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GEOLOGICAL, GEOCHEMICAL AND GEOPHYSICAL

REPORT ON THE

CVS COPPER PROSPECT

KAMLOOPS MINING DIVISION, B.C.

SUB-RECORDER RECEIVED

N.T.S. 92 I/7W

JUN 1 5 1992

ASSESSMENT REPORT

22,373

CLAIMS WORKED									
CLAIM NAMES	UNITS	RECORD NUMBERS	ANNIVERSARIES						
CVS-1 - 6	120	219885-219890	MAY 10,11,12						
CVS-7 - 8	40	308682-308683	APRIL 18,19						
CS 7 - 8	2	308684-308685	APRIL 19						
LOCATION:		North Latitude West Longitude							
OWNER:		alley Syndicate							
OPERATOR:		esources Ltd.							
CONTRACTOR:	Archean 1	Engineering Ltd.							
CONTRACTOR:	P.E. Wald	cott & Associates L	td.						

GEOLOGICAL, GEOCHEMICAL AND GEOPHYSICAL REPORT ON THE CVS COPPER PROSPECT KAMLOOPS MINING DIVISION, B.C.

SUMMARY:

The CVS copper prospect is located in south central British Columbia, on the southeast side of the Guichon batholith, seven kilometers south of the Highmont Copper Mine. The property, comprised of eight 20 unit mineral claims and two, two post mineral claims, was staked to cover a strong copper anomaly discovered by regional geochemical sampling.

In May and August 1991, and April and May 1992, the writer supervised exploration work entailing stream sediment sampling, soil sampling, induced polarization and reconnaissance mapping surveys over the property.

Geochemical sampling involved taking a total of 61 stream sediment samples, 45 soil samples, and two rock chip samples from widely spaced sites on the property. Copper content of the stream sediment samples was highly anomalous, up to 1,000 ppm. Soil contained generally less than 70 ppm copper but concentrations exceeding 100 ppm were obtained in the vicinity of known and suspected mineralization. Two rock chip samples from malachite stained showings on the CVS-1 and CVS-5 claims assayed >1.0% and 0.48% copper respectively.

The claim block straddles a 300 gamma airborne magnetic gradient that passes through the Valley Copper, Lornex, and Highmont ore bodies. The present mapping program suggests that this gradient marks a geologic contact that may be important to copper mineralization in the Highland Valley camp. Previous exploration discovered six widely spaced copper showings on the CVS property in the vicinity of this feature. The mineralization is comprised of malachite with chalcocite, bornite and minor chalcopyrite.

Induced polarization results show a 1,400m long by 500m wide chargeability anomaly situated approximately 1,000 metres southeast of Chataway Lake. The anomaly is best developed on the third and fourth n spacing, (a=75m) introducing the possibility that surface oxidation may have destroyed sulfide mineralization to a depth of 100 metres or more on this property.

The results of this work program are encouraging and suggest that the CVS claims may have potential for hosting bulk tonnage porphyry copper mineralization. Additional exploration is recommended.

GEOLOGICAL, GEOCHEMICAL AND GEOPHYSICAL REPORT ON THE CVS COPPER PROSPECT KAMLOOPS MINING DIVISION, B.C.

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GEOLOGICAL, GEOCHEMICAL AND GEOPHYSICAL REPORT ON THE CVS COPPER PROSPECT KAMLOOPS MINING DIVISION, B.C.

1.0 INTRODUCTION:

In May 1991, Archean Engineering was contracted to explore the CVS copper property in south central British Columbia. The program involved carrying out stream sediment sampling, soil sampling, induced polarization and reconnaissance mapping surveys over the property.

Field work was carried out in May and August 1991 and in April and May 1992.

1.1 LOCATION AND ACCESS:

The CVS copper prospect is located in south central British Columbia on the southeast side of the Guichon batholith, seven kilometers south of the Highmont Copper Mine. The centre of the property is definded by latitude 50°21'N and longitude 120°55'W.

The claims are located 25 kilometers north of the community of Merritt. Good access to the centre of the property is provided by the Pimanus-Tyner fire access road which intersects Highway 8 approximately nine kilometers west of Merritt. A network of logging haul roads provide additional access to most parts of the property.

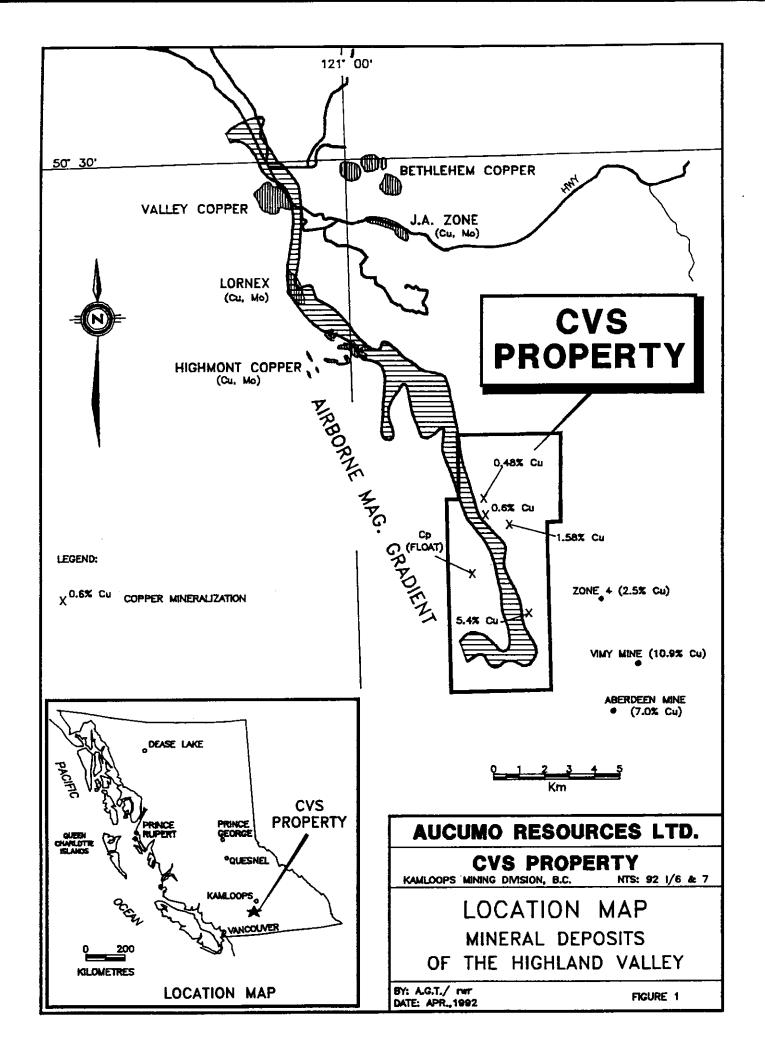
1.2 PHYSIOGRAPHY, VEGETATION AND CLIMATE:

The property is located in a plateau like area in the Interior Plateau physiographic region of British Columbia. Relief over most of the property is very gentle with elevations ranging from 1,280 metres to 1,500 metres. The southeastern corner of the claims extend over the Broom Creek canyon where topography is moderately rugged with slopes up to 30° along the 125 metre high canyon walls.

An extensive 30 metre thick blanket of glacial ground moraine covers most of the property. Rock exposures account for less than 1% of the property and are confined to creek beds, abandoned meltwater channels and the flanks and crests of hills.

Timber is predominantly lodgepole pine which is well spaced allowing easy movement through the forest. Scattered patches of aspen and birch occur on south and west facing slopes, and spruce, fir and mountain alder grow in damp areas along streams and swamps. The entire property is very rapidly being logged and the extensive clear-cut areas and accompanying haul-road networks provide excellent access to most of the claims.

The climate is typical of the southern interior, with warm, dry summers and moderately long cold winters. Temperatures range from in excess of 30°C in August to minus 30°C in January. The average annual precipitation is 31 cm with most of this falling as snow in late fall, winter and early spring. The snow-free period lasts from late April to mid-November, but due to the light snowfall geophysics and drilling can be carried out throughout the winter.



1.3 PROPERTY INFORMATION:

CLAIM

CVS-1

CVS-2

CVS-3

CVS-4 CVS-5

CVS-6

CVS-7

CVS-8

CS 7

CS 8

UNITS

20

20

20 20

20

20

20

20

1

1

The property is located in the Kamloops Mining Division and is comprised of eight 20 unit mineral claims and two, two post claims. The claims were staked in 1991 and 1992. Pertinent claim information is given in Table 1.

308683

308684

308685

TABLE 1	
LIST OF CLAIMS	
RECORD NUMBER	EXPIRY DATE
219885	May 10, 1994
219886	May 11, 1994
219887	May 11, 1994
219888	May 11, 1994
219889	May 12, 1994
219890	May 12, 1994
308682	April 18, 1994

April 19, 1994

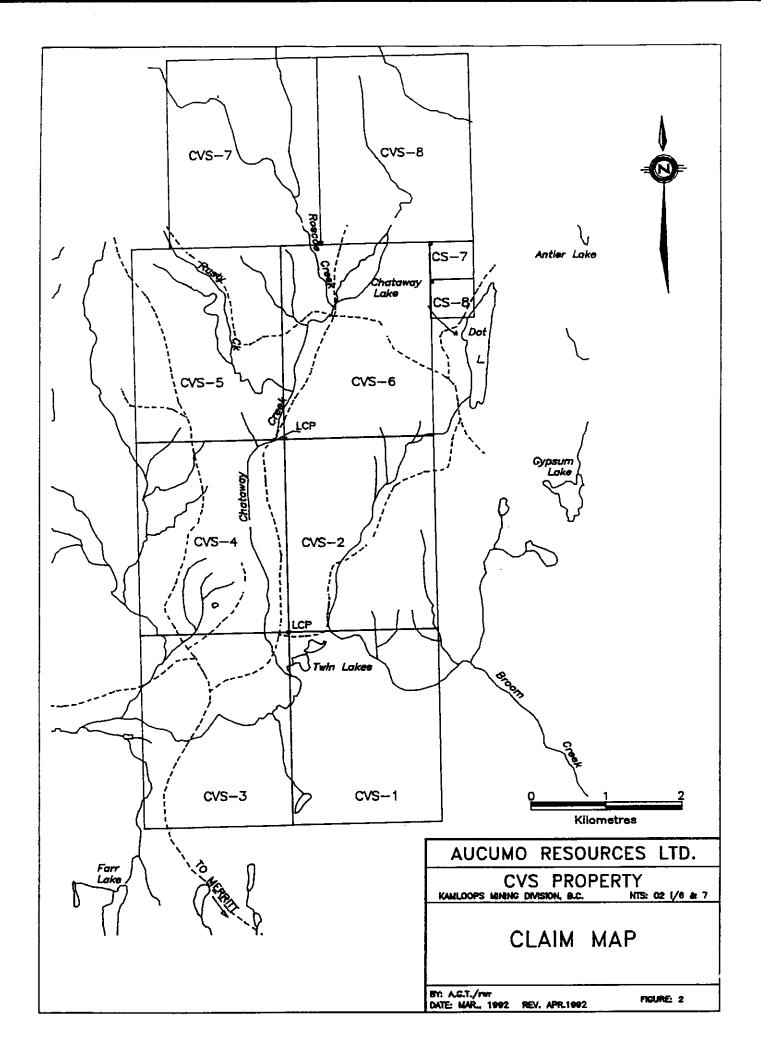
April 19, 1994

April 19, 1994

1.4 HISTORY:

The CVS copper prospect is situated in the Highland Valley porphyry copper camp approximately 65 kilometers southwest of Kamloops and 35 kilometers north of Merritt. Exploration for copper mineralization commenced in 1887 when chalcocite ore grading 7.0% Cu was discovered at the Aberdeen Mine four kilometers southeast of the present property. The nearby Vimy Mine was discovered in 1920 and small high grade shipments were made until 1927. In 1957 economic porphyry mineralization was discovered at the Bethleham Copper Mine located 15 kilometers to the northwest. Since then five world class deposits containing nearly two billion tonnes of ore grading 0.45% copper equivalent have been discovered in the These include three past producers: Bethleham, Lornex, and Highmont with combined production of 600 million tonnes; the J.A. Zone with reserves of 250 million tonnes; and Valley Copper, Canada's largest copper producer currently being mined at 125,000 tonnes per day, with reserves of 775 million tonnes.

The area of the present property was staked by the Chataway Mining Syndicate in 1956 and the property was maintained and worked until the late 1970's. Work by Chataway successfully located five copper showings but exploration was hampered by an extensive blanket of glacial till. Since 1980 the area has been staked intermittently by a number of individuals. In 1991-1992 the present CVS claims were staked by the Copper Valley Syndicate.



1.5 WORK DONE BY ARCHEAN ENGINEERING LTD.:

The following field work was completed by Archean Engineering Ltd. during the period from May 13, 1991 to May 2, 1992:

- (a) Stream sediment sampling was carried out over the entire property.
- (b) Reconnaissance soil sampling was carried out over the Moss 4 and Chataway showings and along I.P. line 0+00N.
- (c) Reconnaissance I.P. lines were flagged along the east side of Twin Lakes and over the Chataway showing.
- (d) Prospecting and reconnaissance geologic mapping was carried out over the entire property.
- (e) Five previously reported showings: the Show 11, Moss 4, Sky 7, Chataway Lake zone and Roscoe Creek showings were located and examined. Rock Chip samples were taken over three of the showings.
- (f) The border of the adjacent Roscoe claim of Highmont Mines Ltd. was located on the ground and tied in to the boundary of the CVS property.
- (g) An Induced Polarization grid run by Chataway Explorations Ltd in 1978 was located and surveyed in relative to the borders of claims CVS 5 & 7.
- (h) An Induced Polarization grid run by Canadian Superior Explorations Ltd. in 1972 was located and surveyed in relative to the borders of claims CVS 6 & 8

2.0 REGIONAL GEOLOGY:

The CVS property is underlain by rocks of the Upper Triassic Guichon Creek batholith. The batholith is elliptical in plan measuring 60 km north-south by 25 km east-west. It intrudes sedimentary and volcanic rocks belonging to the Permian Cache Creek Formation and the overlying Upper Triassic Nicola Formation. Sediments of the Jurassic Ashcroft Formation unconformably overlie the intrusive rocks at a number of locations and to the north are covered by volcanic flows and tuffs of the Eocene Kamloops Group.

The Guichon batholith consists of a number of concentric phases which in a general way decrease in grain size and increase in mafic content from the central core to the outer margin. The principal phases of the batholith from youngest to oldest are: the Bethsaida Phase quartz monzonite-granodiorite, the Bethleham Phase granodiorite, the Highland Valley Phase granodiorite, and the Border Phase quartz diorite-granodiorite. The principal Cu-Mo deposits are situated within and along the margins of the younger Bethsaida or Bethleham Phase rocks. The geology of the Guichon Batholith was mapped by Northcote, 1969 and later by McMillan 1985.

2.1 PROPERTY GEOLOGY:

Outcrop over the property is minimal, probably less than one per cent. Mapping is hindered by an extensive blanket of glacial till that covers most of the property.

The claims are situated over rocks of the Guichon Batholith complex. McMillan's map Geology of the Guichon Creek Batholith shows the property to be underlain by the Chataway variety of the Highland Valley Phase in contact with Bethleham and Bethsaida Phase rocks near the west border. During the current program a considerable quantity of angular Bethsaida float was found up to one km east of the mapped contact, suggesting that this important contact may be situated much further east than previously believed.

A high level airborne magnetometer survey flown in 1967 shows the property to straddle a 300 gamma, north-northwest trending, magnetic gradient. North of the property this magnetic feature passes through the Highmont, Lornex and Valley Copper ore bodies. Geologic mapping in the vicinity of these known deposits has shown this magnetic gradient to be spacially associated with the contact between the Bethsaida and Bethleham

phases of the Batholith. Outcrop and float exposures observed during the present program suggest this is also true on the CVS property. West of the magnetic gradient the mafic minerals in outcrop and float are predominantly biotite while east of the gradient the mafic minerals are predominantly amphibole.

The Chataway granodiorite member of the Highland Valley Phase is the most prominent rock unit found over the property. This unit outcrops at a number of locations over the southeast and eastern portions of the property (Figure 3). It can be quite variable in composition. It is medium grained, 2-3mm, and is comprised of quartz 15-20%, plagioclase and orthoclase 50-60% in about equal proportions, and mafics 20-25%. It is characterized by short stubby hornblende crystals that are generally more abundant than biotite.

The Bethsaida Phase granodiorite is seen in outcrop and float over the western portion of the property. It is a medium grained 2-4mm rock, comprised of quartz 20-35%, plagioclase and orthoclase 50-60% and mafics 15-25%. Biotite is much more abundant than hornblende and occurs in books that may be up to 5mm across.

The Bethleham Phase granodiorite was observed only over the southcentral and southwest corner of the property. It is a medium grained, slightly porphyritic rock, averaging 1-2mm with quartz and feldspar phenochrysts to 4mm. It is comprised of quartz 15-20%, plagioclase and orthoclase 50-60% and mafics 25%. Mafics are primarily hornblende.

A quartz porphyry dyke is exposed as angular boulders in trenches and road cuts near the northwest corner of the property. The body is up to 100 metres in width and strikes northwest. Quartz eyes up to 5mm across occur suspended in a fine grained pale grey matrix. This rock is often altered and occasionally stained with malachite. It is possibly a younger member of the Bethsaida Phase.

2.2 ECONOMIC GEOLOGY:

Previous exploration has located a number of copper showings over and immediately adjacent to the CVS property. Mineralization is comprised of chalcocite, chalcopyrite and bornite and is associated with altered shears and faults. The more important showings are described briefly below.

SHO-11 SHOWING (Minfile 92ISE020)

The SHO-11 SHOWING is situated on claim CVS-2 in Broom Creek Valley approximately 700 metres north of Twin Lakes. Here heavy malachite lenses occur along narrow northwest trending shears within an extensive zone of kaolin, seracite and chlorite alteration developed along a wide north-south crushed zone. Drilling in 1967 is reported to have intersected copper values of up to 5.4% over 10 feet within a 20 foot wide shear zone. A grab sample taken from a surface trench during the present program assayed greater than 1.0% Cu.

MOSS-4 SHOWING (Minfile 9218E060)

The MOSS-4 SHOWING is located along the Pimainus-Tyner logging haul road near the north end of the claim CVS-4. Trenching in 1972 here exposed a number of Chataway granodiorite boulders mineralized with bornite and chalcopyrite. The source of the mineralization was never located. Silt samples collected during the present program from two small streams draining this showing carried 1,035 and 356 ppm Cu. Soil samples taken over this area contained up to 330 ppm Cu.

CHATAWAY LAKE ZONE

The CHATAWAY LAKE ZONE is located in an overburden covered area 800 metres due south of the south end of Chataway Lake. Drilling by Chataway Exploration Ltd. in 1967 intersected copper mineralization in four diamond drill holes, CS-3, C-4, C-5 and C-6. A news release reported in George Cross News Letter dated Feb 8, 1967 gave an inferred reserve of 544,320 Tonnes grading 1.58% copper. An I.P. line completed during the present program shows only a weak one station chargeability high over this showing. The survey results indicate that the Chataway Zone may be an appendage of a 200 metre wide chargeability anomaly situated 500 metres to the east.

SKY-7 SHOWING (Minfile 92ISE062)

The SKY-7 SHOWING is located two kilometers west of Chataway Lake near the north end of claim CVS-5. Moderate to extreme propylitic alteration occurs over a broad north-south zone along the contact between Chataway and Bethleham Phase granodiorite. In 1967 a diamond drill hole intersected 1.5 feet of massive chalcocite at the margin of a zone of propylitic alteration.

ROSCOE CREEK SHOWING

The ROSCOE CREEK SHOWING is located on claim CVS-6 immediately east of Roscoe Creek and 500m west of Chataway Lake. Here considerable spotty malachite occurs widespread over moderately altered Chataway granodiorite. Previous exploration tested this

area with two adits but apparently was unsuccessful. During the present program a chip sample taken from a cluster of malachite stained boulders assayed 0.48% Cu.

THREE CREEKS AREA SHOWING (Minfile 9218E092)

The THREE CREEKS SHOWING is located at the junction of three creeks in the north central portion of claim CVS-5. Sparse amounts of malachite and chalocite are seen over an area 600 metres in width, in weakly altered Bethsaida granodiorite, near a northwest trending, 100 metre wide quartz porphyry dyke. In 1965 grab samples from surface trenches assayed 0.14% and 0.60% Cu but nearby diamond drill holes were unmineralized. A diamond drill hole drilled 700 metres to the northwest encountered 125 metres of intensely altered quartz-porphyry-dyke. The hole was weakly mineralized over its entire length with hematite, chalcocite, chalcopyrite and traces of bornite and molybdenite.

3.0 GEOCHEMISTRY:

In May 1991 Archean Engineering Ltd was contracted to carry out an orientation geochemical sampling survey over the CVS claims. Forty five reconnaissance soil samples were taken at 100 metre intervals along two lines run over the Moss 4 and Chataway showings and at 75 metre intervals along the 0+00N I.P. line over the Chataway Showing. A total of 61 stream sediment samples (46 in 1991 and 15 in 1992) were taken from first, second and third order streams on the property. The samples were sent to Acme and Chemex labs in vancouver where they were analysed by routine ICP methods for 32 elements including Cu and Mo.

Copper and molybdenum values in stream sediments are shown on Figure 4 at a scale of 1:12,000. The results show the streams draining this property to be carrying extremely high Cu concentrations. Copper values range up to 1,035 ppm with a third of the samples containing more than 400 ppm Cu. Anomalous molybdenum values up to 28 ppm are found near the north end of the property. The results suggest that copper mineralization is widespread on the CVS claims but molybdenum is confined to the north end of the property near the Highmont Mine.

Soil sample results are also shown on Figure 4. The results show a bimodal distribution for copper. Samples generally contain less than 70 ppm copper but concentrations exceeding 100 ppm (up to 330 ppm) are found in the vicinity of known and suspected mineralization. Only background molybdenum values were obtained from the soil samples. Inspection of the anomalous soil sample sites revealed that several of the anomalous samples were taken adjacent to streams and from low lying areas where the soils were often moist. These observations suggest that the till cover on this property may be too thick for soil sampling to be entirely effective. anomalies obtained by soil sampling are probably hydromorphic in origin and therefore in some cases might be displaced some distance down slope from the source of the metal.

4.0 GEOPHYSICS:

In May 1992 Walcott & Associates Geophysics Ltd was contracted to carry out four line km of induced polarization over the claims. The work was carried out along a 2 km long, 035° trending line in the Twin Lakes area on claims CVS-1 & 2, and along a 2 km long, 114° trending line over the Chataway Showing on claim CVS-6.

The survey is discussed in detail in a separate report by P.E. Walcott & Associates Ltd. The results of the test program indicated a weak but significant chargeability anomaly situated

approximately 1,000 metres southeast of Chataway Lake and 500 metres east of the Chataway Showing. The anomaly extends by 500 metres an 800 metre long anomaly discovered during a previous survey by Cominco Ltd in 1981. The anomaly is best developed on the third and fourth n spacing (a=75m) suggesting that surface oxidation may extend to a depth of 100 metres or more on this property.

5.0 DISCUSSIONS AND CONCLUSIONS:

The results of work completed to date over the CVS property may be summarized as follows:

- (a) The property is located over an area of favourable geology immediately south of the Highland Valley porphyry copper camp. Three of the rock units hosting economic mineralization at the Bethleham Copper, Valley Copper, Lornex, and Highmont mines are present on the property.
- (b) A high level airborne magnetometer survey flown in 1972 shows the property to straddle a 300 gamma magnetic gradient that passes through the Valley Copper, Lornex, and Highmont ore bodies. The present mapping program suggests that this gradient marks a geologic contact that may be important to copper mineralization in the Highland Valley camp.
- (c) Stream sediment sampling completed by AUCUMO Resources in 1991 and 1992 shows very high Cu concentrations in streams draining the property suggesting the presence of widespread mineralization.
- (d) Reconnaissance soil sampling completed in 1992 revealed anomalous Cu concentrations in the vicinity of the Chataway and Moss 4 showings. The results confirm a local source for stream anomalies over these areas and suggest that in spite of the thick till cover soil sampling may be of use in locating areas of bedrock mineralization.
- (e) Although previous exploration was hampered by an extensive blanket of glacial till, six widely spaced showings were discovered on the property. In all cases surface mineralization was comprised almost entirely of the oxide minerals chalcocite and malachite.
- (f) A reconnaissance I.P. survey carried out during the present program extended an untested chargeability anomaly detected by Cominco in 1981. This anomaly is 1,400 metres long and 500 metres wide.
- (g) The present I.P. results show an increase in chargeability values with depth introducing the possibility that surface oxidation may extend to a depth of 100 metres or more on this property.

6.0 RECOMMENDATIONS:

The results discussed above are encouraging and suggest that the CVS property has potential for hosting porphyry-copper-type mineralization. Additional work entailing soil sampling and induced polarization over target areas, followed by diamond drilling is recommended.

Respectfully submitted at Vancouver, British Columbia,

7.0 REFERENCES:

British Columbia Aeromagnetic Map Series (1972): Energy, Mines and Resources Canada, Ashcroft, B.C., NTS 92I.

British Columbia Aeromagnetic Map Series (1967): Energy, Mines and Resources Canada, Spences Bridge, B.C., Map 5211G NTS 92I/6.

British Columbia Aeromagnetic Map Series (1967): Energy, Mines and Resources Canada, Mamit Lake, B.C., Map 5212G NTS 921/7.

McMillan, W.J. (1985): Geology and Ore Deposits of the Highland Valley Camp. Geological Association of Canada, Field Guide and Reference Manual Series No. 1.

McMillan, W.J. (1978): Geology of the Guichon Creek Batholith, B.C. Ministry of Energy Mines and Petroleum Resources, Preliminary Map 30.

McMillan, W.J. (1976): Geology and Genesis of the Highland Valley Ore Deposits and the Guichon Creek Batholith, CIM Special Volume 15, pp. 85-119.

Minfile Deposits No's.:092ISE017,18,19,20,23,24,60,62,63,69 & 92. (1990). British Columbia, Ministry of Energy Mines and Petroleum Resources, Minfile Report.

National Geochemical Reconnaissance 1:250,000 Map Series, (1982): Ashcroft, B.C., GSC Open File 866.

Northcote, K.E. (1969): Geology and Geochronology of the Guichon Creek Batholith. B.C. Ministry of Energy Mines and Petroleum Resources, Bulletin 56.

Osatenko, M.J., & Jones, M.B., (1976): Valley Copper, CIM Special Volume 15, pp. 130-162.

Reed, A.J., & Jambor, J.L., (1976): Highmont, CIM Special Volume 15, pp. 163-181.

Waldner, M.W., Smith, G.D., & Willis, R.D., (1976): Lornex, CIM Special Volume 15, pp. 120-129.

8.0 STATEMENT OF QUALIFICATIONS:

- I, Arthur G. Troup, do hereby certify that:
- 1) I am a consulting geologist with Archean Engineering Ltd. of 3605 Creery Avenue, West Vancouver, B.C.
- 2) I am a graduate of McMaster University in Hamilton, Ontario with an M.Sc. in Geology.
- 3) I am a registered member of the Association of Professional Engineers of the Province of British Columbia.
- 4) I have practiced my profession in Canada and abroad since 1964.
- 5) I recommended and supervised the geological and geochemical programs discussed in the accompanying report.

Dated at Vancouver, British Columbia, this 15th day of May 1992.

Arthur G

9.0 COST STATEMENT: (15 April - 5 May 1992)

General Cost

Food & Accommodation: 6pers., 22mdays @ \$37.73 Supplies: Fuel: Rentals:	\$ 830.06 186.75 188.22
Adder Jimmy, 6days @ \$124.20 \$ 745.20 Archean Auto, 3days @ \$121.33 364.00 RWR Auto, 3days @ \$113.33 340.00 Aucumo Field Equipment, 22mdays @ \$15 330.00	1,779.20
Total General Cost:	2,984.23
Staking Cost	
Salaries & Wages: 5pers., 7.5mdays @ \$235 FMCs: 2pers @ \$25 Recording Fees: 42 units @ \$5 Transfers: 10 claims @ \$10 General Cost Apportioned: (7.5/22 X \$2,984.23)	\$ 1,762.50 50.00 210.00 100.00 1,017.35
Total Staking Cost:	\$ 3,139.85
Line, Geology, & Geochemistry Cost	
Salaries & Wages: 6pers., 14.5mdays @ \$244.51 Assays & Analyses: Acme Labs 50 Soil for 30-element ICP @ \$5.89 \$ 294.25	\$ 3,545.40
10 Silt for 30-element ICP @ \$5.89 <u>58.85</u> Drafting: Report Preparation:	353.10 856.00 1,610.00
General Cost Apportioned: (14.5/22 X \$2,984.23) Total Line, Geology, Geochemistry Cost:	\$ 1,966.88 8,331.38
IP Survey	
P.E.Walcott & Associates:	\$ 8,688.00

APPENDIX GEOCHEMICAL RESULTS CERTIFICATES

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

Archean Engineering Ltd. PROJECT CVS File # 92-0970

PHONE (604) 253-3158 FAX (604) 253-1716

GEOCHEMICAL AN

SIS CERTIFICATE

SAMPLE#	Мо	Cu	Pb	2n	Ag	Ni	Со	Mn	Fe	As	U	Au	Th	Sr	Cd	Sb	Bi	٧	Ca	P	La	Cr	Mg	Ba	Ti	В	AL	Na	K	Ú
	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	X	ppm	ppm	ppm	ppm	ppm	bbw	ppm	ppm	ppm	*	X	ppm	ррп	X	ppm	×	ppm	*	*	*	ppm
ON 18+00W	1	118	7	27	.1	9	4	157	2.29	2	5	ND	2	33	.2	2	2	58	-41	.043	8	11	.31	89	.13	2 '	1.66	.03	.04	1
ON 17+25W	1 1	60	8	65		16	7	646		7	5	ND	2	23	.2	5	2	52	.23	.114	6	19	.25	117	.16	3 2	2.93	.04	.04	3
RE ON 13+50W	2	91	9	51	.1	15	8	289	2.41	4	5	ND	2	23	.2	3	2	47	.24	. 104	5	15	.27	125	.14	3 3	3.00	.03	. 05	
ON 16+50W	1	56	4	24	.1	8	4	169	2.28	2	5	ND	1	25	.2	2	2	61	.35	.039	5	7	.21	56	.12		1.17	.02	.03	111
ON 15+75W	1	70	5	24	2	12	6	151	3.39	3	5	ND	2	33	.2	4	2	97		.024	7	14	.28	67	.15	5	1.14	.03	.04	1
ON 15+00W	1	69	5	33	.3	10	5	322	1.88	2	5	ND	1	29	.2	4	2	41	.31	.031	6	8	.25	86	.12	3	1.76	.04	.06	1
ON 14+25W	1	122	5	57	 1	18	8	189	3.01	2	5	ND	3	29	.2	2	2	64	.33	.085	5	18	.36	122	. 14	3 2	2.95	.03	.06	1
ON 13+50W	1 1	89	8	50	.1	16	7	269	2.39	2	5	ND	2	23	2	2	2	46	.23	.099	4	14	.27	125	.14	2 :	5.00	.03	.06	1
ON 12+75W	1	88	2	25	.2	8	5	159	1.82	2	5	ND	3	54	.2	2	2	43	.49	.052	7	5	.38	107	. 16	2	1.67	.04	.07	1
ON 12+00W	2	76	8	31	1	14	5	125	2.47	2	5	ND	2	22	.2	3	2	57	.22	.105	4	11	.21	82	.14	4	1.96	.02	.05	1
ON 11+25W	1	198	10	26	.3	11	6			2	5	ND	2	49	.2	2	2	41		.035	19	9	.25	154	.12		2.43		.06	
ON 10+50N	1	48	6	60	.1	18	7	435	2.60	2	5	ND	2	24	.2	2	2	58	. 25	.084	5	20	. 25	107	.17		2.41	. 03	.05	- 1
ON 9+75N	1	125	5	30	. 2	13	5		2.56	2	6	ND	3	72	.2	2	2	48		.032	15	15	.38	149			2.23	.04	.07	7:1
ON 9+00N	1	118	8	27	.1	11	5	247	2.03	- 2	5	ND	2	39	.2	2	2	42		.018	6	12	.28	107		3	1.93	.03	.04	1
ON 8+25N	2	104	11	46	.2	17	6	158	2.42	2	5	ND	2	31	.2	2	4	48	.32	.058	4	16	.28	123	.16	3	2.64	.03	.06	1
ON 7+50N	2	91	8	44	.1	19	7		2.48	3	5	ND	2	30	.2	2	2	53		.079	4	14	.30	108			2.79	.03	.05	1
ON 6+75N	1	73	3	28	.1	14	5		2.24	2	5	ND	2	36	.2	2	2	53		.038	5	13	.30	80	. 16		1.93	.02	.05	4,11
ON 6+00N	1	77	7	25	.2	12	7		2.99	2	5	ND	4	45	.2	2	2	80		.054	7	13	.36	95			1.42	.03	.06	1
ON 5+25N	1	74	4	22	.2	9	5		2.01	2	6	ND	2	40	2	2	2	47	.48	.033	7	9	.28	85	.13		1.38	.03	.08	
ON 4+50N	2	46	6	53	.1	15	6	425	2.76	2	5	ND	2	21	.2	2	2	64	.23	.069	4	19	.23	71	.16	4	2.27	.02	.05	
ON 3+75N	3	56	6	35	.1	12	6			2	5	ND	2	26	.2	2	2	61	.26	.152	4	9	.21	83	.16		2.31	.02		
ON 3+00N	2	43	7	42	.1	13	5		2.45	2	5	ND	2	22	.2	2	2	49	. 25	2136	4	9	. 18	87			2.67	.03	.05	1
ON 2+25N	1	28	6	53		14	6		2.49	2	5	ND	3	16	.2		2	50	.21	.130	3	16	. 16	73			2.79	. 03	.05	12.00 AC ¶
ON 1+50N	1	112	9	29	1	16	5	268	2.59	2	5	ND	- 3	41	.2	2	2	45	52	.039	泉	14	.33	113	.18		2.89	. 04	.06	

ICP - .500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-2 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 SR CA P LA CR MG BA TI B W AND LIMITED FOR NA K AND AL. AU DETECTION LIMIT BY ICP IS 3 PPM. - SAMPLE TYPE: P1 SOIL P2 SILT Samples beginning 'RE' are duplicate samples.

STANDARD C

19 58 40 136 7.4 72 32 1137 4.00 43 17 7 39 53 18.7 16 21 56 .49 .093 37 60 .90 175 .09 33 1.92 .08 .15 .11

May 8/92 SIGNED BY. A. D. D. D. D. D. TOYE, C. LEONG, J. WANG; CERTIFIED B.C. ASSAYERS

YSIS CERTIFICATE GEOCHEMICAL A.

3605 Creeky Ave, West Vancouver BC V7V 2M3

Archean Engineering Ltd. File # 92-0824



	***															8 80 88													
SAMPLE#	Mo	Cu	РЬ	2n	Ag	Ni	Co	Mn	Fe	As	U	Au	Th	Sr	Cd	Sb	Bi	٧	Ca	P	La	Cr	Mg	Ba	Ti	В А	L No	9	K W
	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	×	ppin	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	X	X	ppm	ppm	*	ppm	X	ppm	x :	ξ	% ppm
CVS 50N 2+25E	2	52	2	16	.1	12	4	86	2.15	2	5	ND	1	27	.2	2	2	54	.27	.013	2	12	.09	210	.12	2 1.8	2 .0	2 .0	5 1
CVS 50N 3+25E	2	41	4	23	.1		4	91	2.17	2	5	ND	1	18		2	2	48	.20	.047	2	10	.07		. 10	2 1.8	2 .0:	2 .0	8 1
CVS 50N 4+25E	2	49	2	23		10	4	100	2.12	2	5	ND	2	21	.2	2	2	45	.21	.047	2	12	.07	166	.11			2.0	6 1
CVS 50N 5+25E	1	64	5	17		9	4	81	2.18	2	5	ND	2	22	.2 .2	2	2	50	.24	.050	3	12	.07		.09			2.0	6 1
CVS 50N 6+25E	3	330	3	44	.5	13	5	229	2.37	2	5	ND	2	18	2	2	2	50	.21	.080	2	14	.09	102	.13	2 2.1	2 .0	2 .0	7 1
RE CVS 50N 11+25E	1	29	3	27		9	4	274	2.12	3	5	ND	1	21	.2	2	2	48	.23	.058	2	10	.09	103	.11	3 1.	0.0	2 .0	7 1
CVS 50N 7+25E	2	54	3	29	1	10			2.77	3	5	ND	1	25	.2 .4 .3	2	2	69	.27	.089	3	12	.09	141	.09	2 1.3	8 .0	2 .0	7
CVS 50N 8+25E	2	94	3	20	.1 .2	12	4		2.24	2	5	ND	2	37	***	2	2	47	.38	.051	3	13	.10	205	312	2 1.1	3 .0	3 .0	6 1
CVS 50N 9+25E	Ž	155	2	35		10	7		4.04	3	5	ND	1	40	3	2	2	105		.066		15	. 14	146	.09	2 1.	7 .0	2 .0	7 1
CVS 50N 10+25E	Ī	215	3	24			6		2.80	2	5	ND	1	55	.2	2	2	53	.59	.012	12	15	.16	213	. 15	3 2.0	4 .0	4 .0	6 2
CVS 50N 11+25E	1	28	2	26	.1	9	4	270	2.19	2	5	ND	1	20	.2	2	2	52	.23	.059	2	9	.09	101	.10	2 1.	6 .0	2 .0	6 1
CVS 50N 12+25E	1	46	4	14	.1	9	3	95	1.67	2	5	ND	1	29	.2	2	2	34	.32	.015	2	11	. 10	132	13	2 1.	4 .0	3.0	5 1
CVS 50N 20+00E	1 1	202	4	40	.1 .2	17	8	381	3.08	2	5	ND	3	46	.3	2	2	62	.51	.025	8	13			14	2 2.	35 .0	3.0	7
CVS 50N 21+00E	1 1	60		20			4	144	2.02	2	5	ND	1	35	.2	2	2	41	.38	.013	4	14	. 13	100	.14	3 1.	4 .0	3.0	6 1
CVS 50N 22+00E	1	65	2	23	.1	11	4	117	2.52	2	5	ND	1	30	.2	2	2	59	.33	.052	4	13	.11	110	.12	3 1.	57 .0	2 .0	16
CVS 50N 23+00E	1	66	2	25	.2	12	5	126	2.88	2	5	ND	4	27	.3	2	2	68	.32	.102	3	14	. 13	101	.14	2 2.	7 .0	2 .0)5 1
CVS 50N 24+00E	1 1	61	3	32		16			2.66	2	5	ND	2	23	2	2	2	57	.28	.111	3	13			3314	2 2.	35 .O	2 .0)5 1
CVS 50N 25+00E	1	146	6	53	.1 .2	24	10	164	3.51	2	6	ND	4	28	6	2	3	59		. 144					.16		19 .0	2 .0)6 1
CVS 50N 26+00E	1 1	104	3	30		19	7		3.23	2	5	ND	2	33	.5	2	2	65	.36	.125	3	16	. 14	142	.16	3 3.	26 .0	2 .()5 3 1
CVS 50N 27+00E	1	35	3				5	130	2.45	2	5	ND	1	23	.2	2	2	59	.26	.075	3	14	.10	86	14	2 1.	24 .0	3 .0	15 1
CVS 50N 28+00E	1	32	2	19		8	3	110	1.58	2	5	ND	1	26	.2	2	2	43		.018		11		67	, 15	2 1.			
CVS 50N 29+00E	1	40		26			6		2.66		5	ND	2	21	2	2	2	64		.D69					14)5 💮 1
CVS 50N 30+00E	1	53		25		12	5		3.24		5	ND	3	22	.2	2	2	89		.060		16	.10		.13)5
STANDARD C	19	63	38	132	7.3	71	33	1040	3.97	41	18	7	37	51	17.5	15	20	57	.48	.090	36	58	. 88	177	.09	31 1.	90.0	18.	14

ICP - .500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-2 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 SR CA P LA CR MG BA TI B W AND LIMITED FOR MA K AND AL. AU DETECTION LIMIT BY ICP IS 3 PPM.

Samples beginning 'RE' are duplicate samples. - SAMPLE TYPE: SOIL

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

PHONE (604) 253-3158 FAX (604) 253-1716

GEOCHEMICAL 7

YSIS CERTIFICATE

Archean Engineering Ltd. File # 92-0825 3605 Creeky Ave, West Vancouver BC V7V 2M3

SAMPLE#	Мо	Cu	Pb	Zn	Ag	Ni	Co	Mn	Fe	As	U	Au	Th	Sr	Cd	Sb	Bi	٧	Ca	P	La	Cr	Mg	Ba	Ti	В	AL	Na	K 1
	bbu	ppm	ppm	ppm	ppm	ppm	bbu	ppm	X	ppm	ppm	bbu	ppm	ppm	ppn	ppm	ppm	ppm	*	×	ppm	ppm	×	ppm	∞ %	_	*	*	X pp
CS-47	1	356	9	23	.3	13	3	85	1.56	2	5	ND	7	47		,	6	22	50	.019	23	0	.12	740	.13		7 04		3233
CS-48	8	426	5	48		19	ō		1.92		31	ND	1	225	2	5	5		2.47		44	14	.22				3.06	.05	.05
CS-49	14	146	2	7		6	2		2.52	5	5	ND	•	344	2	5	2		3.50	7.7.7.7.00	74	14	.13			2	2.70	.02	.06
CS-50	3	414	5	33	12	25	10		4.05	2	29	ND	•	137		5	2		2.00		24	10	.39		.01	7	.25	.02	.01
CS-51	1	242	6	51	- 100	22			2.99	2		ND	, <u>,</u>	52	20 PM	5	2	57		1039	15	19			.08		4.69	.02	.09
			•	- '	96000,00		•	1107	L.,,			NU		24		2	~	31	.73	.037	13	18	.26	190	.12	2	4.23	.02	.08
CS-52	5	620	6	44	.7	18	7	1140	3.01	2	21	ND	4	215		2	2		2 45	004	22	44	20	/ 20					
CS-53	1	698	ž	74	400000000000000000000000000000000000000	31	11		3.93	2		ND	•	135	.2		2		2.15		22	11	.29		.07		3.33	.02	.08
RE CS-50	3	428	Ā	32	1000	27	10		4.20	2		ND				- 2			1.56		58	22	.76		.08		6.99	.02	.13
CS-54	28	411	ž	55	4 1 2 7 7 7 7	15			6.24	6	24			139	-		~		2.03		25	21	.43		.09		4.90	.02	.10
CS-55	10	468	Š	43	2010/2007	15			4.88		77	ND	- !	153	2		4		1.45		14	14	.40		.09		1.77	.02	.07 🤍 1
00 22	.0	700	,	43		13	,	3120	4.00	•	22	ND	1	179	.2	2	2	76	1.92	.139	12	10	.42	Z93	.08	4	1.95	.02	.04
CS-56	2	557	7	3ሰ	.4	20	R	04/	3.03		21	NB		170		•	_	-4											
STANDARD C	19	56	38		7.2				4.03	42	24	ND	70	139		- 4	2				29	12	.43		.10		3.76	.03	.09
OTAHOARD C	1 17			130	1,10,40	70	32	1033	4.03	30.4C	. 17		38	22	17.3	16	20	56	.48	.092	36	57	.90	182	.09	34	1.91	.06	.15

ICP - .500 GRAM SAMPLE IS DIGESTED WITH 3ML 3-1-2 HCL-HN03-H20 AT 95 DEG. C FOR ONE HOUR AND IS DILUTED TO 10 ML WITH WATER. THIS LEACH IS PARTIAL FOR MN FE SR CA P LA CR MG BA TI B W AND LIMITED FOR NA K AND AL. AU DETECTION LIMIT BY ICP IS 3 PPM. - SAMPLE TYPE: SILT Samples beginning 'RE' are duplicate samples.

DATE RECEIVED: APR 21 1992 DATE REPORT MAILED:

SIGNED BY D. TOYE, C. LEONG, J. WANG; CERTIFIED B.C. ASSAYERS



Archean Engineering Ltd. PRo_ MCT CVS FILE # 92-0970

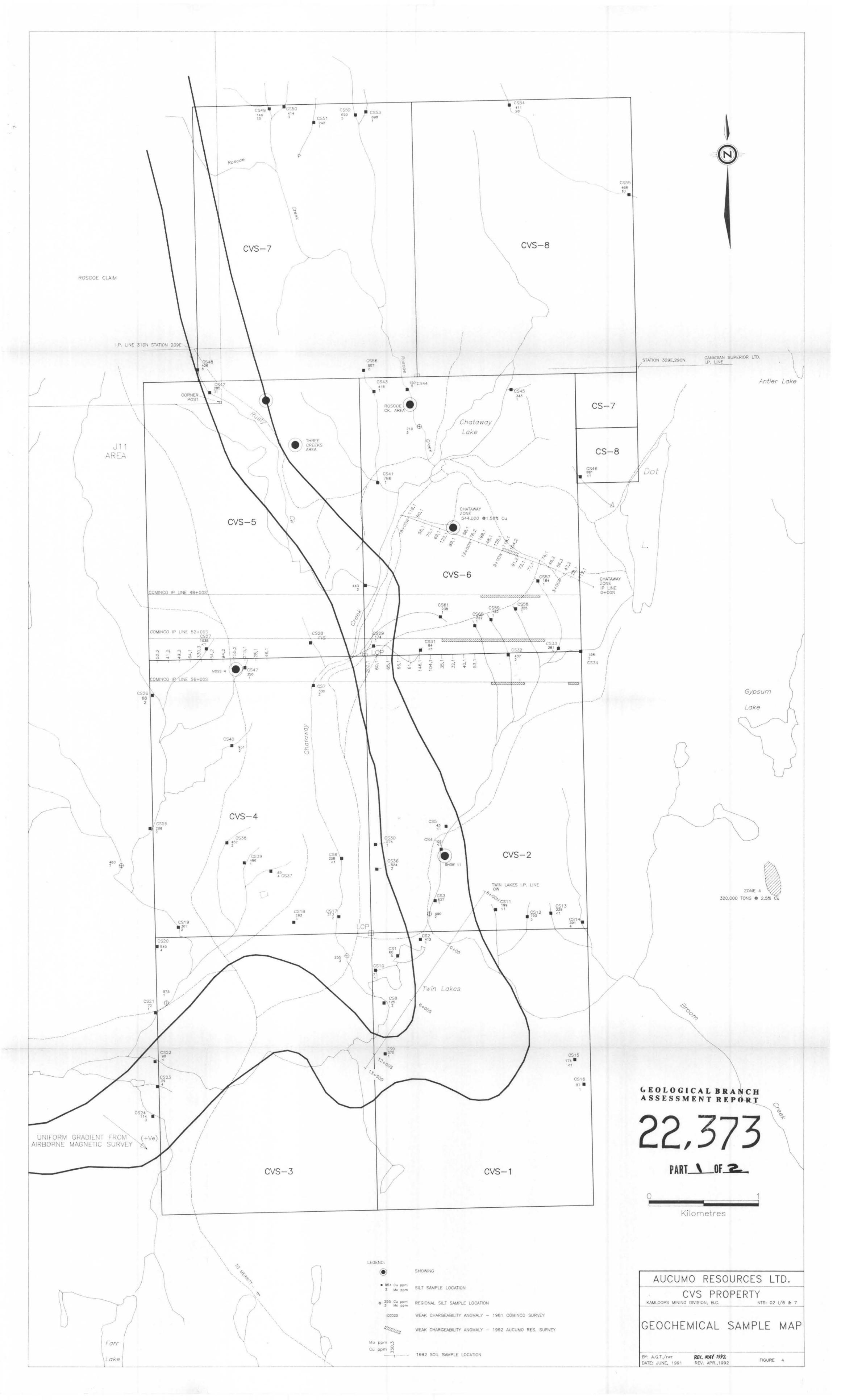
Page

22

1																														MAR ARALT	I ICAL
	SAMPLE#	Мо	Cu	Pb	Zn	Ag	Ni	Co	Mn	Fe	A8	Ü	Au	Th	Sr	Cd	Sb	Bi	٧	Ca	P	La	Cr	Mg	Ba	11	В	Al	Na	K W	
1		ppm	ppm	ppm	ppm	ppm	ppm	ppm	bbu	×	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	*	*	ppm	ppm	X	ppm	*	ppm	X	*	% ppm	
	CS-57	1	164	4	17	.1	8	2	39	1.77	2	5	ND	2	25	.2	2	2	26	.21	.008	9	9	.20	137	.11	2 3.	32	.04	.03 1	· ·
l	CS-58	1	325	11	31	.6	27	7	146	4.18	7	8	ND	8	60	.2	2	2	77	.75	.024	13	23	.51	217	.20	3 4.	75	.05	.12 1	
	CS-59	1	132	8	23	.1	12	4	105	1.76	2	5	ND	5	35	.2	2	2	29	.41	.018	11	8	.31	128	.13	3 2.	71	.05	.09 1	
i	CS-60	1	222	5	30	.1	18	9	821	2.75	3	5	ND	6	64	.2	2	2	51	.74	.039	52	13	.50	193	. 15	3 2.	86	.04	.10 1	
	CS-61	1	238	7	37	.4	20	7	265	3.00	4	8	ND	6	63	.2	2	2	45	.96	.036	23	15	.53	164	.14	4 3.	47	.04	.13 1	
	RE CS-59	1	129	4	22	.1	11	4	106		200 200 750	5	ND	5	34	.2	2	2	28	.41	.018	11	8	.31	126	, - ,	2 2.		.05	.08 1	
	STANDARD C	19	_ 58	40	136	7.4	72	32	1137	4.00	43	17	7	39	53	18.7	16	21	56	,49	.093	37	60	.90	175	.09	33 1.	92	.08	.15 11	

Sample type: SILT. Samples beginning 'RE' are duplicate samples.





LOG NO:	JUN 2 6 1992	RD.
ACTION:		
!		
FILE NO:		

A GEOPHYSICAL REPORT

<u>on</u>

INDUCED POLARIZATION SURVEYING

Highland Valley Area, B.C. 500 22'N, 1200 52'W N.T.S. 92 I/7W

Claims surveyed:

CVS 1,2,3 & 6

Survey Dates:

May 1st - 4th, 1992

Owner:

COPPER VALLEY SYNDICATE

Operator:

AUEUMOLRESCURCESALTD BRANCH ASSESSMENT REPOPT

BY 22,373
PART 2 OF 2

PETER E. WALCOTT & ASSOCIATES LIMITED

Vancouver, British Columbia

June 1992

A GEOPHYSICAL REPORT ON INDUCED POLARIZATION SURVEYING HIGHLAND VALLEY AREA, B.C.

SUMMARY:

The CVS copper prospect is located in south central British Columbia, on the southeast side of the Guichon batholith, seven kilometers south of the Highmont Copper Mine. The property, comprised of eight 20 unit mineral claims and two, two post mineral claims, was staked to cover a strong copper anomaly discovered by regional geochemical sampling.

Between May 1st and 4th, 1992, Peter E. Walcott Associates carried out two pole-dipole traverses over the CVS property, for Aucumo Resources Ltd.

The traverses were undertaken to locate sulphide mineralization in areas where no previous coverage was undertaken and/or the results from previous work were not available to the present owners of the ground.

A weak chargeability anomaly was obtained on the more northerly of the traverses on strike with a previously defined zone of similarly weak response, located in an area of moderately high silt copper values, thus extending the zone by some 400 metres.

As a result of the above and the possibility that surface oxidation could extend to some depth in the area the writer recommends that additional I.P. surveying be carried out with a 150 metre dipole over the anomaly in an effort to see if it exhibits higher response at depth.

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PERSONNEL EMPLOYED ON SURVEY	ii
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I.P. PSEUDOSECTIONS	V
ACCOMPANYING MAPS - Scale 1:1250	MAP POCKET
GEOCHEMICAL RESULTS & 1992 I.P. DATA	Figure 4

INTRODUCTION.

Between May 1st and 4th, 1992, Peter E. Walcott & Associates Limited undertook two lines of induced polarization surveying (I.P.) on a property, located in the Highland Valley area of British Columbia, for Aucumo Resources Ltd.

The surveying was carried out over two lines, one trending N 33° E and the other N 65° W, established by the geophysical crew at the direction of Archean Engineering.

Measurements (first to fourth separation) of apparent chargeability (the I.P. response parameter) and resistivity were made every 100 metres along the lines using the pole-dipole method of surveying with a 75 metre dipole.

The I.P. data are presented in contour form on individual pseudosections bound in this report.

PROPERTY, LOCATION & ACCESS.

The property is located in the Kamloops Mining Division and consists of the following units:

<u>Claim Name</u>	<u>Units</u>	Record No.	Anniversary
CVS 1	20	219885	May 10th
CVS 2 - 4	20	219886 - 88	May 11th
CVS 5 - 6	20	219889 - 90	May 12th
CVS 7	20	308682	April 18th
CVS 8	20	308683	April 19th
CS 7 - 8	1	308684 - 85	April 19th

The claims are situated in the Highland Valley of British Columbia around and south of Chataway Lake and some seven kilometres southeast of the Highmont Copper Mine.

Access was obtained from the town of Merritt via Highway 8, the Pimanus-Tyner fire access road and the spur road to Chataway Lodge fishing camp.

PREVIOUS WORK.

Work has been carried out on the property and surrounding areas since 1887. In 1956 the Chataway Mining Syndicate staked the area of the present property and from then until the late 1970's carried out multiphase exploration in conjunction with a series of partners including geological mapping, stream and soil geochemical sampling, induced polarization surveys and diamond and percussion drilling with mixed results.

Since 1980 the area was held intermittently by a number of individuals who continued sporadic exploration along the lines mentioned above.

The results of the above work is partially documented in assessment reports filed by the various operators.

GEOLOGY.

The reader is referred to the forementioned reports and to a report by A. G. Troup, P.Eng., of Archean Engineering dated May 1992.

Basically the property is underlain by rocks of the Guichon Batholith complex, a somewhat concentric phased intrusive with increase in age, mafic content and decrease in grain size from the inner core to the outer margin.

Although mostly covered by glacial till the Chataway granodiorite, a member of the Highland Valley Phase, appears to be the dominant underlying rock type, in contact with younger Bethlehem and Bethsaida Phase rocks near the western boundary.

Mineralization on the property exists in a number of showings where malachite, bornite, chalcopyrite and chalcocite are observed in shears and/or altered rocks.

PURPOSE.

The purpose of the survey was to (a) carry out sufficient work to satisfy assessment requirements on the property, (b) examine the I.P. response, if any, over the purported half of a million ton Chataway zone, and (c) to explore the area east of Twin Lakes, where lake bottom sampling had returned anomalous copper values, and where an increase in polarization was noted at the south ends of the lines of the late 1960's I.P. grid which terminated on the north side of Broom Creek canyon.

SURVEY SPECIFICATIONS.

The induced polarization (I.P.) survey was conducted using a pulse type system, the principal components of which are manufactured by Huntec Limited of Metropolitan Toronto, Ontario, and BRGM Instruments of Orleans, France.

The system consists basically of three units, a receiver (BRGM), a transmitter and a motor generator (Huntec). The transmitter, which provided a maximum of 2.5kw d.c. to the ground, obtains its power from a 2.5 kw 400 c.p.s. three phase alternator driven by a gasoline engine. The cycling rate of the transmitter is 2 seconds "current-on" and 2 seconds "current-off" with the pulses reversing continuously in polarity. The data recorded in the field consists of careful measurements of the current (I) in amperes flowing through the current electrodes C_1 and C_2 , the primary voltages (V) appearing between any two potential electrodes, P_1 through P_7 , during the "current-on" part of the cycle, and the apparent chargeability, (M_a) presented as a direct readout in millivolts per volt using a 100 millisecond delay and a 1000 millisecond sample window by the receiver, a digital receiver controlled by a micro-processor - the sample window is actually the total of ten individual windows of 100 millisecond widths.

The apparent resistivity ([a) in ohm metres is proportional to the ratio of the primary voltage and the measured current, the proportionality factor depending on the geometry of the array used. The chargeability and resistivity are called apparent as they are values wich that portion of the earth sampled would have if it were homogeneous. As the earth sampled is usually inhomogeneous the calculated apparent chargeability and resistivity are functions of the actual chargeability and resistivity of the rocks.

The survey was carried out using the "pole-dipole" method of surveying. In this method the current electrode, C_1 , and the potential electrodes, P_1 through P_7 , are moved in unison along the survey lines at a spacing of "a" (the dipole) apart, while the second current electrode, C_2 , is kept constant at "infinity". The distance, "na" between C_1 and the nearest potential electrode generally controls the the depth to be explored by the particular separation, "n", traverse.

A 75 metre dipole was employed on this survey, and first to fourth separation measurements made at 75 metre intervals along the survey lines. In all some 3.9 kilometres of surveying were completed using this procedure.

DISCUSSION OF RESULTS.

As the two lines surveyed were a considerable distance apart and in different orientations - as shown on Figure 4 a plan of the line locations and geochemical results - they are best discussed on an individual basis as follows.

Line 0 E. This line was run across Broom Creek canyon, where previous surveys had detected an increase in polarization on the north side, and along the east side of Twin Lakes.

The results, as can be seen from the pseudosection, confirmed the results of the previous survey with chargeabilities in the order of 6 and 7's straddling Broom Creek - 0 + 00 N - but failed to show a further increase to the south. In fact both the chargeability and resistivity decreased to the south at 6 + 75S suggesting a considerable increase in the thickness of overburden cover akin to those on the 1981 Cominco survey over Chataway Creek where drilling failed to encounter bedrock at depths of over 180 metres.

Line 0 N. This line was designed to check the response of the Chataway zone and to locate the possible extension of a weak but untested chargeability zone some 800 metres long by 400 wide indicated on the 1981 Cominco survey and previously on the 60's International Mogul Mines survey.

The results showed a zone of weak chargeability response to exist between 8 + 75W and 10 + 50W on strike with the previously mentioned Cominco anomaly, the location of which is shown in Figure 4.

The higher chargeability readings were obtained on the third and fourth separation as was the case with the Cominco surve - higher readings on a = 100 metre n = 3 - suggesting possible greater percentage sulphide content at depth.

No significant signature was observed to be associated with the Chataway zone around 13 + 50W.

SUMMARY, CONCLUSIONS & RECOMMENDATIONS.

Between May 1st and 4th, 1992, Peter E. Walcott & Associates Limited carried out two pole-dipole traverses over a property, located in the Highland Valley area of British Columbia, for Aucumo Resources Ltd.

The traverses were undertaken to fulfill assessment requirements and in an effort to locate sulphide mineralization in areas where no previous coverage was undertaken and/or the results from previous work were not available to the present holders of the ground.

A weak chargeability anomaly was obtained on the more northerly of the traverses on strike with a previously defined zone of similarly weak response, located in an area of moderately high silt copper values, thus extending the zone by some 400 metres.

No significant chargeability signatures were obtained over the Chataway zone on the northernmost traverse, or on the Broom Creek - Twin Lake traverse.

As a result of the above and the possibility that surface oxidation could extend to some depth in the area the writer recommends that additional I.P. surveying be carried out with a 150 metre dipole over the anomalay in an effort to see if it exhibits higher response at depth. Should this be the case then other areas of weak polarization effects on strike to the north should be afforded the same treatment.

Respectfully submitted,

PETER E. WALCOTT & ASSOCIATES LIMITED

Peter E. Walcott, P.Eng.

Geophysicist

Vancouver, B.C.

June 1992

APPENDIX

COST OF SURVEY.

Peter E. Walcott & Associates undertook the survey on a daily basis so that the total cost of services provided was \$8,688.00.

PERSONNEL EMPLOYED ON SURVEY

Name	Occupation	<u>Address</u>	<u>Dates</u>
Peter E. Walcott	Geophysicist	Peter E. Walcott & Assoc. 605 Rutland Court, Coquitlam, B.C. V3J 3T8	May 1- 4th, June 10, 1992
A. Walcott	Geophysical Operator	Ħ	May 1 - 4 1992
R. Gonzalez	Assistant	11	ff
D. Gonzalez	11	Ħ	11
S. Edwards	79	п	11
J. Walcott	Typing	Ħ	June 10, 1992

CERTIFICATION.

I, Peter E. Walcott, of the Municipality of Coquitlam, British Columbia, hereby certify that:

- I am a graduate of the University of Toronto in 1962 with a B.A.Sc. in Engineering Physics, Geophysics Option.
- 2. I have been practising my profession for the last thirty years.
- I am a member of the Association of Professional Engineers of British Columbia and Ontario.

Peter E. Walcott, P.Eng.

Vancoouver, B.C.

June 1992

