

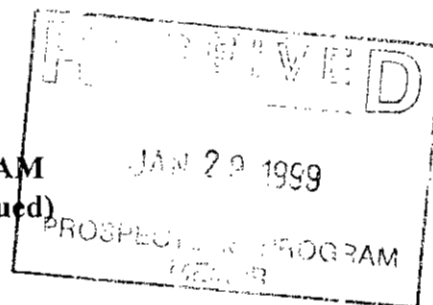
BRITISH COLUMBIA
PROSPECTORS ASSISTANCE PROGRAM
MINISTRY OF ENERGY AND MINES
GEOLOGICAL SURVEY BRANCH

PROGRAM YEAR: 1998/99

REPORT #: PAP 98-13

NAME: STEVE BELL

**BRITISH COLUMBIA
PROSPECTORS ASSISTANCE PROGRAM
PROSPECTING REPORT FORM (continued)**



B. TECHNICAL REPORT

- One technical report to be completed for each project area.
- Refer to Program Requirements/Regulations 15 to 17, page 6.
- If work was performed on claims a copy of the applicable assessment report may be submitted in lieu of the supporting data (see section 16) required with this TECHNICAL REPORT.

SEE: ASSESSMENT REPORT SUBMITTED

Name STEVE BELL Reference Number 98/99-P22

LOCATION/COMMODITIES

Project Area (as listed in Part A) TAL 1-15 MINFILE No. if applicable _____
 Location of Project Area NTS 93 L19 ZONE 9 Lat 54°36' Long 126°05'
 Description of Location and Access LOCATED 19 KM NORTH-EAST OF TOPLEY B.C. ACCESS VIA HOLMES FOREST SERVICE ROAD. AT TRANSMISSION LINE HIKE 7.7 KM TO CLAIMS (EAST)
 Main Commodities Searched For BASE METALS ZN, Pb, Cu

Known Mineral Occurrences in Project Area MINE FILE 0936/259 NOT OBSERVED IN FIELD.

WORK PERFORMED

1. Conventional Prospecting (area) _____
2. Geological Mapping (hectares scale) _____
3. Geochemical (type and no. of samples) (SOILS "C" HORIZON + SOIL PROFILE + TILL 2-21 (ICP 12))
4. Geophysical (type and line km) STREAM + CLAY
5. Physical Work (type and amount) _____
6. Drilling (no. holes, size, depth in m, total m) _____
7. Other (specify) _____

SIGNIFICANT RESULTS

Commodities _____ Claim Name _____
 Location (show on map) Lat _____ Long _____ Elevation _____
 Best assay/sample type STREAM SAMPLE 7130 PPM ZN, 1625 PPM Pb, 1272 PPM Cu
 Description of mineralization, host rocks, anomalies THE CLAIMS ARE LOCATED ON A CONTACT BETWEEN THE EARLY JURASSIC TOPLEY INTRUSION AND LOWER JURASSIC HAZELTON GROUP VOLCANIC ROCKS WHICH POSSIBLY HOST ZN, Pb, Cu MINERALIZATION.

Supporting data must be submitted with this TECHNICAL REPORT

Information on this form is confidential for one year from the date of receipt subject to the provisions of the *Freedom of Information Act*.

Geochemical Report

Approval Number SMI-98-0200556-146

On Field Work Done

Between June 22 and August 31, 1998

On

The Tac Mineral Claims

Located South of Matzehtzal Mountain

Omineca Mining Division, B. C.

NTS Map 93 L/9 Zone 9

Grid Coordinates 60 55 250 North
 6 83 800 ~~South~~ East

Latitude 54 deg. 36 min.

Longitude 126 deg. 09 min.

Owner Steve Bell

By

Steve Bell

January 1999

Table of Contents

	<u>Page</u>
Introduction	1
Summary of Work	9
Observations	15
Conclusions	19
Recommendations	21
Statement of work	22

Figures

Location Map	3
Mineral Titles Map	7
Survey Grid	13
Reconnaissance Grid (map pocket)	map pocket
Detail Grid (map pocket)	map pocket

Appendix

Soil Profiles (field notes see appendix)	1-6
Analytical Data (ICP analysis)	

(A)

Introduction

The following is a record of the exploration work performed on the Tac mineral claims between June 22 and August 31 1998. The property may host poly metallic veins as indicated by mineralized float and a strong hydromorphic zinc, lead and copper geochemical anomaly.

(i)

Position/Physiography

The claims are located on the southern flank of Matzehtzel mountain in the Nechako plateau region 19 km. north east of Topley B. C. This plateau region consists of a collection of mountains and plains which generally vary between 1200 and 1500 meters in elevation. Ice has overrode the entire area and has produced a glaciated topography in both bedrock and till. Glacial drift is widespread. The glacial history is complex and the Quaternary geology complicated. Recent work by Levson (1997) suggests that an ice divide may have occurred over the project location spreading ice both to the east and west during the last glaciation.

The claims surround a small unnamed sub alpine lake which is referred to as lake 2044 in this report. Local elevations vary between 1550 m and 1650 m.

The south west corner of the claim group is located at:

Latitude 54 deg. 36 min.

Longitude 126 deg. 09 min.

On NTS map 93 L/9 Zone 9 at grid coordinates:

60 55 250 North

6 83 800 South

See figure (1) for map sheet location.

(ii)

Access

Access is by motor vehicle and hiking. From Houston via highway 16 turn north at Topley and travel toward Granilse. Turn east on to the Holmes forest service road stopping at the transmission line. The distance by vehicle from Houston is 48 km. Leave vehicle here and travel east by hiking to lake 2044. Hiking distance is 7.7 km.

TOPLEY MAP 93 -19

0 1000 2000 3

METERS

TAC #	TENURE #
1	360336
2	360337
3	360338
4	360339
5	360340
6	360341
7	364236
8	364239
9	364240
10	364241
11	364242
12	364243
13	364244
14	364245
15	364361

V I N C I A L

F O R E S T

Matzahzei
Mountain

TAC 1-15 MINERAL CLAIMS

Figure 1.

(iii)

Exploration History

Bed rock exposures in the area were examined by early prospectors who radiated out from the Topley Richfield discovery 8 km to the south west. Weak copper mineralization was found associated with andesitic dykes cutting Topley intrusive rocks (Minister of Mines Annual report 1932).

In 1986 results of a regional geochemical reconnaissance survey (GSC open file 1361) which included lake sediments was released. A center lake sediment taken from lake 2044 was anomalous in Zn, Pb, Ag and Cd.

In october 1997 a follow up geochemical survey was conducted by S. Bell about lake 2044. The survey tested drainages leading to the lake. Sediments from two streams entering the lake had anomalous levels of Zn, Pb, Cu and Cd. A Western source direction was indicated.

In November 1997 claims were staked by S. Bell to cover the most anomalous drainages about lake 2044.

In January 1998 results of a regional lake sediment survey of the Babine porphyry belt were released (GS B. C. open file 1997-17). Lake 2044 was featured as having the highest single sediment zinc concentration and the second highest lead concentration. Silver, gold and cadmium were also anomalous.

In 1998 a large scale geochemical survey was conducted by S. Bell over the Tac claim group. Soils near the lake were tested and a detailed survey of the most anomalous drainage was performed.

The following is a compilation of previous claims located near or on the Tac 1-15 claim group. The information was derived from the public record or taken from old claim posts found in the field. There are no records of assessment recorded for these is locations.

- (a) In 1972 W. R. Bacon recorded the Mat claim group north of Lake 2044. (Forfeiture in 1973)
- (b) In 1973 W. R. Bacon recorded the Chek claim group west of Lake 2044. (Forfeiture in 1974)
- (c) In 1984 Canamax Resources located a 20 unit claim north-east of lake 2044. (Not recorded)
- (e) In 1986 Bishop Resources Development Ltd. staked 175 units of claims Between Nez Lake and Matzehtzal mountain. (Forfeiture 1987)
- (f) In November 1997 S. Bell staked Tac 1-6 claims.
- (g) In July 1998 S. Bell staked Tac 7-15 claims

(iv)

Claims and Ownership

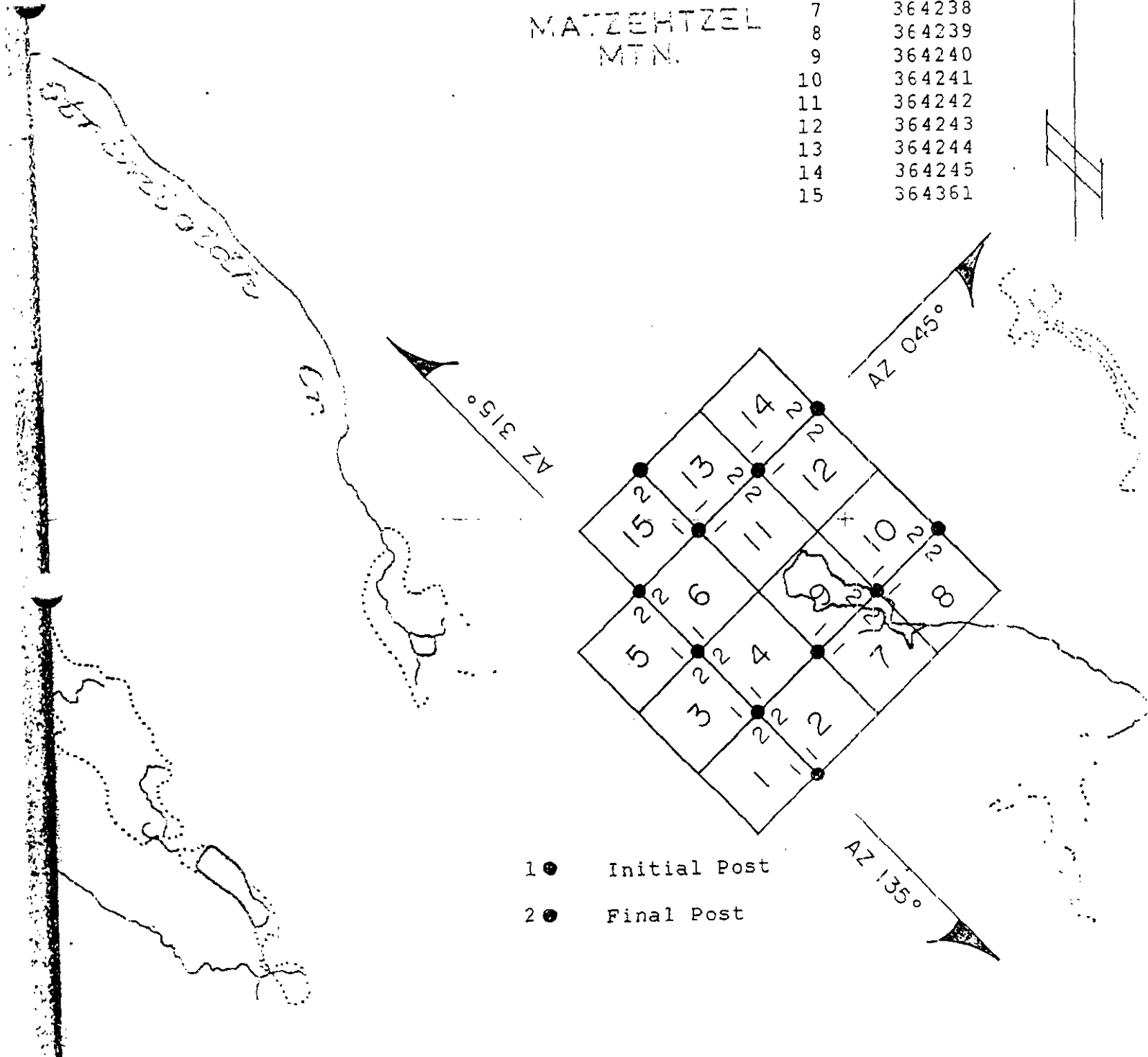
The Tac property consists of 15 one unit claims which are owned and operated by S. Bell of Houston B. C.

<u>Claim Name</u>	<u>Tenure #</u>
Tac 1	360336
Tac 2	360337
Tac 3	360338
Tac 4	360339
Tac 5	360340
Tac 6	360341
Tac 7	364238
Tac 8	364239
Tac 9	364240
Tac 10	364241
Tac 11	364242
Tac 12	364243
Tac 13	364244
Tac 14	364245
Tac 15	364361

See figure (2) for claim post locations.

MATZEHTZEL
MTN.

1	360336
2	360337
3	360338
4	360339
5	360340
6	360341
7	364238
8	364239
9	364240
10	364241
11	364242
12	364243
13	364244
14	364245
15	364361



- 1 ● Initial Post
- 2 ● Final Post

MINERAL TITLES MAP 93 L 09 E
METERS

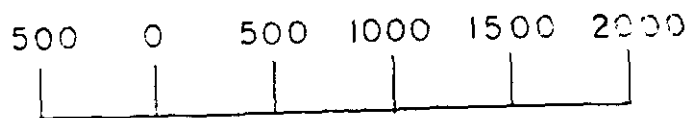


Figure 2.

(v)

Economic Assessment

Geochemical data indicates the presence of underlying base metal mineralization. The batholithic Topley intrusive and near by volcanic Hazelton group rocks are the likely hosts.

(B) Summary of work

In 1998 a geochemical survey was conducted over the Tac claim group where 221 samples were taken from specific locations and analyzed for base metal and pathfinder elements. Sample locations are indicated on fig. 4 and fig. 5. Samples were also taken from drainages within the vicinity of the Tac claims over similar terrain and provides some background. A reconnaissance survey tested the soils about lake 2044 on a widely spaced grid and a detailed survey tested the most anomalous drainage.

(C) Geochemical Survey

(i) Soil Development

The soil overlies glacial till and locally derived colluvium. At higher elevations it is very thin and poorly developed with little accumulation of organic matter.

In low areas east of lake 2044 a blanket of fluvial material consisting of sandy gravels which mask underlying sediments or bed rock. Considerable areas north and south of the lake are covered by muskeg. A blue grey layer of clay is found under the muskeg at an average depth of about 2m. The clay is poorly developed and often contains angular rock fragments. This suggests that the the clay may be derived from underlying bedrock. The lake bottom sediments near shore are washed gravels with abundant rock fragments.

(ii) Drainage Pattern

The drainage pattern about lake 2044 is very well defined. There are two principle drainages which feed the lake and one exit stream. The streams occupy linear topographic lineaments which intersect beneath the lake. The first stream enters the lake from the north west and decants a swampy area north of the lake. Its headwaters are located on Tac 13. The second stream flows from the high ground west of the lake. Its head waters emanate from a seep which drains the pile of till overlying Tac 5 and Tac 6. Lake 2044 is about 600 m long and 7m deep. It is drained by St. Pierre creek which flows from the lake to the south east.

(iii) Geochemical Target

The survey was designed to test for structurally controlled polymetallic vein - stockwork or breccia type base metal mineralization. Sample sites were selected based upon the following model and assumptions.

(a) Mineralization is spatially associated with structural breaks which appear as topographic lineaments on air photos.

(b) Mineralization is related to intrusive rocks and their contacts with Hazelton group volcanic rocks underlying the claims.

||

(c) The target is a residual anomaly in till which overlies mineralization. The anomaly is probably very small and subtle.

(d) The dispersal pathways of metals related to mineralization begin at the residual anomaly and lead down slope to the lake via the drainage.

(e) A large easily detectable dispersal train in till probably does not exist here in the sub alpine due to the complex mixing of tills in the vicinity of an ice divide. Tills which overlie the claims are not locally derived but originate 100's of meters up ice. Anomalous material from mineralized zones would have been diluted and displaced by this till to lower elevations off the claim group.

(iv) Sample Sites

(a) Sample sites were chosen to test a topographic lineament which runs through lake 2044 at azimuth 135 deg. This is a swampy area and the upper clay layer which directly underlies the muskeg was tested.

(b) The contact between Topley intrusive rocks and Hazelton volcanics was investigated on Tac 3 and Tac 4 with conventional soil samples taken from the "c" horizon at depths between 50 and 70 cm.

(c) A dispersion pathway was followed by a detailed sampling of the most anomalous drainage (fig. 5). Here stream samples were taken. Clays were targeted in order to get a uniform sample from each site and to avoid sampling local material that had sloughed off banks into the stream.

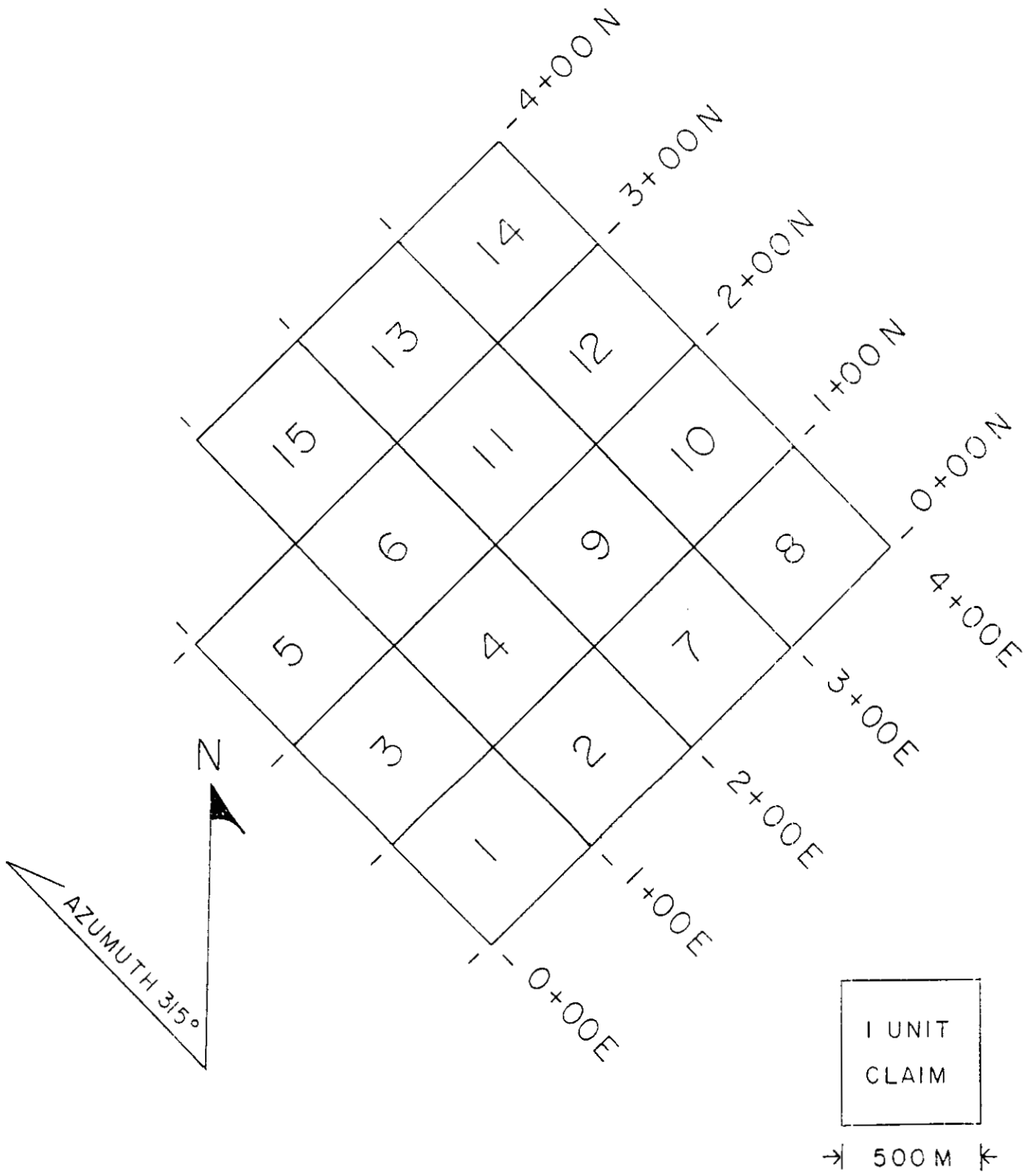
(d) A series of deep test pits were dug in till to test the soil profile and to obtain unoxidised till samples over a topographic lineament which strikes at 100 deg and runs through 2+00 N x 1+100 E.

(v) Survey control

Grid lines were prepared using compass and hip chain to locate sample sites. These were tied in to claim lines and checked for accuracy with an air photo. Sample sites were marked with red flagging. The flagging was labelled with the grid coordinates and sample number. (see fig. 3 for grid coordinates)

(vi) Sampling Procedure

A dutch soil sampler with a stony auger and 1.2 m extension was used to test clays beneath muskeg at depths up to 2m.



TAC 1-15 SURVEY GRID

Figure 3.

A short handled shovel was used to dig 50cm to 70 cm holes to test the "c" horizon obtaining a conventional soil sample.

A pick and shovel was used to pick (1.0 m x 1.8 m x 2 m) sample holes in till to test the soil profile and obtain a deep till sample.

Samples were put in 4" x 7" kraft paper bags. Each bag was filled to ensure adequate sample material. Samples were transported from the field to Smithers B.C. for sample preparation at Mineral Environments Laboratory. Here the samples were dried and screened. A minus 80 mesh fraction sub sample was sent to Vancouver. At the Vancouver lab ICP analysis was performed to detect 12 pathfinder elements including Zn, Pb, Cu and Ag.

Careful notes were recorded at each site regarding the soil types, depth, ground slope etc.

Observations

R. W. Boyle (GSC Bull. 280) states that the average abundances of Zn, Pb and Cu in normal soils and glacial materials are as follows.

Zinc	75 p.p.m
Lead	15 p.p.m
Copper	20 p.p.m

15 samples taken from two back ground locations north of the project area have average metal values as follows.

Zinc	104 p.p.m
Lead	11 p.p.m
Copper	28 p.p.m

The average abundances of these metals in background areas taken in similar terrain as the project area compare favorably with averages as stated by Boyle.

Therefore values 2-3 times the average abundance as stated by Boyle will be considered to be anomalous for the project area.

Specific Sites

(a) No anomaly was detected in the swampy areas tested. The average metal content of sediments sampled in or close to the swampy areas are as follows. (Average of 37 samples primarily upper clay layer below muskeg).

Zinc 105 p.p.m

Lead 16 p.p.m

No significant enrichment above average values for clays in the swampy locations tested is observed.

(b) Samples from Tac 3 and Tac 4 tested soils in the vicinity of an Igneous/Volcanic contact. This contact is not exposed but is inferred to strike south - west near line 1+200 N.

Samples average as follows. (Average of 19 "C" horizon soils).

Zinc 94 p.p.m

Lead 15 p.p.m

No enrichment above average values for soils in the vicinity of this contact is observed.

(c) A detailed survey of stream sediments tested the most anomalous tributary which drains high ground to the west of lake 2044. The clay rich stream sediments are consistently anomalous from the headwaters to the lake. Sandy soils from a dry gulch above the headwaters are also anomalous. Highest values observed are as follows.

Zinc	7130 p.p.m
Lead	1625 p.p.m
Copper	1272 p.p.m

Two separate stream sediments taken from this drainage during an initial reconnaissance were also anomalous. These samples did not target clays but were conventional silt samples. The average of the two silt samples is as follows.

Zinc	2226 p.p.m
Lead	206 p.p.m
Copper	150 p.p.m

Similar results were obtained from clay tested in the vicinity of these silts.

(d) The soil profile was tested near the headwaters of the anomalous stream by digging sample pits. The pits are located on Tac 4 in a pile of till which is dissected by two branches of the stream. The till also overlies a topographic lineament which strikes at 100 deg. (See field notes in appendix for profiles).

The profiles indicate a marked enrichment of Zn and Pb in the upper soil horizons. In the till there is a subtle increase in Zn with depth. The till is primarily a mixture of rounded cobbles supported in a matrix of clay rich sandy gravel. The cobbles are both Topley intrusives and volcanic Telkwa formation.

(e) During the grid preparation and selection of sample sites a piece of sulfide bearing float was found at 0+400 N x 1+100 E. The float is a felsic intrusive rock dominated by pink feldspars. It hosts a stockwork of quartz veins. Galena appears as 5 mm cubic crystals and is associated with minor chalcopyrite. On exposed surfaces the galena has weathered to a white oxide. The underlying bedrock here is green andesite and tuffs.

(f) At 1+00 N x 1+420 E a greenish brown tuff outcrops. It weathers brown and might be slightly pyritic. Flow structure indicates a strike of 275 deg. with a dip of 25 deg. to the north west. Joint surfaces strike at 225 deg. and dip at 70-75 deg.

Conclusions

Anomalous metals are detected in the principle drainage west of lake 2044. The anomalous metals can be traced over a distance of 1800m to the exit stream of the lake where they measure over 500 p.p.m. zinc. A significant dispersal pathway is indicated which extends from a dry gulch located at 2+100 N x 1+150 E to the exit stream at 0+100 N x 3+100 E.

The anomaly is poly metallic rich in Zn, Pb, Cu and Cd. The sediments become progressively richer in metals as the headwaters are approached. Zn appears to be the most mobile followed by Pb and then Cu.

Soil samples adjacent to the stream do not indicate a body of till as a source of anomalous metals. The source appears to be close to the head waters west of the lake on Tac 5 and Tac 6. The till here is slightly enriched in zinc at depth but elevated levels of lead and copper are confined to the upper soil horizons.

Hydromorphic dispersion processes appear to dominate. Mobile metals are migrating with ground water from a well drained site on Tac 5 and Tac 6. The ground water moves from high ground along the bedrock surface under the till until it emerges from a seep at 2+00 N x 1+025 E. The seep probably acts as a geochemical barrier where a change occurs in the chemical environment. The surface stream environment is more oxidizing and may be less acidic than the seepage area. This would reduce the mobility of the metals and give rise to an anomaly in the stream.

A rock type with a high metal content can mimic mineralization by producing an anomaly. In this scenario normal weathering of such bedrock releases trace metals which fixate or adsorb onto the stream sediments resulting in an anomaly. In these cases however the hydromorphic dispersion would be expected to be relatively weaker and less extensive than the one observed. This is due to the fact that rock forming minerals are usually more stable than ore minerals and sulphides are not present to lower the pH and increase the mobility of metals in solution. A litmus paper test of water near the seep indicates an acidic environment (pH 4.75) as one would expect to find near weathering sulphides.

In conclusion the geochemical anomaly and the discovery of sulphide bearing float indicate the presence of near by mineralization.

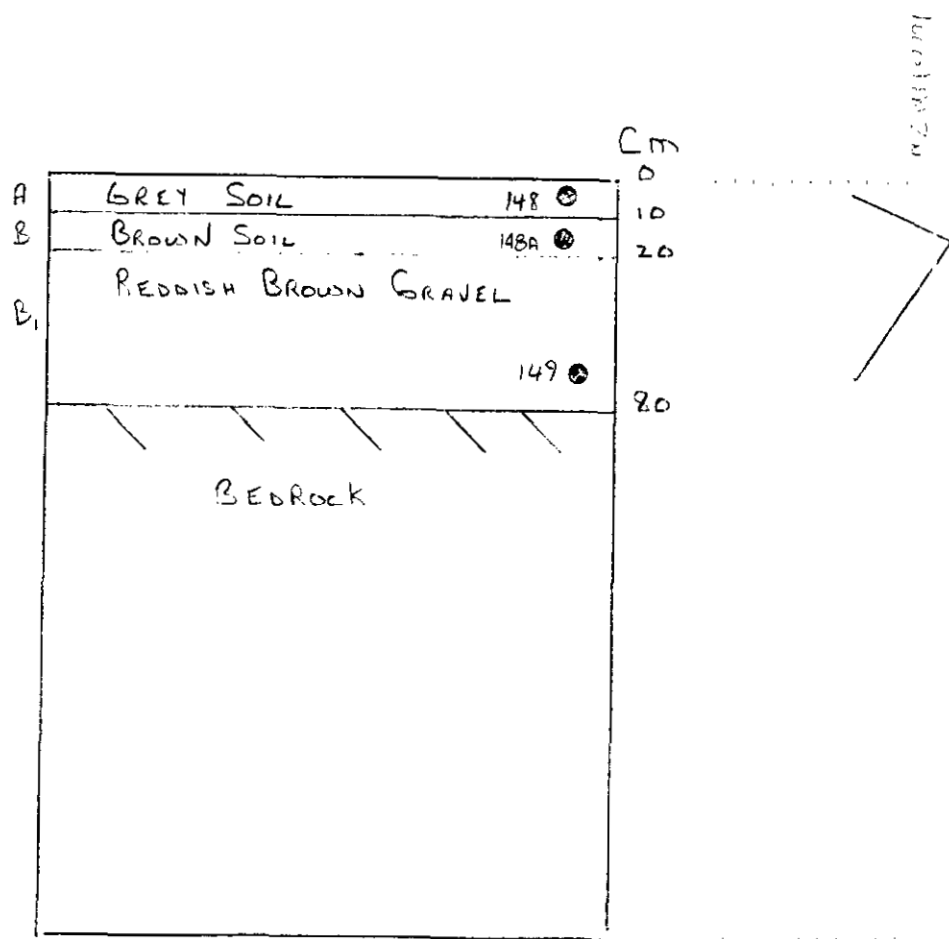
Recommendations

There are numerous outcrop which should be mapped first to determine the relative position of the contact between the Jurassic Topley intrusion and the Telkwa formation volcanic rocks. A ground based geophysical survey should be conducted to detect sulphides in the anomalous area as indicated by the geochemistry. Since the contact areas represent favorable sites for sulphide mineralization the geophysical survey should also include traverses across them.

APPENDIX

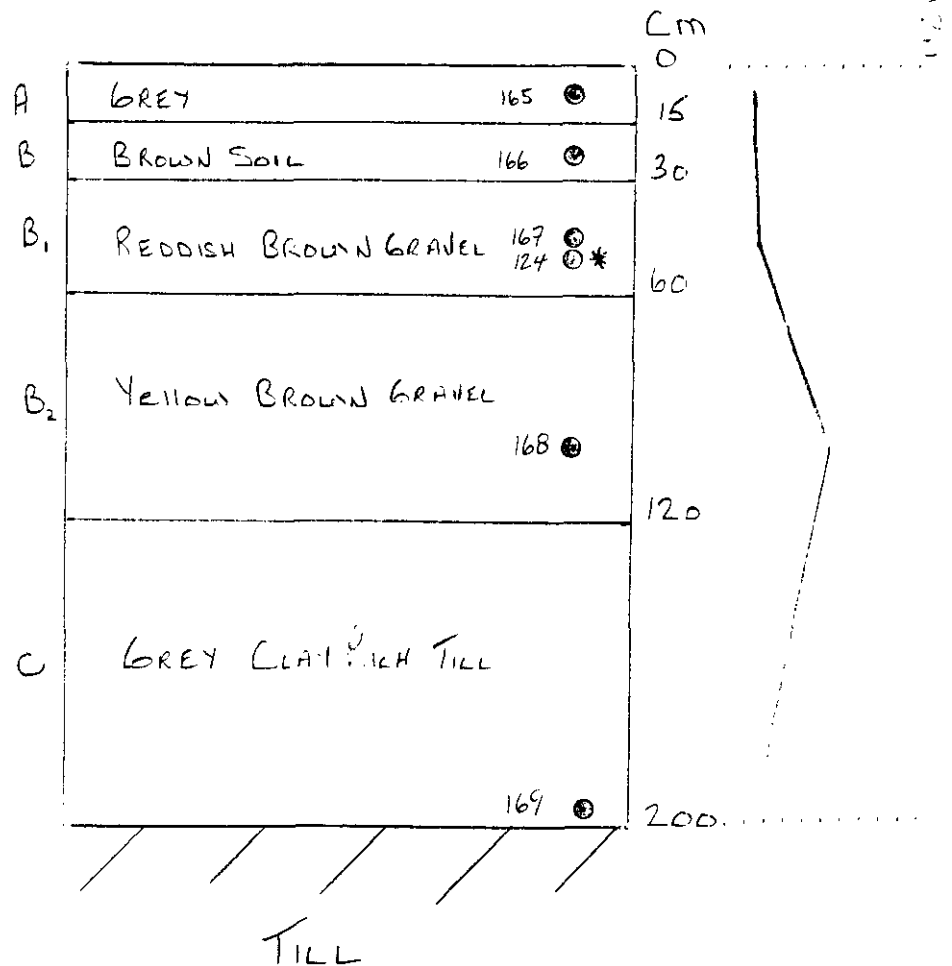
SOIL PROFILE ①

		14450N 14020E	P.P.M				
I.D.	DEPTH cm	TYPE	ZN	Pb	Cu	Ag	Mo
148	5	A	772	76	50	20.2	4
148A	15	B	1240	74	63	20.2	2
149	75	B	741	36	42	20.2	2



SOIL PROFILE (2)

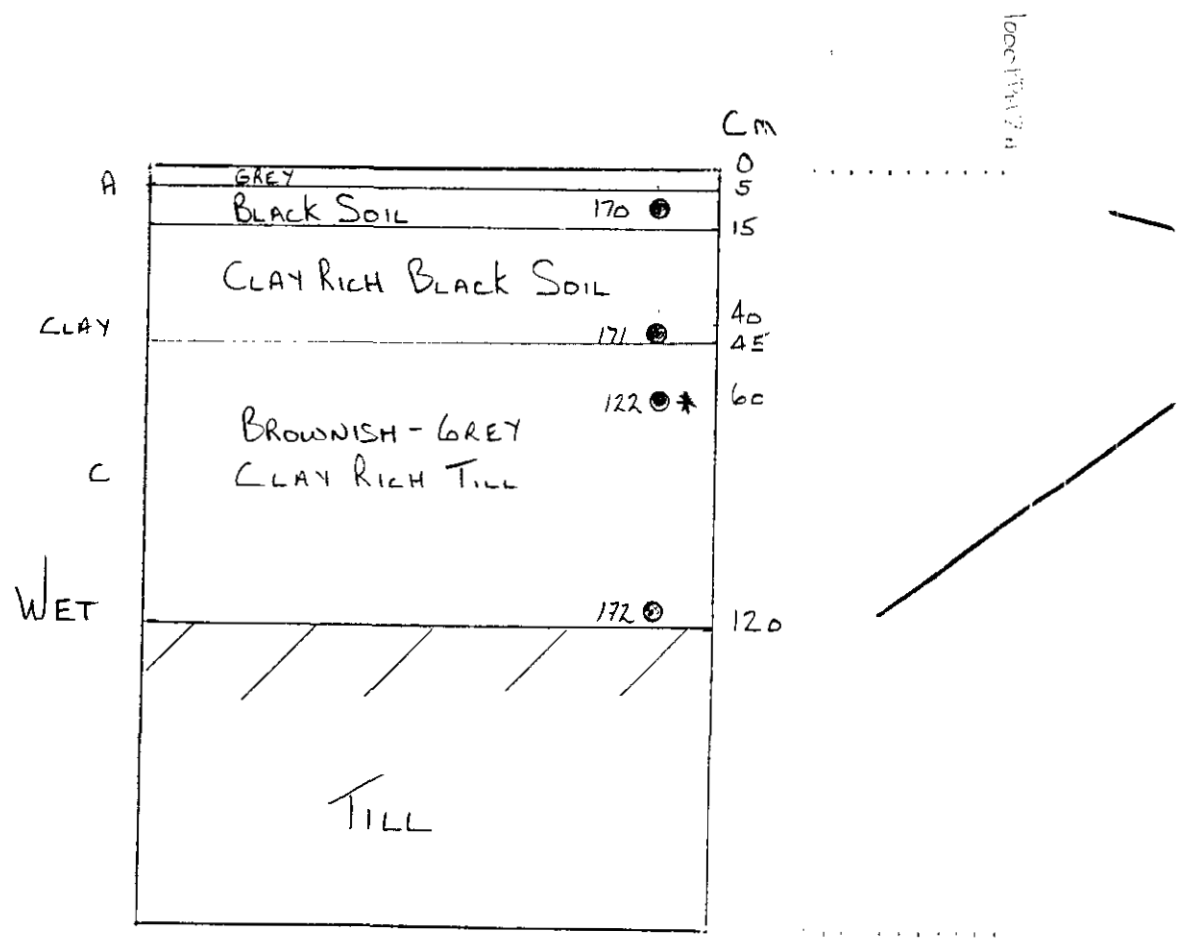
I.D.	H450N H000 E		P.P.M				Mc
	DEPTH _{cm}	TYPE	Zn	Pb	Cu	Ag	
165	10	A	125	12	17	40.2	2
166	20	B	134	16	12	40.2	2
167	40	B ₁	140	20	12	40.2	22
168	100	B ₂	539	52	37	40.2	2
169	200	C	156	28	2.8	40.2	22
* 124	50	B ₁	145	22	11		



* PREVIOUS SAMPLE
 PLOTTED ON FIG. 5

SOIL PROFILE (3)

I.D.	14415N 14000N		P.P.M				Mo
	DEPTH _{cm}	TYPE	ZN	Pb	Cu	Ag	
170	10	B	1594	72	124	0.6	4
171	45	CLAY	4476	194	494	0.8	4
172	120	C	375	22	39	0.2	2
* 122	60	C	1902	72	61		

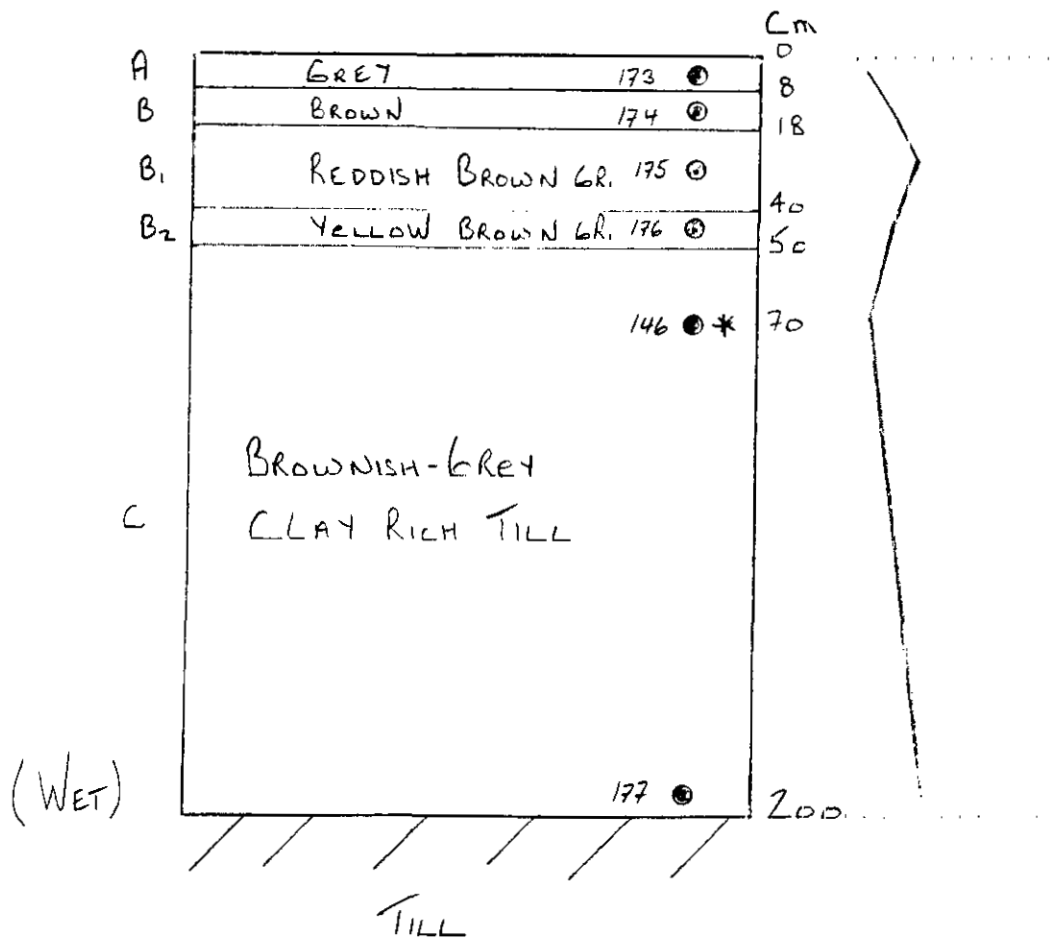


* ● PREVIOUS SAMPLE

SOIL PROFILE (9)

4

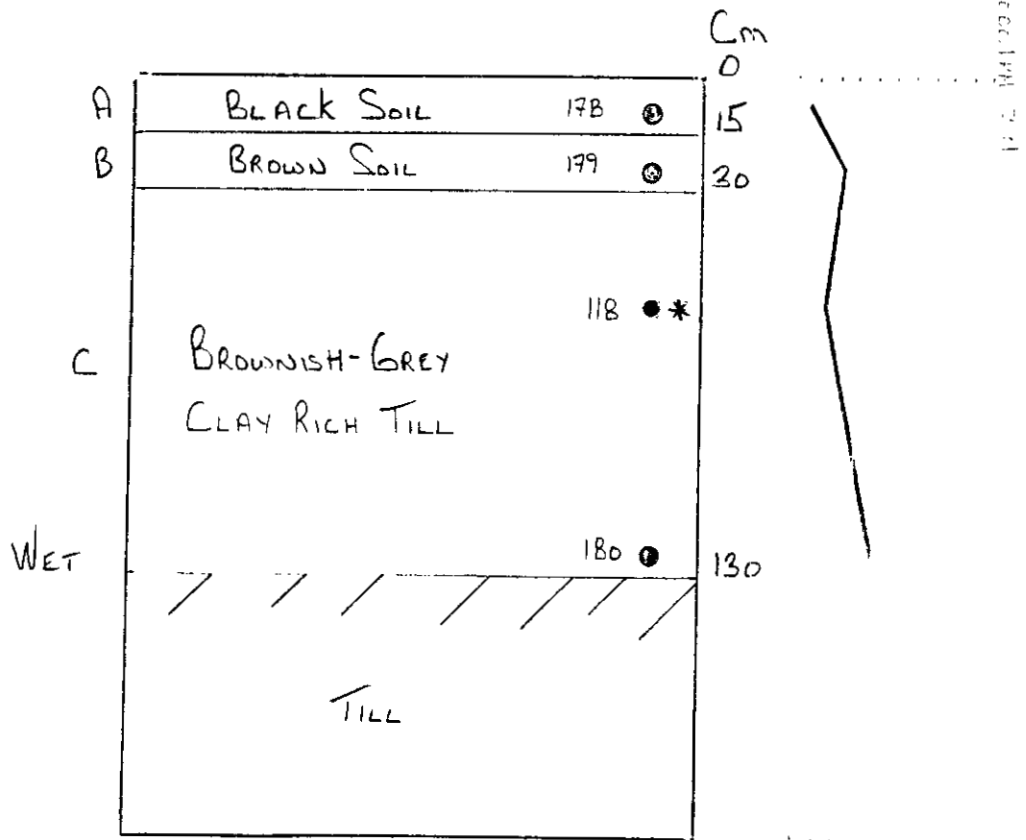
I.D.	I+400N I+025E		P.P.M				Mo
	DEPTH CM	TYPE	ZN	Pb	Cu	Ag	
173	4	A	58	8	10	0.2	2
174	15	B	100	14	10	0.2	2
175	30	B ₁	323	32	34	0.2	2
176	45	B ₂	201	14	24	0.2	2
177	200	C	371	18	40	0.2	2
* 146	70	B ₁ / ₂ C	96	12	22		



* @ PREVIOUS SAMPLE

SOIL PROFILE ⑤

14350N 14050E			P.P.M				
ID.	DEPTH	TYPE cm	ZN	Pb	Cu	Ag	Mo
178	10	A	53	8	5	0.2	2
179	25	B	130	8	13	0.2	2
180	130	C	377	14	26	0.2	2
* 118	60	B	131	12	21		

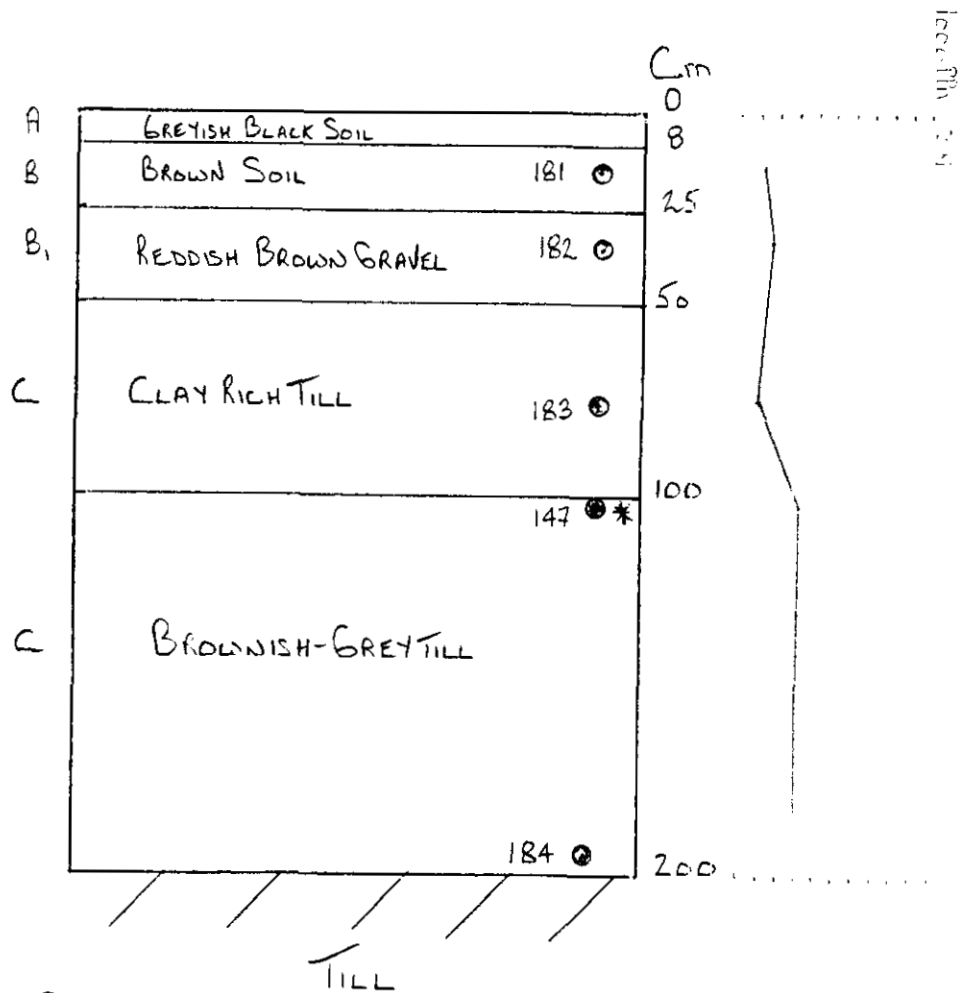


* • PREVIOUS SAMPLE

SOIL PROFILE (6)

6

I.D.	DEPTH _{cm}	TYPE	P.P.M.				Mo
			ZN	Pb	Cu	Ag	
181	15	B	100	12	11	1.0	2
182	35	B ₁	157	20	2.3	0.2	2
183	75	C	92	16	2.0	<0.2	<2
184	200	C	278	30	40	<0.2	2
* 147	100	C	302	12	15		



* ● PREVIOUS SAMPLE



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SMITHERS LAB:
3176 TATLOW ROAD
SMITHERS, B.C. CANADA V0J 2N0
TEL (604) 847-3004
FAX (604) 847-3005

ANALYTICAL PROCEDURE REPORT FOR ASSESSMENT WORK:
PROCEDURE FOR SAMPLE PREPARATION

- a.) The soil and stream sediment samples are dried at 60 Celsius. The sample is then screened by 80 mesh sieve to obtain the -80 mesh fraction for analysis.
- b.) The rock and core samples are dried at 60 Celsius and when dry are crushed in a jaw crusher. The 1/4 inch output of the jaw crusher is put through a secondary roll crusher to reduce it to -1/8 inch. The whole sample is then riffled on a Jones Riffle down to a statistically representative 300 gram sub-sample. This sub-sample is then pulverized on a ring pulverizer to 95% minus 150 mesh rolled and bagged for analysis. The remaining reject from the Jones Riffle is bagged and stored.



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ANALYTICAL PROCEDURE REPORT FOR ASSESSMENT WORK:

PROCEDURE FOR TRACE ELEMENT ICP

Ag, Al, As, Ba, Be, Bi, Ca, Cd, Co, Cr, Cu, Fe, Ga, K, Li, Mg, Mn, Mo, Na, Ni, P,
Pb, Sb, Sn, Sr, Th, Ti, U, W, Zn.

0.50 grams for the sample pulp is digested for 2 hours with an 1:3:4 HNO₃:HCl:H₂O mixture.
After cooling, the sample is diluted to standard volume.

The solutions are analyzed by computer operated Perkin Elmer Optima 3000, Inductively Coupled
Plasma Spectrophotometers.



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FAX (250) 847-3005

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Geochemical Analysis Certificate

8S-0050-SG5

Company: **MR. STEVE BELL**
Project: **TAC**
Attn: **STEVE BELL**

Aug-07-98

We hereby certify the following Geochemical Analysis of 2 SOIL samples submitted Jul-23-98 by STEVE BELL.

Sample Name	Au-fire PPB
1+300N 1+150E	10
1+300N 1+100E	9

Certified by _____

Min-En Laboratories

MR. STEVE BELL

Attention: Steve Bell

Project:

Sample: SOIL

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No

8S0030

Date

: Jul-02-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Mo ppm	Ni ppm	Pb ppm	Sb ppm	Zn ppm
MAT 1	<0.2	10	230	2	18	3.32	0.05	2	13	14	<5	176
MAT 2	0.8	10	540	1	37	3.09	0.07	2	12	18	<5	107
MAT 3	0.6	10	470	14	196	3.04	0.10	4	21	86	<5	457
TAC 16	0.2	5	630	39	87	3.94	0.06	6	14	194	<5	2579
TAC 17	0.2	15	610	2	44	3.55	0.12	6	26	62	<5	252

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.i.H2O.

Signed: _____



MR. STEVE BELL

Attention: STEVE BELL

Project: TAC

Sample: SOIL

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No

8S0050

Date

Jul-29-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Bi ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	Y ppm	Zn ppm
4+00N 2+000E	<0.2	5	<5	1	66	2.76	2	86	1	60	6	446
4+00N 2+050E	<0.2	10	<5	1	91	3.08	<2	12	4	29	9	284
4+00N 2+100E	<0.2	5	<5	<1	14	2.77	<2	10	3	23	6	73
4+00N 2+200E	<0.2	20	<5	<1	36	3.76	4	14	4	25	9	282
3+430N 2+270E	<0.2	10	<5	<1	21	3.42	2	18	2	31	5	144
3+360N 2+350E	<0.2	15	<5	<1	26	4.03	8	24	5	35	8	117
3+300N 2+420E	<0.2	10	<5	<1	22	2.95	4	12	5	35	12	77
3+230N 3+000E	<0.2	5	<5	<1	18	2.72	6	14	5	40	17	116
3+200N 3+040E	0.4	15	<5	1	110	3.24	16	22	13	77	76	147
3+150N 3+070E	<0.2	5	<5	<1	15	1.81	4	20	5	38	15	83
3+080N 3+130E	<0.2	10	<5	1	69	2.41	4	14	9	61	43	115
3+000N 3+180E	<0.2	15	<5	1	70	3.22	10	28	4	62	52	122
2+420N 3+160E	<0.2	10	<5	1	37	3.71	8	30	10	49	25	165
3+000N 3+100E	<0.2	5	<5	<1	13	2.18	6	14	5	39	10	82
3+000N 2+480E	<0.2	10	<5	<1	8	4.97	2	20	1	23	2	90
3+080N 3+040E	<0.2	10	<5	<1	15	2.87	<2	18	2	24	4	98
3+140N 2+460E	<0.2	5	<5	<1	16	2.41	<2	10	3	22	4	117
3+210N 2+400E	<0.2	10	<5	<1	20	3.31	<2	24	3	25	3	135
3+330N 2+280E	<0.2	15	<5	<1	38	4.71	14	28	7	41	10	176
3+400N 2+100E	<0.2	10	<5	<1	19	2.98	<2	16	2	35	4	186
3+400N 2+150E	<0.2	10	<5	<1	20	3.03	<2	10	5	34	11	77
3+400N 2+200E	<0.2	5	<5	<1	7	3.30	2	12	1	26	5	111
3+300N 2+150E	<0.2	10	<5	<1	14	2.94	<2	14	2	28	4	127
3+200N 2+150E	<0.2	5	<5	<1	9	3.03	<2	14	2	31	3	110
3+100N 2+150E	<0.2	5	<5	<1	14	2.61	<2	18	2	21	3	106
3+000N 2+150E	<0.2	5	<5	1	36	3.94	2	22	4	23	4	759
2+400N 2+150E	<0.2	10	<5	2	56	5.32	2	38	1	43	19	1027
2+300N 2+150E	<0.2	5	<5	<1	11	3.35	<2	20	2	22	3	142
2+200N 2+150E	<0.2	5	<5	1	47	2.91	<2	42	4	41	15	258
2+100N 2+150E	<0.2	10	<5	<1	23	3.09	2	16	3	34	12	112

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.



MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Bi ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	Y ppm	Zn ppm
2+000N 2+100E	<0.2	5	<5	<1	19	2.29	<2	12	3	23	8	123
1+400N 2+100E	<0.2	5	<5	<1	19	3.05	<2	18	4	34	12	97
1+300N 2+100E	<0.2	15	<5	<1	34	5.11	6	50	2	68	15	203
1+200N 2+100E	<0.2	15	<5	1	43	4.06	2	44	6	29	25	569
1+200N 2+000E	<0.2	10	<5	<1	21	3.56	<2	36	2	16	4	189
1+150N 2+000E	<0.2	25	<5	37	208	3.86	20	656	4	50	71	3568
1+300N 2+000E	<0.2	10	<5	<1	26	3.64	<2	24	4	24	9	154
1+400N 2+000E	<0.2	5	<5	<1	10	2.59	<2	8	2	31	4	95
2+000N 2+000E	<0.2	10	<5	<1	16	3.19	<2	10	2	23	6	96
2+100N 2+000E	<0.2	10	<5	<1	19	3.23	<2	16	3	21	7	111
1+100N 2+000E	<0.2	5	<5	<1	14	3.25	<2	14	2	16	4	107
1+100N 2+100E	<0.2	10	<5	<1	12	3.07	2	24	3	22	8	113
1+100N 2+200E	<0.2	5	<5	<1	20	1.35	<2	16	3	22	8	294
1+000N 2+300E	<0.2	5	<5	<1	35	1.57	2	14	5	33	9	111
0+400N 2+360E	<0.2	<5	<5	3	40	1.84	<2	24	7	35	10	129
0+280N 2+315E	<0.2	5	<5	<1	12	2.95	<2	12	6	37	10	144
0+200N 2+400E	<0.2	5	<5	<1	23	2.54	<2	18	4	75	8	99
0+340N 2+250E	<0.2	10	<5	<1	22	3.22	2	14	4	22	12	77
0+420N 2+180E	<0.2	5	<5	<1	26	3.69	2	18	6	38	13	123
1+000N 2+200E	<0.2	5	<5	<1	20	1.34	<2	16	1	22	26	51
2+100N 1+100E	<0.2	10	<5	<1	17	3.16	6	16	3	26	9	82
1+000N 2+000E	<0.2	5	<5	<1	4	1.68	2	8	1	17	2	58
1+100N 1+400E	<0.2	10	<5	<1	16	3.32	<2	22	3	19	4	108
1+200N 1+400E	<0.2	5	<5	<1	16	2.68	<2	34	3	20	6	93
1+200N 1+450E	<0.2	5	<5	<1	26	3.55	<2	40	4	22	4	161
1+200N 1+350E	<0.2	10	<5	<1	9	4.22	<2	22	1	14	4	93
1+240N 1+400E	<0.2	5	<5	<1	11	2.56	2	20	3	22	13	163
1+300N 1+400E	<0.2	10	<5	<1	16	3.44	<2	18	3	25	7	105
1+300N 1+450E	<0.2	10	<5	<1	12	3.52	<2	12	1	33	4	121
1+230N 1+450E	<0.2	15	<5	5	111	3.95	6	256	3	54	44	2313

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

MR. STEVE BELL

Attention: STEVE BELL

Project: TAC

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0050

Date : Jul-29-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Bi ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	Y ppm	Zn ppm
1+300N 1+350E	<0.2	10	<5	<1	12	3.60	<2	16	1	26	5	109
1+400N 1+300E	<0.2	5	<5	<1	13	3.04	2	24	2	27	5	103
1+300N 1+300E	<0.2	5	<5	<1	17	2.52	<2	30	3	24	8	131
1+300N 1+250E	<0.2	10	<5	<1	18	3.12	<2	24	2	22	8	117
1+250N 1+250E	<0.2	5	<5	2	28	2.49	<2	40	2	46	18	233
1+2.50N 1+200E	<0.2	5	<5	1	15	2.39	<2	32	1	26	8	129
1+300N 1+250E	<0.2	5	<5	<1	20	3.11	<2	26	4	20	4	129
1+200N 1+300E	<0.2	5	<5	<1	18	3.10	<2	26	3	19	4	114
1+200N 1+250E	<0.2	5	<5	<1	15	2.73	2	18	4	32	10	87
1+100N 1+300E	<0.2	5	<5	<1	8	3.12	2	12	1	16	3	88
1+100N 1+200E	<0.2	5	<5	<1	8	3.12	2	12	1	16	3	88
1+200N 1+000E	<0.2	<5	<5	<1	15	1.59	2	12	4	27	7	77
1+200N 1+200E	<0.2	5	<5	<1	18	2.94	<2	22	4	20	4	114
1+255N 1+350E	0.2	20	<5	2	101	4.89	10	240	7	40	86	1509
1+200N 1+150E	<0.2	15	<5	<1	50	3.94	2	18	4	40	28	101
1+250N 1+200E	<0.2	15	<5	31	184	4.11	8	158	13	49	83	3099
1+250N 1+150E	0.2	35	<5	7	85	4.48	30	86	10	85	95	294
1+300N 1+200E	<0.2	15	<5	<1	24	3.67	<2	18	3	24	7	119
1+300N 1+150E	0.2	30	5	27	948	6.79	20	1624	18	64	140	7023
1+300N 1+100E	0.8	10	<5	21	386	3.94	4	260	16	80	110	3742
1+300N 1+000E	<0.2	10	<5	<1	19	3.17	<2	14	3	14	4	97
1+300N 0+400E	<0.2	5	<5	8	55	3.16	<2	32	9	39	19	691
1+250N 0+400E	<0.2	5	<5	<1	21	1.84	<2	12	5	41	11	77

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

Signed: _____

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	W ppm	Y ppm	Zn ppm
0+000N 3+100E	<0.2	5	<1	13	2.85	<2	8	3	13	<10	3	90
0+000N 3+200E	<0.2	5	<1	11	2.83	<2	20	2	14	<10	3	71
0+100N 3+100E	<0.2	15	3	54	3.25	8	28	11	53	<10	36	514
0+100N 3+200E	<0.2	5	<1	14	2.76	<2	14	7	30	<10	13	95
0+130N 2+470E	<0.2	15	<1	78	3.49	<2	14	6	38	<10	14	100
0+200N 3+100E	<0.2	10	<1	19	3.06	<2	8	4	27	<10	9	71
0+200N 3+200E	0.2	10	<1	64	4.22	<2	20	10	45	<10	17	186
0+280N 3+000E	<0.2	10	<1	16	2.93	<2	10	4	15	<10	8	68
0+300N 3+100E	<0.2	10	<1	18	3.05	<2	16	3	17	<10	5	98
0+300N 3+200E	<0.2	5	<1	12	2.71	<2	12	3	14	<10	4	93
0+340N 2+440E	<0.2	5	<1	34	3.59	<2	8	6	62	<10	12	102
0+400N 0+200E	<0.2	10	<1	10	3.30	2	14	3	18	<10	4	93
0+400N 0+300E	<0.2	5	<1	11	2.74	2	8	3	23	<10	6	81
0+400N 0+400E	<0.2	10	<1	13	3.03	2	12	4	24	<10	8	83
0+400N 3+000E	<0.2	5	<1	14	2.37	<2	12	4	32	<10	7	91
0+400N 3+100E	<0.2	10	<1	12	2.77	<2	10	3	19	<10	4	72
0+400N 3+200E	<0.2	5	<1	10	3.48	<2	10	3	20	<10	4	97
1+000N 0+100E	<0.2	10	<1	13	3.01	<2	12	3	17	<10	4	76
1+000N 0+200E	<0.2	5	<1	9	2.78	<2	10	2	15	<10	3	72
1+000N 0+300E	<0.2	10	<1	26	2.68	2	14	3	22	<10	9	92
1+000N 0+400E	<0.2	10	<1	15	3.53	<2	24	3	15	<10	5	135
1+000N 1+000E	<0.2	10	<1	16	3.65	10	10	4	34	<10	13	102
1+000N 3+000E	<0.2	5	<1	24	4.94	<2	16	6	42	<10	12	95
1+000N 3+100E	<0.2	10	<1	9	2.92	<2	10	2	22	<10	5	73
1+000N 3+200E	0.2	10	<1	47	3.77	6	20	12	56	<10	31	137
1+100N 0+100E	<0.2	10	<1	17	3.10	<2	16	3	14	<10	5	93
1+100N 0+200E	<0.2	5	<1	17	2.48	<2	16	2	25	<10	7	124
1+100N 0+300E	<0.2	5	<1	20	2.92	2	38	3	22	<10	11	113
1+100N 0+400E	<0.2	10	<1	13	2.96	2	12	2	24	<10	4	95
1+100N 1+000E	<0.2	10	<1	12	2.85	6	14	2	26	<10	5	78

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO₃ at 95c for 2 hours and diluted to 25ml with D.I.H₂O.



MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	W ppm	Y ppm	Zn ppm
1+100N 1+100E	<0.2	<5	<1	1	0.36	<2	4	1	13	<10	1	8
1+150N 0+100E	<0.2	10	1	54	3.14	2	46	9	40	<10	47	172
1+150N 1+000E	<0.2	10	<1	13	3.31	2	20	3	23	<10	5	101
1+150N 1+050E	<0.2	15	<1	27	3.08	2	24	5	31	<10	47	103
1+150N 1+100E	<0.2	10	<1	13	3.72	<2	12	3	19	<10	3	95
1+200N 0+100E	<0.2	5	1	25	2.81	<2	28	3	23	<10	14	320
1+200N 0+200E	<0.2	15	1	16	6.48	10	28	8	23	<10	28	355
1+200N 0+300E	0.2	10	1	75	3.98	<2	34	14	49	<10	65	222
1+200N 1+025E	<0.2	5	<1	19	1.83	2	10	4	38	<10	11	75
1+200N 1+050E	<0.2	25	<1	66	7.92	4	8	20	24	<10	21	156
1+200N 1+075E	<0.2	<5	<1	21	3.41	2	20	4	19	<10	8	218
1+200N 1+100E	<0.2	10	<1	29	3.47	<2	20	6	30	<10	8	117
1+200N 1+150E DUPLICATE	<0.2	5	<1	15	2.12	2	10	4	21	<10	11	58
1+200N 0+400E	<0.2	5	<1	15	2.78	<2	10	3	20	<10	5	77
1+215N 1+100E	<0.2	10	<1	54	4.57	2	100	8	33	<10	17	389
1+230N 1+125E	<0.2	5	1	22	3.76	8	16	6	45	<10	38	191
1+245N 1+185E	0.2	10	1	62	4.22	2	40	15	65	<10	97	446
1+250N 0+300E	<0.2	5	2	22	2.78	<2	14	6	25	<10	13	483
1+300N 1+100E	<0.2	20	<1	25	3.92	2	80	3	19	<10	7	204
1+350N 0+450E	<0.2	5	<1	13	2.77	<2	6	3	22	<10	5	111
1+350N 0+475E	<0.2	10	<1	32	3.73	<2	8	4	15	<10	3	106
1+350N 1+000E	<0.2	10	<1	22	3.63	<2	10	4	15	<10	3	144
1+350N 1+025E	<0.2	25	8	218	6.01	10	682	15	60	10	93	3670
1+350N 1+050E	<0.2	10	<1	21	3.39	<2	12	4	24	<10	5	131
1+350N 1+075E	<0.2	10	4	75	3.60	10	70	6	29	<10	22	1024
1+350N 1+090E	0.6	25	14	564	3.47	16	1528	14	47	10	84	5172
1+400N 0+495E	<0.2	45	24	225	8.08	24	1272	13	63	10	78	3880
1+400N 1+025E	<0.2	10	<1	22	3.26	<2	12	4	20	<10	6	96
1+400N 1+050E	<0.2	10	<1	15	3.08	<2	12	3	16	<10	4	302
1+400N 1+070E	0.2	30	11	1072	5.42	10	1274	25	52	10	163	7130

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

[Signature] 10

MR. STEVE BELL

Attention: Steve Bell

Project: TAC

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0058

Date : Aug-10-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Cd ppm	Cu ppm	Fe %	Mo ppm	Pb ppm	Sc ppm	Sr ppm	W ppm	Y ppm	Zn ppm
1+415N 1+000E	<0.2	10	4	81	3.99	2	72	7	35	<10	28	1902
1+450N 0+470E	0.6	10	4	333	3.84	2	686	19	70	10	118	3579
1+450N 1+000E	<0.2	10	<1	11	3.52	<2	22	2	19	<10	4	145
1+450N 1+030E	0.2	15	11	389	4.43	8	518	15	58	10	63	6058
2+000N 0+440E	<0.2	30	22	237	5.59	22	714	12	60	10	62	2783
2+000N 1+025E	0.8	15	26	449	4.14	12	860	13	53	10	85	5151
2+100N 1+000E	<0.2	15	<1	21	3.32	<2	12	3	13	<10	7	223
2+100N 1+140E	<0.2	10	1	142	3.43	6	86	6	18	<10	33	833
2+450N 1+000E	<0.2	5	1	38	2.68	2	14	7	33	<10	12	134
2+470N 1+100E	<0.2	5	6	38	3.42	4	44	5	31	<10	17	950

A .5 gm sample is digested with 10 ml 3.1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

Signed: _____

[Handwritten Signature]

MR. STEVE BELL

Attention: Steve Bell

Project: TAC

Sample: SOIL

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No 8S0076

Date : Sep-02-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	Mn ppm	Mo ppm	Pb ppm	Sb ppm	Y ppm	Zn ppm
1+450N 1+020E (5)	<0.2	5	320	4	50	2.63	1220	4	76	<5	2	772
1+450N 1+020E (15)	<0.2	5	240	2	63	3.55	535	2	74	<5	5	1240
1+450N 1+020E (75)	<0.2	15	120	1	42	3.54	1040	2	36	<5	7	741
2+000N 1+000E	<0.2	10	250	<1	31	3.95	645	<2	12	<5	7	114
2+000N 1+050E	<0.2	15	230	5	100	3.85	990	2	64	<5	12	1243
2+015N 0+415E	<0.2	5	140	2	34	2.91	790	<2	66	<5	7	714
2+020N 0+425E	<0.2	60	620	24	496	6.86	2255	24	566	<5	125	3990
2+020N 1+050E	<0.2	10	430	8	182	4.86	1860	10	410	<5	17	3008
2+040N 0+415E	0.2	15	320	6	101	2.99	485	8	104	<5	33	1347
2+040N 1+095E	<0.2	5	160	3	93	2.89	335	2	48	<5	11	672
2+050N 0+390E	<0.2	25	320	4	145	4.54	1105	6	172	5	34	2546
2+050N 0+450E	<0.2	10	110	<1	21	3.54	515	<2	14	<5	4	344
2+050N 1+000E	<0.2	10	110	2	38	3.62	730	2	60	<5	5	1380
2+050N 1+050E	<0.2	10	180	<1	22	3.67	660	<2	10	<5	4	97
2+075N 1+130E	<0.2	10	130	3	298	3.07	765	2	550	<5	33	1173
1+450N 1+000E (10)	<0.2	5	250	1	12	2.08	775	2	12	<5	1	125
2+125N 1+140E	<0.2	15	340	4	290	3.96	970	2	82	<5	38	1610
2+175N 1+140E	<0.2	15	80	<1	22	3.92	395	2	36	<5	4	150
2+025N 1+140E 2+225N	<0.2	10	140	<1	26	3.16	710	<2	68	<5	8	144
1+450N 1+000E (20)	<0.2	5	140	1	12	4.10	240	2	16	<5	2	134
1+450N 1+000E (40)	<0.2	10	100	<1	12	3.81	405	<2	20	<5	5	140
1+450N 1+000E (100)	<0.2	20	180	1	37	4.26	1090	2	52	<5	14	539
1+450N 1+000E (200)	<0.2	10	270	<1	28	3.59	1010	<2	28	<5	9	156
1+415N 1+000E (10)	0.6	5	630	6	124	2.61	340	4	72	<5	77	1594
1+415N 1+000E (45)	0.8	20	850	16	494	5.96	1460	4	194	<5	89	4476
1+415N 1+000E (120)	<0.2	5	270	3	39	2.92	1150	2	22	<5	11	375
1+400N 1+025E (4)	0.2	<5	290	3	10	1.70	200	2	8	<5	3	58
1+400N 1+025E (15)	0.2	5	170	2	10	3.55	170	2	14	<5	5	100
1+400N 1+025E (30)	<0.2	20	260	1	34	5.36	805	2	32	<5	11	323
1+400N 1+025E (45)	<0.2	10	200	<1	24	3.56	475	<2	14	<5	7	201

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

MR. STEVE BELL

Attention: Steve Bell

Project: TAC

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0082

Date : Sep-15-98

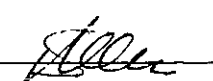
MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	Mn ppm	Mo ppm	Pb ppm	Sb ppm	Y ppm	Zn ppm
2+150N 0+360E	<0.2	10	120	<1	20	3.42	625	<2	10	<5	3	92
1+400N 1+150E	<0.2	5	100	<1	9	3.14	320	<2	12	<5	2	116
2+075N 1+140E	<0.2	5	110	<1	15	3.90	605	<2	12	<5	4	156
2+050N 1+150E	<0.2	10	120	<1	16	3.60	350	2	36	<5	3	219
2+100N 1+100E	<0.2	5	90	<1	13	3.32	490	2	8	<5	3	109
1+400N 1+100E	<0.2	10	80	<1	13	2.93	340	<2	36	<5	3	145
1+350N 1+150E	<0.2	5	130	<1	12	3.02	410	<2	40	<5	4	157
2+000N 1+100E	<0.2	5	80	<1	9	3.24	280	2	12	<5	3	125
1+450N 1+100E	<0.2	10	100	<1	13	3.05	375	<2	18	<5	4	112
2+000N 1+150E	<0.2	5	120	<1	18	3.32	300	2	70	<5	4	166

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with DI H2O

Signed: _____



11

MR. STEVE BELL

Attention: Steve Bell

Project: LAKE 2043

Sample: SOIL

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No. : 8S0083

Date : Sep-15-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	Mn ppm	Mo ppm	Pb ppm	Sb ppm	Y ppm	Zn ppm
2043-1	<0.2	5	390	1	43	4.18	460	8	12	<5	25	216
2043-2	<0.2	10	120	<1	13	3.49	570	<2	12	<5	8	75
2043-3	<0.2	10	120	<1	11	3.02	520	2	10	<5	8	58
2043-4	<0.2	5	100	<1	13	2.64	230	<2	8	<5	3	63
2043-5	<0.2	5	170	<1	22	3.01	495	<2	10	<5	13	62
2043-6	0.4	5	470	2	126	1.65	235	2	8	<5	49	41
2043-7	<0.2	10	350	<1	36	3.25	790	2	10	<5	14	90
2043-8	<0.2	5	210	<1	20	4.17	530	2	12	<5	10	117
2043-9	<0.2	10	350	<1	22	4.03	370	2	12	<5	13	112

BACKGROUND SAMPLES TAKEN NEAR LAKE 2043

LOCATION AT GRID COR. 60 65 500 N
6 83 000 E

A .5 gm sample is digested with 10 ml 3.1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

Signed: _____ *[Signature]* 20

MR. STEVE BELL

Attention: Steve Bell

Project: MAT

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0107 SJ

Date : Nov-06-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

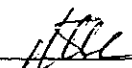
Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Mo ppm	Ni ppm	Pb ppm	Sb ppm	Zn ppm
MAT 4	<0.2	5	390	<1	40	3.20	0.14	10	21	24	<5	145
MAT 5	<0.2	5	310	<1	20	3.65	0.11	4	16	14	<5	138
MAT 6	<0.2	10	210	<1	17	3.00	0.07	2	15	10	<5	100
MAT 7	<0.2	5	360	1	40	2.43	0.13	2	20	14	<5	154
MAT 8	<0.2	5	220	1	15	2.97	0.08	12	15	10	<5	99
MAT 9	<0.2	5	210	1	12	2.93	0.06	8	12	8	<5	116
STRIM 1	<0.2	<5	120	<1	4	2.66	0.03	<2	17	4	<5	87

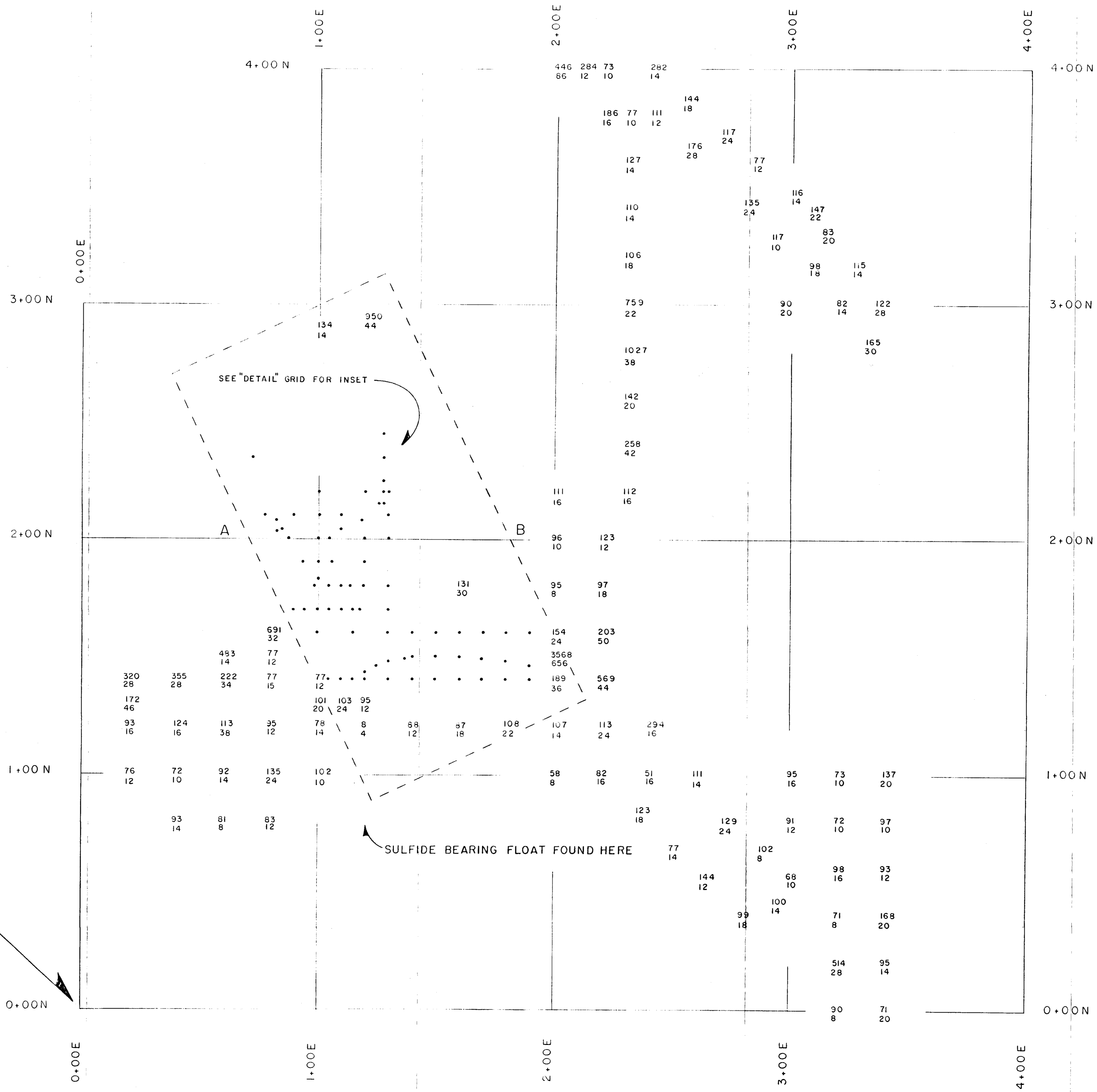
BACK GROUND SAMPLES TAKEN NEAR LAKE LOCATED AT

GRID Coord. 60 59 400 N

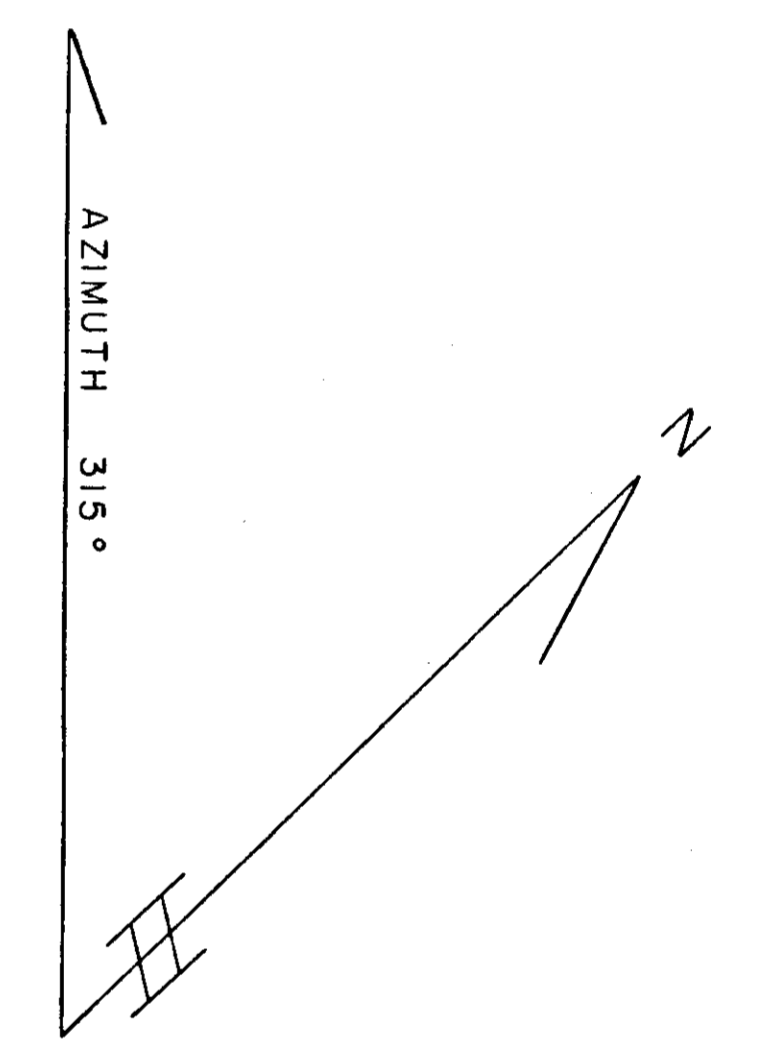
6 82 500 E

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO₃ at 95c for 2 hours and diluted to 25ml with D.I.H₂O.





ZONE 9 UTM GRID COORDINATES	
60 55 250 N	
6 83 800 E	
LATITUDE AND LONGITUDE	
54° 36' 40" N	
126° 09' 13 E	



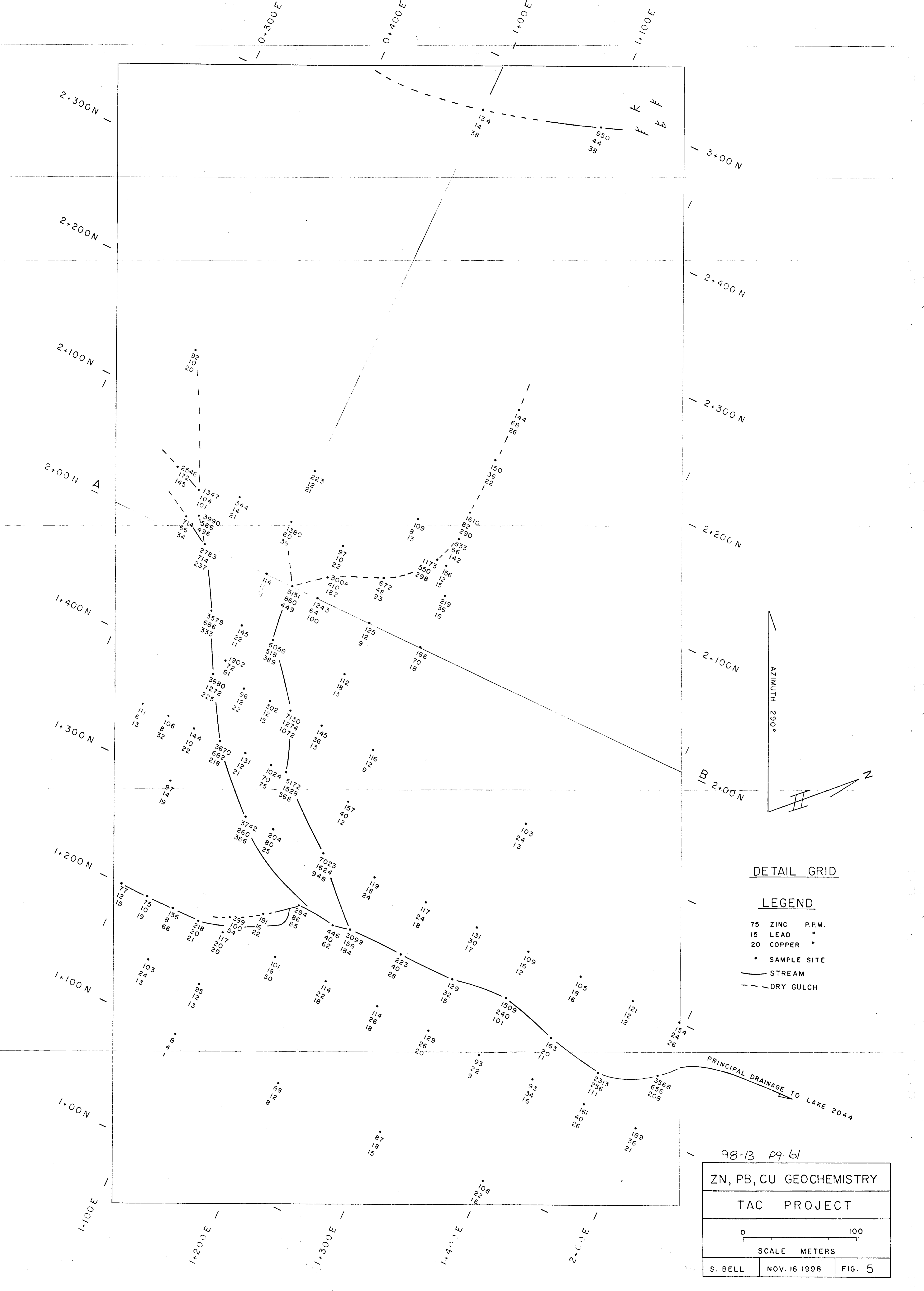
RECONNAISSANCE GRID

LEGEND

- 75 ZINC P.P.M.
- 15 LEAD "
- SAMPLE SITE (DETAIL GRID)

98-13 p9 60

ZN, PB, GEOCHEMISTRY		
TAC PROJECT		
S. BELL	NOV. 15 1998	FIG. 4



DETAIL GRID

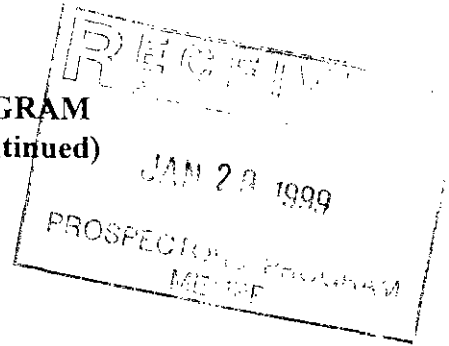
LEGEND

- 75 ZINC P.P.M.
- 15 LEAD "
- 20 COPPER "
- SAMPLE SITE
- STREAM
- - - DRY GULCH

98-13 P9.61

ZN, PB, CU GEOCHEMISTRY		
TAC PROJECT		
<p>SCALE METERS</p>		
S. BELL	NOV. 16 1998	FIG. 5

BRITISH COLUMBIA
PROSPECTORS ASSISTANCE PROGRAM
PROSPECTING REPORT FORM (continued)



B. TECHNICAL REPORT

- One technical report to be completed for each project area.
- Refer to Program Requirements/Regulations 15 to 17, page 6.
- If work was performed on claims a copy of the applicable assessment report may be submitted in lieu of the supporting data (see section 16) required with this TECHNICAL REPORT.

SEE: ASSESSMENT REPORT SUBMITTED

Name STEVE BELL Reference Number 98/99-P22

LOCATION/COMMODITIES

Project Area (as listed in Part A) PALOMINO 1-10 MINFILE No. if applicable 93L A
Location of Project Area NTS 93L 19 Lat 54° 33' Long 126° 24'
Description of Location and Access 6 KM NORTH EAST OF PEROW B.C.
ACCESS VIA JOHNNY DAVID CREEK ESR. AT 6 KM MARK
HIKE SOUTH APPROX 700M TO CENTER OF CLAIMS
Main Commodities Searched For COPPER GOLD

Known Mineral Occurrences in Project Area MINERALIZED SHEAR ZONE AND DYKE
MINE FILE # 93L 9 - 19

WORK PERFORMED

1. Conventional Prospecting (area) _____
2. Geological Mapping (hectares, scale) _____
3. Geochemical (type and no. of samples) TILL SAMPLES 129 ea. (ICP 12) AND GOLD
4. Geophysical (type and line km) SELF POTENTIAL 5.2 KM LINE
5. Physical Work (type and amount) _____
6. Drilling (no. holes, size, depth in m, total m) _____
7. Other (specify) _____

SIGNIFICANT RESULTS

Commodities _____ Claim Name _____
Location (show on map) Lat _____ Long _____ Elevation _____
Best assay/sample type SOIL SAMPLE TILL, 126 CU PPM
SOIL SAMPLE TILL, 289 P.P.M. GOLD
Description of mineralization, host rocks, anomalies _____

COPPER-GOLD MINERALIZATION OCCURS IN A 4M WIDE SHEAR
ZONE IN HAZELTON GROUP VOLCANIC ROCKS.
WEAK COPPER MINERALIZATION IN A QUARTZ MONZONITE
DYKE. (PORPHYRY)

Supporting data must be submitted with this TECHNICAL REPORT SEE REPORT

Information on this form is confidential for one year from the date of receipt subject to the provisions of the Freedom of Information Act

Geochemical and Geophysical Report
Approval Number SMI-98-0200556-147

On Field Work Done
Between Sep. 12 and Oct. 31 1998

On

The Palomino Mineral Claims
Located Northeast of Perow B. C.
Omineca Mining Division, B. C.

NTS Map 93 L/9 Zone 9

Grid Coordinates	60 48 750 North 6 67 450 South <i>east</i>
Latitude	54 deg. 33 min.
Longitude	126 deg. 24 min.

Owner Steve Bell

By

Steve Bell

January 1999

Table of Contents

	<u>Page</u>
Introduction	1
Summary of Work / Recommendations	8
Geochemical Survey	10
Observations	14
Conclusions	15
Geophysical Survey	17
Observations	20
Conclusions	21

Figures

Location Map	3
Mineral Titles Map	7
Survey Grid	9
Reconnaissance Grid (map pocket)	map pocket
Detail Grid (map pocket)	map pocket

Appendix

Analytical Data (ICP analysis)

(A)

Introduction

The following is a record of the exploration work performed on the Palomino mineral claims between September 11 and October 31 1998. The property may host porphyry style copper-gold and shear related copper-gold mineralization as indicated by anomalous geochemistry and geophysics.

(i)

Position/Physiography

The claims are located on an branch stream of Johnny David creek in the Nechako plateau region 6 km north east of Perow B. C. Ice has overroad the entire area and has produced a glaciated topography at 950 meters elevation. This topography has been cut by numerous streams which are entrenched up to 30m into the plateau. The claims cover a mineralized shear zone which has been exposed by this erosion.

Glacial drift is widespread and residual soils are confined to creek valleys. Till cover varies between a few meters to over 30m. and bedrock exposures are scarce. Recent work by Levson (1997) indicates that local ice flow directions were to the south west.

The south west corner of the Palomino 3 claim is located at:

Latitude 54 deg. 33 min.

Longitude 126 deg. 24 min.

On NTS map 93 L/9 Zone 9 at grid coordinates:

60 48 750 North

6 67 450 South

See figure (1) for map sheet location.

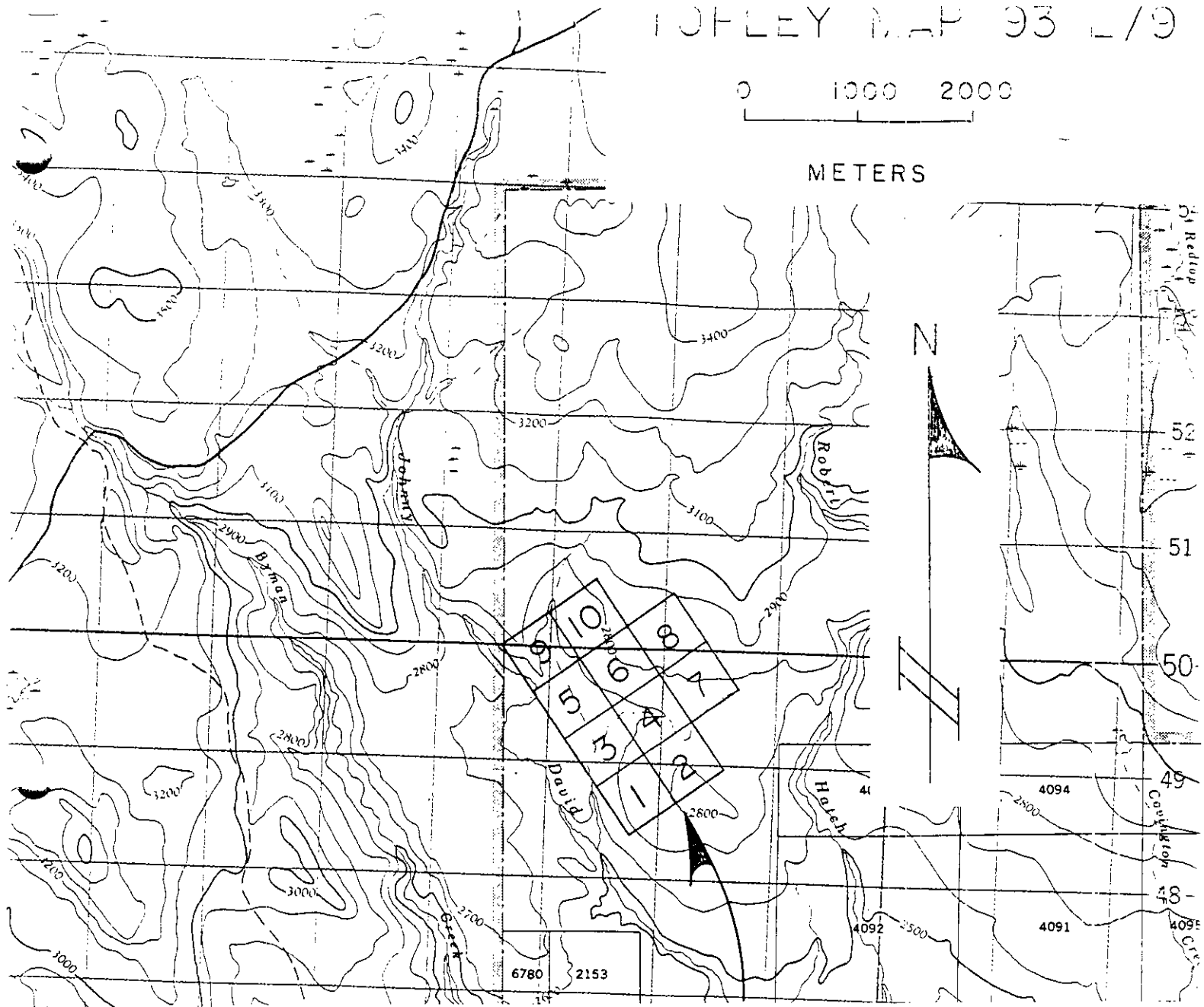
(ii)

Access

Access is by motor vehicle from Houston via. highway 16 turning north at Perow. Follow the Byman forest road to the North road. Turn right on the North road and travel to the Johnny David creek forest service road. Follow this road to its end at the 6 km mark near a large clearcut. The distance is 44km. Proceed south by foot about 700m to Johnny David creek.

0 1000 2000

METERS



PALOMINO 1-10 MINERAL CLAIMS

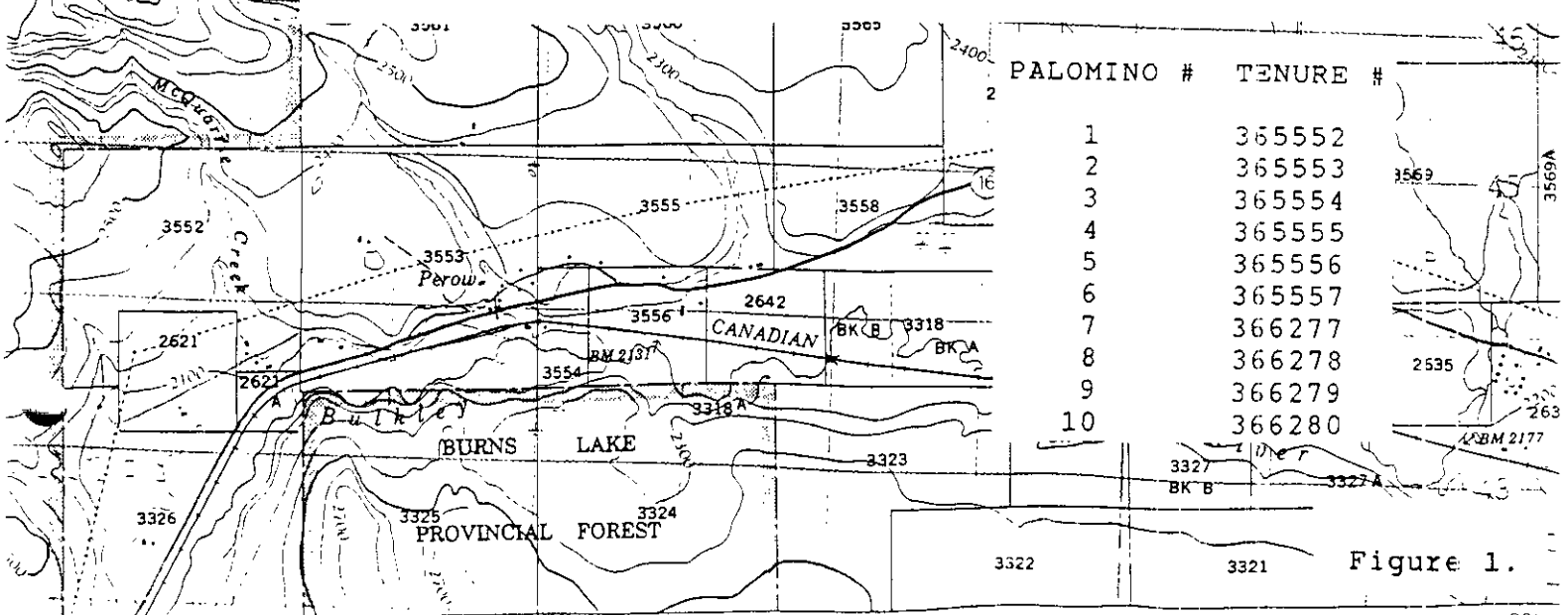


Figure 1.

(iii)

Exploration History

The Jack Rabbit shear zone was first staked in 1927 by Mathew Sam. Early exploration was performed by Sam near the original showing and along Johnny David creek where there is reported to be widespread weak copper mineralization in intrusive and volcanic rocks. These showings were stripped and a short adit was driven on the Jack Rabbit shear where it is exposed on the south bank of Johnny David creek. A sample taken here in 1928 returned one of the highest gold grades recorded in the Smithers area. The high grade nature of the shear was confirmed by S. Bell in 1997 when a 40 cm chip sample across the shear returned 32.42 g/tonne Au. Early work was focused on exposures of mineralized zones along the creek and no work was done to test the extent of the shear beyond the valley.

In 1967 the Tagus Syndicate (Assessment # 2738) conducted a geophysical and geochemical survey on claims located north west of the Jack Rabbit shear. Mag, EM and IP surveys were done on widely spaced lines (1000 ft.) to test the porphyry copper potential. Cu, Zn and Mo were tested for with negative results.

In 1973 Phelps Dodge Corp. (Assessment #4760) conducted a magnetometer survey over the Jack Rabbit shear to define lithologic trends to aid in mapping the underlying bedrock. (An IP survey was recommended).

Exploration History (cont.)

In 1985 P. Ogryzlo a geologist at Bell mine 1972-1977 (Assessment # 13845) mapped the geology in the vicinity of the principle mineral showings. (An IP survey was recommended and a closely spaced geochemical survey where residual soils overlie bedrock to assist in tracing the shear.

In 1987 Rosalie Resources Ltd. (Assessment # 16071) repeated a magnetometer survey over the shear and performed a VLF-EM survey. (A soil sampling program was recommended over the entire claim group with samples taken every 10m along lines spaced 100m apart. Samples being tested for both Au and pathfinder elements.

In 1997 S. Bell resampled the shear to verify its high grade nature. Previous work was reviewed and the trace of the shear was interpreted from the mag and VLF-EM data. A closely spaced soil sampling program was started. The first line of which was located 100m North of the Jack Rabbit showing where 13 samples were taken across the trace of the shear at 10m intervals. The results are not conclusive but do show elevated Cu at 20w - 40w.

(iv)

Claims and Ownership

The palomino property consists of 10 one unit claims which are owned and operated by S. Bell of Houston B. C.

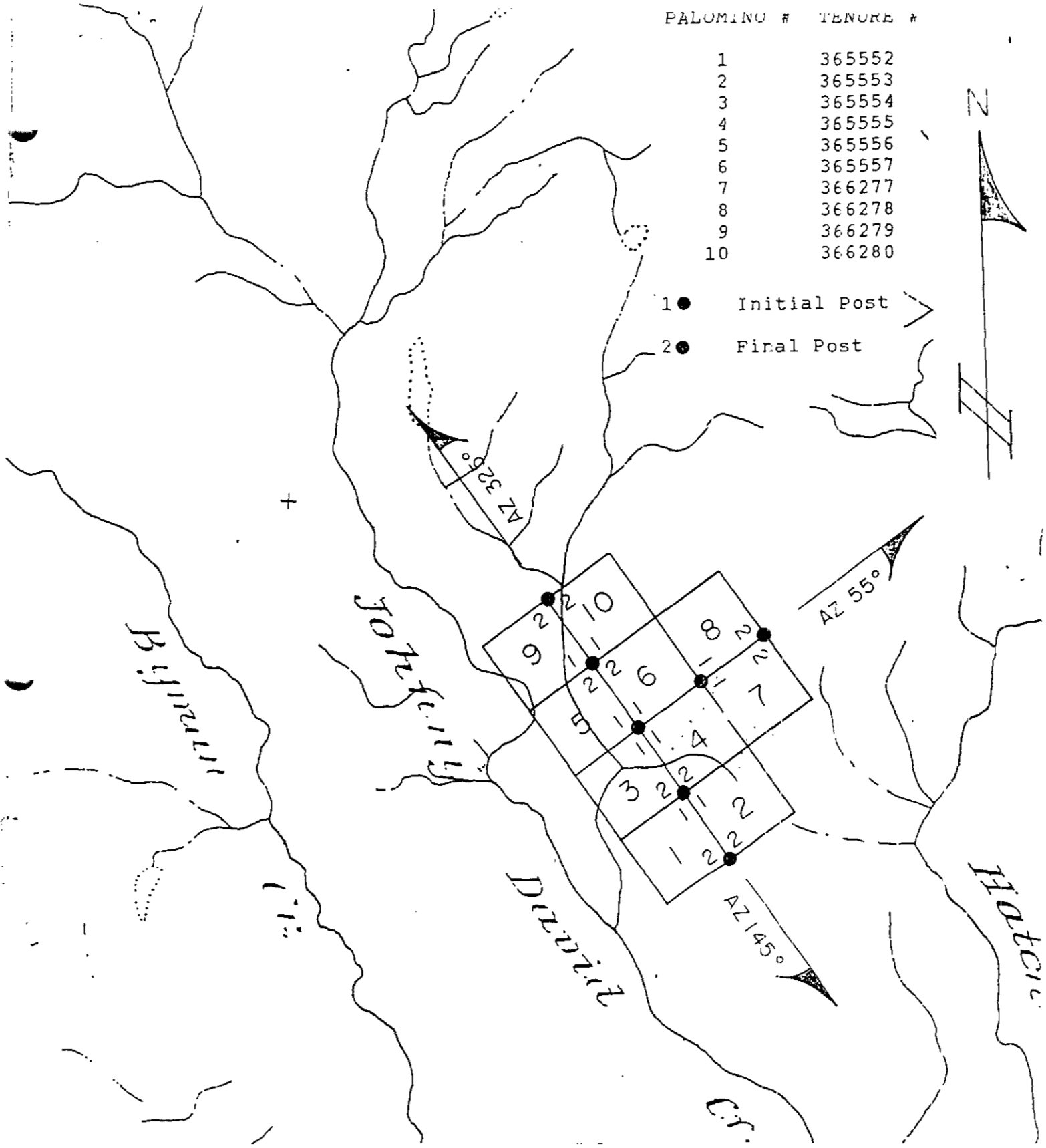
<u>Claim Name</u>	<u>Tenure #</u>
Palomino 1	365552
Palomino 2	365553
Palomino 3	365554
Palomino 4	365555
Palomino 5	365556
Palomino 6	365557
Palomino 7	366277
Palomino 8	366278
Palomino 9	366279
Palomino 10	366280

See Figure (2) for claim post locations.

PALOMINO # TENORE #

1	365552
2	365553
3	365554
4	365555
5	365556
6	365557
7	366277
8	366278
9	366279
10	366280

- 1 ● Initial Post
- 2 ● Final Post



MINERAL TITLES MAP 93 L 09 W

METERS

500 0 500 1000 1500 2000



Figure 2.

(iv) Economic Assessment

Coincident geochemical and geophysical anomalies indicate possible extensions of mineralized zones beyond Johnny David creek. This increases the possibility that more favorable structures exist along strike or at depth which could host economic mineralization.

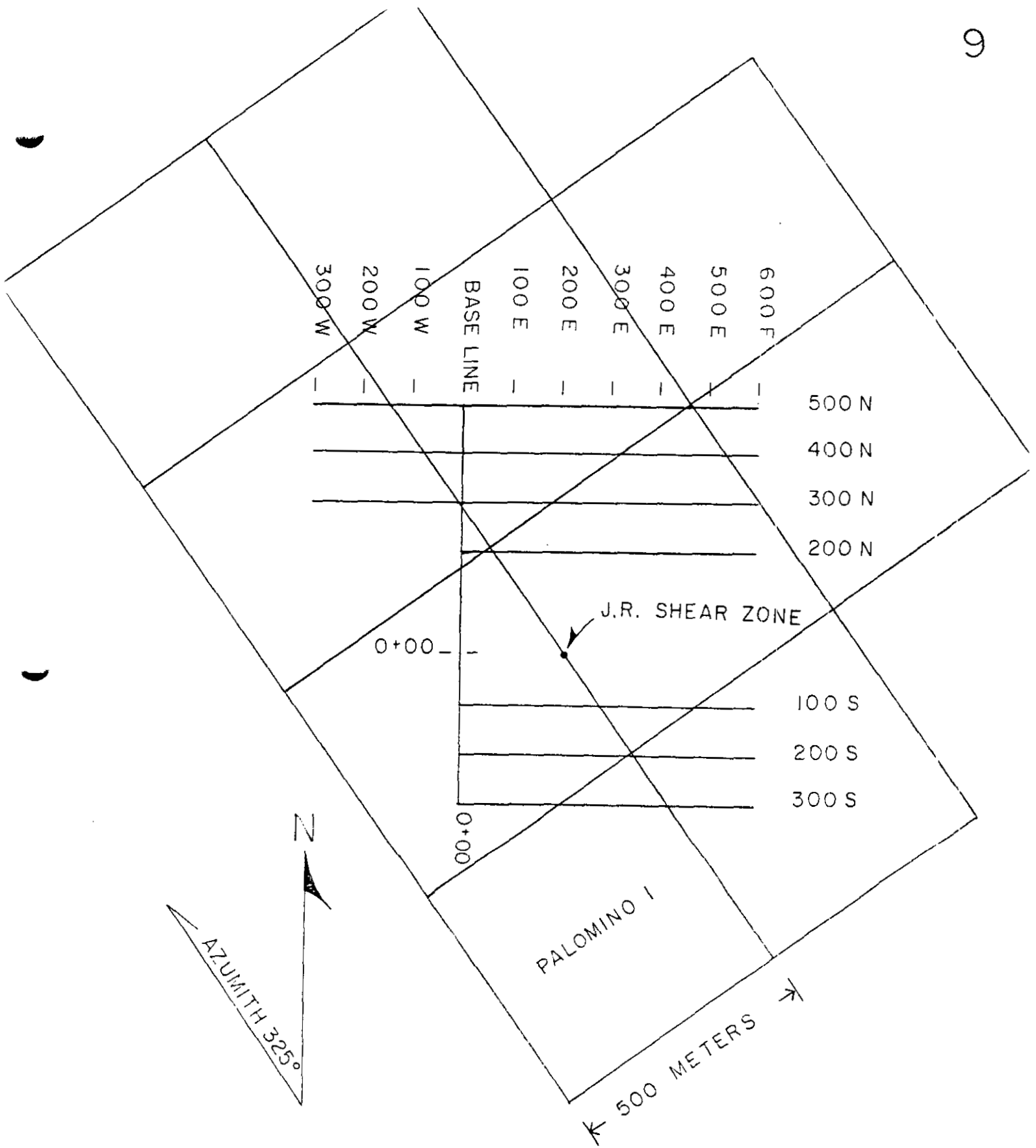
(B) Summary of Work

A geochemical survey was conducted over the Palomino claim group where 129 till samples were taken from specific locations and analyzed for gold and 12 pathfinder elements. Copper and gold values were plotted to scale on a plan and anomalies noted.

A Self Potential geophysical survey was run over the same area to detect changes in ground potentials which can indicate oxidizing sulphide mineralization. Self potentials were plotted in profile relative to a plan view at the same scale as the geochemical plan. A total of 5.2 km of SP line was surveyed.

(C) Recommendations

An attempt should be made to verify anomalous geochemistry and geophysics by exposing the Jack Rabbit shear zone north of the creek at the edge of the residual soils near 150N x 100E. Induced Polarization and Electromagnetic surveys should be conducted to test the zone along strike and at depth.



PALOMINO I-10 SURVEY GRID

Figure 3.

GEOCHEMICAL REPORT

(D) Geochemical Survey

(i) Soil Development

Glacial till covers most of the project area except in the valley of Johnny David creek which runs east-west through the claim group. Fluvial sediments fill the valley which is about 20m deep and 100m wide. Residual soils may be found on the steeper banks away from the creek. The soil is poorly developed and thin in most places except over low spots where organic matter tends to collect and drainage is poor. A typical soil profile from surface to unoxidized till is as follows.

<u>Depth cm</u>	<u>Horizon</u>
0-6	organic matter/black soil
6-30	light brown sandy gravel
30-90	grey/light grayish brown till
90	brown clay rich till

The till is found beneath the various soil horizons and layers of washed sandy gravel with cobbles at depths up to 2 meters. The till varies in thickness from a few meters to many tens of meters. Locally the till appears to be thinner north of the creek where the grade is steeper.

||

(ii) Drainage Pattern

The principle drainage is to the west by a branch stream of Johnny David creek. North of the creek drainage is to the south west to the creek. Water has cut numerous small gullies which makes the surface somewhat hummocky. To the east gulches have eroded through the till exposing the underlying bedrock. These drainages are dry during the summer. South of the creek the terrain is smoother with a gentler slope to the south west. Gullies are absent and there is at least one swampy area.

(iii) Geochemical Target

The survey was designed to test for shear zone and porphyry style copper/gold mineralization. Sample sites were selected based upon the following model and assumptions.

(a) Mineralization is associated with a 4m wide shear zone which strikes at 330 deg. The zone it is exposed in the valley of Johnny David creek.

(b) Weak porphyry copper mineralization is associated with a large (20m wide) quartz monzonite dyke which outcrops near the shear and strikes in a north westerly ? direction.

(c) The Targets are residual anomalies in till which overlies mineralization. These anomalies would be found along strike of the mineralized zones or bodies. The anomalies will be subtle since the bulk of mechanically dispersed debris from the zone has been displaced down ice. The anomalies may only be detected where the till is relatively thin and the metals are upwardly mobile.

(iv) Sample Sites

(a) Sample sites were located north and south of the creek along lines which cross the line of strike of both the shear and the dyke.

(b) Since the targets are relatively narrow a sampling interval of 15m was chosen near the shear and 30m over the dyke.

(c) Tills were sampled to increase the sensitivity of the survey in order to enhance weak anomalies. The till retains a large size fraction of fine material which has been largely washed from the upper soil horizons. Furthermore there should be more mechanically dispersed particles in the till.

(d) In sample holes the unoxidized till was exposed between 50cm and 200cm below surface. The average depth to till being 90cm.

(v) Survey Control

Grid lines were prepared (See fig. 3) using compass and hip chain to locate sample sites. The lines run east west and tie into a north south baseline. The baseline is 215m west of the shear zone where it is exposed in the creek. The east west lines are spaced 100 m apart north and south of the shear. Line 0 +00 N runs through the shear. Sample sites are located on the east west lines as indicated by fig. 4. (flagging marks each site)

(vi) Sampling Procedure

At each site .5m dia. sample holes were dug down through the upper soil horizons to reach unoxidized till. The top of each hole was dug using a long handled shovel and pick. Below depths of .5m a digging bar and spoon were used to expose the till.

Till samples were put in 4" x 7" kraft paper bags. Each bag was filled to ensure adequate sample material. Samples were transported from the field to Smithers B.C. for sample preparation at Mineral Environments Laboratory. Here the samples were dried and screened. A minus 80 mesh fraction sub sample was sent to Vancouver. At the Vancouver lab ICP analysis was performed to detect 12 pathfinder elements. 30g sub samples were tested for gold using the Fire Geochem method with A.A. finish. Careful notes were recorded at each site regarding soil types, sample depth and ground slope.

Observations

R. W. Boyle (GSC Bull. 280) states the the average abundance of copper and gold in normal soils and glacial materials are as follows.

Copper	20 p.p.m.
Gold	5 p.p.b.

Background levels for copper in till in the vicinity of Bell mine 45 km to the north east of the project area were found by Stumpf, Broster and Levson (1997) to average 44.2 p.p.m. Cu.

In the project area tills average:

North of Johnny David Creek	62.p.p.m Cu
South of " " "	38 p.p.m Cu

South the creek the copper content is similar to the background value found at Bell mine while north of the creek the values are high background. Overall background is higher than in normal soils and glacial materials.

Anomalies are defined as twice the background as found at Bell mine or 88 p.p.m. Copper.

Overall average gold content is about that stated by Boyle equal to 5 p.p.b.

Observations (cont.)

No anomalies are found south of Johnny David creek. Three anomalies were detected north of the creek.

The first anomaly marked "A" (fig 4.) is found along the strike line of the shear zone. It is defined by two lines of samples at 100N and 200N. If the trend is extended to 400N the line coincides with elevated copper (>60 ppm) at 0+00E.

The second anomaly marked "C" is found on line 200N and consists of 5 samples at 15m spacing > 100 p.p.m. copper.

The third anomaly marked "B" consists of three elevated gold samples. One on line 300N at 289 p.p.b gold. Two on line 400N at 54 and 16 p.p.b gold. There is no coincident copper anomaly.

Conclusions

Trends "A" and "B" are low order copper anomalies. Residual anomalies in till can be very subtle since there is a high degree of mechanical dispersion and dilution of anomalous bedrock material when the till is created. Since anomaly "A" lies on strike with the Jack Rabbit shear it is a likely location for mineralization. Therefore the anomalous tills probably indicate an extension of the mineralized zone to at least 200N x 100E.

Conclusions (Cont.)

Since the quartz monzonite porphyry at 0+00N x 250E has weak copper mineralization anomaly "B" on Line 200N could indicate a north trending extension of this dyke like body.

Anomaly "B" is only comprised of three anomalous samples and no firm conclusions can be made. Due to the particle sparsity effect of gold in tills it is difficult to get reproducible results. Therefore these three samples could also be spurious.

Since the down slope direction is from "B" to "C" anomaly "C" could also be a displaced residual anomaly associated with Anomaly "B". Gold usually in the form of free grains is relatively immobile when compared to the copper. If it could be shown that "C" has been mobilized from "B" then undiscovered mineralization may be indicated at "B". There is not enough data to draw this conclusion.

The over burden south of the creek may be too thick to detect a residual anomaly.

GEOPHYSICAL REPORT

(E) General Considerations of The Self-Potential Method.

The self potential or spontaneous polarization (SP) method of prospecting was used to survey the Palomino claims. The presence of underlying mineralization may be detected when sulphides give rise to a spontaneous polarization effect. This effect distorts the local electrical field creating an anomalous potential in the earth over the sulphide body. These anomalous potentials are detected by a systematic measurement of the earths electrical potential field over a survey grid.

(i) Equipment

A 300m long electrical cable was used to make connections between stations. During the survey the cable was mounted on a reel such that various lengths could be played out while maintaining electrical continuity between each end. Contact with ground was made by connecting each end of the cable to a SP pot and placing the pot on the ground.

The SP pots are small containers with porcelain ceramic bottoms. Each pot is filled with a saturated solution of copper sulfate and sealed with a threaded cap. From each cap a copper electrode is suspended which establishes electrical contact with ground through the solution via its porous ceramic bottom. A digital millivolt meter was used to take SP readings.

(ii) Survey Method

The cable reel was left at a rear control station. Here one end of the cable was attached to the rear pot which was placed in contact with ground. The forward pot was advanced along a grid line to the first station where it was placed on the ground. The millivolt meter was connected with its positive lead attached to the forward pot and its negative lead attached to the cable leading to the stationary rear pot. When the connection is made an SP reading was recorded for that station. The relative topography at the station was also noted. The cable was then pulled off the reel and readings taken at intermediate stations along the line out to the next control station at 300m. To continue the line the rear pot was moved with the reel to the new control station at 300m and the line advanced.

To inhibit topographic effects and to give better ground contacts two porous burlap bags were filled with wet mud and attached to each pot. Each pot was then in contact with a medium of constant pH which attenuate the varying acidity of the soil from station to station.

Readings were taken every 15m. This interval was reduced to 10m when crossing the strike of the Jack Rabbit shear.

(ii) Survey Grid

The survey grid coincides with the grid used for the till geochemistry (fig. 3). A north south base line was run from the 500N line at 0+00E to the 300S line at 0+00E. The rear control station is at 500N x 0+00E. Each east west line is tied into the base line at 0+00E.

(iv) Data Interpretation

With the method used anomalies due to the polarizing effect of sulphide mineralization appear as negative potentials. Topography can influence SP readings. Normal background readings agree with topography. Small hills tend to give negative readings while swampy areas are more positive. Readings need to be interpreted with topographic information since pronounced slopes can introduce a topographic effect. A high negative reading on a hill might not necessarily be anomalous. Using the "burlap bag" technique adjusted background readings usually vary from +10mv to -25mv. No normalizer was applied to the Palomino data since the highest positive value encountered was close to +10mv. The data plotted in profile on fig. 5 is the actual field data relative to station 500N x 0+00E which was assigned a value of 0mv. In this survey SP readings of at least -40mv are considered anomalous.

Observations

SP anomalies are indicated by bars on fig. 5 at locations "A", "B" and "C". In 4 other locations marked "Hill" or "High Ground" negative SP anomalies are attributed to the topographic effect. Anomalies "A" and "B" are located on the trend of the Jack Rabbit shear zone at 200N and 200S. Anomaly "C" is located on line 200N 100m east of anomaly "A". Anomalies "A" and "C" are coincident with anomalous copper geochemistry.

The relative magnitude of each anomaly is as follows.

"A"	-60mv
"B"	-40mv
"C"	-40mv

There is an interesting trend from more positive readings to negative on lines 300N and 400N at about 300E. The readings reach values of almost -40mv on line 400N. Coincidentally three soil samples tested anomalous for gold here at the cross over to negative SP readings.

Conclusions

Anomalies "A" and "B" are possible extensions of the Jack Rabbit shear zone. If the zone is continuous the shear has a strike length of almost 500m. A shear zone of this length would be a significant exploration target since there is a good chance that more mineralized structures might exist along strike or at depth which could host significant gold.

Anomaly "C" could be related to the quartz monzonite dyke which out crops 200m to the south. The dyke carries a little pyrite which might cause an SP response. Or Anomaly "C" could indicate undiscovered mineralization which trends through "C" in a north east direction toward line 300N at the positive/negative SP cross over.

APPENDIX



**MINERAL
• ENVIRONMENTS
LABORATORIES**
(DIVISION OF ASSAYERS CORP.)

SPECIALISTS IN MINERAL ENVIRONMENTS
CHEMISTS • ASSAYERS • ANALYSTS • GEOCHEMISTS

VANCOUVER OFFICE:
8282 SHERBROOKE STREET
VANCOUVER, B.C. CANADA V5X 4E8
TELEPHONE (604) 327-3436
FAX (604) 327-3423

SMITHERS LAB:
3178 TATLOW ROAD
SMITHERS, B.C. CANADA V0J 2N0
TEL (604) 847-3004
FAX (604) 847-3005

ANALYTICAL PROCEDURE REPORT FOR ASSESSMENT WORK:
PROCEDURE FOR SAMPLE PREPARATION

- a.) The soil and stream sediment samples are dried at 60 Celsius. The sample is then screened by 80 mesh sieve to obtain the -80 mesh fraction for analysis.
- b.) The rock and core samples are dried at 60 Celsius and when dry are crushed in a jaw crusher. The 1/4 inch output of the jaw crusher is put through a secondary roll crusher to reduce it to -1/8 inch. The whole sample is then riffled on a Jones Riffle down to a statistically representative 300 gram sub-sample. This sub-sample is then pulverized on a ring pulverizer to 95% minus 150 mesh rolled and bagged for analysis. The remaining reject from the Jones Riffle is bagged and stored.



**MINERAL
ENVIRONMENTS
LABORATORIES LTD.**

SPECIALISTS IN MINERAL ENVIRONMENTS
CHEMISTS • ASSAYERS • ANALYSTS • GEOCHEMISTS

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3176 TATLOW ROAD
SMITHERS, B.C., CANADA V0J 2N0
TELEPHONE (604) 847-3004
FAX (604) 847-3005

Quality Assaying for over 25 Years

ANALYTICAL PROCEDURE REPORT FOR ASSESSMENT WORK:

PROCEDURE FOR TRACE ELEMENT ICP

Ag, Al, As, Ba, Be, Bi, Ca, Cd, Co, Cr, Cu, Fe, Ga, K, Li, Mg, Mn, Mo, Na, Ni, P,
Pb, Sb, Sn, Sr, Th, Ti, U, W, Zn.

0.50 grams for the sample pulp is digested for 2 hours with an 1:3:4 HNO₃:HCl:H₂O mixture.
After cooling, the sample is diluted to standard volume.

The solutions are analyzed by computer operated Perkin Elmer Optima 3000, Inductively Coupled
Plasma Spectrophotometers.

COMP: MR. STEVE BELL
 PROJ:
 ATTN: Steve Bell

MIN-EN LABS — ICP REPORT
 8282 SHERBROOKE ST., VANCOUVER, B.C. V5X 4E8
 TEL:(604)327-3436 FAX:(604)327-3423

FILE NO: 75-0330-SJ1
 DATE: 9/7/10/24
 * * (ACT:ICP 31)

SAMPLE NUMBER	AG PPM	AS PPM	BA PPM	CD PPM	CU PPM	FE %	K %	MO PPM	NI PPM	PB PPM	SB PPM	Zn PPM	Au-fire PPM
T-100N + 50E	.1	8	110	.1	49	3.11	.03	1	14	8	1	53	15
T-100N + 40E	.1	11	170	.1	99	4.00	.06	1	24	10	1	76	6
T-100N + 30E	.1	9	125	.1	63	3.38	.05	1	17	10	1	62	7
T-100N + 20E	.1	11	125	.1	72	3.69	.06	1	18	11	1	62	3
T-100N + 10E	.1	9	175	.2	64	3.93	.10	1	24	11	1	109	10
T-100N + 00E	.1	12	141	.1	54	3.90	.08	1	24	11	1	76	5
T-100N + 10W	.1	11	150	.1	77	4.11	.09	1	26	12	1	81	4
T-100N + 20W	.1	13	207	.1	99	4.41	.10	1	29	12	1	89	4
T-100N + 30W	.1	10	174	.1	118	3.99	.12	1	27	12	1	87	3
T-100N + 40W	.1	9	228	.2	95	4.16	.10	1	28	10	1	98	6
T-100N + 50W	.1	12	121	.1	62	3.75	.09	1	25	12	1	77	5
T-100N + 60W	.1	11	143	.1	102	4.16	.10	1	27	11	1	83	11
T-100N + 70W	.1	11	132	.1	59	3.66	.09	1	23	11	1	68	4
T-TOPO	.1	7	182	.1	30	3.44	.06	1	15	9	1	94	3
SOIL GEOCHEMISTRY ACROSS JACK RABBIT SHEAR													
100 M NORTH OF OUT CROP													

Fig 17.

MR. STEVE BELL

Attention: Steve Bell

Project: PALOMINO

Sample: SOIL

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No 850094 SJ

Date : Oct-01-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Mn ppm	Mo ppm	Pb ppm	Sb ppm	Zn ppm	Au-fire ppb
100S 210E	<0.2	10	190	<1	44	3.71	0.06	700	<2	4	<5	76	2
100S 225E	<0.2	10	220	<1	52	4.04	0.08	1020	<2	2	5	100	4
100S 240E	<0.2	10	190	<1	41	3.60	0.07	1035	<2	4	5	80	3
100S 255E	<0.2	10	210	<1	39	3.50	0.05	810	<2	4	<5	88	6
100S 270E	<0.2	5	180	<1	32	3.06	0.05	460	<2	2	<5	70	3
100S 285E	<0.2	5	230	1	34	3.03	0.05	430	<2	10	<5	62	4
100S 300E	<0.2	10	220	1	43	3.60	0.05	820	<2	12	5	76	3
100S 315E	<0.2	10	210	2	41	3.38	0.05	710	<2	16	5	75	2
100S 330E	<0.2	10	210	<1	49	3.31	0.05	640	<2	2	<5	70	2
100S 345E	<0.2	5	200	<1	41	3.35	0.06	725	<2	4	<5	74	3
100S 360E	<0.2	5	200	2	35	3.35	0.05	650	<2	18	<5	77	3
100S 375E	<0.2	5	240	<1	48	3.59	0.06	570	<2	<2	5	77	3
100S 390E	<0.2	5	230	<1	50	3.55	0.06	540	<2	4	<5	73	4
100S 405E	<0.2	10	230	<1	49	3.68	0.06	835	<2	4	<5	87	2
100S 420E	<0.2	10	300	<1	44	3.57	0.05	760	<2	2	<5	72	3
200N 045W	<0.2	10	200	1	35	3.25	0.05	885	<2	10	<5	82	4
200N 030W	<0.2	10	260	<1	58	3.94	0.07	965	<2	6	<5	114	7
200N 015W	<0.2	10	200	4	45	3.39	0.04	875	<2	28	5	74	5
200N 000E	<0.2	10	200	3	42	3.48	0.04	845	<2	16	5	80	4
200N 015E	<0.2	10	200	<1	50	3.36	0.05	770	<2	6	5	79	4
200N 030E	<0.2	5	170	<1	71	3.45	0.05	890	<2	6	5	75	4
200N 045E	<0.2	5	220	<1	57	3.57	0.06	815	<2	6	<5	77	4
200N 060E	<0.2	5	300	<1	54	3.58	0.05	460	<2	<2	<5	60	5
200N 075E	<0.2	5	240	<1	75	3.20	0.04	470	<2	2	<5	69	3
200N 090E	<0.2	10	220	<1	90	3.69	0.06	950	<2	2	5	73	2
200N 105E	<0.2	10	210	<1	94	3.63	0.06	840	<2	4	5	70	3
200N 120E	<0.2	10	220	<1	65	3.75	0.07	1155	<2	6	5	80	7
200N 135E	<0.2	5	270	<1	62	3.84	0.11	440	<2	2	5	70	5
200N 150E	<0.2	5	170	<1	37	3.60	0.07	585	<2	4	5	63	2
200N 165E	<0.2	5	260	<1	85	3.40	0.06	545	<2	2	5	64	5

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

MR. STEVE BELL

Attention: Steve Bell

Project: PALOMINO

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0094 SJ

Date : Oct-01-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Mn ppm	Mo ppm	Pb ppm	Sb ppm	Zn ppm	Au-fire ppb
200N 180E	<0.2	10	240	<1	122	4.42	0.09	1315	<2	6	5	91	6
200N 195E	<0.2	10	230	<1	114	3.65	0.06	835	<2	4	5	68	3
200N 210E	<0.2	5	200	<1	114	4.07	0.09	800	<2	<2	5	73	3
200N 225E	<0.2	10	220	<1	126	3.99	0.08	1030	<2	4	5	78	7
200N 240E	<0.2	10	210	<1	132	4.03	0.07	1115	<2	2	5	75	3
200N 255E	<0.2	5	170	<1	94	3.52	0.06	570	<2	4	5	70	3
200N 270E	<0.2	10	220	<1	66	3.19	0.06	340	<2	2	5	56	4
200N 285E	<0.2	10	230	<1	101	3.96	0.07	1015	<2	4	5	80	5
200N 300E	<0.2	5	190	<1	66	3.29	0.05	455	<2	2	<5	54	4
200N 315E	<0.2	10	220	<1	85	4.34	0.08	1255	<2	4	5	88	3

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

Mineral Environments Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0095 SJ

Date : Oct-08-98

MR. STEVE BELL

Attention: Steve Bell

Project: PALOMINO

Sample: SOIL

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Ca %	Mo ppm	Pb ppm	Sb ppm	Zn ppm	Au-fire ppb
200S 290E	<0.2	5	240	<1	39	3.49	0.06	0.52	<2	<2	<5	85	6
200S 305E	<0.2	10	240	<1	51	3.78	0.07	0.55	<2	4	<5	77	2
200S 320E	<0.2	10	190	<1	40	3.44	0.06	0.49	<2	2	<5	76	3
200S 335E	<0.2	5	190	<1	32	3.00	0.05	0.47	<2	2	<5	78	3
200S 350E	<0.2	5	200	<1	45	3.48	0.06	0.53	<2	2	<5	70	4
200S 365E	<0.2	10	210	<1	45	3.82	0.07	0.52	<2	2	<5	87	7
200S 380E	<0.2	10	180	<1	50	3.42	0.06	0.47	<2	4	<5	70	3
200S 395E	<0.2	10	200	<1	41	3.74	0.07	0.45	<2	2	<5	82	2
200S 410E	<0.2	5	200	<1	46	4.00	0.06	0.47	<2	4	<5	85	4
200S 425E	<0.2	5	190	<1	39	3.39	0.05	0.44	<2	4	<5	66	4
200S 440E	<0.2	10	180	<1	45	3.39	0.06	0.46	<2	2	<5	72	2
200S 455E	<0.2	5	160	<1	29	3.09	0.05	0.49	<2	2	<5	65	1
200S 470E	<0.2	5	200	<1	43	3.31	0.06	0.57	<2	4	<5	69	4
200S 485E	<0.2	5	190	<1	53	3.31	0.05	0.65	<2	2	5	71	6
200S 500E	<0.2	5	180	<1	38	3.36	0.06	1.17	<2	4	5	81	4
300S 330E	<0.2	<5	270	<1	34	3.01	0.05	0.75	<2	2	<5	88	3
300S 345E	0.2	<5	320	<1	37	2.68	0.05	1.06	<2	<2	<5	58	2
300S 360E	0.2	5	360	<1	81	3.17	0.06	1.10	<2	<2	<5	90	3
300S 375E	<0.2	5	230	<1	50	2.70	0.05	0.89	<2	<2	<5	52	2
300S 390E	<0.2	<5	180	<1	29	2.19	0.03	0.50	<2	2	<5	56	4
300S 405E	<0.2	5	140	<1	17	2.50	0.05	0.45	<2	2	<5	55	2
300S 420E	<0.2	<5	110	<1	11	2.72	0.04	0.21	<2	<2	<5	91	1
300S 435E	<0.2	5	130	<1	13	3.37	0.05	0.28	<2	<2	<5	90	1
300S 450E	<0.2	5	270	<1	17	3.29	0.06	0.49	<2	4	<5	67	2
300S 465E	<0.2	5	320	<1	35	3.13	0.05	0.71	<2	2	<5	90	3
300S 480E	<0.2	<5	270	<1	19	3.11	0.05	0.45	<2	2	<5	65	1
300S 495E	0.2	5	300	<1	37	3.10	0.05	0.64	<2	<2	<5	104	1
300S 510E	<0.2	<5	110	<1	13	2.59	0.04	0.26	<2	<2	<5	60	8
300S 525E	0.4	10	510	<1	85	5.32	0.17	1.08	<2	<2	5	137	4
300S 540E	<0.2	5	120	<1	16	2.69	0.05	0.30	<2	2	<5	76	2

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO₃ at 95c for 2 hours and diluted to 25ml with D.I.H₂O.



MR. STEVE BELL

Attention: Steve Bell

Project: PALOMINO

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0106 SJ


Date : Nov-04-98

MULTI-ELEMENT ICP ANALYSIS

Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Ca %	Mo ppm	Pb ppm	Sb ppm	Zn ppm	Au-fire ppb
P300N 375E	<0.2	5	180	<1	49	3.38	0.06	0.46	<2	6	<5	57	3
P300N 360E	<0.2	5	180	1	73	3.51	0.06	0.47	<2	12	<5	75	5
P300N 345E	<0.2	10	190	<1	81	3.64	0.06	0.48	<2	12	<5	88	7
P300N 330E	<0.2	10	220	<1	48	3.90	0.08	0.53	<2	8	<5	88	4
P300N 315E	<0.2	10	160	<1	65	4.14	0.06	0.46	<2	6	5	83	289
P300N 300E	<0.2	10	190	<1	51	3.51	0.06	0.47	<2	8	<5	81	4
P300N 285E	<0.2	10	230	<1	68	4.20	0.08	0.55	<2	8	<5	99	6
P300N 270E	<0.2	5	210	<1	54	3.79	0.07	0.55	<2	8	<5	79	4
P300N 180E	<0.2	20	210	<1	43	4.33	0.07	0.47	<2	10	5	70	3
P300N 165E	<0.2	10	210	<1	54	3.85	0.08	0.44	<2	8	<5	87	7
P300N 150E	<0.2	10	210	1	63	3.56	0.06	0.44	<2	10	<5	77	5
P300N 135E	<0.2	10	210	<1	123	3.49	0.06	0.47	<2	8	<5	82	4
P300N 120E	<0.2	10	190	<1	71	3.50	0.07	0.47	<2	8	<5	73	3
P300N 050W	<0.2	10	250	<1	29	3.29	0.06	0.67	<2	8	<5	81	4
P300N 065W	<0.2	10	190	<1	48	3.63	0.06	0.45	<2	10	<5	84	5
P300N 080W	<0.2	10	180	<1	38	3.52	0.06	0.44	<2	8	<5	80	2
P300N 095W	<0.2	10	220	<1	58	3.76	0.06	0.40	<2	10	<5	89	5
P300N 110W	<0.2	10	260	<1	57	4.18	0.10	0.56	<2	12	<5	95	2
P300N 125W	<0.2	10	300	<1	33	3.49	0.06	0.56	<2	6	<5	81	2
P400N 585E	<0.2	10	190	<1	19	3.54	0.10	0.55	<2	6	<5	65	4
P400N 570E	<0.2	10	220	1	44	4.10	0.07	0.46	<2	14	5	83	3
P400N 555E	<0.2	10	250	<1	56	4.05	0.08	0.55	<2	8	<5	84	2
P400N 540E	<0.2	10	250	<1	46	3.53	0.06	0.51	<2	8	<5	70	1
P400N 525E	<0.2	10	200	<1	48	3.61	0.06	0.46	<2	8	<5	85	2
P400N 495E	<0.2	10	230	<1	63	3.67	0.07	0.49	<2	8	<5	83	4
P400N 465E	<0.2	5	200	<1	84	3.93	0.08	0.66	<2	6	<5	69	7
P400N 435E	<0.2	5	250	<1	63	3.82	0.07	0.51	<2	10	<5	72	5
P400N 405E	<0.2	5	270	<1	28	2.86	0.04	0.38	<2	8	<5	64	3
P400N 375E	<0.2	10	260	<1	45	3.57	0.06	0.52	<2	8	<5	80	16
P400N 345E	<0.2	5	280	<1	47	3.63	0.06	0.53	<2	6	<5	69	54

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.

Signed: 

MR. STEVE BELL

Attention: Steve Bell

Project: PALOMINO

Sample: SOIL

Mineral Environmental Laboratories

8282 Sherbrooke St., Vancouver, B.C., V5X 4E8

Tel (604) 327-3436 Fax (604) 327-3423

Report No : 8S0106 SJ

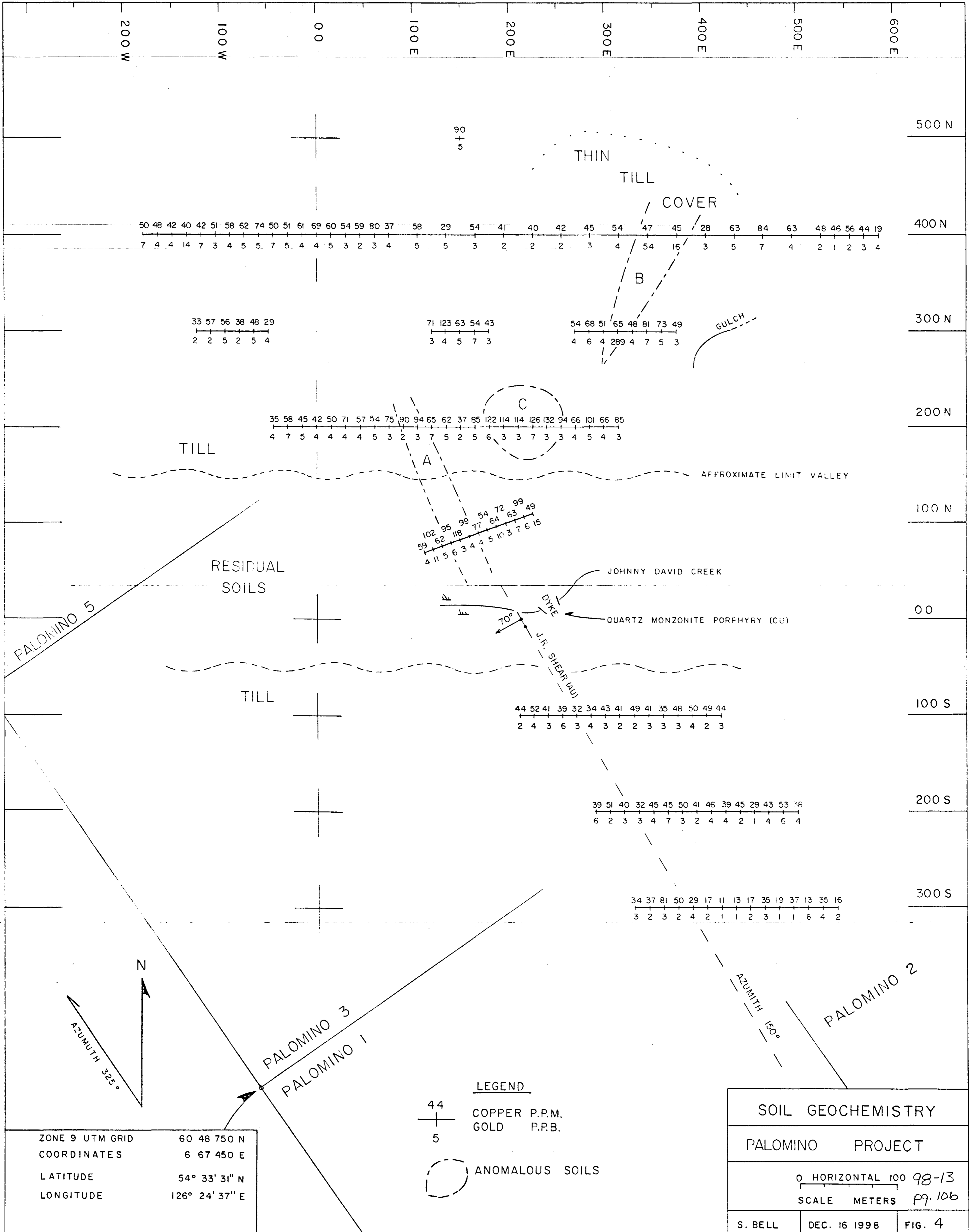
Date : Nov-04-98

MULTI-ELEMENT ICP ANALYSIS

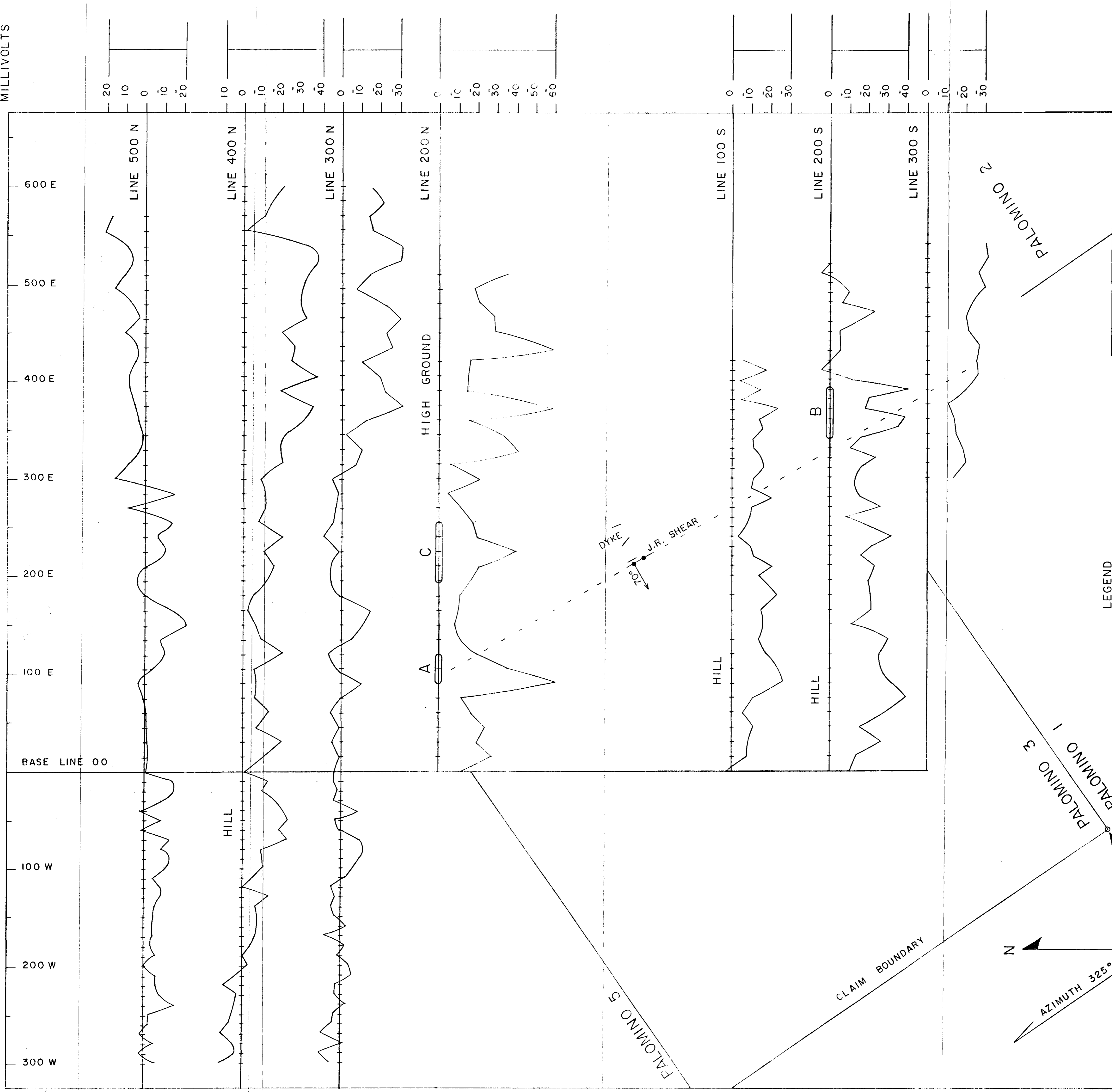
Aqua Regia Digestion

Sample Number	Ag ppm	As ppm	Ba ppm	Cd ppm	Cu ppm	Fe %	K %	Ca %	Mo ppm	Pb ppm	Sb ppm	Zn ppm	Au-fire ppb
P400N 315E	<0.2	10	280	<1	54	4.06	0.08	0.53	<2	8	<5	93	4
P400N 285E	<0.2	10	230	<1	45	3.92	0.07	0.48	<2	8	<5	87	3
P400N 255E	<0.2	10	230	<1	42	3.56	0.06	0.48	<2	6	<5	76	2
P400N 225E	<0.2	10	190	<1	40	3.50	0.05	0.44	<2	6	<5	74	2
P400N 195E	<0.2	10	200	<1	41	3.80	0.06	0.38	<2	8	<5	79	2
P400N 165E	<0.2	10	230	<1	54	4.13	0.08	0.57	<2	10	<5	82	3
P400N 135E	<0.2	5	130	<1	29	2.82	0.06	0.40	<2	12	<5	81	5
P400N 105E	<0.2	10	260	<1	58	3.75	0.07	0.52	<2	8	<5	76	5
P400N 075E	<0.2	10	230	<1	37	3.41	0.06	0.41	<2	6	<5	74	4
P400N 060E	<0.2	10	270	<1	80	4.21	0.09	0.56	<2	8	<5	90	3
P400N 045E	<0.2	10	230	<1	59	4.21	0.09	0.55	<2	8	<5	93	2
P400N 030E	<0.2	10	230	<1	54	3.61	0.05	0.47	<2	6	<5	72	3
P400N 015E	<0.2	10	250	<1	60	3.80	0.06	0.52	<2	8	<5	78	5
P400N 000E	<0.2	10	240	<1	69	3.87	0.07	0.51	<2	8	<5	88	4
P400N 015W	<0.2	10	230	<1	61	3.87	0.07	0.47	<2	8	<5	86	4
P400N 030W	<0.2	10	190	1	51	4.05	0.08	0.74	<2	18	<5	96	5
P400N 045W	<0.2	10	210	<1	50	3.85	0.07	0.44	<2	10	<5	83	7
P400N 060W	<0.2	10	260	<1	74	4.15	0.08	0.46	<2	10	<5	95	5
P400N 075W	<0.2	10	220	<1	62	3.66	0.06	0.44	<2	8	<5	77	5
P400N 090W	<0.2	10	230	<1	58	3.80	0.06	0.42	<2	8	<5	76	4
P400N 105W	<0.2	10	290	<1	51	3.82	0.07	0.54	<2	8	<5	92	3
P400N 120W	<0.2	10	260	<1	42	3.75	0.06	0.51	<2	8	<5	82	7
P400N 135W	<0.2	10	240	<1	40	3.74	0.06	0.46	<2	8	<5	84	14
P400N 150W	<0.2	10	220	<1	42	3.76	0.06	0.44	<2	10	<5	87	4
P400N 165W	<0.2	10	230	<1	48	4.21	0.08	0.54	<2	10	<5	86	4
P400N 180W	<0.2	10	250	<1	50	3.88	0.06	0.49	<2	10	<5	87	7
P500N 150E	<0.2	5	280	<1	90	4.30	0.10	0.53	<2	8	<5	84	5
P780N 890E	<0.2	10	270	<1	73	4.16	0.09	0.63	<2	10	<5	98	5
P825N 360W	<0.2	<5	180	<1	36	3.70	0.07	0.64	<2	4	<5	105	5

A .5 gm sample is digested with 10 ml 3:1 HCl/HNO3 at 95c for 2 hours and diluted to 25ml with D.I.H2O.



MILLIVOLTS



LEGEND

- SELF POTENTIAL (millivolts)
- ANOMALOUS POTENTIAL
- VERTICAL SCALE (millivolts)
- PROJECTION OF "JACK RABBIT"
- SHEAR ZONE AZUMUTH 150°
- (OUT CROP)

SELF POTENTIAL PROFILE

PALOMINO PROJECT

0 HORIZONTAL 100 98-13
SCALE METERS 107 107

S. BELL DEC. 15 1998 FIG. 5

ZONE 9 UTM GRID 60 48 750 N
COORDINATES 6 67 450 E

LATITUDE 54° 33' 31" N
LONGITUDE 126° 24' 37" E



AZIMUTH 325°

CLAIM BOUNDARY

PALOMINO 3
PALOMINO 1
PALOMINO 2

PALOMINO 5

HILL

HILL

HIGH GROUND

A

C

DYKE

J.R. SHEAR
TOP

B

BASE LINE 00

100 W

200 W

300 W

600 E

500 E

400 E

300 E

200 E

100 E

LINE 500 N

LINE 400 N

LINE 300 N

LINE 200 N

LINE 100 S

LINE 200 S

LINE 300 S

20

10

0

10

20

30

40

0

10

20

30

40

0

10

20

30

40

50

60

0

10

20

30

0

10

20

30

40

0

10

20

30