

74-500-0000

DIAMOND DRILL REPORT

MECCA GROUP

OLD TOM 1 & 2

OLD TOM 1 & 2 and HANKIN 1-16

OMINECA M.D.

B.C.

Latitude: 54° - 31' N

Longitude: 127° - 07' W

³
96L / 11E

MECCA MINERALS LTD.

VANCOUVER, B.C.

DRILLING BY:

CARDERO RESOURCES LTD.

7070

Alfred R. Allen, P.Eng.

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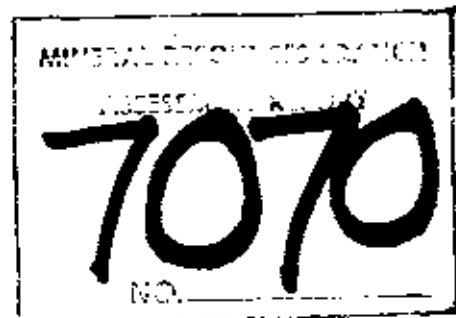
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DIAMOND DRILLING

ON THE

OLD TOM #1 M.C.

INTRODUCTION

The Mecca group of mineral claims is located 20 miles south of Smithers, B.C., on Goathorn Creek.

Access is via Highway #16 from Smithers to Telkwa then on the Hunter Basin road to Goathorn Creek and southerly up the creek to the Old Tom #1 claim.

The property is held by location by Mecca Minerals Ltd. of Vancouver, B.C. By agreement, Cardero Resources Ltd., optioned the property and conducted a diamond drill programme thereon.

Two BQW holes were drilled between February 12 and March 8, 1978, for a total of 182 metres. Core recovery was in excess of 90% and it is stored in boxes in the company warehouse in Smithers.

The purpose of the diamond drilling was to ascertain information pertaining to the mineral content of oxidized bands exposed on the steep cliffs along the east bank of Loring Creek, a tributary of Goathorn Creek.

GEOLOGY

The property is underlain by variegated red, maroon, brown, green, grey and black andesitic tuffaceous and rhyolitic volcanic rocks of the Telkwa formation - a part of the Lower to Middle Jurassic Hazelton group.

Extensive vaulting and shearing, along with granitic intrusives not far distant, and light coloured felsitic dykes, may have been source and control factors in the emplacement of copper-silver-iron deposits exposed on the property.

The mineralized bands conform with the low dipping volcanics. The principal minerals are pyrite, chalcopyrite, chalcocite, magnetite and lesser sphalerite and tetrahedrite, in a gangue of quartz, epidote, calcite, chlorite, micas and altered wall rocks.

DIAMOND DRILLING

A diamond drill contract was arranged with the J.T. Thomas Diamond Drilling Ltd., P.O. Box 394, Smithers B.C. V05 2N0.

The equipment produced BQW core for a total drilling length of 182 metres.

From drilling sites bulldozed along the top of the talus below the steep cliffs, an up-hole was drilled to investigate the mineralized zone indicated by copper and iron staining.

A down-hole was also drilled to prospect for possible zones of mineralization below the talus cover.

Copies of the diamond drill logs and assay reports are included in the pocket of this report.

DRILL RESULTS

D.D.H. #1-78

Up-hole at $+30^{\circ}$, directed N 50° E.

Total length 59.7 metres.

Penetrated grey to black andesite, nearly flat, and altered in bands.

One, 1m intersection at 5.3m, assayed 0.41% copper and 0.26 ounces per ton silver, with very low gold, zinc and cadmium content.

A second 1.9m intersection at 17.7m assayed 0.16% copper and 0.09 ounces per ton silver with very low gold and zinc content.

D.D.H. #2-78

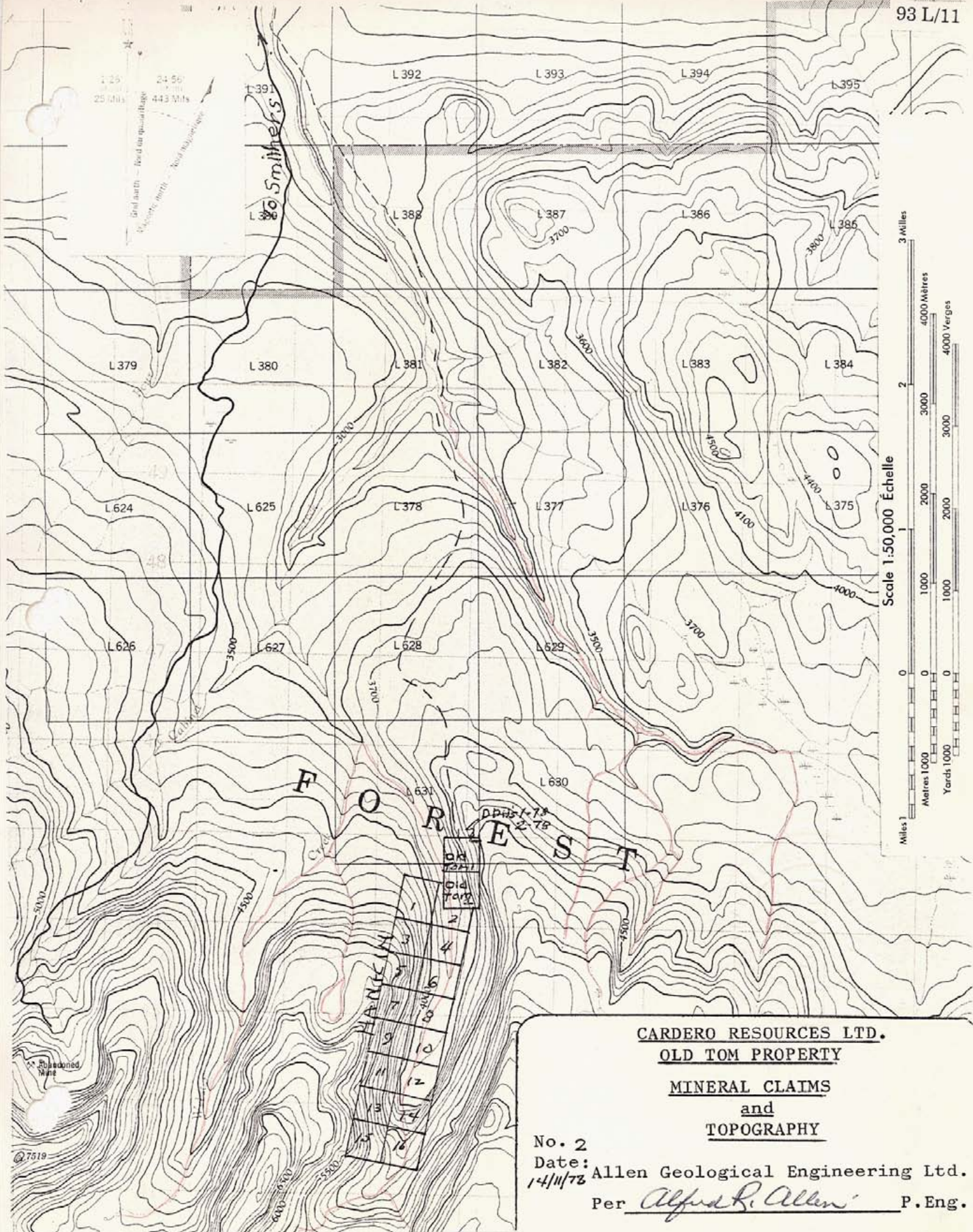
A -80° hole directed into the steep hillside at N 50° E.

Total length 122.5 metres.

Penetrated grey to black argillite, nearly flat, banded and altered.

At 3m, a 3m band of sulphides assayed 0.68% copper, 0.53 ounces per ton silver and 0.028 ounces of gold per ton.

At 90.5m two bands of mineralization assayed over 1.52m and 0.3m, 0.05 and 0.37% copper, and very low gold and silver.

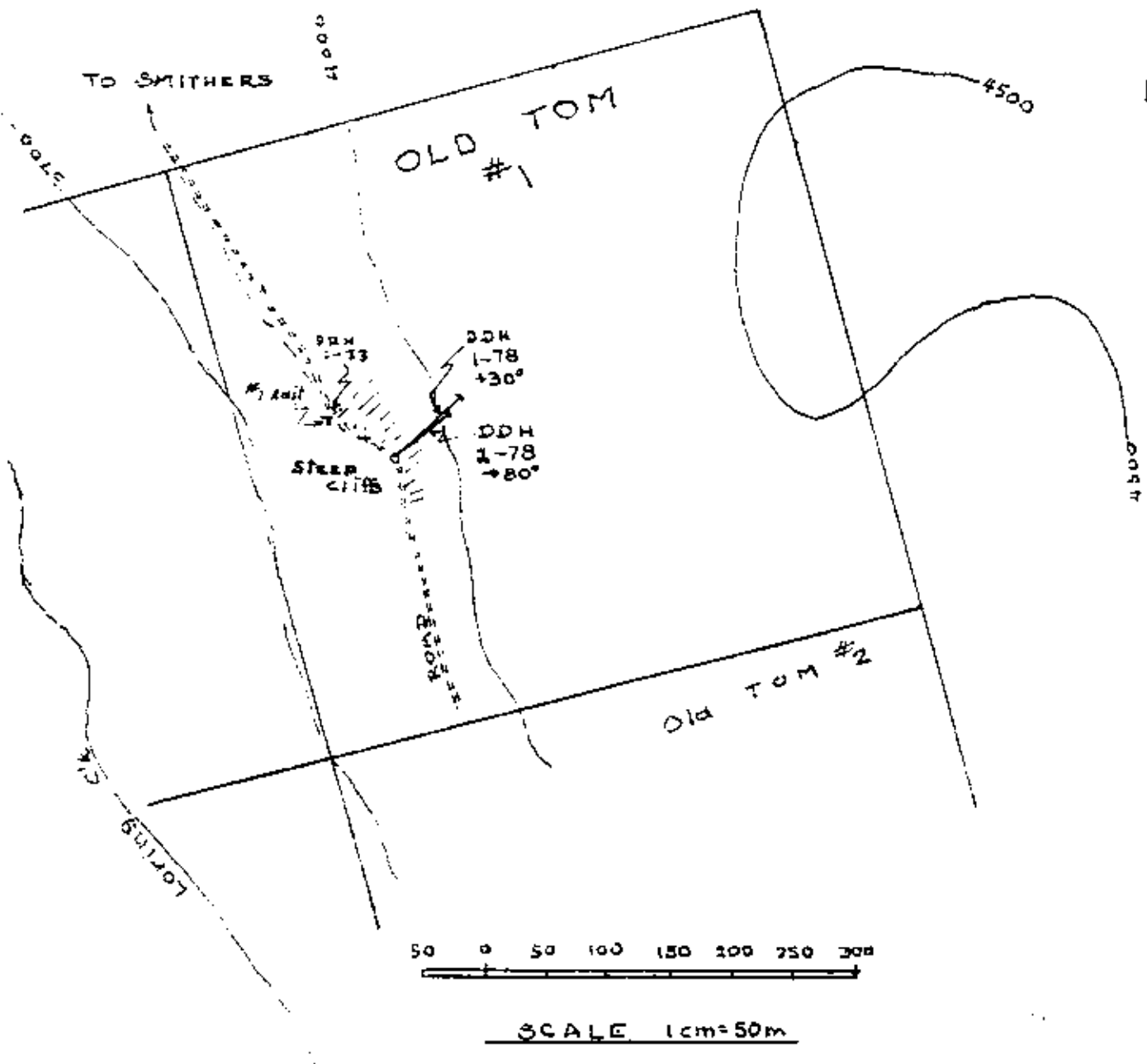


CARDERO RESOURCES LTD.
OLD TOM PROPERTY
MINERAL CLAIMS
and
TOPOGRAPHY

No. 2

Date: 14/11/78 Allen Geological Engineering Ltd.

Per Alfred R. Allen P. Eng.



No. 3 Cardero Resources Ltd.
Old Tom Property
DD Holes 1-78 & 2-78
11/1/79 Per Alfred K. Allen P. Eng.

RECOMMENDATIONS

The number, thickness and grade of the mineralized bands were not sufficient to warrant additional diamond drilling at the selected location. It is therefore recommended that no additional exploratory investigations be conducted over the property at this time by Cardero Resources Ltd.

Respectfully submitted,

ALLEN GEOLOGICAL ENGINEERING LIMITED

Per Alfred R. Allen P. Eng.
Alfred R. Allen

REFERENCES

Brown, D.H., Assessment Reports, Falconbridge Nickel Mines Ltd.
 B.C. Department of Mines No.'s 1810; 1875; 1880.

McAndrews, J.M., The Loring Creek Group
 1973-1974 Field Season
 Maharaja Minerals Limited (N.P.L.)

Lorimer, M.K. Geological Report, Maharaja Minerals, August 16, 1972.

Armstrong, J.E., G.S.C. Paper 44 - 23

Tipper, H.W., G.S.C. Map O.F. 351

* * * * *

COST STATEMENT

DIAMOND DRILLING - OLD TOM #1 CLAIM

FEBRUARY 12 - MARCH 8, 1978.

Alfred R. Allen, P.Eng., Engineer Feb 18 - 22/78 incl.	\$1,250.00
T. Thomas, Field Foreman, Feb 12 - March 8/78	2,160.00
Transportation - Vancouver - Smithers & return	227.70
Hotel, Smithers, Feb 12 - March 8/78	786.30
Bulldozing, access and site preparation D-6 with blade & winch @ \$42.50/hr	1,777.50
Diamond Drilling, by contract J.T. Thomas Diamond Drilling Ltd., Smithers @ \$15/ft.	8,970.00
Truck Rental 3/4 ton 4X4	485.82
Assaying, General Testing Laboratories, Vancouver	131.50
Office, telephone, accounting	216.00
Bank charges, U.I.C., C.P.P.,	114.46
	<hr/>
	\$16,119.28

Alfred R. Allen

GENERAL TESTING LABORATORIES

DIVISION OF SUPERINTENDENCE COMPANY (CANADA) LTD.

1001 EAST PENDER ST. VANCOUVER B.C. CANADA V6A 1W2
 PHONE (604) 274-2611 TELEEX 01 307514 C.A.S.I.F. SUPERVISOR

TO:
ALLEN GEOLOGICAL ENGINEERING LTD.
 203 - 2025 Bellevue Avenue
 West Vancouver, B.C.
 V7V 1B9

CERTIFICATE OF ASSAY

No: 7803-0951 DATE: Mar. 16/78

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

MARKED	GOLD	SILVER	Copper	Zinc	Cadmium	XXX	XXX	XXX
	oz/zt	oz/zt	Cu (%)	Zn (%)	Cd (%)			
137 - 138 A1	-	0.17	0.02	-	-			
877 K	0.001	0.06	0.01	-	-			
878 K	0.001	0.09	0.16	0.01	-			
879 K	0.001	0.26	0.41	0.02	0.003			
883 K	0.001	0.10	0.37	-	-			
884 K	0.001	0.04	0.05	-	-			
885 K	0.028	0.53	0.68	-	-			

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 PULPS AND REJECTS WILL BE STORED FOR A MAXIMUM OF ONE YEAR

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L. Wong

PROVINCIAL ASSAYER

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 OFFICIAL WEIGHMASTERS FOR Vancouver Board Of Trade

DIAMOND DRILL RECORD

MINERAL RESOURCES BOARD
7070

COLLAR
NORTH 50° E
EAST
ELEVATION
AZIMUTH
DIPS 4-30°

COMPANY Condor Resources Ltd
PROPERTY OLD TOM
LOCATION SMITHERS

HOLE 1-28
STARTED FEB 24 1978
FINISHED FEB 25 1978
DEPTH 196 FT
PURPOSE Shot m
LOGGED BY Alfred R. Allen

% Core Recovery	From	To	Description	Samples				Assays				Averages		
				Sample No.	From	To	Width	Au	Ag	Cu	Zn	Ca		
95	0	7.5	BLACK ANDESITE FINE DISSEMINATION OF PYRRHOTITE, PYRITES											
99	7.5	13	GRAY ANDESITE EPIDOTE FINE FRACTURE FILLINGS CALSITE, FINE FRACTURE FILLINGS + SOME DISSEMINATION OF PYRRHOTITE, PYRITES + CHALCOPYRITE + MALACHITE STAIN											
94	13	16	GRAY ANDESITE, EPIDOTE SCATTERED MAGNETITE, PYRRHOTITE											
	16	17.5	GRAY ANDESITE EPIDOTE FINE FRACTURE FILLINGS OF CALSITE											
	17.5	25	GRAY ANDESITE, EPIDOTE, MAGNETITE SOME FINE FRACTURE FILLINGS OF CALSITE SMALL BLEBS OF CHALCOPYRITE + DISSEMINATED CHALCOPYRITE WITH MAGNETITE	879	18	21	3 FT	0.001 ✓	0.26 ✓	0.41 ✓	0.02	0.003		

3

DIAMOND DRILL RECORD

COLLAR
 NORTH
 EAST
 ELEVATION
 AZIMUTH
 DIPS

COMPANY Cardero Resources Ltd
 PROPERTY OLD TOM
 LOCATION

HOLE 1-78
 STARTED FEB 24 1978
 FINISHED FEB 25 1978
 DEPTH
 PURPOSE
 LOGGED BY

% Core Recovery	From	To	Description	Samples				Assays			Averages	
				Sample No.	From	To	Width	An	Ag	Cu		
	98	101	GREY ANDESITE, EPIDOTE, CALCITE FILLING MAGNETITE (BLACK UNKNOWN)									
	101	122	BLACK ANDESITE ^{FINE GRAINED} FINE FRACTURE FILLING OF CALCITE									
	132	135	GRAY ANDESITE, EPIDOTE, CALCITE (BLACK UNKNOWN) SOME SMALL FRACTURE FILLING OF PYRITES									
	135	145	GRAY ANDESITE, EPIDOTE, CALCITE									
	145	147	BLACK ANDESITE									
	147	151	GRAY ANDESITE, EPIDOTE, CALCITE BUBBS									
80	151	196	GRAY ANDESITE EPIDOTE, CALCITE (BLACK UNKNOWN)	B77	152	157	5 FT	0.01	0.06	0.01		