

Diamond Drill



32D12SW0120 13 HARKER

010

Township of HARKER

Report No: 13

Work performed by: Cdn. Johns-Manville Co. Limited

Claim No	Hole No	Footage	Date	Note
L 70958	GM-1	650'	Apr/61	
L 70959	GM-2	600'	May/61	
	GM-4	653'	May/61	
L 70960	GM-3	651'	May/61	
		<u>2554'</u>		

Notes:

DRILL LOG

LOCATION: Line 40400 West; 11425 feet South of the B/L

DATE STARTED: April 29/61

PROPERTY: Ghost Mountain Group - Harker Township

DATE COMPLETED: May 7/61

HOLE NO: G. M. #1

TOTAL DEPTH: 650'

SHEET NO: 1

ELEVATION OF COLLAR: Surface

ELEVATION OF BOTTOM:

BEARING: S36°W

DIP: -45°

GEOLOGICAL DESCRIPTION	FOOTAGE	REG.	TH. V.	FIBRE VEINS												% SL F.	% Mass F.	% Total F.	Vein Avg	% MAG	% PTR	Rock S	REMARKS (VEIN TYPE)
				1	2	3	4	5	6	7	8	9	10	11	12								
0 - 8' casing	8 - 20	11.8	I	4														45	M	15	MP		
8' - 190' dark grey-green medium and coarse grained olivine-rich perid. with large (1/2" long) poikilitic bastite pseudomorphs and olivine chryso-crysts. Completely serp'd. but poorly carbonatized.	20 - 30	9.8	I	3														50	M	10	MP		
	30 - 40	9.7	I	5														35	M	10	MP		
	40 - 50	9.8	I	2														35	M	10	MP		
29', 37'5", 39', 45', 46' - 47'5", 55', 56', 57', 64'5", 70' - slip zones	50 - 60	9.7	I	8	2													50	M	10	MP		
From 50' - patches of whitish isotropic pyroxene-rich material becoming conspicuous. These are apparently secondary after bastite pseudomorphs.	60 - 70	9.7	I	5	1													45	M	10	MP	Slip fibre	
	70 - 80	9.8	I	13														45	M	10	MP		
	80 - 90	9.8	I	7	1													40	M	10	SP		
	90 - 100	9.8	I	14	2													65	M	10	SP		
76' - 78', 84', 91', 99', 97', 102', 105', 106', 112', 115', 119', 117', 125', 122' - slip zones	100 - 110	9.8	I	9	1													45	M	10	SP		
3/4" felsitic veinlets at 117'	110 - 120	9.7	I	3														45	M	10	SP		
126', 128' - 129'5", 130'5", 140', 147', 148', 150' - 151', 154', 159', 161' - 162', 164', 167', 169', 172', 180', 182', 185', 188', 190', 194', 196' - 200' - slip zones	120 - 130	9.7	I	3														45	M	10	SP		
	130 - 140	9.8	I	1														45	M	10	SP		
	140 - 150	9.7	I	3														45	M	10	MP		
	150 - 160	9.7	I	7														30	M	10	MP		
190' - 300' painted serp veins (dark green) often with chrysotile veins growing within appear hard. These usually follow cracks in the perid.	160 - 170	9.7	I	8														45	M	10	MP		
	170 - 180	9.8	I	7														45	M	10	SP		
	180 - 190	9.6	I	4														45	M	10	MP		
201' - 202', 203', 204'5", 206' - 207', 212', 214', 217', 218', 225', 226'5", 228', 233', 239'5", 264', 271', 253', 277' - 279', 282' - 284'5", 289' - slip zones	190 - 200	9.6	I	5														50	M	10	MP		
	200 - 210	9.6	I	4														45	M	10	MP		
	210 - 220	9.7	I	16	1													50	M	10	SP		
	220 - 230	9.6	I	5														45	M	7	SP		
	230 - 240	9.7	I	4														45	M	7	MP		
	240 - 250	9.8	I	7	1													50	M	10	SP		
	250 - 260	9.8	I	1														50	M	7	SP		
301', 303'5", 304'5", 311', 313', 315' - 316', 317'5", 319' - 320', 321' - 322', 324', 325', 326', 333', 337'5", 340', 349' - 349'5" - slip zones	260 - 270	9.8	I	3														45	M	10	SP		
300' - 375' poikilitic pyroxenes (bastite) in perid. one fewer and far smaller in size (up to 1/8") and the perid. is more uniform in appearance.	270 - 280	9.7	I	8														45	M	10	MP		
	280 - 290	9.7	I	7	1													45	M	7	MP		
The bastites are also now mostly altered to the isotropic pyroxene-rich material.	290 - 300	9.7	I	6														50	M	7	SP	Painted serp veinlets very common	
	300 - 310	9.6	I	3														50	M	5	MP		
355', 370', 352', 373', 382', 384', 389' - 391', 392', 396', 397', 399' - slip zones	310 - 320	9.7	I	10														45	M	7	MP		
	320 - 330	9.7	I	9														50	M	7	MP		
375' - 500' large poikilitic bastite pseudomorphs again appearing though few and relatively small (1/4" diameter)	330 - 340	9.8	I	11	1													45	M	7	SP		
	340 - 350	9.8	I	7														45	M	7	SP		
	350 - 360	9.8	I	3														50	M	5	SP		
402'5", 406', 412', 414', 420', 426'5", 429', 430', 434', 436' - 437', 438', 439', 446', 445', 450', 456', 466', 471', 489', 494', 498' - 500', 506', 507'5", 510', 515', 514', 516', 517', 522', 523', 524', 528', 536', 534', 540' - 542', 554' - 555', 566', 567', 568', 572' - 573', 575', 585' - 586', 587', 596', 599', 590', 601', 602', 606', 610', 611', 612', 613', 621' - 625'	360 - 370	9.8	I	4														50	M	5	SP	A few chrysotile veins are highly compacted and altered to an amorphous yellow material	
	370 - 380	9.8	I	8														45	M	5	SP		
	380 - 390	9.6	I	7	2													45	M	7	SP		
	390 - 400	9.7	I	10	1													45	M	7	SP		
	400 - 410	9.7	I	6	1													45	M	7	SP		
	410 - 420	9.8	I	13														45	M	7	SP		

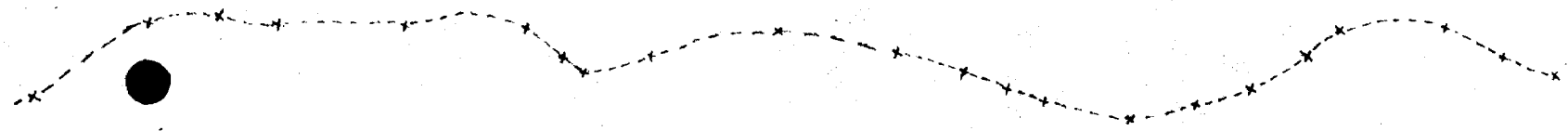
DRILL LOG

LOCATION:
DATE STARTED:
DATE COMPLETED:
TOTAL DEPTH:

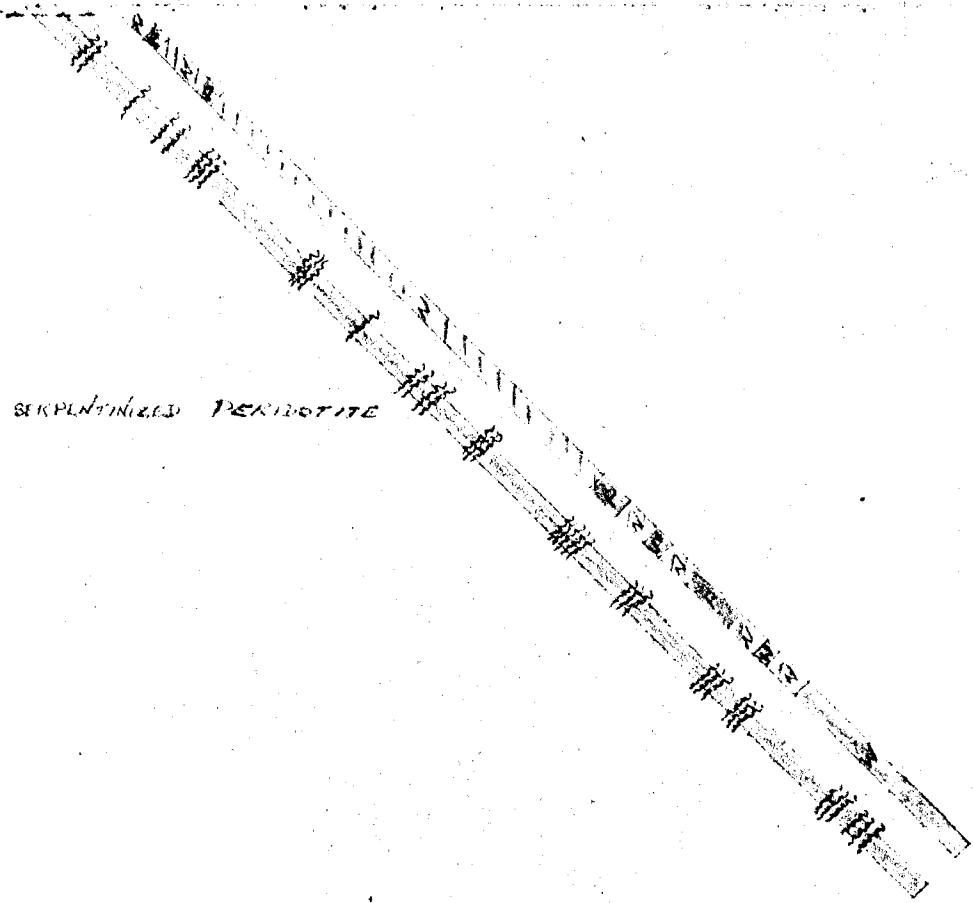
PROPERTY: Ghost Mountain Group - Harker Twp
HOLE NO: G. M. #1 (cont'd)
SHEET NO: 2

ELEVATION OF COLLAR:
ELEVATION OF BOTTOM:
BEARING:
DIP:

GEOLOGICAL DESCRIPTION	FOOTAGE	REC.	TR. V.	FIBRE VEINS														% SL F.	% Massif.	% Total F.	Vain Ang	% MAG	% PR	Rock S	REMARKS (VEIN TYPE)
				1/16"	1/8"	1/4"	3/8"	1/2"	5/8"	3/4"	1"	1 1/4"	1 1/2"	1 3/4"	2"	2 1/2"	3"								
500' - 627' medium grained dark pyroxene-rich perid. Large poikilitic pyroxenes (now bastite becomes increasingly more abundant downwards until the rock is almost a pyroxenite.)	420 - 430	9.6	L	10	2													45	M	7	MF	Fibre zone - 390.5 - 400			
	430 - 440	9.8	L	5														45	M	7	MF				
	440 - 450	9.8	M	12														45	M	7	MF				
	450 - 460	9.8	L	11	2													45	M	7	MF				
627' - 635'5" highly sheared pyroxene-rich perid. but still quite compact and only schistose in appearance.	460 - 470	9.7	L	16	1													45	M	7	MF				
	470 - 480	9.7	L	13	3													50	M	7	SF				
	480 - 490	9.8	L	3														55	M	10	SF				
635'5" - 650' sheared dark olivine-rich perid. with few poikilitic pyroxenes these being 1/4" in diameter. Sharp contact between the pyroxene-rich and olivine-rich peridotites.	490 - 500	9.7	L	2														45	M	10	MF				
	500 - 510	9.8	L															50	M	15	SF	Faintest serp veins common with a few picrolitic cross-fibre veins (very thin & poor however)			
	510 - 520	9.8	L	1														45	M	20	MF				
650' - END OF HOLE.	520 - 530	9.7	L	1																20	SF				
	530 - 540	9.5																		20	SF				
	540 - 550	9.6																		20	MF				
	550 - 560	9.7																		25	SF				
	560 - 570	9.7																		30	MF				
	570 - 580	9.7																		35	SF				
	580 - 590	9.8																		40	SF				
	590 - 600	9.8																		40	SF				
	600 - 610	9.8																		40	SF	A few carbo- nate veins			
	610 - 620	9.8																		40	SF				
	620 - 630	9.8																		40	SF				
	630 - 640	9.7																		25	HF				
	640 - 650	9.7																		15	MF				
	Logged by:		P. L.	G. Crubb,																					



ON A BOREHOLE



SERPENTINIZED PERIDOTITE

CANADIAN JOHNS-MANVILLE CO. LTD.	
MATHERS MURDO MINE ONTARIO	
G. DRILL SECTION - HOLE G.M.#1	
DIP: -45°	BEARING: S36°W
Loc: 40+00W	DEPTH: 650'
111255	
SCALE 1" = 100'	DATE JUNE, 1961
DRAWN R.V.S.	TRACED H.K.R.
TRACED	TWP.
APPROVED	

DRILL LOG

LOCATION: Sec. 46400 West; 8475 foot south
 DATE STARTED: May 8th/61
 DATE COMPLETED: " 16th/61
 TOTAL DEPTH: 600'

PROPERTY: Ghost Mountain Group - Harker Twp
 HOLE NO: G. M. #2
 SHEET NO: 1

ELEVATION OF COLLAR: Surface
 ELEVATION OF BOTTOM:
 BEARING: S37°30' W
 DIP: -45°

GEOLOGICAL DESCRIPTION	FOOTAGE	REC.	TH. V.	FIBRE VEINS												% S. F.	% Mass. F.	% Total F.	Vein Ang.	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)
				1/4"	1/8"	1/16"	1/32"	1/64"	1/128"	1/256"	1/512"	1/1024"	1/2048"	1/4096"	1/8192"								
0 - 33' casing	33 - 40	5.6	I	2														45	M	10	MF	Irregular type	
33' - 400' dark coarse olivine peridotite with conspicuous large pale bastite pseudomorphs. Completely serried, and very poorly carbonatised.	40 - 50	9.6	I	3														45	M	10	MF	also irregular replacement veins	
44', 49', 58', 52' - slip zones	50 - 60	9.8	I	9	1													45	M	15	SF	& lenticles in dunite - often ribbon-type	
A very few dark green painted serp veins with cross fibrous replacement chrysotile fibre	60 - 70	9.7	I	16														45	M	15	SF		
98'15", 89', 93'15", 95', 104', 110' - 115', 116', 119', 125', 126' - 127', 146' - 147', 148' - slip zones	70 - 80	9.6	I	11														45	M	15	SF		
130' - 143', 147' - 148' and 150' massive sheared serpentinite rock	80 - 90	9.8	I	7														45	M	15	SF		
146' - 147' highly carbonatised section with magnetite veinlets	90 - 100	9.7	I	6														40	M	15	SF		
147' - 148', 168', 169', 170' - 174', 176', 203', 202', 204', 219', 221', 234', 239', 242'15", 248' - slip zones	110 - 120	8.4	I	8														45	M	15	MF		
245' - 270' perid. showing moderate carbonatisation	120 - 130	9.8	M	13														45	M	15	MF		
271' - 275', 267' - 269', 266', 261', 259', 277', 279', 285', 295', 286', 287', 290' - 293', 297', 298' - 299' - slip zones	130 - 140	8.7	I	3														50	M	-	MF		
300' - 306', 313' - 314', 316', 327', 335', 341', 346', 349', 352' - 353', 355', 359', 363', 364', 369', 375' - slip zones.	140 - 150	9.7	I	5														50	M	10	SF		
376', 379', 381', 384', 388', 390', 393' - 395', 397' - 402', 404', 409', 412' - 413', 415' - 416', 420', 425', 427' - 429', 434' - 435', 439', 443'15", 160 - 170	150 - 160	9.8	I	9														45	M	15	SF		
441' - slip zones	170 - 180	9.9	I	6														40	M	10	MF		
400' - 425' coarse to medium grained olivine peridotite with smaller (1/4" - 1/8" olivine) bastite pseudomorphs (pseudomorphs)	180 - 190	9.8	I	6														45	M	7	SF		
425' - 575' very pyroxene-rich perid. with high proportion of small (1/4" diam.) bastite olivine enclosing olivine chadocrysts; moderate carbonisation.	190 - 200	9.8	I	9														45	M	7	SF		
454', 459', 462'15", 467' - 468', 481', 483', 484', 490', 504', 507'15", 514', 517', 527', 529' - 531', 533', 540', 543', 550' - slip zones	200 - 210	9.8	M	9														45	M	10	SF	A very few carb veinlets present	
531' - 533' - highly carbonatised section of pyroxene-peridotite.	220 - 230	9.8	I	9														45	M	10	SF		
553', 554', 556', 558' - 560', 562', 566', 568', 569' - 570', 573' - 575', 575' - 578', 582', 583' - 587', 579', 583' - 590', 595', 596' - slip zones	230 - 240	9.8	I	6														45	M	10	SF		
575' - 583' highly carbonatised and sheared pyroxene-peridotite. Sharp contact against fine peridotite.	240 - 250	9.8	I	8														45	M	15	SF		
Below	250 - 260	9.8	I	6														40	M	10	SF		
583' - 590', 593' - 600' fine grained dark olivine peridotite, with large bastite olivine and small	260 - 270	9.8	I	11														45	M	10	MF		

DRILL LOG

LOCATION:

DATE STARTED:

DATE COMPLETED:

TOTAL DEPTH:

PROPERTY: Ghost Mountain Group - Harker Twp

HOLE NO: G. M. #2 (cont'd)

SHEET NO: 2

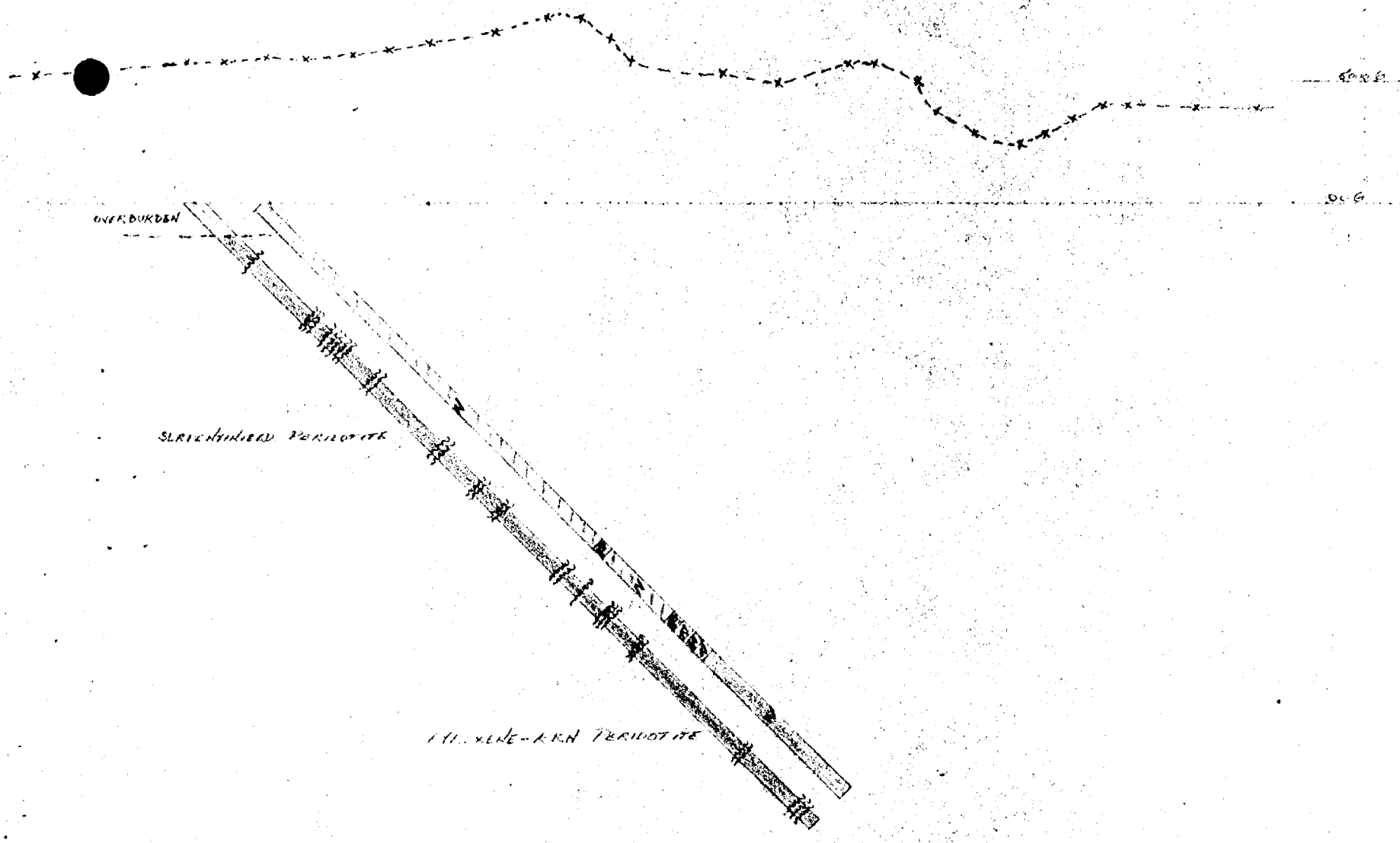
ELEVATION OF COLLAR:

ELEVATION OF BOTTOM:

BEARING:

DIP:

GEOLOGICAL DESCRIPTION	FOOTAGE	REG.	D	FIBRE VEINS														% SL F.	% Mass F.	% Totl F.	Vein Ang	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)
				1/4	1/8	1/16	1/32	1/64	1/128	1/256	1/512	1/1024	1/2048	1/4096	1/8192	1/16384	1/32768								
olivine chadocrysts	270 - 280	9.6	L	4															45	M	10	HF	Dark green		
590' - 593' inclusion of highly sheared and carbonated pyroxenite contact	280 - 290	9.7	L	12															55	M	10	MF	Painted serp		
	290 - 300	9.7	M	17															55	M	10	MF	veins common		
Note: this assemblage probably represents shearing along the contact between the chilled peridotite floor and the coarser pyroxenite above.	300 - 310	9.8	M	19	1														60	M	15	SF			
	310 - 320	9.6	M	6															60	M	15	SF			
	320 - 330	9.8	H	8															60	M	15	SF			
	330 - 340	9.8	M	9															65	M	15	SF			
	340 - 350	9.6	M	5															65	M	15	MF			
	350 - 360	9.6	L	5															60	M	15	SF			
	360 - 370	9.7	L	12	2														60	M	10	MF			
	370 - 380	9.7	L	26	1														60	M	10	MF			
	380 - 390	9.7	L	15	1														60	M	15	MF			
	390 - 400	9.7	L	5															60	M	15	MF			
	400 - 410	9.7	L	9															50	M	15	SF			
	410 - 420	9.7	L	6															50	M	15	MF			
	420 - 430	9.3	L	14	1														60	M	20	SF			
	430 - 440	9.8	L	13	4														60	M	25	SF			
	440 - 450	9.7	L	4															50	M	30	SF			
	450 - 460	9.8																			35	SF			
	460 - 470	9.7	L	1															45	M	40	SF	Only a few dark green painted		
	470 - 480	9.8	L																50	M	40	SF	serp veins		
	480 - 490	9.8	L																60	M	45	SF			
	490 - 500	9.8																			45	SF			
	500 - 510	9.8																			45	SF			
	510 - 520	9.8																			45	SF			
	520 - 530	9.8																			50	SF			
	530 - 540	9.8																			55	SF			
	540 - 550	9.8																			55	SF			
	550 - 560	9.8																			65	MF			
	560 - 570	9.8																			55	SF			
	570 - 580	9.4																			65	MF			
	580 - 590	8.2																			35	HF			
	590 - 600	7.7																			15	MF			
	Logged by:		P.	L. C. Grubb.																					



CANADIAN MINING & DEVELOPMENT CO. LTD.
 HANCOCK MINING & DEVELOPMENT CO. LTD.
 DRILL SECTION - HOLE G.M. # 2,
 DIP: -45° BEARING: S 37° 30' W
 Loc: 46400W DEPTH: 600'
 8+75S
 SCALE 1" = 100' DATE JUNE, 1961
 BY: S.V.S. DRAWN BY: HARPER
 TWP.

DRILL LOG

LOCATION: Line 54480 West, 1425 feet south of the B/L

DATE STARTED: May 17th '61

DATE COMPLETED: " 24th/61

TOTAL DEPTH: 651'

PROPERTY: Ghost Mountain Group - Harker Twp

HOLE NO: G. M. #3

SHEET NO: 1

ELEVATION OF COLLAR: Surface

ELEVATION OF BOTTOM:

BEARING: S9°30'W

DIP: -45°

GEOLOGICAL DESCRIPTION	FOOTAGE	REC.	TH. V.	FIBRE VEINS												% S. F.	% Mass F.	% Tot. F.	Vein Ang	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)			
				1/4"	1/8"	1/16"	1/32"	1/64"	1/128"	1/256"	1/512"	1/1024"	1/2048"	1/4096"	1/8192"											
0 - 25' casing	25 - 30	5.0																								
25' - 450' dark greenish-brown olivine serp'd, perid., medium to coarse grained with bastite pseudomorphs "speckled" throughout	30 - 40	9.6																								
Concentration of minor slips causing broken core at 43' - 44', 46' - 48', 52', 67', 71'.	40 - 50	9.7																								
Zone 95' - 97' more altered and cut by greenish-grey. Mg3SiO5 veins in turn cut by dark-green amorphous serp veins at 0 - 20° to core.	50 - 60	9.8																								
Highly broken core due to minor picrolite slips at 103' - 104' & 108' - 109'.	60 - 70	9.7																								
1 - 12" zone of very large bastite pseudomorphs at 122'. Few picrolite slips 30 - 40° to core at 120' - 128'.	70 - 80	9.6																								
Highly broken core - fractured ? zone (132' - 135') with carbonatization along slip faces.	80 - 90	10.0																								
Fractured zones as above at 143', 144' - 145' and 147'5" - 148'	90 - 100	9.9	L	2																						
Minor carbonatized slip at 30 - 40° to core at 150' - 170' cause easily broken core veins.	100 - 110	9.9	L	2	1																					
An increase in magnetite streaks.	110 - 120	9.8	L	2	1																					
More competent rock beginning at 170' with only scattered slips. Dark green amorphous serp veins associated with wider fibre veins. Much larger bastite pseudomorphs noted from 170' - 251'	120 - 130	9.8	M	2																						
Few minor broken core slip zones slightly carbonatized at 191'5" - 192', 197' - 197'5" and 199'5" - 200'.	130 - 140	9.6	L	1																						
Ladder vein (thread veinlets) noted 207' - 208'.	140 - 150	9.6	L	2																						
Slips associated with fibre veinlets cause broken core 215' - 216'	150 - 160	9.4	L	1																						
Zone at 223' - 224' is deficient in bastite and is a greenish black serp'd. perid. Zone at 233' - 236' is moderately broken due to slips at 45° to core.	160 - 170	9.7	M	1	1																					
Number of dark green amorphous serp veins with an increase in associated magnetite noted. Finer grained dark greenish perid. beginning at 252'.	170 - 180	9.9	M	1																						
Highly broken core due to numerous slips at 262' - 264'. Notable increase in magnetite at 269' - 270', in association with carbonatized slips at 30° to core.	180 - 190	9.9	M	3																						
Highly broken core due to slips at 270' - 275'	190 - 200	9.9	H	2	1																					
More competent core with minor slips	200 - 210	10.0	H	4																						
Slightly to moderately broken core at 30 - 50° to core.	210 - 220	9.9	H	1	1	1																				
Fine grained zone (300' - 302') deficient in bastite	220 - 230	9.9	H	2																						
Zone with moderately broken core due to slip at 30° to core from 318' - 319'	230 - 240	9.8	H	2	1																					
	240 - 250	9.9	M	4																						
	250 - 260	9.9	H	5	2																					

DRILL LOG

LOCATION:

DATE STARTED:

DATE COMPLETED:

TOTAL DEPTH:

PROPERTY: Ghost Mountain Group - Harker Twp

HOLE NO: G. M. #3 (cont'd)

SHEET NO: 2

ELEVATION OF COLLAR:

ELEVATION OF BOTTOM:

BEARING:

DIP:

GEOLOGICAL DESCRIPTION	FOOTAGE	REC	L	V	FIBRE VEINS														% SL F	% Mass F	% Total F	Vein Ang	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)
					1/8"	1/4"	3/8"	1/2"	5/8"	3/4"	1"	1 1/4"	1 1/2"	1 3/4"	2"	2 1/4"	2 1/2"	2 3/4"								
Highly broken core due to slips at 327' - 329' & 334' - 337'	260 - 270	9.8	H		2	1													45	M	6	HF				
Few minor carbonatized slips at 20° to core, Minor broken core resulting.	270 - 280	9.8	L		1														45	M	6	HF				
Highly broken core at 280' - 360' due to slightly carbonatized slips at 10 - 30° to core. Concentration of magnetite at 352' - 353'	280 - 290	9.9	M		2														45	M	6	HF				
Highly broken core at 290' - 300' due to slips at 30 - 40° to core.	290 - 300	9.9	M		2	1													20	M	7	HF				
Highly broken core due to slips (412' - 414' and 417' - 418'). These slips are coated with bluish-white Co_3SiO_2 material	300 - 310	9.5	M		2														70	M	7	HF				
2 (1/16") magnetite veinlets enclosing fibre veinlets at 432' 5"	310 - 320	9.8	L		1														60	M	8	HF				
Massive Rock.	320 - 330	9.8	M		3														60	M	8	HF	Numerous 1/32"			
Dark green serp'd. perid. with whitish-grey bastite pseudomorphs continuous. Massive except where otherwise indicated. Minor picrolite associated with fibre at 469'	330 - 340	9.7	L		2														40	M	8	MF				
Highly broken core due to slips at 475' - 480'	340 - 350	9.8	M		2														30	M	8	HF	and less than			
Minor whitish-blue $\text{Mg-Co}_3\text{-SiO}_2$ coats slips which are associated with fibre veins at 4504'. Highly broken core 507' 5" - 509' due fractures at 200.	350 - 360	9.8	L																							
Minor development of picrolite, coating fractures at 10 - 20° axis. Noted at 520' 5" - 530' core appears to break fairly easy along 1/32" fibre veinlets.	360 - 370	9.8	M		1														40	M	6	MF	1/32" veinlets			
Zone 531' - 32' is highly broken due to 2 picrolite veinlets 1/8" - 1/4" at 10° axis with a notable increase in associated magnetite; also broken core 534' - 535', 543' - 545' and 548' 5" to 549' due to serp'd. slips.	370 - 380	9.8	M																	M	6	MF				
Core 550' - 575' is more of a patchy nature with regards degree of serpentinization. 12" - 24" zones have differing degrees of bastite alteration. Only a few minor slips in this more massive zone	380 - 390	9.9	M		1														30	M	8	HF	throughout			
Highly broken core due to minor picrolite slips at 575' - 576', 581' - 582', and highly broken core 583' - 589' with slips at 50° to core. Moderately broken core 590' - 600' due to similar dark green serp'd. slips. Slight evidence of fault? Gouge at 582'.	390 - 400	9.8	L		1														50	M	9	HF				
Highly broken core zones 626' - 27', 633' 5" - 37' & 638' 5" - 639' 5" due generally to picrolite coated slips at 20 - 40° to core. Core continues from 600' to end of hole to be cut by abundance of black serp veinlets 20 - 50° to core. Other scattered slips cause broken core 602' to end. Hole giving generally	400 - 410	9.8	H																	M	9	HF				
	410 - 420	9.7	H		2														40	M	8	MF				
	420 - 430	9.9	M		1	1													50	M	7	HF				
	430 - 440	9.9	M		1														50	M	9	HF				
	440 - 450	10.0	M		1	2													40	M	9	HF				
	450 - 460	10.0	M		1														40	M	9	HF				
	460 - 470	10.0	L		2														60	M	9	HF				
	470 - 480	9.7	L		1														40	M	7	MF				
	480 - 490	9.8	L																	M	3	HF				

19 5

DRILL LOG

LOCATION:
 DATE STARTED:
 DATE COMPLETED:
 TOTAL DEPTH:

PROPERTY: Ghost Mountain Group - Harker Twp
 HOLE NO: G. M. #3 (cont'd)
 SHEET NO: 3

ELEVATION OF COLLAR:
 ELEVATION OF BOTTOM:
 BEARING:
 DIP:

GEOLOGICAL DESCRIPTION	FOOTAGE	REC	V	FIBRE VEINS														% SL F.	% Mass F.	% Total F.	Vein Ang	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)
				1/2	1/4	1/8	1/16	1/32	1/64	1/128	1/256	1/512	1/1024	1/2048	1/4096	1/8192	1/16384								
Minor blocky core. A 2" pale whitish green altered zone at 634'. A finer grained phase noted at 622' - 624'5".	490 - 500	9.9	M	1															60	M	9	SP			
651' - END OF HOLE.	500 - 510	9.9	I	2															20	M	9	SP			
	510 - 520	9.9	M																	M	9	SP			
	520 - 530	9.9	M	1															50	M	9	MF			
	530 - 540	9.8	I	3															20	M	10	MF			
	540 - 550	9.8	I	2 1															45	M	9	MF	Fibro veins at 10° to core - ladder veins)		
	550 - 560	9.9	I																	M	7	SP			
	560 - 570	9.9	M11																	M	6	SP			
	570 - 580	9.8	"																	M	9	SP			
	580 - 590	9.5	I																	M	5	MF			
	590 - 600	9.8	I																	M	9	MF			
	600 - 610	9.9	I	1															45	M	9	MF			
	610 - 620	9.9	I																	M	9	MF			
	620 - 630	9.8	I	5															20	M	9	MF			
	630 - 640	9.8	I	1															30	M	8	MF			
	640 - 651	10.9	M11																	M	9	SP			
	Logged by: K. V. Stewart.																								
					15	✓																			

DRILL LOG

LOCATION: Line 5400 West; 1000 feet south of the B/L
 DATE STARTED: May 25th/61
 DATE COMPLETED: June 1st/61
 TOTAL DEPTH: 653'

PROPERTY: Ghost Mountain Group - Harker Twp
 HOLE NO: G. M. #4
 SHEET NO: 1

ELEVATION OF COLLAR: Surface
 ELEVATION OF BOTTOM:
 BEARING: S5° E
 DIP: -45°

GEOLOGICAL DESCRIPTION	FOOTAGE	REG	TH. V.	FIBRE VEINS												% SL. F.	% Mass. F.	% Total F.	Vein Avg	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)				
				1/8"	1/4"	3/8"	1/2"	5/8"	3/4"	1"	1 1/8"	1 1/4"	1 1/2"	1 3/4"	2"												
0 - 27' casing	27 - 40	22.8	NI																								
27' - 61' dark greenish-black, medium to coarse grained pyroxene-rich serpd. perid.	40 - 60	19.8	"																								
Serp'd. slips at 20 - 40° to core cause highly broken core at 35' - 36', 40' - 41', 52' - 53', 54' - 55', 58' - 59', 77'5" - 78', 81'5" - 83', 91' - 92', 92'5" - 93', 98' - 99', 102'5" - 103'5", 105' - 105'5", 110' - 111', 115' - 116', 123' - 124', 140' - 142', 123' - 125'.	60 - 80	19.8	"																								
61' - 154' dark greenish-black, serpd. olivine perid. medium to fine grained with an abundance of bastite pseudomorphs. Zone 61' - 63' is dark schistose serp with white-green ferr banding	80 - 90	9.9	"																								
Two white-grey 2" siliceous bands with magnetite inclusions at 105'5" and 106'5"	90 - 110	19.8	"																								
Number of dark green amorphous serp veinlets at 98' - 154' - less than 1/16"	110 - 130	19.8	"																								
154' - 160' transitional zone between perid. & volcanics cut by numerous white siliceous stringers and blebs and altered serp remnants	130 - 150	19.8	"																								
A 2' coarse grained granitic? intrusion with sharp "baked" contacts at 10° to core	150 - 154	4.0	"																								
160' - 215' greenish-grey aphritic volcanic rock (most likely rhyolite) with numerous dark-green (serp?) hair veinlets (fracture coating) few white quartz stringers throughout. Fine fine banding possibly indicates flow lines at 194' - 196' and few other local zones. Also possibly volcanic breccia 212' - 213'5"	170 - 190	20	"																								
215' - 221' transitional zone between volcanics and perid.	190 - 215	24.8	"																								
221' - 265' very highly broken, blocky, schistose grayish black fine grained - aphritic serpd. perid. Shearing at 45° to core. Associated picrolite and slip serp. Lost core 225' - 227'	215 - 265	47.5	"																								
265' - 277'5" greenish-black, olivine perid. with 20% bastite pseudomorphs plus few serpd. slips	265 - 278	13	"																								
277'5" - 310' medium grained dark green olivine diabase, decreasing in grain size and serpentinization towards 310'	278 - 310	22	"																								
Serp'd. slips at 295'5" - 297', 292'5" - 293', 310' - 416' fine grained grayish green onstatite diabase with fine green crystals faces on fresh surface. Few minor slips 40° to core throughout. (serp'd. slips). Finely disseminated pyrite occupies more than 1% at 325' - 400'.	310 - 325	14.8	"																								
Beginning at 375' - 416' larger 1-2 mm greenish black altered rhombil pyroxene pseudomorphs appear	325 - 350	24.8	"																								
	350 - 375	25	"																								
	375 - 415	65	"																								
	475 - 524	48.8	"																								
	524 - 545	21	"																								
	545 - 607	62	"																								
	607 - 653	46	"																								

DRILL LOG

LOCATION:

DATE STARTED:

DATE COMPLETED:

TOTAL DEPTH:

PROPERTY: Ghost Mountain Group - Harker Township

HOLE NO: O. M. #4 (cont'd)

SHEET NO: 2

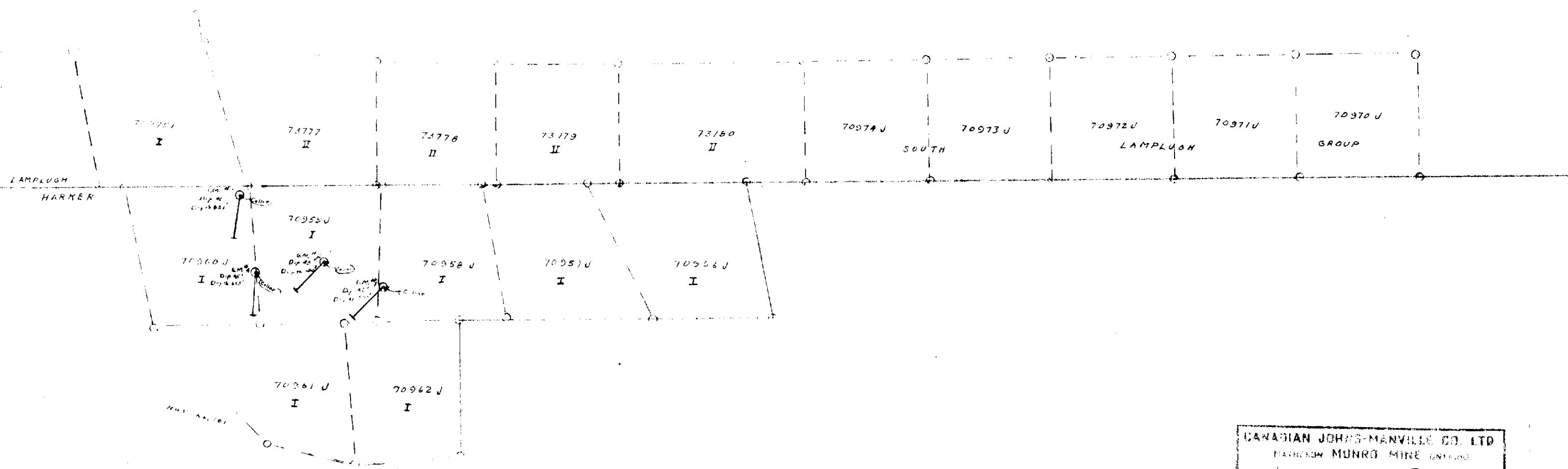
ELEVATION OF COLLAR:

ELEVATION OF BOTTOM:

BEARING:

DIP:

GEOLOGICAL DESCRIPTION	FOOTAGE	REC.	TH. V.	FIBRE VEINS													% SL. F.	% Mass. F.	% Total F.	Vein Ang	% MAG	% PYR	Rock S	REMARKS (VEIN TYPE)			
				3/7	1/4	1/2	1/8	1/16	3/8	1/4	1/8	1/16	1/2	1/4	1/8	1/16											
increasing in size and abundance to 416' 416' - 440' similar to 310' - 416' run but becoming much finer grained and grading to aphanitic texture. Vesicular structure 412' - 420' with (calcite?) coated vugs. 440' - 524' fine grained aphanitic greyish-green onstatite diabase with medium grained zone at 450' - 455'. Cut by abundance 5% - 10% of white acidic stringers. Massive rock with only few minor slips. Highly broken core 462' - 472' due to numerous fractures. Two 6" greyish soft talc zones at 460' and 462.5". Zone 501' - 503' has number of dark highly altered rhombic pyroxene inclusions. Very sharp contact at 45° to core between onstatite diabase and black perid. Perid. somewhat banded lobbing at contact. 524' - 545' aphanitic, greyish-black serpd. perid. cut by few acidic stringers 545' - 603.5" fine grained aphanitic greenish-grey (onstatite diabase?) Number of slips scattered throughout at 45° to core with concentration at 567' - 568', 586' - 587', 592' - 593', 598.5" - 599'. 603.5" - 607' transitional zone pyroxene rich perid. 607' - 653' fine grained greenish-black serpd. perid. with 20% taustite crystals. Serpd. slips 6" - 8" apart cause moderately broken core. Slips at 50° to core. 653' - END OF HOLE.																											
																											Logged by: R. V. Stewart.



CANADIAN JOHNS-MANVILLE CO. LTD.
 MATHeson MUNRO MINE ENTERPRISES
 PROPERTY PLAN
 GHOST MOUNTAIN GROUP
 SHOWING DIAMOND DRILLING
 SCALE 1" = 1000' DATE JUNE 19/61
 DRAWN R.E.K. HARKER
 CHECKED J.K.L. LAMPLUGH
 APPROVED F.V.E. T.M.P.
 REV. DEC/61



32D12SW0120 13 HARKER

GEO-MAG SYMBOLS

- Contour Interval 500 gamma
- Magnetite
- Magnetite with Magnetite Shales
- Magnetite with Magnetite Shales and Magnetite
- Magnetite with Magnetite Shales and Magnetite and Magnetite
- Magnetite with Magnetite Shales and Magnetite and Magnetite and Magnetite

GEOLOGIC LEGEND

- Diabase, Gabbro
- Magnetite Shales
- Magnetite Shales with Magnetite
- Magnetite Shales with Magnetite and Magnetite
- Magnetite Shales with Magnetite and Magnetite and Magnetite
- Magnetite Shales with Magnetite and Magnetite and Magnetite and Magnetite

ELECTRO-MAG SYMBOLS

- In-phase Curve
- Out-phase Curve
- Resistivity Zone

TOPO SYMBOLS

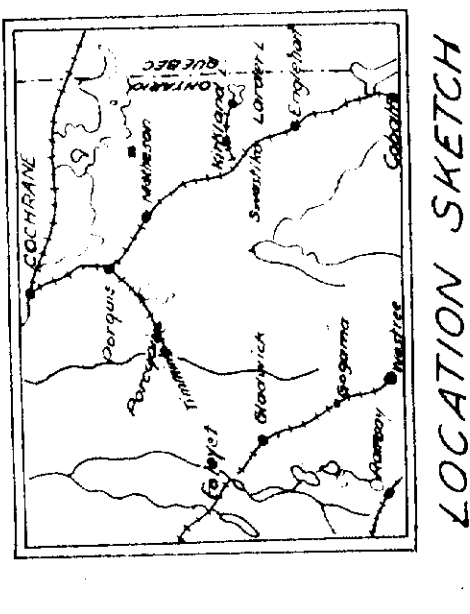
- Contour
- Ridge/Groove
- Scarp
- Mound in Swamp
- Creek
- Drill Hole
- Bluff/Rock
- Trench
- Strike and Dip
- Strike Dip Arrow
- Fence

Scale 40 Units/Inch
 Contour Interval 500 gamma
 Contour is positive
 MAG is negative

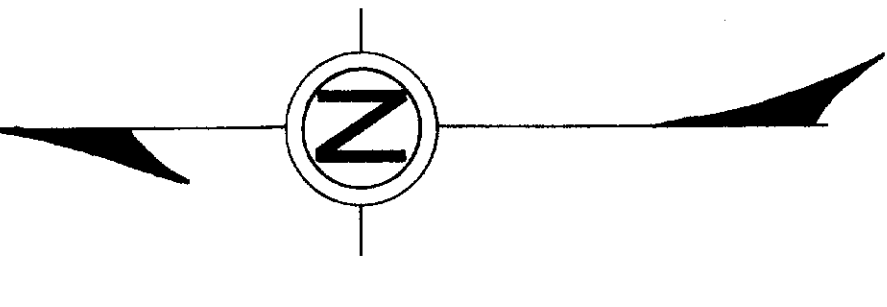
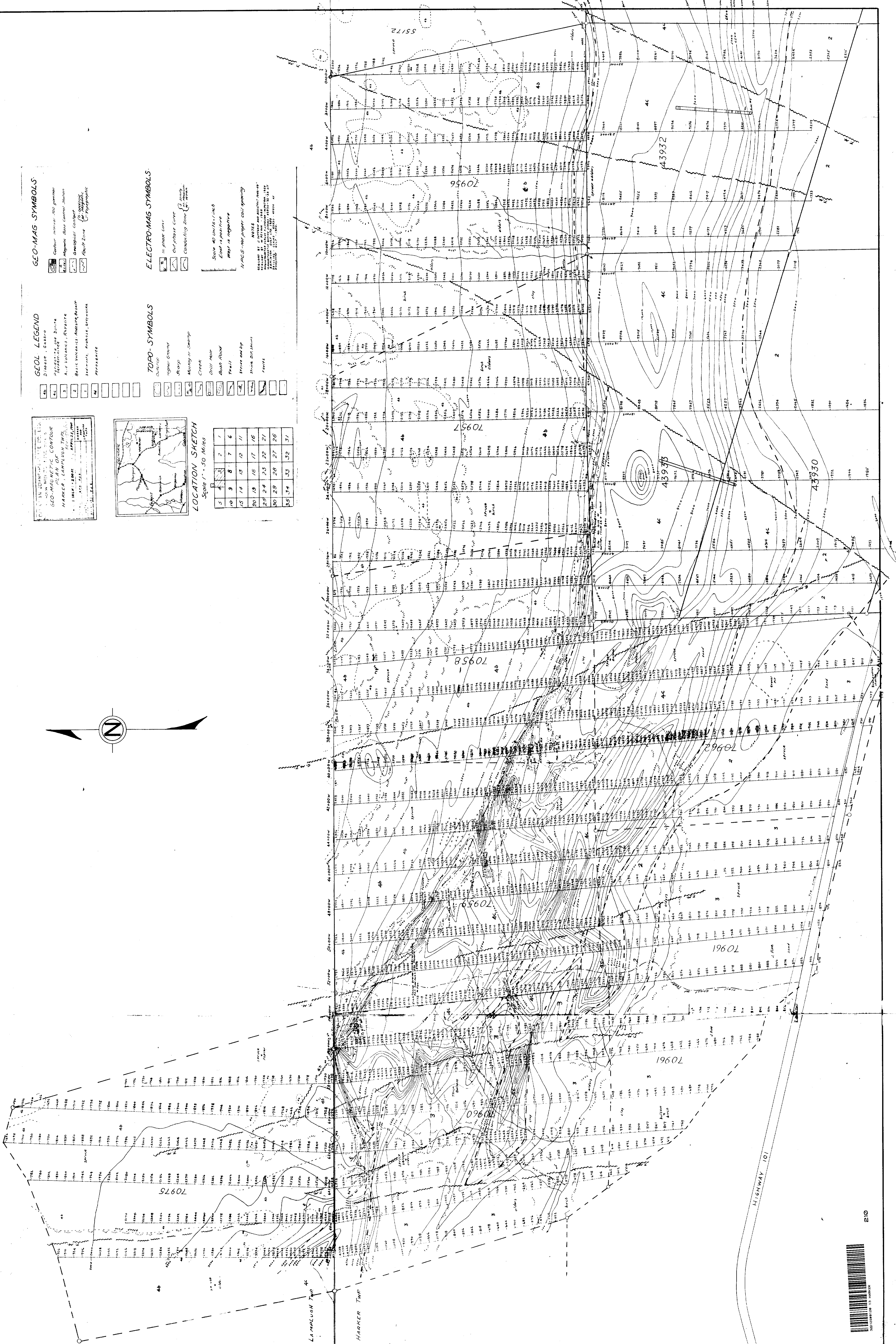
NOTES
 1. MAGNETIC ANOMALY MAP
 2. MAGNETIC ANOMALY MAP
 3. MAGNETIC ANOMALY MAP
 4. MAGNETIC ANOMALY MAP

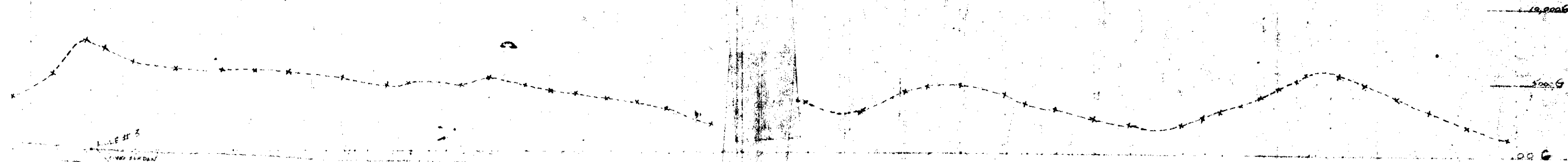
GEO-MAGNETIC CONTOUR PLAN OF HARKER, LAMPLUGH TOWNSHIPS, ILLINOIS

1. MAP SCALE: 1" = 30 MILES
 2. DATE: APRIL 1965
 3. BY: J. J. HARRIS



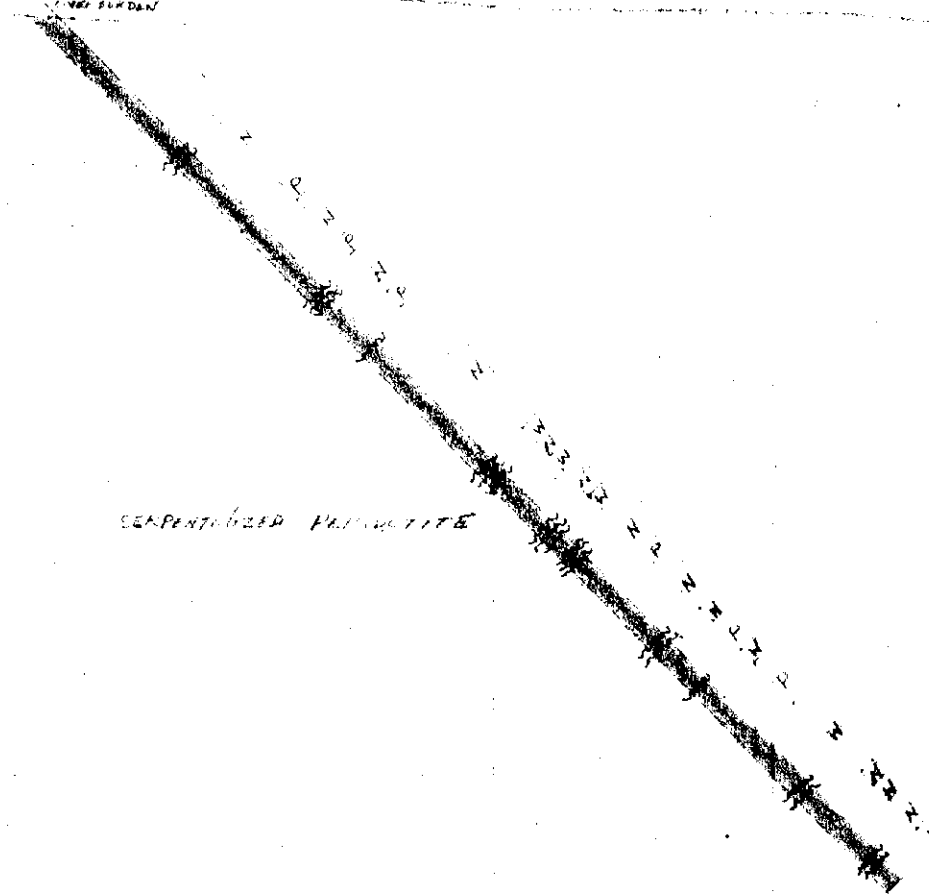
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10	9	8	7	6
15	14	13	12	11
20	19	18	17	16
25	24	23	22	21
30	29	28	27	26
35	34	33	32	31





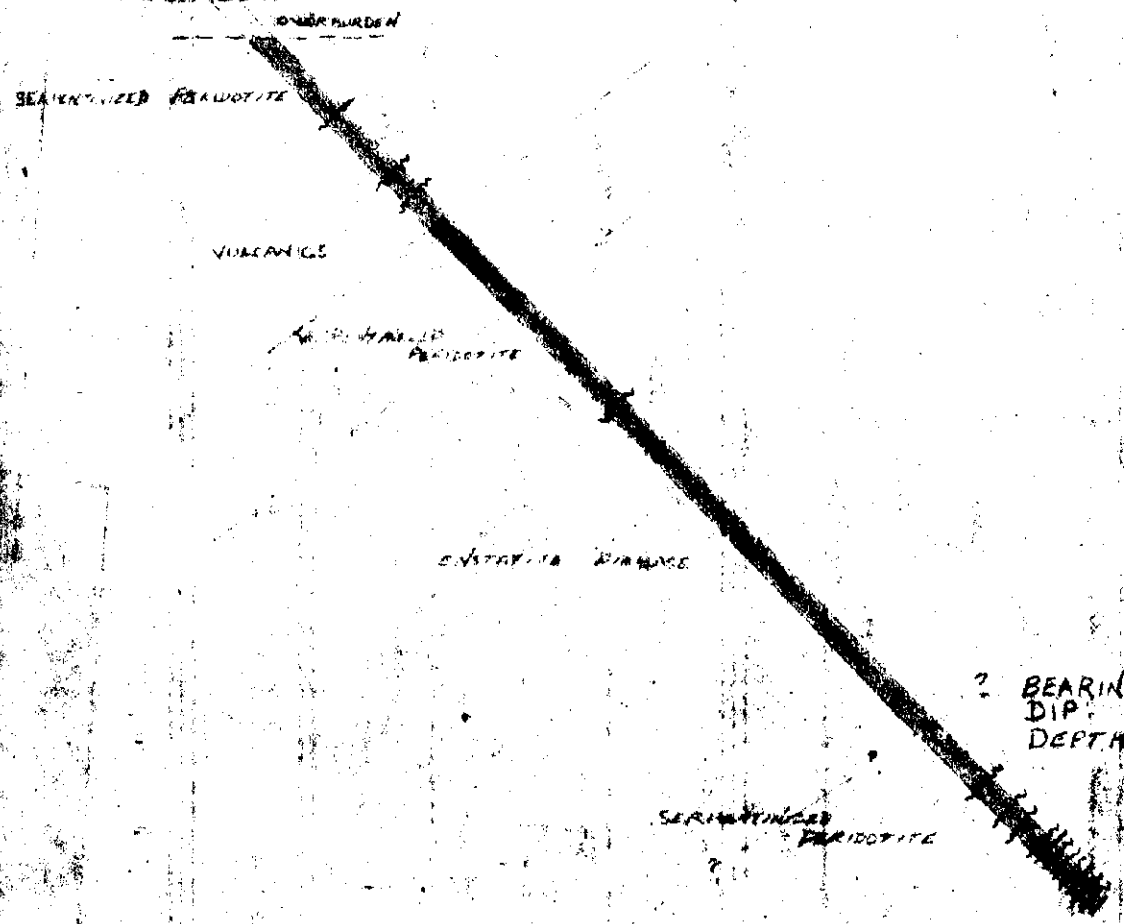
Loc #3
1000

HOLE #4



SERPENTINIZED PERIDOTITE

BEARING $S 8^{\circ} 30' W$
DIP: -45°
DEPTH: 650'



SERPENTINIZED PERIDOTITE

VULCANICS

SERPENTINIZED PERIDOTITE

ENTRAPPED DIAMONDS

SERPENTINIZED PERIDOTITE

? BEARING: DUE SOUTH
DIP: -45°
DEPTH: 655'



220

CANADIAN JOHNS-MANVILLE CO. LTD.	
MATHESON MUNRO MINE ONTARIO	
DRILL SECTION - HOLES CAMPBELL	
Loc. #3 (54+00 W) 10+00 SOUTH	
Loc. #4 54+00 W 10+00 SOUTH	
SCALE 1" = 100'	DATE June, 1961
DRAWN R.V.S.	HARKER
TRACED	TWP.
APPROVED	