids.

RECOMMENDATIONS

A continuing exploration program of geological mapping, sampling, and geochemical surveys is recommended to cover the area of the three trenches. A structural analysis of the two claims should also be completed to locate potential mineral controlling structures that may correlate with indicated mineral exploratory surveys. Samples from any mineral indicated area should be taken which assays may provide the zoning direction to the location to a potential economic mineral zone.

> Respectfully submitted Sookochoff Consultants Inc.



Laurence Sookochoff, P.Eng.

Vancouver, BC

SELECTED REFERENCES

- MINFILE 092HSE075; RIO GRANDE
- MINFILE 092HSE100; ASH
- MINFILE 092HSE136; WEL
- MINFILE 092HSE004; INGERBELLE
- **Bullis, A.R.** Report on Geochemical Survey on the ASH Group for Hanna Mining Co. 2nd August, 1971. AR 3182.
- **Giroux, G.H., Holbeck, P.** Resource Estimate Report Copper Mountain Project for Copper Mountain Mining Corp/ April 1, 2009
- **Macdonald, C.C.** Geology and Geochemistry of the Wen Claims for Canadian Occidental Petroleum Ltd. September 21, 1976. AR 5992
- **Murray, C.S.** Geology, Geochemistry and Ground Magnetometer Survey of the Wel Claim Group for Canadian Occidental Petroleum Ltd. November 7, 1974. AR 5564A.
- **Neugebauer**, **H**. Report on the Ash Group for S. Young. August 12, 1975.
- **Preto, V.A.** Geology of Copper Mountain. Bulletin 59. Ministry of Energy, Mines and Petroleum Resources. 1972.
- **Rice, H.M.A.** Geology and Mineral Deposits of the Princeton Map-Area, British Columbia. Memoir 243, 1960.
- **Sawyer, J.P.B.** Summary Geological and Geochemical Report on the Ash 1 and 2, Ash 9 to 12 incl. Claims for Canadian Natural Resources Ltd. AR 7974.
- **Walcott, P.E.** A Geophysical Report on a Magnetic & Induced Polarization Survey on the Ash Claims for Canadian Natural Resources Ltd. AR 7947B. November, 1979

CERTIFICATE

I, Laurence Sookochoff, of the City of Vancouver, in the Province of British Columbia, do hereby certify:

That I am a Consulting Geologist and principal of Sookochoff Consultants Inc. with an office address at 401-850 West Hastings Street, Vancouver, BC V6B 5T1.

I, Laurence Sookochoff, further certify that:

- 1) I am a graduate of the University of British Columbia (1966) and hold a B.Sc. degree in Geology.
- 2) I have been practicing my profession for the past forty-four years.
- 3) I am registered and in good standing with the Association of Professional Engineers and Geoscientists of British Columbia.
- 4) The information for this report is based on information as itemized in the Selected Reference section of this report and from information supplied to me by the prospecting party; the information is included herein.
- 5) I carried out a cursory general geological examination of the Well claim in July, 2004.
- 6) I do not have any direct or indirect interest in the Property as described herein.



Laurence Sookochoff, P. Eng.

Vancouver, BC

STATEMENT OF COSTS

The prospecting program on the WEL 555365 Claim Group was carried out from July 12. 2010 to July 15, 2010 to the value as follows. The report was completed and dated January 30, 2011.

L. Sostad	4 days @ \$500./day	\$ 2,000.00	
M. Schuss	4 days @ \$400./day	1,600.00	
C. Delorme	4 days @ \$400./day	1,600.00	
G. Delorme	4 days @ \$400./day	<u>1,600.00</u>	\$ 6,800.00
Meals: 16 man days @ \$100.			1,600.00
Vehicle rental: 4 days @ \$50. & gas			316.50
Report: Laurence Sookochoff, PEng			3,000.00
			\$ 11,716.50
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