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GOLDMAC EXPLORATIONS INC.

GEOLOGICAL AND GEOCHEMICAL SURVEYS

HODGETTS TOWNSHIP COPPER PROSPECT

LARDER LAKE MINING DIVISION

ONTARIO

RECEIVED

NOV 0 2 1984

MINING LANDS SECTION

Toronto, Ontario. November 1, 1984.

ULLA M. KNOWLES Consulting Geologist



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1. Geology and Geochemistry of the Hodgetts Township

Property Grid.... (in pocket)

# . INTRODUCTION

On behalf of Goldmac Explorations Inc., geological mapping and soil geochemical surveys were conducted on their Hodgetts Township property, Larder Lake Mining Division, Ontario. The surveys were performed by Ulla M. Knowles, B.Sc., #2206, 201 Sherbourne Street, Toronto, Ontario and J. Lilian Mengozzi, 20 Riverview Ave., Woodbridge, Ontario, between August 17 and November 1, 1984. The following report comprises the observations and results of these surveys.

Location and access to the property and history of exploration and development of the area are reported elsewhere (Goldmac Explorations Inc., OGS Assessment Report, 1983) and need not be repeated here.

### 2. GEOLOGY OF THE HODGETTS TOWNSHIP PROPERTY

### 2a. Grid Geology

Outcrop exposure over the grid area for the most part is rather sparse. All the formations encountered on the Hodgetts
Township property grid are Middle Precambrian in age and comprise:

Nipissing Diabase

Gowganda Formation

The older of the two formations, the Gowganda, forms part of the Huronian Supergroup. Four rock types including conglomerate (or tillite), greywacke, arkose and argillite comprise the Gowganda Formation. Contacts between the units are gradational

and the formation appears to be cyclical. Local disconformities occur within the formation at the base of some of the conglomerate beds.

# Conglomerate or Tillite

The conglomerate or tillite member is polymictic, containing pebble to boulder-sized, sub-rounded to sub-angular fragments of predominantly pink granite. Minor quartz, jasper, greywacke, arkose, argillite and mafic fragments were also observed. The matrix is a medium to coarse grained greywacke, generally dark grey-green in colour. Locally, where feldspar content of the matrix increases, the colour is a dark pink-brown and the matrix composition approaches arkose.

### Greywacke and Arkose

The conglomerate grades into a fine to medium grained, brown-red, to dark grey-green greywacke. Rare, well rounded pebbles of granite occur locally. The greywacke grades into a medium to dark pink, fine to medium grained arkose. The arkose and greywacke also occur as lenses and thin interbeds within the conglomerate unit.

#### Argillite

The arkose is locally interbedded with the overlying argillite. The argillite is a fine grained, dark green to dark grey rock weathering to a light green-grey colour. It is massive to finely laminated and flat lying to gently south sloping. Chloritic alteration is pervasive throughout the argillite.

Traces of pyrite and iron-staining are present rarely within the argillite.

# iabase

Cross-cutting the Gowganda Formation are the Nipissing diabase dykes. One major dyke trending northeasterly, cuts across the grid area. It attains a maximum thickness of 80 to 100 feet. Two narrower dykes paralleling the major diabase dyke are indicated by isolated outcrops and corresponding magnetic highs. The diabase is medium to coarse grained and is dark greengrey in colour. Quartz veining and brecciation of the host rock are common along the contacts of the intrusion. Magnetite is present within the dykes as is evidenced by compass wandering in the vicinity of the diabase.

# 2b. Structural Geology

The structural interpretation of the Hodgetts Township property grid is restricted due to the lack of geological information. This also inhibits deciphering the rather complex series of conductors located by the 1983 VLF survey.

Two major fault directions are defined in the grid area: the older trends northwesterly and the younger, northeasterly.

A third possible fault direction (trending east-west) indicated in the 1983 VLF survey, appears to reflect a disconformity between the argillite and conglomerate within the Gowganda Formation. Weaker, less distinct conductors sub-paralleling this disconformity may represent local disconformities elsewhere within the formation. The cyclical nature of the formation tends to support this interpretation.

The flat-lying nature of the Gowganda Formation and the

parse outcroppings hinder the determination of the attitude of the faults or displacement along them.

### 3. ECONOMIC GEOLOGY

Copper mineralization examined by the writer is exposed in three areas over a strike length of approximately 2400 feet. They may be continuous and mineralization may extend beyond the known strike length. A description of the three areas follows.

# Area #1

Four trenches trending northerly and one pit cut copper mineralization in the centre of the grid. They expose strongly brecciated argillite south of the major diabase dyke, containing large, white, glassy, bull quartz veins trending 232° to 276°. Chalcopyrite occurs in stringers within and cross-cutting the quartz veins. The bull quartz veins attain a maximum thickness of six feet; however, smaller, subsidiary quartz veins are also present. These host the bulk of the chalcopyrite. Two major jointing directions were observed: 288°/90° and 010°/72° SW.

Iron staining is pervasive throughout the trenches; however, only trace amounts of pyrite were observed.

# Area #2

Two pits on either side of the major diabase dyke are located on a large outcrop between Lines 28+00E and 32+00E. The pits expose copper mineralization in both major and subsidiary quartz veins and brecciated conglomerate and argillite. Quartz veins attain a maximum width of four feet and trend  $274^{\circ}/90^{\circ}$ , south

outh dipping. Chalcopyrite also occurs along fractures trending 084°/90° and 055°/90° north of the diabase dyke; however, the copper mineralization here is considerably less extensive than in the hanging wall. Iron-staining is pervasive throughout the pits.

# Area #3

One trench located roughly 1000 feet southwest of Area #1, cuts brecciated, mineralized conglomerate. The trench lies immediately north of a magnetic high indicating a diabase dyke. Quartz veining up to 3 feet wide trends 330° and hosts the chalcopyrite. Iron-staining is present throughout the trench.

- 1. Field observations indicate that the copper mineralization is spatially related to the major northeast trending Nipissing diabase dyke. Chalcopyrite is pervasive throughout quartz-filled, brecciated argillite in the hanging wall. The footwall conglomerate and argillite host chalcopyrite as well; however, it is much less extensive than in the hanging wall.
- 2. No copper mineralization was found in either the diabase or in the Gowganda Formation; therefore, neither of these formations are the source of the copper.
- 3. A deep source is proposed for the copper mineralization. Intrusion of the diabase has brecciated the host rock argillites and conglomerates. Copper brought up from depth is deposited as chalcopyrite in the quartz-rich breccia zones. Very minor pyrite and hematite accompany the chalcopyrite. No galena or other sulfides were observed. Gold and silver values appear negligible.

Rare pyrite in trace amounts, occurs locally within the Gowganda Formation.

Magnetite occurs within the Nipissing diabase dykes; however, none was observed in the Gowganda Formation.

All observed mineralization of note in the grid area occurs near the diabase dyke.

# 4. GEOCHEMICAL SURVEY

# 4a. Introduction

Selective soil sampling was conducted over parts of the grid area in an attempt to extend the zone of known copper mineralization. A total of 35 B-horizon soil samples were taken over the magnetic trace of the major diabase dyke in areas of little or no outcrop. The -80 mesh fraction was analyzed for copper by X-Ray Assay Laboratories.

# 4b. Survey Results

The results of the soil geochemical survey were discouraging. Values ranged from 3.0 ppm to a maximum of 12.0 ppm copper. No anomalous values were encountered.

# . RECOMMENDATIONS AND CONCLUSIONS

- 1. The geological mapping and soil sampling surveys did not expand upon the extent of the copper mineralization. However, the writer recommends further work on the property to include deep overburden drilling and sampling in an effort to increase the strike length of the known copper mineralization and to help delineate possible future diamond drill targets.
- 2. The writer favours a pre-Huronian source for the copper mineralization. It is possible that the exposed mineralization merely represents "sniffs" of a potentially richer, deep-seated source, portions of which have been remobilized and upwardly re-deposited by the diabase intrusion. Nothing is known of the nature of the basement rocks underlying the grid. The nearest outcrop of basement rock in the area lies 3 miles to the northeast and is a porphyritic quartz monzonite, a not unfavourable rock for copper mineralization. Furthermore, if volcanic rocks were to underlie the grid area, they might provide a suitable host for copper mineralization. Diamond drilling will be required to test this interpretation.

This report is respectfully submitted.

Toronto, Ontario November 1. 1984.

Ulla M. Knowles, B.Sc. Consulting Geologist

# . SELECTED REFERENCES

- 1925 G.S.C. Memoir 143, North Shore of Lake Huron, Ontario, W.H. Collins, 1925.
- 1956 Geological Survey, Minada Explorations Ltd., Hodgetts Twp. Property, A.V.W. Dunford, 1956.
- 1969 E.M. and Magnetometer Surveys, A.G.N. Syndicate, Hodgetts Twp., Sudbury Mining Area, 1969.
- 1974 Report to the Pembroke Prospecting Syndicate, Dole-Levoy Property, Hodgetts Twp., J.C. Gill, 1974.
- 1975 Map 2361 Sudbury-Cobalt Sheet, Geological Compilation Series, Geology by K.D. Card and S.B. Lumbers, Ontario Geological Survey; Scale: 1 inch to 4 miles.
- 1977 Diamond Drill Hole Data Three Holes, Hodgetts Twp., Card Lake Copper Mines Ltd., 1977.
- 1978 Card Lake Option: Geological and Geophysical Surveys, Rio Tinto Canadian Exploration Ltd., 1978.
- 1983 Goldmac Explorations Inc., VLF, Mag., Rad. and Geol. Surveys, Hodgetts Township Copper Prospect, Ontario, H.G. Harper, Dec. 1983.

### CERTIFICATE

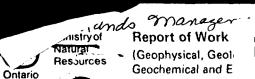
I, ULLA MARIE KNOWLES, of Metropolitan Toronto, in the Province of Ontario, certify as follows with respect to my Report described below.

Goldmac Explorations Inc.
Hodgetts Township Copper Prospect
Larder Lake Mining Division

- 1. I am a geologist residing at #2206, 201 Sherbourne St., Toronto, Ontario.
- 2. I am a graduate of the University of Toronto with a B.Sc. in 1976.
  - 3. I am a Fellow of the Geological Association of Canada.
- 4. I have been given an Option to purchase 5000 Common Shares of Goldmac Explorations Inc. at a price of -10¢- per share on or before August 9, 1985; however, at the present time, this Option has not been ratified by the Ontario Securities Commission.
- 5. The statements made in this report are based on a study of published geological literature and private reports as listed in the "Selected References" section of this report, and a personal examination of the property.

Toronto, Ontario. November 1, 1984.

Ulla M. Knowles, B.Sc. Consulting Geologist





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Ulla M. Knowles, B.Sc., Consulting Geologist

#2206-201 Sherbourne St., Toronto, Ont.

Date Certified

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## Report of Work

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Complete reverse side and enter total(s) here  - Rediometric - Other  Geological - Geochemical  Airborne Credits  Note: Special provisions - credit do not apply to Airborne Surveys.  Magnetometer Radiometric - Other  Calculation of Expenditures (excludes power stripping)  Type of Work Performed  Performed on Claimis)  Total Expenditures  S  + 15  Total Davy Credits Total Davy Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Davy Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Davy Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Total Days Credits necorated Provided	Man Days	Geophysical							
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Expenditures (excludes power stripping)  Type of Work Performed  Performed on Claim(s)  Calculation of Expenditure Days Credits  Total Expenditures  S + 15 =   Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.  Date Ty Recorded Holder's Agent (Signature)  22 Dec Ty Recorded Holder's Agent (Signature)  At the first law of the Claim Selected or witnessed same during and/or after its completion and the annexed report is true.  Name and Postal Address of Person Certifying  At Appl.  Date Certified Days Credits set forth in the Report of Work annexed hereto, having serformed the work or witnessed same during and/or after its completion and the annexed report is true.  Name and Postal Address of Person Certifying  A Appl.  Date Certified Certified Oxio Signature)  A Appl.  Date Certified Oxio Signature)  A Appl.  Date Certified Oxio Signature)  A Appl.  Date Certified Oxio Signature)  A Appl.  A Appl.  Date Certified Oxio Signature)  A Appl.  A Appl.  Date Certified Oxio Signature)		Magnetometer							
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Date Dec 8 / Recorded Holder or Agent (Signature)  22 Dec 8 / 41. N. (7, Holder)  Certification Verifying Report of Work  I hereby certify that I have a personal and intimate knowledge of the facts set forth in the Report of Work annexed hereto, having performed the work or witnessed same during and/or after its completion and the annexed report is true.  Name and Postal Address of Person Certifying  Certified by (Signature)  Au (India)  Date Certified  Certified by (Signature)  Au (India)	choice. Enter number of day				ys Cr. Date Recorded		Mining F	Recorder	
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or witnessed same during and/or after its completion and the annexed report is true.  Name and Postal Address of Person Certifying  1. G. Herph.  Date Certified  Date Certified by (Signature)  Certified by (Signature)  Certified by (Signature)		ort of Work	7		Analy 1 at 1	- £ 14/ 1			ا با د اد
314 Hendon Ave, hellowdel Decertified (Certified by (Signarufe) Decertified Decertified (7.67, Herper.	I hereby certify that I have or witnessed same during an	a personal and intimate I d/or after its completion	cnowledge of	the facts set nexed report i	torth in the Report s true.	of Work ann	exed nereto	, navin performe	o the worl
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	2 11 11	Δ . /.	11. 140	./,	Date Certified	1000	Certifies	by (Signature)	
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Spe of Survey(s)	chemical	, , , , , , , , , , , , , , , , , , , ,			Township	or Area	+ de	
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Address Address	se toplu	retion	ns I	<u>.                                    </u>		7	930	
201-22	0 Bon	ST.	Torna	6				
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Name and Address of Author (of	Sherborr	T. CT.	Tun					
Credits Requested per Each C				aims Traversed (L	ist in nume	erical seguer	nce)	
Special Provisions	Geophysical	Days per	Mı	ning Claim	Expend.	Mir	ning Claim	Expens
For first survey:	- Electromagnetic	Claim	Prefix	Number	Days Cr.	Prefix	Number	Days C
Enter 40 days. (This	Liectiomagnetic		1	721317	23	-	<del></del>	<b>-</b>
includes line cutting)	- Magnetometer		1	651 751	43		<u> </u>	
For each additional survey:	- Radiometric							
using the same grid:	- Other						····	
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	•		284 \ 741 3 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1		1			
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Complete reverse side and enter total(s) here	- Electromagnetic			,				
	- Magnetometer	(1)	02.2	2/		į	/	
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		}	ala A	122.12			-	
	- Other	Ca	llea	///		2/11/	M	
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FIELD WORK			
			Number of
Type of Work	Name & Address	<u> Dates Worked</u> 21 - 23 Au <sub>1</sub> 184	8 hour days
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11 11	<i></i>		3
% Gol	dince Explis - 20	1-220 Beg St. Turnto	
	*****************		
CONSULTANTS			
Nama & Addrace	Dates Worked (specif	fy in field or office)	Number of 8 hour days
	Sept 3/07	_	
Vile 19 KWVIG		(0)114	<i></i>
DRAUGHTSMAN, TYPING	, OTHERS (specify)		Number of
Name & Address	Type of Work	Dates Worked	Number of 8 hour days
X-Rey Accs, Lolg	_	Sort 6	
********	******		
		TOTAL 8 HOUR TECHNICAL D	AVS 7
		TOTAL O HOOK IDONNICAL DA	
LINE-CUTTING			
Name	Address	Dates Worked	Number of 8 hour days
	<del></del>		
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		TOTAL 8 HOUR LINE-CUTTING D	AVC
	•	TOTAL G ROOK LINE-CUTTING DA	n

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1.	Type of Survey Gerchemical
	To hip or Area / No l dg/11 Tup.
	Numbers of Mining Claims Traversed by Survey parts of 1721317
J.	L651751
4.	Number of Miles of Line Cut
*5.	Number of Stations Established
<b>*</b> 6.	Make and type of Instrument Used
<b>*</b> 7.	Scale Constant or Sensitivity
	Frequency Used and Power Output
0.	requency obed and rower output
9.	Summary of Assessment Credits (details on reverse side)
	Total 8 hour Technical Days (Include Consultants, Draughting etc.)
	Total 8 hour Line-Cutting Days
	Calculation 3. 19
	$\frac{7}{\text{Technical}} \times 7 = \frac{56}{\text{Line-cutting}} = \frac{56}{\text{Number}} \div \frac{2}{\text{Number}} = \frac{23}{\text{Assessment credits}}$
	Technical Line-cutting Number Assessment credits of claims per claim
	The dates listed on this form represent working time spent entirely within the limits of the above listed claims Check  If otherwise, please explain
	. /
	Deted Dee 22 1984 Signed A. Ciltery.
	Dated: Dee 22 1984 Signed: 1. Cilteryn.  Reput Tuhmitted wir Gurlonia, Sum to  Tont. Othi fit, 2-7373
	Note: (A) * Complete only if applicable.  (B) Complete list of names, addresses and dates on reverse side.  (C) Submit separate breakdown for each type of survey.  (D) Submit in duplicate.

# Ontari

# **Ministry of Natural Resources**

# GEOPHYSICAL – GEOLOGICAL – GEOCHEMICAL TECHNICAL DATA STATEMENT

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.

	<u> </u>			
Type of Survey(s)	Geochemic	al (Soil)		
Township or Area	17 . A A 1	[wp.		
Claim Holder(s)_	·	xplorations Inc.,	MINING CLAIMS TRAVERSED List numerically	1
` '	#806-88 Uni	versity Ave., Toronto		
Survey Company			L 651750	ł
Author of Deport	Ulla M. K	nowles		
Address of Author	#2206-201	Sherbourne St., Toront	0	• • • • • •
Covering Dates of	A	. 17 to Nov. 1, 1984.	651752	
Covering Dates of	Survey	(linecutting to office)	651753	
Total Miles of Lir	ie Cut	n/a	_	•••••
			L 721314	
SPECIAL PRO		DAYS	721315	
CREDITS REQ	UESTED	Geophysical per claim.	721316	
ENTER 40 day	s (includes	-Electromagnetic	,	••••
line cutting) for	•	-Magnetometer	721317	
survey.		-Radiometric		
ENTER 20 day	s for each	_Other		,
additional surve		Geological		
same grid.		Geochemical 20		
AIDROPNE CDE	DITS (Special cons	ision credits do not apply to airborne surveys)		,
		neticRadiometric		
Magnetometer	Electromag	days per claim)	_	
DATE: Nov	1/0H avan	man / a by knowl	2	
DATE: /Vov	$\frac{1}{100}$ SIGN.	ATURE: Lela M. Knowle Author of Report or Agent		•••••
				•••••
Res. Geol.	Quali	fications $2.7027$		*****
Previous Surveys		•		•••••
File No. Ty	pe Date	Claim Holder		••••
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	••••••		·	
1	••••••	<u> </u>		•••••
	••••••	•		
		<del></del>	TOTAL CLAIMS	

OFFICE USE ONLY

# GEOCHEMICAL SURVEY - PROCEDURE RECORD

Numbers of claims from which samples taken	75); 1/21)1/; 1/21/51
Total Number of Samples 35	ANALYTICAL METHODS
Type of Sample Soil (Nature of Material)  Average Sample Weight 1 lb.	Values expressed in: per cent p. p. m. p. p. b.
Method of Collection -holes were dug using a shovel	Cu, Pb, Zn, Ni, Co, Ag, Mo, As, (circle)
Soil Horizon Sampled B Horizon Development -well developed	Others
Sample Depth 0.5 to 1.5 feet  Terrain gently to moderately rolling	Extraction Methodn/a  Analytical Methodn/a  Reagents Usedn/a
Drainage Development poor  Estimated Range of Overburden Thickness 1 foot to 50 feet	Field Laboratory Analysis  No. (
SAMPLE PREPARATION (Includes drying, screening, crushing, ashing)  Mesh size of fraction used for analysis  -80 mesh	Commercial Laboratory (
General	General



# **Technical Assessment Work Credits**

	File
	2.7373
Date	Mining Recorder's Report of Work No.
1985 03 29	Work No. 22 & 50

Recorded Holder		
GOLDMAC EXPLORATIONS IN	IC	
Township or Area		
HODGETTS TOWNSHIP		
Type of survey and number of Assessment days credit per claim	Mining Claims Assessed	
Geophysical		
Electromagnetic days		
Magnetometer days		
Radiometric days		
Induced polarization days		
Other days		
Section 77 (19) See "Mining Claims Assessed" column		
Geological days		
Geochemicaldays	L 651751-53 721317	
Man days ☑ Airborne ☐		
Special provision Ground		
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 m	lining claims	
No credits have been allowed for the following mining cl	aims	
not sufficiently covered by the survey	Insufficient technical data filed	
L 651750-52 721314-15-16		

# Control Sheet

TYPE OF SURVEY	GEOPHYSICAL GEOLOGICAL GEOCHEMICAL EXPENDITURE
MINING LANDS COMMENTS:	
lad · I·D ·	
Della K. P. D.	
	Signature of Assessor
	85-03-/2 Date

1985 04 17

Your File: 22 4 60 Our File: 2.7373

Mining Recorder
Ministry of Natural Resources
4 Government Road East
Kirkland Lake, Ontario
P2N 1A2

Dear Sir:

RE: Notice of Intent dated March 29, 1985 Geochemical Survey on Mining Claims L 651750, et al, in Hodgetts 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,

S.E. Yundt Director Land Management Branch

Whitney Block, Room 6643 Queen's Park Toronto, Ontario M7A 1W3 Phone: (416)965-4888

#### S. Hurst:mc

cc: Goldmac Explorations Inc Suite 201 220 Bay Street Toronto, Ontario M5J 1P3 cc: Ulla M. Knowles Suite 2206

Suite 2206
201 Sherbourne Street
Toronto, Ontario
N5A 3X2

Encl.

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



april 15/85

1985 03 29

Your Files: 22 & 50 Our File: 2.7373

Mining Recorder
Ministry of Natural Resources
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,

S.E. Yundt Director

Land Management Branch

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

Ŋ ⋅S. Hurst:mc

Encls.

cc: Goldmac Explorations Inc Suite 201 220 Bay Street Toronto, Ontario M5J 1P3

cc: Ulla M. Knowles
Suite 2206
201 Sherbourne Street
Toronto, Ontario
M5A 3X2

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



Notice of Intent for Technical Reports 1985 03 29 2.7373/22 & 50

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 his 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 direct 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.

#2206-201 Sherbourne St., Toronto, Ontario, March 8, 1985.
File: 2.7373

S.E. Yundt, Director, Land Management Branch, Whitney Block, Room 6643, Queen's Park, Toronto, Ontario, M7A 1W3.

Dear Mr. Yundt,

Enclosed please find two corrected copies of the plan for the 'Geological and Geochemical Survey' submitted on Mining Claims L 651750, et al., in Hodgetts Township.

The man-days breakdown which has already been applied to Mining Claims L 721317 and L 651751 applies to the following Mining Claims as well: L 651750, L 651752, L 651753, L721314, L 721315 and L 721316.

I trust you will find all in order. I apologize for the omissions on the map and any delay I may have caused in processing these reports. Should there be any further questions, please do not hesitate to contact me.

RECEIVED

MAR 11 1985

MINING LANDS SECTION

RECEIVED

Land Management Branch
CHRCULLATE

Yours sincerely,

Ulla M. Knowles, B.Sc. Consulting Geologist.

#2206-201 Sherbourne St., Toronto, Ontario, M5A 3X2.

Gela M. Knowles

Tel.: 416-862-8222.

File: 2.7373

Goldmac Explorations Inc Suite 201 220 Bay Street Toronto, Ontario M5J 1P3

Dear Sirs:

RE: Geological & Geochemical Survey submitted on Mining Claims L 651750, et. al., in Hodgetts Township

Returned herein is the plan (in duplicate) for the above-described survey. Please show the claim numbers on each.

The geochemical portion of the above-mentioned survey has been reviewed and does not qualify for assessment under the Special Provisions methods as there has not been a minimum of forty samples taken per claim. You have already provided a man-days breakdown for mining claims L 721317 & L 651751. If this breakdown also applies to mining claims L 651750, L 651752, L 651753, L 721314, L 721315 and L 721316, please advise this office. It it does not apply to these claims, please complete the enclosed form (in duplicate) and return all material to this office quoting file 2.7373.

For further information, please contact Susan Hurst at (416)965-4888.

Yours sincerely,

S.E. Yundt Director Land Management Branch

Whitney Block, Room 6643 Queen's Park Toronto, Ontario M7A 1W3 Phone: (416)965-4888

S. Hurst:mc
Encl.
cc: Mining Recorder
Kirkland Lake, Ontario

cc: Ulla M. Knowles, B.Sc., Consulting Geologist Suite 2206 201 Sherbourne Street Toronto, Ontario N5A 3X2

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# REGISTERED

January 14, 1985

File: 2.7373

Goldmac Explorations Inc Suite 806 88 University Avenue Toronto, Ontario M5J 176

Dear Sirs:

RE: Geochemical Survey submitted on Mining Claims L 651750 et al in the Township of Hodgetts

Enclosed is a copy of our letter dated December 14, 1984 requesting additional information for the above-mentioned survey.

Unless you can provide the required data by January 24, 1985 the file will be assessed as is and a statement of reduced assessment work credits issued.

For further information, please contact Mr. Ray Pichette at (416)965-4888.

Yours sincerely,

S.E. Yundt Director Land Management Branch

Whitney Block, Room 6643 Queen's Park Toronto, Ontario M7A 1W3 Phone: (416)965-4888

S. Hurstimc

cc: Vila M. Knowles
Suite 2206
201 Sherbourne Street
Toronto, Ontario
M5A 3X2

cc: Mining Recorder
Kirkland Lake, Ontario

Encl.

Soldmac Explorations Inc.
Suite 201.
220 Bay St.
Gorando, Out.

December 14, 1984

**File:** 2.7373

Goldmac Explorations Inc Suite 806 88 University Avenue Toronto, Ontario M5J 1T6

Dear Sirs:

Geochemical Survey submitted on Mining Claims L 651750 et al in the Township of Hodgetts

This survey cannot be assessed for special provision credits as there are less than forty samples taken per claim.

In listing the name of the Geochemical se assessed under the lift the Mining Act R.S.O. 1984.

Asse contact Dennis Kinvig

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And Assessed under the lift the Mining Ac Please provide a man-days breakdown listing the names and addresses of the employees and the dates that each man worked on the various phases of the Geochemical survey. The survey will then be assessed under the provisions of Section 77(12) of the Mining Act R.S.O. 1980.

For further information, please contact Dennis Kinvig at (416)965-4888.

Yours sincerely,

S.E. Yundt Director Land Management Branch

Whitney Block, Room 6643 Queen's Park Toronto, Ontario M7A 1W3 Phone: (416)965-4888

D. Kinvig:mc

cc: Ulla M. Knowles Suite 2206 201 Sherbourne Street Toronto, Ontario M5A 3X2

cc: Mining Recorder Kirkland Lake, Ontario File: 50

1984 11 08

Your File:
Our File: 2.7373

Mining Recorder
Hinistry of Natural Resources
4 Government Road East
Kirkland Lake, Ontario
P2N 1A2

Dear Sir:

We received reports and maps on November 2, 1984 for a Geological and Geochemical Survey submitted under Special Provisions (credit for Performance and Coverage) on Mining Claims L 651750 et al in the Township of Hodgetts

This material will be examined and assessed and a statement of assessment work credits will be issued.

We do not have a copy of the report of work which is normally filed with you prior to the submission of this technical data. Please forward a copy as soon as possible.

Yours sincerely,

S.E. Yundt Director Land Management Branch

Whitney Block, Room 6643 Queen's Park Toronto, Ontario M7A 1W3 Phone: (416)965-4888

A. Barr:sc

cc: Goldmac Explorations Inc 806 - 88 University Ave Toronto, Ontario M5J 1T6

cc: Ulla M. Knowles
2206 - 201 Sherbourne St
Toronto, Ontario
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