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REVIEW
of the
HIXON CREEK GOLD PROJECT

for
the CALPETRO - GOLDEN RULE
JOINT VENTURE

by
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CERTIFICATE

I, Ronald Kort Netolitzky, of 74 Wildwood Drive S.W. of the City of Calgary in the Province of Alberta, hereby certify that :

1. I am a consulting geologist with the firm of Taiga Consultants Ltd. whose offices are located at Suite 100, 1300-8 Street S.W., Calgary, Alberta.
2. I am a graduate of the University of Alberta, B.Sc. in Geology (1964) and of the University of Calgary, M.Sc. in Geology (1967).
3. I have practised my profession continuously since 1967.
4. I am a member in good standing of the Association of Professional Engineers, Geologists and Geophysicists of Alberta.
5. I prepared a Report dated May, 1984 titled "Review of the Hixon Creek Gold Project for Calpetro-Golden Rule Joint Venture". This report is comprised of a review of previous Company reports prepared for Golden Rule Resources Ltd. and Calpetro Resources Inc., as well as a review of Published literature on the property and surrounding area.
6. Other than owning shares of and being a director and officer of Golden Rule Resources Ltd., I did not and do not have any interest in, directly or indirectly, and I did not and do not expect to receive any interest, directly or indirectly, in the Hixon Creek property or in securities of any member of the Calpetro-Golden Rule Joint Venture in respect of services rendered in connection with the Hixon Creek Property.

DATED at Calgary, Alberta, this 14th day of May, A.D. 1984.

Respectfully submitted,

PERMIT TO PRACTICE TAIGA CONSULTANTS LTD.	
Signature	<i>Ronald K. Netolitzky</i>
Date	<i>May 14, 1984</i>
PERMIT NUMBER: P 2399	
The Association of Professional Engineers, Geologists and Geophysicists of Alberta	



INTRODUCTION

Golden Rule Resources Ltd., in joint venture with Calpetro Resources Inc., is actively exploring in the Hixon area (Figure 1).

Golden Rule acquired the original property by option from Esperanza. Based on the initial exploration program in 1980, the property was increased by staking the HQ-1 to HQ-4 claims.

A reconnaissance geochemical and geophysical evaluation of the property was completed in 1981 by Golden Rule. In the fall of 1983, Golden Rule entered a joint venture agreement with Calpetro Resources Inc. to fund a winter diamond drill evaluation of the original occurrence and the favourable results from a Golden Rule bulldozer trenching program.

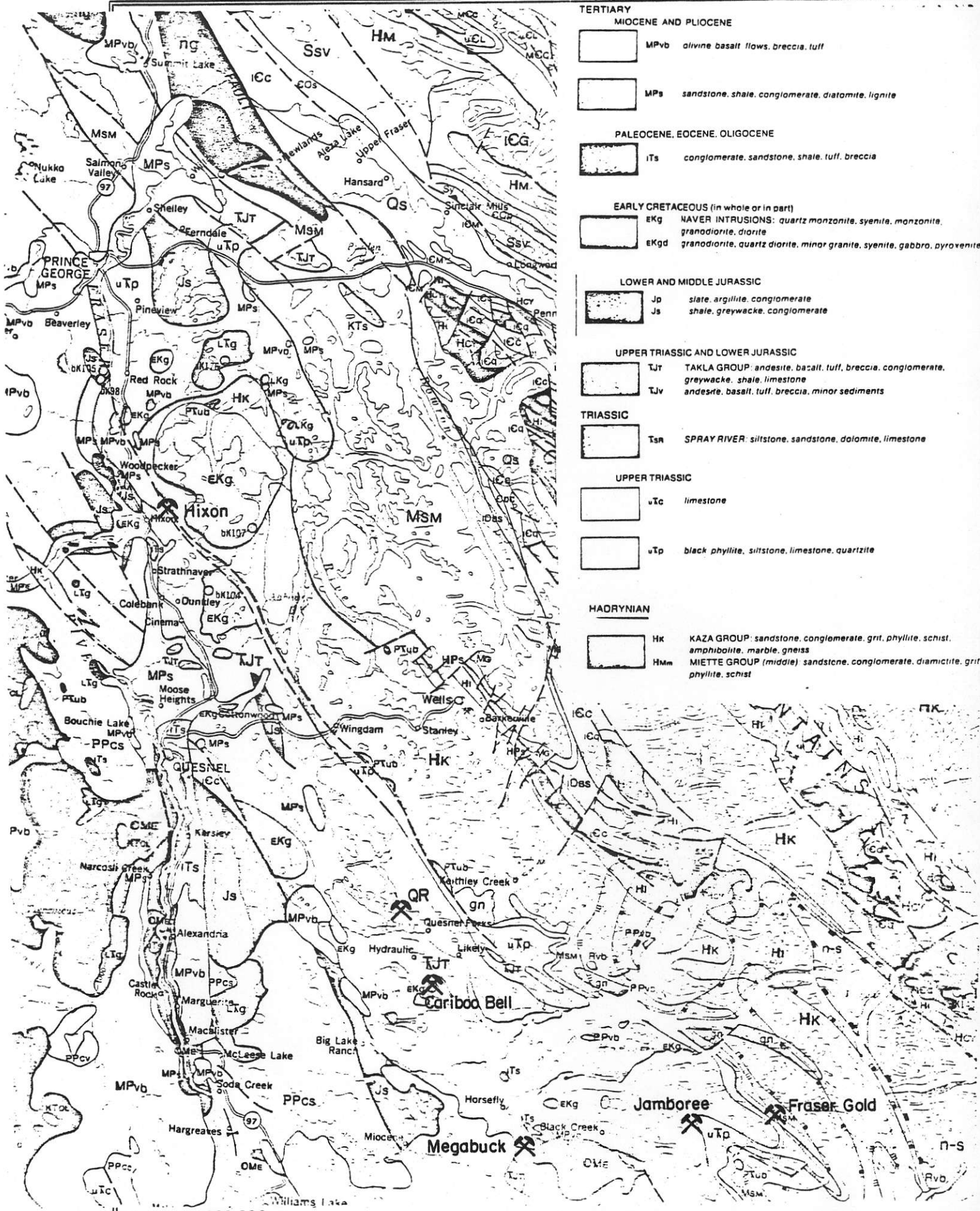
Location and Access

The Hixon Creek gold project is situated approximately 54 km south-southeast of Prince George and 4 km east of the town of Hixon. Access is via a well-maintained logging road which crosses the southern part of the property and connects with B.C. Highway 97 at a point about 10 km to the southwest. Alternative access exists in the form of a seasonally maintained road heading due east from the town of Hixon, crossing the central part of the property, and connecting to the northeast with the aforementioned logging road network.

Claims and Land Status

The Hixon Creek property consists of a contiguous block of four modified grid claims and six two-post mineral claims totalling approximately 1,250 hectares.

The claims are registered in the name of Golden Rule Resources Ltd. of Calgary, Alberta, and are grouped for the purpose of assessment work submittals.



TERTIARY

MIOCENE AND PLIOCENE

MPvb olivine basalt flows, breccia, tuff

MPs sandstone, shale, conglomerate, diatomite, lignite

PALEOCENE, EOCENE, OLILOCENE

ITs conglomerate, sandstone, shale, tuff, breccia

EARLY CRETACEOUS (in whole or in part)

EKg NAVER INTRUSIONS: quartz monzonite, syenite, monzonite, granodiorite, diorite

EKgd granodiorite, quartz diorite, minor granite, syenite, gabbro, pyroxenite

LOWER AND MIDDLE JURASSIC

Jp slate, argillite, conglomerate

Js shale, greywacke, conglomerate

UPPER TRIASSIC AND LOWER JURASSIC

TJT TAKLA GROUP: andesite, basalt, tuff, breccia, conglomerate, greywacke, shale, limestone

TJv andesite, basalt, tuff, breccia, minor sediments

TRIASSIC

Tsr SPRAY RIVER: siltstone, sandstone, dolomite, limestone

UPPER TRIASSIC

uTc limestone

uTp black phyllite, siltstone, limestone, quartzite

HADRYNIAN

Hk KAZA GROUP: sandstone, conglomerate, grit, phyllite, schist, amphibolite, marble, gneiss

HmM MIETTE GROUP (middle) sandstone, conglomerate, diamicite, grit, phyllite, schist

Scale 1:1,000,000

FIGURE 1 General Location Map

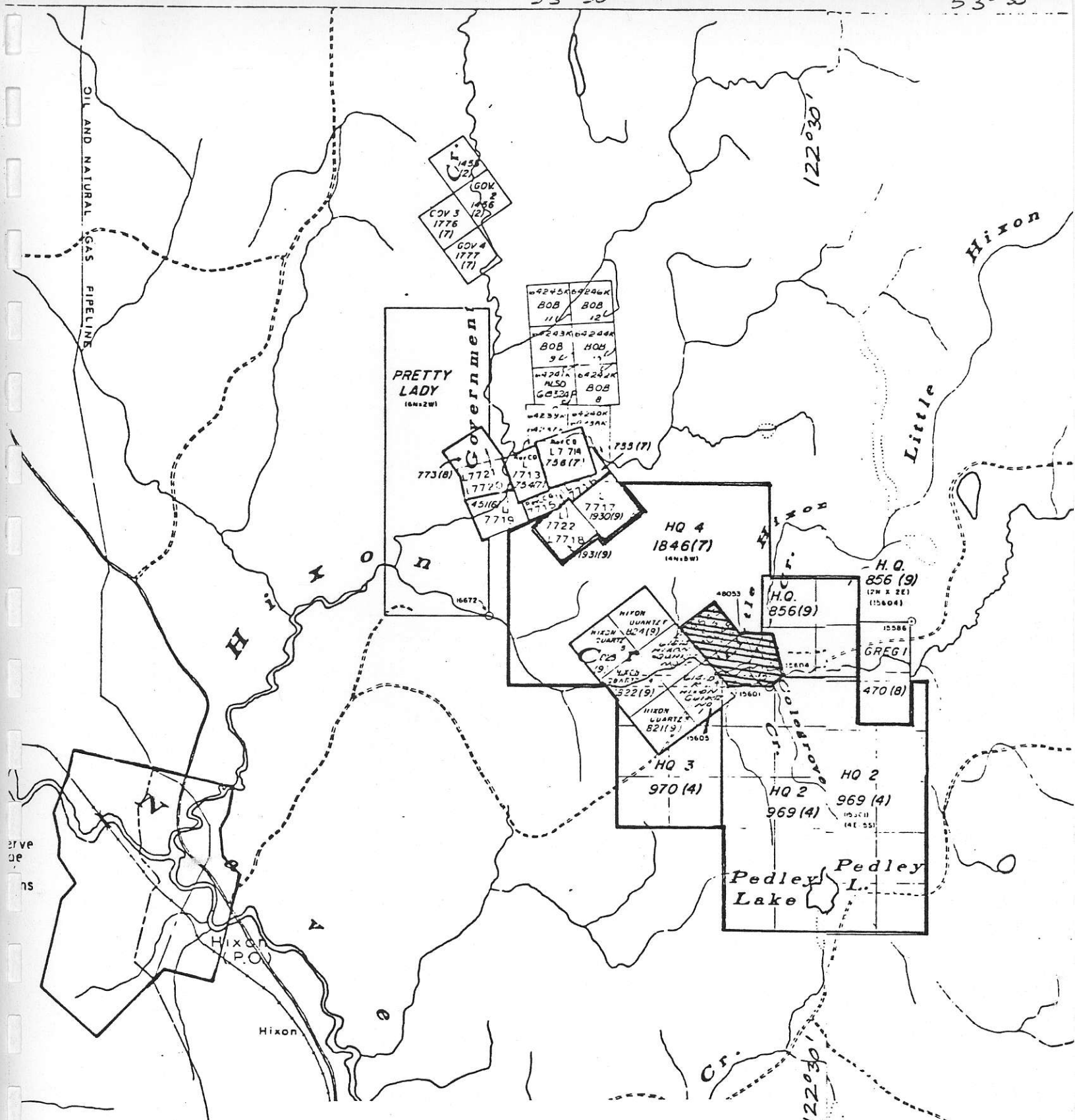
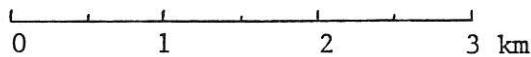


FIGURE 2. Claims Location Map.

Scale: 1:50,000



Claims not included in option

Ownership is subject to certain conditions of an option agreement between Golden Rule Resources Ltd. and the original vendor, Esperanza Explorations Ltd. The claims are described more specifically as follows:

<u>Claim Name</u>	<u>No. of Units</u>	<u>Record Number</u>	<u>Date of Record</u>	<u>In Good Assessment Standing to</u>
HQ	4	856	1978 Sep. 25	1986 Sep. 25
HQ 2	20	969	1979 Apr. 9	1987 Apr. 9
HQ 3	6	970	1979 Apr. 9	1987 Apr. 9
HQ 4	20	1846	1980 July 29	1986 July 29
Hixon Quartz 1		61413	1970 Dec. 16	1986 Dec. 16
Hixon Quartz 2		61414	1970 Dec. 16	1986 Dec. 16
Hixon Quartz 3	two-	821	1978 Sep. 1	1986 Sep. 1
Hixon Quartz 4	post	822	1978 Sep. 1	1986 Sep. 1
Hixon Quartz 5	claims	823	1978 Sep. 1	1986 Sep. 1
Hixon Quartz 6		824	1978 Sep. 1	1986 Sep. 1

Geological Setting

The property is situated in the Quesnel Trough which forms the east-central margin of the Intermontane Belt which is an important host for mineral deposits of varying types from epithermal vein deposits to volcanogenic exhalative and porphyry deposits.

The Quesnel Trough is a linear belt of early Mesozoic volcanic and sedimentary rocks lying along the western margin of the Omineca Crystalline Belt.

The lithologies present are considered to be an Island Arc assemblage formed from late Triassic to early Jurassic time.

Alkalic volcanic, volcanoclastic, and sedimentary rocks form the dominant lithologies which have been locally intruded by co-magmatic dykes and stocks.

The regional geology, as applied to the Hixon Creek area, was completed by Tipper (1961) at a scale of 1 inch = 4 miles. This reconnaissance-scale mapping is of insufficient scale to adequately assess the property.

Regional Background

The Quesnel Trough first acquired importance during the Cariboo gold rush in which placer camps such as Horsefly, Likely, Cottonwood River, and Government Creek (Hixon) came into prominence.

This early exploration did not lead to the development of lode deposits within the placer camps, due to lack of success in locating lode deposits associated with the placer gold. This led to early conclusions that the source of the placer gold was related to glacial dispersion from the nearby Barkerville Camp.

An early exception to this was the lode development of the Quesnelle Quartz Mining Co. Ltd. on Hixon Creek (within the present property boundary). This formed one of the earliest lode operations in British Columbia. During the 1870's, 239 tons were processed which were reported to have returned better than one ounce of gold per ton.

Placer mining of the Hixon and surrounding creeks continued to the early 1960's and may be currently re-activated by the higher gold prices.

In reviewing the Minister of Mines Annual Reports (see Appendix), persistent references are made to deep Tertiary weathering of Jurassic or Triassic schists. The published records suggest that the placer gold is of a local origin with a source in the weathered schists. Until recent exploration successes in the Likely-Horsefly area, the lode potential for the Quesnel Trough was down-played.

Based on a recent paper by Saleken and Simpson (1984), the primary exploration targets within the Quesnel Trough are semi-conformable, strata-bound gold mineralization hosted by permeable volcanoclastic or sedimentary rocks as exemplified by the QR and Fraser Gold deposits. These are considered to be the product of volcanic exhalative activity.

Other exploration targets include porphyry copper/gold deposits such as the Cariboo Beil and the Megabuck. Vein type deposits, some with epithermal characteristics, form targets of tertiary interest.

Exploration for lode deposits has been hampered by the general lack of outcrop exposures. The historical discovery of many of the known lode occurrences were related to placer mining activity. The use of modern geochemical and geophysical procedures has permitted exploration for lode deposits to spread beyond the active placer mining areas.

PROPERTY GEOLOGY

Geological mapping undertaken in 1971 by D. C. Miller, P.Eng. of Bethlehem Copper Corp., outlined a few scattered outcrops of greenstone near the northern end of Pedley Lake; fewer than a dozen small outcrops of phyllite and sericite schist approximately 1 km west of the confluence of Hixon and Little Hixon Creeks; and two small outcrops of biotite-muscovite-feldspar-quartz schist approximately 2 km north of Pedley Lake. Foliations in the greenstone range from N25°W to N50°W, and dips are 80°NE to 80°SW. Attitudes in the schists are similar. Miller also mapped a number of exposures in intrusive rocks approximately 3 km west of the exposures of phyllite and sericite schist. The intrusive exposures are outside the limits of the present claim group.

In 1933 and 1934, personnel of the British Columbia Department of Mines mapped the old underground workings which were opened at that time and dewatered. It was determined that the greenstones (meta-andesites?) were in contact with quartz-sericite schists (felsic tuffs?) along a highly sheared and hydrothermally altered zone. The greenstones were seen to be highly carbonatized adjacent to the contact; this zone of carbonate alteration is represented by a friable, orange-brown weathering, kaolinized zone at surface. The distribution of precious metals values is closely related to this zone.

"A large number of fairly closely spaced quartz veins striking almost entirely northeasterly with varying but steep dip (were observed underground). In a few instances, quartz veins follow the schist-greenstone contact for a limited distance. The width of the veins varies from a few inches up to 6 feet, and nine of them are from 2 feet to 4 feet in width. In the northwest working, twenty-six such veins were cut; and in the southeast working, three were cut, of which one near the face is 4 feet in width. Wherever the contact is exposed, these veins are seen to terminate abruptly at it. Many of the veins have frozen walls. Only two veins to date have been followed in a direction away from the contact, in one case 52 feet and in another 24 feet." (BCDM Annual Report 1935, p.C3)

Reconnaissance mapping carried out in 1981 located several more exposures of fresh, unweathered greenstone at the north end of the grid. A number of outcrops of quartz-sericite schist and decomposed greenstone(?) were also mapped in the vicinity of the old underground workings. The "greenstone" in the latter area is a dark brown, completely kaolinized, very soft rock, marked by bright orange zones of clay at surface. It is not clear whether the extent of decomposition here is due to the breakdown of hydrothermal alteration products of the greenstone or to the fortuitous preservation of a zone of deep, pre-glacial weathering. According to earlier workers (BCDM Annual Report 1935), the zone of oxidation extends to a depth of approximately 100 feet below creek level.

Several suites of rock samples were collected from the dump around the Main Shaft to assist in detailed mapping. Major rock types included:

1. fresh, unaltered, massive greenstone
2. heavily pyritized greenstone
3. grey or brownish-grey pyritized greenstone, containing $\frac{1}{2}$ - 3% galena, cut by numerous quartz and calcite stringers
4. quartz-carbonate-mariposite rock
5. black graphitic argillite
6. vein quartz

PREVIOUS EXPLORATION

The majority of references to previous exploration on the property have been excerpted from the British Columbia Minister of Mines Annual Reports and other sources, and are included in the Appendix.

The old Quesnelle Quartz Mining Co. Ltd. workings on Hixon Creek are located at a greenstone-schist contact that has a northwesterly strike (N42°W) and a steep southwesterly (-80°) dip. The greenstone along the contact appears to be hydrothermally altered to carbonate, quartz, a "green, chloritic mineral" (probably mariposite), and an "unidentified chocolate colored iron silicate" (perhaps ankerite). Along the northeasterly striking sheared contact, a network of short northeasterly striking veins (from a few centimetres to two metres thick) are developed in the greenstones. Pyrite, chalcopryite, galena, sphalerite, arsenopyrite, molybdenite, native gold, and native silver occur both in the veins and in the greenstone. Sampling carried out in the 1930's indicated erratic values in the quartz veins, although it was suggested that "...a considerable width of vein and country rock (greenstone) in the vicinity of the contact (might) constitute commercial ore" (BCDM Annau Report 1935, p.C4). The results of the sampling carried out by B.C. Department of Mines personnel in 1934 are shown in Table I, and a plan of the old workings is shown in Figure 3, below.

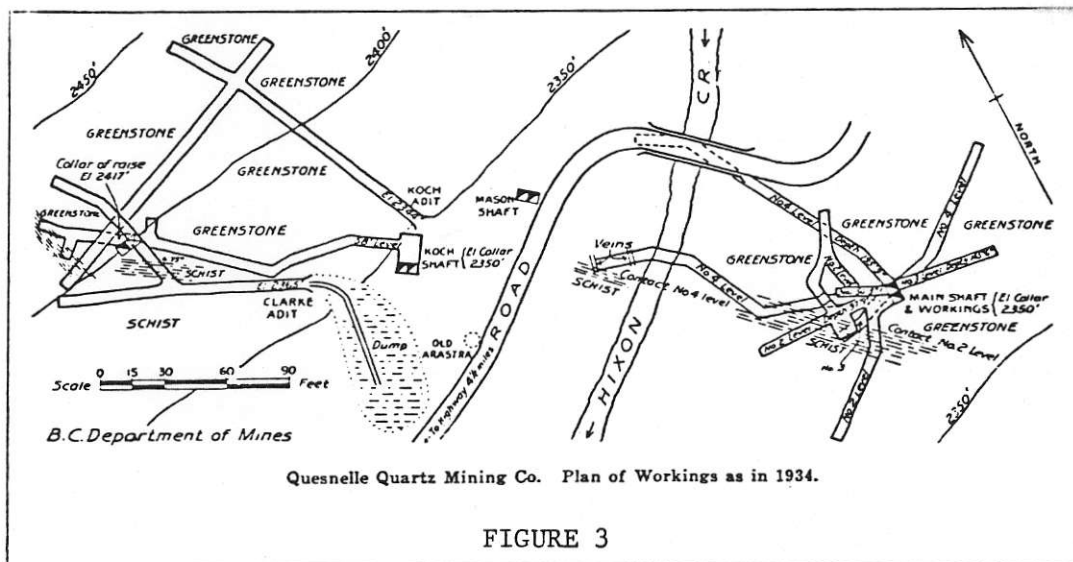


TABLE I
Results of 1934 Sampling - Main Shaft

No. 4 Level

The following samples were taken from the veins in the north-west working at the respective distances given from the shaft:—

- At 60 feet, across 2.2 feet. Assay: Gold, 0.02 oz. per ton.
- At 150 feet, across 6 inches. Assay: Gold, trace.
- At 162 feet, across 3.2 feet. Assay: Gold, trace.
- At 170 feet, across 4.5 feet. Assay: Gold, trace.
- At 250 feet, across 2 feet. Assay: Gold, 0.08 oz. per ton.
- At 265 feet, across 6 inches. Assay: Gold, 0.02 oz. per ton.
- At 290 feet, across 1.5 feet. Assay: Gold, 0.10 oz. per ton.
- At 299 feet, across 2.6 feet. Assay: Gold, 0.02 oz. per ton.
- At 324 feet, across 2 feet. Assay: Gold, 0.02 oz. per ton.
- At 356 feet, across 2 feet. Assay: Gold, 0.10 oz. per ton.
- At 440 feet, across 4 feet. Assay: Gold, 0.20 oz. per ton.

The following sample was taken in the south-east working from a vein 6 inches wide, 90 feet south-east of shaft:—Assay: Gold, 0.30 oz. per ton.

No. 3 Level

No. 3 level is driven wholly in greenstone. In the east drift from the shaft close to the latter a steeply dipping fairly well-mineralized quartz vein about 6 feet wide is exposed, striking north 38 degrees east and cut diagonally by the working. A sample taken across a width of 4 feet assayed: Gold, 0.04 oz. per ton.

No. 2 Level

On No. 2 level the greenstone-schist contact was reached 25 feet west of the shaft. At this point a shallow winze and a short raise follow one quartz vein 18 inches in width and two adjoining parallel stringers each about 3 inches in width. These strike north-easterly and their continuation is intercepted by the more easterly of two parallel north branch workings, which also exposes another quartz vein on its east side 6 feet in width striking north-east. A sample taken at this point across 6 feet assayed: Gold, 0.04 oz. per ton. On the west side of the working opposite the last-mentioned vein, a sample was taken across a width of 5 feet, being mainly oxidized greenstone with a little quartz. This sample assayed: Gold, 0.5 oz. per ton.

No. 1 Level

On No. 1 level, wholly in highly oxidized greenstone, a vein 6 feet in width, striking north-east, is cut 12 feet from the shaft. A sample taken across this width assayed traces of gold only.

Other Workings

The other workings, consisting of the old Koch shaft and Koch adit, and new Clarke adit, are on the right bank of the creek about 230 feet north-westerly from the main shaft.

The westerly working from the Koch adit cuts some well-mineralized quartz veins in oxidized greenstone within the first 90 feet of its length, but samples taken from these veins showed no values. For the last 66 feet this working is in schist which passes into graphitic schist near the face.

The north-westerly working from the Koch shaft is driven entirely in schist, in the immediate vicinity of the contact of the latter with oxidized greenstone. Although lagging prevents thorough inspection, there is evidence of quartz veins on the east side of the working. The face has entered graphitic schist. Near the face a short crosscut west discloses a quartz stringer in the schist, one of the very few examples on this property of the occurrence of a vein in the schist.

The Clarke adit is a recent working chiefly in schist, except where it enters oxidized greenstone in the region immediately below the raise shown on the plan. The purpose of this adit was to explore the region immediately below the bench-ground 60 feet above the adit on which rich stringers were discovered in 1932. Near the top of the raise a quartz vein 4 feet in width is exposed in which free gold was found. These veins did not prove to be continuous.

1981 TRENCHING

The locations of areas trenched in 1981 with respect to the old workings are shown on Map 1a (back pocket). One of the trenches intersected a greenstone-schist contact between the Koch shaft and the Clarke adit. Rock geochemical analyses indicated anomalous gold values over a 4 m wide zone of highly sheared quartz-sericite schist adjacent to the greenstone contact (samples HT-35 and HT-35, 322 and 224 ppb Au respectively). Re-sampling in 1982 yielded .02 oz/ton Au over 1 m, .018 oz/ton Au over 1 m, and .017 oz/ton Au over 2 m. A second trench, located 200 m west of the Clarke adit, also intersected a greenstone-schist contact in the vicinity of another old adit. Anomalous gold-in-rock geochemical values occur here over an 11 m wide zone of sheared quartz-sericite schist adjacent to the greenstone contact (samples HT-71 to HT-74). A third zone, located approximately 20 m northwest from the latter area, returned highly anomalous and potentially economic gold-in-rock geochemical values with 5 m sample intervals returning values of 7,160 ppb (.21 oz/ton) and 992 ppb (.029 oz/ton). This would represent a true width of approximately 4 m due to the acute angle between the strike of the schist and the direction of trenching at this point. Resampling of this site in 1982 yielded .154 oz/ton Au over an interval of 3 m.

Deep weathering and complete oxidation of sulphide minerals is present in all of the trenched areas. Apart from re-opening the old workings, drilling would be the only way to assess the relationship of values encountered in surface sampling to gold values in unoxidized zones of mineralization.

GROUND MAGNETOMETER SURVEY

The regional aeromagnetic pattern is depicted in Figure 4. The ground survey outlined a 150 - 300 m wide 58,000+ nanoTesla magnetic high, 3,600 m long, still open at the south end of the zone. The zone averages 1,000 - 3,000 nanoTesla above background and several offsets in the trend of the more intense "highs" suggest a possible northwesterly striking right-lateral fault regime. The magnetic high gradually narrows towards the southeast where it appears to split into three or more trends in the vicinity of Pedley Lake.

Although the orientation magnetic survey carried out in 1980 suggested a good correlation between magnetic highs and those areas underlain by greenstone, this was well substantiated by the 1981 survey results. Extensive exposures of greenstone occur at the northern end of the grid area, well beyond the limits of the magnetic high, as mapped to date.

Bethlehem drill hole HX-72-1 may have intersected a portion of the magnetic high northeast of Pedley Lake. Traces of magnetite and disseminated pyrite are reported in altered and sheared "meta-andesites".

35'

122°30'

25'

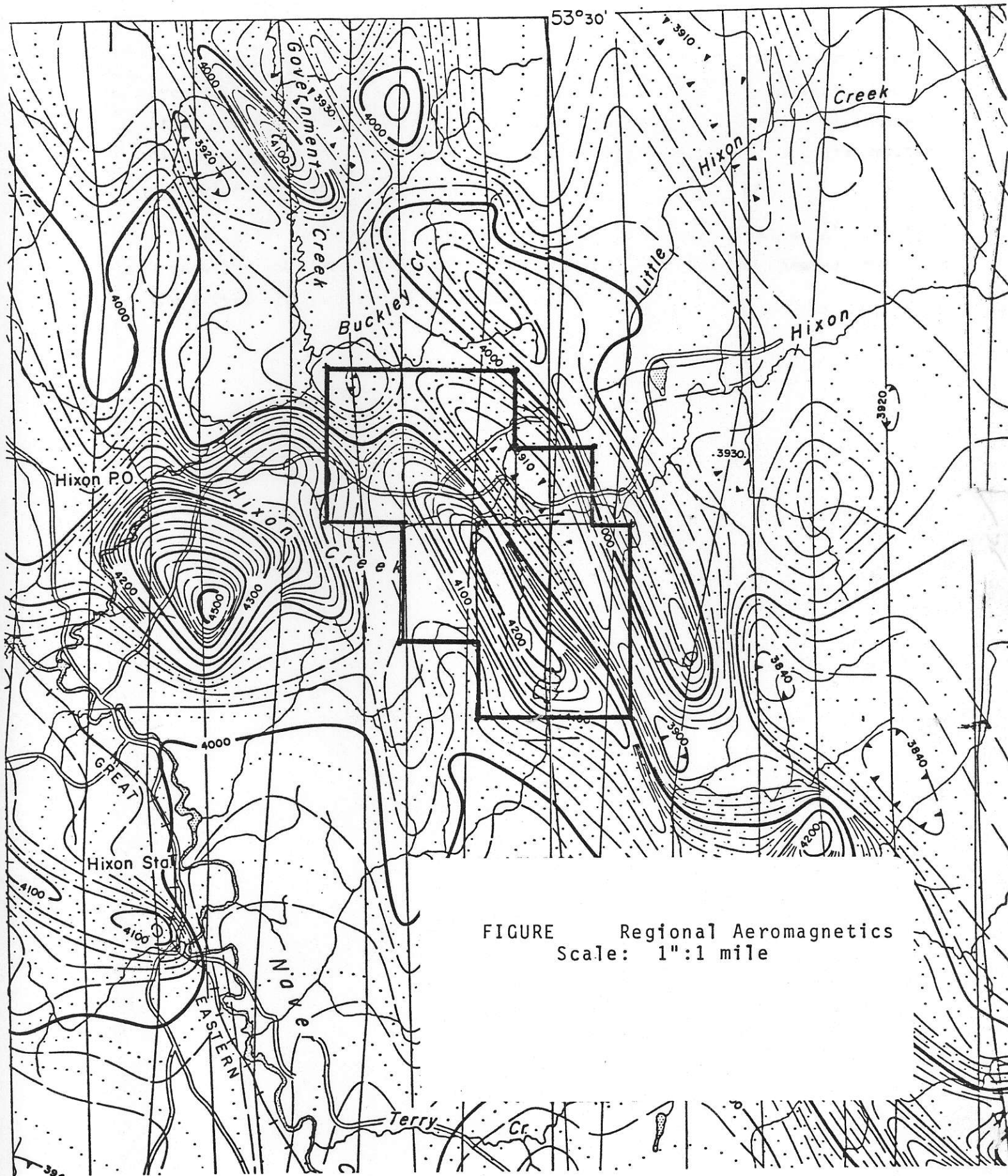


FIGURE Regional Aeromagnetics
Scale: 1" : 1 mile

GROUND VLF-EM SURVEY

Approximately 30.5 line km of ground VLF-EM surveying were carried out over the grid area. Readings (both in-phase and out-of-phase) were taken at 25 m intervals along grid lines, utilizing a Geonics EM-16. The transmitter used was Seattle, Washington (18.6 kHz); direction to the transmitter was determined to be 175° Azimuthal.

A series of strong northerly trending conductors, labelled 'A' to 'S', appears to transect the formational geological contacts interpreted from the ground magnetic survey at a small angle.

SOIL GEOCHEMICAL SURVEY

Geochemical sampling consisted of the collection of 957 B-horizon soil samples at 25 m intervals along grid lines. The samples were collected with mattocks and were placed in bellows-type heavy kraft paper sample envelopes. The samples were dried, sieved to -80 mesh, and analyzed for 26 elements by Acme Analytical Labs Ltd. of Vancouver, using an ICP (induction coupled plasma) technique. The elements for which the samples were analyzed include:

Mo	Cu	Pb	Zn	Ag	Ni	Co	Mn	Fe	As	U	Th	Cd
Sb	Bi	V	Ca	P	La	In	Mg	Ba	Ti	B	Al	W

An aqua regia leach was used to digest the samples. The leach is only partial for Ca, P, Mg, Al, Ti, La, and W; very little Ba is taken into solution. A separate analytical technique was used for Au, consisting of an aqua regia leach, followed by atomic absorption. Only the analytical results for Au, Ag, Cu, Pb, Zn, Ni, As, and Sb were tabulated and plotted (these are available separately from this report).

A total of 91 rock samples were collected by chip sampling from outcrops in the trenches. An additional 27 rock samples were collected from the Main Shaft dump, the ore bin, and at various locations in the grid area during the course of property mapping. All of these samples were geochemically analyzed for Au by combined fire assay and atomic absorption techniques by TerraMin Research Labs Ltd. of Calgary. The locations of these samples are shown on the accompanying 1:5000 property compilation map and the 1:1000 map of the trenched areas. Significant geochemical responses are described as follows.

Gold

Several moderately to strongly anomalous zones define a number of discontinuous linear trends, each several hundred metres long, located as follows:

1. A northwesterly trending zone extends from L36N/7+50E to L44N/5+25E (best value of 460 ppb Au). This is oblique to nearby conductor trends. One bedrock sample H-26 returned 596 ppb Au.
2. A north-northwesterly trending zone extends from L16N/10+00E to L30N/9+50E. Conceivably, (1) and (2) may be related to the same stratigraphic horizon. These one- and two-sample site anomalies are situated over a linear magnetic low. The segment from L28N to L30N coincides with a VLF-EM conductor axis.
3. A northwesterly trending zone (unrelated to the contamination around the mine dumps) extends from L28N/5+00E to L32N/2+75E (best value of 720 ppb Au).
4. A northwesterly trending zone extends from L6N/7+25E to L14N/6+25E (best value of 345 ppb Au). The zone flanks VLF-EM conductor 'S' and is characterized by a linear magnetic low. There is a weak As association along this trend. The best Au values on L14N are associated with anomalous Zn levels.
5. A northwesterly trending zone extends from L6N/6+25E to L12N/4+00E (best value of 960 ppb Au). This geochemical response is directly associated with the strong linear magnetic trend northeast of Pedley Lake. There is also a weak but persistent As association with this trend.
6. A northwesterly trending zone extends from L8N/2+75E to L10N/3+00E located parallel to and 100 m south of anomaly (5) above, and flanks the magnetic high on the western side. Anomalous Cu and As levels are evident on L10N.
7. A marginally anomalous set of sample sites (40 - 50 ppb Au) is located at L36N/3+00E to L38N/2+75E.
8. Two anomalous single sample sites on adjacent lines (150 and 250 ppb) are located on L44N/8+75E and L42N/9+00E and constitute a "significant" geochemical target worthy of additional investigation. There is a good association with As values along this trend.
9. An anomalous sample site is situated at L26N/4+25E (230 ppb Au). This site has anomalous Zn levels and is associated with elevated As values which continue to Anomaly (3).
10. This single site anomaly is situated at L24N/0+25E, and is in close proximity to a strong conductor axis which may be a continuation of the strong conductor adjacent to the Main Shaft.
11. A north-south trending zone extends from L14N/2+75E to L18N/5+00E (best value of 470 ppb Au). This trend parallels and is between two strong conductive responses.

Two highly anomalous areas in the vicinity of the Main Shaft and the Raven adit are attributed to contamination from the mine dumps in these areas.

Au- and Zn-in-soil values exhibit fair correlation; Zn values greater than 200 ppm show a good correlation with gold anomalies.

Au- and Pb-in-soil values show only a fair correlation, notwithstanding the presence of galena in the gold-bearing rocks collected from the Main Shaft dump and ore bin. One very high Pb-in-soil value (379 ppm) occurs at L40N/5+00E with no associated anomalous Au values.

Au- and Cu-in-soil anomalies show only a fair correlation although most Au anomalies have high background Cu-in-soils values associated.

Coincident Au- and Sb-in-soil zones occur within the magnetic high on L10N to L12N / 3+50E to 3+25E, and at L10N/3+00E.

Au- and Ni-in-soil anomalous values show a good correlation in a zone extending from L31N/4+00E to L32N/3+00E, and several other isolated highs occurring at L40N/6+00E, L36N/7+25E, L44N/9+00E, L42N/8+75E, and L28N/5+00E.

Au- and Ag-in-soil values show a poor to non-existent relationship. The maximum Ag value of 8 ppm was obtained from L38N/8+25E. Elevated Cu and Ni values were also obtained from this site.

1981 ROCK GEOCHEMICAL ANALYSES

In addition to the trench sampling, several suites of unoxidized rock samples were collected from the mine dump around the "Main Shaft" and from the ore bin located south of the "Main Shaft". Representative hand specimens were also routinely collected during the course of grid-controlled geological mapping. All 27 rock samples collected were submitted for geochemical analysis, with the following results:

<u>Sample No.</u>	<u>Au (ppb)</u>	<u>Rock Type</u>
<i>Main Shaft Dump</i>		
H-18	524	Brownish-grey carbonatized, pyritized 'greenstone'
H-20	204	Quartz-carbonate-mariposite rock cut by quartz stringer
H-21	2	Massive, unaltered greenstone
H-23	4	Siliceous, greyish-green, quartz-carbonate-mariposite rock
H-24	124	Brownish, slightly oxidized, carbonatized, pyritized 'greenstone'
H-25	<2	Rusty weathering vein quartz
<i>Ore Bin</i>		
H-11	4	Quartz-carbonate-mariposite rock
H-12	262	Vein quartz
H-13	4,900	Grey, carbonatized, pyritized 'greenstone' cut by quartz stringers, minor galena
H-14	1,642	as above
H-15	242	as above
H-16	1,226	Brownish, carbonatized, pyritized 'greenstone', >5% pyrite, approx 2% galena
H-17	<2	Vein quartz
H-22	1,068	Brownish, carbonatized, pyritized 'greenstone', minor (<1%) galena
<i>Grid Samples</i>		
H-1	<2	33+50N-6+60E Deeply weathered quartz-carbonate rock
H-2	<2	34+00N-6+75E as above
H-3	16	36+50N-6+50E Massive unaltered greenstone
H-4	<2	37+20N-6+10E as above
H-5	<2	38+00N-7+10E Massive greenstone, weakly serpentinized and chloritized on narrow shears
H-6	<2	37+50N-7+00E as above
H-7	4	36+10N-7+30E Quartz vein
H-8	<2	36+10N-6+50E Quartz vein

<u>Sample No.</u>	<u>Au (ppb)</u>	<u>Rock Type</u>
H-9	2	36+05N-6+50E Incipiently carbonatized greenstone
H-10	18	Adjacent to trench sample HT-57; strongly sheared, chloritized greenstone
H-19	76	Fault gouge, fault breccia; outcrop in Hixon Creek, 50 m downstream from Main Shaft dump
H-26	596	36+00N-7+25E Brownish, fine-grained, siliceous, pyritized, massive greenstone
H-27	<2	38+00N-7+15E Massive, medium-grained, weakly epidotized greenstone

The above sampling confirms the presence of potentially economic grades in rocks collected from the ore bin and the mine dump. Also of interest is the 596 ppb Au-in-rock value obtained from sample H-26. This sample location coincides with a gold-in-soils anomaly which forms part of an anomalous trend several hundred metres in length.

1983 DRILL RESULTS

In December 1983, Golden Rule Resources Ltd. undertook to further explore the potential for extensive, low-grade precious metal distribution along the carbonatized and pyritized greenstone-schist contact with a limited drill program. Four diamond drill holes totalling 353 metres were completed, as described below (see also Map 1a for locations). Drill logs, sections, and assays are appended.

DDH 83-1

Location: L30+04.5N-3+62.5E
Bearing: 228°
Angle: -45°
Total Depth: 131.7 metres (432 feet); BQ core

0.0- 4.6 Casing - Till
4.6- 28.0 Intensely altered meta-andesite
28.0- 52.4 Diorite dykes; occ included band of felsic tuff
52.4-101.3 Felsic tuff; lt.grey, siliceous
101.3-107.9 Intensely altered meta-andesite
107.9-131.7 Metasediment; extremely altered, slightly graphitic

Sludge samples were collected at 1.5 metre intervals down to 84.4 metres. Loss of circulation at 84.4 metres prevented further collection of sludges. Core recovery generally averaged 80% although was very poor throughout the weathered zones. The surface casing was left in the hole.

Significant Core Assays:		oz/ton Au	oz/ton Ag
81.4- 82.9	1.5 m	0.065	
87.5- 90.5	3.0 m	0.054	
96.6- 97.5	0.9 m	0.064	
104.2-105.7	1.5 m	0.105	
108.8-110.3	1.5 m	0.167	0.6
119.3-121.0	1.7 m	0.055	

The best sludge sample (22.0-23.5) assayed 0.213 oz/ton Au (no corresponding core assay at this level).

DDH 83-2

Location: L31+50N-0+94E
Bearing: 257°
Angle: -45°
Total Depth: 82.9 metres (272 feet); NQ core

0.0- 2.1 Casing (glacial till)
2.1-82.9 Black, very carbonaceous meta-argillite; minor disseminated pyrite; numerous very narrow quartz stringers.

Sludge samples were collected at 1.5 metre intervals throughout the hole. Core recovery was very poor (average <60%) due to the extremely weathered nature of the shale. Surface casing was left in the hole.

There were no anomalous gold or silver assays in either core or sludge.

DDH 83-3

Location: 22.5 metres at a bearing of 300° from the drill hole to the centre of the "Main Shaft"

Bearing: 313°

Angle: -45°

Total Depth: 101.2 metres (332 feet); NQ core

0.0- 5.1	Till
5.1- 12.8	Andesite; highly oxidized
12.8- 43.5	Felsic tuff; intensely oxidized
43.5- 48.8	Felsic tuff
48.8- 52.0	Andesite; very chloritic
52.0- 68.8	Felsic tuff
68.8- 70.7	Diorite dyke
70.7- 75.3	Andesite
75.3-101.2	Felsic tuff

Sludge samples were collected at 1.5 metre intervals throughout the hole. Core recovery averaged 85%. Surface casing was recovered.

Significant Core Assays:		oz/ton Au
20.4- 25.0	4.6 m	0.037
40.2- 43.5	3.3 m	0.056
64.6- 65.8	1.2 m	0.057

Good correlation exists between the sludge and core sample assays (refer to appended section).

DDH 83-4

Location: L31+50N-0+16E

Bearing: 032°

Angle: -45°

Total Depth: abandoned at 37.8 metres (124 feet); NQ core

0.0- 6.1	Casing (glacial till)
6.1-37.8	Black, very carbonaceous meta-argillite with minor disseminated pyrite

Sludge samples were collected at 1.5 metre intervals throughout the hole. Core recovery was very poor (<60%) due to the extremely weathered nature of the shale. The drill hole was abandoned after several unsuccessful attempts to recover stuck drill rods. Surface casing was recovered.

No significant gold or silver assays were obtained from either the core or the sludge samples.

All core recovered was split-sampled and assayed for Au and Ag by TerraMin Research Labs Ltd. in Calgary. Analytical techniques consisted of their combined fire assay and atomic absorption analysis with a 25 g sample aliquot.

In DDH 83-1 and DDH 83-3, the widespread presence of anomalous gold levels would support the possibility for stratigraphic controls to the mineralization. Due to poor core recovery, the importance of the quartz veining to the gold enrichment could not be established.

The loss of circulation in DDH 83-1 combined with poor core recovery adds to the uncertainty with regard to the actual extent and grade of mineralization. For example, the best interval (108.8 - 110.3 : 5720 ppb Au [0.167 oz/ton]) had only 30% core recovery and no sludge returns.

SUMMARY AND CONCLUSIONS

Data obtained on the Hixon Creek Gold Project by Golden Rule Resources Ltd. during the course of their 1980 and 1981 field seasons confirmed the presence of "significant" gold values previously reported by Esperanza et al., and further attested to by the presence of old underground exploratory workings and the remains of a mill and tailings spill pile.

Ground magnetic and VLF-EM geophysical surveys, 31 line kilometres of soil geochemical sampling, a limited 'cat'-trenching program, and four diamond drill holes have identified a series of targets which warrants further detailed investigation.

Zones of anomalous precious metals values in soils exhibit a fairly consistent spatial relationship to geologic contacts as inferred from the magnetic survey. In most instances, Au-in-soil anomalies lie along the margins of a prominent, regional magnetic high, the latter here interpreted as a narrow band of meta-andesite and related diorite dykes and sills (a minor ultramafic component is also suggested by some workers). These rocks are bounded, both to the east and west, by an intercalated sequence of felsic tuffs(?) (quartz-sericite schists) and thin interbeds of calcareous metasediments, and are overlain(?) to the west by graphitic meta-argillites.

Where observed, the mafic volcanics have undergone moderate hydrothermal alteration (carbonatization, kaolinization, and weak pyritization) at or near their contacts. Additionally, a 20 - 25+ metre wide zone within the greenstone and subjacent to the quartz-sericite schist contact contains a stockwork of tensional quartz veins nearly perpendicular to the contact. Gold grades within the quartz veins, which vary from a few centimetres to greater than 2 metres thick, were reported to be highly erratic (from trace to nearly 1 oz/ton). Mineralization consists of pyrite, chalcopyrite, galena, sphalerite, arsenopyrite, molybdenite, tetrahedrite, native gold, and native silver.

In decreasing order of priority, the targets which warrant detailed investigations are set out below.

1. Pedley Lake Zone

Gold-in-soil geochemical anomaly #5 (best value of 960 ppb Au) is the highest priority of the as yet completely untested anomalies. It exhibits good similarity to the Koch Zone in that it is characterized by a strong magnetic anomaly.

Anomaly #6, located parallel to and 100 m west of #5, occurs in a similar environment and should be examined simultaneously.

Anomaly #4, a third-priority response, is located parallel to and 200 m east of #5. It is situated on the eastern flank of the regional magnetic anomaly and appears to be directly coincidental with VLF-EM conductor 'S'. (Bethlehem drill hole HX-72-2 appears to have adequately sectioned both the conductor and the trend of gold-in-soil geochemical anomalies with negative results.) The best values are found on L14N, well removed from the previous drilling and would be the best area to investigate this trend.

2. Koch Zone

The Koch Zone (c.f. Map 1a for details) covers the main north-westerly trending contact between the highly altered greenstone and quartz-sericite schist.

Drill holes 83-1 and 83-3 partially tested the contact in the vicinity of the old Main Shaft, albeit with marginally encouraging results. Exceptionally poor core recovery detracted from the evaluation of the previously inferred low-grade potential of this zone (i.e., it is still not known whether the gold values occur exclusively in quartz veins and stringers, or are associated with hydrothermal alteration or exhalative volcanogenic processes). VLF-EM conductor 'A', located 25 - 50 m west of the contact, has not yet been drill intersected.

Additionally, gold-in-soil geochemical anomaly #3 (best value of 720 ppb), coincidental with the axis of the magnetic high, has yet to be field examined.

3. Gold-in-soil geochemical anomalies #1 and #2, which exist as a northwesterly trending discontinuous string of single sample site anomalies, may or may not be related to the same geological horizon (or structure?). The geochemical anomalies obliquely transgress the VLF-EM conductor trends but are all within a magnetic low regime.
Sufficient bedrock exposure should be available between L34N and L40N to map this zone in considerable detail before having to either trench or drill the targets.
4. Anomaly #11 warrants investigation in conjunction with Anomalies #5 and #6. The close association with a strong conductive trend makes this an especially attractive target to investigate. The interpretation of the orientation requires confirmation.
5. Gold-in-soil geochemical anomalies #7, #8, #9, and #10 (50, 250, 230, and 930 ppb Au respectively) all warrant a prospecting and mapping investigation.

6. Raven Zone

This zone is situated 175 m west of the Koch Zone contact, and represents a nearly identical geological setting (a sheared and altered greenstone/quartz-sericite schist contact). A somewhat irregular, folded, 2 m thick quartz vein appears to roughly parallel the contact 5 m out into the schist. This was previously explored with the Raven adit, although no values were ever reported from this site. 20 m above this location, a continuous chip sample (from the 1981 trenching program) yielded 0.154 oz/ton Au over a trench width of 3.0 metres.

Drill holes 83-2 and 83-4 were emplaced to test for a possible extension of the Raven adit quartz vein, as well as to test the above noted trench values. DDH 83-2 intersected a continuous section of black graphitic meta-argillite. No anomalous assays were obtained from this core. It was subsequently assumed that the hole had been

drilled down-dip and DDH 83-4 was undertaken as a second test of this target. Unfortunately, DDH 83-4 had to be abandoned (due to stuck rods) at 37.8 m; as the section again consisted of black, graphitic meta-argillite, the structural interpretation obviously had not been resolved.

Remapping of this area will be required prior to additional drilling.

RECOMMENDATIONS

1. Detailed mapping and prospecting of the six priority target areas previously described.
2. A re-evaluation of the surficial environment (and a detailed classification of surficial deposits) in the six target areas in order to assess the soil geochemical coverage to date. Provision should be made for in-fill B-horizon soil sampling and perhaps limited basal-till geochemical sampling utilizing a Wacker drill system.
3. In view of the good road access, provision should be made for either backhoe or bulldozer trenching, particularly in the Pedley Lake Zone and in the areas of geochemical anomalies #1 and #2.
4. Drill target definition should also entail additional detailed VLF-EM profiles.
5. Reconnaissance geological, prospecting, and geochemical coverage of the balance of the property area should be undertaken.

PROPOSED PROGRAM AND BUDGET

Stage I	Geological and Geochemical Investigations	
	- drill target definition	
	- Wacker drill program	
	- backhoe trenching program	\$ 60,000
Stage II	600 m NQ diamond drilling @ \$120/m	
	- drilling, supervision, assays, reports	<u>72,000</u>
	TOTAL	<u>\$132,000</u>

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4 + 00 E

3 + 00 E

2 + 00 E

1 + 00 E

BL 00

L 32 N

L 31 N

L 30 + 50 N

L 30 + 00 N

L 29 + 75 N

L 29 N

L 28 + 50 N

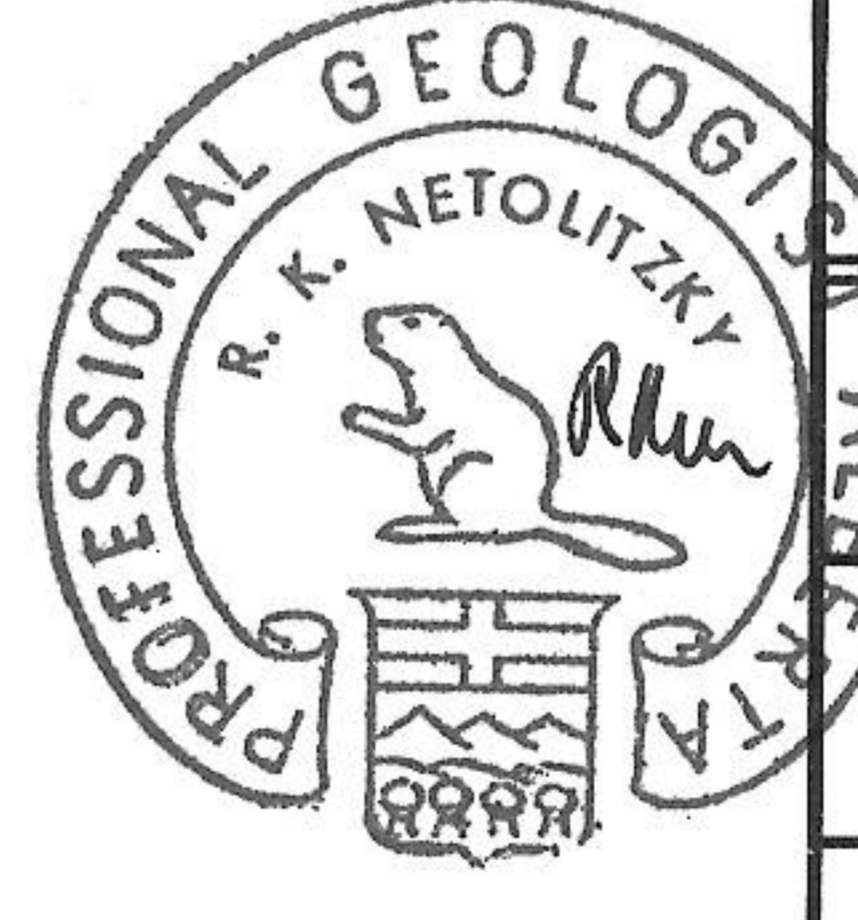
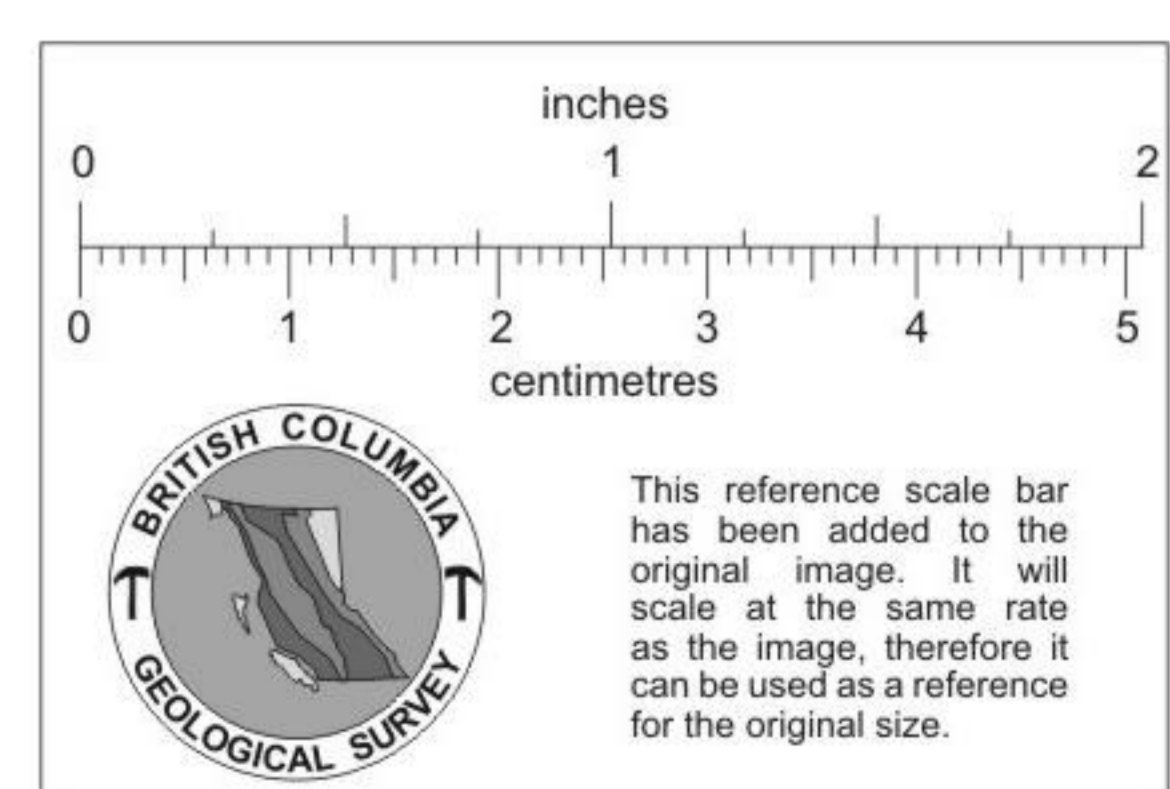
L 28 N

L 27 N

LEGEND

- 1 Andesite (?) or mafic dyke; intensely altered
- 2 Quart -sericite schist, minor graphite schist
- Quartz Veins
- trench
- adit
- shaft
- conductor axis

- Outcrop
- Subcrop
- Geological contact (known, inferred)
- Fault, shear zone
- Attitude of foliation? Bedding?
- Jointing attitude
- Mapped by: M. Fox - 1981
J. R. Allan - 1982
D. Hoy
- 0.2/4.0' Gold assays reported as oz. per ton over sample width
- DDH-83-1 Diamond drill hole; projected vertically



CALPETRO RESOURCES INC.	
HIXON GOLD PROJECT	
MAP 1A - DETAILED GEOLOGY	Revised December, 1983
PROJECT GR-BC-8	NTS 93G/7,8
SCALE 1:1,000	0 10 20 30 40 50 METRES
TAIGA CONSULTANTS LTD.	

