

84-#343 - 12172

5

DIAMOND DRILLING REPORT

NUGGET CREEK GROUP

Victoria Mining Division

NTS 92B/13W

48° 52.5' 123° 47'

Owner: Corporation Falconbridge Copper

Operator: Corporation Falconbridge Copper

by A. J. Davidson

May 25, 1984

Claims

Little Nugget	Beatrice
Chemainus	Morley Jane Fr.
Belle	Bonnie I
Dunsmuir	Bonnie II
Seattle	Bonnie III
Copper King	Bonnie IV
Copper Queen	Bonnie V
Queen Bee	Bonnie VI
Alliance Fr.	CR I
Patricia Jane Fr.	CR II
Peggy Fr.	

**GEOLOGICAL BRANCH  
ASSESSMENT REPORT**

12,172

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## INTRODUCTION

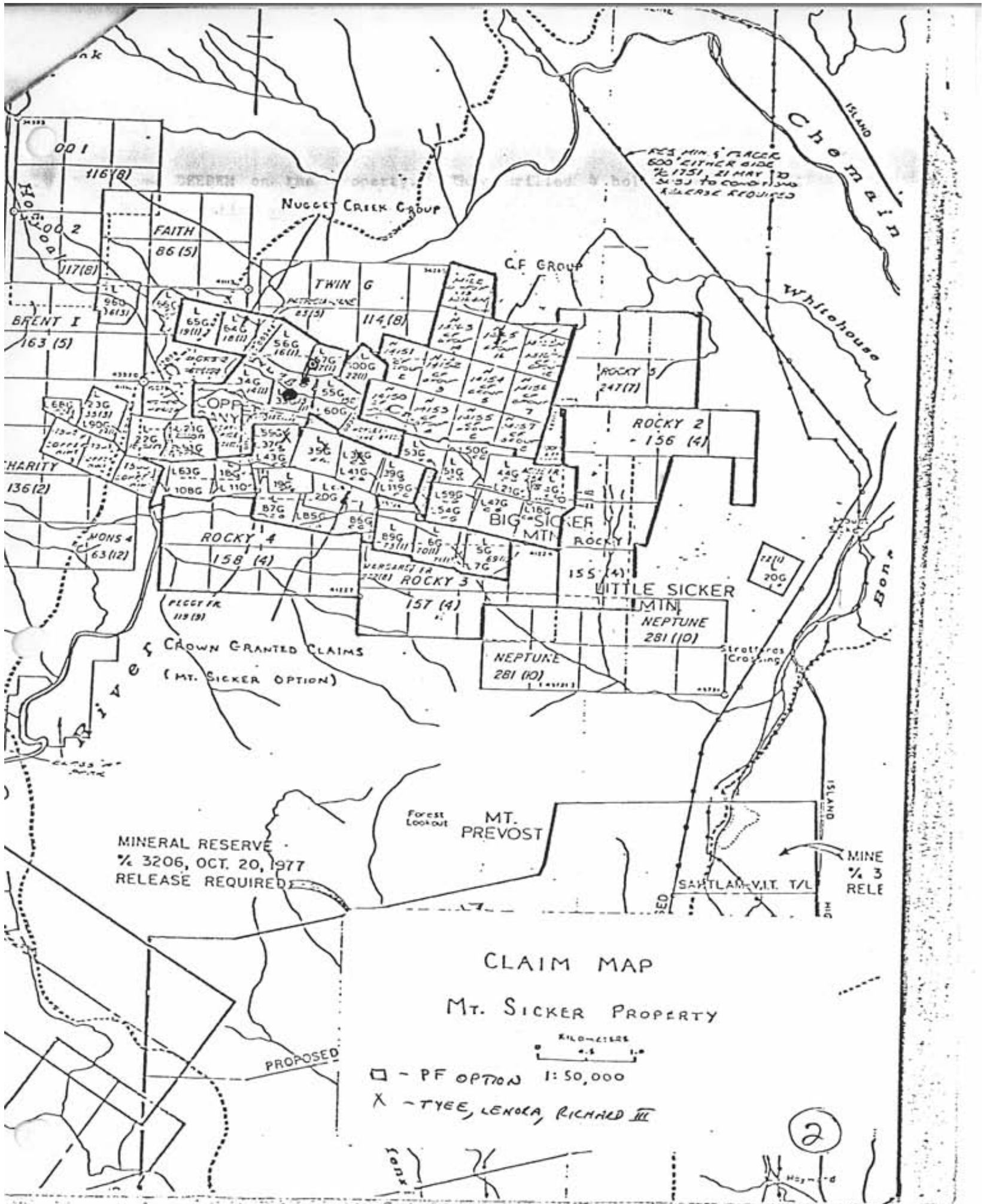
### Location and Access

The Postuk-Fulton Option is located 13 km north of Duncan, B. C. on the northwest slope of Big Sicker Mountain. Access is by 2 wheel drive vehicle (Fig. 1).

### Property

The property consists of the following contiguous claims (Fig. 2):

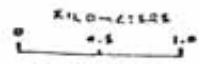
<u>Name</u>	<u>Record #</u>	<u>Month</u>
Little Nugget	13	January
Chemainus	14	January
Belle	15	January
Dunsmuir	16	January
Seattle	17	January
Copper King	18	January
Copper Queen	19	January
CR I	929	May
CR II	930	May
Queen Bee	22	January
Alliance Fraction	120	September
Patrica Jane Fr.	83	May
Morley Jane Fr.	84	May
Peggy Fraction	119	September
Beatrice	121	September
Bonnie I	415	September
Bonnie II	416	September
Bonnie III	417	September
Bonnie IV	418	September
Bonnie V	422	October
Bonnie VI	423	October



SEE MIN 5 PLACER  
500' EITHER SIDE  
1/4 1751 21 MAY 70  
24 33 TO COMPTON  
RELEASE REQUIRED

MINERAL RESERVE  
1/4 3206, OCT. 20, 1977  
RELEASE REQUIRED

CLAIM MAP  
Mt. SICKER PROPERTY



- - PF OPTION 1:50,000
- X - TYEE, LENORA, RICHARD III

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### History

The property is part of the Mt. Sicker Camp which has had a history of sporadic mining activity since 1897. The Tyee mine adjacent to the Nugget Creek Group produced 305,787 tons of 3/31% Cu, 7.51% Zn, 0.13 oz/ton Au and 2.75 oz/ton Ag from 1949 - 1952.

The Nugget Creek Group was part of the Mt. Sicker property when Mt. Sicker Mines Ltd. was formed in 1966. In 1972 Ducanex made a reconnaissance geological map of the area and drilled 866 feet in two diamond drill holes on the Queen Bee and Seattle claims.

The claims were staked by the present owners Dr. P. Postuk and Mr. S. B. Fulton of Duncan and were optioned in 1979 by S.E.R.E.M. Ltd. S.E.R.E.M. geologically mapped, soil sampled and ran VLF and some DEEPEM on the property. They drilled 4 holes totalling 591 metres testing geophysical responses.

S.E.R.E.M. dropped the option in 1982 when they pulled out of the entire Mt. Sicker area.

### WORK DONE

One diamond drill hole has been completed on the Seattle Claim (17(January)). The hole was drilled a total of 175.6 metres and was of BQ size.

### TECHNICAL DATA

The hole was drilled to test the western strike extent of sulphide mineralization found 200 metres east of the hole. The hole encountered 35.4 metres of mixed andesite-rhyolite and then 140.2 metres of quartz diorite. The hole was stopped at 175.6 metres. Core is stored at 5215 Hykawy Road, Duncan, B. C.

CONCLUSIONS

The hole did not extend the previously known mineralization and encountered a substantial thickness of quartz diorite. Further drilling will be necessary to better define the geology.

A handwritten signature in cursive script, appearing to read "A. P. A.", is written above a horizontal line.

STATEMENT OF COSTS

F. BOISVENU DIAMOND DRILLING LTD.  
C/O 200 2695 GRANVILLE STREET  
VANCOUVER, B.C. V6H 3H4

INVOICE

DATE: May 23, 1984

TO: Corporation Falconbridge Copper  
6415 - 64th Street  
Delta, B.C.  
V4K 4E2

FOR: Surface drilling *MTS-1*  
April 27 to April 30, 1984

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Drilling <i>MTS-1</i>	\$ <del>9,628.00</del> <i>9588.00</i>
Moving	<del>660.00</del> <i>—</i>
Materials	904.79 ✓
Tropari testing	<u>140.00</u> ✓
	<del>\$11,332.79</del> <i>10632.79</i>

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70580 - 600 - 204. - 100?

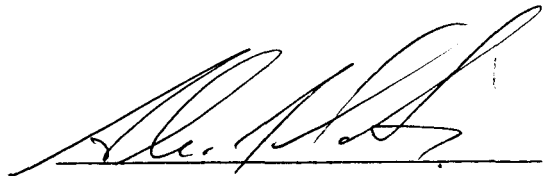
*A. J. [Signature]*

STATEMENT OF QUALIFICATIONS

I, Alex J. Davidson hereby certify that:

1. I hold a Bachelor of Science Degree (Geology Major) and a Master of Science Degree in Economic Geology from McGill University, Montreal, Quebec.
2. I have practised my profession in exploration continuously since graduation.
3. I have based conclusions and recommendations contained in this report on knowledge of the area, my previous experience and the results of the field work conducted on the property.

THUNDER BAY, ONTARIO.

A handwritten signature in black ink, appearing to read 'Alex J. Davidson', written over a horizontal line.

ALEX J. DAVIDSON MSc.



CORPORATION FALCONBRIDGE COPPER

X METRIC UNITS  
IMPERIAL UNITS

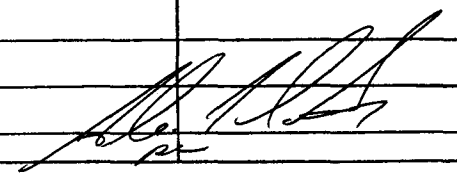
DRILL HOLE RECORD

HOLE NUMBER MTS 1	GRID CFC GRID (1983)	FIELD COORDS	LAT 3+12N	DEP. 2+22W	ELEV. 337.11	COLLAR BRNG. 200°	COLLAR DIP -52	HOLE SIZE BX	FINAL DEPTH 175.6m
PROJECT Postuk-Fulton	CLAIM#	SURVEY COORDS	3+17.5N	2+22.8W	337.11	DATE STARTED: April 28/84 DATE COMPLETED: MAY 1/84	CONTRACTOR: F. Boisvenu Drilling Ltd. CORE STORAGE: Hykawy Road, CASING: Yes		

PURPOSE 1) to test the strike project of the SRM 16 exhalite.  
2) to extend the massive chlorite alteration trend located at surface.

Duncan  
RQD LOG  
COLLAR SURVEY  
PULSE EM SURVEY  
MULTISHOT SURVEY

ACID TESTS				TROPARI TESTS			MULTISHOT DATA		
DEPTH (m )	CORRECTED ANGLE	DEPTH ( )	CORRECTED ANGLE	DEPTH (m )	AZIMUTH	DIP	DEPTH ( )	AZIMUTH	DIP
19.8	42°			25.9	208	47.0°			
61.0	44.5°			174.0	213.5	42.0°			
96.0	43.5°								
121.9	44°								

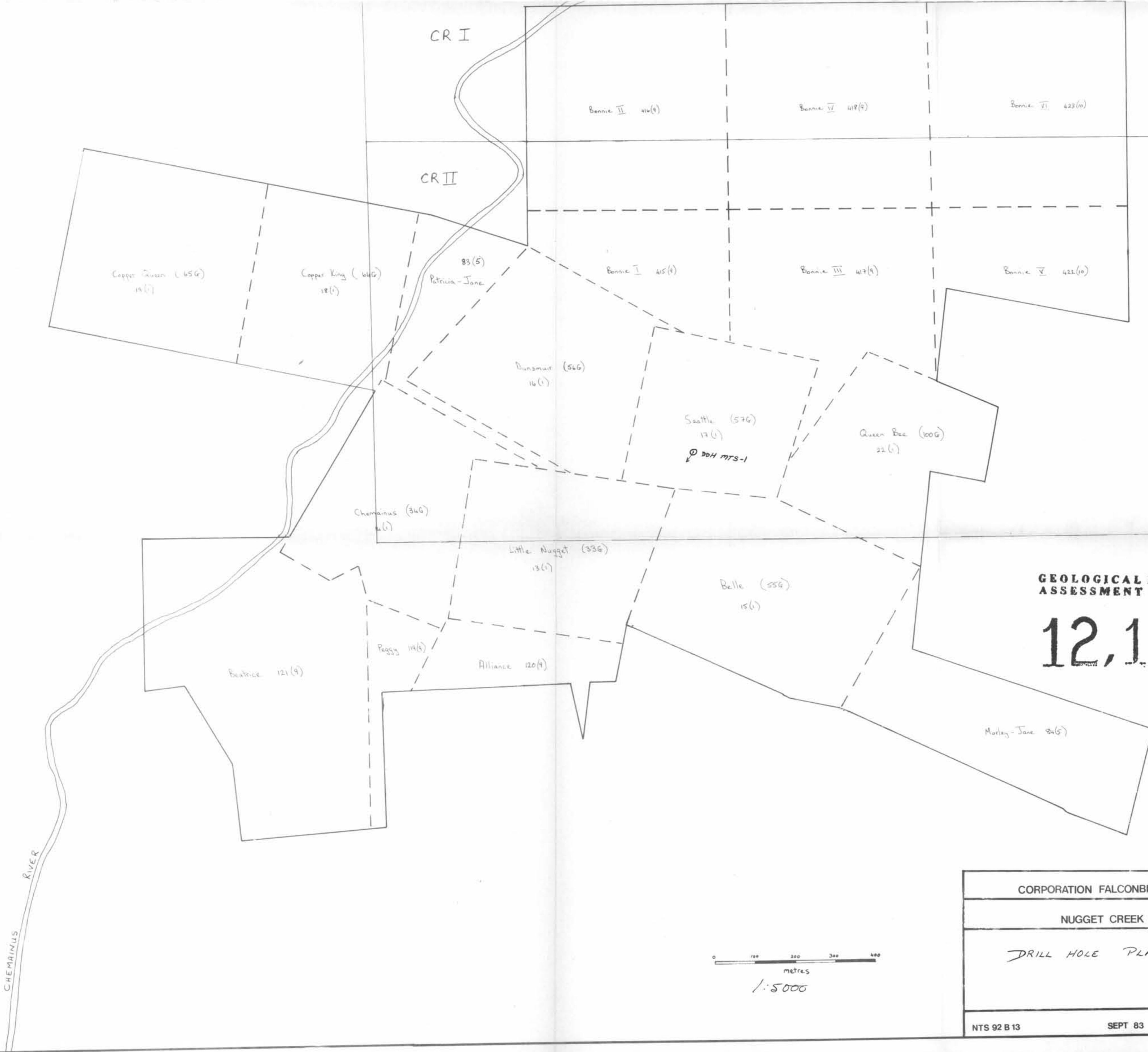


FROM TO	ROCK TYPE	COLOUR	GRAIN SIZE	TEXTURE AND STRUCTURE	ANGLE TO CORE AXIS	ALTERATION	SULPHIDES
0 to 16.38	Overburden						
16.38 to 22.01	Intermediate Lapilli and Ash tuff.	Lt. Grey to Greyish -Green	f.g. to m.g.	- fine grained to aphanitic at top of unit grading downwards into medium-grained clastic rock - siliceous clasts most pronounced, angular, irregular shapes - weak foliation @ 60° to CA - quartz (minor carbonate) veinlets	20-35°	NIL	- diss. cp and py (< 1%) - 18.58 to 18.68 - 5% py.
22.01 to 22.85	Gray Massive Chert or Rhyolite	Gray	Aphanitic	- upper contact irregular with fragments of siliceous unit in overlying lapilli and ash tuff - massive		NIL	Barren
22.85 to 27.43	Mafic Ash Tuff	Dark Green	f.g.	- some portions are aphanitic, massive with possible amygdules filled with chlorine - carbonate veinlets	30°	Chlorite in tuff and filling amygdules.	Trace diss. py.
27.43 to 27.48	Layered Chert	Grey	aphan.	- layers partially broken up - basal contact	50°	NIL	Barren
27.48 to 29.63	Mafic Ash Tuff			- similar to 22.85 to 27.43		Also strong chlorite on fractures.	

FROM TO	ROCK TYPE	COLOUR	GRAIN SIZE	TEXTURE AND STRUCTURE	ANGLE TO CORE AXIS	ALTERATION	SULPHIDES
29.63 to 35.4	Feldspar Diorite Porphyry	Light Greenish Grey	f.g.	<ul style="list-style-type: none"> <li>- plagioclase phenocrysts are white with blocky shapes but blurred boundaries - 4mm.</li> <li>- in a matrix of feldspar ferromagnesian minerals and minor quartz</li> <li>- contains scattered amygdules(?) up to 5mm filled with quartz occasional halos</li> <li>- gradational contact into underlying unit</li> </ul>		<ul style="list-style-type: none"> <li>- carbonate veinlets with associated carbonate, chlorite, specularite at varying angles to core.</li> </ul>	Barren
35.4 to 175	Quartz Diorite	Grey	f.g.	<ul style="list-style-type: none"> <li>- strongly magnetic</li> <li>- equigranular, fine-grained mixture of plagioclase, magnetite, amphibole and quartz</li> <li>- 15-20% quartz</li> </ul> <p><u>53.34-55.5</u> Shear zone with pronounced foliation, quartz veins with associated chalcopyrite.</p> <p><u>73.5-76.9</u> mylonitic zone</p> <p><u>89.81-94.07</u> mylonitic zone more chloritized</p> <p><u>103.22-103.55</u> f.g. flow-banded mafic dyke</p> <p><u>159.82-161.68</u> shear zone</p>		<ul style="list-style-type: none"> <li>- amphibole is chloritized and plagioclase is sausseritized</li> <li>- veinlets of carbonate and chlorite</li> <li>- 5-10cm patches of epidotized diorite occur from 65-72.5</li> <li>- quartz starts to acquire a pinkish tinge from 71-82.7</li> <li>- magnetite altered to a light brown colour from 75 to 79</li> </ul>	<ul style="list-style-type: none"> <li>- trace disseminations of pyrite (&lt;&lt;1%).</li> <li>- trace pyrite (&lt;&lt;1%)</li> <li>- 5% pyrite over 2cm at beginning of mylonitic zone</li> <li>- make dyke contains 3% diss. pyrite.</li> <li>- 2cm qtz vein in shear zone with 40% pyrite.</li> </ul>



FROM TO	ROCK TYPE	COLOUR	GRAIN SIZE	TEXTURE AND STRUCTURE	ANGLE TO CORE AXIS	ALTERATION	SULPHIDES
				<u>CONCLUSIONS</u>			
				1. The cherty exhalite with pyrite intersected in SRM 16 is dyked out by the quartz diorite intrusion.			
				2. The hole was collared in intermediate lapilli and ash tuff similar to outcrops east of the casing.			
				3. Shear zones in the quartz diorite are silicified and chloritized with a weak mylonitic texture. Disseminated pyrite and quartz-carbonate veins are common in the shear zones. Minor chalcopyrite occurs in some quartz veins. Several samples from the shear zones are to be assayed for gold.			
				4. No fault was encountered in the drilling. The quartz diorite must dip towards the south shallowly and the east-west fault at the trench must dip to the south as well.			
						D. Lefebure May 2, 1984	



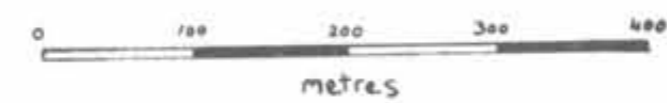
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*DRILL HOLE PLAN*



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