PROSPECTING AND GEOCHEMICAL REPORT

on the

STRAW GROUP

(Straw 1-20 two-post mineral claims)

Clinton Mining Division

NTS 92P\15W

LAT. 51' 54" N

LONG. 120' 54" W

BY

D. RIDLEY (owner)

and

D. DUNN

PIONEER METALS CORPORATION (operator)

JANUARY, 1994

WORK APPROVAL NUMBER: PRG-1993-1000760-4-5679

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SUMMARY

The Straw property is situated approximately 55 kilometers north east of 100 Mile House, B.C. and is accessible via paved and gravel logging roads. The claims straddle the contact zone between upper Triassic Nicola Group volcanics to the east and intrusives of the Takomkane batholith to the west. The property lies near the south end of a large air-magnetometer high, roughly outlined by the 3500 gamma contour line, and stretching from Roger Lake to north of Iron Lake. This may indicate a border phase of the batholith or a younger, more basic intrusion within it.

The ground around the Straw property has been held by various mining companies and individuals since the early 1960's. In 1972, Utah Mines Ltd. staked the July claims and conducted a detailed work program consisting of geological mapping, soil sampling and ground magnetometer surveys (Catchalian F.R., 1972). This work discovered widespread minor copper occurrances associated with breccia zones in the volcanics and syenitic dykes which indicated a possible copper-bearing porphyry system. Four diamond drill sites were proposed but due to changes in the provincial government the claims were allowed to lapse in 1973. In 1990, Princeton Mining Corp. optioned the Clay property which covered portions of the Straw ground. Although soil samples were anomalous in copper and sporadically anomalous in gold no further work was recommended for this area (Bishop S.T., 1990).

A limited prospecting and soil sampling program was carried out in 1993. Prospecting traverses in the western portions of the property resulted in examination of many of the anomalous zones outlined by past operators. This confirmed the earlier mapping and it is believed that a porphyry system may underlie the area at depth. Soil sampling in the eastern portion of the property resulted in northward extension of copper anomalies outlined by Bishop (1990).

Further work is recommended for the Straw property in the form of detailed geological mapping followed by ground magnetometer and Induced Polarization surveys. If results from this work prove encouraging a machine trenching and diamond drill program would follow.

INTRODUCTION

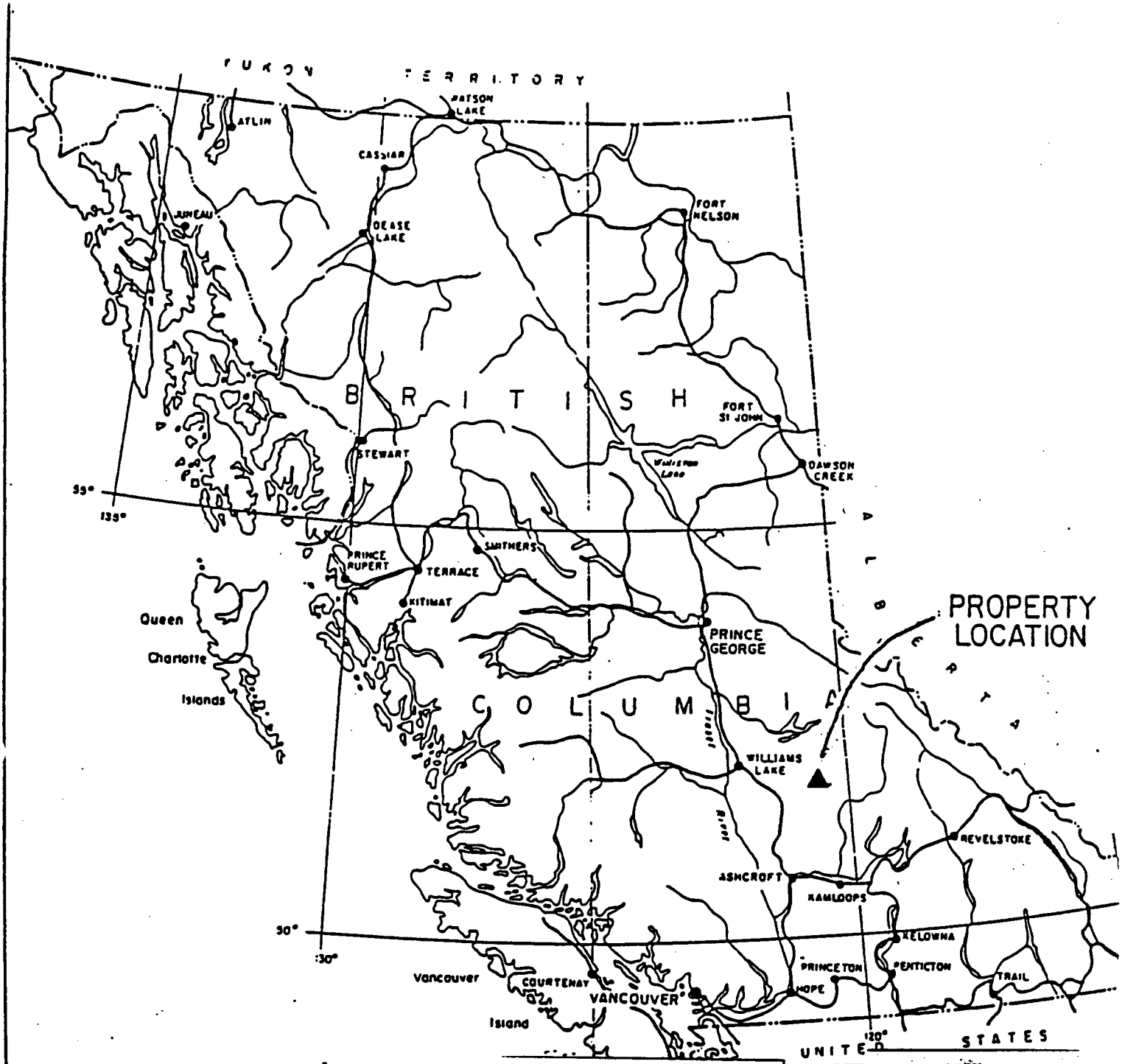
During July 1993, the Straw property was subjected to prospecting traverses and a soil sampling survey. Prospecting was restricted to examining as many of the anomalous areas defined by past operators as possible. The soil survey was directed to northward extension of a 1990 soil grid which contained anomalous copper and sporadic gold anomalies. The western portion of the property appears to have fair-good potential to host a copper-gold porphyry system at depth. The eastern portion may have greater potential for base or precious metal enriched skarn mineralization.

LOCATION AND ACCESS

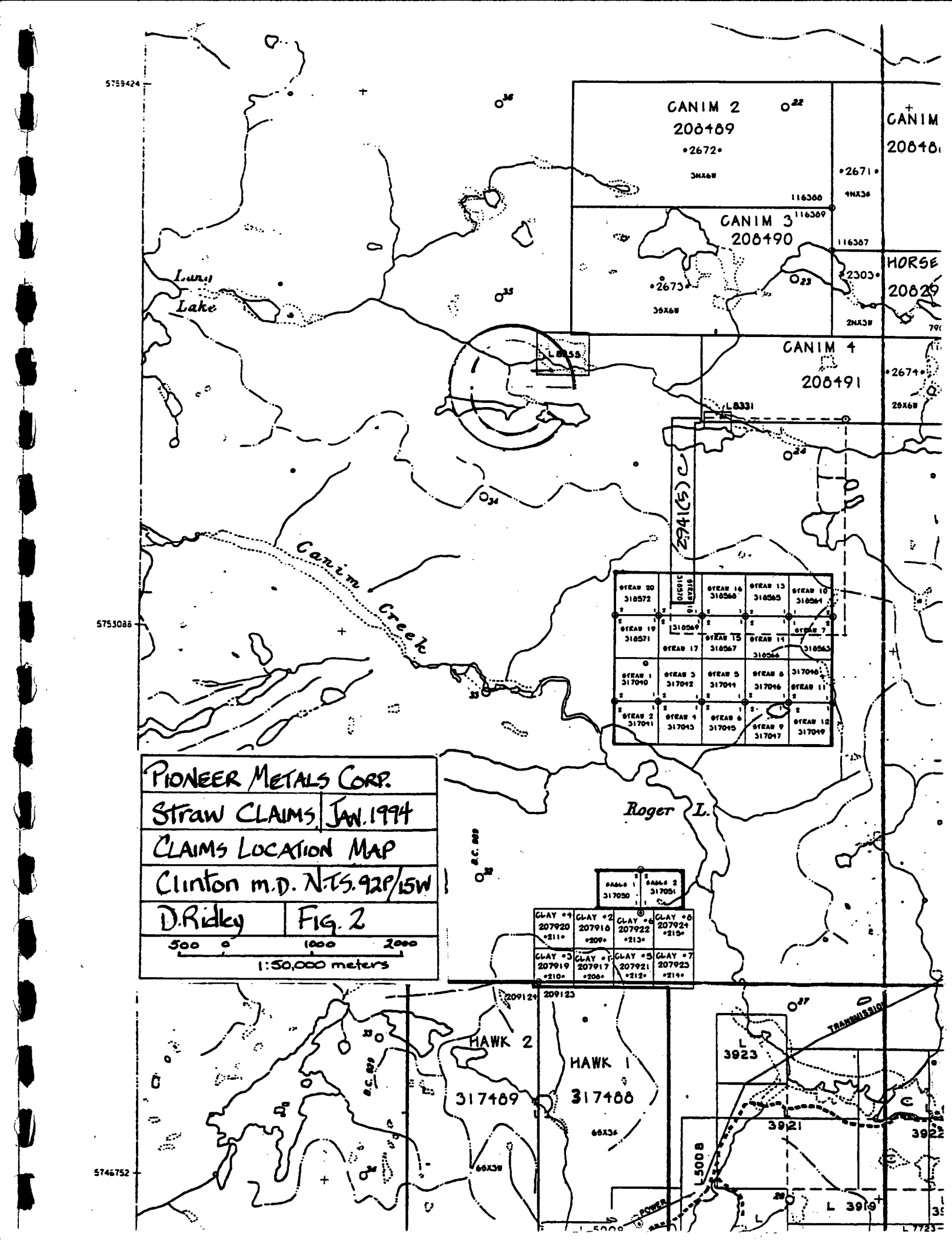
The Straw property is located approximately 55 kilometers northeast of 100 Mile House, B.C., and is easily accessible via paved and gravel logging roads. Access from highway 97 is by the Canim Lake road to Eagle Creek bridge, where the Hendrix Lake road continues northeasterly for about 5 kilometers to its junction with the Lang Lake forestry access road. This road is followed north-northwest for nine kilometers to a southerly trending arterial which goes to Judy Lake thence on to Roger Lake and passes through the eastern edge of the property. A hydro transmission line lies approximately five kilometers south of the center of the Straw claims.

The claims lie between the Interior Wet Belt and the Interior Dry Belt bioclimatic zone. They are situated in the western portion of Quesnel Highlands physiographic region. Topography ranges between 2600-3400 feet. The steepest area lies above the northeast shore of Roger Lake where a series of low rocky bluffs form the most extensive outcrops on the property. Elsewhere the ground is generally flat with several small hilltops and ridge crests poking above the swampy plateau above 3200 feet elevation.

The property is densely forested except for the northeast corner where a recent logging clearcut provides vehicular access. The forested portion is a mixture of thick juvenile stands of cedar- spruce- fir- pine-balsam. Also park-like stands of lodgepole pine and/orpoplar, which are cut by numerous swamps consisting of willows, alder, cattails and swamp grass which make the running ofcompass lines somewhat difficult.



PIONEER METALS CORP.	
Straw CLAIMS	JAN. 1994
GENERAL LOCATION MAP	
CLINTON M.D. 92P/15W	
D. Ridley	FIG. 1
0 100 200 miles 0 100 200 300 Kilometers	


5755424
5753088
5746752
CANIM 2
208489
CANIM 3
208490
CANIM 4
208491
HORSE
Lunn Lake
Canim Creek
Roger L.
HAWK 2
317489
HAWK 1
317488
TRANSMISSION
POWER
L 3919
PIONEER METALS CORP.
STRAW CLAIMS | JAN. 1994
CLAIMS LOCATION MAP
Clinton m.D. N.T.S. 92P/15W
D. Ridley | FIG. 2
500 0 1000 2000
1:50,000 meters

CLAIM STATUS

The Straw property consists of twenty two-post mineral claims situated in Clinton Mining Division. The Straw 1-6, 8, 9, and 11-12, (record Nos. 317040-317049) were staked on April 2, 1993, by A. Molnar and D. Ridley. The Straw 7, 10, 13-20, (Record Nos. 318563-318570, 318572, and 318579) were staked June 16, 1993 by C. Ridley for D. Ridley. All are held by Dave Ridley, General Delivery, Eagle Creek, B.C., V0K1L0. In June 1993, an option was signed with Pioneer Metals Corp. who has corporate offices at 1770-401 West Georgia Street, Vancouver, B.C., V6B5A1. Pioneer has the right to earn a 100% interest in the property subject to a 2% NSR retained by Ridley. The claims will be grouped and the new expiry date would be April 2, 1997 (pending assessment work approval).

PROPERTY HISTORY

The general area of the Straw claims has been held by various mining companies and individuals since the early 1960's. The most comprehensive work was carried out in 1972 by Utah Mines Ltd. who focused on copper-bearing porphyry potential of the Nicola-Takomkane intrusive contact. The geology and mineralization encountered during this work program is well presented in a report by F.R. Gatchalian (1972), who concluded "Alteration, brecciation and some copper mineralization is evident at the intrusive-Nicola contact. The copper mineralization on the property is widespread, erratic and low grade." Although this program returned favourable results and a drill program was recommended, it was never completed and the claims were allowed to lapse in 1974.

During the early 1970's, Aragon Explorations Ltd., held much of the ground east of, and contiguous to, the claims of Utah Mines Limited. A report by V. Cokor (1973), describes the eastern portion of the present Straw property as being underlain by altered tuffaceous and volcanic rocks which are locally intruded by small plugs and dykes of granodiorite to diorite composition. "Epidote and chlorite are widespread secondary minerals often accompanied by biotite and sometimes sericite. Potassium feldspar, calcite and gypsum often appear as fracture fillings. These latest are often related to visible copper mineralization. Rock is generally highly sheared and fractured,

in some locations brecciated. The most common sulphide minerals found so far, are pyrite and pyrrhotite, accompanied by chalocopyrite and\or bornite, found as disseminations, blebs and small irregular stringers." (Cukor V., 1973; Ass. Rpt. #4265). Although the limited surface work to this time was encouraging, the claims were allowed to lapse in 1974.

Noranda Exploration Company optioned the Clay property west of Roger Lake in 1984 and although they expanded this property to include portions of the Straw ground, work was restricted to the Clay showings. In 1990, the package was optioned to Princeton Mining Corp., who initiated a soil and geological mapping program over the eastern portion of the present Straw ground. This work revealed copper and sporadic gold soil anomalies in the altered volcanics between Gosling Lake and the main access road (Bishop S.T., 1990). The claims were allowed to lapse in 1992 and were staked as the present Straw property in 1993.

Several properties surrounding the Straw ground have been subjected to extensive grassroots exploration work which has returned encouraging results. A brief summary of these properties is included for compilation purposes.

The Canim property of Canevex Resources Ltd., situated approximately 5 kilometers north of the Straw claims, has been held in the past by several different companies. In the early 1970's, Pickands-Mather Ltd., conducted geological mapping, soil geochemistry, lake sediment sampling, and ground magnetometer surveys on the Sheri claims. This work revealed several large, persistent copper soil anomalies with favorable geology and magnetometer signatures. Seven short percussion drill holes were completed in the Island-Iron Lake area. No economic intersections were found and the ground was allowed to lapse. Several companies and individuals held this portion as the Iron Horse property during the late 1970's to late 1980's. In 1988 G.R. Peatfield recorded a rock sample from a quartz-carbonate alteration zone which returned 993 ppb platinum (Ass. Rpt. #19322).

Recent work by Canevex Resources indicated seven geochemically anomalous zones including; 3 copper, 1 nickel, 1 gold-palladium, 1 platinum-palladium, 1 copper-nickel-gold-platinum-palladium. Thirteen quartz-carbonate alteration zones with anomalous copper-gold-platinum-palladium were also found. Soil anomalies include values as high as 75 ppb gold, 392 ppb

palladium and 154 ppb platinum while rock samples from trenching returned values up to 1219 ppb gold, 2093 ppm copper, 156 ppb platinum, and 258 ppb palladium. "Initial mineralization is believed to be related to segration within a mafic-ultramafic intrusion and post intrusive shear controlled mineralization which may be un-related to intrusive event and may show an arsenic-gold association. The property was given good potential for massive and concentrated disseminated copper-nickel (Au-Pt-Pd-enriched) and shear controlled gold (Pt-Pd-enriched) deposits" (Ass. Rpt. #19322). The northern portion of the Straw property contains similar geological features and may therfore have some potential to host similar showings.

The Christmas property of E and B Explorations Inc., are situated approximately seven kilometers east of the Straw claims. Gold values to 6290 ppb with the majority in the 210-500 ppb gold were obtained during rock sampling of a high sulphide hornfels zone in green andesites, tuffs and sediments of Jurassic (?) age adjacent to a partially un-roofed quartz diorite stock of Cretaceous (?) age. A large hornfels aureole extends outward 1-2 kilometers from the intrusive. Sulphide content (pyrite-pyrrhotite) is generally less than 1-2% with local zones of 2-10% which host the higher gold values (Ass. Rpt. #12183). Subsequent work identified several anomalous gold values in soil samples and the mineralized hornfels zones showed good Induced Polarization response. Although several drill targets were outlined, no further work has been completed on these claims.

In 1978, the Clay property, situated approximately four kilometers southwest of the Straw claims, was staked by Alfred Robinson to cover outcroppings of bornite-chalcopyrite bearing, epidote altered volcanic breccia. Limited exploration continued until 1982 when Alcare resources Inc. did EM and magnetometer surveys on the "Knob" showing and drilled 11 BQ diamond drill holes totalling 424 meters on and around the showing. Very few mineralized zones were intersected in the drilling. In 1984 and 1985 Noranda Exploration Co. Inc. optioned the ground, expanded the land position, and conducted soil sampling, detailed geological mapping, trenching, magnetometer and I.P. surveys, and drilled 4 diamond drill holes totaling 397 meters. This work defined several copper soil anomalies and two main I.P. anomalies, one of which is the Knob showing. The drilling partially tested both I.P. anomalies. The best assay was a 19.66 meter intersection of epidote alteration which returned 0.12% copper, 0.06 oz\ton silver, and 0.007 oz\ton gold. Within this section, a 4.5 meter section asayed 0.27% copper, 0.13 oz\ton silver, and 0.013 oz\ton gold (Gale R.E., 1988).

The Clay (Hawkins Lake) property was modeled after Dome's QR deposit in that it "was situated within Triassic volcanics of the Quesnel Trough, the gold mineralizing event is associated with a comagmatic monzonite (?) stock, gold-sulphide mineralization is within a zone of propyllitic alteration, and gold-sulphide mineralization was deposited in a calcareous environment; calcareous tuff (QR); limestone-volcanic contact (Hawkins)" (Lewis T.D., Bradish, L., 1985).

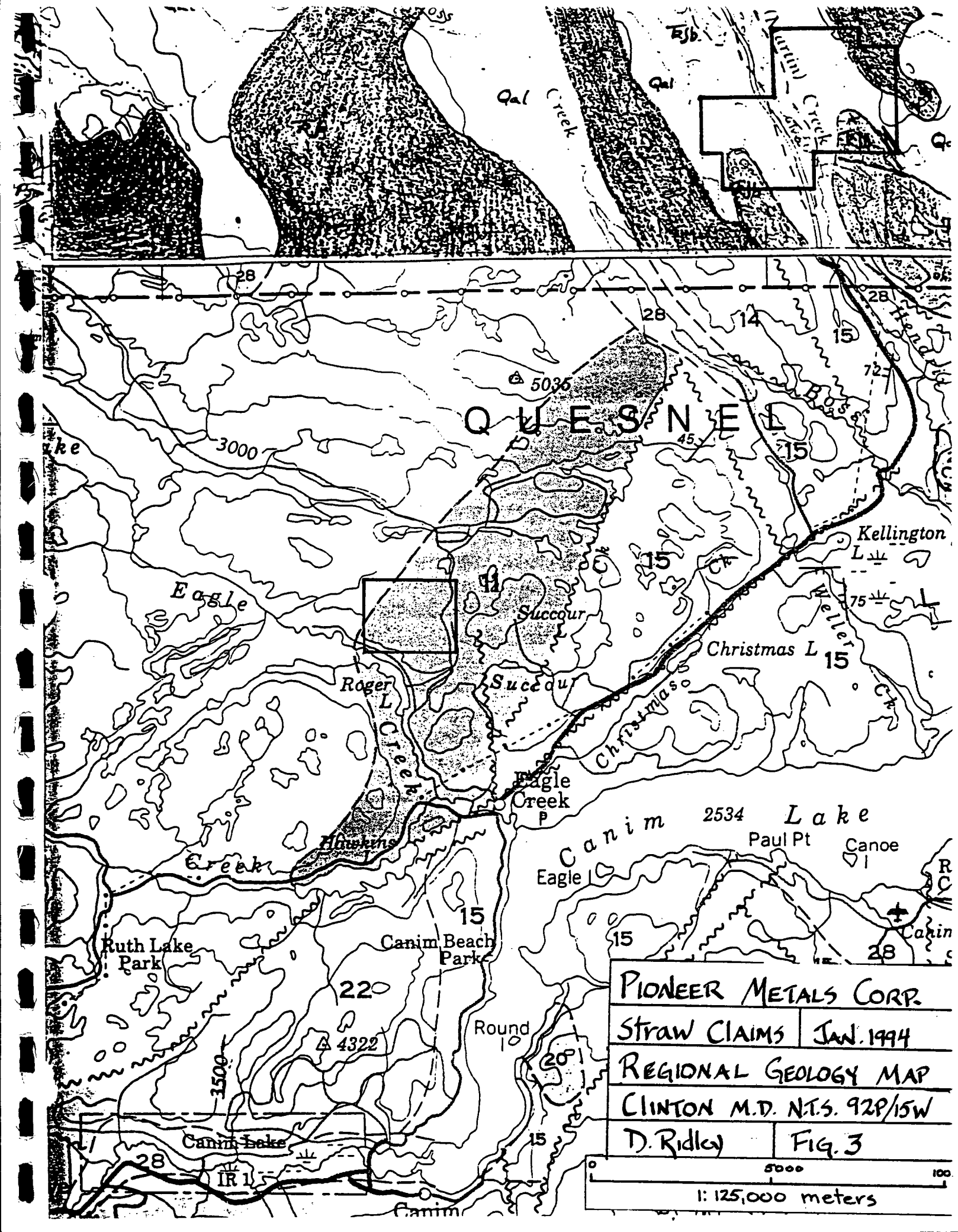
In 1990 Princeton Mining Corp. optioned the Clay (Hawkins Lake) property, extended Noranda's grid and conducted a limited soil sampling and geological mapping program. In addition, a similar program was carried out in the eastern portion of the present Straw property, as indicated above. By 1993 the Clay property had been reduced to eight two-post units centered on the Knob showing.

REGIONAL GEOLOGY

The Straw property lies in the Quesnel Trough, a subdivision of the Intermontane belt, which is composed of Triassic to Jurassic volcanic, volcaniclastic, and sedimentary rocks which are intruded by various plutons ranging in age from Triassic to Cretaceous.

The oldest rocks in the region comprise augite andesite-basaltic flows, breccias and agglomerate, tuff, argillite, phyllite, greywacke, and black to grey limestone of the Triassic Nicola Group which is intruded by the upper Triassic-Jurassic Takomkane batholith. The Takomkane batholith is a composite granodiorite intrusion with hornblende-biotite quartz diorite and granodiorite, hornblende diorite, monzonite, gabbro and hornblendite. Phases may be syenodiorite-diorite or quartz monzonite in composition and locally K-feldspar porphyritic, and quartz-rich (Blann, 1993).

A large magnetic high shown on Figure 4, streching from Roger Lake in the south to north of Iron Lake and roughly outlined by the 3500 relative gamma contour, was found to be underlain by magnetite-rich, locally porphyritic, hornblendite, pyroxenite, gabbro and diorite. It is not clear whether this



PIONEER METALS CORP.	
STRAW CLAIMS	JAN. 1994
REGIONAL GEOLOGY MAP	
CLINTON M.D. N.T.S. 92P/15W	
D. RIDLEY	FIG. 3

0 5000 100

1: 125,000 meters

LEGEND

QUESNEL LAKE (93-A) MAP-AREA

QUATERNARY

RECENT

(29) **Rv** Olivine basalt blocky flows; Rvc related cinder cones: ultrabasic nodules common

PLEISTOCENE AND RECENT

(28) **Qal** Glacial deposits, till, gravel, sand, silt: alluvium. Few scattered unmapped outcrops

Qv Olivine basalt flows and breccia; Qvc, related volcanic cones including basalt flows, breccia and cinder: ultrabasic nodules common

TERTIARY AND QUATERNARY

PLIOCENE AND/OR PLEISTOCENE

TQvc Olivine basalt volcanic cones; flows and cinder: TQvb, basaltic breccia, minor flows: ultrabasic nodules common

TERTIARY

MIOCENE AND PLIOCENE

(25) **uTvo** Plateau basalt: olivine basalt, feldspar porphyry basalt, minor breccia, conglomerate and sandstone: uTvb, areas underlain by plateau basalt, few scattered unmapped outcrops: uTvp, coarse feldspar porphyry, may be older intrusions

uTs Shale, sandstone (mainly Miocene)

EOCENE AND (?) OLIGOCENE

KAMLOOPS GROUP (lmTv and lmTs)

lmTv Basaltic, andesitic, and dacitic breccia and flows, minor shale, sandstone and conglomerate: may include small areas of younger volcanics. lmTvs: areas of few scattered unmapped outcrops of lmTv and lmTs undivided

lmTs Shale, sandstone, tuff, conglomerate

QUESNEL and OMINECA BELTS

QUESNEL BELT

CRETACEOUS AND (?) TERTIARY

KTs Conglomerate, sandstone, shale

JURASSIC AND CRETACEOUS

JKg Granodiorite, quartz monzonite, quartz diorite

JKns Nepheline syenite, syenite

QUESNEL RIVER GROUP (uTa to lmJs)

JURASSIC

LOWER AND (?) MIDDLE JURASSIC

PLIENSBACHIAN TO (?) BAJOCIAN

lmJs Conglomerate (local granitic clasts), greywacke, shale

TRIASSIC AND JURASSIC

UPPER TRIASSIC AND LOWER JURASSIC

TJi Syenite, monzonite, diorite; sub-volcanic intrusive phases, probably mainly lower Jurassic

NORIAN TO SINEMURIAN

TJd Purple or maroon, minor grey and green basaltic and felsitic breccia, minor flows, tuff, sandstone and limestone. TJda: purple and maroon basalt with analcite phenocrysts

TJg TAKOMKANE BATHOLITH: granodiorite, quartz monzonite, quartz diorite

NORIAN AND (?) HETTANGIAN

TJc Green and purple conglomerate and sandstone

NORIAN AND (?) YOUNGER

(16) **TJb** Augite porphyry basalt breccia, minor flows, tuff and tuffaceous argillite; local andesitic basalt

(15) **TJa** Basaltic tuff and breccia, generally fine-grained; argillite, flows, chert

TRIASSIC

UPPER TRIASSIC

KARNIAN AND (?) NORIAN

uTb Basaltic and andesitic flows and breccia, minor argillite and limestone

(10) **uTa1** Phyllite, argillite, slaty argillite, quartzite, schist, minor greenstone (sub-greenschist to amphibolite (kyanite) facies of metamorphism)

uTa2 Greenstone, augite-porphyry breccia, tuff breccia, tuff; possible dykes and sills (greenschist facies of metamorphism)

uTa3 Undivided uTa1, and uTa2 not separable at scale of mapping: may include dykes and sills and passes gradationally upward to TJa (sub-greenschist and greenschist facies of metamorphism)

OMINECA BELT

JURASSIC (?), CRETACEOUS AND/OR TERTIARY

KTg Muscovite - biotite granite and quartz monzonite

JURASSIC AND (?) CRETACEOUS

(20) **JKg** Granodiorite, quartz monzonite, quartz diorite, minor diorite

PALEOZOIC OR MESOZOIC

PMub Serpentinite, peridotite: may be pre PPAa

REDFERN COMPLEX (PMRub, PMRga and PMRa)
(may be equivalent to PMub and PPAb)

PMRa Amphibolite

PMRga Gabbro, norite

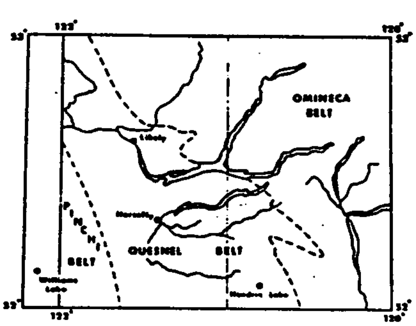
PMRub Serpentinite, pyroxenite, peridotite

PENNSYLVANIAN, (?) PERMIAN AND (?) YOUNGER

SLIDE MOUNTAIN GROUP (PPAa and DMa)

(2) **PPAa** ANTLER FORMATION: pillow basalt, breccia, chert greywacke, minor limestone. PPAb, amphibolite; probably equivalent to PPAa

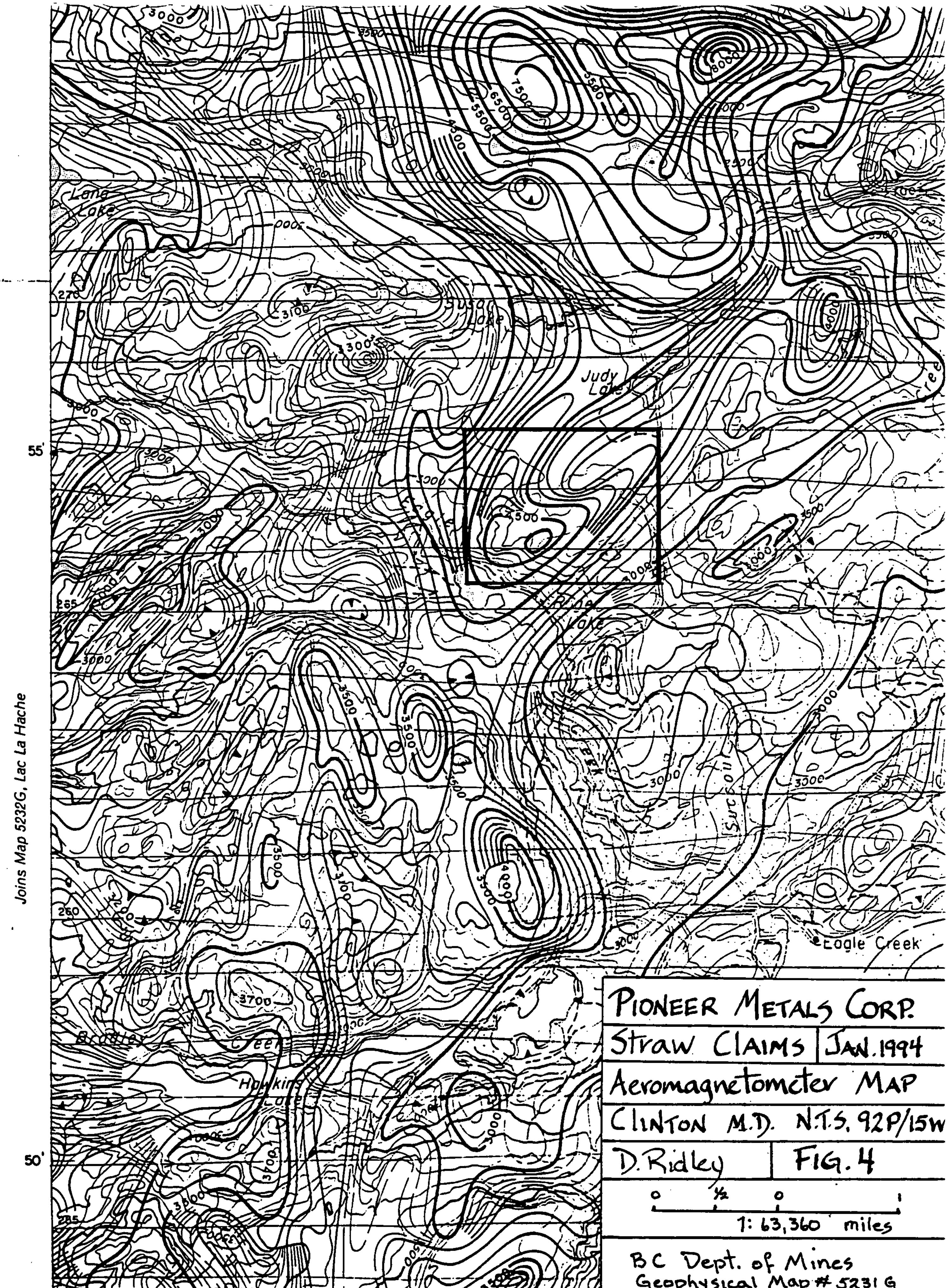
(1) **HPsm** SNOWSHOE FORMATION: may include HPm undivided: phyllite, schist and gneiss to amphibolite facies of metamorphism.
HPsmm: marble (shown in solid black where thin):
HPsmg: gneissose granitized layers of uncertain origin



Glacier
Geological contact (defined, approximate or assumed, covered)
Contact of Shuswap Metamorphic Complex (coincides with sillimanite isograd)
Fault (defined, approximate or assumed, covered by water)
Bedding (horizontal, inclined, vertical, overturned: tops not indicated)
Foliation: cleavage, schistosity, gneissose layering (inclined, vertical)
Anticlinal axis (fold upright, overturned)
Synclinal axis (fold upright, overturned)
Antiformal axis
Fossil locality
Mine

Geology by R.B.Campbell, 1959-1963, 1969

Compiled by R.B.Campbell from published and unpublished sources, 1978



Joins Map 5232G, Lac La Hache
55'
50'
Judy Lake
Eagle Creek
Hawkins Lake
3000
3500
4000
6500
7500
8000
3100
3300
3700
PIONEER METALS CORP.
Straw Claims
JAN. 1994
Aeromagnetomcter MAP
CLINTON M.D.
N.T.S. 92P/15W
D. Ridley
FIG. 4
1: 63,360 miles
BC Dept. of Mines
Geophysical Map # 5231 G

represents a border phase of Takomkane batholith or the emplacement of a younger, more mafic intrusion, along its margin.

Jurassic rocks comprise andesitic arenite, siltstone, grit, breccia and tuff, local granite-bearing conglomerate, greywacke, minor argillite and flows. These rocks are in apparent fault contact with all other rocks in the area (Campbell, Tipper, 1971). Jurassic and older rocks are intruded by several satellite stocks and smaller bodies, consisting of biotite-quartz monzonite and granodiorite of Cretaceous age. Three small stocks on the east side of Canim Lake believed to be Cretaceous in age, are syenite, syenodiorite to diorite and gabbro in composition.

South of Canim and Hawkins Lakes, dacite, trachyte, basalt, andesite, rhyolite, and related breccias of the Eocene to Oligocene Skull Hill formation form the higher hills. Miocene and\or Pliocene plateau lava, olivine basalt, basaltic andesite, and related ash and breccia beds of the Chilcotin Group are found in the lower lying areas and form extensive exposures on the Fraser plateau, immediately west of the property.

1993 WORK PROGRAM

The 1993 work program consisted of a detailed compilation of past data and presentation on one map (FIG.8). Prospecting traverses were run in areas of mineralization and\or alteration defined by past operators. Several of these were rock sampled and mapped. A small soil sampling survey was conducted in the east-central portion of the claims. The grid was an extension of the 1990 grid which was found to be in fairly good condition with most stations still legible.

The work was conducted by D. and C. Ridley under the supervision of D. Dunn, geologist for Pioneer Metals Corporation. The work was completed between June 14-18, July 14-17, and Aug. 20, 1993. The program resulted in the collection and subsequent analysis of 111 soil, 28 rock, and 2 silt samples.

PROSPECTING AND ROCK SAMPLING

Outcrop on the Straw property is best exposed in a series of low cliffs rising above the northeast end of Roger Lake and on several hill and ridge tops in the generally flat-lying central and northern portions. On many of the hill and ridge tops, a thick mantle of moss with little or no soil, masks the underlying bedrock. In the overburdened areas float is generally of uniform composition and may be presumed to be rubble and\or subcrop accumulating from surface weathering of underlying bedrock. This may aid in geological mapping.

Several past operators have examined the ground and reported on the overall geology (see Bibliography). The most comprehensive report is by F.R. Gatchalian (1972), who presents a detailed account of the geology including petrographic examinations of "type" rocks. The geology map from this work provided the base for the compilation map presented in this report (FIG.8).

Prospecting traverses were run over areas of mineralization or alteration and anomalous soil results defined by past operators. Rock samples were taken from angular float in anomalous soil holes, mineralized angular float , and mineralized and\or altered outcrop. Rock sample locations are plotted on Fig. 5 and analysis results are presented in the appendix.

Prospecting of a clearcut, southwest of Judy Lake, revealed chlorite-biotite altered greenstone intruded by fine-grained mesocratic diorite with local hornblende-feldspar porphyritic pegmatite dykes. A grab sample from a well exposed outcrop returned 115 ppb gold and 417 ppm copper (STRAW93 DR8). The mafic rocks are typically magnetite-rich and carry trace pyrite and\or chalcopyrite.

Several rock samples were obtained from an old bulldozer trench along the main access road. This is the general area of the old "Beer" showings (Cukor V., 1973). The rocks are highly altered, sheared, and brecciated augite porphyry (?) that contains local disseminated pyrite, magnetite, hematite and minor chalcopyrite and bornite. The rocks are altered by carbonate, chlorite, epidote, minor pink calcite veinlets, and local K-feldspar veinlets. None of these samples returned significant gold or copper values (STRAW93 DR20-25).

Along the access road further to the south similar altered augite porphyry outcrops are found in a road cut. These rocks are chlorite-carbonate-epidote altered and contain narrow pink calcite veins to 3 cms. wide which carry blebs of chalcopyrite. Pyrite-magnetite are disseminated in the wallrocks as is trace chalcopyrite. Rock samples returned values of 3-10 ppb gold and 170-359 ppm copper (STRAW93 DR 1, 3-4). A grab sample across one meter of epidote-chlorite-magnetite-pink calcite altered augite porphyry and carrying trace bornite-chalcopyrite, found 100 meters east of the road, returned 145 ppb gold and 261 ppm copper (STRAW93 DR13).

A grab sample from an outcrop three hundred meters west of the trench and within a coincident Cu-Ca-K soil anomaly returned disappointing results of 10 ppb gold and 145 ppm copper (STRAW93 CR1). The outcrop consists of magnetite-rich diorite altered by biotite-epidote-chlorite and minor K-feldspar veinlets and fracture fillings. Minor disseminated pyrite and trace chalcopyrite is found within the the veinlets.

A small hand trench was found on the northeastern brow of the ridge overlooking the area of the trenches. Outcrop exposed in the floor of the trench consisted of a skarn altered mafic volcanic unit, trending 033\60NW, and containing up to 2% bornite as blebs along fracture planes and minor disseminated chalcopyrite-pyrite-magnetite. The rock is completely altered to skarn which is composed of epidote, calcite, and minor pink calcite, K-feldspar, biotite and chlorite (STRAW93 DR19). It returned values of 120 ppb gold, 1.2 ppm silver, and 2499 ppm copper. An old cat trail from the road trench ends approximately fifteen meters west of the hand trench. It is not clear whether this is actual bedrock, subcrop, or float. However it does lie within a mineralized trend following the ridge southwesterly to Gosling Lake and is within a copper soil anomaly defined by Bishop (1990), and during this program.

Several rock samples were obtained from the bluffs above the north end of Gosling lake. Soil sampling and geological mapping by Bishop, 1990, indicated several highly anomalous copper and sporadic gold soil anomalies and a single well mineralized narrow hornfelsed shear zone. The shear zone is less than one meter wide and contains up to 2% chalcopyrite, pyrite, and trace bornite. A grab from the shear returned 80 ppb gold and 2152 ppm copper (STRAW93 DR17). A grab from float immediately below the shear returned 185 ppb gold, 0.8 ppm silver, and 8690 ppm copper (STRAW 93 DR18).

A second shear zone, trending 030\90, was found to outcrop 75 meters west. The shear was altered by epidote-pink calcite-chlorite, contains up to 10% magnetite and minor chalcopyrite-pyrite-pyrrhotite. A sample across 50 cms. returned 10 ppb gold and 559 ppm copper (STRAW93 DR7). A 30 cms. wide quartz vein carrying up to 1% pyrite-pyrrhotite-chalcopyrite, situated 35 meters south of DR7 returned 170 ppb gold and 300 ppm copper (STRAW93 DR6).

Two rock samples were taken from fragments found in a soil hole at Line 12N;5+00E, where the 1990 soil program revealed a highly anomalous value of 114 ppb gold and 505 ppm copper (Bishop, 1990). One rock sample consisting of little altered augite porphyry with narrow quartz stockworks and containing trace chalcopyrite and malachite returned 130 ppb gold and 407 ppm copper (STRAW93 DR14). A second sample was obtained 5 meters west of DR14 and consisted of an angular float boulder. The rock was completely altered by epidote so the original character was obliterated and cut by pink calcite and quartz veinlets. It did not contain visible sulphides and a sample returned 10 ppb gold and 16 ppm copper (STRAW93 DR15).

Prospecting traverses were run in the western portion of the property to examine the mineralized zones depicted by Gatchalian (1972). No economic mineralization was encountered on surfaceand it was concluded that the area might benefit from an I.P. survey due the largely overburdened nature of the ground. Rocks in the area are brecciated and intruded by acidic to mafic stocks, plugs and dykes and contain trace disseminated chalcopyrite and bornite. They are generally mildly prophylitic altered and relatively sulphide-free suggesting that a copper-gold alkalic porphyry system may be found at depth.

SOIL GEOCHEMISTRY

A total of 111 soil samples were collected on the Straw property during the 1993 work program. These were collected during north-east extension of a grid established in 1990 (Bishop, 1990), and is situated in the east-central portion of the property (FIG.5). Samples were dug by hand with a mattock, placed in Kraft soil envelopes and air-dried one week prior to shipment to Eco-Tech Laboratories, Kamloops, British

Columbia. Samples were sieved to -80 mesh, one gram was analyzed for 30 elements by I.C.P., and ten grams were fire assayed and analyzed by atomic absorption for gold. Sample results are plotted on Figures 6 & 7; analysis certificates and lab procedures are included in the appendix.

Soil development was good over most of the grid except for the low-lying swampy areas which consisted of black organic soils at least one meter in depth. Elsewhere, samples were collected from the light-orange "BF" horizon, generally between 15 and 25 cms. below the surface. Numerous angular rock fragments in the soil holes and scattered about on the surface correlate well to observed bedrock, and so only limited lateral displacement of anomalies is suspected.

Several soil samples along Line 16N are anomalous for copper and correlate well to earlier work to the south (Bishop, 1990). The most extensive copper soil anomaly lies just west of the access road and between Line 16N to Line 18N (FIG.5). Calcium-potassium enrichment coincides with the copper anomaly (FIG.6). Weakly mineralized, altered volcanic float and skarn-altered augite porphyry outcrops are found sporadically throughout or near the soil anomaly. Soil samples returned values between 86-889 ppm copper and represent a northern extension of a soil anomaly depicted by Bishop (1990), which terminate in swamps near the road trenching (FIG.8).

A weak gold anomaly with values between 10-15 ppb is coincident with the Cu-Ca-K soil anomaly. A highest value of 65 ppb gold occurs at L16N;6+50E. Across the swamp and 300 meters north, two samples returned values between 40-45 ppb gold. No samples were taken in the swampy ground separating the two sample lines (FIG.7).

CONCLUSIONS

Based on compilation of past data and results from the 1993 work program it appears two main zones with differing geological environments exist on the Straw property. These include an alkalic porphyry environment to the west and skarn altered Triassic volcanics to the east (FIG.8).

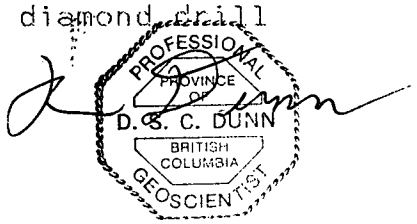
The western zone appears to represent the upper portion of an alkalic porphyry system in that Triassic volcanics are

intruded by the composite Takomkane batholith, limited to weak alteration and sulphidation, and widely scattered, low grade copper showings. Soil geochemistry and magnetometer surveys add to the overall geological setting. It is postulated that more significant mineralization may lie at depth.

Targets in the eastern portion of the property are Cu-Fe (Au-Ag) skarns in Triassic Nicola Group limy volcanics and sediments. Soil sampling indicates a large copper anomaly, 700 meters long, up to 200 meters wide, roughly following the strike of the volcanic outcrops, and containing several minor low grade, copper showings. Limited geological mapping of this anomaly along the ridge between Gosling Lake and the main access road, revealed numerous outcrops of skarn altered (calcite-epidote-chlorite-K-Spar) volcanic rock which contained minor pyrite-chalcopyrite-bornite-hematite-magnetite.

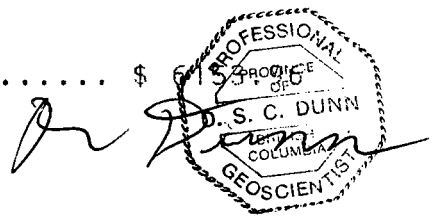
RECOMMENDATIONS

Further work is recommended for the Straw property in the form of detailed geological mapping, rock sampling and ground magnetometer survey of the grid along the ridge between Gosling Lake and the main road. An Induced Polarization survey is recommended for the western portion of the property and should be conducted over the eastern grid if the initial phase is favourable. The I.P. survey would be instrumental in determining eventual back hoe trenching or diamond drill targets.



FINANCIAL STATEMENT

PERSONEL	
D. Ridley, prospector; 7D @ $200\day	$ 1400.00
C. Ridley, prospector; 5D @ $125\day	$ 625.00
D. Dunn, geologist; 2D @ $250\day	$ 500.00
TRAVEL	
Truck Rental; 7D @ $40\day	$ 280.00
Gas;	$ 105.00
GST PAYABLE	
7% on contracting and vehicle rental	$ 196.35
FOOD AND ACCOMODATION	
Minac Lodge, Canim Lake; 2D @ $50\day	$ 100.00
SAMPLE ANALYSIS	
i) Rocks; 28 @ $16 each	$ 448.00
ii) Soils; 111 @ $15 each	$ 1665.00
iii) Silts; 2 @ $15 each	$ 30.00
SHIPPING	$ 21.88
FIELD SUPPLIES	$ 41.73
PHOTOCOPYING	$ 35.00
FAX	$ 6.00
REPORT PREPARATION	$ 700.00
TOTAL EXPENDITURES FOR 1993 WORK PROGRAM	$ 6153.96



STATEMENT OF QUALIFICATIONS

I, David Wayne Ridley, of General Delivery, Eagle Creek, B.C., V0K1L0, do hereby certify:

1) That I completed the "Mineral Exploration for Prospectors" course, hosted by the BC Ministry of Mines at Mesachie Lake, B.C. in 1984.

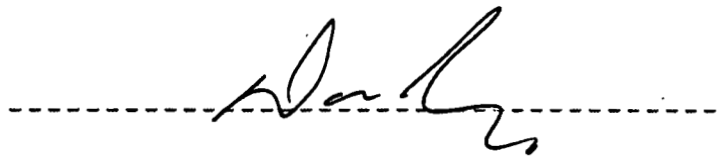
2) That I completed the short course entitled "Petrology for Prospectors" held in Smithers, B.C., and hosted by the Smithers Exploration Group, in 1990.

3) That I have prospected independently since 1982 and have been employed as a prospector by various exploration companies in B.C., Alaska, and Yukon Territory since 1984.

4) That I conducted the work set out in this report while under the supervision of D. Dunn.

5) That I currently own an interest in the subject property.

Dated at Eagle Creek, B.C.,



David Wayne Ridley

I, David St. Clair Dunn, with a business address of 2348 Palmerston Avenue, West Vancouver, B.C. V7V 2W1, declare that;

1. I am a professional Geoscientist registered under the Professional Engineers and Geoscientists Act of the Province of British Columbia.

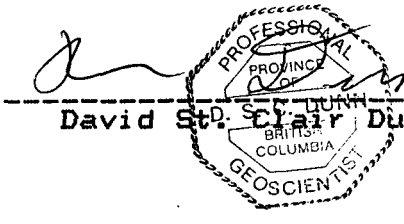
2. I am a Fellow of the Geological Association of Canada.

3. I am a Fellow of the Association of Exploration Geochemists.

4. I have practiced my profession as a prospector and geologist for more than 20 years in Canada, U.S.A. and Australia.

5. I supervised the work program on the Straw Property described in this report.

6. I am Exploration Manager for Pioneer Metals Corporation.



David St. Clair Dunn, P.Geo.

BIBLIOGRAPHY

Bishop S.T., 1990: Geological and Geochemical Report of the Robby Claim Group; Ass. Rpt. #14798.

Campbell R.B., Tipper H.W. 1972: Geology of the Bonaparte Lake Area: GSC Memoir 363.

Cukor V., 1973: Report on the Canim Lake Property for Aragon Explorations Ltd.; Ass. Rpt. #4265, 3547.

Gale R.E., 1988; Report on Hawkins Lake Copper-Gold Prospect: Private report for Sheba Copper Mines Ltd.

Gatchalian F.R., 1972: Geological, Geochemical and Geophysical Report on the July 1-32 claims; Ass. Rpt. #4496.

GSC Geophysics Paper 5231; Canim Lake, 92P\15: aeromagnetic Survey, 1968; Map #5231G.

Other useful Assessment Reports from around the area include:

#4731, #4821, #6122, 8410, #10183, #11088, #11055, #14949, #14798, 16170.

APPENDIX "A"

Rock Description Sheets

ROCK SAMPLE SHEET

Sampler D. Ridley
Date June 1993
Property Straw
NTS 92P/15

SAMPLE NO.	Sample Width	DESCRIPTION			ADDITIONAL OBSERVATIONS	ASSAYS				
		Rock Type	Alteration	Mineralization		Cu	Au	Ag		
STRAW 93 DR-1	F	augite porphyry	epidote carbonate chlorite	minor disem cpy in wallrx + 1cm wide pink calcite veinlets	similar rock outcrops in road bank above this site but is less well-mineralized.	192	3	.1		
STRAW 93 DR-2	40cm	shear zone	chlorite	up to 5% pyrite	wallrx are augite porphyry andesite: subcrop from road cut N of creek in road + south of Judy L.	20	15 ~~30~~	<2 ~~4~~		
STRAW 93 DR-3	2.5m	augite porphyry	epidote chlorite minor carb.	minor cpy trace magnetite	shear zone trending 140/65SW: ● ≈15m N of DR1: outcrop exposed in roadcut.	359	10	.2		
STRAW 93 DR-4	1.2m	augite diorite?	epidote chlorite carbonate	minor pyrite trace cpy.	7m N of DR-3: outcrop + subcrop exposed in road bank.	170	10	.2		
STRAW 93 DR-5	50cm	augite andesite qtz veins	chlorite silica	1-3% pyrrhotite-py trace cpy	≈ 100 m South of Straw 172 post: outcrop exposed in road cut.	42	15	.4		
STRAW 93 DR-6	30cm	qtz vein	chlorite carbonate	cpy-pyrrhotite-pyrite ≈ 1%	poorly exposed subcrop trends ≈ 025/90: ~~Rogers~~ ≈35m on 120° to Bishop's L12N: 5+50E.	300	170	.2		
STRAW 93 DR-7	50cm	shear zone	epidote pink calcite chlorite	minor cpy-py trace bornite, mal.	trends ≈ 030/90: ~~probably Bishop's "Rogers Lake Showing"~~: wallrx are augite porphyry grading to feldspar porphyry to east	559	10	.2		
STRAW 93 DR8	1m	intrusive breccia?	epidote biotite chlorite	up to 10% magnetite minor cpy-py-po	area consists of chloritic-biotite greenstone intruded by f-gr. diorite + further intruded by magnetite-rich horn-feld porphyritic pegmatite dykes?	417	115	.2		
STRAW 93 DR9	grab from 1.5m dia outcrop	"	biotite more intense than DR8	" "	≈ 40 m E of DR-8. @ end of road.	113	40	.2		
STRAW 93 DR 10	1m	shear zone	limonite carbonate	minor pyrite along footwall	@ end of road: exposed in road bank: shear trends 010/70W	191	10	<.2		
STRAW 93 DR 11	F	"	qtz-carb.	minor magnetite trace pyrite	above Roger Lake: can see this outcropping on cliffs above (15-30cm wide):					
STRAW 93 DR 12	30cm	syenite dyke	minor epidote	trace chalcopy	above Roger L.: on top of cliffs: several similar dykes throughout large area:					
STRAW 93 DR 13	1m	augite porphyry	epidote chlorite magnetite pink calcite	calcite veinlets 1-5mm wide contain trace bornite-cpy	above main road ≈ 70 m NW of swamp @ DR-1: probably shear-related trending ≈ 040°: pink calcite veinlets trend 120/50NE.					
STRAW 93 DR 14	F	qtz vein + augite porphyry	—	trace cpy-mal	Bishop's L12N: 5+00E (soil anomaly 1990: 114 Au: 505 Cu): material immediately below bottom of soil hole.					
STRAW 93 DR 15	F	skarn	epidote chlorite qtz-carb.	up to 5% magnetite trace pyrite	1.5 m from DR14: possibly an old trench:					

ROCK SAMPLE SHEET

Sampler D. Ridley
Date July 1993
Property STRAW
NTS

SAMPLE NO.	Sample Width	DESCRIPTION: Rock Type	Alteration	Mineralization	ADDITIONAL OBSERVATIONS	ASSAYS: Cu	Au	Ag		
Straw 93 DR 16	1.2m	augite porphyry	epidote pink calcite	trace bornite + malachite	≈ 25 m @ 237° from DR6: outcrop cob. trends 025/50W: rocks heavily flooded with epidote.	70	5	<.2		
Straw 93 DR 17	1m	shear zone	hornfels epidote	up to 1% pyrite + chalcopyrite	L 12N: 6E: Bishop's "Roger's Lake Showing"	2152	80	<.2		
Straw 93 DR 18	F	"	"	"	≈ 15 m below DR17: originated from DR17:	8690	185	.8		
Straw 93 DR 19	G	skarn	epidote quartz chlorite carbonate	up to 2% bornite minor cpy - py magnetite.	old trench above creek in road (L 15+40N: 35+00E): zone trends 033/60NW: old sample ? # 34091?	2499	120	1.2		
Straw 93 DR 20	G	augite porphyry	chlorite epidote	malachite	trench @ creek in road: grab of malachite-rich wallrx encountered during digging of trench.	326	5	<.2		
Straw 93 DR 21	25cm	carbonate vein	chlorite qtz-carb epidote	malachite trace bornite-cpy	trench 1: 25 cm wide calcite vein + pods trending 130/70W: wallrx + main shear trend 360/65W:	198	5	<.2		
Straw 93 DR 22	70cm	augite porphyry	"	up to 20% mag trace malachite-cpy - py	trench 1: immediately N of DR 21: magnetite rich section:	189	5	<.2		
Straw 93 DR 23	2.5m	"	"	trace malachite-cpy minor pyrite	chip along rock face as exposed in Trench 1	268	5	<.2		
Straw 93 DR 24	G	carbonate pod 25x10x15cm	"	3-5% hematite minor mag-cpy	probably related to + similar to DR21: in Trench 1:	81	5	<.2		
Straw 93 DR 25	1.7m	f-grain andesite	epidote chlorite carbonate	minor pyrite	beside main road ≈ 100 m S of Trench 1: old grid L31N: 32+50E: major fractures trend 180/90	193	10	<.2		
93 Straw CR1	grab	epidote magnetite calcite	diorite	minor Py trace ccp	@ L16N: 4+19E - 104°/50° S.E.					

[redacted]

APPENDIX "B"

Laboratory Procedures

ECO-TECH LABORATORIES LTD.
ASSAYING - ENVIRONMENTAL TESTING
10041 East Trans Canada Hwy., Kamloops, B.C. V2C 2J3 (604) 573-5700 Fax 573-4557

GEOCHEMICAL LABORATORY METHODS

SAMPLE PREPARATION (STANDARD)

1. Soil or Sediment: Samples are dried and then sieved through 80 mesh nylon sieves.

2. Rock, Core: Samples dried (if necessary), crushed, riffled to pulp size and pulverized to approximately -140 mesh.

3. Heavy Mineral Separation: Samples are screened to -20 mesh, washed and separated in Tetrabromothane. (SG 2.96)

METHODS OF ANALYSIS

All methods have either certified or in-house standards carried through entire procedure to ensure validity of results.

1. Multi-Element Cd, Cr, Co, Cu, Fe (acid soluble), Pb, Mn, Ni, Ag, Zn, Mo

Digestion	Finish
Hot aqua-regia	Atomic Absorption, background correction applied where appropriate

A) Multi-Element ICP

Digestion	Finish
Hot aqua-regia	ICP

2. Antimony

Digestion	Finish
Hot aqua regia	Hydride generation - A.A.S.

3. Arsenic

Digestion	Finish
Hot aqua regia	Hydride generation - A.A.S.

4. Barium

Digestion	Finish
Lithium Metaborate Fusion	I.C.P.

ECO-TECH LABORATORIES LTD.
ASSAYING • ENVIRONMENTAL TESTING
10041 East Trans Canada Hwy., Kamloops, B.C. V2C 2J3 (604) 573-5700 Fax 573-4557

13. Tin

Digestion	Finish
Ammonium Iodide Fusion	Hydride generation - A.A.S.

14. Tungsten

Digestion	Finish
Potassium Bisulphate Fusion	Colorimetric or I.C.P.

15. Gold

Digestion	Finish
a) Fire Assay Preconcentration followed by Aqua Regia	Atomic Absorption
b) 10g sample is roasted at 600°C then digested with hot Aqua Regia. The gold is extracted by MIBK and determined by A.A.	

16. Platinum, Palladium, Rhodium

Digestion	Finish
Fire Assay Preconcentration followed by Aqua Regia	Graphite Furnace - A.A.S.

ECO-TECH LABORATORIES LTD.
ASSAYING - ENVIRONMENTAL TESTING
10041 East Trans Canada Hwy., Kamloops, B.C. V2C 2J3 (604) 573-5700 Fax 573-4557

LABORATORY METHOD ASSAYS

Gold	-	Coventional fire assay with A.A. finish
Gold "Metallics"	-	A 300g re-split is taken from the rejects and pulverized in a ring and puck pulverizer. The entire split is screened to -140mesh. The entire +140 mesh oversize is assayed separately. Two replicate assays are performed on the -140 mesh fraction.
Ag Pb Sb Zn	-	Aqua regia digestion, A.A. finish
As	-	Aqua regia digestion, ICP finish

APPENDIX "C"

Sample Analysis Certificates

ECO-TECH LABORATORIES LTD.
10041 EAST TRANS CANADA HWY.
KAMLOOPS, B.C. V2C 2J3
PHONE - 604-573-5700
FAX - 604-573-4557

PIONEER METALS CORPORATION ETK 93-216
1770-401 W. GEORGIA STREET
VANCOUVER, B.C.
V6B 5A1

ATTENTION: D. DUNN

JULY 30, 1993

VALUES IN PPM UNLESS OTHERWISE REPORTED

111 SOIL SAMPLES RECEIVED JULY 23, 1993
PROJECT #: CANIM LAKE - Straw

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
1	- L16N 0 + 25E	<5	<.2	2.80	10	14	140	<5	.58	<1	27	127	42	3.43	.16	<10	1.44	288	<1	.01	49	1330	28	5	<20	32	.17	<10	70	<10	9	128
2	- L16N 0 + 50E	<5	<.2	2.77	15	4	135	<5	.75	<1	33	338	116	4.34	.29	<10	2.73	315	<1	.01	77	820	20	5	<20	31	.18	<10	105	<10	7	56
3	- L16N 0 + 75E	<5	<.2	2.11	5	6	170	<5	.50	<1	25	128	46	2.88	.29	<10	1.32	657	<1	.02	42	690	22	5	<20	34	.19	<10	75	<10	9	103
4	- L16N 1 E	<5	<.2	2.54	15	6	130	5	.87	<1	28	53	38	4.13	.26	<10	1.35	616	<1	.04	22	1190	22	10	<20	38	.23	<10	121	<10	12	118
5	- L16N 1 + 25E	<5	<.2	2.68	10	6	135	5	.52	<1	27	78	67	4.32	.15	<10	1.08	635	<1	.02	30	1700	30	5	<20	34	.20	<10	106	<10	9	153
6	- L16N 1 + 40E	<5	<.2	1.96	<5	4	80	5	.89	<1	24	80	67	3.38	.10	<10	.99	294	<1	.02	28	80	14	<5	<20	53	.20	<10	94	<10	13	47
7	- L16N 1 + 75E	<5	<.2	1.14	5	4	45	<5	.45	<1	16	51	11	2.30	.06	<10	.64	172	<1	.02	14	120	10	<5	<20	30	.16	10	81	<10	8	50
8	- L16N 2 E	<5	<.2	1.74	5	4	80	5	.48	<1	22	64	25	3.07	.13	<10	1.03	309	<1	.02	21	950	14	5	<20	27	.17	<10	99	<10	8	70
9	- L16N 2 + 25E	<5	<.2	1.96	10	4	95	<5	.57	<1	22	79	54	3.33	.15	<10	1.18	350	<1	.02	26	1090	14	<5	<20	32	.15	<10	92	<10	8	65
10	- L16N 2 + 55E	<5	<.2	1.43	5	4	145	<5	.48	<1	21	108	31	2.38	.11	<10	.86	740	<1	.01	25	630	12	<5	<20	35	.14	<10	62	<10	7	113
11	- L16N 2 + 75E	10	<.2	1.96	10	4	110	<5	.37	<1	21	66	23	3.10	.09	<10	.75	472	<1	.02	21	910	18	<5	<20	23	.16	<10	76	<10	7	88
12	- L16N 3 E	15	<.2	2.57	15	6	105	<5	.63	<1	28	78	92	4.25	.20	<10	1.46	548	<1	.02	22	1450	16	<5	<20	33	.19	<10	110	<10	9	91
13	- L16N 3 + 50E	5	<.2	2.16	10	4	115	<5	.50	<1	21	81	30	2.87	.10	<10	.96	453	<1	.02	28	760	18	<5	<20	33	.18	<10	73	<10	10	128
14	- L16N 3 + 31E	<5	<.2	1.92	10	4	75	<5	.43	<1	22	78	32	3.04	.10	<10	.88	283	<1	.01	25	1130	16	5	<20	30	.16	<10	78	<10	8	84
15	- L16N 3 + 75E	10	<.2	1.41	5	2	65	<5	.49	<1	14	26	25	2.34	.10	<10	.46	622	<1	.02	8	1000	14	<5	<20	29	.16	<10	63	<10	8	72
16	- L16N 4 E	5	<.2	1.83	15	4	75	<5	.54	<1	22	82	59	3.32	.16	<10	1.15	350	<1	.02	26	370	14	5	<20	37	.19	<10	96	<10	10	60
17	- L16N 4 + 25E	15	<.2	1.91	10	4	115	<5	.44	<1	21	66	60	2.89	.13	<10	.91	650	<1	.01	18	820	16	<5	<20	29	.18	<10	78	<10	9	81
18	- L16N 4 + 50E	5	<.2	2.06	5	4	85	<5	.74	<1	23	51	96	3.51	.18	<10	1.02	441	<1	.02	18	300	14	5	<20	37	.21	<10	99	<10	14	73
19	- L16N 4 + 75E	10	<.2	1.76	10	2	95	<5	.42	<1	16	44	26	2.45	.08	<10	.65	360	<1	.01	17	760	16	<5	<20	26	.15	<10	64	<10	8	67
20	- L16N 5 + 00E	5	<.2	1.17	<5	4	80	<5	.28	<1	12	25	22	1.81	.06	<10	.43	399	<1	.01	10	730	12	<5	<20	19	.12	<10	51	<10	6	47
21	- L16N 5 + 25E	10	<.2	2.42	15	4	135	<5	.84	<1	34	124	50	4.30	.74	<10	2.32	807	<1	.02	20	2200	12	5	<20	34	.18	<10	130	<10	8	63
22	- L16N 5 + 50E	15	<.2	2.89	10	4	200	<5	.43	<1	29	62	110	4.36	.25	<10	1.79	540	<1	.01	19	720	18	<5	<20	26	.23	<10	128	<10	9	70
23	- L16N 5 + 75E	10	<.2	2.63	15	4	80	<5	.59	<1	25	60	313	3.84	.11	<10	1.45	382	<1	.02	20	1180	18	5	<20	33	.18	<10	105	<10	9	56
24	- L16N 6 E	10	<.2	1.52	10	4	115	<5	.29	<1	22	55	22	2.79	.05	<10	.82	1289	<1	.01	22	960	14	<5	<20	19	.13	10	68	<10	5	91
25	- L16N 6 + 25E	10	<.2	2.59	20	4	90	<5	.56	<1	31	72	94	3.90	.12	<10	1.63	505	<1	.01	43	540	16	5	<20	37	.20	<10	103	<10	9	87

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
26	- L16N 6 + 50E	65	<.2	1.29	15	4	75	<5	.30	<1	14	34	48	1.94	.06	<10	.64	507	<1	.01	15	350	12	<5	<20	19	.13	<10	55	<10	6	63
27	- L16N 6 + 75E	20	<.2	.67	5	4	45	<5	.45	<1	10	30	7	1.55	.05	<10	.40	262	<1	.03	5	640	6	<5	<20	30	.12	<10	49	<10	7	44
28	- L16N 7 E	5	<.2	1.93	10	4	105	<5	.40	<1	22	92	60	2.61	.09	<10	1.12	583	<1	.01	29	1320	14	<5	<20	26	.14	10	62	<10	7	66
29	- L16N 7 + 25E	15	<.2	2.17	5	4	90	<5	.51	<1	23	33	198	3.38	.07	<10	1.02	725	<1	.02	11	1610	18	<5	<20	32	.17	<10	91	<10	8	131
30	- L16N 7 + 50E	<5	<.2	2.32	10	2	175	<5	.46	<1	23	52	217	3.23	.15	<10	.94	413	<1	.01	25	1820	18	5	<20	27	.13	<10	81	<10	7	99
31	- L16N 7 + 75E	15	<.2	2.37	10	4	105	<5	.44	<1	22	50	68	3.23	.11	<10	.93	367	<1	.01	28	1260	18	<5	<20	29	.14	<10	85	<10	8	104
32	- L16N 8 E	20	<.2	2.55	5	4	180	<5	.60	<1	23	62	83	3.53	.13	<10	1.16	439	<1	.02	27	1850	18	<5	<20	37	.15	<10	91	<10	8	109
33	- L16N 8 + 25E	10	<.2	2.47	20	4	150	<5	.62	<1	21	52	100	3.16	.13	<10	.80	541	<1	.02	31	460	20	<5	<20	36	.15	<10	77	<10	14	102
35	- L17N 0 + 25E	20	<.2	1.60	20	4	70	<5	.47	<1	19	135	31	2.56	.07	<10	1.21	234	<1	.01	31	530	10	<5	<20	23	.13	<10	56	<10	7	62
36	- L17N 0 + 50E	5	<.2	2.53	10	2	215	<5	.47	<1	31	232	39	3.18	.32	<10	2.32	352	<1	.01	73	740	16	<5	<20	19	.19	<10	74	<10	8	67
37	- L17N 0 + 75E	25	<.2	1.70	15	4	70	<5	.49	<1	24	84	39	3.26	.15	<10	1.18	298	<1	.02	26	370	12	5	<20	28	.18	<10	93	<10	10	59
38	- L17N 1 + 00E	5	<.2	2.37	10	4	115	<5	.47	<1	30	162	43	3.24	.56	<10	1.79	327	<1	.01	53	700	16	<5	<20	36	.20	<10	92	<10	9	84
39	- L17N 1 + 25E	5	<.2	1.89	15	2	70	<5	.33	<1	21	193	24	2.59	.21	<10	1.09	217	<1	.01	32	730	14	<5	<20	28	.14	<10	62	<10	6	57
40	- L17N 2 + 25E	<5	<.2	2.11	10	6	75	<5	.40	<1	24	201	45	3.13	.13	<10	1.40	329	<1	.01	40	1010	16	<5	<20	22	.15	<10	70	<10	7	112
41	- L17N 3 + 58E	5	<.2	1.02	10	4	50	5	.46	<1	15	55	16	1.77	.05	<10	.70	147	<1	.02	16	110	10	<5	<20	39	.19	<10	66	<10	10	36
42	- L17N 3 + 75E	5	<.2	2.05	10	4	60	5	.49	<1	24	130	48	3.30	.07	<10	1.33	361	<1	.02	35	720	16	5	<20	32	.19	<10	91	<10	9	56
43	- L17N 4 + 00E	10	<.2	2.02	5	6	80	<5	.60	<1	25	81	69	3.53	.12	<10	1.21	347	<1	.02	29	740	14	5	<20	32	.18	<10	100	<10	10	69
44	- L17N 4 + 25E	15	<.2	2.02	10	4	85	<5	.85	<1	25	75	86	3.75	.22	<10	1.24	843	<1	.02	26	390	14	<5	<20	47	.21	<10	108	<10	15	71
45	- L17N 4 + 50E	15	<.2	2.26	20	10	100	<5	.88	<1	30	90	164	4.80	.47	<10	1.63	897	<1	.02	31	1260	16	5	<20	47	.19	<10	133	<10	14	84
46	- L17N 4 + 75E	15	2.8	4.39	20	4	445	<5	1.50	1	23	123	889	5.85	.38	<10	1.14	1850	<1	.01	58	740	32	5	<20	67	.11	<10	106	<10	32	89
47	- L17N 5 + 00E	5	<.2	1.78	10	4	105	<5	.48	<1	18	51	34	2.81	.08	<10	.64	337	<1	.01	19	930	16	<5	<20	29	.13	<10	73	<10	7	115
48	- L17N 5 + 25E	5	<.2	1.59	10	4	135	<5	.36	<1	17	42	24	2.40	.07	<10	.61	642	<1	.01	15	1510	16	5	<20	22	.12	<10	58	<10	6	138
49	- L17N 5 + 50E	5	<.2	1.76	10	2	195	5	.37	<1	17	48	18	2.78	.07	<10	.49	445	<1	.01	16	2700	18	<5	<20	28	.12	<10	62	<10	6	157
50	- L18N BLO+ 00W	<5	<.2	1.45	5	2	60	<5	.20	<1	12	56	8	1.59	.03	<10	.41	315	<1	.01	18	520	14	<5	<20	10	.10	<10	36	<10	5	66
51	- L18N 0 + 25E	<5	<.2	1.89	5	4	65	<5	.40	<1	26	96	12	2.19	.08	<10	1.68	254	<1	.01	44	390	14	5	<20	17	.14	<10	31	<10	6	69

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
52	L18N 0 + 50E	<5	<.2	1.89	10	4	60	5	.44	<1	25	120	28	2.81	.07	<10	1.24	278	<1	.01	42	600	14	<5	<20	21	.15	<10	54	<10	7	78
53	L18N 0 + 75E	<5	<.2	1.80	10	2	55	<5	.27	<1	18	88	13	2.33	.06	<10	.68	206	<1	.01	23	720	16	<5	<20	17	.13	<10	48	<10	6	84
54	L18N 1 + 00E	5	<.2	1.24	10	4	90	5	.25	<1	13	60	8	1.70	.04	<10	.47	444	<1	.01	15	660	14	<5	<20	11	.11	<10	38	<10	5	76
55	L18N 1 + 25E	10	<.2	1.64	5	4	80	5	.34	<1	17	115	15	2.12	.07	<10	.84	263	<1	.01	26	460	14	5	<20	17	.12	<10	41	<10	6	88
56	L18N 1 + 50E	<5	<.2	1.54	10	4	55	<5	.36	<1	18	97	17	2.12	.05	<10	1.02	217	<1	.01	27	590	12	5	<20	15	.13	<10	40	<10	7	64
57	L18N 1 + 75E	<5	<.2	1.94	10	4	55	5	.44	<1	23	87	28	3.03	.18	<10	1.21	301	<1	.01	28	380	16	5	<20	21	.17	<10	75	<10	9	73
58	L18N 2 + 00E	10	<.2	1.36	5	4	30	5	.48	<1	19	53	12	2.84	.31	<10	.98	241	<1	.02	18	290	10	5	<20	20	.18	<10	96	<10	9	50
59	L18N 2 + 25E	<5	<.2	2.01	15	2	95	<5	.38	<1	23	85	33	3.16	.12	<10	.94	355	<1	.01	28	1250	16	<5	<20	22	.13	<10	69	<10	6	155
60	L18N 2 + 50E	5	<.2	2.01	10	4	115	<5	.35	<1	21	104	19	2.48	.09	<10	1.11	236	<1	.01	40	1490	20	<5	<20	19	.15	<10	51	<10	7	119
61	L18N 2 + 75E	5	<.2	3.03	10	4	225	<5	.42	<1	31	108	52	3.94	.16	<10	1.40	1066	<1	.01	48	1860	24	<5	<20	24	.18	<10	91	<10	8	153
62	L18N 3 + 00E	5	<.2	1.86	10	4	115	<5	.41	<1	20	82	21	2.55	.15	<10	1.01	310	<1	.01	30	1230	16	5	<20	22	.15	<10	58	<10	8	104
63	L18N 3 + 25E	10	<.2	1.96	5	4	150	<5	.49	<1	24	107	34	3.10	.13	<10	1.17	454	<1	.02	35	890	14	5	<20	25	.16	<10	75	<10	8	122
64	L18N 3 + 50E	5	<.2	.99	<5	2	100	<5	.28	<1	10	34	11	1.61	.08	<10	.39	364	<1	.01	12	1230	10	<5	<20	15	.10	<10	44	<10	5	74
65	L18N 3 + 75E	5	<.2	1.65	<5	4	195	<5	.43	<1	19	60	52	2.48	.22	<10	.83	571	<1	.02	25	1280	16	<5	<20	22	.15	<10	61	<10	8	134
66	L18N 4 + 00E	5	<.2	2.29	5	4	145	<5	.96	<1	27	198	88	3.64	.29	<10	1.81	561	<1	.02	52	380	16	5	<20	34	.17	<10	88	<10	11	52
67	L18N 4 + 25E	5	<.2	2.33	5	4	150	<5	.51	<1	27	93	69	3.93	.23	<10	1.35	382	<1	.02	35	2170	18	<5	<20	27	.17	<10	94	<10	7	167
68	L18N 4 + 50E	10	<.2	3.20	10	4	215	5	.48	<1	30	98	50	3.89	.10	<10	.98	867	<1	.02	39	3270	30	<5	<20	34	.17	<10	81	10	9	257
69	L18N 4 + 75E	15	<.2	1.88	15	4	105	<5	.47	<1	21	72	32	2.77	.10	<10	.93	382	<1	.02	24	520	18	<5	<20	35	.19	10	75	40	11	105
70	L18N 5 + 00E	5	<.2	2.45	10	6	200	<5	.58	<1	26	136	77	3.40	.19	<10	1.39	654	<1	.02	40	1280	24	<5	<20	39	.19	10	84	<10	10	162
71	L18N 5 + 25E	5	<.2	2.20	10	8	140	<5	1.07	<1	31	98	136	5.20	.51	<10	1.56	727	<1	.02	30	970	16	5	<20	61	.19	10	149	<10	12	102
72	L18N 5 + 50E	<5	<.2	2.83	10	6	160	5	.59	<1	25	77	42	3.89	.12	<10	1.09	440	<1	.02	32	270	26	5	<20	38	.21	<10	105	100	12	92
73	L18N 5 + 75E	<5	<.2	2.77	10	4	110	5	.76	<1	30	79	48	4.56	.13	<10	1.39	421	<1	.02	31	610	24	<5	<20	42	.26	<10	126	<10	15	90
74	L19N BLO+ 00W	<5	<.2	1.58	10	6	70	5	.22	<1	20	112	12	1.86	.04	<10	.86	430	<1	.01	27	710	18	<5	<20	11	.11	10	31	<10	6	85
75	L19N 0 + 25E	10	<.2	1.75	5	6	55	5	.44	<1	24	192	12	2.24	.07	<10	1.71	298	<1	.01	44	340	14	<5	<20	18	.12	<10	34	<10	6	77
76	L19N 0 + 50E	<5	<.2	2.11	10	6	75	<5	.42	<1	18	101	27	2.68	.09	<10	1.06	277	<1	.01	34	570	22	<5	<20	22	.15	<10	54	50	9	103

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
77 -	L19N 0 + 75E	<5	<.2	1.84	15	4	80	<5	.32	<1	23	141	26	2.97	.12	<10	1.00	371	<1	.01	30	340	18	<5	<20	22	.14	10	64	<10	8	79
78 -	L19N 1 + 00E	<5	<.2	1.87	5	4	80	<5	.35	<1	19	104	17	2.55	.06	<10	1.00	279	<1	.01	27	560	16	<5	<20	24	.14	<10	58	<10	8	67
79 -	L19N 1 + 25E	<5	<.2	2.27	10	4	60	<5	.38	<1	36	197	26	3.74	.05	<10	2.16	219	<1	.01	57	450	18	<5	<20	22	.12	10	58	<10	5	63
80 -	L19N 1 + 50E	<5	<.2	1.79	5	4	65	<5	.30	<1	21	141	16	2.30	.05	<10	1.05	211	<1	.01	32	460	16	<5	<20	16	.12	<10	42	<10	6	86
81 -	L19N 1 + 75E	<5	<.2	2.04	5	4	80	<5	.38	<1	29	100	12	2.54	.04	<10	1.65	367	<1	.01	47	300	16	5	<20	17	.13	10	37	<10	6	90
82 -	L19N 2 + 00E	<5	<.2	1.90	5	4	125	<5	.29	<1	21	65	11	2.57	.06	<10	.85	464	<1	.01	34	510	16	<5	<20	16	.13	10	55	<10	6	82
83 -	L19N 2 + 25E	<5	<.2	1.85	10	4	85	<5	.40	<1	19	80	17	2.39	.15	<10	.90	343	<1	.01	26	490	16	5	<20	21	.16	<10	50	<10	8	83
84 -	L19N 2 + 50E	<5	<.2	1.52	15	4	105	<5	.51	<1	19	88	21	2.37	.15	<10	.94	549	<1	.02	27	810	12	<5	<20	26	.14	10	57	<10	7	93
85 -	L19N 2 + 75E	<5	<.2	1.38	10	4	245	<5	.17	<1	11	38	7	1.69	.04	<10	.30	464	<1	.01	12	3030	16	<5	<20	15	.10	<10	34	<10	6	71
86 -	L19N 3 + 00E	<5	<.2	1.64	10	4	95	<5	.41	<1	20	59	58	2.82	.14	<10	.91	323	<1	.01	24	930	12	5	<20	26	.15	10	75	<10	7	96
87 -	L19N 3 + 25E	5	<.2	1.27	10	4	55	<5	.26	<1	13	93	4	1.51	.02	<10	.76	499	<1	.02	31	1090	12	<5	<20	15	.10	<10	38	<10	5	70
88 -	L19N 3 + 50E	5	<.2	.58	5	2	40	<5	.14	<1	7	16	6	1.19	.02	<10	.19	169	<1	.01	7	360	6	<5	<20	10	.09	<10	35	<10	5	36
89 -	L19N 3 + 75E	<5	<.2	1.33	5	4	85	<5	.29	<1	13	42	18	1.88	.07	<10	.51	275	<1	.01	17	620	12	<5	<20	20	.13	<10	47	<10	7	67
90 -	L19N 4 + 00E	<5	<.2	1.82	15	4	120	5	.35	<1	18	71	29	2.46	.07	<10	.86	568	<1	.01	22	2090	16	<5	<20	23	.13	<10	57	<10	6	111
91 -	L19N 4 + 25E	<5	<.2	2.29	5	4	190	<5	.39	<1	19	63	24	2.78	.08	<10	.79	463	<1	.01	23	1040	22	5	<20	26	.15	10	65	<10	9	128
92 -	L19N 4 + 50E	5	<.2	2.04	10	4	140	5	.50	<1	20	73	31	2.81	.13	<10	.91	346	<1	.02	28	530	18	5	<20	32	.18	10	72	<10	10	83
93 -	L19N 4 + 75E	<5	<.2	1.26	5	4	260	<5	.26	<1	11	49	19	1.76	.05	<10	.44	449	<1	.01	12	1340	14	<5	<20	18	.12	10	45	<10	6	68
94 -	L19N 5 + 00E	5	<.2	1.21	10	4	105	10	.37	<1	19	40	11	3.19	.09	<10	.73	315	<1	.02	15	1240	12	5	<20	24	.20	<10	103	<10	10	63
95 -	L19N 5 + 25E	<5	<.2	2.07	10	4	135	<5	.60	<1	24	61	54	3.35	.23	<10	1.16	465	<1	.02	24	610	16	5	<20	34	.21	<10	95	<10	12	89
96 -	L19N 5 + 50E	5	<.2	1.78	5	4	195	<5	.57	<1	22	90	26	2.53	.20	<10	1.24	738	<1	.02	31	1090	14	5	<20	32	.15	10	66	<10	8	91
97 -	L19N 6 + 25E	10	<.2	1.81	10	4	110	<5	.39	<1	17	47	21	2.64	.10	<10	.62	603	<1	.01	18	1380	16	<5	<20	27	.14	<10	64	<10	8	135
98 -	L19N 6 + 50E	40	<.2	2.41	15	6	110	<5	.39	<1	17	56	36	2.97	.10	<10	.68	304	<1	.01	24	1270	22	<5	<20	29	.15	<10	72	<10	9	98
99 -	L19N 6 + 75E	45	<.2	2.93	10	4	145	5	.54	<1	19	65	34	3.50	.15	<10	.81	313	<1	.01	28	3040	28	5	<20	39	.15	<10	79	<10	10	126
100-	L19N 7 + 00E	20	<.2	2.13	5	6	100	<5	.40	<1	18	53	38	2.75	.09	<10	.71	285	<1	.02	24	1800	22	<5	<20	27	.14	<10	68	<10	8	94
101-	L19N 7 + 25E	<5	<.2	.83	5	6	50	<5	.30	<1	9	20	10	1.35	.04	<10	.23	345	<1	.01	7	510	10	<5	<20	20	.11	<10	40	<10	6	61
102-	L19N 7 + 50E	<5	<.2	2.72	5	6	130	<5	.54	<1	24	81	103	3.32	.10	<10	1.16	506	<1	.02	32	900	22	5	<20	38	.19	<10	87	<10	11	96

PIONEER METALS CORPORATION ETK 93-216 ECO-TECH LABORATORIES LTD. JULY 30, 1993

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
103-	L19N 7 + 75E	15	<.2	1.38	5	6	95	<5	.45	<1	19	32	34	2.57	.18	<10	.67	329	<1	.02	12	1870	12	5	<20	30	.17	10	69	<10	10	78
104-	L19N 8 + 25E	5	<.2	1.38	10	6	90	<5	.33	<1	13	41	29	2.20	.07	<10	.55	423	<1	.01	15	840	12	<5	<20	26	.14	<10	61	<10	8	77
105-	L19N 8 + 50E	<5	<.2	2.38	10	4	130	<5	.40	<1	20	69	42	3.22	.10	<10	.93	366	<1	.01	27	1480	20	5	<20	31	.15	<10	81	<10	8	108
106-	L19N 8 + 75E	<5	<.2	1.85	10	6	90	5	.39	<1	17	55	30	2.45	.09	<10	.68	545	<1	.01	22	980	16	5	<20	27	.15	10	61	<10	9	86
107-	L19N 9 + 00E	15	<.2	.91	5	4	65	<5	.22	<1	9	18	8	1.51	.04	<10	.25	313	<1	.01	10	890	10	<5	<20	18	.11	<10	40	<10	6	49
108-	L19N 9 + 25E	10	<.2	1.41	5	6	90	<5	.33	<1	14	37	16	1.98	.08	<10	.52	491	<1	.01	16	750	12	<5	<20	23	.13	<10	50	<10	7	85
109-	L19N 9 + 50E	5	<.2	2.54	15	4	120	5	.37	<1	18	58	25	2.99	.11	<10	.64	328	<1	.01	29	2220	22	<5	<20	30	.15	10	66	<10	9	96
110-	L19N 9 + 75E	5	<.2	1.73	5	6	165	<5	.37	<1	15	41	23	2.10	.07	<10	.51	1672	<1	.01	18	940	16	<5	<20	28	.13	<10	50	<10	8	140
111-	L19N 10+ 00E	5	<.2	1.76	10	6	65	<5	.72	<1	18	55	48	2.59	.13	<10	.81	275	<1	.02	20	170	14	<5	<20	40	.18	10	74	<10	12	56

NOTE: < = LESS THAN
> = GREATER THAN
Sample #34 damaged in transport

Fax @: 669-1240

cc: David Ridley
@: 397-2958
Call for pickup @: 397-2771

SC93/PioneerMetals

ECO-TECH LABORATORIES LTD.
FRANK J. PEZZOTTI, A.Sc.T.
B.C. Certified Assayer

PIONEER METALS CORPORATION ETK 93-216

ECO-TECH LABORATORIES LTD.

JULY 30, 1993

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QC/DATA:	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
Repeat #:																														
25- L16N 6 + 25E	<.2	2.46	15	4	90	<5	.53	<1	29	69	89	3.68	.11	<10	1.54	469	<1	.01	41	520	16	5	<20	36	.19	<10	97	<10	9	82
69- L18N 4 + 75E	<.2	1.98	10	6	100	<5	.50	<1	23	77	34	2.93	.10	<10	.99	401	<1	.02	25	550	20	<5	<20	35	.20	10	80	<10	11	111
91- L19N 4 + 25E	<.2	2.32	10	4	200	5	.40	<1	19	63	24	2.78	.08	<10	.79	481	<1	.01	24	1050	20	5	<20	26	.16	<10	66	<10	8	127
STANDARD 1991:	1.4	1.88	65	6	125	<5	1.68	<1	20	64	81	3.75	.38	<10	.99	683	<1	.02	24	610	24	5	<20	66	.12	10	78	<10	11	70

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KAMLOOPS, B.C. V2C 2J3
PHONE - 604-573-5700
FAX - 604-573-4557

PIONEER METALS CORPORATION ETK 93-217
1770-401 W. GEORGIA STREET
VANCOUVER, B.C.
V6B 5A1

ATTENTION: D. DUNN

AUGUST 4, 1993

16 ROCK SAMPLES RECEIVED JULY 22, 1993
PROJECT #: CANIM LAKE
SHIPMENT #: 3

VALUES IN PPM UNLESS OTHERWISE REPORTED

PAGE 1

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
1	- STRAW 93 DR- 11	10	<.2	.45	20	6	25	<5	6.09	<1	19	63	15	2.94	.14	<10	3.08	821	<1	.01	14	180	2	10	<20	191	.02	<10	55	<10	5	25
2	- STRAW 93 DR- 12	45	<.2	.43	5	6	25	<5	.86	<1	8	61	200	2.25	.08	<10	.31	210	1	.04	5	660	4	<5	<20	50	.09	10	94	<10	7	13
3	- STRAW 93 DR- 13	145	<.2	.95	15	6	20	<5	1.70	<1	13	36	261	2.52	.20	<10	.70	345	1	.02	5	1660	10	<5	<20	126	.13	<10	81	<10	9	22
4	- STRAW 93 DR- 14	130	<.2	.45	5	6	65	<5	1.57	<1	8	156	407	1.03	.18	<10	.48	427	6	.02	6	470	4	<5	<20	27	.07	10	35	<10	5	15
5	- STRAW 93 DR- 15	10	<.2	.79	10	4	30	<5	3.55	<1	7	88	16	2.12	.08	<10	.41	778	4	.02	4	560	6	<5	<20	154	.09	<10	109	<10	6	14
6	- STRAW 93 DR- 16	5	<.2	.64	10	4	15	<5	4.61	<1	6	58	70	.91	.09	<10	.27	357	1	<.01	3	900	4	<5	<20	138	.15	<10	52	<10	9	5
7	- STRAW 93 DR- 17	80	<.2	1.33	10	6	285	<5	1.96	<1	24	35	2152	5.16	.49	<10	1.28	695	<1	.08	5	1900	4	<5	<20	77	.16	10	154	<10	10	47
8	- STRAW 93 DR- 18	185	.8	1.17	10	4	150	<5	1.66	<1	25	41	8690	5.04	.31	<10	.99	506	1	.08	5	1980	2	<5	<20	106	.12	10	107	<10	8	48
9	- STRAW 93 DR- 19	120	1.2	.52	15	6	65	<5	4.48	<1	7	31	2499	1.25	.27	<10	.39	556	2	.02	2	1370	2	<5	<20	75	.11	<10	79	<10	11	9
10	- STRAW 93 DR- 20	5	<.2	1.11	10	6	70	<5	4.01	<1	20	46	326	3.83	.28	<10	1.28	772	<1	.02	8	950	4	<5	<20	108	.10	<10	124	<10	7	31
11	- STRAW 93 DR- 21	5	<.2	1.02	15	2	50	<5	9.93	<1	18	31	198	2.75	.20	<10	1.15	1191	<1	.01	8	670	8	5	<20	169	.09	<10	92	<10	10	46
12	- STRAW 93 DR- 22	5	<.2	1.23	10	4	65	<5	6.22	<1	22	94	189	4.16	.20	<10	1.76	1140	<1	.02	18	920	2	5	<20	117	.05	10	138	<10	7	36
13	- STRAW 93 DR- 23	5	<.2	1.42	5	8	190	<5	1.86	<1	26	50	268	4.47	.72	<10	1.61	672	<1	.02	11	1090	6	<5	<20	66	.13	10	139	<10	7	43
14	- STRAW 93 DR- 24	5	<.2	.70	15	4	80	<5	9.37	<1	9	40	81	2.50	.11	<10	.71	1406	<1	<.01	5	620	<2	<5	<20	141	.07	<10	104	<10	7	14
15	- STRAW 93 DR- 25	10	<.2	1.20	10	2	65	<5	6.12	<1	21	93	193	4.13	.19	<10	1.74	1126	<1	.02	17	900	2	<5	<20	112	.05	<10	138	<10	7	37
16	- 93-ST CR - 1	10	<.2	1.05	20	8	35	<5	1.71	<1	16	41	145	3.10	.33	<10	.82	472	1	.06	4	1380	10	<5	<20	86	.13	10	100	<10	10	29

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QC/DATA:	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
Repeat #:																														
11- STRAW 93 DR- 21	<.2	1.05	15	2	50	<5	10.06	<1	18	31	204	2.78	.20	<10	1.16	1210	<1	.01	9	670	6	5	<20	173	.10	<10	94	<10	10	32
STANDARD 1991:	1.0	1.56	65	4	115	<5	1.42	<1	17	54	64	3.20	.33	<10	.86	592	<1	.01	18	550	18	5	<20	53	.10	20	65	<10	10	56

NOTE: < = LESS THAN
> = GREATER THAN

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cc: David Ridley
@: 397-2958
Call for pickup @: 397-2771

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FAX - 604-573-4557

PIONEER METALS CORPORATION ETK 93-344
1770-401 W. GEORGIA STREET
VANCOUVER, B.C.
V6B 5A1

ATTENTION: DAVID DUNN

SEPTEMBER 21, 1993

9 ROCK SAMPLES RECEIVED SEPTEMBER 2, 1993
PROJECT #: CANIM LAKE
SHIPMENT #: 8

VALUES IN PPM UNLESS OTHERWISE REPORTED

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
1	- STRAW 93: DR 26	<5	<.2	.63	50	2	45	25	.79	<1	28	72	38	6.17	.20	<10	.73	303	1	.04	26	250	2	20	<20	18	.20	<10	278	<10	12	29
2	- STRAW 93: 127431	30	<.2	.78	15	2	100	<5	3.17	<1	35	10	958	7.32	.33	<10	1.58	774	<1	.02	10	340	2	25	<20	127	.12	<10	274	<10	8	49
3	- PAP 93: DR 5	<5	<.2	2.86	15	2	70	10	3.21	<1	9	22	38	5.08	.16	<10	2.23	675	2	<.01	11	750	8	20	<20	37	.03	<10	55	<10	10	76
4	- PAP 93: DR 6	<5	2.8	1.41	15	2	35	<5	2.44	<1	11	91	652	3.28	.08	<10	.83	586	4	.01	21	970	8	10	<20	30	.06	<10	77	<10	8	150
5	- PAP 93: DR 7	<5	<.2	1.90	5	2	25	25	8.17	<1	27	46	48	4.82	.02	<10	1.81	829	1	.02	15	410	4	15	<20	52	.28	<10	136	<10	25	32
6	- PAP 93: DR 8	<5	<.2	.25	40	2	80	5	7.46	<1	9	64	31	4.52	.11	<10	1.71	1961	3	<.01	9	640	<2	15	<20	232	<.01	<10	26	<10	5	31
7	- PAP 93: DR 9	220	1.2	.05	2586	2	35	15	12.32	36	10	26	75	8.16	.01	<10	3.91	9453	1	<.01	4	30	<2	35	<20	290	<.01	<10	5	<10	8	19
8	- PAP 93: DR 10	<5	<.2	.48	30	6	105	15	3.66	<1	53	361	49	5.56	.20	<10	8.30	1256	<1	<.01	387	780	2	40	<20	158	<.01	<10	58	<10	2	50
9	- PAP 93: DR 11	<5	<.2	3.11	15	2	45	10	6.17	<1	36	353	83	5.29	.08	<10	4.83	1489	<1	<.01	97	730	10	25	<20	173	.06	<10	142	<10	9	49
QC/DATA:																																
Repeat #:																																
8	- PAP 93: DR 10		<.2	.49	30	6	100	5	3.45	<1	50	345	48	5.26	.20	<10	7.74	1163	<1	<.01	367	740	<2	35	<20	150	<.01	<10	56	<10	2	48
STANDARD 1991:			1.2	1.89	65	2	125	10	1.73	<1	20	66	80	3.84	.40	<10	.97	710	<1	.02	25	660	26	15	<20	61	.11	<10	80	<10	13	74

NOTE: < = LESS THAN

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PIONEER METALS CORPORATION ETK 93-179
1770-401 W. GEORGIA STREET
VANCOUVER, B.C.
V6B 5A1

ATTENTION: D. DUNN

JULY 19, 1993

VALUES IN PPM UNLESS OTHERWISE REPORTED

23 ROCK SAMPLES RECEIVED JULY 7, 1993
PROJECT #: CANIM LAKE

ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
1	- RED 93 DR 1	10	.2	.52	20	10	120	<5	1.42	1	14	178	10	2.56	.04	<10	.62	325	18	.04	42	1500	14	<5	<20	24	<.01	<10	36	<10	9	135
2	- RED 93 DR 2	10	.4	.33	25	18	155	5	1.86	<1	6	211	11	5.53	.05	<10	.44	104	31	.04	13	9270	14	<5	<20	38	.04	<10	54	<10	15	66
3	- STRAW 93 2	15	<.2	1.08	10	8	45	5	.89	<1	35	179	20	3.52	.05	<10	1.47	436	1	.04	17	1310	16	<5	<20	21	.16	<10	79	<10	9	42
4	- STRAW 93 3	10	.2	1.50	25	8	75	<5	4.33	<1	25	57	359	3.59	.40	<10	1.80	840	4	.03	8	1820	18	10	<20	149	.13	<10	128	<10	9	45
5	- STRAW 93 4	10	.2	1.85	15	10	110	<5	2.24	<1	26	46	170	3.49	.65	<10	1.75	752	1	.05	9	1840	24	5	<20	122	.17	<10	131	<10	9	78
6	- STRAW 93 5	15	.4	1.56	5	6	130	<5	.95	<1	14	91	42	2.79	.79	<10	1.06	574	5	.07	3	920	22	<5	<20	55	.12	<10	72	<10	8	38
7	- STRAW 93 6	170	.2	.07	<5	6	10	<5	.07	<1	6	274	300	.55	<.01	<10	.07	91	15	<.01	5	40	2	<5	<20	3	<.01	<10	5	<10	<1	7
8	- STRAW 93 7	10	.2	1.31	20	4	90	<5	3.06	<1	25	38	559	4.79	.21	<10	1.28	820	2	.05	5	1920	16	<5	<20	142	.18	<10	150	<10	12	51
9	- STRAW 93 8	115	.2	2.15	10	6	75	<5	3.49	<1	29	34	417	4.96	.18	<10	2.00	636	1	.12	12	9260	24	5	<20	192	.08	<10	222	<10	16	46
10	- STRAW 93 9	40	.2	1.76	10	6	140	<5	2.54	<1	25	27	113	4.76	.27	<10	1.49	521	1	.09	10	5840	22	5	<20	168	.08	<10	198	<10	13	45
11	- STRAW 93 10	10	<.2	2.17	30	14	140	<5	2.93	<1	41	53	191	4.18	.40	<10	2.29	559	1	.08	16	2910	26	5	<20	120	.12	<10	153	<10	8	32
12	- HEN 93 DR 3	10	.4	2.40	10	12	180	<5	3.52	<1	18	55	90	2.18	.52	<10	.66	339	1	.14	11	1440	32	5	<20	148	.23	<10	96	<10	17	29
13	- HEN 93 DR 4	10	.2	1.76	20	18	175	<5	3.93	<1	19	48	97	2.83	.61	<10	.66	343	2	.09	9	1220	24	5	<20	139	.21	<10	99	<10	17	31
14	- HEN 93 DR 5	5	<.2	3.85	80	10	105	<5	6.35	<1	17	135	102	2.03	.48	<10	.48	554	5	.17	39	1000	48	5	<20	210	.15	<10	80	<10	12	27
15	- HEN 93 DR 6	5	<.2	4.26	50	8	185	<5	3.16	<1	25	153	113	2.56	.82	<10	1.12	254	5	.25	77	1320	56	5	<20	197	.19	<10	92	<10	12	31
16	- HEN 93 DR 7	10	.2	.78	5	10	65	<5	.95	12	33	132	172	4.05	.23	<10	.62	251	25	.12	108	1070	16	5	<20	16	.21	<10	142	<10	16	430
17	- HEN 93 DR 8	5	.2	1.99	35	10	145	<5	.98	<1	33	269	110	3.44	1.24	<10	1.87	256	8	.11	129	1220	30	10	<20	31	.27	<10	130	<10	17	45
18	- HEN 93 DR 9	>1000	.4	2.85	35	6	90	<5	4.27	<1	19	92	50	1.90	.12	<10	.40	460	2	<.01	25	1030	44	15	<20	62	.07	<10	60	<10	5	18
19	- HEN 93 DR 10	45	.2	3.61	30	10	70	<5	2.79	<1	26	43	129	3.67	.11	<10	.57	186	38	.21	24	1200	48	5	<20	249	.06	<10	79	<10	5	47
20	- HEN 93 DR 11	15	<.2	.93	10	12	40	<5	5.16	<1	11	45	70	1.04	.13	<10	.18	314	3	.08	11	960	18	<5	<20	81	.12	<10	25	<10	12	12

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PIONEER METALS CORPORATION ETK 93-178
1770-401 W. GEORGIA STREET
VANCOUVER, B.C.
V6B 5A1

ATTENTION: D. DUNN

JULY 15, 1993

7 SILT SAMPLES RECEIVED JULY 7, 1993
PROJECT #: CANIM LAKE

VALUES IN PPM UNLESS OTHERWISE REPORTED

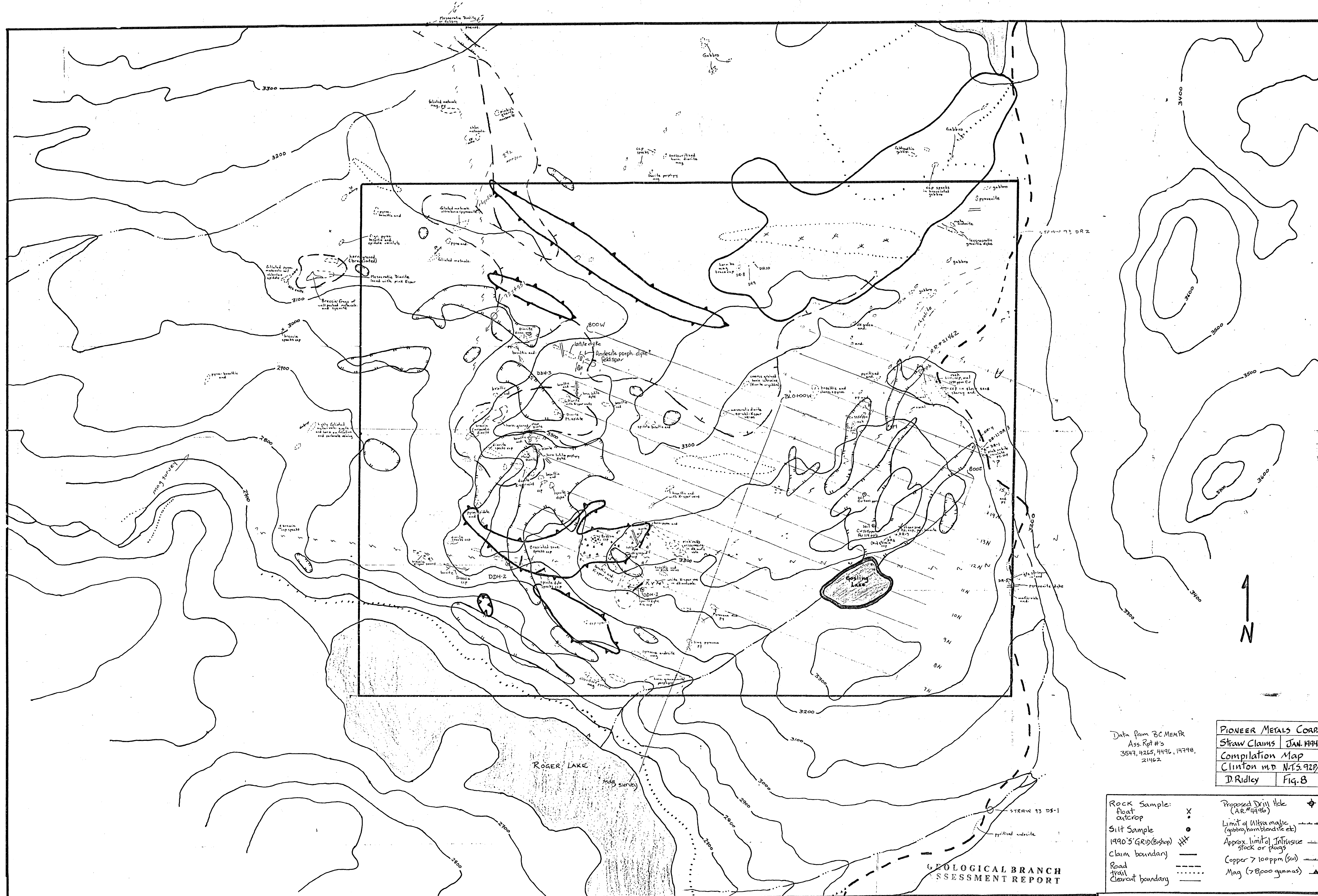
ET#	DESCRIPTION	AU (ppb)	AG	AL(%)	AS	B	BA	BI	CA(%)	CD	CO	CR	CU	FE(%)	K(%)	LA	MG(%)	MN	MO	NA(%)	NI	P	PB	SB	SN	SR	TI(%)	U	V	W	Y	ZN
1	- HEN 93 CS1	<5	<.2	1.87	45	2	195	<5	.76	1	16	60	68	2.83	.28	10	.84	446	<1	.01	50	490	6	<5	<20	44	.10	<10	89	<10	15	53
2	- HEN 93 CS2	20	<.2	1.30	35	2	165	<5	.74	1	17	53	91	2.59	.29	<10	.76	520	<1	.01	58	390	6	5	<20	41	.09	<10	77	<10	10	65
3	- HEN 93 DS1	10	.2	1.46	20	2	215	<5	.64	1	19	65	124	2.66	.29	<10	.76	346	1	<.01	89	360	6	5	<20	40	.09	<10	78	<10	11	55
4	- HEN 93 DS2	<5	.6	1.37	20	<2	110	<5	.55	<1	15	49	35	2.69	.18	<10	.67	480	1	<.01	23	430	6	5	<20	30	.10	<10	82	<10	8	49
5	- HEN 93 DS3	<5	<.2	1.85	35	<2	200	<5	.52	1	26	75	78	3.64	.55	<10	1.46	657	<1	.01	50	1200	8	5	<20	44	.14	<10	99	<10	12	82
6	- STRAW 93 CS1	5	<.2	1.97	5	2	135	<5	.76	1	22	151	91	3.00	.10	<10	1.78	670	<1	<.01	37	500	4	5	<20	31	.08	<10	53	<10	8	55
7	- STRAW 93 DS1	<5	<.2	1.17	10	2	70	<5	.44	<1	14	42	30	2.63	.12	<10	.99	454	<1	<.01	23	710	4	5	<20	20	.04	<10	58	<10	4	44
QC/DATA:																																
Repeat #:																																
3	- HEN 93 DS1		.2	1.44	20	2	210	<5	.62	1	18	64	123	2.53	.27	<10	.76	333	1	<.01	86	350	6	5	<20	35	.09	<10	74	<10	10	56
STANDARD 1991:			1.2	1.40	65	2	155	<5	1.53	<1	17	48	84	3.14	.36	<10	.92	661	<1	<.01	22	610	16	5	<20	51	.05	<10	60	<10	8	75

NOTE: < = LESS THAN

Fax @: 669-1240
cc: David Ridley

SC93/KAMISC

ECO-TECH LABORATORIES LTD.
FRANK J. PEZZOTTI, A.Sc.T.
B.C. Certified Assayer



GEOLOGICAL BRANCH
ASSESSMENT REPORT

23,279

L19N .22 .44 .42 .32 .35 .38 .30 .38 .29 .40 .51 .17 .41 .26 .14 .29 .35 .39 .50 .26 .37 .60 .57 .37 .39 .54 .40 .30 .54 .45 NS .33 .40 .39 .22 .33 .37 .37 .72
.04 .07 .09 .12 .06 .05 .05 .04 .06 .15 .15 .04 .14 .02 .02 .07 .07 .08 .13 .05 .09 .23 .20 .10 .10 .15 .09 .04 .10 .18 NS .07 .10 .09 .04 .08 .11 .07 .13

L18N .20 .40 .44 .27 .25 .34 .36 .44 .48 .38 .35 .42 .41 .49 .28 .43 .96 .57 .48 .47 .58 1.07 .57 .76
.03 .08 .07 .06 .04 .07 .05 .18 .31 .12 .09 .16 .15 .13 .08 .22 .29 .23 .10 .10 .19 .51 .12 .13

L17N .47 .47 .49 .47 .33 .40 .46 .49 .60 .85 .88 1.50 .48 .36 .37
.07 .32 .15 .56 .21 .13 .05 .07 .12 .22 .47 .38 .08 .07 .07

L16N .58 .75 .50 .87 .52 .89 .45 .48 .57 .48 .37 .63 .50 .43 .49 .54 .44 .74 .42 .28 .84 .43 .59 .29 .56 .30 .45 .40 .51 .46 .44 .60 .62
.16 .29 .29 .26 .15 .10 .06 .13 .16 .11 .09 .20 .10 .10 .10 .16 .13 .18 .08 .06 .74 .25 .11 .05 .12 .06 .05 .09 .07 .15 .11 .13 .13

0+00 1E 2E 3E 4E 5E 6E 7E 8E 9E 10E

N

← ROAD

Ca(%) + K(%)

PIONEER METALS CORP.
Straw Claims | DEC. 1993
Clinton M.D. N.T.S. 92P/15W
Ca/K Soil Geochem
C.J. Ridley | FIG. 7
50 0 25 50 100 150
1:3,000 meters

L19N

<45 10 <5 <5 <5 <5 <5 <5 <5 <5 <5 <5 <5 <5 5 5 <5 <5 <5 5 <5 5 <5 5 NS NS 10 40 45 20 <5 <5 15 NS 5 <5 <5 15 10 5 5 5

12 12 27 26 17 26 16 12 11 17 21 7 50 4 6 18 29 24 31 19 11 54 26 121 36 34 38 10 103 34 29 42 30 8 16 25 23 48

L18N

<5 <5 <5 <5 5 10 <5 <5 10 <5 5 5 5 10 5 5 5 5 10 15 5 5 <5 <5

8 12 28 13 8 15 17 28 12 33 19 52 21 34 11 52 88 69 50 32 77 136 42 48

L17N

20 5 25 5 5 <5 5 5 10 15 15 5 5 5 5

31 37 39 43 24 45 16 48 69 86 164 889 34 24 18

L16N

<5 <5 <5 <5 <5 <5 <5 <5 <5 <5 10 15 <5 5 10 5 15 5 10 5 10 15 10 10 10 65 20 5 15 <5 15 26 10

42 116 46 38 67 67 11 25 54 31 23 92 32 30 25 59 60 96 26 22 50 110 313 22 94 48 7 60 198 217 68 88 100

0+00 1E 2E 3E 4E 5E 6E 7E 8E 9E 10E

← ROAD

PIONEER METALS CORP.

Straw Claims | DEC. 1993

Clinton M.D. N.T.S. 92P/15W

Au/Cu SOIL GEOCHEM

C.J. Ridley | FIG. 6

50 0 25 50 100 150

1:3,000 meters

Au (ppb)
+
Cu (ppm)

PIONEER METALS CORP.	
STRAW CLAIMS	DEC. 1993
CLINTON M.D. N.T.S. 92P/15W	
ROCK SAMPLING MAP	
C.J. Ridley	FIG. 5

100 0 100 200
1:6,000 metres

8+00W

3300

BL0+00W
20N

1E 2E 3E 4E 5E 6E 7E 8E 9E

L19N
10E

STRAW CLAIM
LINE

DR2

3500

N

ROAD

3200

DR8 DR9 DR10

CR1

DR20-24

DR25

DR19

L15N
8E

DR13

DR4
DR3
DR1

DR5

3100

3400

DR14+15

DR7

DR6
qtz.

DR17

DR18

DR16

DR12

3200

DR11

3100

3000

3300

Gosling Lake

BL0+00W
7N