



41P12SE0518 13 GROVES

010

DIAMOND DRILLING

Township: Groves

Do
Report No: 13

WORK PERFORMED FOR: Canadian Gold Resources Inc.

RECORDED HOLDER: SAME AS ABOVE []

: OTHER []

<u>CLAIM NO.</u>	<u>HOLE NO.</u>	<u>FOOTAGE</u>	<u>DATE</u>	<u>NOTE</u>
P 806583	PL-86-01	437	Feb/86	(1)

NOTES: (1) #243-86

GEOLOGICAL REPORT

on

DIAMOND DRILLING PROGRAM

in

PENSYL LAKE AREA

of

GROVES TOWNSHIP
PORCUPINE MINING DIVISION

for

CANADIAN GOLD RESOURCES INC.

May 30, 1986

JRB/lb

by JOHN R. BOISSONEAULT

Geologist, Engineer

INTRODUCTION

The following is a report on the results of a diamond drilling program, carried out in the vicinity of Pensyl Lake, in Groves Township in the Porcupine Mining Division of north-eastern Ontario, by Canadian Gold Resources Inc.

The decision to carry out subsurface exploration in this area, was based upon three factors. First, two airborne geophysical surveys had indicated anomalous conductivity, in the central portion of Pensyl Lake, and at its eastern end, and the area immediately to the east. Secondly, the region had been mapped by G.M. Siragusa of the Ministry of Natural Resources, and the area of interest was shown as covering the northern limb and central portion of the Swayze Syncline, a structure considered to be favourable for the occurrences of mineral deposits. Finally, two mineral occurrences to the east of Pensyl Lake, were observed; these consist of cherty quartz veins, up to 9 feet wide, and grading up to 0.15oz/ton gold.

The program was planned in late 1985, and carried out in January and February of 1986; in conjunction with NOREX (Noranda Exploration Co.). Surface geophysics, consisting of H.E.M. and V.L.F. surveys, were carried out along north-south lines, 200 feet apart, in the anomalous area, in order to locate the two conductors with accuracy. A series of diamond drill holes, was then completed, in order to test the anomalies and explore the subsurface, in the vicinity of the showings east of the lake. Six holes were put down, having a total length of 2,092.5 feet.

The core was logged, and selected sections were split for analysis, during the time that the drilling was done, and in March.

The results of the program are discussed in this report and recommendations are made for additional exploration, in this area.

DRILLING RESULTS

Hole #1 (PL-86-01)

This hole was collared at 50 feet south, on line 14 + 00 east, and drilled northward at -50° , for a length of 437 feet. Its purpose was to test an electromagnetic anomaly, crossing the central portion of the lake in an east-west direction, for a distance of in excess of 1,200 feet.

The hole passed through a section of graphitic tuffs, between 216 feet and 297 feet, which accounts for the conductivity. This section and the section above it, was highly sheared and altered, with ferrodolomite, fuchsite and silica, and contained two phases of quartz veining with disseminated sulfides. Unfortunately, the core analysis failed to yield gold content above 0.003 oz/ton.

Hole #2 (PL-86-02)

This hole was collared at 300 feet south, on line 37 + 00 east, and drilled northward at -50° , for a length of 354 feet. Its purpose was to test, what was assumed to be, the faulted

eastern extension of the conductor previously referred to. This anomaly crossed the eastern edge of the lake, extending eastward, its length being, in excess of 800 feet.

The hole passed through a section of graphitic tuffs between 194' and 234' and graphitic seams between 292' and 309', again accounting for the broad zone of electromagnetic conduction. These sections and the one above 194', were altered and mineralized in a similar fashion to the sections in Hole #1. The difference in the lithology above and below the graphitic zones, however, suggests that they lie along a different geologic horizon, to the south of the section cut by Hole #1.

Hole #3 (PL-86-03)

This hole was collared at 1,400 feet south, on line 47 + 00 east, and drilled northward at -45° , for 353 feet. It was designed to intersect a zone of cherty quartz mineralization, in an altered volcanic section, which was exposed at surface, and contained values up to 0.15 oz/ton gold.

The drill hole passed through this section between 188' and 193.5', and showed that it lies within a broad zone of hydrothermally altered volcanics, containing ferrodolomite, introduced silica and fuchsite along with disseminated sulfides from 143' to 232'. Unfortunately, analysis of split core samples, failed to show values exceeding 0.002 oz/ton gold.

Hole #4 (PL-86-04)

This hole was collared at 1,350 feet south, on line 44 + 00

east, and drilled northward at -50° , for a length of 345 feet. Its purpose was to test the same section as Hole #3 further west and higher in structure. This it accomplished, cutting the cherty quartz zone from 246' to 254' and the section of hydrothermal alteration from 165' to 285'. Again, analysis of split core samples, failed to show gold values above 0.002 oz/ton.

Hole #5 (PL-86-05)

Hole #5 was collared at 1,100 feet south, on line 52 + 00 east, and drilled southward at -45° , for 310 feet. Its purpose was to test a zone at the surface where a cherty "iron formation" was reported to contain low gold values, and the eastern extension, of the section cut in Hole #3.

This hole intersected a metasedimentary section with strong hydrothermal alteration from 180' to 229' but it failed to encounter the mineralization at surface, or the cherty quartz zone, cut in Holes #3 and #4.

Hole #6 (PL-86-06)

This hole was collared at 1,800' north, on line 18 +00 east, and drilled southward at -45° , for 293.5 feet. It was designed to intersect surface mineralization, containing base metal and low gold values. This it failed to do, instead, it cut through a section of barren mafic volcanics.

CONCLUSIONS

The diamond drilling program carried out in the vicinity of Pensyl Lake, has indicated the following:

First, the two zones of electromagnetic conductivity in the lake, are caused by graphitic tuffs, associated with quartz-carbonate veining and sulfide mineralization, but the gold content is too low to be of economic importance.

Secondly, both of these zones lie within, and to the north of, sections of hydrothermally altered felsic tuffs and breccias, which are sparsely mineralized, and carry low gold values.

Thirdly, a large area of hydrothermal alteration, containing ferrodolomite, fuchsite and introduced silica, in the meta-volcanics, tuffs, and metasediments, lies under the eastern part of Pensyl Lake and extends eastward for at least 1,200'. This alteration was encountered in the tops of Holes #2 and #5, in the lower half of Hole #3, and in most of Hole #4. Several sections of cherty quartz lie within this area, and although the drill holes which intersected one of these, did not yield significant gold values, gold values were obtained on surface in at least two localities.

Fourthly, the area referred to, in the previous paragraph, is bounded to the south by a diorite intrusive, and to the north by graphitic tuffs, both good marker horizons, and is covered by thin overburden, in most places.

Since the large altered area has only been partially explored, and only along its edges, it is my opinion, that there is still considerable encouragement for further exploration,

and that these efforts should be concentrated in the area east of Pensyl Lake, between 300' south and 1300' south, of the base line.

RECOMMENDATIONS

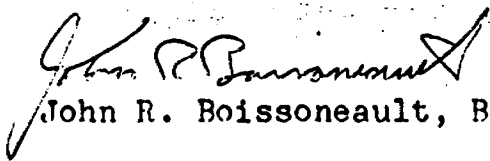
I recommend that the company plan a program of surface stripping, in altered areas referred to in "Conclusions". This would involve bulldozer and backhoe work and hydraulic stripping. A series of cuts should be made in a north-south direction, starting from outcrop areas, as far as the depth of overburden allows. The exposed areas should then be sampled and analysed for gold content.

A geochemical survey should be conducted over areas of deeper overburden, in conjunction with the stripping program.

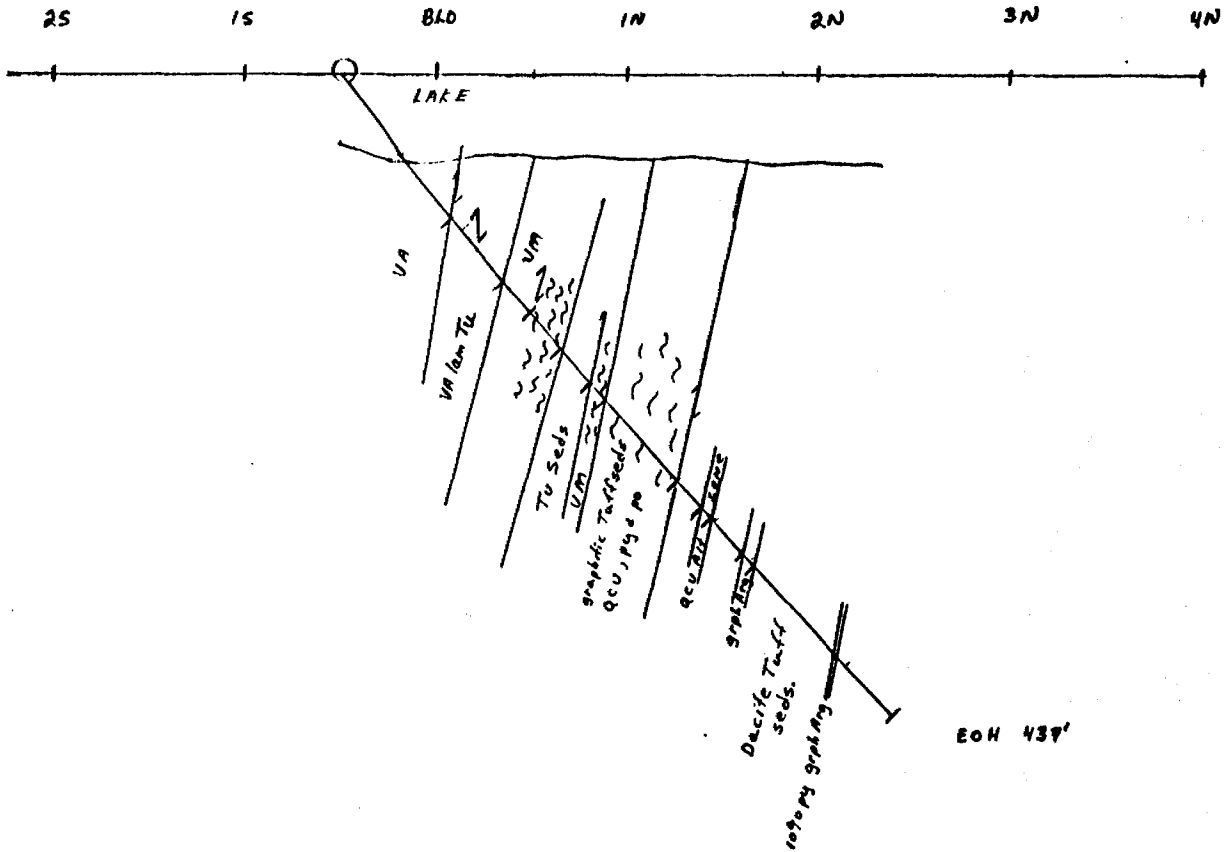
This work will require that a tractor road be put in, from Makwa in Champagne Township to the south, a distance of about 7 or 8 miles.

I also recommend, that all the core in Holes #2, #3, #4 and #5, be split and analysed for gold content.

Submitted by


John R. Boissoneault, B.Sc. P.Eng.
Geologist, Engineer

PL-86-01



Pensyl Lake Property
Section 14+00 E
Hole PL-86-01
Scale 1" = 100'
Groves Twp. Mar 1986
Drawn by T.B.

CANADIAN GOLD RESOURCES - GROUES TWP. - PENSYLLAKE PROJECT

INCLINATION TESTS

DEPTH	DIP	DEPTH	DIP	DEPTH	DIP
COLLAR	-50	0	-46°	437'	

HOLE NO: PL-86-01

SHEET 1

LOCATION: GRID: ELEVATION:

PROJECT: PENSYL - LAKE

LENGTH: 437' HORIZ: 14+00 VERT: 0+50' AZIMUTH: 0° CORE SIZE: BQ

STARTED: ~~Feb 1/86~~ Feb 5/86

RECOVERY: LOGGED BY: J. BOISSONEAULT DATE: FEB 28, 1986

FINISHED: ~~Feb 1/86~~ Feb 8/86

FROM	TO	DESCRIPTION	ANALYTICAL RESULTS									
			SAMPLE	FROM	TO	LENGTH	Cu (ppm)	Zn (ppm)	Ag (ppm)	Au (ppb)		
0	53	CASING - LAKE										
53	133	MED. GRAINED ANDESITE, WEAKLY FOLIATED 45° SLIGHTLY TO MODERATE CARBONATIZATION, SLIGHTLY CHLORITIC INCREASING DOWN SECTION. QZ-CARB. STRINGER AND SPECKS OF PYR. + PYRR.	14101	97.3	98.4	0.6'			.06	.001		
		92-133 TUFFACEOUS SECTIONS, WELL LAMINATED 25-40°, QZ-CARB. STRINGERS WITH MINOR CRY + PYRR. SEVERAL PLACES BANDS OF PYRITE - 126', FRAG. TEXTURES NEAR BOTTOM	14102	110	110.5	0.5'			.02	.001		
133	178	ULTRAMAFIC, HIGHLY CHLORITIC, SOFT TALCOSE, FOLIATED, 45° HIGHLY SHEARED SECTIONS WITH MINOR PYR. PYRR. CRY. BECOMING MORE HIGHLY ALTERED DOWN SECTION. CARBONATIZATION, FUCHSITE, PYR.	14103	147	147.4	.4			.06	.001		
		147-147.5 CHERTY SECTION, FINE PYR., QZ. STRINGERS.	14104	154.8	157.6	2.8			.01	.001		
		147-178 - AMYGDALOIDAL, NO SHEARING	14105	157.6	160.0	2.4			.01	.001		
178	204	FELSIC TUFFS, TEXTURE VARIES FROM WELL LAMINATED TO MASSIVE LIGHT GREENISH GREY COLOUR WITH THIN BANDS OF GREEN CHLORITE SEAMS OF FUCHSITE, BROWN CARBONATE (FERRUDOLOMITE) AND SERICITE IN SHEARED AREAS 55° INCREASING NEAR BOTTOM OF SECTION										
204	216	ULTRAMAFIC, HIGHLY CHLORITIC, SOFT (133-178)										
216	297	GRAPHITIC TUFFS, HIGHLY SHEARED AND ALTERED IN SOME SECTIONS WITH CARBONATIZATION (FERRUDOLOMITE) AND CONSIDERABLE FUCHSITE SILICIFIED AREAS. UNALTERED AREAS WELL LAMINATED DARK GREY.	14119	216	217.4	1.4			.01	.001		
		216-271 ZONE OF INTENSE QZ-CARB. WEINING WITH PYR. PYRR. AND PYRR. IN AREAS OF STRONG SHEARING AND BRECCIATION.	14106	217.4	222.0	4.6			.01	.001		
		TWO DEFINITE PHASES OF SILICIFICATION 1 ST WHITE QZ.	14107	222.0	228.0	6.0'			.04	.001		
		2 ND TRANSLUCENT BLuish GREY SILICA CONTAINING MINERALS	14108	228.0	233.2	5.2'			.01	.001		
		CORE ANGLES OF STRINGERS 50° TO 60°. GRAPHITIC SEAMS	14109	233.2	237.1	3.9'			.02	.001		
			14110	238.1	241.3	3.2'			.03	.001		
			14111	241.3	247.0	5.7'			.01	.001		
			14112	247.0	248.8	1.8'			.01	.001		
			14113	248.0	252.8	4.0'			.01	.001		
			14114	252.8	253.8	1.0'			.01	.001		
			14115	253.8	258.4	4.6'			.01	.001		
			14116	258.4	263.5	5.1'			.01	.001		
			14117	263.5	268.1	4.6'			.01	.001		
			14118	268.1	271.0	2.9'			.01	.003		
			14120	290.0	290.9	.9'			.04	.001		

ONTARIO GEOLOGICAL SURVEY
 DEPARTMENT FILED
 RESEARCH OFFICE
 AUG 20 1986
 RECEIVED

CANADIAN GOLD RESOURCES

INCLINATION TESTS

DEPTH	DIP	DEPTH	DIP	DEPTH	DIP
COLLAR					

HOLE NO: PL-86-01

SHEET #2

LOCATION: GRID: ELEVATION:

PROJECT: PENSVL LAKE

LENGTH: HORIZ: VERT: AZIMUTH: CORE SIZE:

STARTED: ~~Aug/85~~ FEB 5/86

RECOVERY: LOGGED BY: DATE:

FINISHED: ~~FEB/86~~ FEB 8/86

FROM	TO	DESCRIPTION	ANALYTICAL RESULTS							
			SAMPLE	FROM	TO	LENGTH	Cu (ppm)	Zn (ppm)	Ag (ppm)	Au (ppb)
			14181	290.9	291.4	.5			.01	.001
			14182	291.4	294.8	3.4			.01	.001
			14183	294.8	297.2	2.4			.03	.001
297	437	DACITIC TUFFS, WELL LAMINATED FINE TO MEDIUM GRAINED LIGHT GREENISH GREY, LIGHT SERICITIZATION THROUGHOUT, PINKISH LEUCOXENE IN SEVERAL PLACES. HIGHLY SILICEOUS SECTIONS SEVERAL BANNS OF GRAPHITIC ARGILLITES CONTAINING 10% - 15% PYRITE WITH SMALL AMOUNTS OF COP. TRACES OF SPHALERITE IN MORE SCHISTOSE SECTIONS, GENERALLY 50° - 60°. GRAPHITIC ARGILLITE 329-333 310-313, 321-337 390'-395'.	14124	393.2	395.0	1.8			.01	.001
		437' END OF HOLE								

J. R. Pinnard

ONTARIO GEOLOGICAL SURVEY
ASSESSMENT FILE
RESEARCH OFFICE
AUG 20 1985
RECEIVED

4

GROVES TP.
CLAIM # 806853
HOLE # PL-86-01
DIP-50° Length 437'

BQ



Pensyl LAKE

1



COLLAR LOCATED 370'
DUE NORTH OF #2 POST

3

2

24c
243/80
Grossed
Mining



41P12SE0518 13 GROVES

900

Name and Address of Recorded Holder
CANADIAN GOLD RESOURCES INC. (William Dickinson) T 985
20 Advance Blvd., Brampton, ONT. L6T, 4R7

Summary of Work Performance and Distribution of Credits

Total Work Days Cr. claimed A37	Mining Claim			Mining Claim			Mining Claim		
	Prefix	Number	Work Days Cr.	Prefix	Number	Work Days Cr.	Prefix	Number	Work Days Cr.
for Performance of the following work. (Check one only) <input type="checkbox"/> Manual Work <input type="checkbox"/> Shaft Sinking Drifting or other Lateral Work. <input type="checkbox"/> Compressed Air, other Power driven or mechanical equip. <input type="checkbox"/> Power Stripping <input checked="" type="checkbox"/> Diamond or other Core drilling <input type="checkbox"/> Land Survey	P	806583	37	P	806586	20	P	806595	20
		806578	20		806587	20		806596	20
		806579	20		806589	20		806597	20
		806582	20		806590	20		806598	20
		806584	20		806591	20		806588	20
		806585	20		806592	20			
	806580	20		806593	20				
	806581	20		806594	20				

All the work was performed on Mining Claim(s): **P-806583**

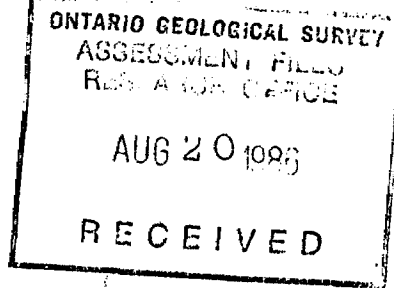
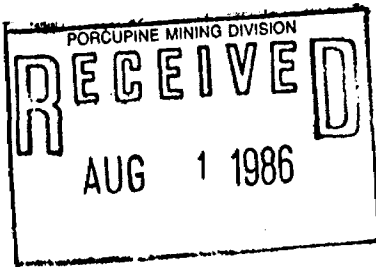
Required Information eg: type of equipment, Names, Addresses, etc. (See Table Below)

DRILLING Co. : Herb Funk Diamond Drilling
 P.O. Box 23
 Wawa, ONT.

EQUIPMENT : Longyear 34

RECORDED

AUG - 1 1986



Date of Report: **May 30, 1986**
 Recorded Holder or Agent (Signature): *[Signature]*

Certification Verifying Report of Work

I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.

Name and Postal Address of Person Certifying

JOHN R. BOISSONEAULT, 670 SPRUCE ST. NORTH
TIMMINS, ONT.

Date Certified: **JUNE 22, 1986**
 Certified by (Signature): *[Signature]*

Table of Information/Attachments Required by the Mining Recorder

Type of Work	Specific Information per type	Other Information (Common to 2 or more types)	Attachments
Manual Work	Nil	Names and addresses of men who performed manual work/operated equipment, together with dates and hours of employment.	Work Sketch: these are required to show the location and extent of work in relation to the nearest claim post.
Shaft Sinking, Drifting or other Lateral Work			
Compressed air, other power driven or mechanical equip.	Type of equipment	Names and addresses of owner or operator together with dates when drilling/stripping done.	
Power Stripping	Type of equipment and amount expended. Note: Proof of actual cost must be submitted within 30 days of recording.		
Diamond or other core drilling	Signed core log showing; footage, diameter of core, number and angles of holes.	Nil	Work Sketch (as above) in duplicate
Land Survey	Name and address of Ontario land surveyor.		Nil

