

84-#482 - #12421  
1/85

GEOCHEMICAL REPORT  
on the  
WELL GROUP MINERAL CLAIMS  
CRANBROOK AREA  
FORT STEELE MINING DIVISION  
BRITISH COLUMBIA



PROPERTY	WELL 3 and WELL 4 N.T.S. 82F/9E 49° 33'N 116° 07'W
OWNER	GEOTECH RESOURCES INC. /TUNSTALL RESOURCES INC., 319-470 GRANVILLE ST. VANCOUVER, B.C. V6C 1V5
OPERATOR	GEOTECH RESOURCES INC., 319-470 GRANVILLE STREET VANCOUVER, B.C. V6C 1V5
AUTHOR	G.S. ARCHER, 319-470 GRANVILLE STREET VANCOUVER, B.C.
DATE	JULY 5, 1984

12421

GEOLOGICAL BRANCH  
ASSESSMENT REPORT

12,421

GEOCHEMICAL REPORT

on the

WELL GROUP MINERAL CLAIMS

CRANBROOK AREA

FORT STEELE MINING DIVISION

BRITISH COLUMBIA

---

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N.T.S. 82F/9E  
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AUTHOR

G.S. ARCHER,  
319-470 GRANVILLE STREET,  
VANCOUVER, B.C.

DATE

JULY 5, 1984

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## INTRODUCTION

This report was written at the request of Geotech Resources Inc. The report is based on geochemical data and observations made during the sampling process.

The Well mineral claim group is located 30 km. west of Cranbrook within one km. east of Angus Creek. Perry Creek is within 4 km. to the east (see property location map). The property can be accessed from Cranbrook, north along Highway 95-A for 20 km. and then west for 15 km. A main logging road is then followed south up the east side of Angus Creek where the Well group is located.

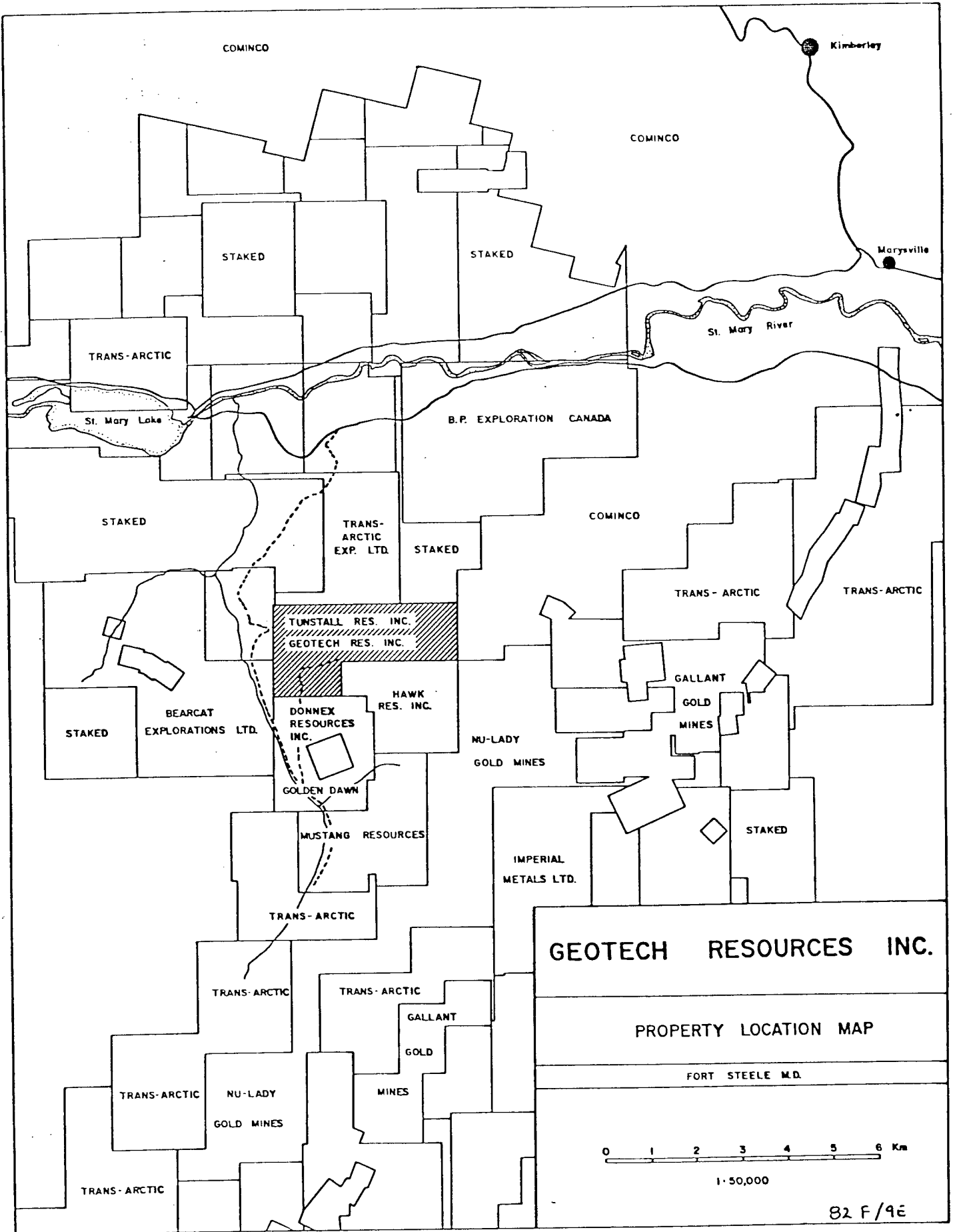
The property consists of two claims of 16 units each. The property was purchased from Trans-Arctic Ltd. with 50% interest in the claims held by Tunstall Resources Inc. No previous work has been recorded on the property.

The geochemical survey that has been carried out to date is of limited scope. It is felt that continued exploration along the shear zone should produce more encouraging result due to the close proximity to a mineral occurrence as indicated by G.B. Leech on his St. Mary Lake map sheet. L. Sookochoff, P.Eng states that:

"The WELL CLAIM GROUP covers geologically favorable ground for the occurrence of gold bearing quartz material comparable to that located on the adjacent ground to the southwest or at Perry Creek.

The St. Mary's shear zone covered by the claim group could provide the necessary mineral controlling structures. The trenched shear zone on the property, although not carrying gold or silver values provides encouraging features to geological controls of potential mineralization."

A total of 12 samples, weighing 3-4 kilograms each were collected (see Appendix A).



## GEOLOGY

The general geologic setting of the property consists of three formations. The basal Aldridge Formation, the oldest formation occurring in the region as well as the property consists primarily of weathered argillite and argillaceous quartzite. The Creston Formation, which is transitional from the Aldridge Formation consists of argillaceous quartzites and argillites. This formation is host to gold quartz veins on Perry Creek situated to the east. The Moyie Intrusions, which are interbedded with the Aldridge Formation, consists of meta-diorite and meta-quartz diorite.

The following is quoted from L. Sookochoff's June 5, 1984 report on the Well claim group.

"The general structure of the area is of a broad, northerly striking anticline exposing the core of the Proterozoic rocks with younger rocks to the west and east. The regional St. Mary's Fault trends east northeast through the property area and creates a fault contact with the Aldridge and Creston Formations.

Faults extending from the south generally terminate or trend into the St. Mary's fault and commonly indicate contacts between the Creston and Kitchener Formations."

"The property predominantly covers the basal Aldridge Formation in a northeasterly trending contact with the Creston Formation to the southeast. The two Formations are partly in fault contact by the east northeasterly trending St. Mary's fault."

## SAMPLING AND LABORATORY METHODOLOGY

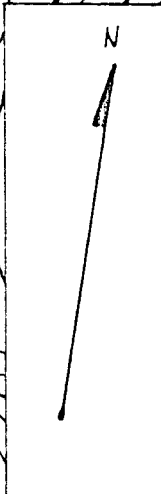
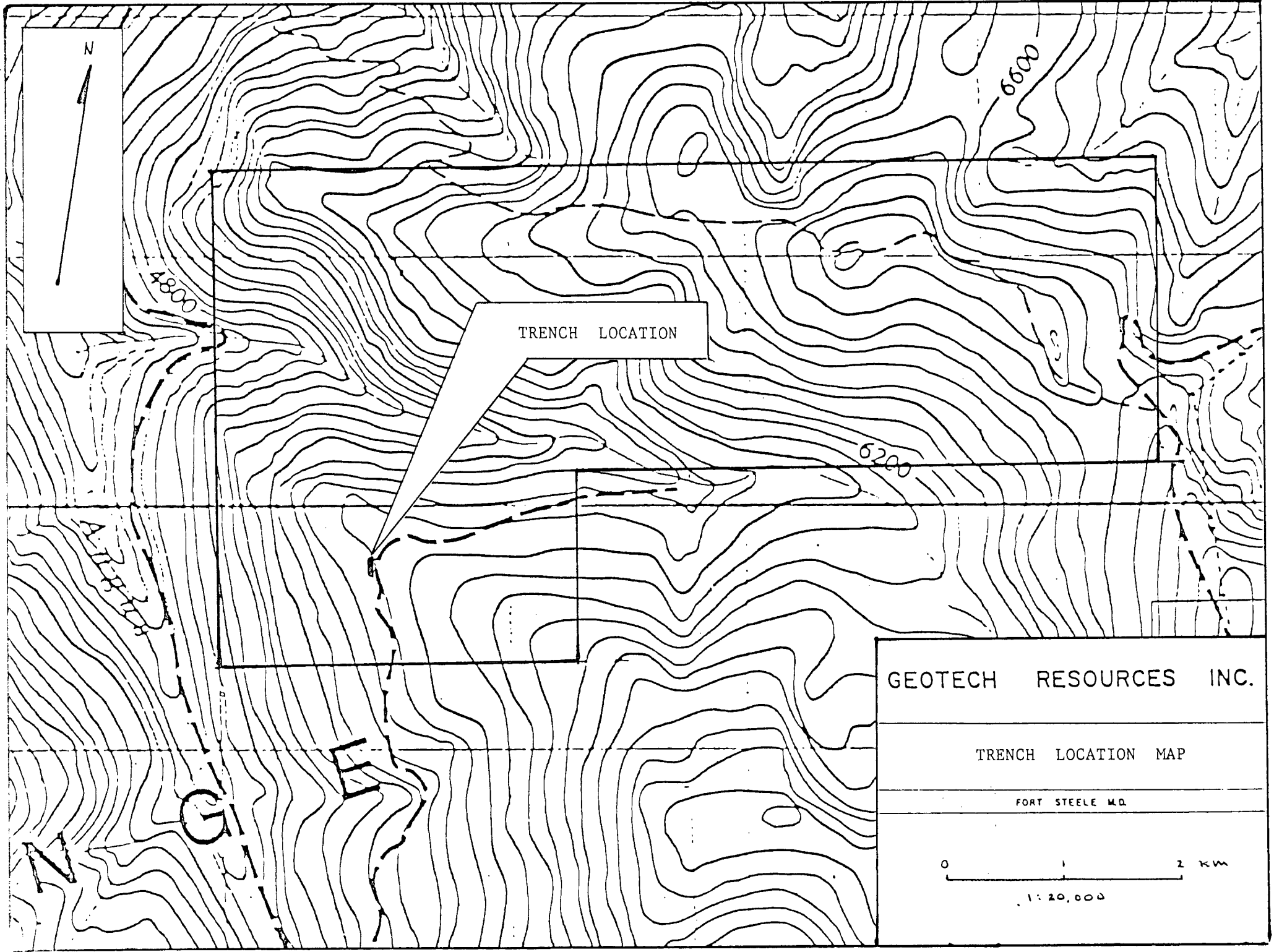
The recently excavated trench exposed a 30 metre shear zone trending 090 . A total of 12 samples, weighing 3-4 kilograms each were collected (see trench and sample map). Appendix A lists the sample rock type, texture and other observations made during the sampling process. Direction and distance was measured using compass and tape . The samples were put in numbered plastic bags.

The trenched zone was accessed via a secondary logging road which was cleared of snow. The trench was excavated by 'cat' to a depth of 2.2 metres and length of 35 metres on a bearing of 170.

The samples were analyzed by Acme Analytical Laboratories Ltd., Vancouver B.C. The samples were tested for 30 elements using Inductively coupled Argon Plasma (ICP). The rock samples were pulverized to -100 mesh and dried. A 0.5 gram sample was digested in hot diluted aqua regia (3 ml) in a boiling water bath (90 C) and diluted to 10 ml with demineralized water. Gold was determined by regular assay.

The results showed only background levels for gold and silver (see Appendix B). The St. Mary Lake map sheet by G.B. Leech shows this location to be a mineral prospect which prompted the re-testing of the samples at Chemex Labs Ltd. Similar results for gold and silver were obtained (see Appendix B-2).

It is expected that additional trenching and sampling to the east of this location will provide the necessary information to accurately evaluate the shear zone.



TRENCH LOCATION

GEOTECH RESOURCES INC.

TRENCH LOCATION MAP

FORT STEELE M.D.



1:20,000



N

TR-I-A

TR-I-B

TR-I-C-1

TR-I-C-2

TR-I-D

TRENCH

TR-I-E

TR-I-F

TR-I-G

TR-I-H

TR-I-I

TR-I-J

COVERED

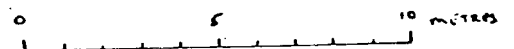
TR-I-K

ROAD

GEOTECH RESOURCES INC.

SAMPLE AND TRENCH MAP

FORT STEELE MD.



1:200

82 F/9E

ITEMIZED COST STATEMENT

A) Wages - May 7-12, 1984

Geologist - 6 days @ \$115.00/day \$ 690.00

B) Trenching and road improvement

Trans-Arctic Exp. Ltd. (May 24) \$ 585.00

Trans-Arctic Exp. Ltd. (June 11) \$1030.00

C) Food and Accomadation between May 7 and May 12, 1984

\$ 150.35

D) Truck and Air Fair

Truck rental \$ 64.17

Air Fair \$ 250.00

E) Geochemical Analysis -

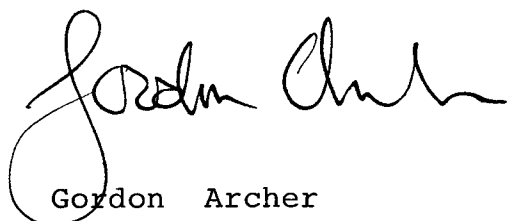
Acme Analytical Laboratories (see Appendix C) \$ 186.00

Chemex Labs Ltd. (see Appendix D) \$ 291.00

-----  
\$3247.07

GORDON S. ARCHER - QUALIFICATIONS

- 1) I am a graduate of the University of Victoria with a Bachelor of Science Degree (1980 - Physical Geography).
- 2) I have subsequently completed the Geology Program at the University of British Columbia.
- 3) Geology Work Experience :
  - Assistant Geologist with the B.C. Ministry of Energy, Mines and Petroleum Resources, Project Geology Dept. 1980-1981.
  - Intermediate Field Geologist with Petro Canada (Coal Division) - 1982.
  - Self-employed - worked for several Vancouver based resource companies and with various geological engineers throughout the season - 1983.
  - Currently employed by Geotech Resources Inc. as a Geologist and Computer Programmer.
- 4) I am currently a shareholder of Geotech Resources Inc.

  
Gordon Archer

APPENDIX A

<u>Sample number</u>	<u>Description</u>
TR-1-A	-Chloritic porphyry -rust along fractures -3.7 metres sampled
TR-1-B	-rusty color throughout -linear texture -mylonitic -granular appearance -3.1 metres sampled
TR-1-C-1	-gossan material -7 cm wide siliceous material(vertical) within loose gossan. -1.6 metres sampled
TR-1-C-2	-gossan material -last 0.9 metres-siliceous volcanic rock very angular -linear fabric - fine grained -some alteration to clays -1.7 metres sampled -090°/ 90°
TR-1-D	-fine grained - very rusty volcanics -slight linear fabric -3.9 metres sampled
TR-1-E	-same as TR-1-D -granular appearance -2.5 metres sampled
TR-1-F	-rusty/dark green colour -siliceous -small dark quartz veins 1-4 cm thick -3.7 metres sampled

Sample number

Description

TR-1-G            -rusty colour with little green (chloritic) colour  
                  -box shaped vesicules - from oxidized pyrite (?)  
                  -some quartz 'eyes'  
                  -3.4 metres sampled

TR-1-H            -very siliceous  
                  -quartz veins 1 - 12 mm thick  
                  -3.4 metres sampled

TR-1-I            -same as TR-1-H  
                  -large 'lumps' of quartz (7cm dia.) in volcanic matrix - no quartz veins  
                  -3.2 metres sampled

TR-1-J            -same as TR-1-H and TR-1-I  
                  -slightly more chloritic  
                  -2.2 metres sampled

1.2 metres of covered section

TR-1-K            -very siliceous fine grained volcanics  
                  -some rust colour  
                  -2.2 metres sampled

end of section

APPENDIX B

ACME ANALYTICAL LABORATORIES LTD.

852 E. HASTINGS ST. VANCOUVER B.C. V6A 1R6

PHONE 253-3158

DATA LINE 251-1011

## ASSAY CERTIFICATE

.500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-3 HCL-HNO3-H2O AT 95 DEG. C FOR ONE HOUR AND IS DILUTED TO 10 ML WITH WATER.  
 THIS LEACH IS PARTIAL FOR MN, FE, CA, P, CR, MG, BA, TI, B, AL, NA, K, V, SI, ZR, CE, SM, Y, NB AND TA. AU DETECTION LIMIT BY ICP IS 3 PPM.  
 - SAMPLE TYPE: ROCK CHIPS AU: REGULAR ASSAY

DATE RECEIVED: MAY 11 1984

DATE REPORT MAILED:

*May 16/84*ASSAYER: *D. J. J.* DEAN TOYE, CERTIFIED B.C. ASSAYER

GEOTECH RES FILE # 84-0744

PAGE 1

SAMPLE#	MO	CU	PB	ZK	AG	NI	CO	MN	FE	AS	U	AU	TM	SR	CD	SB	BI	V	CA	P	LA	CR	MG	BA	TI	D	AL	NA	K	W	ACU
	PPM	PPM	PPM	PPM	PPM	PPM	PPM	PPM	%	PPM	PPM	PPM	PPM	PPM	PPM	PPM	PPM	PPM	%	%	PPM	PPM	%	PPM	%	PPM	%	%	%	PPM	OZ/T
TR-1-A	1	11	1	31	.1	38	18	464	3.61	2	2	ND	2	7	1	3	2	73	.20	.02	4	191	1.30	14	.10	5	1.86	.01	.02	2	.001
TR-1-B	3	3	4	58	.1	70	39	841	7.02	5	2	ND	2	11	2	7	1	163	.19	.03	2	322	2.44	19	.09	3	3.35	.01	.04	2	.001
TR-1-C1	1	15	74	15	.3	13	6	44	3.44	8	2	ND	2	2	1	2	2	45	.03	.03	8	76	.15	7	.01	4	.63	.01	.03	2	.001
TR-1-C2	1	9	12	8	.1	12	4	26	1.49	3	2	ND	2	2	1	2	2	.35	.02	.01	3	190	.30	11	.01	5	.83	.01	.04	2	.001
TR-1-D	3	10	10	74	.1	110	46	1007	8.96	2	4	ND	2	12	2	10	4	210	.17	.03	6	443	3.24	26	.02	2	4.83	.01	.01	2	.001
TR-1-E	2	4	2	81	.1	79	38	927	7.58	2	5	ND	2	18	2	10	2	205	.27	.03	2	372	3.24	15	.05	4	3.99	.01	.01	2	.001
TR-1-F	4	13	4	58	.1	58	53	814	9.26	3	3	ND	2	12	1	4	3	178	.20	.03	2	279	1.87	14	.12	4	2.62	.01	.01	2	.001
TR-1-G	2	15	20	60	.1	50	29	402	9.79	2	2	ND	2	8	1	5	1	173	.12	.03	2	260	1.78	23	.06	3	2.70	.01	.01	2	.001
TR-1-H	2	11	7	51	.1	46	48	405	6.54	2	2	ND	2	6	1	2	3	157	.07	.03	6	194	1.31	26	.01	4	2.35	.01	.01	2	.001
TR-1-I	1	12	6	34	.1	41	52	490	4.87	2	2	ND	2	4	1	2	2	148	.04	.03	9	182	.90	25	.01	5	2.19	.01	.01	2	.001
TR-1-J	1	6	7	29	.1	44	58	370	7.59	2	2	ND	2	3	1	2	2	128	.03	.04	7	150	.90	22	.01	3	2.64	.01	.01	2	.001
TR-1-K	1	5	6	12	.2	9	11	73	3.86	2	2	ND	9	1	1	2	2	10	.01	.05	6	17	.05	3	.01	5	.53	.01	.02	4	.001
STD A-1	1	30	39	187	.3	36	13	1053	2.80	9	2	ND	2	37	2	2	2	56	.62	.10	7	64	.63	255	.10	7	2.06	.01	.20	2	-



APPENDIX B-2



# CHEMEX LABS LTD.

• ANALYTICAL CHEMISTS

• GEOCHEMISTS

• REGISTERED ASSAYERS

212 BROOKSBANK AVE.  
NORTH VANCOUVER, B.C.  
CANADA V7J 2C1

TELEPHONE: (604) 984-0221  
TELEX: 043-52597

## CERTIFICATE OF ANALYSIS

TO : GEOTECH RESOURCES INC.  
319 - 470 GRANVILLE ST.  
VANCOUVER, B.C.  
V6Z 1K3

CERT. # : A9411884-001-A  
INVOICE # : 10-11884  
DATE : 21-MAY-84  
P.C. # : NONE

Sample description	Mo ppm (ICP)	K ppm (ICP)	Zn ppm (ICP)	P ppm (ICP)	Si ppm (ICP)	Cd ppm (ICP)	Co ppm (ICP)	Ni ppm (ICP)	Ba ppm (ICP)	Fe % (ICP)	Mn ppm (ICP)	Cr ppm (ICP)	Mg % (ICP)	V ppm (ICP)	Al % (ICP)	Be ppm (ICP)	Ca % (ICP)	Cu ppm (ICP)	Ag ppm AAS	Ti % (ICP)	Sr ppm (ICP)	Na % (ICP)	K % (ICP)	
TR-1-A	<1	<10	131	115	2	<2	<0.5	28	61	65	6.34	900	390	4.57	190	7.59	2.0	3.20	12	<0.2	0.321	81	2.66	0.64
TR-1-B	<1	<10	55	112	2	<2	<0.5	41	61	51	7.02	795	385	4.02	193	7.21	2.0	0.83	4	<0.2	0.282	44	1.82	0.52
TR-1-C-1	<1	<10	20	250	90	<2	<0.5	8	25	114	4.70	102	350	0.55	184	5.77	2.5	0.09	22	<0.2	0.231	8	0.48	2.45
TR-1-C-2	<1	<10	3	144	20	<2	<0.5	3	20	145	2.00	32	405	0.77	192	7.54	2.0	0.03	8	<0.2	0.308	5	1.29	3.01
TR-1-D	<1	<10	36	163	2	<2	<0.5	49	52	92	9.04	823	465	4.44	250	9.45	2.5	0.22	4	<0.2	0.259	33	1.89	0.77
TR-1-E	<1	<10	72	115	2	<2	<0.5	37	71	29	7.06	760	430	4.92	225	6.94	3.5	0.40	<1	<0.2	0.296	31	1.31	0.21
TR-1-F	<1	<10	57	98	2	<2	<0.5	53	60	34	8.48	810	345	3.41	215	6.59	4.0	0.97	5	<0.2	0.321	28	2.13	0.23
TR-1-G	<1	<10	47	67	12	3	<0.5	36	45	39	8.05	380	270	2.49	176	5.25	2.0	0.27	7	<0.2	0.172	15	1.25	0.20
TR-1-H	<1	<10	39	109	2	3	<0.5	45	41	44	5.91	330	205	1.68	164	5.23	2.0	0.10	5	<0.2	0.141	14	1.39	0.19
TR-1-I	<1	<10	26	140	2	<2	<0.5	51	38	41	4.88	410	280	1.02	170	5.73	1.5	0.06	8	<0.2	0.176	9	1.41	0.24
TR-1-J	<1	<10	15	170	2	<2	<0.5	48	40	46	6.29	260	155	1.22	170	5.75	1.5	0.04	<1	<0.2	0.205	3	0.58	0.58
TR-1-K	<1	<10	4	360	4	3	<0.5	10	9	50	4.27	91	31	0.19	31	3.84	1.0	0.01	1	<0.2	0.069	1	0.25	1.73

APPENDIX C

# ACME ANALYTICAL LABORATORIES LTD.

PHONE: 253-3158

852 East Hastings St., Vancouver, B.C. V6A 1R6

File: 84-0744

Date: May 16, 1984

Geotech Res.  
 319 - 470 Granville St.,  
 Vancouver, B.C.  
 V6C 1V5

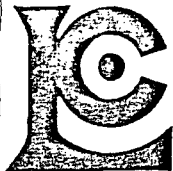
**TERMS:**  
 NET TWO WEEKS  
 2% PER MONTH CHARGED ON  
 OVERDUE ACCOUNTS.

NUMBER	ASSAY	PRICE	AMOUNT
12	ICP Analysis @	\$6.00	\$ 72.00
12	Au assays @	6.75	81.00
12	Rock sample preparations @	2.75	33.00
			\$186.00

*Paid by cheque #208*  
*May 17/84*

PLEASE PAY LAST AMOUNT

APPENDIX D



# CHEMEX LABS LTD.

212 BROOKSBANK AVE  
NORTH VANCOUVER B.C.  
CANADA V7J 2C1  
TELEPHONE: (604) 984-0221  
TELEX: 043-52597

• ANALYTICAL CHEMISTS

• GEOCHEMISTS

• REGISTERED ASSAYERS

\*\*\* INVOICE \*\*\*

To : GEOTECH RESOURCES INC.

Invoice # : 18411883

319 - 470 GRANVILLE ST.  
VANCOUVER, B.C.  
V6Z 1K3

Date : 30-MAY-84  
P.O. # : NONE  
Project

Invoice for analytical work reported on certificate(s) A#411883-001

Quantity	code	description	unit	price	amount
12	487	- Au AR	oz/T	7.50	90.00

Sample preparation and other charges :

12	207	- Assay - PULVERIZE		3.75	45.00
----	-----	---------------------	--	------	-------

TOTAL \$ 135.00

Please pay this amount ----> \$ 135.00

TERMS -- NET 30 DAYS

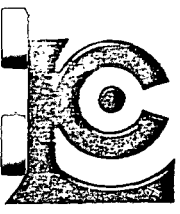
1.5 % per month (18 % per annum) charged on overdue accounts

Well 3+H.

pd June 1/84 chg # 214



MEMBER  
CANADIAN TESTING  
ASSOCIATION



# CHEMEX LABS LTD.

212 BROOKSBANK AVE  
NORTH VANCOUVER, B.C.  
CANADA V7J 2C1  
TELEPHONE: (604) 984-0221  
TELEX: 043-52597

• ANALYTICAL CHEMISTS • GEOCHEMISTS • REGISTERED ASSAYERS

\*\*\* INVOICE \*\*\*

To : GEOTECH RESOURCES INC.  
319 - 470 GRANVILLE ST.  
VANCOUVER, B.C.  
V6Z 1K3

Invoice # : 18411884  
Date : 31-MAY-84  
P.O. # : NONE  
Project

Invoice for analytical work reported on certificate(s) A8411884-001

Quantity	Analysed for code	description	unit price	amount
12	554 - Mo	ppm (ICP)		
	556 - W	ppm (ICP)		
	558 - Zn	ppm (ICP)		
	559 - P	ppm (ICP)		
	560 - Pb	ppm (ICP)		
	561 - Bi	ppm (ICP)		
	562 - Cd	ppm (ICP)		
	563 - Co	ppm (ICP)		
	564 - Ni	ppm (ICP)		
	565 - Ba	ppm (ICP)		
	566 - Fe	% (ICP)		
	568 - Mn	ppm (ICP)		
	569 - Cr	ppm (ICP)		
	570 - Mg	% (ICP)		
	572 - V	ppm (ICP)		
	573 - Al	% (ICP)		
	575 - Be	ppm (ICP)		
	576 - Ca	% (ICP)		
	577 - Cu	ppm (ICP)		
	578 - Ag	ppm AAS		
	579 - Ti	% (ICP)		
	582 - Sr	ppm (ICP)		
	583 - Na	% (ICP)		
	584 - K	% (ICP)	6.00	72.00

Well 3+4

Sample preparation and other charges :

12	214 - Bag pulp		0.00	0.00
12	232 - Total ICP digestion		7.00	84.00

TOTAL \$ 156.00

Please pay this amount ---> \$ 156.00  
=====

TERMS -- NET 30 DAYS  
5 % per month (18 % per annum) charged on overdue accounts



per June 1984 chg #218