

ASSESSMENT REPORT  
ON  
GEOLOGICAL AND GEOCHEMICAL WORK  
ON THE  
BB - 12 CLAIM  
LOCATED  
20 AIR-KILOMETERS NORTHEAST OF  
PORT COQUITLAM, B.C  
N.T.S. 92G/7E  
NEW WESTMINSTER MINING DIVISION  
FIELD WORK - JANUARY 8, 1981

ON BEHALF OF  
RODEO RESOURCES LTD.  
SUITE 1004 - 595 HOWE STREET  
VANCOUVER, B.C.

DATE SUBMITTED  
February 11, 1981

REPORT BY:  
DR. W.D. GROVES, P. ENG.  
ARCHAEAN RESOURCES CORP.  
152 - 890 W. PENDER ST.  
VANCOUVER, B.C.

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## INTRODUCTION

### a) Location, Access, Geography

The BB-12 claim is located on the mountainous west side of Pitt Lake, B.C. approximately 5 km. north of the boat launch at Grant Narrows (where the Pitt River drains the lake in the New Westminster Mining Division). The claim borders Pitt Lake to the south, the BB-13 claim to the north, and the MAC-6 claim to the east and the BB-11 claim to the west.

Access to the property is by skiff from the boat launch at Grant Narrows at the south end of the lake, or by water taxi up the Pitt River from the Pitt River Bridge. Nearest town is Haney, some 35 km east of Vancouver on Highway 7. A Bell 207 helicopter is stationed at Pitt Meadows 5 km west of Haney, conveniently close to the property.

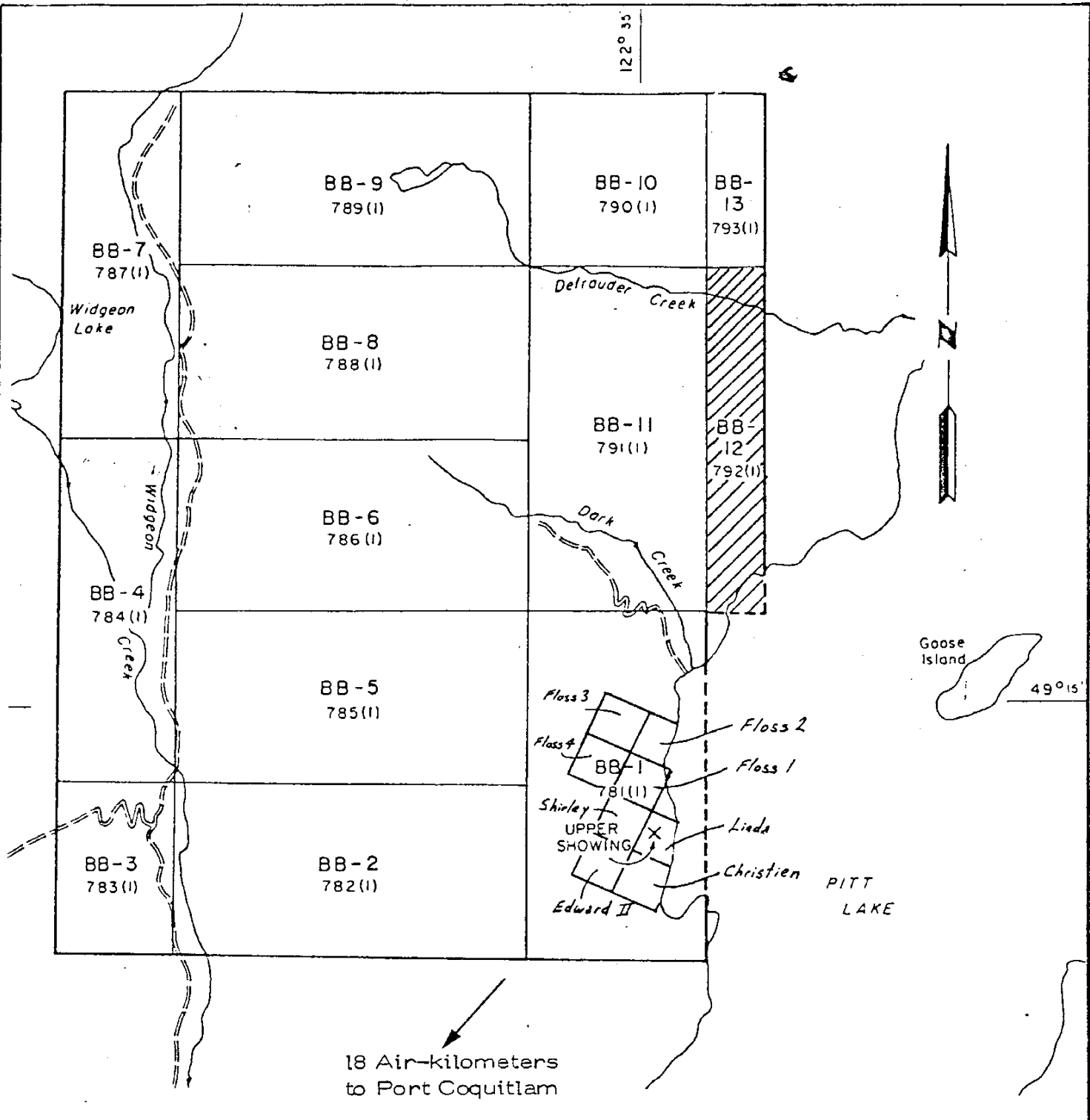
The claim lies between lake elevation, a few meters above sea level (Pitt Lake is tidal), to 800 m. elevation on the top of the mountain overlooking Defrander Creek (to the north). A small, unnamed lake at about 370 metres elevation is drained by a southward flowing creek named for identification purposes in this report, Inlyer Creek, since its drainage drains the Inlyer on Roddick's map in the area.

### b) Status of Property

This report covers the following claim:

<u>Name</u>	<u>Record No.</u>
BB-12	792 (1)

122° 35'



N.T.S. 92 G/7E

NEW WESTMINSTER MINING DIVISION

FIG. 1

RODEO RESOURCES LTD.

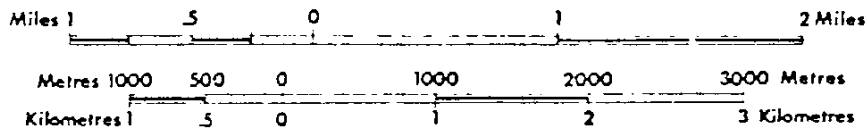
LOCATION MAP

OF

BB CLAIMS

*W.D.G.*

Scale 1:50,000



18 Air-kilometers  
to Port Coquitlam

The claim is within the New Westminster Mining Division. N.T.S. is 92G/7E. There are 6 units in the claim block arranged one on top of the other, north-south.

It is the author's understanding that the claim is under option to Rodeo Resources Ltd., Suite 1004 - 595 Howe Street, Vancouver, British Columbia.

c) History of Property

Mr. E.A. Richardson of Pitt Meadows, B.C. and various partners have worked/held various claims in the area since 1934. The author had the opportunity of discussing the area with him and his son Mr. E.C. Richardson. There is an old 15 m. long tunnel driven west  $30^{\circ}$  north into a crossfault following a sheared amphibolite dyke in a joint plane at the lakeshore on the southernmost unit of the BB-12 claim block. The adit enters a 150 feet vertical face of a massive granodiorite east-facing cliff on the lakeshore at this point. It was driven by Jim Baily about 1934, according to Mr. E.A. Richardson.

d) Summary of Work Done

The 1980 program, as directed by the author, was as follows.

1. An old 15 meter long tunnel driven west  $30^{\circ}$  north into a crossfault at the lakeshore on the southernmost unit of the claim block was sampled by the author. A sample was taken of mixed shear and quartz vein material in the fault at the tunnel mouth, and assayed for gold-silver.
2. A reconnaissance traverse was made up the creek draining the small lake on the BB-12 claim. A short geochemical sample line was run with 5 stations at 25 meter intervals across the valley of this creek at the 330 meter contour with station 4 in the creek. Line direction was north  $50^{\circ}$  east starting southwest of the creek. Materials sampled were 'B' horizon soil, talus fines and silt sediments. They were analysed for gold and silver content.

e) References

1. Vancouver North, Coquitlam and Pitt Lake Map Areas, British Columbia, G.S.C. Memoir 335, J.A. Roddick, 1963.
2. B.C. Minister of Mines Reports, 1947 and 1950.

REGIONAL GEOLOGY

The claim is underlain by various facies of Coast Plutonic rocks - mostly Roddick's unit 4H, a hornblende diorite, with a very prominent massive suborthogonal joint set. An inlyer of high grade regional metamorphic hornblendite and other metasedimentary facies extends south-southeast into the claim just west of the small lake, and into the creek. Topography is moulded by the extreme recent southward glaciation down Pitt Lake Valley (once a fjord, now back filled with Fraser Valley sediments to 1/3 way up Pitt Lake). Block plucking and rounding of the jointed diorite has accentuated surface exposure of the jointing pattern, which shows up dominantly on lake shore cliffs as well as high south - facing cirques in the Widgeon Creek area south of the claim. Except where cliffs preclude it, the whole region is heavily timbered. Large jumbles of blocks from cliffs have been formed by post glacial ice-wedging of the joints in the massive diorite. In some instances  $N15^{\circ}E$  and  $N20^{\circ}W$  joints have been invaded by narrow amphibolite dykes which have been highly sheared, showing minor fault movement. Locally the same thing has happened to a  $W30^{\circ}N$ /steep joint set explored by the old adit on the lakeshore in the southernmost unit of the claim.

PROPERTY GEOLOGY

Lithology - Lithology of the intrusive rocks constitutes varieties of hornblende diorite.

Structure - Main structures of interest is the  $W30^{\circ}N$ /steep fault explored by the lake adit, and the north-northwest trending inlyer just west of the little lake.

Mineralization - Potentially economic mineralization is vein quartz-pyrite and shear material in the W30°N/steep fault on the lakeshore (sampled for gold and silver).

#### RESULTS OF WORK PROGRAM

Assay results for gold and silver from the tunnel mouth indicated negligible gold and silver values. Results of the 5-station geochemical traverse across the creek valley just east of the little lake, on the rim of the hill (where erosion products of the inlyer would occur), also gave negligible results for gold and silver. (See Assay Sheets, Appendix III.)

#### INTERPRETATION OF RESULTS - RECOMMENDATIONS FOR FURTHER WORK

The geochemical sampling results from the creek valley traverse were negative. The conclusion is that the sulphide halo around the inlyer crossing the claim does not carry a significant amount of precious metals. Although this is not entirely conclusive of a lack of mineralization in the BB-12 claim, it is recommended that no further work beyond prospecting be undertaken.

Work on adjacent claims has shown that sheeting joints in the diorite invaded by narrow amphibolite dykes which sheared, then faulted, are structures most likely to host mineralized zones of interest. Prospecting efforts should focus on finding and investigating such structures.

*Respectfully submitted*  
*William D. Groves.*  
*Feb 11/81.*

APPENDIX I

COST STATEMENT - GEOLOGICAL

AND GEOCHEMICAL WORK

Personnel Costs:

Dr. W. D. Groves, P. Eng., Geological Engineer	
1 day fieldwork, property examination, Jan. 8, 1981.	
1½ day report preparation, February, 1981.	
Total of 2½ days @ \$200/day	\$ 500.00
C. Charron, assistant	
1 day field work, Jan. 8, 1981	
1 day @ \$75/day	75.00

Assay Costs:

7 Geochem Ag and Au assays by Acme Analytical Laboratories.	
7 samples @ \$5.05/sample plus \$15 surcharge	50.35
1 Au, Ag assay by General Testing Laboratories	
1 sample @ \$10.25/sample	10.25

Report Costs:

Typing - Word Processor	
2 hours @ \$25/hour	50.00
Drafting and Reproduction Costs	65.00

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TOTAL \$ 750.00

W.D.G.



APPENDIX II

Certificate

I, William D. Groves, do hereby certify that:

1. I, William D. Groves am a consulting engineer (geological) with an office at #152-890 W. Pender, Vancouver, B.C.
2. I am a graduate of the University of British Columbia (B.A.Sc. in Geological Engineering, 1960). I am a graduate of the University of Alberta, B.Sc. in Chemical Engineering in 1962, and of the University of British Columbia with a Ph.D. in Chemical Engineering in 1971.
3. I am a registered Professional Engineer in the Province of British Columbia.
4. I have practiced by profession since 1960.
5. I examined the BB-12 claim, Pitt Lake area, on January 8, 1981.
6. I have no direct, indirect or contingent interest in the Pitt Lake property of Rodeo Resources Ltd., nor do I beneficially own, directly or indirectly, any securities of Rodeo Resources Ltd., nor do I intend to receive any such interest.

Respectfully submitted,



Dr. W.D. Groves, P. Eng.  
February 11, 1981

APPENDIX III

Assay Certificates



To: Rodeo Res.,  
c/o Dr. Groves,  
152 - 890 W. Pender St.,  
Vancouver, BC.

File No. 81-0022

Type of Samples Soil

Disposition

GEOCHEMICAL ASSAY CERTIFICATE

SAMPLE No.	Ag	Au																			
SED 1 (S)	.1	.005																			1
2	.2	.005																			2
3	.1	.005																			3
4 A	.2	.005																			4
4 B	.1	.005																			5
SED 5	.1	.005																			6
																					7
INL 1	.2	.005																			8
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All reports are the confidential property of clients  
All results are in PPM.

DIGESTION:.....

DETERMINATION:.....

DATE SAMPLES RECEIVED Jan. 9, 1981

DATE REPORTS MAILED Jan. 14, 1981

ASSAYER

DEAN TOYE, B.Sc.  
CHIEF CHEMIST  
CERTIFIED B.C. ASSAYER

*W.D.G.*

# General Testing Laboratories

A Division of SGS Supervision Services Inc.

1001 EAST PENDER ST., VANCOUVER, B.C., CANADA, V6A 1W2  
 PHONE (604) 254-1647 TELEX 04-507514 CABLE: SUPERVISE



TO:  
 RODEO RESOURCES  
 c/o Dr. Groves  
 #152 - 890 West Pender Street  
 Vancouver, B.C. Canada

## CERTIFICATE OF ASSAY

No.: 8101-0950      DATE: Jan. 13/81

We hereby certify that the following are the results of assays on: Submitted Ore Samples

MARKED	GOLD	SILVER					
	oz/st	oz/st					
N - 1	0.002	0.62					
N - 2	0.014	trace					
N - 3	0.002	trace					
N - 4	0.002	trace					
S - 1	0.002	trace					
L Adit	0.002	trace					
CS - Fig. 2. w29.							
D. 8101-1251							
50-1 - Vein & Ass.	0.076	trace					
50-2 - 972 Vein	0.062	trace					

ASSAYED

REJECTS RETAINED ONE MONTH. PULPS RETAINED THREE MONTHS. ON REQUEST PULPS AND REJECTS WILL BE STORE FOR A MAXIMUM OF ONE YEAR.

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*L. Wong*  
 L. Wong

*W.D.G.*  
 PROVINCIAL ASSAYER

Analytical and Consulting Chemists, Bulk Cargo Specialists, Surveyors, Inspectors, Samplers, Weighers

MEMBER: American Society For Testing Materials • The American Oil Chemists Society • Canadian Testing Association  
 REFEREE AND OR OFFICIAL CHEMISTS FOR: National Institute of Oilseed Products • The American Oil Chemists' Society  
 OFFICIAL WEIGHMASTERS FOR: Vancouver Board Of Trade



LEGAL POST

BB-12

Defrauder Cr.

Logging Road

Projected position of In/yer

Small Lake

2000'  
(616m)

SAMPLE TRAVERSE } W TO E, EVERY 25 m.  
SED 1 to SED 5  
SED 4A & 4B FROM CREEK

500'  
(154m)

1500'  
(462m)

PITT LAKE

1000'  
(308m)

SAMPLE INK 1

FAULT & ADIT  
W 30° N

ADIT IS ON THE LAKE SHORE

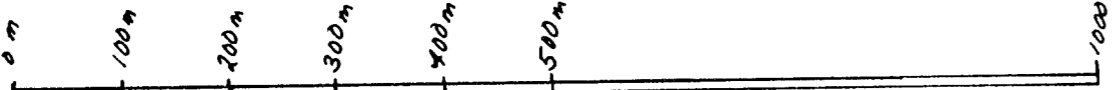
SAMPLE "L-ADIT"

Au: 0.002 oz./ton  
Ag: 0.62 oz./ton

Geochem

ASSAY - SAMPLES

SAMPLE NO.	Ag (ppm)	Au (ppm)
SED 1 (S)	.1	.005
2	.2	.005
3	.1	.005
4A	.2	.005
4B	.1	.005
SED 5	.1	.005
INK 1	.2	.005



SCALE: approx: 1:7,000

FIG. 2 - TRAVERSE MAP  
BB-12 CLAIM  
NEW WESTMINSTER M.D.  
N.T.S. 92/617E  
by W.D. Groves, P. Eng.