86-607-15197

NTS 92F/2E Lat. 49 07.5' Long. 124°42'44.5'

09/87

GEOCHEMICAL ASSESSMENT REPORT

ON THE

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PAT 1 CLAIM

Franklin River - China Creek Drainage Port Alberni, British Columbia Alberni Mining Division

Owner: William Poole

Operator: Victoria Diego Resource Corporation

GEOLOGICAL BRANCH ABSESSMENT REPORT

by

Elizabeth A. Scroggins, Geologist ASHWORTH EXPLORATIONS LIMITED

R3684081 UNION CCT 2 J 1986 ANCOUVER, B.C.

submitted October 15, 1986

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1. INTRODUCTION

This report summarizes geochemical work done on the Pat 1 claim on September 23, 1986. Ashworth Explorations Ltd. was retained by William Poole (Owner) and Victoria Diego Resource Corporation (Operator) to perform assessment work and prepare a report.

2. LOCATION AND ACCESS

The Pat 1 property is located 120 kilometers west of Vancouver or 12 kilometers southeast of Port Alberni on Vancouver Island (see Figure 1). It is within NTS map sheet 92F/2 in the Alberni Mining Division.

Access is from Port Alberni along the Museum Creek haul road. This leads to a series of logging roads, operated and maintained by MacMillan-Bloedel Ltd. and provides excellent four wheel drive access to the Mount Patlicant area. Roads are present at the southeast boundary and through the north part of the claim. The northwest fork of the northern logging road has been blocked off but the road provides good walking access.

3. PHYSIOGRAPHY

The property is situated within the western coastal forest region characterized by abundant rainfall and heavy growth of large timber including fir, pine and cedar.

The claim, situated 2 kilometers southeast of Patlicant Mountain, has elevations ranging from 350 metres to 920 metres giving a total relief of 570 metres. Slopes vary from shallow in the north to moderate in the south. Drainage is into the Franklin River, which flows west for 7 kilometers into Alberni Inlet.

4. HISTORY

Mineral prospecting in the area has been active since placer gold was mined on China and Franklin Creeks during the 1860's. Development of lode gold prospects soon followed with eight properties in production by the 1940's. Low gold prices combined with low tonnage of the vein deposits inhibited further development.

In the 1960's Gunnex Limited acquired prospecting rights on certain parts of the E & N Railway Land Grants. Work done included a

helicopter aeromagnetic survey, a regional soil and silt sampling program, plus regional geological mapping combined with mineral showing examinations.

The area still remains quite active. A diamond drill program was carried out by Jan Resources on the Black Panther Mine - Summit Lake area, in 1980-81, which was further developed by Lode Resources Corp. in 1983-84. Westmin Mines Ltd. is currently undertaking a diamond drill program on the Thistle Mine property, 6 km east of the claim.

Other work was done in the area by Gunnex Ltd. in the 1960's, but no known work has been performed on the Pat 1 claim. The 1985 work program revealed some low anomalous gold and copper values, which were further investigated in this study.

5. PROPERTY STATUS

The Pat 1 claim was staked on September 11, 1984. It is comprised of 10 units (record no. 2424) and expires on September 27, 1985. It is owned by William Poole and operated by Victoria Diego Resource Corporation (see Fig. 2). Assessment work was performed in September, 1985 by Ashworth Explorations Limited and applied against one year's work.

6. GEOLOGY - PROSPECTING

The property is underlain by Triassic Karmutsen basaltic volcanics on the eastern part of the claim. This unit consists mainly of dark grey to black pillowed basalt, massive basalt and pillow breccia. These are overlain by Cretaceous Nanaimo sediments to the northwest, which consist of a dark gray-black siltstone. Tertiary diorite intrusions occur to the west in fault contact with the Karmutsen volcanics. This unit is comprised of hornblende-quartz diorite and is regionally recognized as a quartzdiorite-granodiorite porphyry. These intrusions are associated with several mineral prospects in the area, including Mt. Spencer and Mt. McQuillan.

The area concentrated on for prospecting was the northeast corner of the claim, along a small creek which flows from the northeast into the Franklin River. The area around a low anomalous gold value obtained in the 1985 program, was further prospected. The rocks exposed in outcrop in this area are the Karmutsen volcanics. A fork in the logging road in the north-central portion of the claim was sampled further, as recommended by the 1985 program. This area reported two anomalous gold values and one copper anomaly. Outcrop not previously mapped, was done and several rock samples were taken in areas of intense iron-staining.

7. GEOCHEMISTRY

7.1 Field Procedures

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a substance

The purpose of the 1986 program was to investigate any anomalous values which were reported from the previous years work. Soil and silt samples were taken in the areas of interest. Outcrops were mapped and rock samples taken where rust staining and vein-like structures occurred.

Altogether, 30 samples were collected, consisting of 13 soil samples, 7 silt samples and 10 rock samples. Soil samples were taken at a depth of 30 cm in the B-horizon using Kraft gusset envelopes. Some sample depths were slightly greater due to an increase in organic material in certain areas.

7.2 Analytical Techniques

Vangeochem Lab Limited was retained to perform the analysis. All samples were dried and sieved to minus 80 mesh. Elements Cu, Pb, Zn and Ag were determined by atomic absorption. Arsenic was determined colorimetrically by comparing the intensity of the colour of a prepared complex with known standards. Gold was determined in rock samples by fire assay and detected by atomic absorption spectroscopy. The soil and silt samples were analysed for gold by solvent extraction and detected by atomic absorption spectroscopy.

7.3 Results

For complete geochemical lab report see Appendix A. Because of the small number of samples and the large range in values, statistical calculations were not performed. Only the very high values will be examined in this section.

7.3.1 Copper

Copper has the widest range of values which span from low to high as follows: 5 ppm to 16,600 ppm, 6 ppm to 286 ppm, and 66 ppm to 186 ppm in rock, soil, and silt samples respectively. The high anomalous values come from the northeast corner of the claim, along a creek which drains into the Franklin River. A high value of 16,600 ppm was attained in a rock sample taken from an outcrop of Karmutsen volcanics, just west of the creek and north of the logging road. This high copper value correlates with high zinc, silver and gold values. Other high copper values occur south along the creek in outcrops exposed along the river bank.

7.3.2 Lead

There are no distinct lead anomalies as the values are quite low and only range from 10 ppm to 34 ppm. It should be noted, however, that the highest value (34 ppm) coincides with the highest copper, zinc and silver values and the second highest gold value.

7.3.3 Zinc

The zinc values range from 15 ppm to 210 ppm. The highest value of 210 ppm once again correlates with the highs mentioned previously. Two soil samples from the creek which had the highest copper values in soils, also have the highest zinc in soils.

7.3.4 Silver

Silver values range from 2.1 ppm to 14.8 ppm. Again the very high value of 14.8 ppm occurs in the aforementioned sample also containing high copper, zinc and gold. The remaining silver values are scattered and relatively low, however the "high" of 14.8 ppm confirms that this sample and the surrounding area warrants further investigation.

7.3.5 Gold

The gold values exhibit a very wide spread in the rock samples (160 ppb to 2,900 ppb) and a narrow spread in the silts and soils (5 ppb to 30 ppb).

The highest Au value in rock, 2,900 ppb (= 0.09 oz/ton) occurs about 100m south of the eastern boundary of the claim in the northeast corner, along a small creek which flows into the Franklin River.

The sample was taken from an outcrop of Karmutsen volcanics within the river cut on the eastern bank. The dark gray-green basaltic volcanic was highly weathered and not well exposed. The second gold anomaly of interest was found west of the creek as described previously. This sample was taken from the same unit, basaltic volcanics, and was extremely weathered, making it very difficult to get a fresh sample. At this location, the Au value was 880 ppb (= 0.02 oz/ton), Ag 14.8 ppm, Cu 16,600 ppm, Pb 34 ppm and Zn 210 ppm.

7.3.6 Arsenic

All samples were analysed for arsenic because it is thought to be a good pathfinder element for mineralization. However, no anomalous values were found and the range in values is quite narrow (<2 ppm to 40 ppm). The highs for all other elements show no correlation with the arsenic values.

7.4 Interpretation

The results obtained in this study are quite encouraging. The very high copper anomaly of 16,600 ppm (= 1.66% Cu) occurring in the northeast corner of the claim correlates with the highest lead, zinc and silver values. This sample also has the second highest gold value. The outcrop of Karmutsen volcanics, from which this sample was obtained, was extremely weathered making it difficult to determine the extent of the mineralized zone. This area is of definite interest and should be further prospected. The area along the river which yielded the highest gold value is thought to be a fault zone (mapped by Laanela, Gunnex Ltd., 1965) and should also be examined in further detail. Based upon the highly anomalous values obtained in this study, future work programs should concentrate on the above two mentioned areas.

8.0 CONCLUSIONS

The Pat 1 claim is underlain by Triassic Karmutsen basaltic volcanics which are in fault contact with diorite intrusions to the west. The northwest segment of the claim are overlain by Coctaceous Nanaimo sediments.

The 1986 program consisted of soil and silt sampling, as well as geological sampling along river cuts and road cuts, and mapping of outcrops. Two areas of interest were found, both from rock samples of Karmutsen volcanics in the northeast.

It is recommended that a program of detailed sampling take place in the areas of high anomalous values. A program of close spaced geological sampling and mapping and geophysical surveys should be outlined to deliniate the targets. Future work consisting of trenching and drilling would be contingent upon favourable results from the 1987 program.

Respectfully submitted,

Elizabeth A. Scroggins, B.Sc. (Hon) ASHWORTH EXPLORATIONS LIMITED

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APPENDIX A

GEOCHEMICAL RESULTS

| /GC | NC (6) | ANG 1521 PEM ORTH VANCO 04) 986-5211 | EOC N OFFICE ABERTON DUVER, B. TELEX | CHEM AVE. .C. V7P 2S3 04-352578 | | BLIMIT BRANCH OFFE 1630 PANDORA ANCOUVER, B.C. (604) 251-563 | CE ST. V5L 1L6 | | |
|--------------------------|-----------|---|--|--|------------|--|----------------------|-------|---|
| REPORT NUMBER: 852488 38 | | CYBER: 860 | 488 | Ashhorth | explorat | TION LTD. | 52 | H : J | : |
| EBADIE # | Cu | ₽a | Ze | ₽z | Au | Rs | | | |
| | זגפב | 95M | com | 002 | 593 | 202 | | | |
| 27-86-1 25 1 | 122 | 22 | 55 | .8 | nc | r.s | | | |
| 0T- <u>86-1 8</u> 5 2 | 5 | <u>2</u> 7 | 62 | .6 | rđ | nc | | | |
| 97-86-1 RS 6 | 1.22 | 21 | 72 | . 4 | 2999 | <u>4</u> | | | |
| PT-86-1 85 9 | 1378 | 22 2 | 85 | .5 | :52 | 4 | | | |
| PT-86-1 RS 13 | 296 | 15 | 35 | . 4 | nd | 4. | | | |
| 27-86-1 RS 15 | 35 | 10 | 43 | .5 | 7 0 | nd | | | |
| PT-66-1 RS 16 | 11 | 21 | 15 | . 4 | 23 | n:: | | | |
| PT-86-1 RS 18 | 44 | 25 | 45 | .2 | 66 | 4 | | | |
| PT-85-1 RS 19 | 16600 | 34 | 210 | 14.8 | 852 | nci | | | |
| 97-85-1 R 5 54 | 121 | 17 | 51 | .5 | nc | 4 | | | |
| PT-86-1 55 5 | 269 | <u>-</u> 4 | 111 | • | 15 | 22 | | | |
| PT-65-1 5S 6 | 296 | 25 | 59 | .3 | 12 | | | | |
| 97-86-1 SS 11 | 125 | 23 | 92 | .2 | 3 9 | 40 | | | |
| PT-36-1 55 12 | 51 | 15 | 51 | . 4 | 22 | 18 | | | |
| PT-66-1 SS 14 | 6 | 10 | :5 | .3 | ΞØ | 2 | | | |
| PT-86-1 SS 17 | 140 | :7 | 75 | nd | 25 | 10 | | | |
| PT-85-1 SS 48 | 145 | 22 | 98 | nd | <u>:</u> 2 | 20 | | | |
| PT-66-1 SS 50 | 93 | 22 | 75 | .3 | 29 | 42 | | | |
| 27-85-1 SS 51 | :25 | 22 | 53 | .1 | 10 | 12 | | | |
| PT-85-1 SS 53 | 12 | 10 | 24 | .3 | 5 | 4 | | | |
| 27-85-1 68 55 | 82 | 20 | 66 | .1 | 5 | 30 | | | |
| PT-86-1 55 56 | 155 | 28 | 101 | .5 | 12 | 18 | | | |
| 27-86-1 38 57 | 145 | 25 | 49 | nd | Зð | 12 | | | |
| PT-86-1 99 58 | 178 | 23 | 59 | .3 | 25 | 19 | | | |
| 97-86-1 SILT 3 | :49 | 17 | 86 | nd | 28 | 18 | | | |
| | | | | | | | | | |

186 25 80 .1 20 185 20 82 rd 20 161 20 80 rd 20 86 21 100 .1 15 86 15 60 .1 13

PT-85-1 SILT 4 97-36-1 SILT 7 PT-86-1 SILT 12

57-85-1 SILT 49 PT-86-1 SILT 52

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> DETECTION LIMIT 1 2 1 2.1 5 2 nd = mone detected -- = not analysed is = insufficient sample

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APPENDIX B

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ITEMIZED COST STATEMENT

APPENDIX B

ITEMIZED COST STATEMENT

| Wages | | |
|--|-----------|---------|
| Geologist, Sept. 23/86 1.5 days @ \$225/day (incl. mob and demob) | \$ | 337.50 |
| One Geological Technician, Sept. 23/86 1.5 days @ \$150/day (inc. mob and demob) | | 225.00 |
| Food and Accommodation | | |
| Sept. 23/86, 2 man days @ \$60/day | | 120.00 |
| Transportation | | |
| Truck Rental and Fuel, 1 day @ \$90/day \$ 90.00 Ferry fees 35.00 | | 125.00 |
| Analysis | | |
| All samples analyzed for Cu, Pb, Zn, Ag, Au, As | | |
| 13 soil samples @ \$12.85/sample\$167.0510 rock samples @ \$16.75/sample167.507 silt samples @ \$12.85/sample89.95 | | 424.50 |
| Materials | | 75.00 |
| Filing Fees (10 units @ \$5.00/unit) | \langle | 50.00 |
| Report and Drafting | | 150.00 |
| TOTAL | \$1 | ,507.00 |

APPENDIX C

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STATEMENT OF QUALIFICATION

APPENDIX C

STATEMENT OF QUALIFICATION

I, ELIZABETH A. SCROGGINS, of P.O. Box 1457, Station A, Vancouver, B.C., V6C 2P7 do hereby state that:

- 1. I am a graduate of The University of Western Ontario, in London, Ontario with a B.Sc.(Hon) degree in Geology, 1986.
- 2. I have actively pursued my career as a geologist for four years in Ontario, Alberta and British Columbia.
- 3. I have no direct or indirect interest in the property or securities of Victoria Diego Resource Corporation, nor do I expect to receive any such interest.

Respectfully submitted:

Elizabeth A. Scroggins, B.Sc. (Hon) ASHWORTH EXPLORATIONS LIMITED

Dated at Vancouver, B.C. October 15, 1986



LEGEND Triassic Karmutsen Formation : basaltic lava, pillow lava, tuff. Cretaceous Nanaimo Group : shale, siltstone, sandstone. Tertiary Intrusions : quartzdiorite - granodiorite porphyry. Geology by H. Laanela, Gunnex Ltd, 1965.

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2

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| | Outcrop from 1986 mapping |
|------------------------|--|
| | Geological contact |
| ~~~~ | Fault |
| 🗖 LuCuP. | Legal claim post |
| | Claim boundary (approximate) |
| == = = = | Road |
| 014 | Silt sample site and number |
| Х З | Soil sample site and number |
| All sample r | numbers have prefix PT-86-1 |
| ∆15 | Rock sample site and number |
| 0 100 200 ⁶ | 300 (200 4300 500 700 800 900 1000 metres |
| - ta | Sister Clogo NT REPORT |
| Contor | in the first of the trest of th |
| · · · · · | |

DIF RESOURCE CORPORATION PAT I CLAIM

ALBERNI MINING DIVISION, B.C.

SAMPLE LOCATION AND GEOLOGY MAP

| Design by: | L.S. | Date : | OCTOBER 1986. |
|------------|-------|--------|---------------|
| Drawn by : | J. S. | Map : | 3 |

Ashworth Explorations Limited



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| | LEGEND |
|-----------------|--|
| □ L C P | Legal claim post |
| | Claim boundary (approximate) |
| | Road |
| 0 | Silt sample site |
| × | Soil sample site |
| 165/2/108 | Cu ppm, Pb ppm, Zn ppm |
| Δ | Rock sample site |
| 0 100 200 | GEQUE 90G LOC ADOL BED ROA NOOL Metres 300 Scale 1 10400 CN TREPORT |
| Conta | innerval 40 metres. |
| V RESOL | DIEGO |
| F | PAT I CLAIM |
| ALE | BERNI MINING DIVISION, B.C. |
| GEOCH | HEMICAL SURVEY |
| COPPER, | LEAD, ZINC RESULTS |
| Design by: L.S. | Date: OCTOBER 1986. |
| | |
| Ashworth | Explorations Limited |



| | LEGEND | | | | | | |
|-----------------------------------|--|--|--|--|--|--|--|
| 🗖 L.C.P. | Legal claim post | | | | | | |
| | Claim boundary (approximate) | | | | | | |
| | Road | | | | | | |
| 0 | Silt sample site | | | | | | |
| x | Soil sample site | | | | | | |
| 0.2/5 | Ag ppm, Au ppb | | | | | | |
| Δ | Rock sample site | | | | | | |
| 0 100 200 A S Contou | 300 400 500 600 700 800 900 1000 metres Scale 1 40 GOAL BRANCH r interval 40 metres. | | | | | | |
| RESOU | ROE CORPORATION | | | | | | |
| | AT I CLAIM | | | | | | |
| GEOCH | EMICAL SURVEY | | | | | | |
| SILVER, GOLD RESULTS | | | | | | | |
| Design by: L.S. Drawn by: J.S. | Date: OCTOBER, 1986. Map; 5 | | | | | | |
| Ashworth | Explorations Limited | | | | | | |

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