# HUNTER GROUP OF MINERAL CLAIMS

## SKEENA MINING DIVISION, BRITISH COLUMBIA

by

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## INTRODUCTION

The Hunter Group of gold-silver-copper-tellurium mineral claims, which are 110 miles south-east of Prince Rupert, were examined and sampled on November 6, 1963 in company with Mr. J. M. Meldrum. The lower sections of the claims and the lower veins were free of snow but the higher sections were covered by several feet of snow which prevented examination of the upper surface showings; however, the tunnel on the upper showings was reached and the tunnel was roughly surveyed and the vein was examined.

Detailed reports are available on this property by Mr. E. M. Davidson (1930), Dr. V. Dolmage (1931), Dr. J. T. Mandy (1931) and by Mr. E. L. Borup (1939). This present report briefly brings the history of the property and the work done up to date, outlines present conditions, and offers suggestions for further work. To avoid duplication, the reader is referred to the older reports for detailed descriptions of the geology and veins.

## LOCATION AND ACCESS

The Hunter Group consists of 17 Crown-granted mineral claims in the Skeena Mining Division. They are near the coast of British Columbia and are 60 miles south of Kitimat, 30 miles

south-west of Kemano and 14 miles east of Butedale. The claims are at an elevation of about 1,000 to 3,500 feet.

Access, except by helicopter, is extremely difficult at present. Access to the property this year was by helicopter from Terrace via Kemano and return via Kitimat. The route used during the period the shaft and tunnel were driven (1930's and early 1940's) was by boat to Butedale (a canning factory on Princess Royal Channel), by motor boat for 16 miles to the head of Khutze Inlet, for 4 miles along an abandoned railway, and finally along a pack trail (which required cable crossings of the Khutze River) for an additional 8 miles to the property.

A 12-mile truck road could be constructed from Khutze Inlet to the Hunter property without the necessity for much rock-work, according to Mr. J. M. Meldrum.

## TOPOGRAPHY, CLIMATE AND TIMBER

The property lies on both sides of the north branch of Khutze River which flows in a glaciated U-shaped valley with steep sides. The surrounding mountains are extremely rugged and rise to elevations of more than 6,000 feet.

The claims are in the wet coastal belt of British Columbia and the rainfall is more than 100 inches a year. Ample quantities of good timber grow in the lower parts of the valley.

## HISTORY

The Hunter gold prospect was found by the late C. W. Meldrum and A Smith while on a hunting trip in 1925. The prospect was indirectly found because of a "chicamen" (rich or good) stone obtained by C. W. Meldrum and A. McLeod from an Indian in 1904. This "chicamen" stone, on crushing, is reported by J. M. Meldrum (the son of C. W. Meldrum) to have yielded $800.00 in gold, and caused C. W. Melfrum to spend much of the remainder of his life searching for its source. During the search the Western Copper property near the head of Khutze Inlet was discovered in 1904, and the Hunter in 1925.

The original discovery of the Hunter was a narrow quartz-pyrite vein in Khutze River, and the first sample assayed 5.2 oz. gold per ton. This first vein discovered, called the River Vein, was traced by trenching in the 1920's and early '30's, and prospecting during this period led to the discovery of six other veins in the area. A 3-ton shipment of ore from the River Vein was back packed out in 1933 and shipped to Tacoma. It assayed 9.29 oz. gold per ton, 4.02 oz. silver per ton and 1.37 per cent copper.

Underground work was started in the late 1930's and continued until 1941, during which period a tunnel, about 600 feet long, was driven on one of the upper veins at an elevation of 2335 feet and a 140-foot inclined shaft was sunk on the River Vein (elevation 985 feet) and two 100-foot drifts were driven from the bottom of the shaft. No work has been done on the property since 1941.

## GEOLOGY, VEINS AND ORE RESERVES

Narrow but continuous quartz-pyrite veins containing gold, silver, copper and tellurium occur in a metamorphosed type of granodiorite that probably occurs as a very large roof pendant within the surrounding Jurassic or Cretaceous granitic rocks of the Coast Range Batholith.

Seven veins have been found, and underground work has been done on two of them. The veins are generally from a few inches to eighteen inches wide and, where they are mineralized with considerable amounts of pyrite, have a high gold content. Assays of several ounces of gold and silver are common. Copper and tellurium are also present. None of the veins have been continuously exposed over their entire lengths, but the Main Vein appears to have a length of more than 2,000 feet and the other veins may have similar lengths.

Ore reserves cannot be calculated at present due to the lack of accurate geological and assay maps of the surface and underground veins, but calculations by E. M. Borup (1939) show the average value of 662 feet of sections of veins that were exposed is $94.96 per ton over a width of 7.7 inches.

## SAMPLES FOR GOLD AND TELLURIUM

The property was sampled during the 1925-1940 period by numerous individuals. However, a few check samples were taken

by the writer, with the following results:

1. Quartz specimens, containing about 20% of coarse friable pyrite, from the dump by the shaft on the River Vein — 5.32 oz. gold/ton
2. Quartz-pyrite and massive pyrite specimens from open-cuts in the River Vein — 10.68 oz. gold/ton
3. A two-inch diameter pyrite crystal from the River Vein — 4.36 oz. gold/ton
4. Chip samples from 100 to 200 feet from the tunnel mouth on the Main Vein (quartz with considerable pyrite and some copper stains) — 1.90 oz. gold/ton
5. Quartz chips lying on the first 200 feet of the tunnel floor on the Main Vein (very little pyrite) — 0.66 oz. gold/ton

The gold-silver telluride (sylvanite) is reported as being present in the quartz veins but tests of five samples collected by the writer, and listed above, contained no tellurium (according to J. R. Williams and Son Ltd.); however, a specimen, stated to be a telluride and to be from the property, was tested and was found to be strongly positive for tellurium though negative for both gold and silver. From its physical characteristics this telluride specimen is probably tetradymite which is a bismuth telluride containing from 52 to 59 per cent tellurium.

## SUGGESTIONS FOR FURTHER WORK

Veins of the type found at the Hunter property, despite their high-grade gold content, are generally too narrow and are worked on too small a scale to yeild much profit. However, a reasonable profit should be obtainable if sufficient ore reserves can be proved to warrant the construction of a 100-ton per day mill.

Access to the property is expensive at present. For a preliminary program of surveying, sampling and drilling short holes, servicing should be by helicopter. A base camp could be set up at Khutze Inlet and all men and materials flown to the Hunter property. As the Hunter is only 12 miles from Khutze inlet, flying supplies from there would not be expensive, but bringing a helicopter from Terrace would cost about $400.00 per round trip.

If underground work or a large drilling program is undertaken at the Hunter, then a truck road should be constructed from Khutze Inlet to the property. The road could use the old railway embankment for 4 miles to the Western Copper property, then a further 8 miles of road would have to be constructed to the Hunter, plus several small bridges. The cost of constructing a tractor road to the Hunter property was estimated by E. M. Borup in 1939 at $25,000.00. Arrangements could probably be made with the British Columbia Government to share half the cost of this road. Khutze Valley contains a large quantity of timber, hence the road could also serve for logging operations.

A suggested program follows:

1. A considerable volume of odd maps and several hundred assays, especially for the work done during the underground program of 1939-1941, should be compiled into a more useable and co-ordinated form. This should be completed before field work and further sampling is started, to prevent duplication of work already done.
2. Only parts of the upper tunnel (Main Vein) and the drifts from the shaft (River Vein) have been sampled and assayed. The entire underground workings should be geologically mapped, and sampling should be completed. (It will be necessary to pump out the shaft and drifts on the River Vein. This will not be difficult as the shaft is only 140 feet deep, and the shaft and drifts contain less than 100,000 gallons of water, with an inflow said to be less than 500 gallons per day. The shaft timbers are probably still in good condition, as the shaft is believed to have remained full of water, to within 6 feet of the surface, ever since work ceased in 1941.)
3. All the known surface veins should be mapped in detail and the results should be tied in with the underground work. (It is not positive that the upper tunnel is on the same vein (Main Vein) as that exposed at the surface; I made a compass and pace survey of the tunnel but could not tie in the vein exposed in the tunnel with the known surface vein due to snow.)
4. Short drill holes, using AX core, should be used to test for extensions of the various veins. Both the veins and their adjoining wall rocks should be sampled and all core should be carefully examined with a hand lens for tellurides. (A light drill should

be used for ease in moving on the steep mountain slope; ample water for drilling is available near all the veins.)

When the above preliminary program has been completed, it will be possible to make an assessment of the economic possibilities of the property.

Respectfully submitted,

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