

85-302-13702

GEOLOGICAL BRANCH  
ASSESSMENT REPORT

13,702

DIAMOND DRILL REPORT

ON THE

YELLOW GROUP

Cariboo Mining Division

93 B/8

(Latitude 52 31", Longitude 122 17")

OWNER AND OPERATOR

GIBRALTAR MINES LIMITED

McLEESE LAKE, B.C.

AUTHOR: M. R. Thon

Submitted: April 23, 1985

## TABLE OF CONTENTS

	Page
1.0 INTRODUCTION.....	1
2.0 MINERAL CLAIMS.....	2
3.0 DRILL PROGRAM.....	4
3.1 Objective.....	4
3.2 Results.....	4
3.3 Interpretation.....	5
4.0 STATEMENT OF EXPENDITURES.....	6
5.0 CONCLUSIONS.....	7

## FIGURES

Figure 1	Area Location Map	(In Text)
Figure 2	Yellow Group Claim Map	(In Pocket)
Figure 3	Drill Hole Location Map/Topo Map	(In Pocket)
Figure 4	Drill Hole Location Map/Claim Map	(In Pocket)

## APPENDICES

I.	Statement of Qualifications.....	8
II.	List of Abbreviations.....	10
III.	Drill Log: Hole 85-01.....	(In Pocket)
	Drill Log: Hole 85-02.....	(In Pocket)
	Drill Log: Hole 85-03.....	(In Pocket)
	Drill Log: Hole 85-04.....	(In Pocket)

## 1.0 INTRODUCTION

The Yellow Mineral Claim Group is part of the Gibraltar Mines Limited permanent property. It is accessed along a mine haul road and lies approximately 1.75 miles (2.8 Km.) from the plant site. The general location is shown in Figure 1.

The 1984 drilling on this group took place along the north edge of the Granite Lake Pit. These areas have previously been tested by Canex in 1969 and 1971, and by Gibraltar Mines in 1979, 1982 and 1984. The 1985 drill locations are shown in Figure 3.

Drilling was carried out by G. & D. Diamond Drilling of 5425 Dallas Drive, Kamloops, B.C. during the period March 26 to March 31, 1985. Four vertical N.Q. wireline diamond drill holes were completed for a total of 800 feet (243.84 m.). Core was not split. The whole core was sent to the assay lab for analysis. The ground core is stored at Gibraltar Mines plant site for a period of one year.

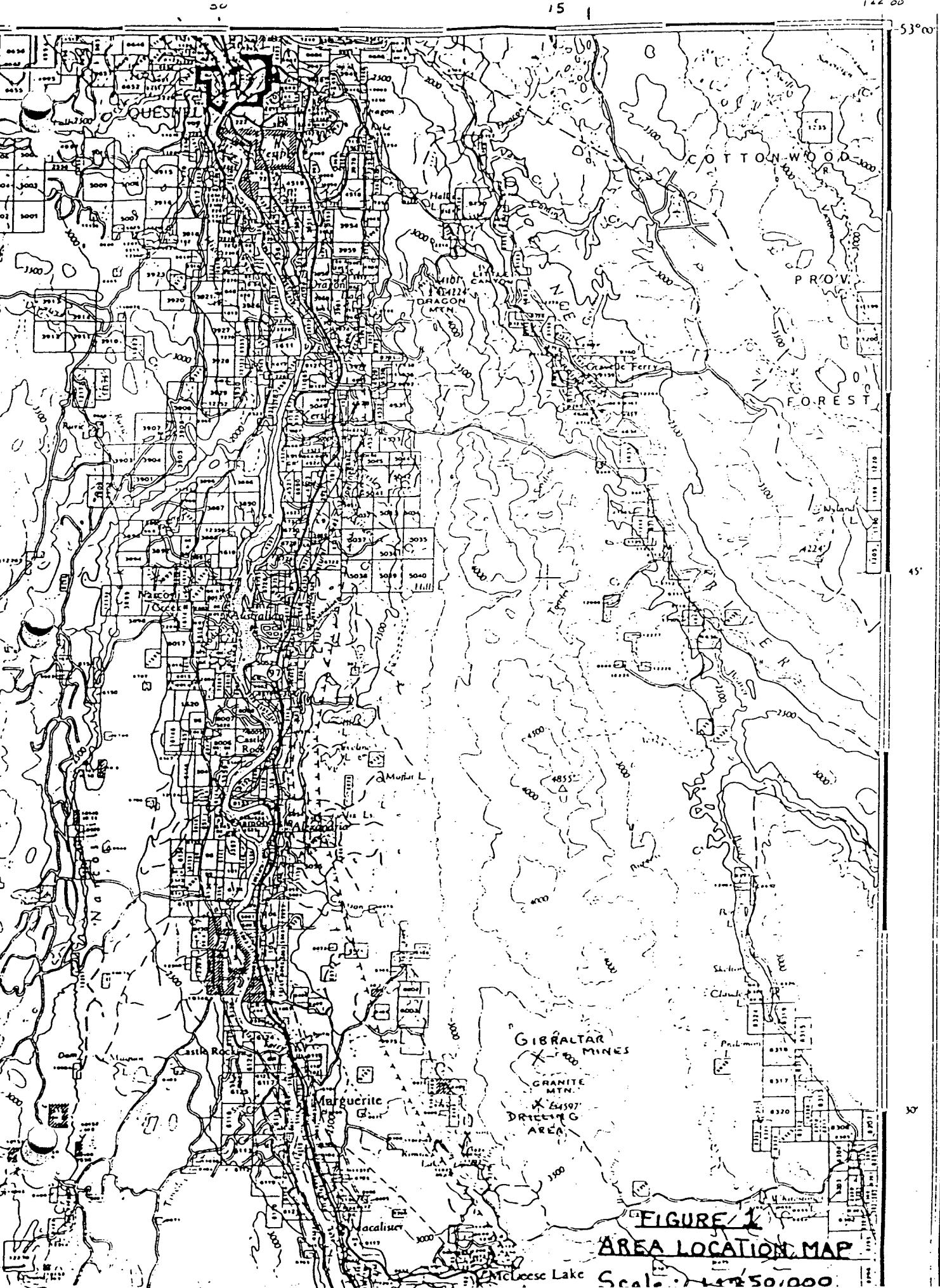


FIGURE 1  
AREA LOCATION MAP  
Scale 1:50,000

## 2.9 MINERAL CLAIMS

The Yellow Claim Group has mineral leases grouped with mineral claims. Particulars of each claim are listed below. Some of the claims are owned by Cuisson Lake Mines Limited but Gibraltar Mines Limited has full administrative rights over all of these claims. Mineral Claim locations are shown in Figure 2 (in pocket).

### G I B R A L T A R M I N E S L I M I T E D 11-JUN-84

#### C L A I M G R O U P S

##### Y E L L O W      G R O U P M I N E R A L C L A I M S

NAME	RECORDED DDMMYY	RECORD NUMBER	MINERAL UNITS	LEASE	OPTIONED FROM
BUD #1	230574	71611	1		
BUD #2	230574	71591	1		
BUD #3	230574	71599	1		
BUD #4	230574	71608	1		
CAROL #4FR	120768	46104	1		CLM
CAROL #6FR	120768	46106	1		CLM
CAROL #7FR	120768	46107	1		CLM
EV # 1	230574	71594	1		
EV # 2	230574	71593	1		
EV # 3	090174	71588	1		
EV # 4	230574	71614	1		
FFE #13	160566	35766	1		CLM
FFE #14	160566	35767	1		CLM
FFE #15	160566	35768	1		CLM
FFE #16	160566	35769	1		CLM
FFE #17	160566	35770	1		CLM
FFE #19	160566	35772	1		CLM
FI #2 FR	230574	71601	1		
FI #4 FR	230574	71602	1		
FLO #1 FR	230574	71603	1		
GIB #15FR	030971	64566	1		
GIB #20FR	210672	66782	1		
GJ #20FR	090174	71325	1		CLM
HAS #2	161068	48026	1		CLM
HAS #12	161068	48031	1		CLM
HAS #13	161068	48032	1		CLM
HAS #14	161068	48033	1		CLM
HAS #15	161068	48034	1		CLM
HAS #16	161068	48035	1		CLM
HAS #17	161068	48036	1		CLM
HAS #18	161068	48037	1		CLM
HAS #19	161068	48038	1		CLM
HAS #20	161068	48039	1		CLM
HO # 5	051066	37784	1		CLM
HO # 6	051066	37785	1		CLM
HO # 7	051066	37786	1		CLM
HO # 8	051066	37787	1		CLM
HO #20	051066	37797	1		CLM
SAP #2 FR	030971	64568	1		CLM
SAP #3 FR	030971	64569	1		CLM
SAP #5 FR	210672	66783	1		CLM
VE #21	280469	50693	1		CLM
VE #22	280469	50694	1		CLM
ZIP #1FR	120270	00133	1		
EST #03 FR	200571	62401	1	3604	M42
LYNNE #3	130766	30699	1	3604	M42
RUM #80 FR	031270	51406	1	3604	M42
VE NO. 1	140266	34947	1	3604	M42
VE NO. 2	140266	34948	1	3604	M42
VE NO. 3	140266	34949	1	3604	M42

C L A I M   G R O U P S

Y E L L O W   G R O U P   M I N E R A L   C L A I M S

NAME	RECORDED DOMHYY	RECORD NUMBER	UNITS	MINERAL LEASE	OPTIONED FROM
VE NO 5	140266	34951	1	3604	M42
VE NO 7	140266	34953	1	3604	M42
VE NO 10	140266	34955	1	3712	M50
VE NO 4	140266	34950	1	3713	M51
VE NO 6	140266	34952	1	3713	M51
VE NO 8	140266	34954	1	3713	M51
HO #18 FR	051066	37795	1	4139	M58
HO #19	051066	37795	1	4139	M58
LINDA #1	211169	55049	1	4139	M58
LINDA #2	211169	55050	1	4139	M58
LINDA #3	211169	55051	1	4139	M58
LINDA #4	211169	55052	1	4139	M58
SAP #4 FR	030971	64570	1	4139	M58
VE NO 15	140266	34961	1	4142	M61
VE NO 16	140266	34962	1	4142	M61
VE NO 17	140266	34963	1	4142	M61
VE NO 18	140266	34964	1	4142	M61
VE NO 19	140266	34965	1	4142	M61
VE NO 20	140266	34966	1	4142	M61
HAS 4	161068	48028	1	4143	M59
HAS 6	161068	48029	1	4143	M59
SAP #1 FR	030971	64507	1	4140	M50

TOTAL UNITS 72

TOTAL \$

### 3.0 DRILL PROGRAM

#### 3.1 OBJECTIVE.

The purpose of this drill program was to test ore projections in the north wall of the Granite Lake Stage 1 pit. It was felt that mining grades were having too great an influence over the projected grades.

#### 3.2 RESULTS.

The drill hole locations are shown in Figure 3. The locations were surveyed with an E.O.M. AGA survey instrument. Drill logs are included in the pocket of this report. All copper values reported here and in the logs are for total copper. All molybdenum reported is MoS .

All holes intersected a typical "Mine Phase Quartz Diorite". This is a medium grained rock comprised of about 30% dark grey quartz, 20% green chloritized mafics, and 50% light green saussuritized feldspar. "Dark Alteration Zones" mentioned in the drill logs are zones of further alteration in which the epidote content of the saussurite has been re-mobilized out of the dark zones to form clots and veins of epidote near the borders of the dark zones. The feldspar in these dark zones is a grey color and there is often a higher concentration of chlorite and sericite associated with these zones. These dark alteration zones were encountered in all of the drill holes in this drill program along with narrow intersections of quartz-chlorite-sericite shear zones.

Hole 85-01 was drilled from the Stage 1 ramp, cased to 14 feet, and drilled to 200 feet. No leach cap was intersected; oxide occurred to 30 feet and supergene mineralization to 110 feet. The ore zone started at the top and went to 160 feet for a 146 feet thick zone of 0.40% copper and 0.021% MoS . The results of this hole were better than the projected grades. A six feet thick fault was intersected at 174 feet to 180 feet near the base of the ore zone.

Hole 85-02 was drilled from the Stage 1 ramp, cased to 10 feet, and drilled to 202 feet. There was no leach cap or oxide zone and supergene enrichment only occurred down to 20 feet. The entire hole averaged as ore, though there was narrow waste zones. This makes an ore zone 192 feet thick grading 0.25% copper and 0.021% MoS . The ore intersected near the top was lower than expected but the system at the bottom was much higher than the projections. This system is thought to lie sub-parallel to the upper zone. Possible fault zones occurred at 67 feet to 85 feet and 127 to 140 feet and much broken core was encountered. This hole is thought to be very near a major fault system.

Hole 85-03 was also drilled from the Stage 1 ramp, cased to 10 feet and drilled to 201 feet. No leach cap or oxide zone was intersected and supergene enrichment ended at 40 feet. The ore zone extended from the top of the hole to 140 feet for 130 feet of 0.22% copper and 0.012% MoS. These grades again, were much lower than projected. A narrow fault zone was intersected at 112 to 120 feet and much shattered rock was intersected throughout the hole. This hole is about 130 feet from a major vertical fault system which caused a failure along the east wall of the Stage 1 pit.

Hole 85-04 was drilled from a berm on the north wall of the pit. It was cased to 22 feet and drilled to 197 feet. No leach cap, oxide, or supergene surfaces were intersected. Assay results here were very disappointing. 110-feet of ore was intersected from 30 feet to 140 feet with a grade of 0.21% copper and 0.014% MoS. This hole was very close to 1.00% copper material mined in the pit. It will reduce the amount of "super hi-grade" projected in this area. A possible fault was intersected at 20 to 38 feet with zones of broken core continuing to 55 feet.

### 3.3. INTERPRETATION.

The results of this drill program suggest that we are drilling the edge of our orebody and therefore the grade is not very predictable (ie. "fingering" effect). Between this fact and the faulted nature of the ore here, many drill holes are required to verify ore projections.

#### 4.0 STATEMENT OF EXPENDITURES

March 1985 Diamond Drilling, Yellow Group

(a) Drilling costs

85-01	200'	@ \$13.00/ft.	\$2,600.00
85-02	202'	@ \$13.00/ft.	\$2,626.00
85-03	201'	@ \$13.00/ft.	\$2,613.00
85-04	197	@ \$13.00/ft.	\$2,561.00
			-----
			\$10,400.00

(b) Site Preparation

Cat time:

(1) Pushing Roads  
Operator for 8 hrs. @ \$15.60/hr \$ 124.80

(2) Developing Sites  
Cat for 8 hrs. @ \$123.00/hr \$ 984.00

-----  
\$ 1,108.80

(c) Vehicle

4X4 1980 Suburban, March 18, 22,

March 26 to April 1

6 days @ \$20/day

\$ 120.00

(d) Assay Costs

75 Cu - MoS2 assays @ 4.40/assay 330.00 \$ 330.00

(e) Supplies

Core boxes - 40 boxes @ \$5.85/box = \$234.00

Tags, bags, etc. = 25.00

-----  
\$259.00 \$ 259.00

(f) Personnel Costs

(1) Core Logging and Supervision

G. Bysouth April 1, 2

16 hrs @ \$31.55 \$ 504.80

(2) Core Logging

M. R. Thon Mar 27 - 29

18 hrs. @ \$22.02 \$ 396.36

(2) Field Work and Sample Preparation

E. Oliver Mar 18 - 8hrs.

Mar 22 - 8hrs.

Mar 25-29 -16hrs.

Apr 1 - 4hrs.

36 hrs @ 19.64 \$ 707.04

-----  
\$1,608.20 1,608.20

TOTAL DRILLING COST

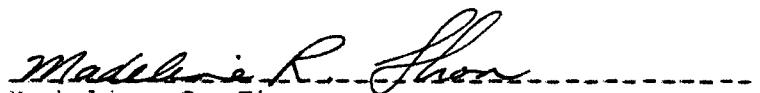
\$13,826.00

## 5.0 CONCLUSIONS

These results confirm the need for close-spaced drilling and it is recommended that more drilling be done to decrease the drill spacing to about 200' x 200'.

SUBMITTED BY:

GIBRALTAR MINES LIMITED

  
-----  
Madeline R. Thon  
Mine Exploration Geologist

mt

APPENDIX I

STATEMENT OF QUALIFICATIONS

I, Garry D. Bysouth, of Gibraltar Mines Limited, McLeese Lake, British Columbia, do certify that:

1. I am a geologist.
2. I am a graduate of the University of British Columbia, with a B.Sc. degree in geology in 1966.
3. From 1966 to the present I have been engaged in mining and exploration geology in British Columbia.
4. I personally supervised this drill program, logged the core and assessed the results.

*Garry D. Bysouth*  
Garry D. Bysouth

APPENDIX I

STATEMENT OF QUALIFICATIONS

I, Madeline R. Thon, of Gibraltar Mines Limited, McLeese Lake, British Columbia, do certify that:

1. I am a geologist.
2. I am a graduate of the University of British Columbia, with a B.Sc. degree in Geological Science in 1978.
3. From 1978 to the present I have been engaged in mining and exploration geology in British Columbia.
4. I personally assisted in the logging of the core and the assessment of the results of this drill program.

  
-----  
Madeline R. Thon

Madeline R. Thon

APPENDIX II

ABBREVIATIONS USED IN DRILL LOGS

cal.....calcite  
carb.....carbonate  
chl.....chlorite  
cp.....chalcocrite  
cren.....crenulated  
dissem.....disseminated  
ep.....epidote  
foln.....foliation  
grn.....grained  
lim.....limonite  
mal.....malachite  
mag.....magnetite  
py.....pyrite  
QSP.....quartz-sericite-py  
qtz.....quartz  
rx.....rock  
ser.....sericite  
str.....strong  
stkwk.....stockwork  
wk.....weak  
Wt. Q.D.....White Quartz Diorite  
= Leucocratic Phase

GIBRALTAR MINES LIMITED

PERMANENT PROPERTY AREA

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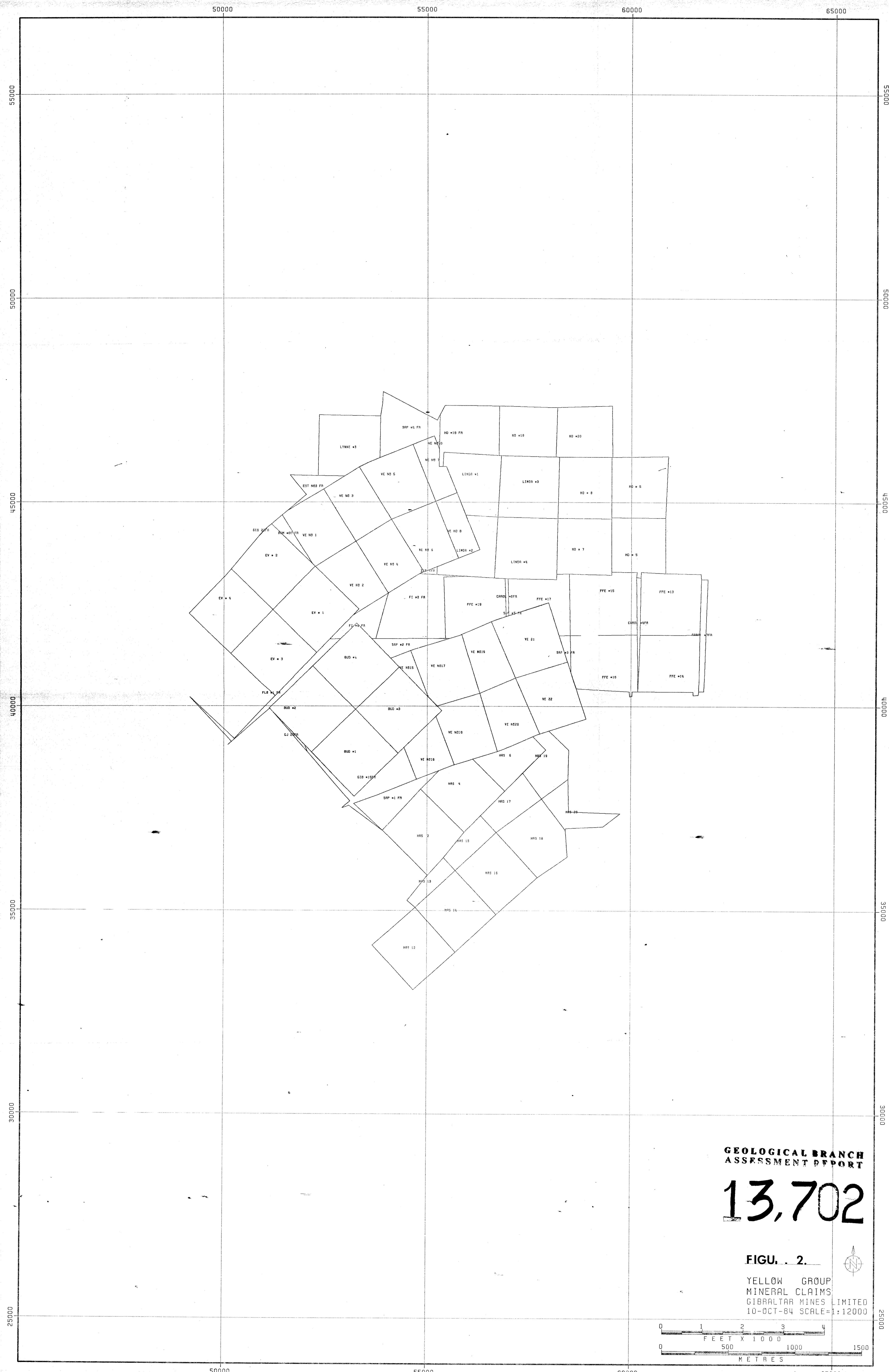
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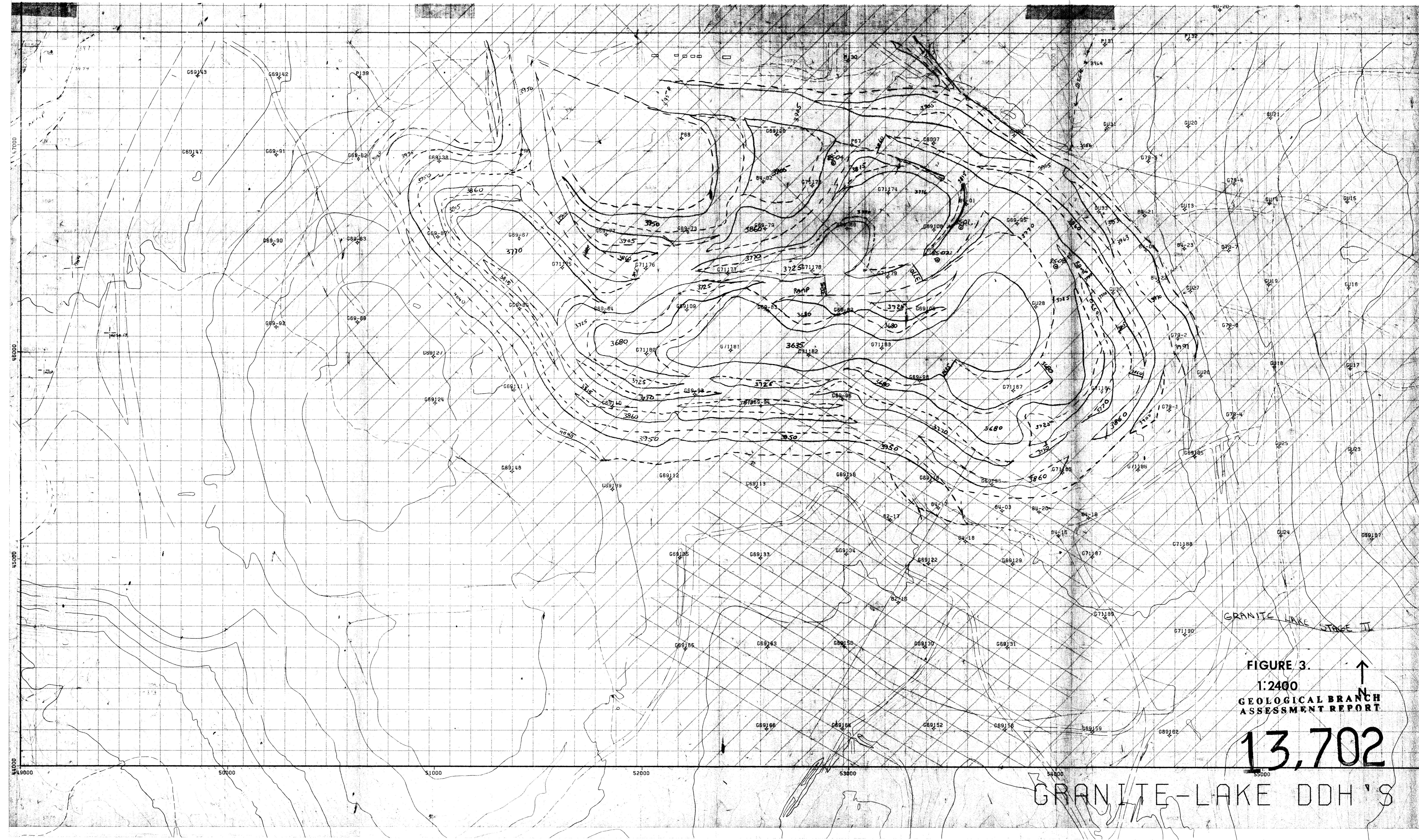
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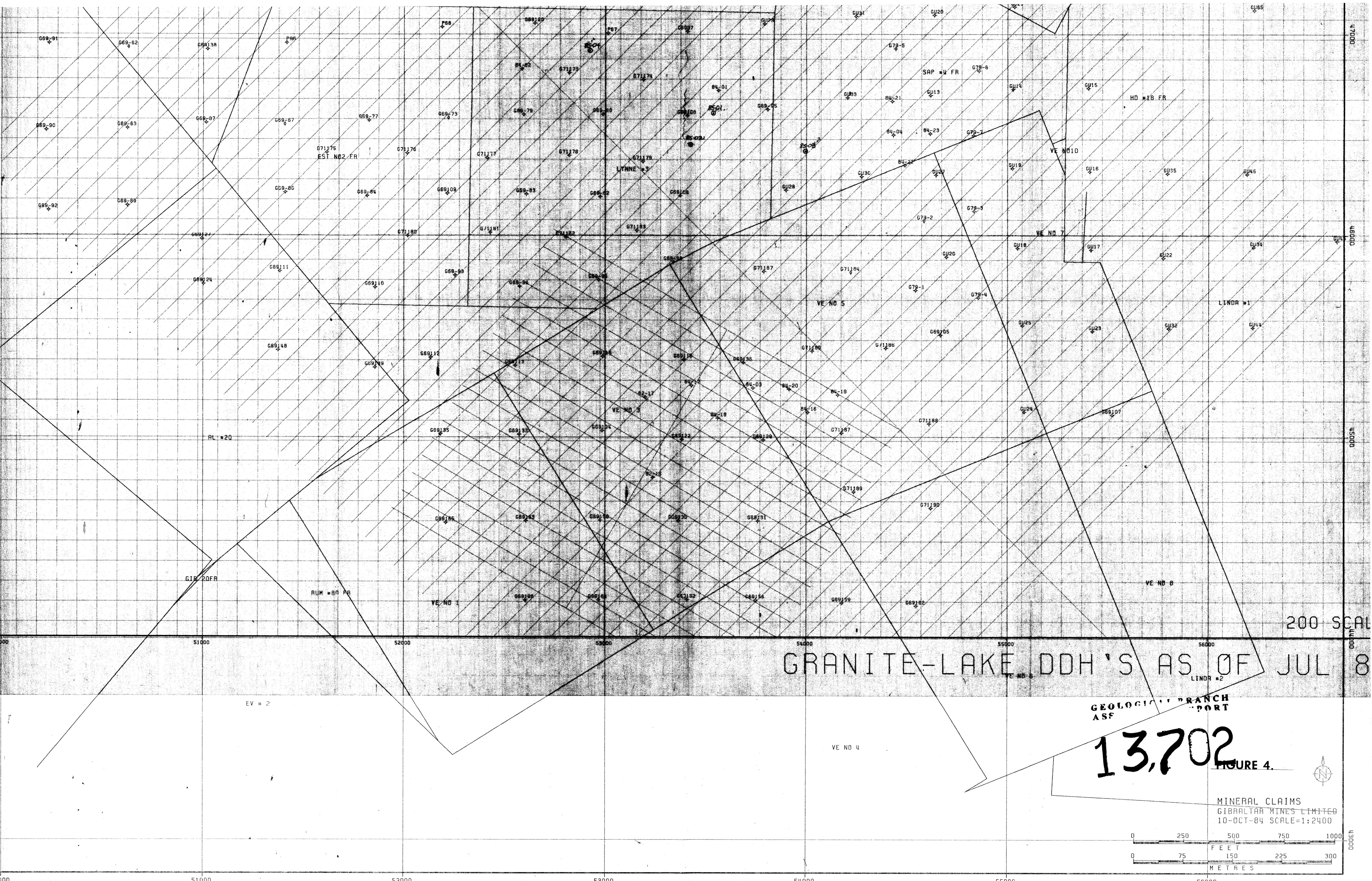


**FIGURE 3.**

**1:2400**

**GEOLOGICAL BRANCH  
ASSESSMENT REPORT**





**GRID** \_\_\_\_\_

# GIBRALTAR MINES LTD.

HOLE No. 85-04  
SHEET No. 1 of 4

13902

LOCATION GRANITE LAKE  
DATE COLLECTED 30 March, 1985  
DATE COMPLETED 31 March, 1985

BEARING \_\_\_\_\_  
LENGTH 197'  
DIP -90°

LATITUDE 46° 12' 64 N  
DEPARTURE 52,924.19 E  
ELEVATION 3863.98'

CORE SIZE N.Q.-W.  
SCALE OR LOG 1" = 10'  
REMARKS hole drilled inside

LOGGED IN G.D.B  
DATE April 2 1985

**GRID** \_\_\_\_\_

# SIBRALTAR MINES LTD.

HOLE No. 85-04  
SHEET No. 2 of 4

**GRID**

# GIBRALTAR MINES LTD.

HOLE No. 85-04

SHEET No. 3 of 4

GRID

# GIBRALTAR MINES LTD.

HOLE No. 85-04

SHEET No. 4 of 4

**GRID** \_\_\_\_\_

# GIBRALTAR MINES LTD.

LOCATION GRANITE LAKE  
DATE COLLECTED March 28 1985  
DATE COMPLETED March 29 1985

BEARING \_\_\_\_\_  
LENGTH 201  
DIP -90°

LATITUDE 46,916.53 N  
DEPARTURE 53,999.12 E  
ELEVATION 3742.40

HOLE No. 85-03  
SHEET No. 1 of 4

**GRID** \_\_\_\_\_

# GIBRALTAR MINES LTD.

HOLE No. 85-03  
SHEET No. 2 of 4

GRID \_\_\_\_\_

# GIBRALTAR MINES LTD.

HOLE No. 85-03  
SHEET No. 3 of 4

# GRID

# GIBRALTAR MINES LTD.

HOLE No. 85-03  
SHEET No. 4 of 4

GRID \_\_\_\_\_

## GIBRALTAR MINES LTD.

HOLE NO. 25-02  
SHEET NO. 1 OF 4

13702

LOCATION N.Wall Grik Pt on Ramp  
 DATE COLLARED 27 March '85  
 DATE COMPLETED 28 March '85

BEARING -  
 LENGTH 202'  
 DIP - 90°

LATITUDE 46, 447.99 N  
 DEPTH 53, 423.07 E  
 ELEVATION 3775.81'

CORE SIZE NO. WINNINGS  
 SCALE OF LOG 1" = 10'  
 REMARKS

LOGGED BY MRT  
 DATE 28 March '85

ROCK TYPES & ALTERATION			L to Core Foliation Foliation Alteration Foliation Structures	GRAPHIC LOG Foliation Alteration Foliation Structures	Yolno L to Axis	Width of Voids	Mineralization	FRACTURE ANGLE TO CORE AXIS -FREQUENCY-	ESTIMATED % PYRITE	BOTTOM DEPTHS		Estimated Core Recovery %	R O D	ASSAY RESULTS			
										LEACH CAP	—			Sample Number	% Cu	% Mo	Estimated Grade
										0							
										10							
										20							
										30							
										40							
										50							
										60							
										70							
										80							
										90							
	10-26'	Sauc. Alt'd Mine Phase	45°	60x3 60° 30° 20° 60° 30x2 30x2	1/20x3 1/9 1/20 1/9 1/20 1/2x2 1/8x2	gtz-dl-cp gtz-dl-cp gtz-chl-cp gtz-dl-cp gtz-chl-cp gtz-chl-cp gtz-chl-cp	0 10 20 30 40 50 60 70 80 90	21%	No limonite zone -only minor tarnishing of sulphides	16	75%	20%	99645	.31	.036	.28%	
		Q.D. of many narrow zones of veins of chloritic material containing gal.	45°	60° 60° 60° 30° 30° 130°	1/8 2 1 1/2 1/16	gtz-chl-cp gtz-chl-cp gtz-chl-cp gtz-vn-mag-chl-ep-cp gtz-ser-chl-cp	0 10 20 30 40 50 60 70 80 90	<1%	-gtz has a bluish tinge - no?	21 1/2	87%						
	26-40'	Highly altered, fine	30	10x2 130+10°	1/16x2 1/6x2	gtz-dl-cp-cpx gtz-cdl-chl-cp-(md) X7	0 10 20 30 40 50 60 70 80 90	<1%		27	95%	40%	99646	.27	.016	.26%	
		gr. rock rich in gtz - abundant ep blotches + veins.	ND.	130x2 130° 130° 130x3 130°x2 145x3 130	1/12x2 1/16 1/8 1/20x3 1/8+1/20 1/8x3 1/16	gtz-chl-cpx gtz-chl-cp-(py) gtz-dl-cp gtz-chl-cpx gtz-ser-chl-cpx gtz-chl-cpx gtz-dl-cp	0 10 20 30 40 50 60 70 80 90	<1%		30	80%						
	90 → 112'	Sauc. Alt'd Q.D. w/narrow zones of veins of Dkaltin or Ser. Sulf.	60° Mod Str.	30 160 25 145 140° 160° 140°	1/8 1/16 1/20 1/16 1/20 1/16 1/16	gtz-chl-cp gtz-dl-cp gtz-chl-cp gtz-vn-chl-cp-mo gtz-dl-cp gtz-chl-cp	0 10 20 30 40 50 60 70 80 90	<1%		32 1/2	93%	30%	99647	.27	.022	.21%	
			50	160	1/16					37							
										40	80%						
										48	80%	6%	99648	.13	.014	.16%	
										50							

GRID

## GIBRALTAR MINES LTD.

HOLE No. 85-02  
SHEET NO. 2 of 4

ROCK TYPES & ALTERATION			GRAPHIC LOG		Width of Vein	Mineralization	Fracture Angle to Core Axis - FREQUENCY -	Estimated % Pyrite	BOTTOM DEPTHS			Footage Below	Estimated Core Recovery %	ASSAY RESULTS							
L to Core	Foliation	Alteration	Foliation	Foliation					LEACH CAP		R O D	Sample Number	% Cu		% Mo		Estimated Grade				
									LIM. ZONE	SUPERGENE			Cu	Mo							
			75° 60° Npl	60° 10° 60° 60°	25° 60x3 95x2 60x2 10° 30x6 60° 11"	2' 1/4x3 1/2x2 1/8x2 1/8 1/20x6 1/8	Gtz Vn - chl - ar - mo - qz gtz-chl-ser-cpx3 gtz-chl-ser-qz-mo-x2 gtz-chl-cpx2 gtz-chl-cpx gtz-chl-cpx6 gtz-calc-fq	<1%			59	70%	40%	99649	.19	.042	.27%				
			ND	60° 60° 60° 60° 60° 60° 70°	130x3 260 145+60 160 130° 160° 120 20	1/2x3 51" 1/4x2 1/8 1/16 1/8	Gtz - chl - cpx3 gtz-ser-mag-cpx shear gtz-chl-s2+ - cp gtz-chl-ser-cpx gtz-calc-chl-cpx-mo gtz-chl-cpx-mo-ccc??> (gtz-calc-chl)	<1%		57	90%	60									
69-76 Fault Zone?			ND	70° 70°							67	96%	45%	99650	.26	.012	.23%				
-badly broken, -gougy DC Atm zone			ND	70° 70° 145x5 150° 80° 80° 80° 60°	30° 70° 145x5 150° 80° 80° 80° 60°	2' 1/20 1/20 1/20x5 1/8 1/4 1/4	Brdn. core + qz gtz-chl-cpx gtz-chl-mag-cpx gtz-chl-cpx5 gtz-chl-cpx-mo gtz-chl-cpx-mo gtz-calc-cpx	41%	badly broken core Gougy Zones	76	65%	80%	99651	.20	.044	.18%					
80-85 Fault Zone - Broken core, (gg) hem, Calcaceous - Chalcocite at altn zone			ND	80° 100° 45° 100+5° 20° 75° 90° 60°	80°x5 100° 45° 100+5° 20° 75° 90° 60°	1/2x5 1/20 1/20 1/20x2 1/16 1/4 1/4	Gtz-chl-cpx5 carb-gg hem-chl. gtz-carb gtz-carb-hem x2 gtz-calc-cpx gtz-chl-cpx-99-mo gtz-calc	<1%	broken broken core Gougy zones	80	67%	80									
			70° Wk	100° 125° 130° 140° 145x2	170° 160° 125° 130° 140° 145x2	1/16 1/16 1/16 3/4 1/2 1 + 1/2	gtz-ser-chl-cpx gtz-chl-ser-rank gtz-chl-cpx-Lcp> gtz-chl-carb-cpx gtz-ser-chl-cpx-Lcp gtz-ser-chl-cpx-Lcp	<1%		916	62%	12%	99652	.11	.006	.10%					
			30° 45° Wk Npl	120x2 15° 30° 140° 30x2 110° 50°	120x2 15° 30° 140° 30x2 110° 50°	1/8x2 1/8 1/8 1/20x2 1/16	Gtz - ar - chl - cpx2 gtz-carb-hem gtz-chl-cpx-Lcp gtz-chl-cpx-Lcp gtz-chl-X2 gtz-chl-cpx	<1%		95	78%	40%	99653	.32	.012	.20%					
											103		85%	100							
											107	80%	40%	99654	.12	.018	.09%				
											110										

**GRID** \_\_\_\_\_

# GIBRALTAR MINES LTD.

HOLE No. 85-02  
SHEET NO. 3 of 4

GRID \_\_\_\_\_

# GIBRALTAR MINES LTD.

HOLE No. 85-02  
SHEET NO. 1 of 4

**GRID** \_\_\_\_\_

# GIBRALTAR MINES LTD.

LOCATION N. Wall Gulk Pit on Ramp  
DATE COLLECTED 26 March, 1985  
DATE COMPLETED 27 March 1985

BEARING \_\_\_\_\_  
LENGTH 200 /  
DIP -90°

ATTITUDE 46602.17 N  
LATITUDE 53540.06 E  
ELEVATION 3789.89'

HOLE No. 85-01  
SHEET NO. 1 of 4

ccco on M.R.T.  
March 27-28, 1985

GRID

## GIBRALTAR MINES LTD.

HOLE No. 85-01  
SHEET NO. 2 of 4

ROCK TYPES & ALTERATION			GRAPHIC LOG			FRACTURE ANGLE TO CORE AXIS - FREQUENCY -			ESTIMATED % PYRITE	BOTTOM DEPTHS			Bottom Depth Feet	Estimated Core Recovery %	P.O.D.	ASSAY RESULTS			
			L to Core Foliation	Solution Alteration Foliation	Structure	Ytine Vol.	Wtine Vol.	Mineralization		LEACH CAP	LIM. ZONE	SUPERGENE	REMARKS	Sample Number	% Cu	% Mo	Estimated Grade		
			20° -70° Str. to Mod.	60° Mod.	30° 130°X3 75°	40° 80° 150° 120° 30° 1/2 1/2+1/8+1/4 1/8	1/16 1/14 1/16 1/2 1/2+1/8+1/4 1/8	Qtz-chl-cp- chl-mo- Qtz-Vn-chl-mag-cp-carb Qtz-carb-gg-hem Qtz-chl-py-cp-cm0 Qtz-chl-gp Qtz-chl-ser-opy-py-pass Qtz-chl-mag-hem?	0 10 20 30 40 50 60 70 80 90	1.3%	Zones of disseminated cp.			51					27%
			60° Mod.	70° Mod.	170° 160° 80° 130° 1/2+1/16 1/8X5	1/20 1/8 1/16 1/2+1/16 1/8X5	Qtz-carb-hem Qtz-chl-ser-opy Qtz-Vn-chl-mag-cp-vuggy Qtz-chl-mo Qtz-chl-cp-bornite? Qtz-vn-de-mag-ep Qtz-vn-all-ep-carb>	0 10 20 30 40 50 60 70 80 90	<1%	Broken & vuggy in places - carb-hem.			54	50%	9%	99630	.49	.012	Grade Mo.5%
			70° WK	80	130° 160° 160°X2 1/2+1/16	1/2 3/4 1/2 1/20 1/2 1/8 1/8X2	Qtz-chl-ser-cp Qtz-chl-ser-py-cp Qtz-all-ser-ep-cc-vuggy Qtz-all-cp Qtz-ser-chl-carb Qtz-chl-py-cp-carb-hem	0 10 20 30 40 50 60 70 80 90	<1%	88%			65	60%	8%	99631	.34	.016	-25%
			70° WK	90	145 140° 150°X2 1/2+1/16 1/2 1/20 1/2 1/2+1/16 1/8	1/8 1/8 1/8 1/8 1/8 1/8 1/8	Qtz-chl-ser-carb-cc?> Qtz-all-carb-gg-hem Qtz-chl-cp Qtz-ep-chl-carb-py mag-Qtz-ser-cp-hem Qtz-all-ser-ep-cc Qtz-all-cp	0 10 20 30 40 50 60 70 80 90	<1%	- bo? - could be tarnish! - found mineralized veins.			74 1/2	78%	12%	99632	.42	.016	.22%
			20-70° WK Mod	100	125° 115° 110° 130°X2 125° 130°X2 130° 150°X3	1/14 5 1/16 1/16X2 1/16 1/4X2 1/20X3	Qtz-ser-chl-cp Qtz-Vn-ser-chl-150°(mag)-cp Qtz-carb-chl-cp Qtz-chl-mag-cp-X2 Qtz-chl-ser-opy-cp Qtz-ser-chl-carb-cpx2 Qtz-chl-mag-ccp-carb	0 10 20 30 40 50 60 70 80 90	<1%	Disseminated cp. in places.			87	81%	45%	99633	.29	.016	.18%
			104-110 Sau. R.P. w/mix dk alt zones & vns	110	150° 130° 130° 170° 160° 125° 125° 150°X3	1/16 1/2 2" 1/16X2 1/2 1/20X2	Qtz-chl-ep-cc-vuggy Qtz-carb-all-ep> Qtz-chl-carb-cm0>-cp Qtz-calcareous Qtz-chl-cp-X2 Qtz-chl-carb-150°mag-cp	0 10 20 30 40 50 60 70 80 90	<1%	94%			92 1/2	90%	78%	99634	.51	.048	.29%
													105	93%	20%	99635	.23	.010	.22%
														90%	110				

GRID

## GIBRALTAR MINES LTD.

HOLE No. 85-01  
SHEET NO. 3 of 4

ROCK TYPES & ALTERATION			L to Core Collection	GRAPHIC LOG Alteration Proportion	Value L to Core Axis	Value of Minerals	Minerals	FRACTURE ANGLE TO CORE AXIS -FREQUENCY-	ESTIMATED % PYRITE	BOTTOM DEPTHS			Footage Bottom	Estimated Core Recovery %	R O D	ASSAY RESULTS				
										LEACH CAP	LIM. ZONE	SUPERGENE				Sample Number	% Cu	% Mo	Estimated Grade	
		REMARKS								REMARKS	REMARKS	REMARKS								
	110-119 DK #14 Zone.		60° Mod	110 Mod	65° 60° 30° 90° 45° 45° 45° 45° 120 120	1/8 1/8 1/8 1/8 3" 3/8" 12"	gtz-chl - ser - mag (cp) gtz-chl - ser-mag - cp gtz-chl - ser-thyg - cp gtz-chl - ser-mag = cp gtz-vn - <chl>-<ser>-mag gtz-chl - (no sulphides) gtz + broken core - carbarenous	<<1%					115	14%	99636	.49	.020	.15%		
	119-146 Sauc. Alt'd Q.D. w/ narrow zones of DK after?		60° WT	120 130	75° 30°x2 30° 115° 15° 15° 15° 160° 130°	1/20x2 1/20x2 1/16 1/8 1/2 1/2 1/2 1/2 1/8	gtz + broken core - carbarenous gtz - chl - ser - cp x 2 gtz - chl - ser - cp gtz - chl - carb gtz - carb - cp - chl carbogg - broken core gtz - carb - chl gtz - chl - carb - cp	<<1%				120 1/2	95%	120						
	128-131' - gtz-chl - carb zone		85° WT	130	85	1/8	gtz-chl - cp x 2						127	89%	99637	.06	.004	.13%		
			60° WT	130 140	120 120° 120° 160 180 180 180 180 140 140	1/8x2 2" 1/8x2 1/8x2 1/4 1/8 1/8 1/8 1/8 1/8 1/8	gtz-vn - <chl>-<ser>-<carb> gtz-chl - cp - py - <cp> x 2 gtz-chl - ep - <py> - <cp> gtz-chl - ep - <py> - <cp> carb-hem gtz-chl - cp gtz-chl - carb	<1%				130								
			60° Mod +	140	50° 70° 55 70 70 160x3 30° 30°	1/16x3 1/16 1/8	gtz-chl-ser - cp - mo gtz-carb gtz-chl - ser - <cp> gtz-chl - ser - cp gtz-ser - chl - cp - mo gtz-ser - chl - <cp>					137	88%	62%	99638	.05	.006	.09%		
	146-158' Rock takes on a finer grained, more altered	ND	60° Mod +	150	50° 70° 55 70 70 160x3 30° 30°	1/16x3 1/16 1/8	gtz-chl-ser - cp - mo gtz-carb gtz-chl - ser - <cp> gtz-chl - ser - cp gtz-ser - chl - cp - mo gtz-ser - chl - <cp>	<1%				140	95%	140						
	Look, less distinct grains - sand, becomes less & becomes concentrated as epidote stringers and blocks	ND	60° Mod +	150	30° 30° 130x4 150° 145° 145°	1/8 1/2 1/20x4 1/20 1/20 1/8	gtz - chl - cp - mo gtz - chl - ep - cp - mo gtz - chl - ep - cp x 4 gtz - chl - cp - <cp> gtz - chl - cp					143 1/2			60%	99639	.23	.014	.15%	
	150-180' Fine grained, gtz rich, altered rock w/ abund. ep blottches & stringers (a few narrow NP zones dof the above rock type)	ND	60° Mod +	160	160x2 15° 30x2 30x4 40° 25° 25°	1/20x2 1/20 1/16x2 1/16x4 1/9 1/16x4 1/16x4	gtz - ep - py - <cp> gtz - ep - chl - py - <cp> - um gtz - vn - chl - mo gtz - chl - cp x 2 gtz - chl - <cp> gtz - chl - <cp> gtz - mag - chl - cp - cp	<1%				153			56%	99640	.23	.014	.15%	
			60° Mod +	170	65° 30x2 30x4 40° 25° 25° 60°	1/20 1/16x2 1/16x4 1/9 1/16x4 1/16x4 1/16x4	gtz - ep - chl - py - <cp> - um gtz - vn - chl - mo gtz - chl - cp x 2 gtz - chl - <cp> gtz - chl - <cp> gtz - chl - <cp> gtz - mag - chl - cp - cp	<1%				160	93%	160						
													163			60%	99641	.11	.012	.15%
													170	87%						

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# GIBRALTAR MINES LTD.

HOLE NO. 85-01  
SHEET NO. 4 of 4