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GEOCHEMICAL, ROCK SAMPLING & TRENCHING REPORT

ON THE  
WHITEDOME MINERAL CLAIMS

ALBERNI MINING DIVISION

N.T.S. 92L/2W

Latitude 50° 07'N

Longitude 126° 54'W

Esperanza Explorations Ltd.  
(Owner and Operator)

Period of Work May 10-22, 1980

Report by J. D. Guild, P.Eng.,

November, 1980.

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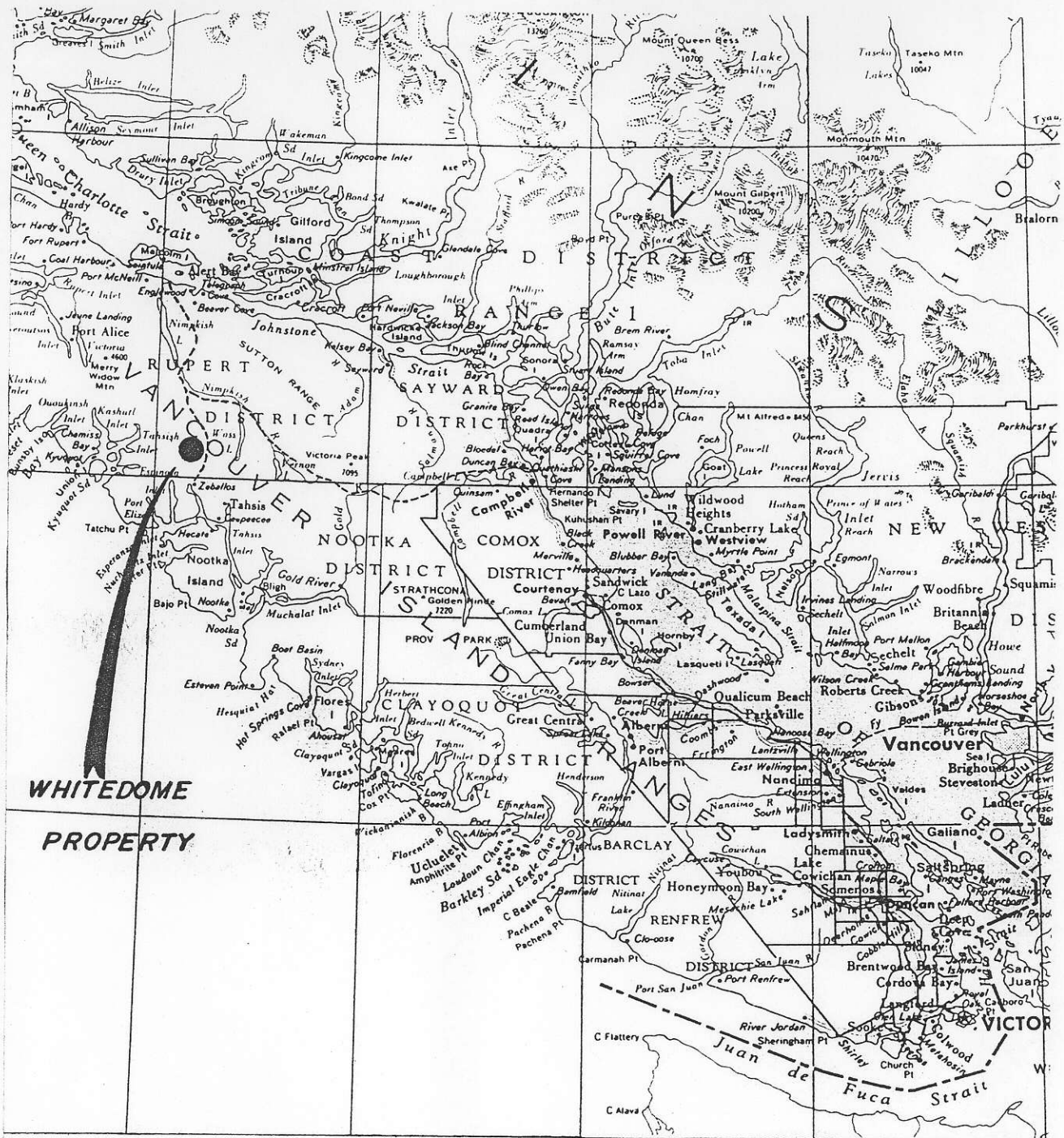
## INTRODUCTION

The WHITEDOME Property is located sixteen kilometres to the north of Zeballos on Vancouver Island near the headwaters of the Artlish river (N.T.S. 92L/2W) (Figure 1). Access to the claims is by way of an all-weather gravel road leading some 26 kilometres from that town.

The property consists of one claim, the WHITEDOME which is made up of 20 units. The current owner of the claim is Esperanza Explorations Ltd. of Vancouver, British Columbia. Certain parts of the claim have been previously held and have received exploration attention in the past.

The programs carried out by Esperanza Explorations Ltd. consisted of silt sampling, prospecting and chip sampling of outcrop in 1979 and soil sampling, rock trenching and chip sampling in 1980. The program successfully outlined significant concentrations of gold mineralization on which an on-going program of exploration is recommended.

While this report details the results of both the 1979 and the 1980 programs on the property, application is made for assessment credit on only the 1980 work.



**WHITEDOME  
PROPERTY**

127°                      126°                      125°                      124°                      12

<b>ESPERANZA EXPLORATIONS LTD.</b>		
<b>WHITEDOME PROPERTY</b>		
<b>INDEX MAP</b>		
Scale: 1:2,000,000	Date: Dec. 1980	N.T.S.
Revised:	By:	Fig. 1

LOCATION AND ACCESS

The WHITEDOME mineral claim is located at the headwaters of the Artlish river, north of Zeballos on Vancouver Island, British Columbia, in the Alberni Mining Division. The location is more precisely defined by the co-ordinates 126° 54' W and 50° 07' N within N.T.S. Map Sheet "Woss Lake", 92L/2W (Figure 1).

The property covers the westerly and north-westerly flowing tributaries of the Artlish river. Elevations on the claim range from 400 metres to 1160 metres. The area is densely wooded with outcrop being restricted to creek cuts and isolated step-cliff faces.

Access to the WHITEDOME property can be gained by helicopter from Zeballos which lies 16 kilometres to the south of the claim. A system of all-weather gravel roads leading from Zeballos forms a 26 kilometre ground access route to the property.

PROPERTY DEFINITION

The property is made up of the following claim:

<u>Claim Name</u>	<u>Grant Number</u>	<u>Number of Units</u>	<u>Recording Date</u>
WHITEDOME	530	20	August 29, 1979

The owner and operator of the claim is Esperanza Explorations Ltd.  
1027 - 470 Granville Street, Vancouver, B.C.

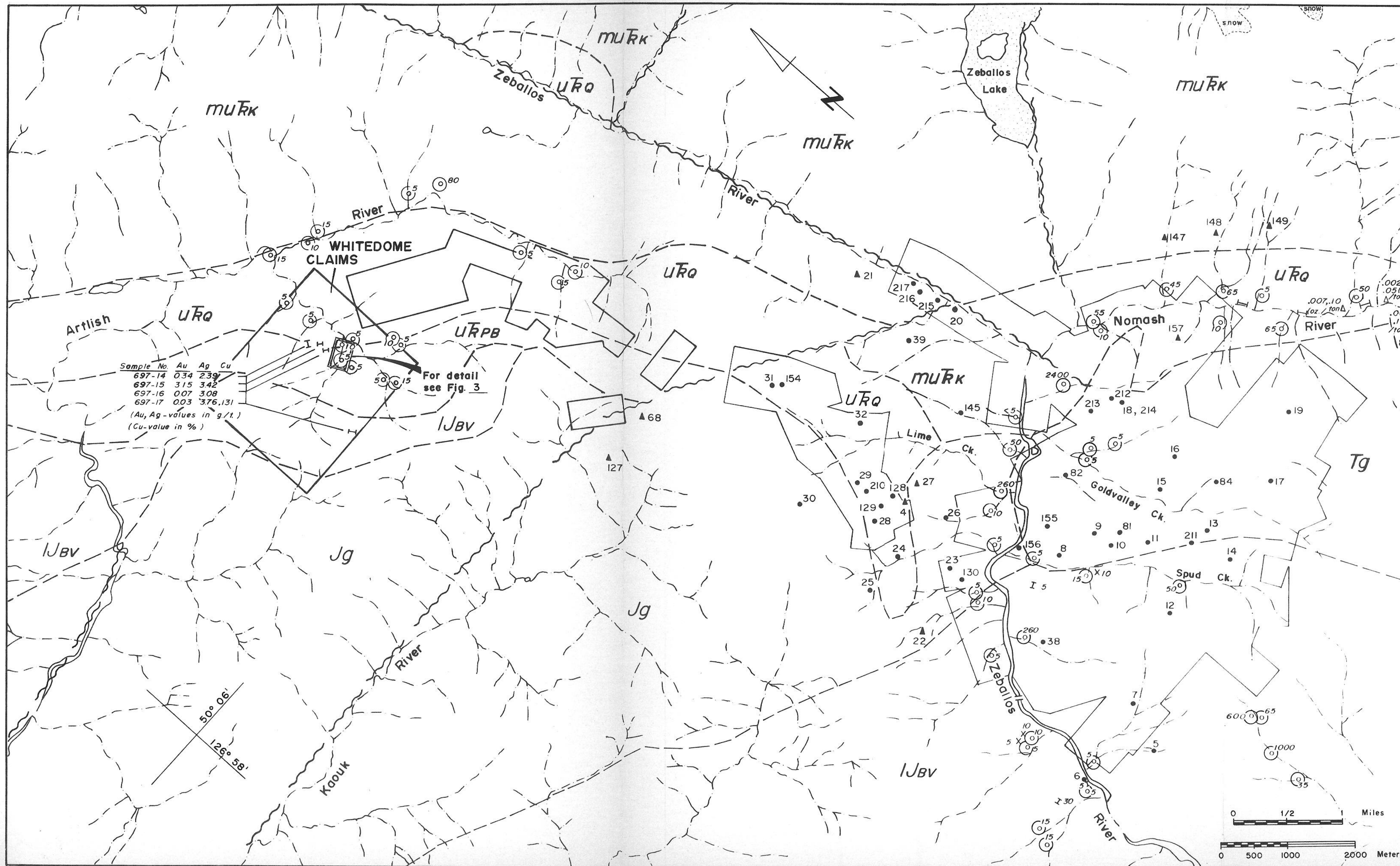
### PREVIOUS WORK

There is no history of previous work known to the author on the WHITEDOME Property although old claim posts found in the area indicate that the ground was at least partially staked in the past. The nearest mineral deposits according to the B.C. Department of Mines Mineral Inventory consists of two skarn type magnetite occurrences (Nos.92L 68 and 127) some five kilometres along general strike to the southeast of the WHITEDOME. These occur at the Quatsino-Bonanza contact in geology broadly equivalent to that which underlies the WHITEDOME Property.

The Scrutor Gold (No.92L-100) occurs eight kilometres to the northwest, again in a similar geologic environment. This deposit consists of narrow shear zones containing pyrite, chalcopryite, pyrrhotite and sphalerite reportedly carrying values in gold.

### PROPERTY GEOLOGY

Very little is presently known of the geology of the WHITEDOME Property. Geological Survey of Canada paper 74-8 by J. E. Muller indicates that the property is underlain by a broad easterly striking sequence of interbedded sediments and volcanics which lie on the northern fringe of a large mass of Island Intrusives which in this area is predominantly composed of quartz diorite. The northern edge of this Jurassic age intrusive cuts through the southerly section of the property and extends for many kilometres to the south and east of the claims (Figure 2).



**GEOLOGICAL LEGEND**

- TERTIARY**  
**EOCENE**  
Tg Quartz diorite
- JURASSIC**  
Jg ISLAND INTRUSIONS: quartz diorite, granodiorite, quartz monzonite, quartz feldspar porphyry
- TRIASSIC AND JURASSIC**  
**VANCOUVER GROUP**  
**LOWER TRIASSIC**  
IJBV BONANZA VOLCANICS: andesitic to rhyodacitic lava, tuff, breccia
- UPPER TRIASSIC**  
URPB PARSON BAY FORMATION: calcareous siltstone, shale, limestone, greywacke, conglomerate, breccia
- URQ QUATSINO FORMATION: limestone
- MURK KARMUTSEN FORMATION: basaltic lava, pillow lava, breccia, aquagene tuff

NOTE: Geology by J.E. Muller, G.S.C. paper 74-8

**GENERAL LEGEND**

- Geological contact
- ~ Fault
- - - Creek
- ▲ Mineral Occurrence (approximate location)
- Mineral Occurrence
- x<sup>10</sup> Soil sample (Au in p.p.b.)
- <sup>15</sup> Silt sample (Au in p.p.b.)
- △<sup>100</sup> Rock grab sample (Au, Ag in grams/tonne)
- ⊢ Rock chip sample (Au in p.p.b. unless otherwise noted)
- ⌊ Existing Mineral and Crown Granted claims

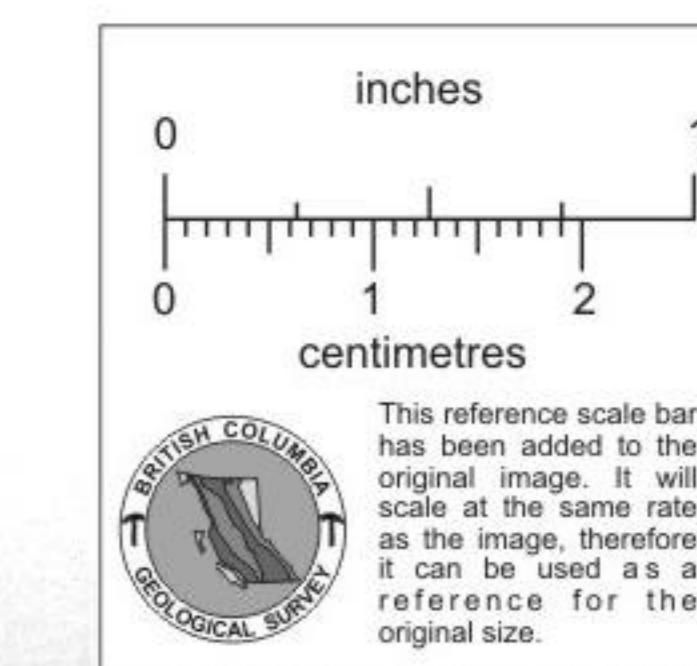
NOTE: Mineral occurrences from B.C. Dept. of Mines and Pet. Res. Revised Mineral Inventory Map 92L

**ESPERANZA EXPLORATIONS LTD.**

**WHITEDOME CLAIMS**

**REGIONAL GEOLOGY AND SAMPLE RESULTS**

Scale: 1:50,000 Date: Feb. 1980 N.T.S. 92L/2  
Revised: DEC. 1980 By: J.GUILD/d.h. Fig. 2



The Bonanza Volcanics of Lower Triassic age consisting mainly of lavas and tuffs lies immediately to the north of the intrusive. This is underlain by Upper Triassic Parsons Bay Formation which is made up of calcareous siltstone, shale, limestone, greywacke and conglomerate. The northern section of the claim is underlain by Quatsino Formation limestone.

The known mineralization on the WHITEDOME Property occurs within interbedded siliceous and calcareous siltstones thought to be a part of Parsons Bay Formation. The contact between the Parsons Bay and the underlying Quatsino Formation is locally gradational with the WHITEDOME mineralization apparently occurring in the transition zone between the two formations.

#### GEOCHEMICAL PROGRAM

Reconnaissance silt samples were collected over a large area, initially extending some 16 kilometres to the east of the WHITEDOME Property. Silt accumulations were noted in general to be well developed and samples were collected in a standard manner in craft paper bags at approximately one-half kilometre intervals along various drainages. The silt sampling, particularly that done in 1979 aided in isolating the concentrations of gold which were the subject of more detailed work in 1980. These reconnaissance samples were analyzed and are illustrated on Figure 2. The cost of this sampling has not been applied in the present application for assessment credit.

In 1980, in addition to further silt sampling, a geochemical soil survey was carried out in a grid extending to the north of known gold occurrences. Samples were collected along lines 30 metres apart and spaced at 15 metres along the lines. Wherever possible the 'B' soil horizon was collected at an average depth of 0.3 metres. A total of 39 samples were collected and analyzed for gold and arsenic. The results of this survey are plotted on figure 3.

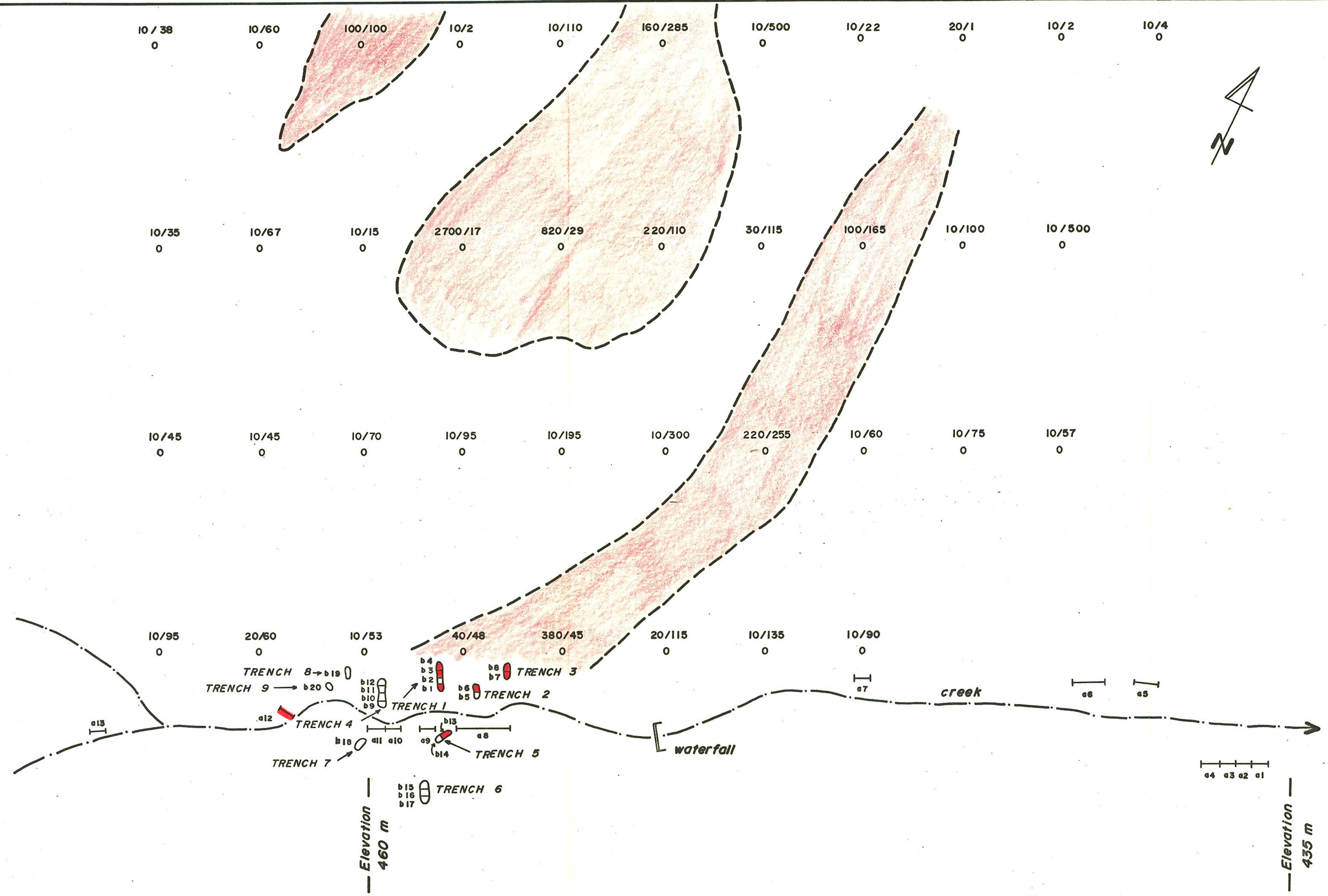


A total of 39 samples were collected and analyzed for gold and arsenic. The results of this survey are plotted on Figure 3.

Samples were sent for analysis to Chemex Labs Ltd. 212 Brooksbank Avenue, North Vancouver, B.C. where they were sieved and ground to - 80 mesh. Assay was by aqua regia digestion with A.A. analysis for gold with spectrophotometric for arsenic.

The soil sample results are listed below:

<u>Sample No.</u>	<u>PPB</u> <u>Au</u>	<u>PPM</u> <u>As</u>	<u>Sample No.</u>	<u>PPB</u> <u>Au</u>	<u>PPM</u> <u>As</u>
ESP 80-10	10	90	ESP 80-36	10	67
11	10	135	37	10	35
12	20	115	38	10	38
13	380	45	39	10	60
14	40	48	ESP-80-40	100	100
15	10	53	41	10	2
16	10	60	42	10	110
17	10	95	43	160	285
18	10	45	44	10	500
19	10	45	45	10	22
ESP 80-20	10	70	46	20	1
21	10	95	47	10	2
22	10	195	48	10	4
23	10	300			
24	220	255			
25	10	60			
26	10	75			
27	10	57			
28	10	500			
29	10	100			
ESP 80-30	100	165			
31	30	114			
32	220	110			
33	820	29			
34	2700	17			
35	10	15			



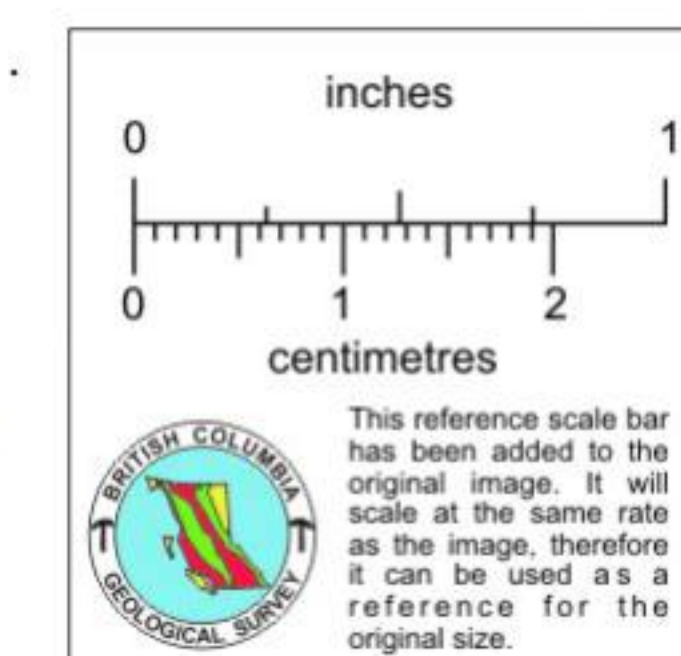
CHIP SAMPLE RESULTS

Sample Designation	Sample No.	Width (Metres)	Au Oz/Ton (g/t)	Ag Oz/Ton (g/t)	Cu %
a 1	697-1	2.5	.023 (.79)	.10 (3.42)	.261
a 2	69-2	2.5	.02 (.68)	.09 (3.08)	.294
a 3	697-3	2.5	.001 (.03)	.07 (2.39)	-
a 4	697-4	2.5	.001 (.03)	.06 (2.05)	-
a 5	697-5	4.0	.001 (.03)	.03 (1.03)	-
a 6	697-7	5.0	.001 (.03)	.03 (1.03)	-
a 7	697-6	2.5	.002 (.07)	.03 (1.03)	-
a 8	697-8	8.0	.004 (.14)	.09 (3.08)	.139
a 9	697-9	2.5	.003 (.10)	.09 (3.08)	.064
a 10	697-10	2.5	.002 (.07)	.08 (2.74)	.032
a 11	697-11	2.5	.002 (.07)	.08 (2.74)	-
a 12	697-12	3.0	<u>.148</u> (5.06)	.09 (3.08)	-
a 13	697-13	2.5	.007 (.24)	.09 (3.08)	-
b 1	15786	1.0	<u>.226</u> (7.73)	-	-
b 2	15787	1.0	<u>.088</u> (3.01)	-	-
b 3	15788	0.7	<u>.154</u> (5.27)	-	-
b 4	15789	1.4	<u>.128</u> (4.38)	-	-
b 5	15790	1.0	<u>.052</u> (1.78)	-	-
b 6	15791	1.0	<u>.196</u> (6.71)	-	-
b 7	15799	1.0	<u>.114</u> (3.90)	-	-
b 8	15800	1.0	<u>.606</u> (20.73)	-	-
b 9	15792	1.0	.020 (.68)	-	-
b 10	15793	1.0	.022 (.75)	-	-
b 11	15794	1.0	.018 (.62)	-	-
b 12	15795	1.3	.012 (.41)	-	-
b 13	15796	1.0	<u>.298</u> (10.19)	-	-
b 14	15797	0.8	<u>.046</u> (1.57)	-	-
b 15	7940	1.3	.064 (2.19)	-	-
b 16	7944	0.7	.04 (1.37)	-	-
b 17	7945	1.0	.005 (.17)	-	-
b 18	15798	1.4	.010 (.34)	-	-
b 19	7938	1.5	.005 (.17)	-	-
b 20	7939	1.1	.005 (.17)	-	-

LEGEND

- CREEK
- WATERFALL
- SOIL SAMPLE Au p.p.b. / As p.p.m.
- AREAS OF ANOMALOUS SOIL GEOCHEMISTRY
- CHIP SAMPLE LOCATION - 1979 (FROM NATURAL OUTCROP)
- ROCK TRENCH - CHIP SAMPLE 1980

NOTE: FOR LOCATION SEE FIG. 2



ESPERANZA EXPLORATIONS LTD.  
 WHITEDOME CLAIMS  
 GEOCHEMICAL, CHIP SAMPLE AND TRENCHING RESULTS

Scale: 1: 500 Date: Aug. 1980 NTS. 92L/72  
 Revised: By: J. GUILD Fig. 3

TRENCHING AND ROCK SAMPLING PROGRAM

Largely as the result of prospecting but confirmed by regional geochemical sampling, the discovery of the mineralization "in place" was made in 1979. Surface exposures along the discovery creek were chip sampled in the same year. Seventeen samples were cut and assayed at that time.

The 1980 program involved more systematic chip sampling. In order to carry out this sampling, trenches through the overburden were drilled and blasted to obtain fresh exposures. Nine trenches one metre in width and extending approximately one half metre in depth were excavated. A total accumulative length of 21.2 metres was trenched and sampled. Samples were continuous-line chips obtained by hammer and moil.

The trench locations and sample results are illustrated on Figure 3 and the assay results for both 1979 and 1980 are tabulated in a following table.

CHIP SAMPLE RESULTS

<u>Sample Designation</u>	<u>Sample No.</u>	<u>Width (Metres)</u>	<u>Au</u>		<u>Ag</u>		<u>Cu %</u>
			<u>Oz/Ton</u>	<u>(g/t)</u>	<u>Oz/Ton</u>	<u>(g/t)</u>	
a 1	697-1	2.5	.023	(.79)	.10	(3.42)	.261
a 2	697-2	2.5	.02	(.68)	.09	(3.08)	.294
a 3	697-3	2.5	.001	(.03)	.07	(2.39)	-
a 4	697-4	2.5	.001	(.03)	.06	(2.05)	-
a 5	697-5	4.0	.001	(.03)	.03	(1.03)	-
a 6	697-7	5.0	.001	(.03)	.03	(1.03)	-
a 7	697-6	2.5	.002	(.07)	.03	(1.03)	-
a 8	697-8	8.0	.004	(.14)	.09	(3.08)	.139
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a 10	697-10	2.5	.002	(.07)	.08	(2.74)	.032
a 11	697-11	2.5	.002	(.07)	.08	(2.74)	
a 12	697-12	3.0	.148	(5.06)	.09	(3.08)	
a 13	697-13	2.5	.007	(.24)	.09	(3.08)	
b 1	15786	1.0	.226	(7.73)	-	-	
b 2	15787	1.0	.088	(3.01)	-	-	
b 3	15788	0.7	.154	(5.27)	-	-	
b 4	15789	1.4	.128	(4.38)	-	-	
b 5	15790	1.0	.052	(1.78)	-	-	
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b 7	15799	1.0	.114	(3.90)	-	-	
b 8	15800	1.0	.606	(20.73)	-	-	
b 9	15792	1.0	.020	(.68)	-	-	
b 10	15793	1.0	.022	(.75)	-	-	
b 11	15794	1.0	.018	(.62)	-	-	
b 12	15795	1.3	.012	(.41)	-	-	
b 13	15796	1.0	.298	(10.19)	-	-	
b 14	15797	0.8	.046	(1.57)	-	-	
b 15	7940	1.3	.064	(2.19)	-	-	
b 16	7944	0.7	.04	(1.37)	-	-	
b 17	7945	1.0	.005	(.17)	-	-	
b 18	15798	1.4	.010	(.34)	-	-	
b 19	7938	1.5	.005	(.17)	-	-	
b 20	7939	1.1	.005	(.17)	-	-	

### RESULTS OF EXPLORATION

All work to date on the WHITEDOME Property has been carried out on behalf of Esperanza Explorations Ltd. by David Heino of Box 1524 Hope, B.C., a respected prospector of eight years professional experience.

The known mineralization on the claims is contained in rusty pyritic beds within a siliceous siltstone. These rocks are intercalated with calcareous beds which locally swell into actinolitic zones containing pyrite, pyrrhotite and magnetite with some associated arsenopyrite. Although the genesis of the gold deposition can at this stage be only surmised, hand specimens and showing descriptions suggest a possible syngenetic origin for the mineralization.

Significant gold values in chip samples have been obtained over a distance of approximately 170 metres along the discovery creek. This creek is believed to run at an oblique angle to the strike of the zone which appears to have a true thickness of more concentrated gold mineralization some 30 metres wide. There is insufficient exposure or sampling to determine the overall grade of the zone. The highest gold assay obtained was 20.73 grams per tonne over a one metre sample length. Sampling to date does, however, suggest that a zone of considerable size potential may contain overall gold values in the target range of 2.0 to 5.0 grams per tonne.

The limited geochemical soil survey carried out in 1980 appears to substantiate the validity of soil sampling as an indicator of mineralization. Survey results indicate a probably strike extension of the known gold zone for approximately 100 metres to the north and also suggests the existence of possible additional zones. Arsenic in the soils does not appear to serve as a useful trace element indicator.

CONCLUSIONS AND RECOMMENDATIONS

The geochemical, trenching and chip sampling programs on the WHITEDOME Property have indicated a zone of gold mineralization with significant size potential at a suggested grade of possible economic interest under present gold price ranges.

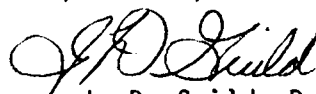
Work to date has been of a preliminary nature but has clearly justified the execution of a more advanced exploration program.

To this end the following program is recommended for the WHITEDOME Property:

1. Geological mapping should be carried out both on a property scale and in detail in the area of indicated mineral zones.
2. Geochemical soil surveys should be conducted throughout the property with closer spaced sampling in the areas along projected extensions of the known zones.
3. Test magnetometer and electromagnetic surveys should be carried out over the indicated zone and expanded to other areas if results warrant.
4. Systematic trenching normal to the strike of the known mineralization should be conducted in areas of known gold concentration and extended into areas of geochemical highs. Trenches should be chip sampled at one metre intervals.

Results of the above program should be evaluated prior to embarking on a phase II diamond drill program.

Respectfully submitted,



J. D. Guild, P.Eng.

APPENDIX I

ITEMIZED COST STATEMENT - WHITEDOME MINERAL CLAIMS

Period May 10 - 22, 1980

David Heino - May 10-22, 1980, thirteen days @ \$118.12/day 1535.56  
(prospecting, trenching & sampling)

\$

Assays

20 rock assays for gold @ \$9.00 ea.	- 180.00	
39 soil geochems-gold arsenic @ \$7.25 ea.	- <u>282.75</u>	462.75
Accommodation May 10-22, 1980 thirteen days @ \$32.50		422.50
Truck Rental May 10-22, 1980 thirteen days @ \$25.00 day		325.00
Field equipment - drill rental, powder, flagging etc.		<u>96.29</u>
	Total cost:	<u><u>\$2842.10</u></u>

APPENDIX II

CERTIFICATE

I, JOHN D. GUILD do hereby certify that:

1. I am a practicing geologist employed by Welcome North Mines Ltd.
2. I am a graduate of the University of Alberta, B.Sc., (Geology).
3. I am a member in good standing of the Association of Professional Engineers of the Province of British Columbia.
4. I have practiced my profession since 1959 primarily in Western North America but also in Eastern Canada, Australia and Mexico.
5. Part of my duties with Welcome North Mines consist of supervising the field activities of employees of Esperanza Explorations Ltd.