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ASSESSMENT REPORT ON THE
TREATY AND STAN CLAIM GROUPS
STEWART, BRITISH COLUMBIA
SKEENA MINING DIVISION
NTS 104B/9
LATITUDE 56°36'
LONGITUDE 130°04'

BY

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September, 1990

FILE: TREATY90

GEOLOGICAL BRANCH
ASSESSMENT REPORT

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SUMMARY

The Treaty 2-7 and Stan 1-4 claims are located 90 air-kilometers north of Stewart, British Columbia, within the Skeena Mining Division. The property area is underlain by geologically favourable volcanics and sediments of the Hazelton Group in a belt of rocks referred to as B.C.'s "Golden Triangle". This "Triangle" encompasses the Iskut River Gold Camp to the west, the Galore Creek Camp to the north, the Unuk River Camp to the east and the Stewart Gold Belt to the south. Besides the recent Eskay Creek discovery, the "Triangle" has two producing gold mines and at least three more in the process. Numerous deposits, including base metal, gold-silver-base metal and silver-base metal deposits are present.

The 1990 exploration program consisted of analyzing the 1987 and 1988 rock and silt sample pulps for Cu, Pb, Zn, Sb, Hg and Ba. A total of 30 rock and silt samples were analyzed for Cu, Pb, Zn, Sb, Hg and Ba while a total of 338 rock and silt samples were analyzed for Cu, Sb, Hg and Ba. Anomalous samples were indicated for all elements tested. The survey indicated 0.11% and 0.12% Zn in several from the Treaty 5 claim silt samples. The samples were from an area that encompasses the Mt Dilworth formation overlain by black argillites of the Salmon River formation. Also the area of the exposed Mt Dilworth along steep slopes shows abundant white stain; possible indicating the presence of smithsonite. The source of the stain would be immediately above the Mt Dilworth formation.

In addition the 1990 program included reconnaissance mapping, silt and rock sampling as well as prospecting. This work showed that the Mt Dilworth formation (host of the Eskay Creek deposit) is present on the Treaty 5 and Stan 2 claims.

A total of 108 rock and 44 silt samples were collected in the period June 18 - June 25, 1990 and analyzed for Au and Ag. Anomalous values were indicated for both elements. No anomalous gold values were indicated for the Mt Dilworth formation.

Further exploration is recommended to evaluate the economic potential of the Treaty property. A \$100,000 exploration program is recommended for 1991 consisting of mapping, detailed rock geochemistry and continued prospecting.

INTRODUCTION

Work conducted on the Treaty property commenced in May 1990 and was completed on June 25, 1990 by E.R. Kruchkowski Consulting Ltd. personnel. This report is based on data obtained from prospecting, silt and rock geochemical surveys. All analyses were performed by Loring Laboratories Ltd. in Calgary, Alberta.

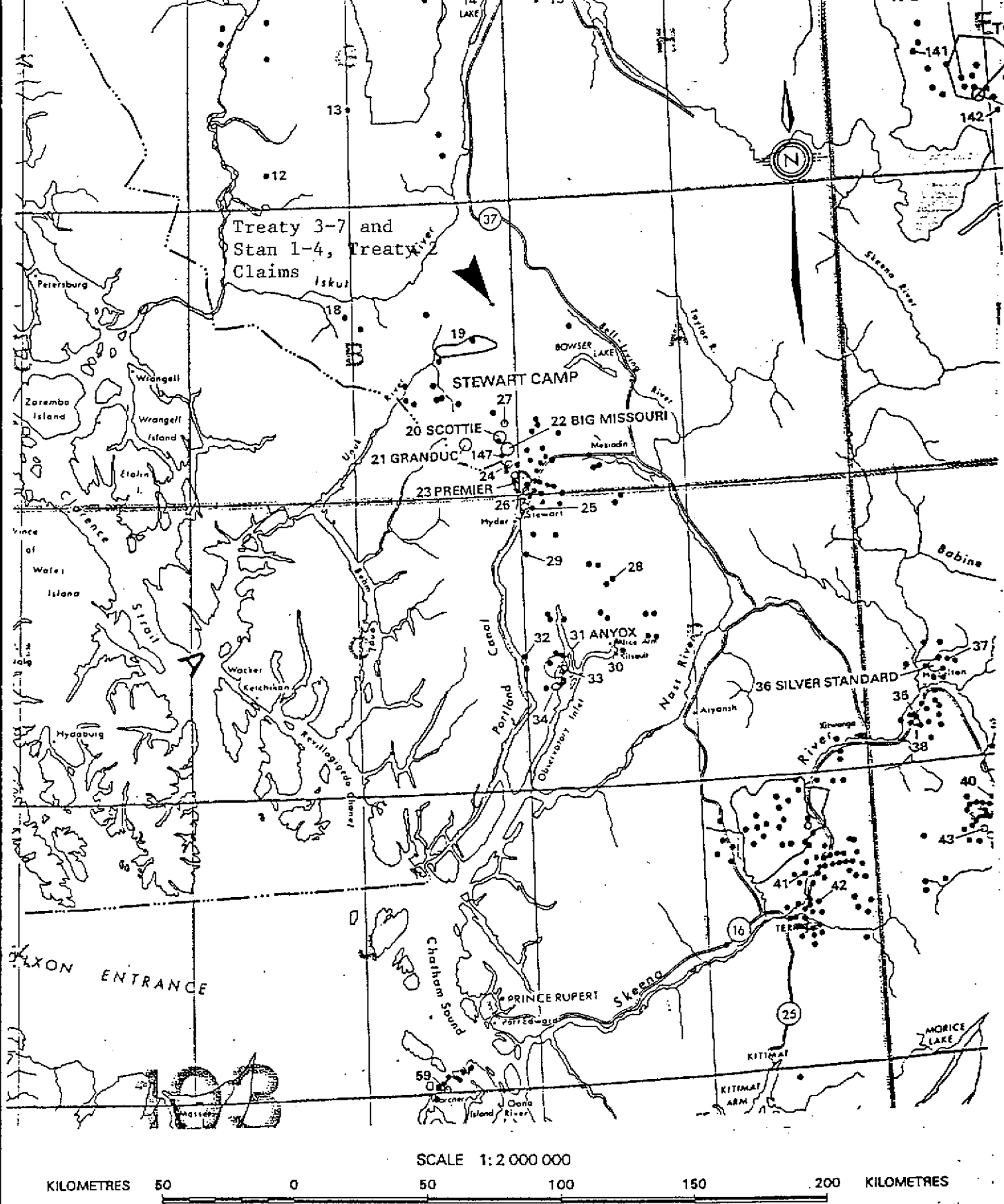
Location and Access

The claims are located approximately 90 air-kilometers north of Stewart, British Columbia (Figure 1). Approximate longitude and latitude is 130°05' west and 56°38' north respectively. The property area is confined to map sheet NTS 104B/9 within the Skeena Mining Division.

Access to the claim area may be gained utilizing helicopters based in Stewart or Bell II on Highway 37. Daily access to the claim area was accomplished by utilizing a helicopter based at Bell II located approximately 25 air-kilometers southwest of the above truck stop on Highway 37.

Physiography and Topography

The property area lies within the steep, rugged coastal mountain range with elevations varying from 2600 ft (792 m) to 6430 ft (1960 m) above sea level (Figures 2a and 2b). The area is drained by the Unuk River and Treaty Creek drainage systems. Many smaller, swift running streams generally flow year round as high level snow packs and icefields are common. The southern portion of the property



TREATY CREEK AREA
SKEENA MINING DIVISION

NTS 104B/9

REGIONAL LOCATION MAP

Figure 1

borders and encompasses parts of South Treaty and Drysdale Glaciers.

Treeline is located between 4000 - 4500 ft (1020 - 1372 m) and includes some dense alpine forest. Generally the steeper slopes host only tag alder and devils club well below the treeline. Above treeline, alpine mosses, grasses, flowers and lichen occur. Glacial till is thin and excessive overburden is confined to the Treaty Creek valley floor. Outcrop exposure is good as permanent snow and icefields only cover 10-15% of the area.

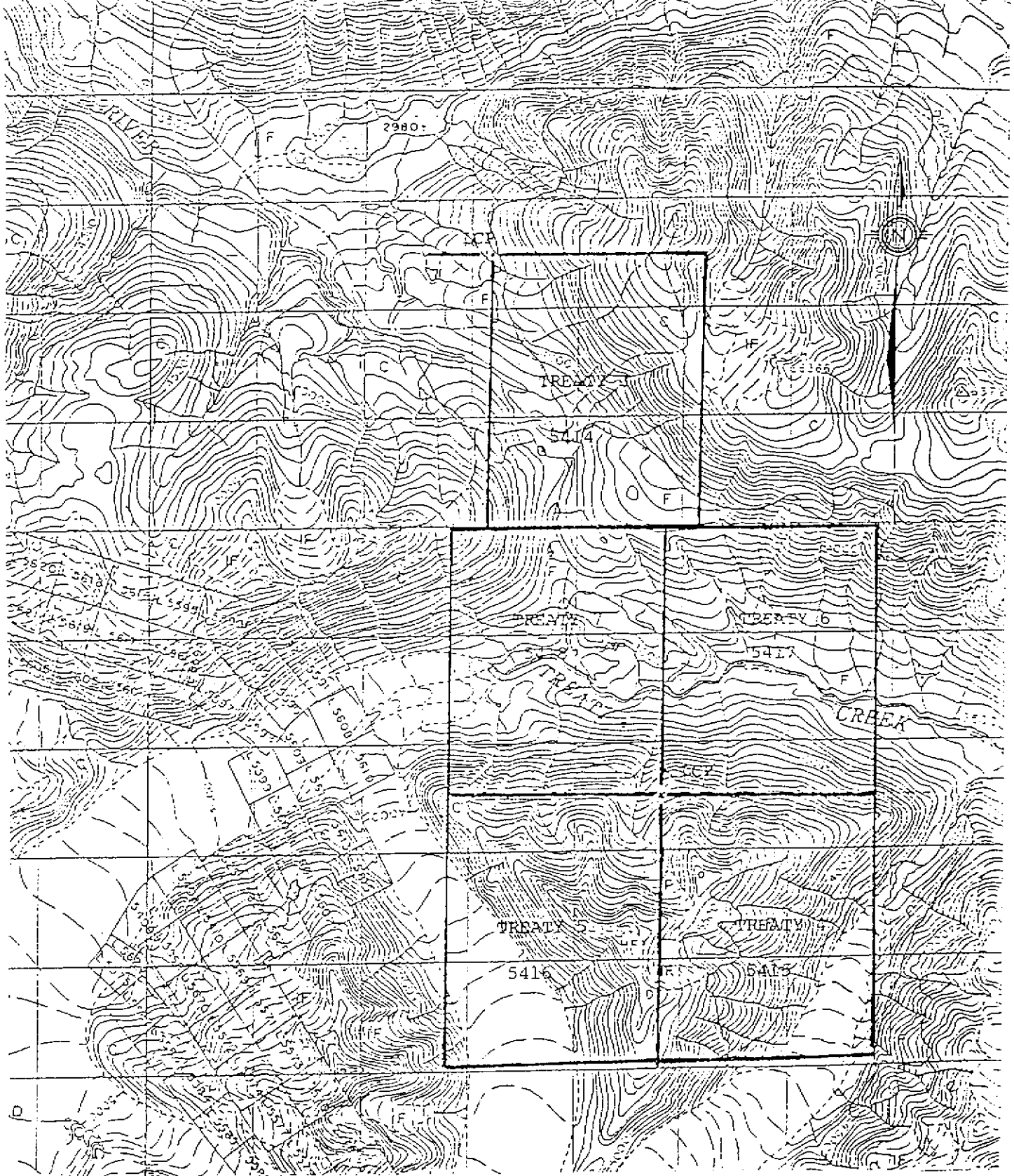
Summers can vary from hot and dry to very cold and wet. The prospecting-mapping-sampling field season is restricted to early June to late September, limited by snow accumulation and fierce winter weather.

Property Ownership

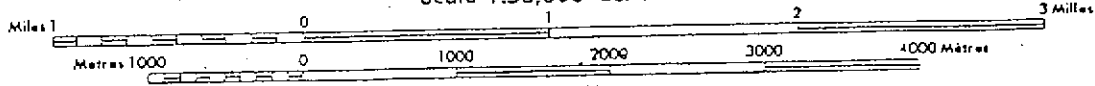
The property consists of 200 units divided into 2 groups.

The Treaty Claim Group consists of 100 units or five 20 unit claims as follows:

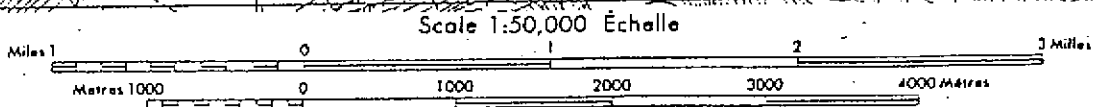
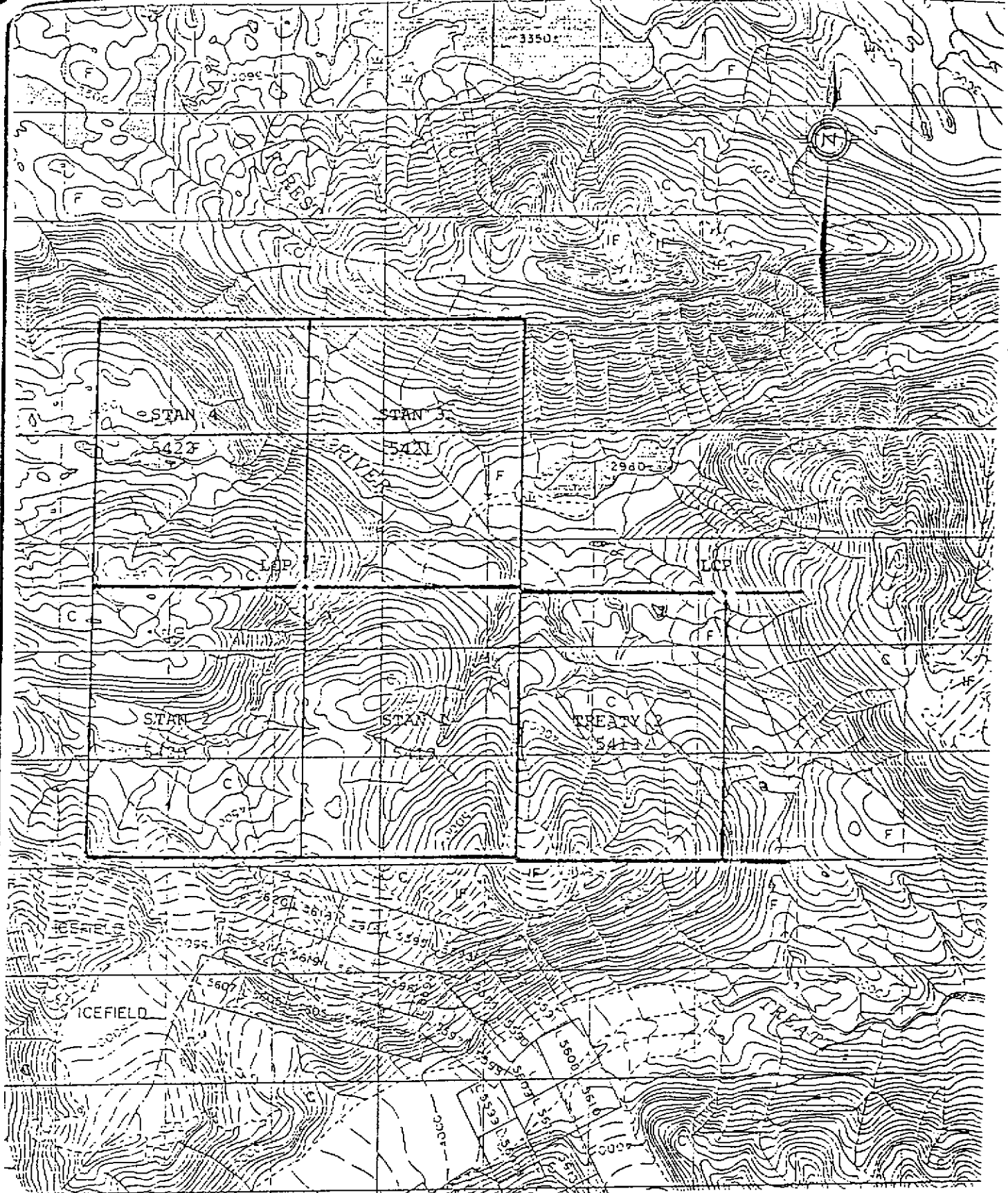
<u>Claim</u>	<u>Record Number</u>	<u>Record Date</u>	<u>Number of Units</u>
Treaty 3	5414	June 25, 1986	20
Treaty 4	5415	June 25, 1986	20
Treaty 5	5416	June 25, 1986	20
Treaty 6	5417	June 25, 1986	20
Treaty 7	5418	June 25, 1986	20



Scale 1:50,000 Échelle



TREATY CREEK AREA SKEENA MINING DIVISION	NTS 104B/9
CLAIM LOCATION MAP TREATY 3-7	Figure 2 a



TREATY CREEK AREA SKEENA MINING DIVISION		NTS 104B/9
CLAIM LOCATION MAP	TREATY 2 and STAN 1-4	Figure 2 b

The Stan Claim Group consists of 100 units or five 20 unit claims as follows:

<u>Claim</u>	<u>Record Number</u>	<u>Record Date</u>	<u>Number of Units</u>
Stan 1	5419	June 25, 1986	20
Stan 2	5420	June 25, 1986	20
Stan 3	5421	June 25, 1986	20
Stan 4	5422	June 25, 1986	20
Treaty 2	5413	June 25, 1986	20

The claims were staked by E.R. Kruchkowski in 1986 and transferred to Catear Resources Ltd., May 1, 1987. The exact location of these claims would be subject to surveys (Figures 2a and 2b).

Personnel and Operations

E.R. Kruchkowski Consulting Ltd. personnel were utilized between June 18 to June 25, 1988. Personnel include the following:

Ed Kruchkowski	Geologist	10 days
Phil Van Angerum	Geologist	9 days
Howard Christensen	Assistant	9 days
Colin Christensen	Assistant	9 days
Jason Smith	Assistant	5 days
Bill Nielsen	Prospector	5 days
Corey Kruchkowski	Assistant	5 days

Accommodations were provided at a tent camp located at Bell II approximately 25 air-kilometers northeast of the property area. Daily access to the claims from the Bell II camp was gained utilizing a Northern Mountain Bell 206 helicopter based at the truck stop on Highway 37. Personnel and supplies were mobilized to the camp via truck from Calgary, Alberta.

The primary focus of the 1988 exploration program was a more detailed study of metal contents in previous sediment sampling programs. These samples were obtained in the 1987 and 1988 silt

sampling programs. Continued reconnaissance prospecting and outcrop chip sampling was conducted in 1990 as an extension to the 1987 and 1988 geochemical programs.

The stream sediment sampling was located in areas of little or no coverage from previous surveys. The samples were screened to a minus 1 mm mesh size and sufficient sample material was gathered to fill a standard kraft paper soil sample bag. All sites were flagged with pink-glo flagging tape with corresponding sample numbers. Rock geochemical samples were taken as grabs and were generally representative of the rocks.

Previous Work

Prior to being staked in 1986, the Treaty and Stan property had no previous work documented. In 1987, E.R. Kruchkowski Consulting personnel obtained significant gold values in silt samples taken. A total of 29 rock and 38 silt samples were collected while prospecting and mapping the area.

The adjacent area to the west of the claims has had an extensive work history for such a remote location. The area to the immediate north, south and east is unstaked.

An extensive gossanous outcrop has been a focus of exploration effort for several years on the adjoining western property. The gossan is located on the southeast valley wall of Treaty Glacier. These claims are solely owned by Teuton Resources and named the Treaty (not to be confused with the Treaty 2-7 claims) and TR1-7 claims.

During 1929 and 1930, a B.C.D.M. annual report documents that the extensive gossan extending over the Treaty, TR1-4, 6 and 7 claims was the focus of exploration efforts. The company, Consolidated Mining and Smelting Company of Canada Ltd., located 57 surveyed crown-granted claims and in 1931 exploration ended. The

exploration results were never published. The British Columbia Miner (1928) notes that prospectors Williams and Knipple obtained \$3.50 gold and silver values associated with heavy arsenic content.

In 1953, Williams and Knipple discovered a small silver-sulphide vein south of the Treaty claim, and large tetrahedrite boulders on the ice surface (location is unspecified). A geophysical survey identified a significant magnetic anomaly at the junction of Treaty and South Treaty Glaciers in 1967.

E & B Explorations Ltd. conducted a rock geochemistry and prospecting program in 1981 on the Treaty claim, but failed to outline any gold anomalies. Teuton Resources carried out a prospecting program in 1984 on the Treaty claim and surrounding Electrum claims (now restaked at the TR claims). They too were unsuccessful in identifying any gold anomalies in outcrop, however, anomalous gold values were obtained in float and silt samples.

In 1985, Teuton Resources carried out a heavy stream sediment sampling program and identified one highly anomalous gold value on the Treaty claim. Teuton Resources then executed a rock geochemistry sampling program in 1986 and isolated two random gold anomalies. Generally the program hosted poor results.

In 1987, E.R. Kruchkowski Consulting personnel carried out an extensive prospecting and rock geochemistry program on behalf of Teuton Resources Ltd. The result of the summer exploration effort yielded the discovery of an extremely high-grade gold-skarn deposit located on the north slope of the Treaty Glacier. Values as high as 28 opt gold across a four foot width were reported. The gold showings are known as the "Konkin Gold Zone" and the "Konkin North" occurrences.

Subsequent diamond drilling of the Konkin-North gold-skarn failed to encounter coarse native gold as observed on surface in the three holes drilled totalling 600.5 feet, however, 15 feet of .3 opt gold

was encountered in DDH-87-1. Unfortunately harsh winter elements in the late fall cut short the diamond drill program and the majority of the gold-skarn remains untested by diamond drilling.

During 1988, a detailed geochemical survey was undertaken on the property with significant gold and silver values obtained from silt and float specimens. The follow-up silt sampling program confirmed the presence of anomalous silver and gold values as high as 12.4 ppm silver and +1000 ppb gold (assayed to .220 opt gold). Unfortunately very few economically significant gold or silver values were obtained from chip sampling various sediments, volcanics and barren quartz veins. Yet, float samples of pyritic sediments and volcanics yielded gold and silver values of 0.92 opt gold and 13.7 ppm silver. The source of the anomalous float samples remains undetermined.

In the period in 1988-89, Tantalus has explored the adjoining Treaty Creek property of Teuton Resources. Drilling has indicated spotty but significant results. In 1990, a new base metal - precious metal zone in a quartz stock work system has been announced.

GEOLOGICAL SURVEYS

Regional Geology

The Treaty Creek property lies in the Stewart area, east of the Coast Crystalline Complex and within the western boundary of the Bowser Basin. Rocks in the area belong to the Mesozoic, Stuhini and Hazelton Group and have been intruded by plugs of both Cenozoic and Mesozoic age.

The base of the volcanic rocks appears to be triassic in age and consists of brown, black and grey, mixed sedimentary rocks interbedded with medium to dark green, mafic to intermediate volcanic and volcanoclastic rocks. The Stuhini Group appears to be conformably overlain by the Hazelton Group.

At the base of the Hazelton Group is the Lower Jurassic Marine (submergent) and non-marine (emergent) volcanoclastic Unuk River Formation. This is overlain at steep discordant angles by a second, lithologically similar, middle Lower Jurassic volcanic cycle (Betty Creek Formation), in turn overlain by an upper Lower Jurassic dacitic lapilli tuff horizon (Mt Dilworth Formation). Middle Jurassic non-marine sediments with minor volcanics of the Salmon River Formation unconformably overlie the above sequence.

The oldest rocks in the area belong to the Lower Jurassic Unuk River Formation which forms a north-northwesterly trending belt extending from Alice Arm to the Iskut River. It consists of green, red and purple volcanic breccia, volcanic conglomerate, sandstone and siltstone with minor crystal and lithic tuff, limestone, chert and coal. Also included in the sequence are pillow lavas and volcanic flows.

In the property area the Unuk River Formation is unconformably overlain by middle Lower Jurassic rocks from the Betty Creek Formation. The Betty Creek Formation is another cycle of trough-

filling sub-marine pillow lavas, broken pillow breccias, andesitic and basaltic flows, green, red, purple and black volcanic breccia, with self erosional conglomerate, sandstone and siltstone, and minor crystal and lithic tuffs, chert, limestone and lava.

The upper Lower Jurassic Mt Dilworth Formation consists of a thin sequence varying from black carbonous tuffs to siliceous massive airfall lapilli tuffs and felsic ash flows. Minor interbedded sediments and limestone are present in the sequence. Locally pyritic varieties form strong gossans.

The Middle Jurassic Salmon River Formation is a late to post volcanic episode of banded, predominately dark coloured, siltstone, greywacke, sandstone, intercalated calcarenite, minor limestone, argillite, conglomerate, littoral deposits, volcanic sediments and minor flows.

According to E.W. Grove, the majority of the rocks from the Hazelton Group were derived from the erosion of andesitic volcanoes subsequently deposited as overlapping lenticular beds varying laterally in grain size from breccia to siltstone.

Mr. Alldrick's work has shown several volcanic centres in the property area. Lower Jurassic volcanic centres in the Unuk River Formation are located in the Big Missouri Premier area, and in the Brucejack Lake area. Volcanic centres within the Lower Jurassic Betty Creek Formation are in the Mitchell Glacier and Knipple Glacier areas.

There are various intrusives in the area. The granodiorites of the Coast Plutonic Complex largely engulf the Mesozoic volcanic terrain to the west. East of these (in the property area), smaller intrusive plugs range from quartz monzonite to granite to highly felsic; some are, likely, related late phase offshoots of the Coast plutonism, others are synvolcanic and tertiary. Double plunging, northerly-trending synclinal folds (Mitre syncline, Dilworth



FROM: Geology of the Unuk River-Salmon River-Anyox Map Area Bulletin 63.
 British Columbia Ministry of Mines & Petroleum Resources

BIGHORN DEVELOPMENT
 CORPORATION

NTS 104B/9
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GENERAL GEOLOGY

FIGURE 3

MESOZOIC


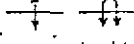
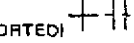

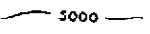





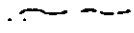



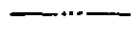



MIDDLE JURASSIC
SALMON RIVER FORMATION

- 16 SILTSTONE, GREYWACKE, SANDSTONE, SOME CALCARENITE, MINOR LIMESTONE, ARGILLITE, CONLOMERATE, LITTORAL DEPOSITS
- 15 RHYOLITE, RHYOLITE BRECCIA; CRYSTAL AND LITHIC TUFF
- 14 BETTY CREEK FORMATION
- 14 PILLOW LAVA, BROKEN PILLOW BRECCIA (a); ANDESITIC AND BASALTIC FLOWS (b)
- 13 GREEN, RED, PURPLE, AND BLACK VOLCANIC BRECCIA, CONLOMERATE, SANDSTONE, AND SILTSTONE (a); CRYSTAL AND LITHIC TUFF (b); SILTSTONE (c); MINOR CHERT AND LIMESTONE (INCLUDES SOME LAVA (+14)) (d)

LOWER JURASSIC
UNUK RIVER FORMATION

- 12 GREEN, RED, AND PURPLE VOLCANIC BRECCIA, CONGLOMERATE, SANDSTONE, AND SILTSTONE (a); CRYSTAL AND LITHIC TUFF (b); SANDSTONE (c); CONGLOMERATE (d); LIMESTONE (e); CHERT (f); MINOR COAL (g)
- 11 PILLOW LAVA (a); VOLCANIC FLOWS (b)

SYMBOLS

- ADIT 
- ANTICLINE (NORMAL, OVERTURNED) 
- BEDDING (HORIZONTAL, INCLINED, VERTICAL, CONTORTED) 
- BOUNDARY MONUMENT 
- CONTOURS (INTERVAL 1,000 FEET) 
- FAULT (DEFINED, APPROXIMATE) 
- FAULT (THRUST) 
- FAULT MOVEMENT (APPARENT) 
- FOLD AXES, MINERAL LINEATION (HORIZONTAL, INCLINED) 
- FOSSIL LOCALITY 
- GEOLOGICAL CONTACT (DEFINED, APPROXIMATE) 
- GLACIAL STRIAE 
- GRAVEL, SAND, OR MUD 
- HEIGHT IN FEET ABOVE MEAN SEA LEVEL 
- INTERNATIONAL BOUNDARY 
- JOINT SYSTEM (INCLINED, VERTICAL) 
- MARSH 
- MINING PROPERTY 

FROM: Geology of the Unuk River-Salmon River-Anyox Map Area Bulletin 63,
British Columbia Ministry of Mines & Petroleum Resources

BIGHORN DEVELOPMENT CORPORATION	NTS 104B/9
TABLE OF FORMATIONS	FIGURE 4

Syncline Spider anti-cline) of the Unuk River and Mt Dilworth Formations dominate the structural setting of the area. These folds are locally disrupted by small east-overthrusts on strikes parallel to the major fold axis, cross-axis steep wrench faults which locally turn beds, selective tectonization of tuff units, and major northwest faults which turn beds. A large fault zone extending along Harrymel Creek south to the South Unuk River has been indicated by the government survey. Figure 3 shows the regional geology of the Treaty Creek property area (Grove).

Local Geology

The property area is mapped by E.W. Grove as being predominately underlain by Middle Jurassic Salmon River Formation. The sedimentary units include: siltstone, greywacke, sandstone, calcarenite, minor limestone, argillite, conglomerate and littoral deposits. Mapping and prospecting traverses confirm the presence of siltstone, greywacke and argillite. Some minor greywacke/lithic tuff is also noted. Grove also notes a Middle Jurassic, crystal and lithic tuff of the Betty Creek Formation in the southwest region of the Treaty 3-7 Claim Group. Based on 1987 and 1988 field observations, these rocks appear to be tightly folded into small anticlines and synclines. Due to the steep topographic nature of the structural occurrence, lithological confirmation is hindered.

The 1987 reconnaissance mapping crew notes dacitic porphyry (crystal tuff), dacitic-andesitic agglomerate, dark green-mauve andesite and feldsic/silicified lenses along the valley floor, bordering the South Treaty Glacier in the southwest portion of the Treaty 3-7 Claim Group. These rocks, according to Grove, dip 40° - 50° to the east. Work done in 1990 indicates that the dacitic rocks are part of the Mt Dilworth formation that strikes roughly east-west on Treaty 5 with a 40° - 50° dip to the north. As a result the formation forms a loop in the SW corner of Treaty 5 due to elevation difference from the ridge top to the valley floor. The Mt Dilworth is a thin, siliceous unit, weakly pyritic on the

Treaty 5. Total thickness appears to be 25 - 30 m and is underlain by purple to red Betty Creek volcanics and overlain by thinly bedded argillites and black volcanic pyroclastics.

The Mt Dilworth is also exposed on the Stan 2 claim where it trends NW - SE across the southwest corner. Here the unit appears more vertical with a dip of 85° to the NE.

The Mt Dilworth formation on the Stan 2 varies from a dense siliceous rock, possibly flows to a thinly banded crystal tuff. The formation has abundant pyrite in this area and weathers a distinct orange-brown. It is approximately 20 meters thick and is overlain by graphitic, pyritic argillites with minor limestone lenses. The argillite is approximately 50 meters thick and is overlain by a thick red felsic pyroclastic. Below the Mt Dilworth, red cherty volcanics of the Betty Creek formation were noted.

Also in the SW corner of the Stan 2 claim, a feldspar porphyry stock was noted. The rock consists of coarse euhedral to anhedral crystals of white feldspar up to 2 cm in a greenish groundmass. Crystals form up to 30% of the rock. A series of east-west quartz stockwork zones up to 3 m wide are present, peripheral to the intrusive margins. Abundant pyrite is associated along the walls of the quartz veinlets in the stockwork.

A traverse along the ridge tops in Treaty 4 and Treaty 5 indicated interbedded black argillite with coarse andesitic pyroclastics. The rocks trend east west and dip north.

Generally, north of the Treaty Creek, the sediments of the Salmon River Formation dip north between 45° - 70° and exhibit minor schistosity trending east-west and dip steeply to the south. The same sediments to the south of Treaty Creek generally dip 50° - 80° to the east. (Figure 3 and 4).

Economic Geology

The Treaty Property is in a belt of rocks referred to as B.C.'s "Golden Triangle". This "Triangle" encompasses the Iskut River Gold Camp to the west, the Galore Creek Camp to the north, the Unuk River Camp to the east and the Stewart Gold Belt to the south. Besides the recent Eskay Creek discovery, the "Triangle" has two producing gold mines and at least three more in the process. Numerous deposits, including base metal, gold-silver-base metal and silver-base metal deposits are present. The broad distribution of porphyry and mesothermal and epithermal style of mineralization supports the perception of the region as capable of yielding many more discoveries of both precious and base metals.

This "Triangle" hosts a number of gold discoveries and occurrences as follows:

1. Snip Deposit
1.57 million tons of 0.64 oz/ton Au
(Proven and Probable)
2. Johnny Mountain Gold Mine
686,000 tons of 0.57 oz/ton Au
(Drill indicated)
3. E & L Deposit
3.2 million tons of 0.8% Ni & 0.6% Cu
(Drill Indicated)
4. 21 Zone Discovery
3-5 million ounces of Au
(Indicated Potential)
5. Sulphurets Gold Zone
20 million tons of 0.08 oz/ton Au
(Indicated Potential)
6. Snowfield Gold Zone
25 million tons of 0.08 oz/ton Au
(Indicated Potential)
7. Brucejack Gold Deposit
854,072 tons of 0.354 oz/ton Au & 22.94 oz/ton Ag
(Drill Indicated and Inferred)

8. Gold Wedge Deposit
375,000 tons of 0.75 oz/ton Au & 1.0 oz/ton Ag
(Proven and Probable)
9. Kerr Deposit
66 million tons of 0.86% Cu & 0.01 oz/ton Au
(Drill Indicated)
10. Q22/17 Gold Zone
470,000 tons of 0.27 oz/ton Au & 1.31 oz/ton Ag
(Probable)
11. S B Deposit
308,000 tons of 0.505 oz/ton Au & 1.07 oz/ton Ag
(Drill Indicated and Inferred)
12. Big Missouri Deposit
1.86 million tons of 0.091 oz/ton Au & 0.67 oz/ton Ag
(Drill Indicated and Inferred)
13. Silbak Premier Deposit
6.1 million tons of 0.064 oz/ton Au & 2.39 oz/ton Ag
(Drill Indicated & Inferred)
14. Prosperity - Porter Idaho Deposit
911,000 tons of 19.5 oz/ton Ag & 5% Pb, Zn
(Probable)
15. Georgia River Deposit
321,067 tons of 0.839 oz/ton Au & 0.656 oz/ton Ag
(Drill Indicated and Inferred)
16. Dolly Warden Deposit
515,350 tons of 11.04 oz/ton Ag
(Proven, Probable)

Currently several precious metal prospects in the Stewart area are being explored. The important developments in the area in recent years included the mining at the Granduc Mine, the start-up of the Scottie Gold Mines in 1981, the start of production on the Silbak-Premier and Big Missouri prospects by Westmin Mineral Resources and the exploration of the Sulphurets camp by Newhawk-Granduc and Catear Resources as well as the recent discovery at Eskay Creek and the Kerr copper gold deposit.

1. Silbak-Premier - During the period 1918 to 1968, 4,670,170 tons of ore were mined containing 1,804,318 ounces of gold, 40,863,280 ounces of silver, 4,083,635 pounds of copper, 54,628,047 pounds of lead and 17,468,730 pounds of zinc. The property is currently in production with Westmin Resources Ltd. as operator and majority owner.

The ore is restricted to several sulphide-rich shoots enclosed within essentially barren quartz-pyrite zones. Both the ore shoots and the surrounding barren quartz zones are enclosed by irregular zones of quartz-pyrite-sericite alteration. The ore shoots consist of sphalerite, galena, chalcopyrite, pyrrhotite, argentite, tetrahedrite, mercury and electrum within a gangue of quartz-calcite-barite.

Three types of ore occurred in the mine including: (1) stephanite native silver (2) "black sulphide" ore, and (3) lower grade siliceous ore. The surface bonanza ores (stephanite-native silver) and the black sulphide ores contained up to 5% mercury. Silver content within galena averaged 1 oz/ton but ranged up to 55 oz/ton.

In recent years, some geologists have interpreted the ore zones as volcanogenic exhalations.

2. Big Missouri - From 1927 to 1942 the Big Missouri Mine produced 847,615 tons of ore containing 58,384 ounces of gold, 52,677 ounces of silver, and 2,712 pounds of lead. The prospect is currently being explored by Westmin Resources; in 1983 this company published open pit reserves of 1.9 million tons averaging 0.1 oz/ton gold.

The ore body has been described as 200-foot fracture zone laced with quartz-calcite veinlets. The veinlets contain varying but generally small amounts of galena, sphalerite and chalcopyrite. The ore occurs within chloritic schists which have been sericitized, silicified, and pyritized. Silicification would appear to be the most persistent form of alteration. Recent talks by Harlan

Meade of Westmin Resources indicate the possibility that the Big Missouri might contain a number of small lenses of exhalative sulphides with associated alteration zones.

3. Scottie Gold - The Scottie Gold Mine began operation in 1981 at which time reserves were reported as 175,000 tons grading 0.75 oz/ton gold.

Mineralization is described as consisting of erratic, discontinuous masses of sulphide mineralization occurring within siliceous replacement bodies. Sulphides include pyrrhotite, pyrite, arsenopyrite and chalcopyrite with minor sphalerite and galena.

4. Granduc Mine - The Granduc Mine was opened by Esso Minerals Ltd. in 1980 at which time the indicated reserves were 10,890,000 tons using a cut-off of 1.79% copper. The mine closed again in 1983.

5. Eskay Creek (Tom MacKay) - This prospect is owned by Consolidated Stikine Silver Ltd. and Prime Resources Ltd. In 1973 the inferred reserves were reported as 107,200 tonnes using a 0.25 oz/ton gold cut-off.

Prior to 1988, the reported mineralization consisted of stockworks of quartz veins irregularly mineralized with pyrite, tetrahedrite, sphalerite, galena, chalcopyrite and arsenopyrite. These stockworks occur within prominent oxidized knolls or domes.

Subsequent to 1988, Consolidated Stikine Silver Ltd. and Prime Resources Ltd. discovered the Eskay Creek deposits (21B Zone). Gold and silver mineralization occurs as a stratabound sheet traced by drilling over 1000 metres and with a maximum thickness over 200 metres. Mineralization in the zone is hosted within variably sheared and schistose graphite mudstone, carbonaceous debris breccia and rhyolite breccia of the Mt Dilworth formation. The mineralization changes from one with massive to semi-massive

stibnite, realgar and orpiment in the south section to an increase of sulphides, especially pyrite and sphalerite with a relative absence of antimony and mercury-bearing minerals to the north. In addition, gold and silver values increase to the north. At present, reserves are quoted as being in excess of 4,000,000 ounces of gold equivalent.

6. Newhawk-Granduc - The deposits are as follows:

	<u>Present Reserves</u>	<u>Grade</u>	
		<u>opt Au</u>	<u>opt Ag</u>
<u>Newhawk West</u> (partially explored)	854,072	.354	22.94
<u>Catear Goldwedge</u> (partially explored)			
Golden Rocket	319,149	.80	1.12
Discovery	37,980	.63	1.08

The above gold-silver discoveries are structurally controlled, epithermal-mesothermal veins occurring in areas of syenodiorite intrusions and associated with areas of intense sericite (quartz-pyrite) alteration.

Tantalus Resources Ltd. announced a discovery of a new zone of precious and base metals mineralization on the Treaty Creek Project, adjacent to the Treaty property. Systematic prospecting of altered and gossanous andesitic volcanics led to the discovery of the Mama Susu Zone. Within this zone, occurring over an area of approximately 500 metres x 800 metres, are a number of outcrops and numerous angular boulders of sulphide-bearing sheared andesitic volcanics and pyroclastics with quartz veins and stockworks. Although outcrop exposure is limited, shearing within the zone is trending to the northeast. Of the 43 samples collected from outcrop and boulder occurrences throughout the Mama Susu Zone, 31 returned in excess of 1.0 oz/ton silver. Assays from boulder occurrences have returned up to 0.401 oz/ton gold, 100.0 oz/ton silver, 28.6% lead, 15.5% zinc and 1.65% copper.

The close proximity of the property to known deposits, the presence of favourable geology and anomalous gold and silver in silts and rocks make the Treaty property an excellent exploration target.

GEOCHEMICAL SURVEYS

Rock Geochemistry

A total of 108 rock samples were collected during the prospecting and silt sampling program. Samples were sent to Loring Laboratories in Calgary where they were crushed, split and ground to -80 mesh. The samples were analyzed using standard geochemical methods for gold and silver. The 1987 and 1988 pulps from rock geochemistry programs were also analyzed for Cu, Pb, Zn, Sb, Hg and Ba. A total of 30 rock and silt samples were analyzed for Cu, Pb, Zn, Sb, Hg and Ba while a total of 338 rock and silt samples were analyzed for Cu, Sb, Hg and Ba. The rock geochemical survey concentrated on sampling the Mt Dilworth formation and overlying rocks. All samples of the above formation indicated no significant gold or silver values.

Sampling of the quartz stockwork zones near the feldspar porphyry indicated weakly elevated silver values compared to the rest of the rock geochemical survey.

Two float boulders yielded assays of .142 opt and .130 opt gold along the Treaty valley. It is speculated that the source is up valley on the adjoining property.

Silt Geochemistry

A total of 44 silt samples were collected from streams that had little or no previous sampling. The samples were collected and screened to -20 mesh in the field and then placed in appropriately numbered kraft sample bags. These samples were sent to Loring Laboratories in Calgary, Alberta where they were dried, screened to -80 mesh and analyzed for gold and silver using standard geochemical methods. A total of 30 rock and silt pulps from the 1987-88 program were analyzed for Cu, Pb, Zn, Sb, Hg and Ba while

a total of 338 rock and silt pulps were analyzed for Au, Sb, Hg and Ba.

The 1990 silt sampling indicated anomalous gold in stream sediments on the Treaty 7 and Stan 2 claim. This work verified previous anomalous gold in silt samples from the 1987 - 1988 surveys.

The analysis for the other elements outlined a potential zone of enriched zinc values in stream sediments. One sample from Treaty 7, one from Treaty 5 and a number from Treaty 4 indicate an increase in zinc. These samples T5-5 (.11% Zn) on Treaty 7, samples T5-1 (.12% Zn) and samples DL130-134 (421-341 ppm Zn from 1988 survey) on Treaty 4 are substantiated by abundant white stain along the contact of the Mt Dilworth formation and overlying argillites. It is speculated that this white stain is smithsonite caused by the oxidation of zinc minerals along this contact. Weakly anomalous Sb is indicated for samples T5-1 and T5-15. The geochemical analysis of pulps also showed a correlation between elevated Cu, Sb and Hg values.

Figures 4-8 show the metal distribution in rocks and silts.

CONCLUSIONS

1. The property is underlain by Jurassic age volcanic and sedimentary rocks. These rocks host numerous gold-silver deposits in the Stewart-Sulphurets area.
2. The property is adjacent to the high-grade coarse native gold showings of Teuton Treaty and TR claims and the newly announced discovery by Tantalus.
3. Numerous anomalous gold and silver silt samples have been indicated on the property.
4. Elevated zinc values in stream sediments in an area of possible smithsonite stain indicates the potential for zinc mineralization at the contact of Mt Dilworth rhyolite and overlying sediments.
5. The property presents a good potential as an exploration target for gold-silver mineralization. Further work consisting of mapping, detailed rock geochemistry and prospecting is recommended, particularly along the volcanic-sediment contact between the respective Betty Creek and Salmon River Formations.

RECOMMENDATIONS

The recommendations are as follows:

1. An orthophoto study should be initiated to give better survey control.
2. Further prospecting and mapping in the area of elevated zinc in stream sediments.
3. A possible airborne VLF and magnetometer survey over the property area.

Cost of the program is estimated at \$150,000.

STATEMENT OF EXPENDITURES

Mobilization/demobilization	4,000.00
Personnel (wages)	12,850.00
Helicopter	6,342.92
Support	9,750.65
Consumables	287.00
Subsistence	1,025.00
Camp Rental	1,410.00
Report Writing	5,000.00
Typing and Drafting	<u>400.00</u>
Total	<u>\$41,065.57</u>

50% of total on Treaty 3-7 group and 50% on Stan 1-4 and Treaty 2 Claim Group.

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Report on Corey Claim Group, Stewart, B.C., NTS 104B/8W,
Skeena Mining Division

CERTIFICATE

I, EDWARD R. KRUCKOWSKI, Geologist, residing at 23 Templeside Bay, N.E., in the City of Calgary, in the Province of Alberta, hereby certify that:

1. I received a Bachelor of Science degree in Geology from the University of Alberta in 1972.
2. I have been practising my profession continuously since graduation.
3. I am a member of the Association of Professional Engineers, Geologists and Geophysicists of Alberta.
4. I am a consulting geologist on behalf of Catear Resources Ltd.
5. This report is based on a review of reports, documents, maps and other technical data on the property area and on my experience and knowledge of the area obtained during programs in 1974 - 1990.

Date

Sept 19/90


E.R. Kruckowski, B.Sc.

APPENDIX I
ANALYTICAL DATA 1987 - 1988

To: CATEAR RESOURCES LTD.,
400, 255 - 17th Avenue S.W.,
Calgary, Alberta T2S 2T8

 ATTN: Jack Wyder

File No. 33458
 Date June 4, 1990
 Samples Soil/Silt/Rock



Certificate of Assay

LORING LABORATORIES LTD.

Page # 1

SAMPLE NO.	PPM Cu	PPM Pb	PPM Zn	PPM Sb	PPB Hg	PPM Ba
Geochemical Analysis						
18001	+1000	+1000	+1000	118.0	46000	123399
18002	+1000	+1000	+1000	235.0	21600	304404
18003	490	357	+1000	21.0	3300	25681
18004	95	104	725	3.5	4000	6468
18005	52	58	343	2.1	6600	2393
18006	20	61	248	3.3	4100	714
18007	53	12	315	2533.0	6500	841
18008	128	58	268	34.8	4300	32
18009	63	19	176	16.5	4200	1010
18010	110	23	156	1.1	4000	971
18011	83	18	165	1.6	1500	2006
18012	39	21	195	0.9	1800	746
18013	21	9	131	0.7	3200	1494
18014	-	-	-	12.0	5700	1643
18015	-	-	-	25.6	5200	1150
18016	-	-	-	18.7	4300	5065
18017	-	-	-	62.1	17000	2678
18018	-	-	-	4.0	1900	1704
18019	-	-	-	3.0	2500	3734
18020	-	-	-	1.8	4000	529
18021	-	-	-	0.3	1700	759
18022	-	-	-	0.5	2300	1172
18023	-	-	-	0.9	2500	1946
18024	-	-	-	0.6	2400	1145
18025	-	-	-	1.8	5400	497
18026	-	-	-	1.4	3600	1177
18027	-	-	-	0.5	2600	1659
18028	-	-	-	0.1	2500	537
18029	-	-	-	1.1	4100	1463
18030	-	-	-	1.5	3600	1064

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Reagents retained one month.
 Samples retained one month.
 Unless specific arrangements
 are made in advance.

Ray Gandy
 Assayer

To: CATEAR RESOURCES LTD.
400, 255 - 17th Avenue S.W.,
Calgary, Alberta T2S 2T8

 ATTN: Jack Wyder

File No. 33458
 Date June 4, 1990
 Samples Soil/Silt/Rock



Certificate of Assay

LORING LABORATORIES LTD.

Page # 2

SAMPLE NO.	PPM Cu	PPM Pb	PPM Zn	PPM Sb	PPB Hg	PPM Ba
18031	-	-	-	1.7	5000	1339
18032	-	-	-	0.2	2600	312
18033	-	-	-	0.4	2000	591
18034	-	-	-	0.6	1300	1043
18035	-	-	-	1.4	3600	1322
18036	-	-	-	0.2	1300	257
18037	-	-	-	0.6	680	399
18038	-	-	-	14.1	3500	17502
18039	-	-	-	1.0	1600	950
18040	-	-	-	0.8	2000	1732
18041	-	-	-	0.4	500	1848
18042	-	-	-	2.5	950	254
18043	-	-	-	1.2	620	218
18044	-	-	-	0.6	1100	166
18045	-	-	-	3.9	2900	820
18046	-	-	-	0.6	410	243
18047	-	-	-	2.0	1100	822
18048	-	-	-	15.7	4300	4972
CGS-03	1	240	+1000	2.7	5400	236
CG-01	123	105	540	NSS	NSS	NSS
CG-02	NSS	NSS	NSS	NSS	NSS	NSS
CG-04	60	14	625	3.7	1600	769
CG-05	26	17	240	2.5	930	1179
CG-06	41	10	256	2.5	1200	1114
CG-07	72	10	135	2.4	1500	1793
CG-08	35	35	685	11.6	2600	562
C-36-1	58	7	148	0.1	1300	1060
C-38-GS-2	19	2	49	0.4	1900	1035
C-38-GS-3	27	2	87	0.4	1200	993
C-38-GS-4	21	1	67	0.2	800	1136
C-39-GS-1	49	28	203	1.3	1500	1226
✓S2-1	64	185	370	29.3	3600	2107

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
 Pulps retained one month
 unless specific arrangements
 are made in advance.

Jack Wyder
 Assayer

To: CATEAR RESOURCES LTD.,

400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Jack Wyder

File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 3

SAMPLE NO.	PPM Cu	PPM Pb	PPM Zn	PPM Sb	PPB Hg	PPM Ba
✓S2- 2	64	36	180	11.1	5700	5298
✓S2- 3	30	17	190	3.5	3500	2968
S3-01	25	13	200	1.9	1800	1680
✓S3-02	24	6	134	0.7	2000	1618
S3-03	21	6	107	0.8	1800	1699
✓S3-04	31	7	137	0.9	1900	1031
✓S3-05	27	7	146	1.2	2800	1322
✓S3-06	19	4	176	0.5	1300	686
✓S4-02	37	5	169	1.1	1700	802
✓S4-03	49	6	206	1.1	1400	943
✓S4-04	45	8	196	1.1	1600	890
✓S4-05	47	8	198	1.1	2200	751
✓T2-01	23	7	91	0.7	2800	1339
✓T3-01	8	8	66	0.2	3300	686
✓T3-02	35	10	175	1.0	1900	886
✓T3-03	20	6	112	0.5	1500	857
T3-04	39	6	143	0.8	1300	1153
✓T3-07	36	7	120	1.1	1500	1249
✓T4-01	44	6	146	1.9	1100	988
✓T4-02	47	10	173	1.8	2500	1581
✓T4-03	36	8	126	1.2	1600	917
✓T4-04	23	7	80	0.9	820	913
✓T4-05	38	15	135	1.4	1300	1178
✓T5-01	85	10	+1000	11.8	1400	1480
T5-02	37	8	160	1.8	2000	1339
T5-03	27	6	163	2.0	2900	1418
T5-04	25	6	130	1.8	950	1036
✓T5-05	97	7	+1000	15.3	1300	1676
✓T5-06	58	22	165	6.9	1600	2303
✓T6-01	34	6	128	0.2	680	1287
✓T6-02	37	9	129	1.4	1900	2051
✓T6-03	33	8	120	0.8	1200	1261

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
Pulps retained one month.
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Assayer

To: CATEAR RESOURCES LTD.,

File No. 33458

400, 255 - 17th Avenue S.W.,

Date June 4, 1990

Calgary, Alberta T2S 2T8

Samples Soil/Silt/Rock

ATTN: Jack Wyder



Certificate of Assay LORING LABORATORIES LTD.

Page # 4

SAMPLE NO.	PPM Cu	PPM Pb	PPM Zn	PPM Sb	PPB Hg	PPM Ba
✓T6-04	33	8	122	0.9	1050	2276
✓T6-05	38	8	139	0.9	1600	1668
✓T6-06	35	9	130	1.0	1800	988
✓T7-03	39	6	144	0.8	1500	1421
✓T7-04	39	11	130	NSS	NSS	NSS
T7-05	35	35	128	3.5	1600	1351
✓T7-06	41	9	112	1.3	1400	1490
✓ST1-GS-05	35	10	133	1.3	1500	984
✓ST1-GS-06	48	8	240	0.8	2100	924
✓ST1-GS-07	21	6	122	0.5	2300	1606
✓KK-88-01	9	-	-	0.4	200	1015
✓KK-88-02	48	-	-	0.9	1200	1319
✓KK-88-03	47	-	-	1.1	1100	1185
✓KK-88-04	36	-	-	1.2	1300	893
✓KK-88-05	7	-	-	0.1	180	907
✓KK-88-06	6	-	-	0.2	160	683
✓KK-88-07	42	-	-	1.4	1700	1572
✓KK-88-08	9	-	-	0.3	160	332
✓KK-88-09	18	-	-	1.3	220	454
✓KK-88-10	30	-	-	2.8	750	859
✓KK-88-11	24	-	-	1.4	410	825
✓KK-88-12	14	-	-	0.1	230	2153
✓KK-88-13	9	-	-	0.2	50	41
✓KK-88-14	6	-	-	0.3	90	170
✓KK-88-15	3	-	-	0.1	50	140
✓KK-88-16	8	-	-	0.2	120	263
✓KK-88-17	47	-	-	1.0	850	1012
✓KK-88-18	23	-	-	1.3	380	518
✓KK-88-19	8	-	-	0.1	90	210
✓KK-88-20	7	-	-	0.1	80	220
✓KK-88-21	10	-	-	0.1	300	204
✓KK-88-22	6	-	-	0.1	140	281

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
Pulps retained one month
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Assayer

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File No. 33458

400, 255 - 17th Avenue S.W.,

Date June 4, 1990

Calgary, Alberta T2S 2T8

Samples Soil/Silt/Rock

ATTN: Jack Wyder



Certificate of Assay LORING LABORATORIES LTD.

Page # 5

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓KK-88-23	10	0.2	310	148
✓KK-88-24	44	1.3	600	901
✓DL-88-40	69	10.1	460	2354
✓DL-88-41	77	9.5	550	2551
✓DL-88-42	57	6.8	570	2589
✓DL-88-43	35	2.1	270	1557
✓DL-88-44	40	6.9	320	1647
✓DL-88-45	34	1.7	240	1618
✓DL-88-46	28	2.4	230	1418
✓DL-88-47	35	25.2	220	1528
✓DL-88-48	32	1.3	260	1643
✓DL-88-49	28	2.2	200	1529
✓DL-88-50	29	2.7	180	1680
✓DL-88-51	39	3.3	220	1571
✓DL-88-52	31	2.7	230	1557
✓DL-88-53	30	3.4	180	1573
✓DL-88-54	29	2.8	210	1669
<i>Rk</i> ✓DL-88-56	185	90.6	890	18
✓DL-88-57	44	0.1	350	1638
✓DL-88-58	33	1.7	210	1393
✓DL-88-59	34	3.9	300	1388
✓DL-88-60	36	3.6	480	1648
✓DL-88-61	38	3.5	460	1319
✓DL-88-62	33	2.4	400	1461
✓DL-88-63	60	3.0	270	1808
✓DL-88-64	31	1.8	220	1198
✓DL-88-65	37	2.7	480	1473
<i>set Rks.</i> ✓DL-88-66	44	2.7	270	2749
✓DL-88-67	49	3.3	520	584
✓DL-88-68	567	35.1	3800	214
✓DL-88-69	41	1.9	350	1480
✓DL-88-70	40	3.2	410	1631

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

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Pulps retained one month,
unless specific arrangements
are made in advance.


Assayer

To: CATEAR RESOURCES LTD.,

400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Jack Wyder

File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 6

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓DL-88-71	38	2.8	460	1470
DL-88-72	100	4.3	680	3705
DL-88-73	14	2.3	310	3397
DL-88-74	26	4.0	10	341
✓DL-88-75	38	3.1	360	3862
✓DL-88-76	35	3.4	340	1358
✓DL-88-77	43	3.4	500	1511
✓DL-88-78	47	3.2	330	1493
✓DL-88-79	38	2.0	460	1762
✓DL-88-80	39	1.5	590	1243
✓DL-88-81	40	1.4	830	1449
✓DL-88-82	37	1.5	800	1211
✓DL-88-83	36	0.7	650	1408
✓DL-88-84	41	1.6	880	1252
✓DL-88-85	40	1.4	820	1284
✓DL-88-86	43	1.2	1500	1116
✓DL-88-87	43	2.1	1300	1536
✓DL-88-88	48	1.7	1200	1666
✓DL-88-89	42	1.5	1500	1689
✓DL-88-90	45	1.9	830	1461
✓DL-88-91	42	1.9	900	1615
✓DL-88-92	30	1.0	210	923
✓DL-88-93	29	1.0	220	991
✓DL-88-94	29	1.0	200	1011
✓DL-88-95	34	1.0	190	832
✓DL-88-96	29	1.2	330	915
✓DL-88-97	30	1.0	360	892
✓DL-88-98	31	1.1	350	953
✓DL-88-99	34	0.1	150	919
✓DL-88-100	43	2.2	350	1309
✓DL-88-101	39	2.1	270	1191
✓DL-88-102	39	1.8	200	1316

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
Pulps retained one month
unless specific arrangements
are made in advance.


Assayer

To: CATEAR RESOURCES LTD.,

File No. 33458

400, 255 - 17th Avenue S.W.,

Date June 4, 1990

Calgary, Alberta T2S 2T8

Samples Soil/Silt/Rock

ATTN: Jack Wyder



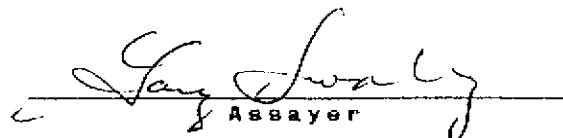
Certificate of Assay LORING LABORATORIES LTD.

Page # 7

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
DL-88-103	41	2.1	230	1279
DL-88-104	42	2.3	160	1317
DL-88-105	42	2.1	220	1309
DL-88-106	39	2.2	240	1264
DL-88-107	43	2.3	330	1330
DL-88-108	43	2.2	200	1345
DL-88-109	42	2.1	220	1323
DL-88-110	47	2.2	290	1288
DL-88-111	48	2.3	300	1314
DL-88-112	42	6.4	830	1849
DL-88-113	49	1.4	270	1197
DL-88-114	51	1.8	400	1291
DL-88-115	47	1.5	300	1183
DL-88-116	40	1.5	290	1173
DL-88-117*	82	1.3	650	1032
DL-88-118	47	1.6	320	1135
DL-88-119	38	1.3	340	1150
DL-88-120	45	1.4	210	1186
DL-88-121	56	1.4	240	1123
DL-88-122	51	1.5	220	1118
DL-88-123	38	1.2	300	1167
DL-88-124	40	1.1	430	890
DL-88-125	41	1.2	320	859
DL-88-126	41	1.1	250	859
DL-88-127	42	1.1	220	896
DL-88-128	41	1.1	340	845
DL-88-129	50	1.2	310	937
DL-88-130	86	2.2	400	1107
DL-88-131	88	2.1	430	1071
DL-88-132	94	2.7	380	1111
DL-88-133	97	2.4	480	1155

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Calgary, Alberta T2S 2T8

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File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 8

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓ DL-88-134	95	2.3	300	1075
✓ DL-88-135	37	1.1	180	1097
✓ DL-88-136	36	1.9	260	1139
✓ DL-88-137	37	2.3	280	1275
✓ DL-88-138	38	1.9	290	1295
✓ DL-88-139	36	2.0	340	1192
✓ DL-88-140	35	2.1	220	1116
✓ DL-88-141	35	2.1	250	1221
✓ DL-88-142	38	1.9	240	1430
✓ DL-88-143	36	1.9	300	1309
✓ DL-88-144	37	1.7	330	1335
✓ DL-88-145	36	2.1	960	1280
✓ DL-88-146	39	1.9	720	1147
✓ DL-88-147	38	1.9	600	1205
✓ DL-88-148	45	1.9	700	1132
✓ DL-88-149	39	1.9	610	1184
✓ DL-88-150	39	1.7	600	1246
✓ DL-88-151	38	1.8	460	1074
✓ DL-88-152	37	1.8	400	1151
✓ DL-88-153	39	1.9	450	1168
✓ DL-88-154	39	2.0	360	1228
✓ DL-88-155	38	1.6	800	1267
✓ DL-88-156	40	1.8	560	1238
✓ DL-88-157	41	1.7	600	1213
✓ DL-88-158	40	1.7	620	1109
✓ DL-88-159	42	1.8	500	1149
✓ DL-88-160	40	1.7	610	1094
✓ DL-88-161	39	1.5	490	1075
✓ DL-88-162	40	1.5	420	1173
✓ DL-88-163	40	1.7	620	1320
✓ DL-88-164	40	1.8	630	1227
✓ DL-88-165	39	2.0	410	1097

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Calgary, Alberta T2S 2T8

ATTN: Jack Wyder

File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 9

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
DL-88-166	38	1.5	700	1133
DL-88-167	39	1.8	380	1065
DL-88-168	38	1.9	420	1365
DL-88-169	41	1.3	360	1605
DL-88-170	39	1.6	400	1467
DL-88-171	42	1.5	470	1467
DL-88-172	44	1.4	960	1542
AJ-88-01	55	1.4	430	1133
AJ-88-02	51	1.4	420	1072
AJ-88-03	59	1.2	560	1119
AJ-88-04	58	1.4	420	1147
AJ-88-05	60	1.3	460	1040
AJ-88-06	53	1.5	470	1042
AJ-88-07	64	1.2	400	1013
AJ-88-08	83	1.8	600	1163
AJ-88-09	81	1.6	540	1117
AJ-88-10	85	1.9	620	1148
AJ-88-11	77	1.8	830	1072
AJ-88-12	78	1.7	540	1102
DJ-88-01	30	0.5	950	1522
DJ-88-02	38	0.9	930	2870
DJ-88-03	44	0.9	1100	1668
DJ-88-04	38	0.9	1200	2300
DJ-88-05	40	1.0	1100	2493
DJ-88-06	35	0.8	760	2579
DJ-88-07	40	0.8	1050	2950
DJ-88-08	39	0.8	1100	2669
DJ-88-09	38	0.9	820	2040
DJ-88-10	35	1.1	1300	1651
DJ-88-11	38	0.9	1200	1248
DJ-88-12	47	0.7	1400	17177
DJ-88-13	48	0.8	2300	2399

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Assayer

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400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Jack Wyder

File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 10

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓DJ-88-14	39	1.0	1100	3391
✓DJ-88-15	41	0.9	1700	2509
✓DJ-88-16	37	1.2	780	4481
✓DJ-88-17	41	0.8	1200	1855
✓DJ-88-18	36	1.1	930	4075
✓DJ-88-19	93	2.4	560	1347
✓DJ-88-20	37	2.6	620	1459
✓DJ-88-21	37	1.3	1050	2016
✓DJ-88-22	36	1.4	820	2650
✓JP-88-01	41	1.3	710	3392
✓JP-88-02	41	1.3	600	1357
✓JP-88-03	35	2.0	490	1227
✓JP-88-04	41	2.1	670	1246
✓JP-88-05	36	2.3	660	1314
✓JP-88-06	41	2.3	900	1423
✓JP-88-07	36	2.2	730	1423
✓JP-88-08	35	2.5	410	1279
✓JP-88-09	31	2.1	460	1507
✓JP-88-10	32	1.3	400	1739
✓JP-88-11	31	2.0	730	1629
✓JP-88-12	34	2.3	640	1234
✓JP-88-13	34	2.5	1050	1323
✓JP-88-14	35	2.5	650	1086
✓JP-88-15	33	2.2	1100	1123
✓JP-88-16	36	2.2	1300	1215
✓JP-88-17	36	2.4	1100	1077
✓AH-88-01	40	4.1	440	2070
✓AH-88-02	23	2.4	330	1337
✓AH-88-03	30	4.3	310	1865
✓AH-88-04	28	3.3	330	2296
✓AH-88-05	24	2.5	360	1593
✓AH-88-06	25	2.6	300	1586

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Assayer

To: CATEAR RESOURCES LTD.,
400, 255 - 17th Avenue S.W.,
Calgary, Alberta T2S 2T8

 ATTN: Jack Wyder

File No. 33458
 Date June 4, 1990
 Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 11

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓AH-88-07	24	2.6	240	1534
✓AH-88-08	23	2.4	250	1708
✓AH-88-09	23	2.7	200	1905
✓AH-88-10	24	2.3	180	1652
✓AH-88-11	20	2.6	230	1849
✓AH-88-12	25	2.7	250	1776
✓AH-88-13	22	3.0	190	1652
✓AH-88-14	22	2.6	260	1416
✓AH-88-15	23	NSS	NSS	NSS
✓AH-88-16	33	NSS	NSS	NSS
✓AH-88-17	26	3.3	220	1867
✓AH-88-18	30	3.6	170	1952
✓AH-88-19	29	3.6	150	1988
✓AH-88-20	21	2.9	180	2071
✓AH-88-21	25	2.7	170	2010
✓AH-88-22	23	2.6	200	1946
✓AH-88-23	25	2.8	180	2586
✓AH-88-24	22	2.8	210	2198
✓AH-88-25	77	9.7	1900	3111
✓AH-88-26	55	9.7	950	3101
✓AH-88-27	62	8.7	200	1923
✓AH-88-28	74	8.8	210	2860
✓AH-88-29	54	7.3	420	2614
✓AH-88-30	25	1.7	200	1451
✓AH-88-31	28	1.8	270	1695
✓AH-88-32	31	1.7	300	1564
✓AH-88-33	34	1.1	220	1434
✓AH-88-34	49	7.0	450	2151
✓AH-88-35	73	9.8	420	3096
✓AH-88-36	46	4.9	580	1748
✓AH-88-37	65	9.1	370	2451
✓AH-88-38	60	8.5	460	2606

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400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Jack Wyder

File No. 33458

Date June 4, 1990

Samples Soil/Silt/Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 12

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓AH-88-39	54	8.7	450	2304
✓AH-88-40	61	7.8	470	2448
✓AH-88-41	32	1.8	340	1381
✓AH-88-42	23	1.5	250	1408
✓AH-88-43	26	1.8	210	1359
✓AH-88-44	25	NSS	NSS	NSS
✓AH-88-45	28	2.3	350	1481
✓AH-88-46	24	1.8	270	1286
✓AH-88-47	26	NSS	NSS	NSS
✓AH-88-48	23	1.8	220	1111
✓AH-88-49	26	NSS	NSS	NSS
✓AH-88-50	NSS	NSS	NSS	NSS
✓AH-88-51	35	1.8	350	1435
✓AH-88-52	32	1.5	250	1484
✓AH-88-53	29	1.8	300	1430
✓AH-88-54	24	1.5	320	1411
✓AH-88-55	28	1.5	340	1572
✓AH-88-56	26	1.9	360	1465
✓AH-88-57	26	1.3	300	1387
✓AH-88-58	32	1.7	510	979
✓AH-88-59	36	1.3	220	996
✓AH-88-60	31	2.0	580	2475
✓AH-88-61	30	2.1	770	2028
✓AH-88-62	32	3.1	540	3049
✓AH-88-63	33	2.7	760	3165
✓AH-88-64	34	3.1	5000	3312
✓AH-88-65	27	2.2	560	2136
✓AH-88-66	33	2.5	540	1841
✓AH-88-67	28	2.3	1100	2054
✓AH-88-68	28	2.1	800	2004
✓AH-88-69	32	2.1	520	1681
✓AH-88-70	30	2.3	670	1738

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

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Assayer

To: CATEAR RESOURCES LTD.,
400, 255 - 17th Avenue S.W.,
Calgary, Alberta T2S 2T8

 ATTN: Jack Wyder

File No. 33458
 Date June 4, 1990
 Samples Soil/Silt/Rock




Certificate of Assay LORING LABORATORIES LTD.

Page # 13

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓AH-88-71	36	2.8	1100	4678
✓AH-88-72	33	2.3	1500	2254
✓AH-88-73	29	2.5	780	2108
✓AH-88-74	28	1.9	470	1707
✓AH-88-75	30	1.6	560	1294
✓AH-88-76	33	2.3	690	1817
✓AH-88-77	30	2.3	490	1479
✓AH-88-78	30	2.5	950	2002
✓AH-88-79	32	1.8	550	2981
✓AH-88-80	31	2.9	13400	3961
✓AH-88-81	29	3.0	1400	2629
✓AH-88-82	31	2.9	660	2478
✓AH-88-83	29	2.7	650	2512
✓AH-88-84	29	3.2	740	2528
✓AH-88-85	29	3.4	680	3017
✓AH-88-86	30	1.0	330	873
✓AH-88-87	33	3.3	670	3394
✓AH-88-88	24	0.8	210	900
✓AH-88-89	25	2.6	560	2384
✓AH-88-90	31	2.9	640	2769
✓AH-88-91	30	2.8	480	2995
✓AH-88-92	32	2.6	550	3772
✓AH-88-93	30	2.8	650	4302
✓AH-88-94	33	3.1	570	2293
✓AH-88-95	33	4.1	620	3423
✓AH-88-96	30	3.3	670	2718
✓AH-88-97	34	2.7	430	2459
✓AH-88-98	34	3.6	760	3451
✓AH-88-99	30	1.0	350	1000
✓AH-88-100	32	2.7	750	3210
✓AH-88-101	37	1.1	300	1128
✓AH-88-102	44	1.1	260	863

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 Assayer

To: CATEAR RESOURCES LTD.,

File No. 33458

400, 255 - 17th Avenue S.W.,

Date June 4, 1990

Calgary, Alberta T2S 2T8

Samples Soil/Silt/Rock

ATTN: Jack Wyder



Certificate of Assay LORING LABORATORIES LTD.

Page # 14

SAMPLE NO.	PPM Cu	PPM Sb	PPB Hg	PPM Ba
✓AH-88-103	30	2.5	500	2012
✓AH-88-104	32	3.2	730	1914
✓AH-88-105	31	2.0	550	1734
✓AH-88-106	33	2.6	590	2136
✓AH-88-107	36	2.2	750	2958
✓AH-88-108	37	2.8	1300	3301
✓AH-88-109	33	1.0	300	1020
✓AH-88-110	34	1.1	400	1052
✓AH-88-111	30	0.9	610	878
✓AH-88-112	26	1.0	330	1067
✓AH-88-113	26	1.0	580	1524
✓AH-88-114	27	1.1	140	1042
✓AH-88-115	26	1.0	160	1138
✓AH-88-116	26	1.0	150	1099
✓AH-88-117	28	1.0	170	1126
✓AH-88-118	30	1.1	230	1028
✓AH-88-119	26	1.0	200	1084
✓AH-88-120	25	1.0	210	1043
✓AH-88-121	34	1.3	190	953
✓AH-88-122	43	1.7	230	1275
✓AH-88-123	46	1.9	220	1318
✓AH-88-124	45	1.7	260	1296
✓AH-88-125	48	2.0	270	1321
✓AH-88-126	47	1.8	360	1290
✓AH-88-127	48	1.8	340	1358
✓AH-88-128	48	1.9	410	1541
✓AH-88-129	49	1.9	150	1421
✓AH-88-130	50	1.8	260	1251

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Subjects retained one month.
Culps retained one month.
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Assayer

To: CATEAR RESOURCES LTD
400, 255 - 17th Avenue S.W.,
Calgary, Alberta
T2S 2T8
Attn: Jack Wyder

File No. 33458
Date June 4, 1990
Samples Soil/Rock



Certificate of Assay


LORING LABORATORIES LTD.

Page # 15

SAMPLE NO.	% Cu	% Pb	% Zn
"ASSAY ANALYSIS"			
18001	.52	2.20	34.36
18002	.78	.56	4.36
18003	-	-	.34
CGS -03	-	-	.19
T5 - 01	-	-	.11
T5 - 05	-	-	.12

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Assayer

APPENDIX II
ANALYTICAL DATA - 1990

To: E.R. KRUCHKOWSKI CONSULTING LTD.,

400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Ed Kruchkowski

File No. 33476

Date July 9, 1990

Samples Rock



RECEIVED JUL 17 1990

Certificate of Assay LORING LABORATORIES LTD.

Page # 1

SAMPLE NO.

OZ./TON
GOLD

OZ./TON
SILVER

"Assay Analysis"

ERK-18	0.142	5.70
PVAR-13	0.130	-

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Assayer

To: E.R. KRUCKOWSKI CONSULTING LTD.,

File No. 33476

400, 255 - 17th Avenue S.W.,

Date July 9, 1990

Calgary, Alberta T2S 2T8

Samples Soil

ATTN: Ed Kruckowski



Certificate of Assay LORING LABORATORIES LTD.

Page # 2

SAMPLE NO.

PPB
AU

PPM
Ag

Geochemical Analysis

BNSS- 1	40	0.1
2	NIL	0.1
3	325	NIL
4	NIL	0.1
5	20	NIL
6	165	0.1
7	NIL	0.1
8	NIL	NIL
9	NIL	0.1
10	NIL	0.1
11	NIL	NIL
12	NIL	NIL
13	NIL	NIL
14	40	0.1
15	NIL	0.1
16	50	NIL
30	NIL	NIL
31	NIL	NIL
32	NIL	NIL
33	NIL	NIL
HCS- 1	NIL	0.1
2	NIL	0.2
3	NIL	NIL
4	25	NIL
5	140	0.2
6	70	NIL
7	20	NIL
8	NIL	NIL
ERKS- 1	NIL	0.5
2	NIL	0.5

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Assayer

To: E.R. KRUCKOWSKI CONSULTING LTD.,
400, 255 - 17th Avenue S.W.,
Calgary, Alberta T2S 2T8

File No. 33476
Date July 9, 1990
Samples Soil



ATTN: Ed Kruckowski

Certificate of Assay LORING LABORATORIES LTD.

Page # 3

SAMPLE NO.	PPB AU	PPM Ag
ERKS- <u>3</u>	NIL	0.4
<u>4</u>	NIL	NIL
<u>5</u>	NIL	0.1
<u>6</u>	NIL	NIL
<u>7</u>	NIL	NIL
<u>8</u>	NIL	NIL

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Pulps retained one month
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are made in advance.


Assayer

To: E.R. KRUCHKOWSKI CONSULTING LTD.,

File No. 33476

400, 255 - 17th Avenue S.W.,

Date July 9, 1990

Calgary, Alberta T2S 2T8

Samples Rock

ATTN: Ed Kruchkowski



Certificate of Assay LORING LABORATORIES LTD.

Page # 4

SAMPLE NO.

PPB
Au

PPM
Ag

Geochemical Analysis

BNR-✓1	NIL	0.1
✓2	NIL	NIL
✓3	NIL	NIL
✓5	NIL	NIL
✓6	NIL	NIL
✓7	NIL	NIL
✓8	NIL	0.1
✓9	NIL	NIL
✓10	NIL	NIL
✓11	NIL	NIL
✓12	NIL	NIL
13	NIL	NIL
✓14	NIL	NIL
15	NIL	NIL
17	NIL	NIL
CCR-✓1	NIL	0.2
✓2	NIL	0.1
✓4	NIL	0.1
✓5	NIL	NIL
✓6	NIL	NIL
✓7	NIL	NIL
✓8	NIL	NIL
✓9	NIL	NIL
✓10	NIL	NIL
✓11	NIL	NIL
✓12	NIL	NIL
✓13	NIL	NIL
✓14	NIL	NIL
✓15	NIL	NIL
✓16	NIL	NIL

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
Pulps retained one month
unless specific arrangements
are made in advance.


Assayer

To: E.R. KRUCHKOWSKI CONSULTING LTD.,

400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Ed Kruchkowski

File No. 33476

Date July 9, 1990

Samples Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 5

SAMPLE NO.	PPB Au	PPM Ag
CCR-17	NIL	0.2
18	NIL	NIL
19	15	NIL
20	10	NIL
21	NIL	0.2
ERK-1	NIL	NIL
2	NIL	NIL
3	NIL	NIL
4	NIL	NIL
5	NIL	NIL
6 + 7	NIL	NIL
8	NIL	NIL
9	NIL	NIL
10	NIL	NIL
11	NIL	NIL
12	NIL	NIL
13	NIL	NIL
14	NIL	NIL
15	NIL	NIL
16	NIL	NIL
17	NIL	NIL
18	+1000	+30.0
19	25	1.4
20	35	2.2
21	120	6.6
22	60	3.0
23	25	2.3
24	NIL	0.8
25	NIL	3.5
26	30	NIL
27	NIL	0.3
28	50	NIL

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

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Assayer

To: E.R. KRUCKOWSKI CONSULTING LTD.,

File No. 33476

400, 255 - 17th Avenue S.W.,

Date July 9, 1990

Calgary, Alberta T2S 2T8

Samples Rock

ATTN: Ed Kruckowski



Certificate of Assay LORING LABORATORIES LTD.

Page # 6

SAMPLE NO.	PPB AU	PPM Ag
ERK- 29	NIL	0.8
30	NIL	NIL
✓31	NIL	NIL
✓32	NIL	3.0
33	NIL	0.1
34	NIL	1.0
35	NIL	2.8
36	NIL	0.9
37	NIL	2.3
✓38	NIL	NIL
✓39	10	NIL
✓40	5	0.2
PVAR-1	NIL	NIL
2	10	NIL
3	NIL	NIL
4	NIL	NIL
5	NIL	NIL
6	NIL	NIL
7	NIL	NIL
8	NIL	NIL
9	NIL	NIL
10	NIL	NIL
11	NIL	NIL
12	NIL	NIL
13	+1000	11.0
14	20	NIL
15	15	NIL
16	NIL	NIL
17	15	1.5
18	40	0.2
19	30	NIL
20	NIL	NIL

I Hereby Certify that the above results are those assays made by me upon the herein described samples....

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Pulps retained one month
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Assayer

To: E.R. KRUCKOWSKI CONSULTING LTD.,

400, 255 - 17th Avenue S.W.,

Calgary, Alberta T2S 2T8

ATTN: Ed Kruckowski

File No. 33476

Date July 9, 1990

Samples Rock



Certificate of Assay LORING LABORATORIES LTD.

Page # 7

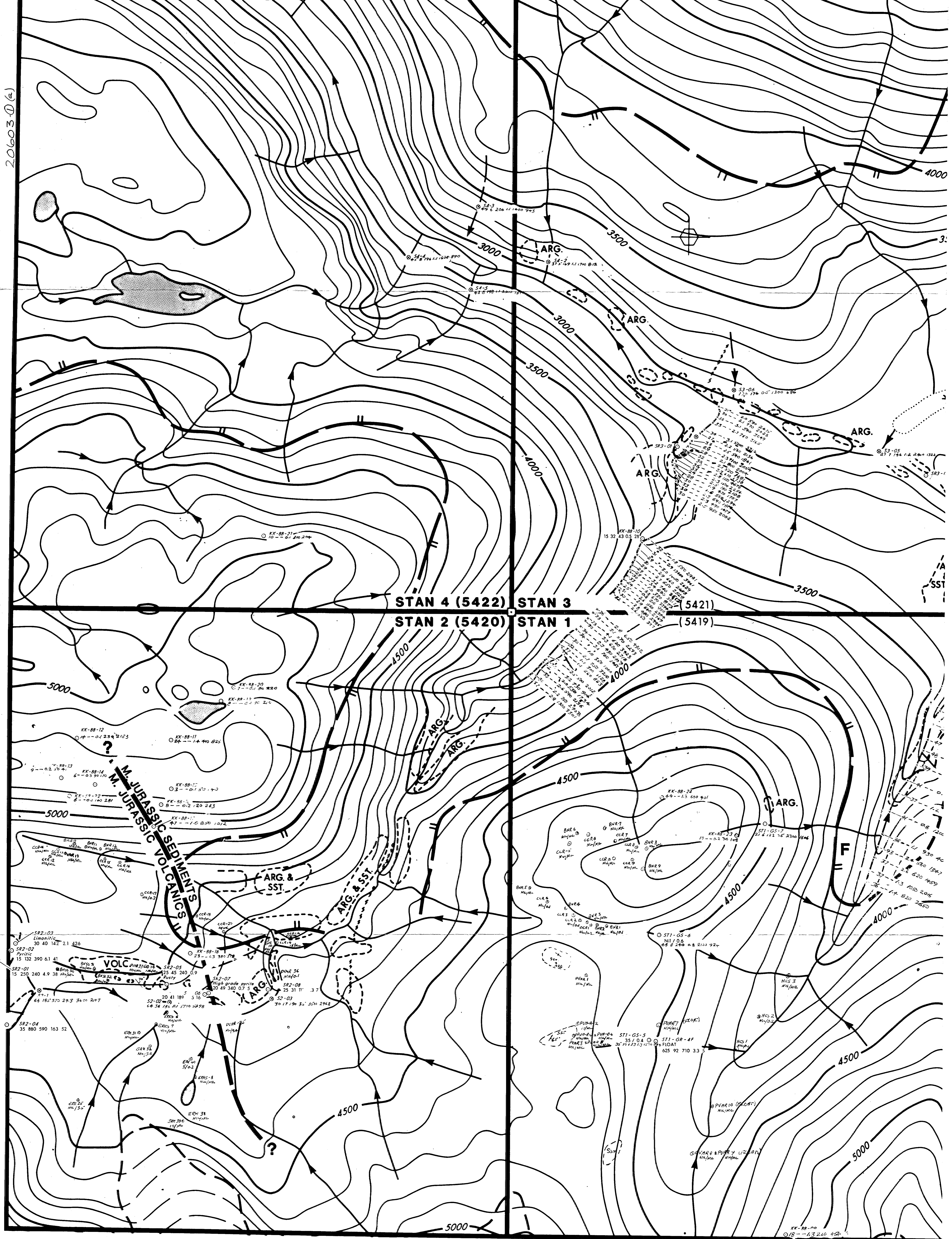
SAMPLE NO.	PPB Au	PPM Ag
PVAR-21	20	NIL
22	15	NIL
23	NIL	0.2
24	NIL	NIL
25	NIL	NIL
26	NIL	NIL
27	NIL	NIL
28	NIL	NIL
29	NIL	NIL
30	NIL	NIL
31	NIL	NIL
32	NIL	0.2
33	NIL	NIL
34	NIL	NIL
35	NIL	9.4
36	NIL	0.1
UNKNOWN # 1	NIL	NIL
# 2	NIL	0.2

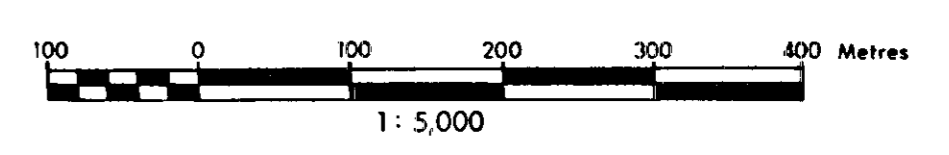
I Hereby Certify that the above results are those assays made by me upon the herein described samples....

Rejects retained one month.
Pulps retained one month
unless specific arrangements
are made in advance.


Assayer

20603-0(4)





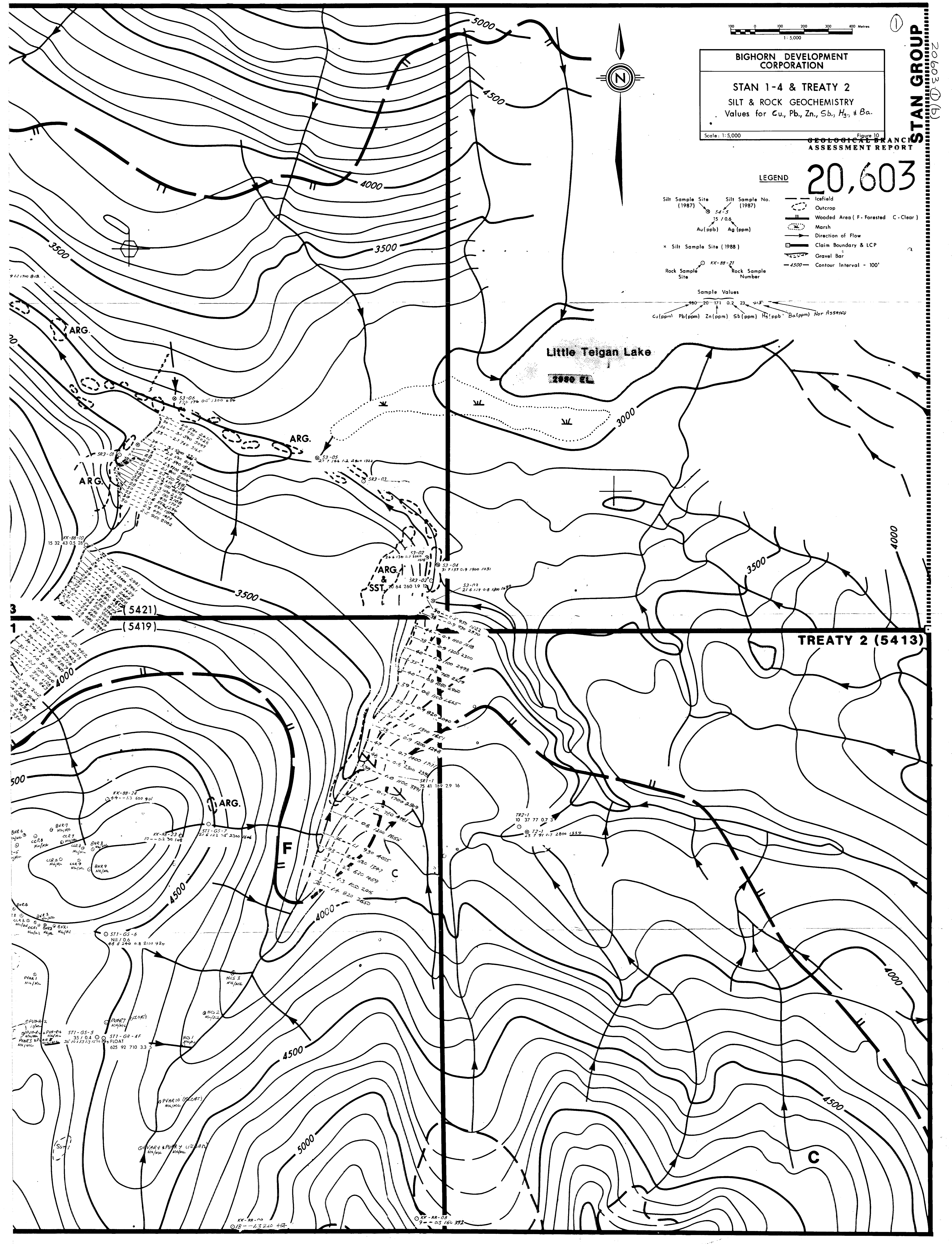
BIGHORN DEVELOPMENT CORPORATION
STAN 1-4 & TREATY 2
SILT & ROCK GEOCHEMISTRY
Values for Cu, Pb, Zn, Sb, Hg, & Ba.
Scale: 1:5,000

Figure 10
GEOLOGICAL BRANCH
ASSESSMENT REPORT

LEGEND

20,603

- Silt Sample Site (1987)
 - Silt Sample No. (1987)
 - Au (ppb)
 - Ag (ppm)
 - Silt Sample Site (1988)
 - Rock Sample Site
 - Rock Sample Number
 - Icefield
 - Outcrop
 - Wooded Area (F - Forested C - Clear)
 - Marsh
 - Direction of Flow
 - Claim Boundary & LCP
 - Gravel Bar
 - Contour Interval - 100'
- Sample Values
Cu (ppm) Pb (ppm) Zn (ppm) Sb (ppm) Hg (ppb) Ba (ppm) Not Assayed



3
1
5421
5419
TREATY 2 (5413)

20,603

Scale: 1:5,000

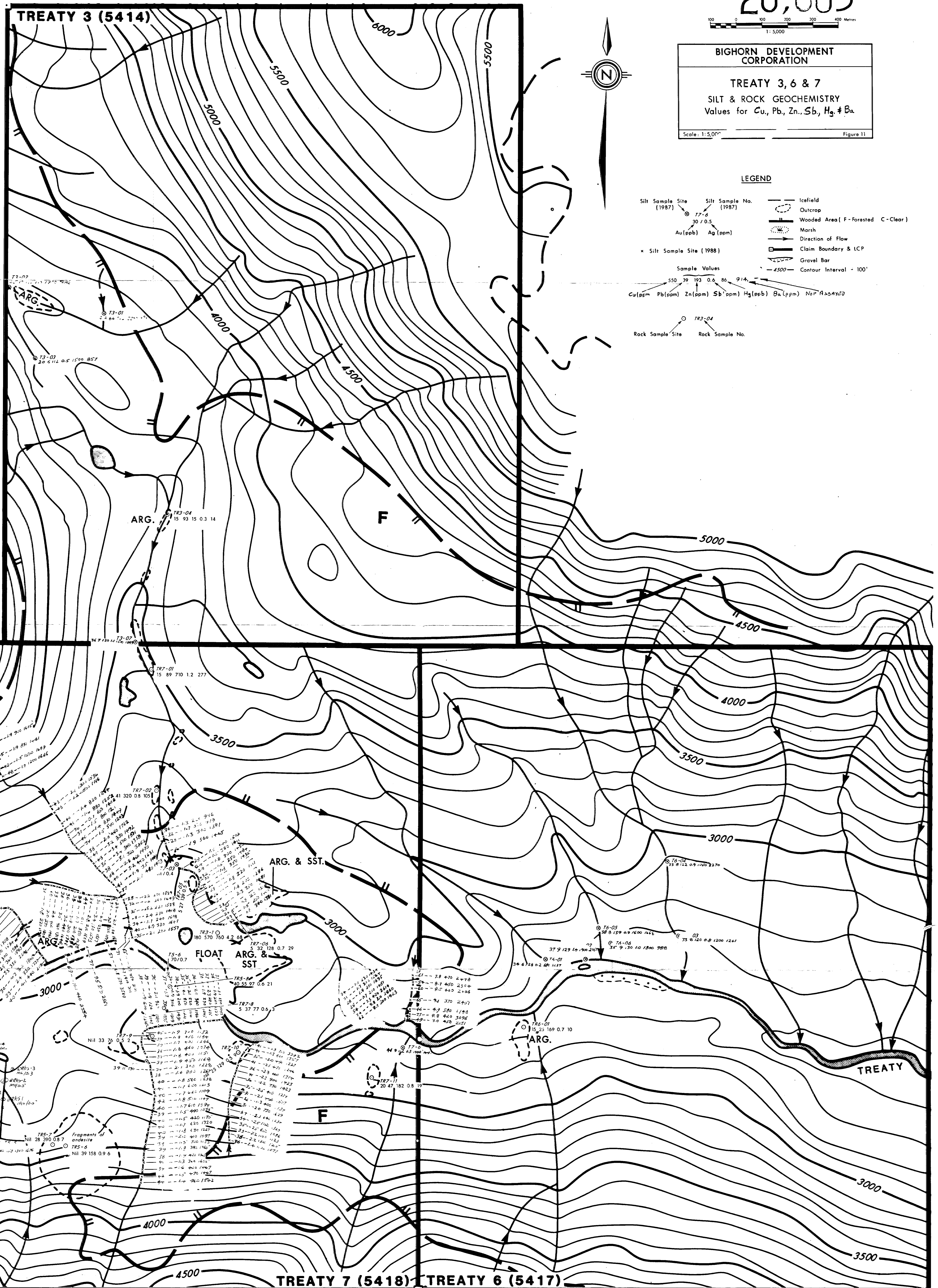
BIGHORN DEVELOPMENT CORPORATION

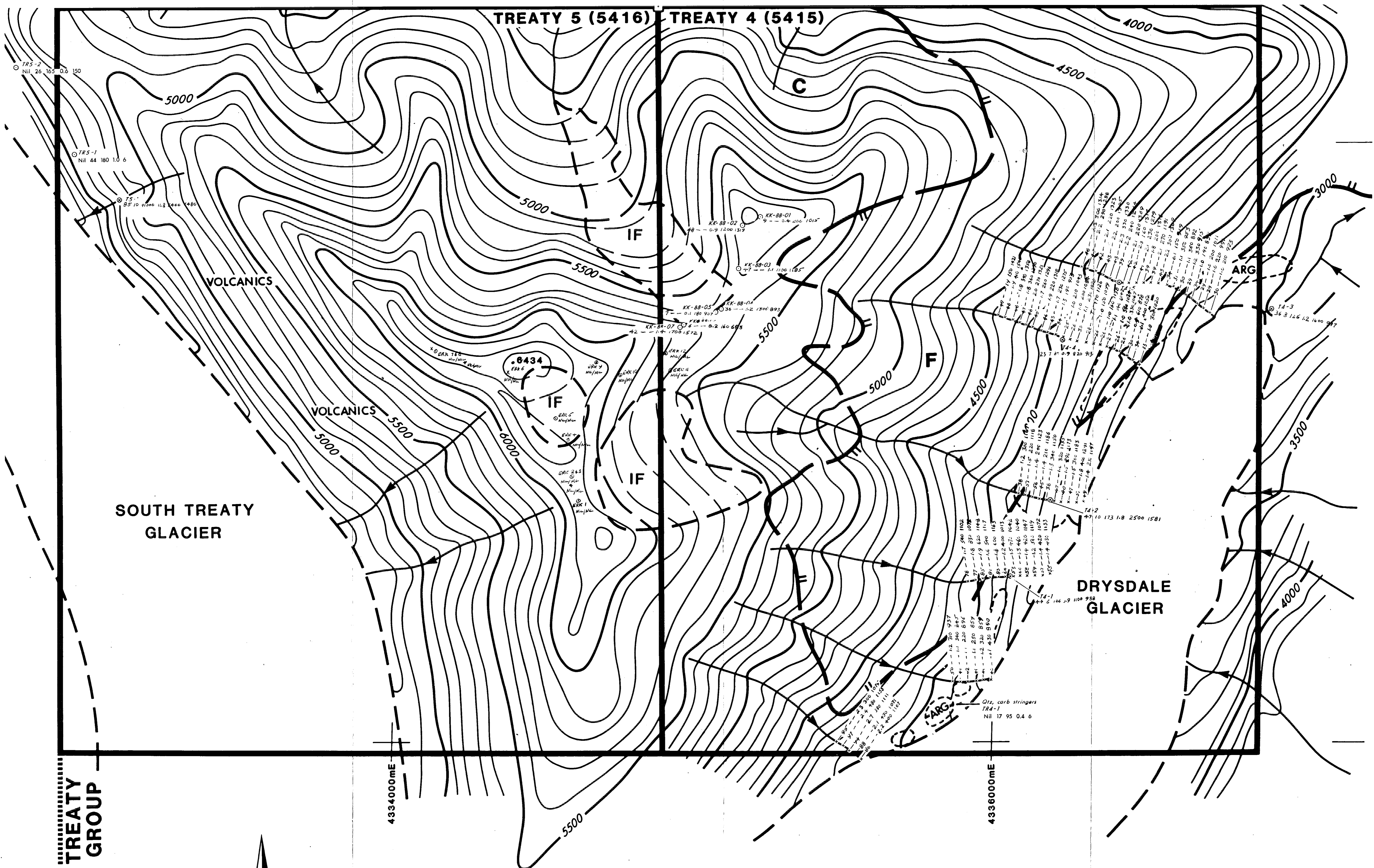
TREATY 3, 6 & 7
SILT & ROCK GEOCHEMISTRY
Values for Cu, Pb, Zn, Sb, Hg, & Ba

Scale: 1:5,000 Figure 11

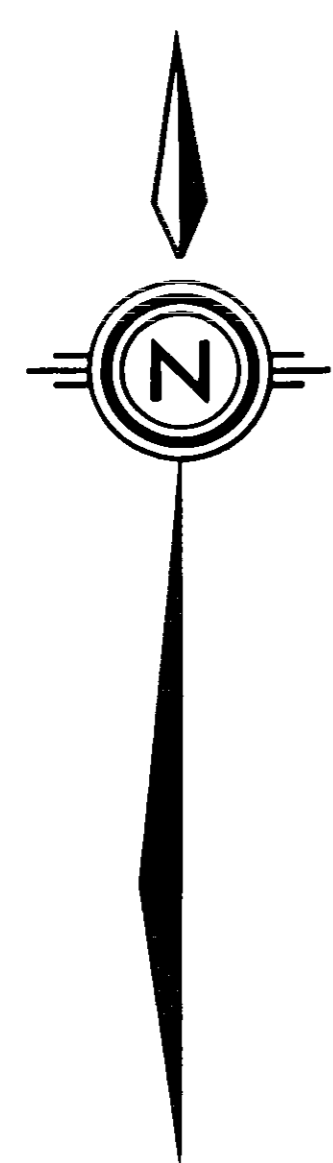
LEGEND

- Silt Sample Site (1987)
- Silt Sample No. (1987)
- Au (ppb) Ag (ppm)
- Sample Values
- Cu (ppm) Pb (ppm) Zn (ppm) Sb (ppm) Hg (ppb) Ba (ppm) Ni (ppm) As (ppm)
- Rock Sample Site
- Rock Sample No.
- Icefield
- Outcrop
- Wooded Area (F - Forested C - Clear)
- Marsh
- Direction of Flow
- Claim Boundary & LCP
- Gravel Bar
- 4500 Contour Interval - 100'



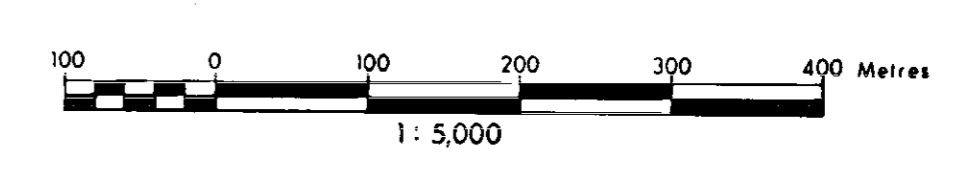


TREATY GROUP



LEGEND

- | | |
|--|---|
| <p>Silt Sample Site (1987) T4-5
85 / 0.5
Au (ppb) Ag (ppm)</p> <p>* Silt Sample Site (1988)</p> <p>Rock Sample Site KK-88-07
Rock Sample Number</p> <p>Sample Values
50 19 135 0.2 13 0.18
Cu (ppm) Pb (ppm) Zn (ppm) Sb (ppm) Hg (ppb) Ba (ppm) NOT ASSAYED</p> | <p> Icefield</p> <p> Outcrop</p> <p> Wooded Area (F-Forested C-Clear)</p> <p> Marsh</p> <p> Direction of Flow</p> <p> Claim Boundary & LCP</p> <p> Gravel Bar</p> <p> -4500 Contour (feet) Interval -100'</p> |
|--|---|



BIGHORN DEVELOPMENT CORPORATION

TREATY 4 & 5
SILT & ROCK GEOCHEMISTRY
Values for Cu, Pb, Zn, Sb, Hg, & Ba

Scale: 1:5,000

GEOLOGICAL BRANCH ASSESSMENT REPORT

20,603