



32D04SE0390 2.2752 SKEAD

010

2.77-2

REPORT ON
GEOLOGICAL SURVEY

SOUTH 1/2 Lot 6 Con 6

SKEAD TOWNSHIP, ONTARIO

BY

R. A. MACGREGOR, P. ENG.

JULY 21, 1978

RECEIVED

JUL 27 1978

MINING LANDS SECTION

I. INTRODUCTION

A geological survey was run over lines cut on 3 claims in Skead Township during May 1978.

II. LOCATION, ACCESS AND OWNERSHIP

The property is located in the South 1/2 of lot 6 Con 6 Skead Township, Larder Lake Mining Division, District of Temiskaming, Ontario. The claims are numbered L341838, L341839 and L342531 and are recorded in the name of R.A. MacGregor, 134 Palace Drive, Sault Ste. Marie, Ontario.

Highway 624, a paved secondary highway passes through the claims about 8 miles south of the town of Larder Lake, Ontario. A bush road, passable to truck or 4-wheel drive traffic runs along the south boundary of the claims.

III. PREVIOUS EXPLORATION

Gold was discovered during or before the 1920's and exploration carried out at that time and into the 1930's. A large number of old pits, trenches, and drill casing is still in evidence from this work. A shaft was sunk on claim L341838 to a reported depth of 500 feet with lateral work on the 215 and 475 foot levels. Little information is now available on this work, although there is reference to some spectacular gold showings in Ontario Department of Mines reports from that period. More recently the claims have been surveyed by magnetometer, VLF-EM and soil sampling surveys. Some surface trenching has also been carried out.

..... Continued

IV. TOPOGRAPHY

The major part of the property is covered by Pleistocene drift, gravel and swamp. Rocky hills up to 20 feet above the surrounding area with fair to good rock exposure occurs in the north-west part of the claims. The central and southern parts are largely drift covered with a few low outcrops. The east side of claim L342531 is an open muskeg. The remainder of the property is covered with poplar, alder and wild cherry with a dense growth of low bushes. Black spruce occur in the more swampy places. The thick underbrush often makes the location of outcrops difficult.

V. MAPPING PROCEDURE

A grid of picket lines were cut for the geological survey. An east west base line was cut approximately through the centre of the claim group and picket lines run north and south at 400 foot intervals. The lines follow approximately old lines which were cut some years ago but were too overgrown to be usable. The picket lines were chained and picketed every 100 feet. The pickets were marked with fluorescent red paint for easier observation. Trial lines were run east and west from the picket lines by pace and compass in search of poorly exposed outcrop. All outcrops found were noted in a field book as to rock type and distance from picket lines. This information was then plotted on a 1" - 200' scale plan.

..... Continued

VI. GENERAL GEOLOGY

The general geology of northern Skead Township has been described by D.F. Hewitt ⁽¹⁾. The area is underlain by early Precambrian volcanics, sedimentary rocks and intrusives.

Hewitt used a classification and nomenclature to conform with that used by J.E. Thomson ⁽²⁾ in Hearst Township to the north. All the volcanics were classified as Keewatin; with the sediments classified as Temiskaming. Both these rocks were cut by later Algomian intrusives. A group of diorite, gabbros and serpentized peridotites are classified as Post Keewatin intrusives. The geological succession of the area as proposed by Hewitt is given in the following table:

Table of Formations

QUATERNARY

Recent and Pleistocene: Clay, sand gravel.
Great unconformity

PRECAMBRIAN

Keweenawan or Matachewan: Diabase.

Intrusive contact

Huronian (Cobalt Series): Conglomerate, greywacke, arkose, slate, quartzite.

Great unconformity

Algomian: Syenite; syenite porphyry; granite; granite porphyry; felsite; aplite; lamprophyre; basic syenite; hornblende syenite; hornblende diorite; amphibolite, hornblendite.

Intrusive contact

Timiskaming: Fine-grained sediments; greywacke, arkose, slate, iron formation.
Conglomerate with interbedded greywacke.

Great unconformity

Post-Keewatin: Diorite, diabase, gabbro, serpentized Peridotite.

Intrusive contact

..... Continued

Table of Formations (continued)

PRECAMBRIAN (continued)

Keewatin:

Early Intrusives: Quartz porphyry, feldspar porphyry, dacite porphyry.

Basic and Intermediate Volcanics: Greenstone, pillow lava; diabasic, dioritic, and gabbroic lava, fragmental lava, agglomerate, pyroclastics, dacite, talc-chlorite schist, andesite, tuff, sheared basic lava.

Acid Volcanics: Rhyolite, cherty tuff, rhyolite tuff, tuff agglomerate, fragmental lavas, trachyte.

- (1) O.D.M. Report Vol. 58 part 6, 1949
- (2) O.D.M. Report Vol. 56 part 8, 1947

VII. PROPERTY GEOLOGY

The rocks occurring on the three claims surveyed are mainly massive to sheared flows cut by some narrow felsic intrusive. The volcanics range in composition from rhyolite to basalt. The beds appear to trend north-west; south-east. Spinifex texture was noted in a number of locations in gabbroic to diabasic textured flows along the western part of the claims. The volcanics are believed to be of the Calc-Alkaline Suite, but this has not yet been confirmed by chemical analysis. The presence of Spinifex texture and the occurrence of Komatiitic ultramafics a short distance south of the area surveyed suggests the possibility that some of the basalts may belong to the Komatiitic Suite which again would have to be confirmed by chemical analysis.

The basaltic rocks are greenish grey to dark green in colour. The more massive basalt contains pyrite up to 1-2%. The basalt is sheared in many places and contains carbonate, quartz-carbonate and quartz veinlets.

..... Continued

The rhyolite ranges in colour from white to light greenish. It ranges from a massive very siliceous looking rock with a conchoidal fracture to a porphyritic appearing rock with quartz and feldspar phenocrysts. An outcrop in the south-west corner of the group has been sericitized and carbonatized. Rocks mapped as andesite range in composition from massive to a coarse pyroclastic breccia occurring at the east side of the claims.

The Algoman intrusives consist of a light pink quartz-feldspar porphyry in narrow dykes and a darker feldspar porphyry which was not seen in contact with the volcanics. A dyke of biotite lamprophyre was also noted. It contains black biotite phenocrysts up to 1/8" in a soft black fine grained matrix. Lamprophyre is easily recognized in outcrop by its dark grey pitted surface.

Many of the gold showings are now covered by rock from the Manor shaft or the trenches have filled with water or debris. The gold mineralization would appear to be in altered volcanic rocks cut by shear zones or fractures filled with quartz, possibly connected with felsic intrusive rocks. A large amount of felsic porphyry rocks were noted on the dump from the Manor shaft but were noted at only a few places in outcrop.

..... Continued

VIII. CONCLUSIONS

The claims are underlain by a volcanic sequence of rocks favourable for gold deposition and on which a number of gold showings have already been found. Continued exploration is warranted particularly for strata bound gold deposits of the Kerr-Addison model.

Respectfully submitted



July 21, 1978

Robert A. MacGregor, P. Eng.



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) Geological
Township or Area Skead
Claim Holder(s) R.A. MacGregor

Survey Company _____
Author of Report R.A. MacGregor
Address of Author 134 Palace Dr. SAULT STE. MARIE
Covering Dates of Survey May - July / 1978
(linecutting to office)
Total Miles of Line Cut 4.0

MINING CLAIMS TRAVERSED
List numerically

L. 341838 ✓
(prefix) (number)
L. 341839 ✓
L. 342531 ✓

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 _____
-Radiometric _____
-Other _____
Geological 40
Geochemical _____

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

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

DATE: July 21/78 SIGNATURE: R. MacGregor
Author of Report or Agent

Res. Geol. _____ Qualifications 2.1102 & on this file

Previous Surveys

| File No. | Type | Date | Claim Holder |
|----------|------|------|--------------|
| | | | <u>R.A.</u> |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |

TOTAL CLAIMS 3

If space insufficient, attach list

OFFICIAL COPY

GEOPHYSICAL TECHNICAL DATA

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

Number of Stations _____ Number of Readings _____

Station interval _____ Line spacing _____

Profile scale _____

Contour interval _____

MAGNETIC

Instrument _____

Accuracy – Scale constant _____

Diurnal correction method _____

Base Station check-in interval (hours) _____

Base Station location and value _____

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 _____

NOTES

400' surface rights reservation along the shores of all lakes and rivers.

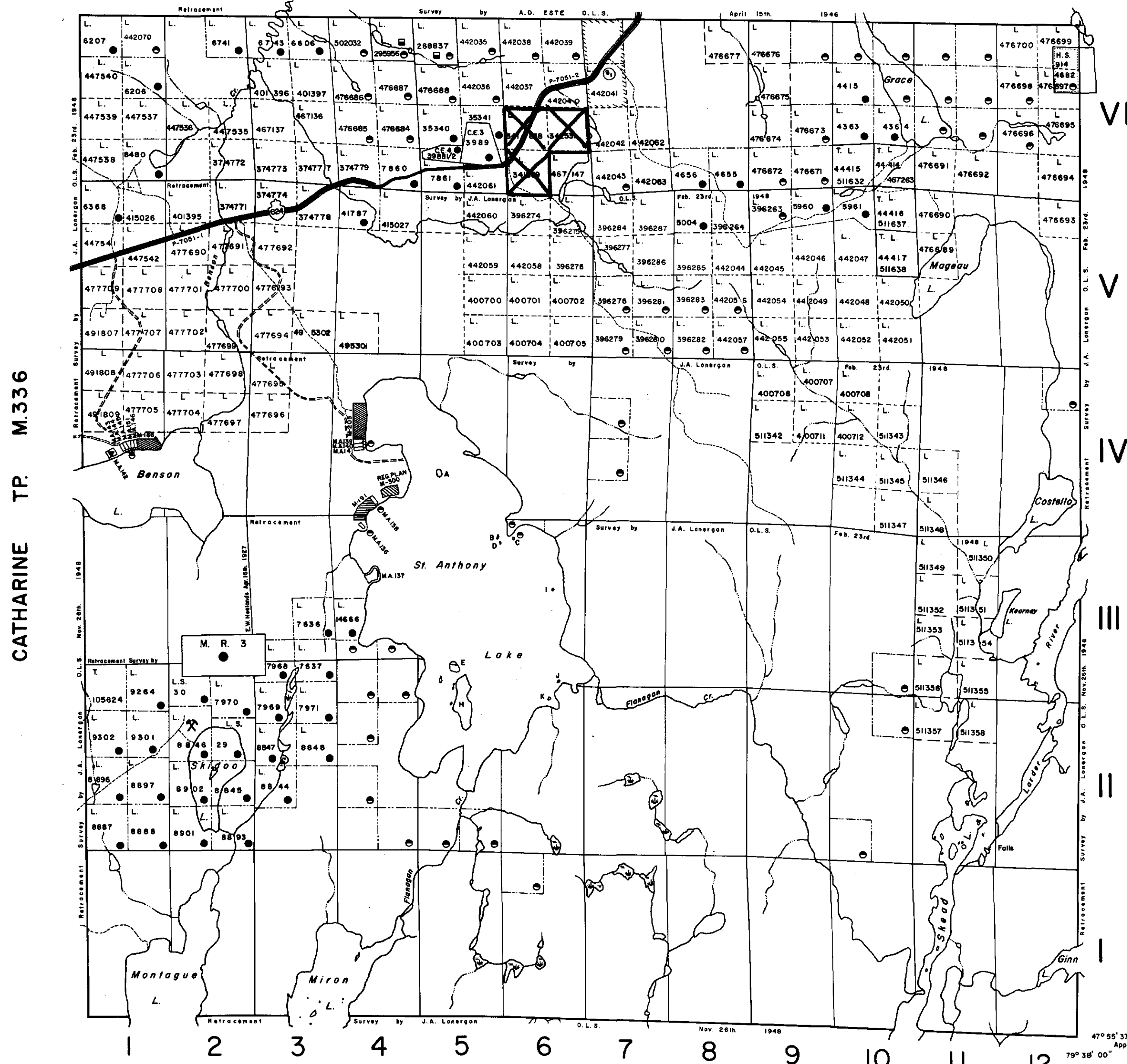
All unpatented mining claims accepted subject to survey, Section 118 of the Mining Act (R.S.O. 1970).

SAND and GRAVEL

M.T.C. PIT No. 1230

DATE OF ISSUE
JUL 31 1978
SURVEYS AND MAPPING
BRANCH

HEARST TP. M.354



CATHARINE TP. M.336

RATTRAY TP. M.384

BAYLY TP. M.323

LEGEND

- HIGHWAY AND ROUTE No.
- OTHER ROADS
- TRAILS
- SURVEYED LINES:
 - TOWNSHIPS, BASE LINES, ETC.
 - LOTS, MINING CLAIMS, PARCELS, ETC.
- UNSURVEYED LINES:
 - LOT LINES
 - PARCEL BOUNDARY
 - MINING CLAIMS ETC.
- RAILWAY AND RIGHT OF WAY
- UTILITY LINES
- NON-PERENNIAL STREAM
- FLOODING OR FLOODING RIGHTS
- SUBDIVISION
- ORIGINAL SHORELINE
- MARSH OR MUSKEG
- MINES

DISPOSITION OF CROWN LANDS

| TYPE OF DOCUMENT | SYMBOL |
|---------------------------------|--------|
| PATENT, SURFACE & MINING RIGHTS | ● |
| " SURFACE RIGHTS ONLY | ○ |
| " MINING RIGHTS ONLY | ◐ |
| LEASE, SURFACE & MINING RIGHTS | ■ |
| " SURFACE RIGHTS ONLY | □ |
| " MINING RIGHTS ONLY | ◻ |
| LICENCE OF OCCUPATION | ▼ |
| CROWN LAND SALE | C.S. |
| ORDER-IN-COUNCIL | OC |
| RESERVATION | ⊙ |
| CANCELLED | ⊗ |
| SAND & GRAVEL | ⊕ |

SCALE: 1 INCH = 40 CHAINS



| ACRES | HECTARES |
|-------|----------|
| 40 | 16 |

TOWNSHIP 2.2752

SKEAD

DISTRICT
TIMISKAMING
MINING DIVISION
LARDER LAKE

Ministry of Natural Resources

Ontario Surveys and Mapping Branch

Date 10/4/74

Plan No.

Whitney Block
Queen's Park, Toronto

M.387



32D043E0390 2.2752 SKEAD

LEGEND

- LAMPROPHYRE
- QUARTZ - FELDSPAR PORPHYRY
- (B) FELDSPAR PORPHYRY
- RHYOLITE
- ANDESITE, ANDESITE BRECCIA
- BASALT, MASSIVE
- (B) SHEARED

- STRIKE AND DIP OF BEDS
- STRIKE AND DIP OF SCHISTOSITY
- STRIKE OF LAVA FLOWS

**GEOLOGICAL SURVEY
LOT 6 CON 6
SHEAD TOWNSHIP
SCALE 1"=200'**

