

REPORT ON
MAGNETOMETER AND GRADIOMETER

SURVEYS

ON CLAIM

SSH #81686

McMURRAY TOWNSHIP

FOR

GOLDEN AGE - DUNRAINE

JOINT VENTURE

WAWA, ONTARIO

BY

PRECAMBRIAN EXPLORATION & MINING SERVICES LTD.

JUNE 12/86

RECEIVED
JUL 14, 1986
MINING LANDS SECTION

MINING LANDS SECTION

SAULT STE. MARIE
MINING DIV.
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A.M. P.M.
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41N1SNE0034 0065C1 MCMURRAY



INTRODUCTION:

A combined total Field Magnetometer and Gradiometer Surveys were recently conducted on Claim SSM 581686 in McMurray Township in the Wawa area of the Sault Ste. Marie Mining Division. ★

The instrument used was the "Scintrex IGS-2" [Integrated Geophysical System], serial number 507254.

A small grid totaling 940 meters was cut and chained over this wedge shaped claim and stations at 10 meter intervals were established on the cross lines. (See enclosed sketches).

LOCATION AND ACCESS:

Claim SSM 581686 is situated in the central section of McMurray Township immediately east of Ward Lake, which is approximately 4 kilometers south of the Town of Wawa. The number 3 post of this 2.98 acre fraction can be found 200 meters west of the number 1 shaft of the Parkhill Gold Mine.

MAGNETOMETER SURVEY:

The Magnetometer Survey is designed to measure the magnetic field of the earth as influenced by rock formations having different magnetic properties and is measured in gammas.

Eighty four [84] Survey Stations were established and measurements of the earth's total magnetic field were taken. These values were manually corrected for diurnal shift and a base value of 55,000 gammas was removed from each reading before being plotted.

Due to the small area covered by the Survey, interpretation of the results is difficult. However, certain magnetic features are obvious and are expressed as areas of relatively high total field values.

As illustrated in the geological report on this claim dated May 31/82 this claim covers an area of complex geology.

The Parkhill Fault Zone, which is intruded by diabase to form dykes, strikes N-NW and can be found near the number 3 post of the claim. This area is represented by two narrow N-NW trending subtle magnetic features.

The North Section of the claim is predominantly underlain by a Felsic intrusion (granodiorite) with diabase and large xenoliths of the surrounding metavolcanic sequences "Floating" in it. This area represents the contact breccia between the more massive granodiorite stock to the North and the N-E striking metavolcanic and metasediments on its Southern Flank.

GRADIOMETER SURVEY:

A Gradiometer Survey measures the vertical total Field Magnetic Gradient.

The spacing between two sensors is fixed, in this instance at one (1) meter. A reading of the lower sensor followed by a reading of the upper sensor provides a difference of magnetic intensity which is then divided by the distance between the sensors. The result is the Magnetic Gradient.

Due to the relatively thin cover of overburden, the main function of the gradient survey is to provide information which would assist in interpreting any complex anomalies detected during the survey.

A total of eighty four (84) stations were established.

Vertical gradient measurements were taken at each station and then plotted on an appropriate sketch.

As with the total magnetic field survey, the small amount of information obtained from the data covering this irregular claim is inconclusive. Broadly speaking however, certain geologic features such as diabase dykes and altered xenoliths have high magnetic gradients.

CONCLUSIONS:

The Magnetometer and Gradiometer Surveys recently completed on this Claim illustrate the complex geological features that are found within it. Due to the lack of a reference base, it is recommended that a Magnetometer and Gradiometer Survey be conducted over the entire claim block held by Dunraine Mines Ltd. and Goldun Age Resources in McMurray Township.

Respectfully Submitted,



Daniel J. Gignac

June 12th, 1986

PRECAMBRIAN EXPLORATION & MINING SERVICES LTD.

CLA: A SSM 581686
 GRADIOMETER SURVEY
 FOR
 GOLDEN AGE - DUNRAIVE
 JOINT VENTURE
 McMURRAY T.P.

L 0750V
 L 0725W
 L 0700
 L 0725E
 L 0750E
 L 0775E

- SSM 3129
- 0+40N
 - 0+20N
 - BL 00
 - 0+20S
 - 0+40S
 - 0+60S
 - 0+80S
 - 1+00S
 - 1+20S
 - 1+40S
 - 1+60S
 - 1+80S
 - 2+00S
 - 2+20S
 - 2+40S
 - 2+60S
 - 2+80S
 - 3+00S
 - 3+20S
 - 3+40S
 - 3+60S
 - 3+80S

SSM 3406

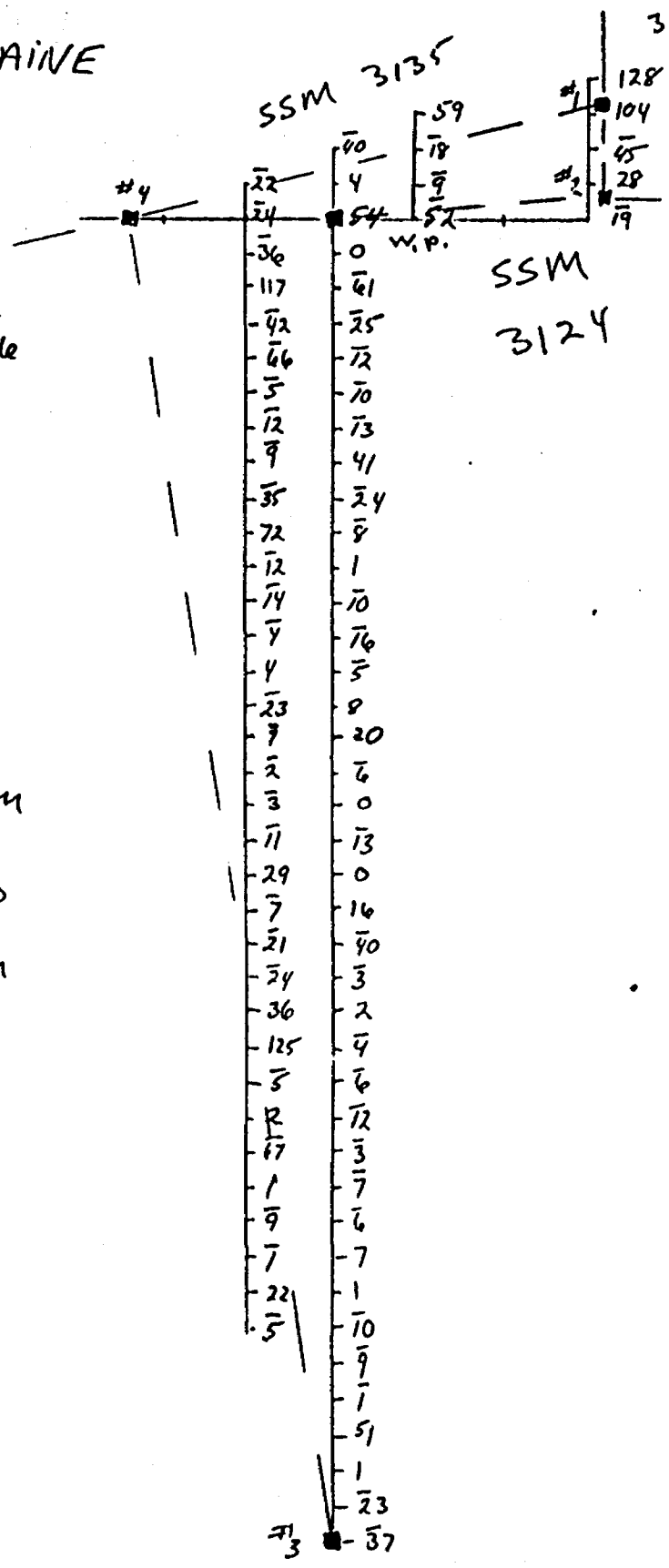
SSM 3135

SSM 3124



sensor separation = 1m

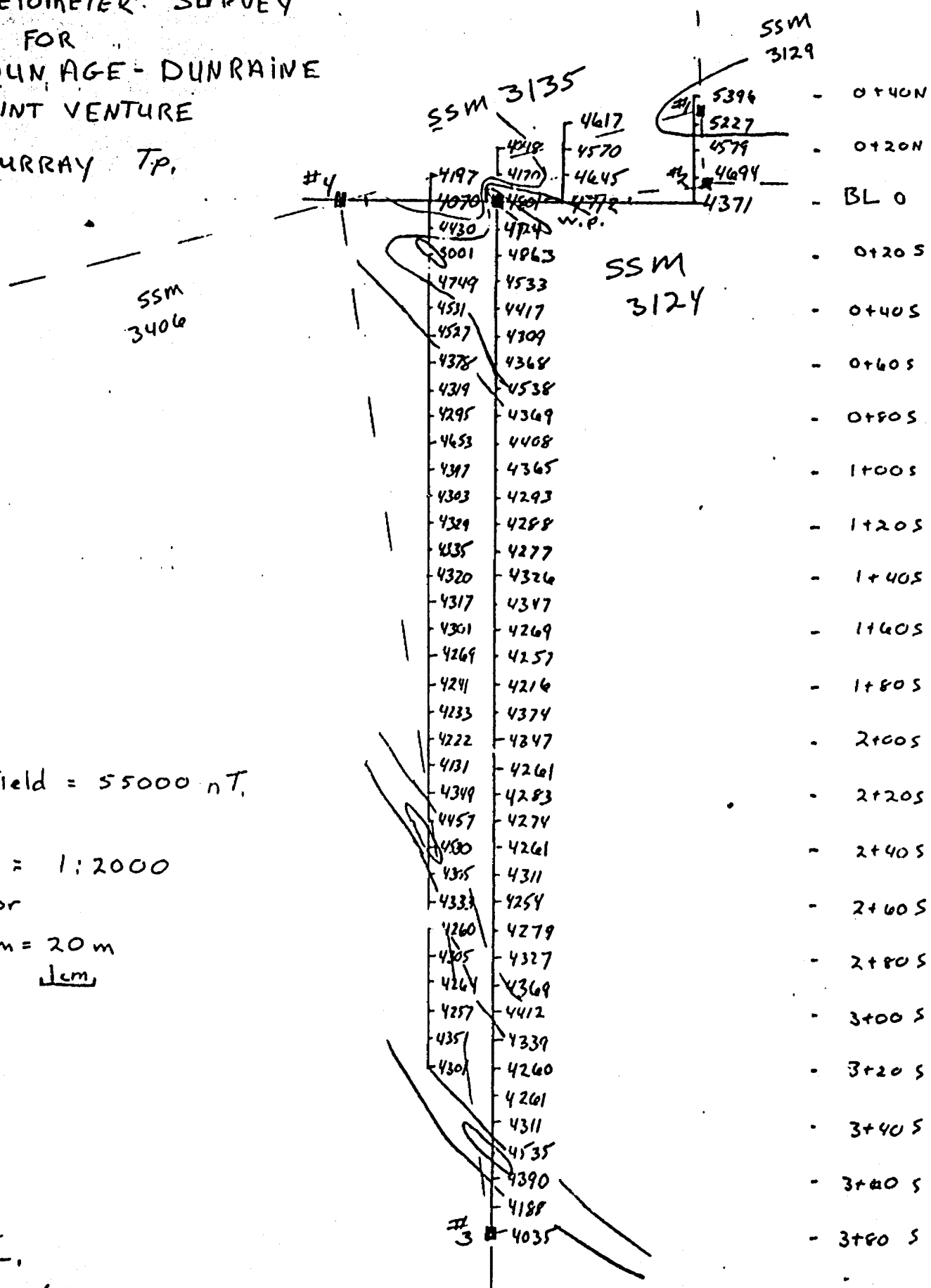
SCALE = 1 to 100
 or
 1cm = 20m
1cm



D.J.G.
 June 12/86

- 0510
- 0320
- 007
- 0320
- 0450
- 0470

CLAIM SSM 581686
MAGNETOMETER SURVEY
FOR
GOLDUM AGE - DUNRAINE
JOINT VENTURE
McMURRAY Tp.



SSM 3406

SSM 3135

SSM 3124

SSM 3129

Base Field = 55000 nT.

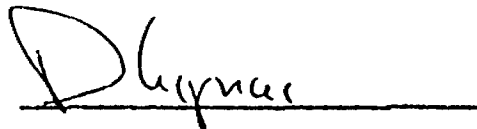
SCALE = 1:2000
or
1cm = 20m
1cm

D.J.G.
June 12/86.

CERTIFICATE OF QUALIFICATION

I Daniel J. Gignac of 171 Niven Street, Haileybury, Ontario,
certify that:

1. I am an Explorationist, and President of Precambrian Exploration & Mining Services Ltd.
2. I am a graduate of the University of Waterloo with a Bachelor of Environmental Studies, Geology Minor, 1980.
3. I have been employed as a staff and freelance Explorationist since 1980.
4. I have not received directly or indirectly, nor do I expect to receive any interest, direct or indirect in the Property described herein.
5. This Report has been prepared based upon field and office work carried out from May 30th to June 12th 1986.
6. The information contained in the Report is accurate and correct.



Daniel J. Gignac

171 Niven Street
P. O. Box 210
Haileybury, Ontario
POJ 1K0



41N15NE0034 0065C1 MCMURRAY

lural Resources

File _____

900 GICAL - GEOCHEMICAL TA 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.

Type of Survey(s) Magnetometer, Gradiometer
Township or Area Mc Murray Tp - Wawa Area
Claim Holder(s) Dunrain Mines Ltd.

Survey Company Precambrian Exploration + Mining Sr.
Author of Report Daniel J. Givvic
Address of Author 171 Wiven st. Haileybury Ont.
Covering Dates of Survey May 30 to June 12/86
(linecutting to office)
Total Miles of Line Cut 0.94 Km.

MINING CLAIMS TRAVERSED
List numerically

SSM 581656
(prefix) (number)

RECEIVED

JUL 14 1988

MINING CLAIMS SECTION

If space insufficient, attach list

SPECIAL PROVISIONS
CREDITS REQUESTED

DAYS
per claim

ENTER 40 days (includes
line cutting) for first
survey.

ENTER 20 days for each
additional survey using
same grid.

- Geophysical
 - Electromagnetic _____
 - Magnetometer 15
 - Radiometric _____
 - Other 14
- Geological _____
- Geochemical _____

AIRBORNE CREDITS (Special provision credits do not apply to airborne surveys)

Magnetometer _____ Electromagnetic _____ Radiometric _____
(enter days per claim)

DATE: _____ SIGNATURE: DJG
Author of Report or Agent

Res. Geol. _____ Qualifications _____

Previous Surveys

File No.	Type	Date	Claim Holder

TOTAL CLAIMS 1

GEOPHYSICAL TECHNICAL DATA

GROUND SURVEYS - If more than one survey, specify data for each type of survey

Number of Stations 168 Number of Readings 168
Station interval 10m Line spacing 25m
Profile scale
Contour interval

MAGNETIC

Instrument Scintrex IGS-2 - proton mag.
Accuracy - Scale constant 0.1 gamma
Diurnal correction method manual
Base Station check-in interval (hours) 1 hour
Base Station location and value Line 0+00, 3+80 S = 57035 gamma

ELECTROMAGNETIC

Instrument
Coil configuration
Coil separation
Accuracy
Method: [] Fixed transmitter [] Shoot back [] In line [] Parallel line
Frequency (specify V.L.F. station)
Parameters measured

GRAVITY

Instrument
Scale constant
Corrections made
Base station value and location
Elevation accuracy

INDUCED POLARIZATION RESISTIVITY

Instrument
Method [] Time Domain [] Frequency Domain
Parameters - On time Frequency
- Off time Range
- Delay time
- Integration time
Power
Electrode array
Electrode spacing
Type of electrode

SELF POTENTIAL

Instrument _____ Range _____

Survey Method _____

Corrections made _____

RADIOMETRIC

Instrument _____

Values measured _____

Energy windows (levels) _____

Height of instrument _____ Background Count _____

Size of detector _____

Overburden _____
(type, depth - include outcrop map)

OTHERS (SEISMIC, DRILL WELL LOGGING ETC.)

Type of survey Gradiometer

Instrument FGS-2 (Scintrex)

Accuracy 0.1 gamma

Parameters measured magnetic gradient at 1 meter sensor
separation

Additional information (for understanding results) _____

AIRBORNE SURVEYS

Type of survey(s) _____

Instrument(s) _____
(specify for each type of survey)

Accuracy _____
(specify for each type of survey)

Aircraft used _____

Sensor altitude _____

Navigation and flight path recovery method _____

Aircraft altitude _____ Line Spacing _____

Miles flown over total area _____ Over claims only _____



Recorded Holder JOHN S. GRANT

Township or Area McMURRAY TOWNSHIP

Type of survey and number of Assessment days credit per claim	Mining Claims Assessed
Geophysical Electromagnetic _____ days Magnetometer _____ 15 _____ days Radiometric _____ days Induced polarization _____ days Other _____ days Section 77 (19) See "Mining Claims Assessed" column Geological _____ days Geochemical _____ days Man days <input checked="" type="checkbox"/> Airborne <input type="checkbox"/> Special provision <input type="checkbox"/> Ground <input checked="" type="checkbox"/> <input type="checkbox"/> Credits have been reduced because of partial coverage of claims. <input type="checkbox"/> Credits have been reduced because of corrections to work dates and figures of applicant.	SSM 581686

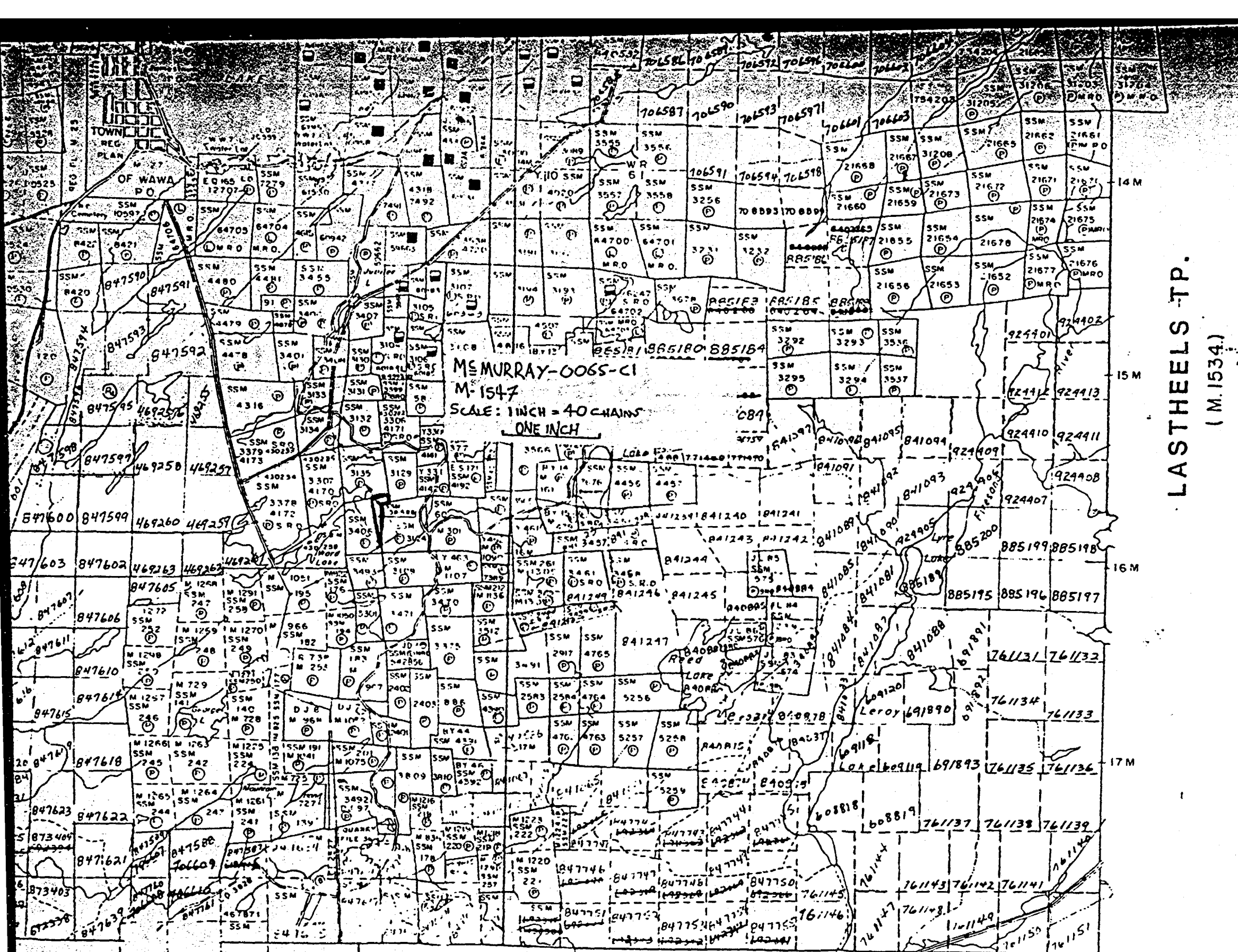
Special credits under section 77 (16) for the following mining claims

No credits have been allowed for the following mining claims

- not sufficiently covered by the survey
- insufficient technical data filed

NO CREDIT FOR THE GRADIOMETER SURVEY, AS IT WAS PERFORMED AT THE SAME TIME AS THE MAGNETOMETER SURVEY.

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; Geological - 40; Geochemical - 40; Section 77(19) - 60.



LEGEND

PATENTED LAND	● or (P)
CROWN LAND SALE	C.S.
LEASES	(L)
LOCATED LAND	Loc.
LICENSE OF OCCUPATION	L.O.
MINING RIGHTS ONLY	M.R.O.
SURFACE RIGHTS ONLY	S.R.O.
ROADS	—
IMPROVED ROADS	—
KING'S HIGHWAYS	—
RAILWAYS	—
POWER LINES	—
MARSH OR MUSKEG	—
MINES	—
CANCELLED	—
PATENTED for S.R.O.	—
LEASED for M.R.O.	—

NOTES

400' SURFACE RIGHTS RESERVATION AROUND ALL LAKES AND RIVERS.

THIS TOWNSHIP UNDER SUBDIVISION CONTROL OF THE MUNICIPALITY OF THE TOWNSHIP OF MICHIPICOTEN. Refer to Twp. By Low 18-59 File:16756'

MINING CLAIMS SSM 10524, 25, 26, 27, SSM 10528, 29, 30, 31, SSM 10532 & 33 ARE PATENTED SURFACE RIGHTS ONLY WITHDRAWN FROM STAKING File 10532

L.O 3826 COVERS TELEPHONE LI FROM WAWA STA FOLLOWING THE MINES ROAD.

AREAS WITHDRAWN FROM C.S.P.O.

S.R. - SURFACE RIGHTS	M.P. - MINE
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Description	Order No.	Date	Deposit
(P)	W. 1/80	7/2/80	70672
(L)	N. 7/80	4/15/84	
(Q)			

(Q) QUARRY PERMIT

PLAN NO. M. 1547

Ministry of Natural Resources

LASTHEELS TP. (M. 1534)

RABAZO TP. (M. 1556)

NAVEAU TP. (M. 1546)

Mining Act 29259

Type of Survey: Magnetometer, Gradiometer; Township or Area: McMurray

Claim Holder(s): John S. Grant; Prospector's Licence No.: A. 26664

Address: Suite 2500, 390 Bay St. Toronto M5H-2W7

Survey Company: Precambrian Expl. & Mining Services Ltd.; Date of Survey (from & to): 03 06 86 03 06 86; Total Miles of line Cut: 0.94 km

Name and Address of Author (of Geo-Technical report): D.J. Giguere - Precambrian - 171 N. ven. st. Haileybury Ont P0J-1K0

Table for 'Credits Requested per Each Claim in Columns at right' with columns for Special Provisions, Man Days, Airborne Credits and various survey methods.

Table for 'Mining Claims Traversed (List in numerical sequence)' with columns for Mining Claim Prefix, Mining Claim Number, and Expend. Days Cr.

RECEIVED S.S-MARIE MINING DIV. JUL 4 - 1986

Expenditures (excludes power stripping) section with 'Type of Work Performed' and 'Performed on Claim(s)' fields.

Calculation of Expenditure Days Credits: Total Expenditures \$ + 15 = Total Days Credits

Instructions: Total Days Credits may be apportioned at the claim holder's choice.

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...

Name and Postal Address of Person Certifying: Daniel J. Giguere, 171 N. ven. st. Haileybury Ontario - P0J-1K0

For Office Use Only section with fields for Total Days Cr. Recorded, Date Recorded, Mining Recorder, Date Approved as Recorded, and Branch Director.

file on SSN 581686 15

October 17, 1986

Your File: 75-86
Our File: 2.9259

Mining Recorder
Ministry of Northern Development and Mines
875 Queen Street East
Box 669
Sault Ste. Marie, Ontario
P6A 2B3

Dear Madam:

RE: Notice of Intent dated September 19, 1986
Geophysical (Magnetometer) Survey on Mining
Claim SSM 581686 in McMurray 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
SH/mc

cc: John S. Grant
Suite 2500
390 Bay Street
Toronto, Ontario
M5H 2W7

Encl.

Daniel J. Gignac
171 Niven Street
Halleybury, Ontario
POJ 1K0

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

Resident Geologist
Sault Ste. Marie, Ontario