

GEOCHEMICAL AND VLF-EM (NSS) SURVEY REPORT

ON THE

PERRON PROPERTY
NORTHLAND GRID

GAUTHIER TOWNSHIP

LARDER LAKE MINING DIVISION

DISTRICT OF TIMISKAMING, ONTARIO

FOR

RECEIVED

HB 2 8 1386

ALEXANDER H. PERRON

MINING LANDS SECTION

while the many of

NOVEMBER 11, 1985

MARY GREER

GEOPHYSICAL TECHNICIAN

RESIDENT GEOLOGIST ONTARIO GOVERNMENT RECEIVED

DEC 2 7 1985

KIRKLAND LAKE, ONT.

ILLUSTRATIONS

Location	Map	-	(Figure	1a)	•	•	•	•	•	•	•	•	•	•	•	•	2	a)	

Location Map - (Figure 1b) 2 b)

Accompanying Plan Maps

In Back Pocket

Scale: 1 inch to 200 feet

Date: September, 1985

Northland Grid

Ground VLF-EM Survey (NSS)

Drawing No. 85-N-1a

Northland Grid

Geochemical Survey

Drawing No. 85-N-4



TABLE OF CONTENTS

INTRODUCTION	, 2
PROPERTY DESCRIPTION)
LOCATION AND ACCESS)
PREVIOUS WORK	}
SURVEY PROCEDURE	}
TOPOGRAPHY	}
GENERAL GEOLOGY	1
ECONOMIC GEOLOGY	1, 5
INSTRUMENTATION	5, 7
PRESENTATION AND DISCUSSION OF RESULTS	7,8
CONCLUSIONS AND RECOMMENDATIONS	3, 9
BIBLIOGRAPHY	10
CERTIFICATE	11

GEOCHEMICAL AND VLF-EM (NSS) SURVEY REPORT

ON THE

PERRON PROPERTY

NORTHLAND GRID

GAUTHIER TOWNSHIP

LARDER LAKE MINING DIVISION

DISTRICT OF TIMISKAMING, ONTARIO

INTRODUCTION

The Northland Grid was recorded by Alexander H. Perron on May 29, 1981.

A geophysical grid, at a 400 foot line spacing, was subsequently established by A. H. Perron in March, 1982. Two geophysical surveys, (Electromagnetic and Magnetic) were completed over the entire Northland Grid. In May of 1984, 200 foot intermediate lines were cut and a detailed Magnetometer survey performed.

In August of 1985, a Geochemical survey and an electromagnetic survey was completed over the entire grid. The EM survey used a different station than the first survey to assist in further interpretation. The Geochemical survey was also performed to further assist in defining any anomalous zones.

The surveys were conducted by Tom Obradovich of Kirkland Lake, Ontario. and assisted by students of Sir Sanford Fleming College.

All drafting and interpretation was completed by Mary Greer.

RESIDENT GEOLOGIST ONTARIO GOVERNMENT RECEIVED

DEC 2 7 1985

KIRKLAND LAKE, ONT,

The purpose of this report is to briefly describe the results obtained in said surveys.

The anomalies detected therefrom are shown on the accompanying plan maps at a scale of one inch to 200 feet, that form an integral part of this report.

PROPERTY DESCRIPTION

The Northland Grid consists of a contiguous block of six (6) unpatented mining claims, located in Gauthier township, Larder Lake Mining Division, District of Timiskaming, Ontario, and are further described as follows:

Claim No.		No. of Claims
L-561530 - 535 (inclusive)	•	6

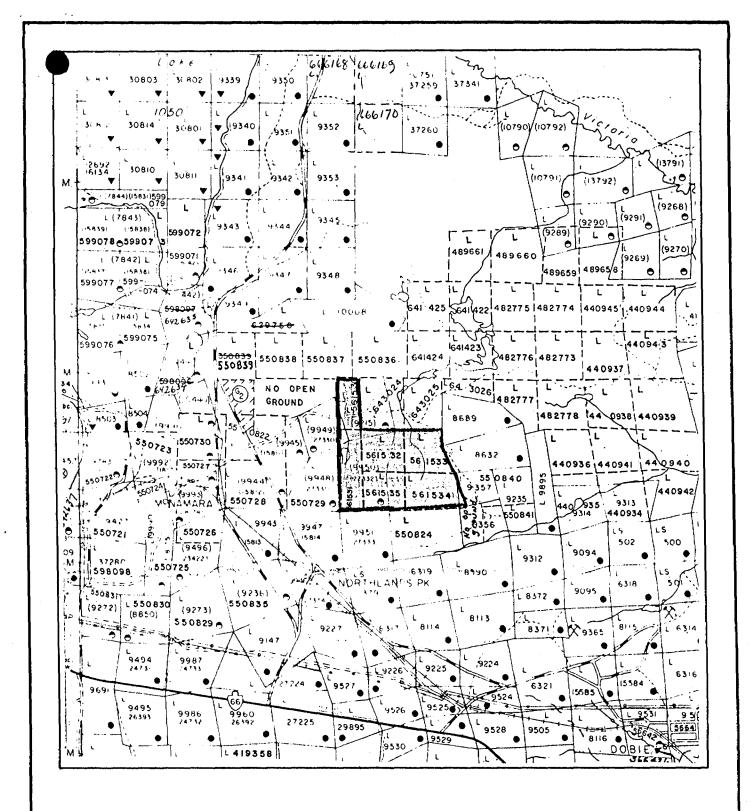
Ownership of the following claims has been attested to by:

Alexander H. Perron of 103 Government Road East, Kirkland Lake, Ontario, and
was not independently ascertained by the writer.

LOCATION AND ACCESS

The Northland Grid is found in the central-western part of Gauthier township, approximately one mile southeast of Victoria Lake.

The property is located approximately eight (8) miles east of the town of Kirkland Lake, Ontario, on highway No. 66, then one mile north on the Esker Lakes Provincial Park access road. (See figure 1a and 1b).



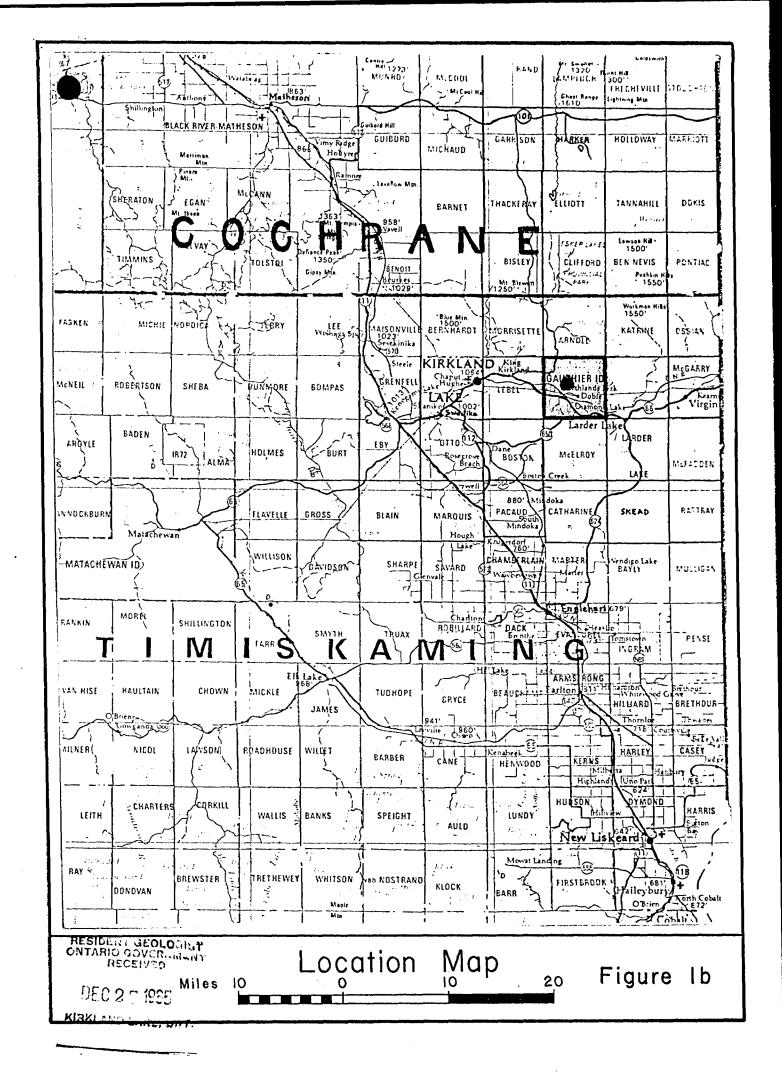
Claim Location Map

Scale: linch to 1/2 mile

RESIDENT GEOLOGIST ONTARIO GOVERNMENT RECEIVED

(Taken from a Mar. 1983 claim map)

DEC 2.7 1985 Figure la



PREVIOUS WORK

The western section of the Northland Grid has had an airborne magnetometer survey carried out over it. An area of higher magnetic susceptibility was found in the southern half. An airborne spectrometer survey was also conducted without locating any anomalies on the Northland Grid. See the Regional Geologist files for the previous geophysical surveys conducted by Alexander H. Perron.

SURVEY PROCEDURE

A baseline was established west from the #1 claim post of claim L-561534, for a total footage of 3,100 feet. A grid system of picket lines at 400 foot spacings, with stations every 100 feet, was cut at right angles to the baseline.

For the Geochemical survey, «B» horizon samples were taken at each 100 foot station along the picket lines.

Readings were taken at 100 foot intervals along the picket lines, for the VLF-EM survey.

TOPOGRAPHY

The general terrain of the Northland Grid is flat to very gently rolling drifts. A snall lake is found on the western boundary. The grid is covered by spruce, poplar and jack pine with a few open marshy sections.

One forestry access road encircles the claims to the north.

RESIDENT GEOLOGIST ONTARIO GOVERNMENT RECEIVED

DEC 2 7 1985

KIRKLAND LAKE, ONT.

GENERAL GEOLOGY

According to the O.D.M. Geological Map No. 50C covering the Township of Gauthier, little is known about the underlying bedrock of the Northland Grid due to the drift covering.

However, the general geology of the surrounding area appears to be intrusive syenitic rocks mainly syenite porphyry and possibly acidic volcanics consisting mainly of trachyte flows. There is also an indication of a Keweenawan or Matachewan diabase dike striking north-south.

ECONOMIC GEOLOGY

The Northland Grid was at one time part of twenty (20) claims held by Northland Gold Mines Ltd. (1922). Between 1922 and 1929, exploration work was conducted which included diamond drilling of seventeen (17) holes, surface exploration, and underground work. Two shafts were sunk, No. 1 and No. 2. The No. 1 shaft was sunk to a depth of 1,020 feet and the No. 2 shaft was sunk to a depth of 50 feet. Levels were established at 250, 500, 750, and 1,000 feet, most of the work was conducted on the 1,000 foot level.

In March 1940, the company was reorganized as Northland Mines and further surface work was carried out in the southern claims, consisting of 2,686 feet of diamond drilling.

A fault was found on the 1,000 foot level striking N 80° W and dips steeply to the south. This fault consists of a «mud seam» and was not noticed on the 500 foot level nor at surface. The maximum width is approximately two feet and the wall rock is mineralized. The drilling conducted in the east

RESIDENT GEOLOGIST ONTARIO GOVERNMENT L'ECEIVED

UEC 2 7 1985 KIRKLAND LAKE, ONT. reveals a zone of strong shearing and brecciation along the greywacke-syenite contact which may be a continuation of the fault on the 1,000 foot level.

Mineralization was only found at the No. 2 shaft.

Gold values were reported at a number of locations but no ore was successfully found on the property.

RESIDENT GEOLOGIST ONTARIS GOVERNMENT LECEIVED

1 FC 2 7 1985

KIRKLAND LAKE, ONT.

INSTRUMENTATION

Electromagnetic Survey:

The VLF-EM method uses as a source, one of the main submarine communications transmitters in the 15 to 25 kHz band found throughout the world. These submarine communication radio waves travel in a single mode parallel to the surface of the earth along the earth-air surface.

Without vertical conductors and travelling over flat ground, the magnetic field component of this radio or surface wave is horizontal and perpendicular to it's direction of travel.

VLF instruments are capable of picking up these structures that change the direction of the waves by measuring the tilt angle of the major axis of the polarization ellipse. This is illustrated by the tilt angle being zero on flat ground, but when a conductor is present the tilt angle will acquire a finite value. The direction of tilt indicates the direction of the conductor. Calculations of such parameters as depth, depth extent, dip and width of the conductor is very minimal.

The VLF easily illustrates the location of the upper limit of dipping structures which can be seen or plotted as VLF profiles as areas of greatest change in tilt angle per unit of distance.

The instrument used for this EM survey was a Geonics VLF-EM16 unit. The sensitivity of this unit is $\frac{+}{-}$ 1% for the in-phase and $\frac{+}{-}$ 1% for the quadrature. The operating frequency for the EM16 is from 15-25 kHz and the station selection is made by plug-in units.

RESPAIN MEDIOSICY CHARLES ROYLINGSERY LECEIVED

15(2)195

KIRKLAND LAKE, OUT.

For the purpose of this EM survey the station used was Annapolis, Maryland, which has a frequency of 21.4 kHz.

All the readings were taken facing east at 100 foot intervals and the topography was noted for future use in the interpretation of the EM results.

PRESENTATION AND DISCUSSION OF RESULTS

Electromagnetic Survey:

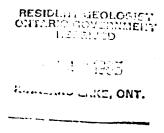
The field data is presented on a map at a horizontal scale of one inch to 200 feet, drawing number 85-N-la found in the back pocket of the report.

The VLF-EM data is illustrated as profiled data along the survey lines and is plotted at a vertical scale of one inch = 40% with the positive to the right and the negative to the left.

Minor VLF responses were noted on the property. None of these responses had any continuous patterns. And no conductors showed enough of a cross over or dip to illustrate anything other than surface or overburden interferences.

Geochemical Survey:

The field data is presented on a map at a horizontal scale of one inch to 200 feet, drawing number 85-N-4 found in the back pocket of this report.



The geochemical data is illustrated as contoured data along the survey lines.

Some areas could not be accessed due to high water levels.

The process for assaying the samples were as follows:

The samples were dried and crushed to 100 mesh and then homogenized. From the total amount of material, 10 grams of the sample were analyzed.

The 10 gram sample was dissolved in hydro bromic acid and a cold hydro bromic acid digestion process was used.

No traces of gold was found in the samples. Several samples that had a high ppb count of gold were tested again to ensure accuracy, and verify whether the gold was there by mechanical means or not.

CONCLUSIONS AND RECOMMENDATIONS

No strong conductors were found to make any constructive conclusions on the Northland Grid.

The geochemical survey may possibly have been improperly sampled. It was noted that many samples assayed contained leached material. No gold could possibly be found in this type of material. Most of the claim group lies over large glacial deposits. The most predominate ore being the Munro Esker. It is difficult to conclude how beneficial the survey would be because of the depth to bedrock.

RESIDALL GEOLOGY CNYARY ON ANTALICATION LECEIVED

1F(2) 1888

KIRKLAND LIKE, ONY.

Any further work performed on the ground should involve a deep diamond drill program. There are no further recommendations to be made at this time.

Respectfully submitted,

November 11, 1985

Mary Greer Geophysical Technician

Wide Gree

RESIDENT GEOLOGICA CONTARIO CON LONGE LA CONTARIO CON LONGE LA CONTARIO CON LONGE LA CONTARIO CONTARIO

KIRKLAND LAKE, ONT.

BIBLIOGRAPHY

Jas. E. Thomson and A.T. Griffis

1941: Vol. L, Part VIII, 1941

Geology of Gauthier Township, East

Kirkland Lake Area

Ontario Department of Mines

RESIDENT GEOLOGIST ONTARIO GOVERNMENT HECEIVED

LEC 2 7 1985 KIRKLAND LAKE, ONT.

CERTIFICATE

- I, Mary Greer, of Kirkland Lake, Ontario, do hereby certify:
- That I am a Geophysical Technician and reside at:
 49 McKelvie Avenue, Kirkland Lake, Ontario, P2N 2K6
- That I graduated from Sir Sandford Fleming College at Lindsay, Ontario, in 1978, with a diploma as a Geological Technician.
- 3) That I was employed as a Geophysical Technician by H.E.
 Neal and Associates Limited for 18 months.
- 4) That I have been practising my profession for a period of five (5) years and I am qualified to write this report.
- 5) That I did not participate in this survey.

1/3v. 1 35

Date

Mary Greer

Geophysical Technician

RESIDERA GEOLOGIST ONTARIO GOVERNMENT RECEL/ED

DEC 2 7 1985

KIRKLAND LAKE, ONT.



SWASTIKA LABORATORIES LIMITED

P.O. BOX 10, SWASTIKA, ONTARIO POK 1T0
TELEPHONE: (705) 642-3244
ANALYTICAL CHEMISTS • ASSAYERS • CONSULTANTS

Certificate of Analysis

Certificate No. 62171			Date: _	Jan. 2	1, 1986	
Received Jan. 16, 1986	13	Samples of	soils			
Submitted by Perrons', Ki	rkland Lake, Ont	ario				
	SAMPLE NO.	GOLD PPB				
	L28W-10N	10				
	11N	5				
	12N	10 15				
	13N	Nil				
	14N	Nil				
	15N	5				
	16N	Nil				
	17N	5				
	18N	Nil				
	19N	Nil				
	• •	•				
	20N	30 20		·		
	21N	Nil				

22N

G. Lebel, Manager

Nil



SWASTIKA LABORATORIES LIMITED

P.O. BOX 10, SWASTIKA, ONTARIO POK 1TO TELEPHONE: (705) 642-3244 ANALYTICAL CHEMISTS ● ASSAYERS ● CONSULTANTS

Certificate of Analysis

Certificate No. 62171			Date: _	Jan. 21, 1986	
Received Jan. 16, 1986	13	Samples of	soils		
Submitted by Perrons', F	Girkland Lake, Ont	ario			
	SAMPLE NO.	GOLD PPB			
	L28W-10N	10			
	11N	5			
	12N	10 15			
	13N	Nil			
	14N	Nil			
	15N	5			
	16N	Nil			
	17N	5			
	18N	Nil			
	19N	Nil			
	\mathbf{v}_{i_1}	8 3			
	20N	30 20			
	21N	Nil			

Nil

22N

er ____

G. Lebel, Manager

Natural Resources (George	ophysical, Geological,	80030 NO	ur Pi			*** *** *****	201011	
Ontario Geoc	physical, Geological, chemical and Expendi	tures) γ	1					
Type of Sur	× 2 2010	530°	he Minir	32D04NW0103 2	.8631 GAUTHI	ER		000
GEOCHEMICAL -	- GEOPHYSICA	L EM				OIIITEN		900
ALEX H. PERRO	NC NC					K-19	Licence No. 326	
103 GOVERNMEN		, KIRKI	AND LAI	KE, ONTAR	IO P2N	IA9		
Survey Company		to the common terrelative of the specimen		Date of Survey 25 08 {	(from P. to)		APPROX.	5.5 IIIL
PERRONS Name and Address of Author (of MARY GREER)	f Geo-Technical report)	V//E (VI DIVI ANI	Day No. 1	Vr. Dav A	Mo. Yr.		
Credits Requested per Each C				ims Traversed (L				
Special Provisions	Geophysical	Days per Claim		ning Claim Number	Expend. Days Cr.	~	ning Claim Number	Expend. Days Cr.
For first survey: Enter 40 days. (This	- Electromagnetic	20		561530			reaction.	
includes line cutting)	- Magnetometer			561531				
For each additional survey:	- Radiometric			561532				
using the same grid: Enter 20 days (for each)	- Other			561533			Market Sydnodium and the Reservoir Specific Sections	
	Geological			561534				
	Geochemical	20		561535				
Man Days	Geophysical	Days per Claim				CEL	UED	
Complete reverse side and enter total(s) here	- Electromagnetic		10. 00. 2.0			1	-	
	- Magnetometer		-	Add to the control of		DR 0 5	, 1883	
	- Radiometric					LAND	os sectión	
	- Other		11		With	ING LAND	19 050	
	Geological			· · · · · · · · · · · · · · · · · · ·		-		
Airborne Credits	Geochemical	Days per				-		<u> </u>
		Claim	TI	RDER	AKE			
Note: Special provisions credits do not apply	Electromagnetic			FREE LY		\		-
to Airborne Surveys.	Magnetometer			1 . 1 SHA	485 ·	1		-
Expenditures (excludes power	Radiometric er stripping)			\$1.00 · · · ·	13141516			-
Type of Work Performed	y seripping,		715	19110/11/12/11/2				-
Performed on Claim(s)			-		-	-		
					 			-
								-
Calculation of Expanditure Days Total Expanditures	•	Total	-	e v — the v — to t — atherine v	-			
\$	÷ 15 =	, 6,00,00	L		<u></u>	Total numb	per of mining	<u> </u>
Instructions							ered by this	6
Total Days Credits may be ap choice. Enter number of days	· ·			or Office Use O	nly]	-1417	
in columns at right,			Recorded	Alic	3 0 1985	Mining Rece		
Certification Verifying Repo	corred Holder or Agent (Signature)	240	Date Approved	as Recorded	Branch Dire	ik statem	w.X
I hereby certify that I have a or witnessed same during and	personal and intimate k d/or after its completion	nowledge of t and the anne	the facts set for exed report is t	orth in the Report (crue.	of Work annex	ked hereto, ha	aving performed t	he work
MARY GREER,	, -	AVENUE	KIRKL	AND LAKE,	ONTAR	10 P2N	2K6	
Late was a second and a second				Dete Certified	3:/35	Certified by	y (Signature)	
1362 (81/9)				11/1/2011	15/81	$\frac{1}{\sqrt{\lambda}}$	V447	77

NN 20						20	0/01/5	
Ministry of R	eport of Work		11.0/	, ir	nstructions: -	Please type of	print.	735
Matural	Seophysical, Geological,		473/	85	U		of mining clair on this form,	
Ontario G	eochemical and Expendi	tures)	•	V J	Note: -	Only days	credits calcula	ited in the
	5/1621		Mining Ac	Q_{0}	X631	in the "Exp	pend. Days Cr naded areas belo	." columns.
Type of Survey(s)	7613701			<u> </u>	Township		iaded areas pero	<u>w.</u>
	ICAL EM, GEOCH	EMICAL	SURVEY		G	AUTHIER		
Claim Holder(s) ALEX H.	DEDDUM				and the second s	Prospector's		
Address	ar nar san ran Bhera, an Lana, ayan na an dh' madh na h-Bhill birla, ann ann an daidheile an Bhille Bhi	*****************	Milliones and page 1 ages and resource are considered the continue of a page and a second				9026	
103 GOVE	ERNMENT ROAD E	AST, K	IRKLAND	LAKE, O	NTARIÓ	P2N IA9		ĺ
Survey Company PERRONS		Vice - republic V mod / 4 (common for		Date of Survey	/ (from & to) .	To	otal Miles of line	Cut
Name and Address of Author	(of Geo-Technical report)	t the supplementation of the section of		TOBY MOT		1,1 85		
MARY GR	EER, 49 MCKEL	/IE AVE	E., KIRKL	.AND LAK	Œ, ONTA	ARIO P2N	1 2K6	
Credits Requested per Eac	th Claim in Columns at ri		Mining Claim					
Special Provisions	Geophysical	Days per Claim	Prefix	g Claim Number	Expend. Days Cr.	Prefix Min	ing Claim Number	Expend. Days Cr.
For first survey:	· Electromagneti	28-19	L 5	61530				
Enter 40 days. (This includes line cutting)	- Magnetometer			er vann geleig met van er bestille konstigeneers versteel op met			hanga agan 1 Jahan dari serendi di Bermalia Sebingsi in pujubing	
Facility Market	- Radiometric	·	the standard and					
For each additional surver using the same grid:	y: - Other	ļ			-		1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 -	
Enter 20 days (for eac	h)						para i ar a milioni milioni mornino mornino a l'assa	
	Geological	1,0						
	Geochemical	7/20 21	7					
Man Days	Geophysical	Days per Claim						
Complete reverse side and enter total(s) here	- Electromagnetic							
did enter totalismiere	- Magnetometer						er e cardina de la materia de mando de de estado de aposicio.	
	Radiometric		#### 					
		·						
	- Other		153004					
	Geological							
	Geochemical							
Airborne Credits		Days per Claim						
Note: Special provisions	Electromagnetic		1.45%	ng at the employees from the large gardens of contributions		12,445		
credits do not appi to Airborne Survey	1 1			r. a sala e sidilah 1994 dan yang menerimbahan di salah	6		ne, annual perior il periodor è discontinuo partir di marchina di discontinuo completa di discontinuo di discon	
to Amborne during	The second secon			Maria samintana i matsamban manggapa kananasana, ani mantina saki n	LEV.		nakanakan darap 1. Interpreparation philosophic da da dara	
Expenditures (excludes p					↓	1100		-
Type of Work Performed :	ower stripping)				460	160		000
		<u> </u>		MININ	1 4	7.	n and the second	No and
Ferformed on Claim(s)	The first of the f	p/A		·	AND	100	50	
					1 50 JK	25	rolle A	<i>M</i>
	and the second s					ION	700	
Calculation of Expenditure Total Expenditures	· ·	Total s Credits					1	
\$								
19	÷ [15] = [Total numb claims cove report of w		1
Instructions Total Days Credits may b	e apportioned at the claim l	nolder's		04:11:-	Only	report of w	ork.	
choice, Enter number of in columns at right.	days credits per claim select	ed	Total Days Cr.	r Office Use Date Repute	<u> </u>	Mining Pge	order (\bigcirc
	. ^		Recorded	UC	C 3 198	0		7 .
Date 1485	Recorded Holder or Agent (Signature)	30	Date Approve	d as Recorded	Dire	ector	
Certification Verifying R	eport of World	<u>/</u>		<u> </u>	···	<u> </u>		
	ve a personal and intimate k	nowledge of	the facts set fort	h in the Repor	t of Work ann	exed hereto, h	aving performed	I the work
or witnessed same during	and/or after its completion							
Name and Postal Address of MARY GR	EER, 49 MCKEL	VIE AV	E., KIRKI	AND LAI	KE, ONT	. P2N 21	K6	1
101111 011	100 m 110 1 10 1 10 1 10 10 10 10 10 10 10 10	, 117		Date Certifie			(Signature)	
	*************			I Vec !	<u> </u>	<u> </u>	144	4/4/

1362 (81/9)

D ***
Date

1985 11 22

Mining Recorder's Report Work No.

309

Recorded Holder	
ALEX H. PERRON	
GAUTHIER TOWNSHIP	
Type of survey and number of Assessment days credit per claim	Mining Claims Assessed
Geophysical	
Electromagnetic	L 561531 to 535 inclusive
Magnetometer days	
Radiometric days	
Induced polarization days	
Other days	
Section 77 (19) See "Mining Claims Assessed" column	
Geologicaldays	
Geochemical days	
Man days Airborne	
Special provision X Ground X	
Credits have been reduced because of partial coverage of claims.	
Credits have been reduced because of corrections to work dates and figures of applicant.	
Special credits under section 77 (16) for the following :	mining claims
10 DAYS ELECTRO 10 DAYS GEOCHEM	
L 561530	·
No andide house been allowed for the following mining.	
No credits have been allowed for the following mining of not sufficiently covered by the survey	insufficient technical data filed
increase and the second of the second	
	RESIDENT GEOLOGIST ONTARIO GOVERNMENT RECEIVED

The Mining Recorder may reduce the above credits if necessary in order that the total number of appropriate agreement days recorded on each claim does exceed the maximum allowed as follows: Geophysical - 80; Geologocal - 40; Geophysical - 40; Section 77(19) - 60.

OFC > 7 1985



Ministry of Natural Resources

TO BE ATTACHED AS AN APPENDIX TO TECHNICAL REPORT
FACTS SHOWN HERE NEED NOT BE REPEATED IN REPORT
TECHNICAL REPORT MUST CONTAIN INTERPRETATION, CONCLUSIONS ETC.

1 / PC O. Du. (C) (S)		ETIC	
Township or Area GAUTHIER Township	OWNSHIP		MINING OF A FAG ED ATTENDED
Claim Holder(s) ALEXANDER			MINING CLAIMS TRAVERSED List numerically
103 GOV'T	RD.E., KIRKLAND LAKE,	ONT.	
Survey Company PERRONS	P2N IA	9	L- 561530
Author of Report MARY GREER			(prefix) (number) L- 561531
Address of Author 49 MCKELVI	E AVE., KIRKLAND LAKE	ONT.	L- 561532
Covering Dates of Survey AUGUS	T 25/85 TO AUGUST 29	/85	***************************************
	(linecutting to office) XIMATELY 5.5 MILES		L- 561533
Total wiles of Line Gut			L- 561534
SPECIAL PROVISIONS	render of the second of the se	and some	L- 561535
CREDITS REQUESTED	DAYS Geophysical per claim	4	L- 201222
	-Electromagnetic 20	i	
FNTER 40 days (includes	-Magnetometer		
cutting) for first survey.	-Radiometric		
ENTER 20 days for each	Other		
additional survey using	Geological		
same grid.	Geochemical 20		RECEIVED
AIRBORNE CREDITS (Special provi	sion credits do not apply to airborne surv	cys)	
MagnetometerElectromag	neticRadiometric		<u> </u>
(enter	lays per claim)	."	Millione Lampa account
DATE: N. V. 1 8.5 SIGNA	TURE: MANI AMIN		MINING LANDS SECTION
	Author of Report or Ag	ent	
		İ	
Res. GeolQuali	Sications		
Previous Surveys	indutions	RE	SIDEM 1. GEOLOGIST
File No. Type Date	Claim Holder	ON.	ARIO GOVERNMENT RECEIVED
			EC 2 7 1985
		AIN	KLAND LAKE, ONT.
			The same of the sa
			TOTAL CLAIMS 6

GEOPHYSICAL TECHNICAL DATA

Street Contract Street

	mber of Stations	200		Number	of Readings	220	
S	tation interval	100 PPPT		Line spa	.	400	F00T
	rofile scale	*** + 1.00		_			
I.N	Instrument			**************************************		-	
	Accuracy - Scale co	nstant	-				······································
BILANG	Diurnal correction n	ethod					
21	Base Station check-in	n interval (hours)					
	Base Station location	and value					
	7	GEONICS VLF-E	M16				
TO CHROMAGNETIC	Instrument	VERTICAL & HO					
고 ()	•	INFINITY					
\{\bar{\chi}{\chi}\}	Accuracy	.1.					
⊘	Method:	X Fixed transmi					☐ Parallel line
		21.4 KHZ ANNA	POLIS,	MARYLAND			
2.	• •	IN-PHASE AND	(:	specify V.L.F. station)			
	rarameters measured	I IN-LINOL AND	מנוטמטש	101\L			
	Instrument						
<u>```</u>							
\(\frac{1}{2}\)							
=	Base station value ar	d location				~	
							
	Elevation accuracy_						
	Instrument						
	Method Time	Domain			Frequency Do	main	
	Parameters - On tim	ne			Frequency		
	– Off tin	me			Range	T	
377	– Delay	time	· · · · · · · · · · · · · · · · · · ·				
5: -	- Integr	ation time					
· <u>:</u>							
	•						
	Electrode spacing _						
	Type of electrode						

GEOCHEMICAL SURVEY - PROCEDURE RECORD

Total Number of Samples 140	tota a trater i ci ci ci ci ci ci ci ci
Type of Sample SOILS	AWALTEROAL ER FREIN
(Nature of Material)	Values expressed in: per cent
Average Sample Weight 10 GRAMS	p. p. b. (X)
Method of Collection HOE AND SHOVEL	Cu, Pb, Zn, Ni, Co, Ag, Mo, As, (circle)
Soil Horizon Sampled <u>«B» HORIZON</u>	Others
2005	Field Analysis (tests)
· · · · · · · · · · · · · · · · · · ·	•
Sample Depth APPROX. 6 TO 10 INCHES	Extraction Method
Terrain GLACIAL DEPOSITS AND PARTS OF	Analytical Method
ESKER POOR	Reagents Used
Drainage Development	Field Laboratory Analysis
Estimated Range of Overburden Thickness 7	No. (tests)
7 0 130 1 LL1	Extraction Method
	Analytical Method
	Reagents Used
SAMPLE PREPARATEM	Commercial Laboratory (tests)
(Includes drying, screening, crushing, ashing)	Name of Laboratory SIR SANFORD FLEMING (
Mesh size of fraction used for analysis <u>100 MFSH</u>	Extraction Method HYDRO BROMIC ACID.
	Analytical Method
	Reagents Used
	Reagents Used
General SAMPLES DRIED, CRUSHED TO 100	General LA BORATORY USED:
MESH, HOMOGENIZED.	SIR SANFORD FLEMING COLLEGE,
PIESTI, HONOGENIZEDI	BOX 8000,
10 CDAM CAMPLES ANALYTED	LINDSAY, ONTARIO
10 GRAM SAMPLES ANALYZED.	K9V 5E6
DISSOLVED IN COLD HYDRO BROMIC ACID.	TELEPHONE: 1-705-324-6908
DISSOCACD III COCD IIIDIG DIGITIC HOIDI	ATTENTION: MR. MAURICE JOHNSTON

Mining Lands Section

File No 2863/

Control Sheet

TYPT : SURVEY	GEOPHYSICAL GEOLOGICAL GEOCHEMICAL EXPENDITURE
MINING LANDS COMMENTS:	
	(Gadhier)
•	
	Demo Kr
	Signature of Assessor
	Mar. 6/86

Date

April 4, 1986

Your File: 473/85 Our File: 2.8631

Mining Recorder Ministry of Northern Development and Mines 4 Government Road East Kirkland Lake, Ontario P2N 1A2

Dear Madam:

RE: Notice of Intent dated March 7, 1986 Geophysical (Electromagnetic) and Geochemical Surveys on Mining Claims L 561530 in Gauthier Township

The assessment work credits, as listed with the above-mentioned Notice of Intent, have been approved as of the above date.

Please inform the recorded holder of these mining claims and so indicate on your records.

Yours sincerely,

J.C. Smith, Supervisor Mining Lands Section

Whitney Block, 6th Floor Queen's Park Toronto. Ontario M7A 1W3

Telephone: (416) 965-4888

DK/mc

cc: Alex H. Perron 103 Government Road East Kirkland Lake. Ontario P2N 1A9

Mary Greer 49 McKelvie Avenue Kirkland Lake, Ontario P2N 2K6

Mr. G.H. Ferguson Mining & Lands Commissioner Kirkland Lake, Ontario Toronto, Ontario

Resident Geologist

Encl.



Technical Assessment Work Credits

2.8631

Date
Mining Recorder's Report of Work No. 473/85

Recorded Holder	
ALEX H. PERRON Township or Area	
GAUTHIER TOWNSHIP	
Type of survey and number of	Mining Claims Assessed
Assessment days credit per claim Geophysical	Withing Claims Assessed
Electromagnetic 10 days	L 561530
Magnetometer days	
Radiometric days	
Induced polarization days	
Other days	
Section 77 (19) See "Mining Claims Assessed" column	
Geological days	
Geochemical days	
Man days [] Airborne []	
Special provision X Ground X	
Credits have been reduced because of partial coverage of claims.	
Credits have been reduced because of corrections to work dates and figures of applicant.	
Special credits under section 77 (16) for the following mining claims	
Special creates and a content / / 1,0/ for the following mining ordinal	
No credits have been allowed for the following mining claims	
not sufficiently covered by the survey	insufficient technical data filed

The Mining Recorder may reduce the above credits if necessary in order that the total number of approved assessment days recorded on each claim does not exceed the maximum allowed as follows: Geophysical - 80; Geologocal - 40; Geochemical - 40; Section 77(19) - 60.



mark 2 x/80

Ministry of Northern Development and Mines

March 7, 1986

Your File: 473/85 Our File: 2.8631

Min'ing Recorder
Ministry of Northern Development and Mines
4 Government Road East
Kirkland Lake, Ontario
P2N 1A2

Dear Sir:

Enclosed are two copies of a Notice of Intent with statements listing a reduced rate of assessment work credits to be allowed for a technical survey. Please forward one copy to the recorded holder of the claims and retain the other. In approximately fifteen days from the above date, a final letter of approval of these credits will be sent to you. On receipt of the approval letter, you may then change the work entries on the claim record sheets.

For further information, if required, please contact Mr. R.J. Pichette at (416) 965-4888.

Yours sincerely,

J.C. Smith, Supervisor Mining Lands Section

Whitney Block, 6th Floor Queen's Park Toronto, Ontario M7A 1W3

OK DK/mc

Encl.

cc: Alex H. Perron 103 Government Road East Kirkland Lake, Ontario P2N 1A9

> Mr. G.H. Ferguson Mining & Lands Commissioner Toronto, Ontario

Mary Greer 49 McKelvie Avenue Kirkland Lake, Ontario P2N 2K6



Ministry of Northern Development and Mines

> Notice of Intent for Technical Reports

March 7, 1986

2.8631/473/85

An examination of your survey report indicates that the requirements of The Ontario Mining Act have not been fully met to warrant maximum assessment work credits. This notice is merely a warning that you will not be allowed the number of assessment work days credits that you expected and also that in approximately 15 days from the above date, the mining recorder will be authorized to change the entries on the record sheets to agree with the enclosed statement. Please note that until such time as the recorder actually changes the entry on the record sheet, the status of the claim remains unchanged.

If you are of the opinion that these changes by the mining recorder will jeopardize your claims, you may during the next fifteen days apply to the Mining and Lands Commissioner for an extension of time. Abstracts should be sent with your application.

If the reduced rate of credits does not jeopardize the status of the claims then you need not seek relief from the Mining and Lands Commissioner and this Notice of Intent may be disregarded.

If your survey was submitted and assessed under the "Special Provision-Performance and Coverage" method and you are of the opinion that a re-appraisal under the "Man-days" method would result in the approval of a greater number of days credit per claim, you may, within the said fifteen day period, submit assessment work breakdowns listing the employees names, addresses and the dates and hours they worked. The new work breakdowns should be submitted directly to the Land Management Branch, Toronto. The report will be re-assessed and a new statement of credits based on actual days worked will be issued.



103 GOVERNMENT ROAD EAST - KIRKLAND LAKE, ONTARIO - P2N 1A9 - (705) 567-7057

January 25, 1986

Mr. Arthur Barr, Land Management Branch, Whitney Block, Room 6643, Queen's Park, Toronto, Ontario M7A IW3

Dear Arthur:

RE: File Number 2.8631/309 and Mining Recorder's File Number 473/85

Please find enclosed duplicate maps of a Geophysical EM Survey and a Geochemical Survey, submitted as required by the letter of intent (file number 2.8631) sent from your office on November 22, 1985.

Please refer these maps to previously submitted work report, Mining Recorder file number 473/85, to be attached to the survey report already filed (file number 2.8631/309).

Also enclosed is a copy of the assay results from Swastika Laboratories Limited which should also be included with the survey report.

Thank you very much.

Yours truly,

PERRONS

Mary Greer

Geological Technician

MG/p

Encls.



1985 12 20

Your File: 309 Our File: 2.8631

Mining Recorder
Ministry of Northern Development and Mines
4 Government Road East
Kirkland Lake, Ontario
P2N 1A2

RE: Notice of Intent dated November 22, 1985.
Geophysical (Electromagnetic) and Geochemical
Survey on mining claims L 561531 et al in
Gauthier Township.

The assessment work credits, as listed with the above-mentioned Notice of Intent, have been approved as of the above date.

Please inform the recorded holder of these mining claims and so indicate on your records.

Yours sincerely

8.E. Yundt Director

Land Management Branch

Whitney Block, Room 6643 Queen's Park, Toronto M7A 1W3

Telephone: 416/965-4888

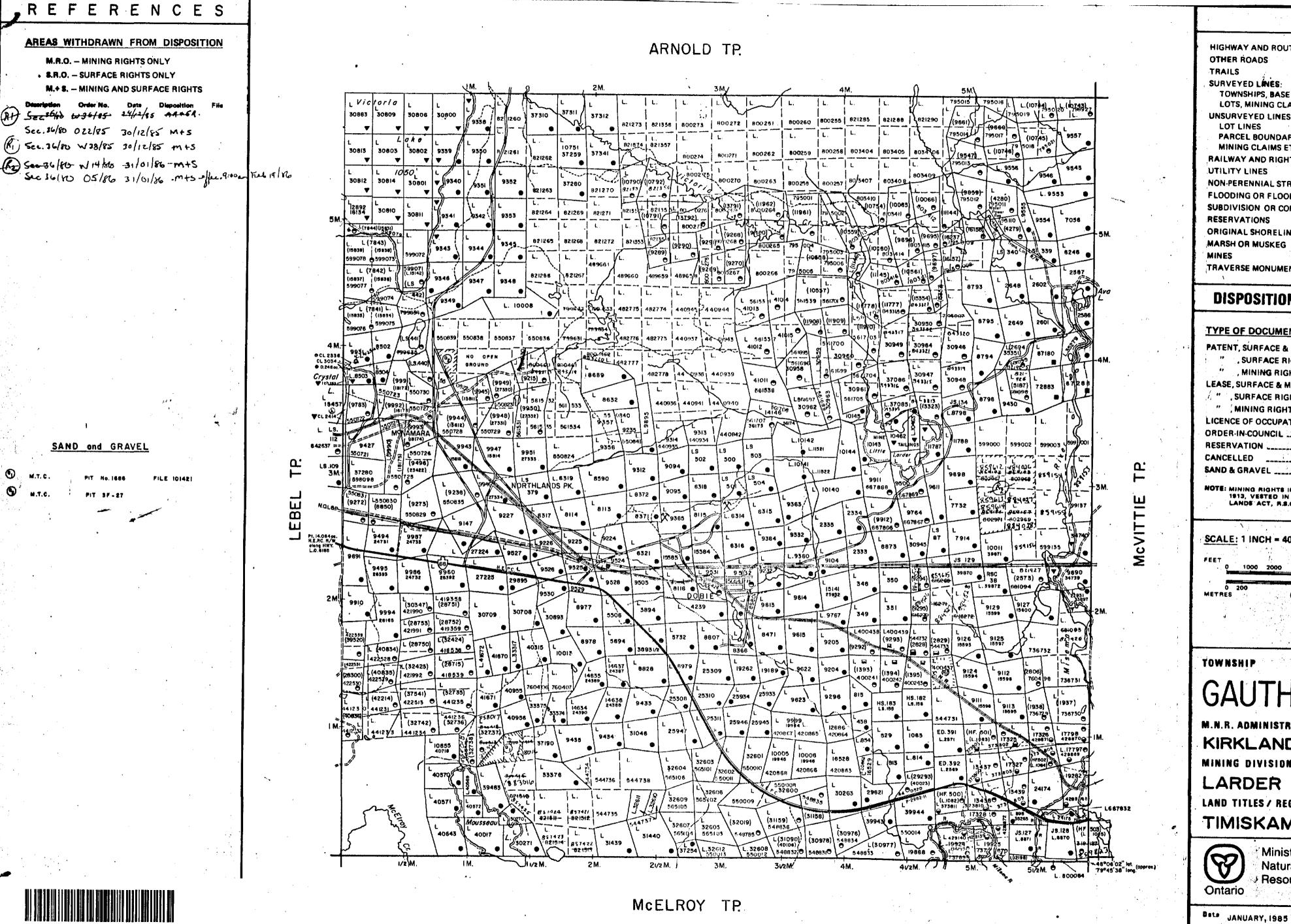
SH:sc

Encls:

cc: Alex H. Peron 103 Government Rd East Kirkland Lake, Ontario P2N 1A9 cc: Mary Greer
49 McKelvie Avenue
Kirkland Lake, Ontario
P2N 2K6

HESIDENT GEOLOGIST ONTANICECEITED

cc: Mr. G.H. Ferguson cc: Resident Geologist
Mining & Lands Commissioner Kirkland Lake, Ontario
Toronto, Ontario



LEGEND HIGHWAY AND ROUTE No. OTHER ROADS SURVEYED LINES TOWNSHIPS, BASE LINES, ETC. PARCEL BOUNDARY RAILWAY AND RIGHT OF WAY FLOODING OR FLOODING RIGHTS ORIGINAL SHORELINE MARSH OR MUSKEG TRAVERSE MONUMENT DISPOSITION OF CROWN LANDS TYPE OF DOCUMENT SYMBOL NOTE: MINING RIGHTS IN PARCELS PATENTED PRIOR TO MAY 6, 1913, VESTED IN ORIGINAL PATENTEE BY THE PUBLIC LANDS ACT, R.S.O. 1970, CHAP. 380; BEC. 63, BUBBECC 14 SCALE: 1 INCH = 40 CHAINS TOWNSHIP KIRKLAND LAKE MINING DIVISION LARDER LAKE LAND TITLES / REGISTRY DIVISION TIMISKAMING Ministry of Natural Management Resources Branch Ontario

APR 1 1000

200

