

**PROSPECTING REPORT ON
LANDHOLDINGS OF THE
SWARD LAKE AMETHYST MINE,
THUNDER BAY MINING DIVISION**

NTS 52 A/10

2.22428

Balmertown, Ontario
October 15, 2001

Timothy J. Twomey
H.BSc. Geology



52A10NE2011 2.22428 MCTAVISH

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INTRODUCTION

The property contains an amethyst occurrence nearby to Sward Lake within the prolific amethyst belt of the north half of McTavish Township in Northern Ontario. It contains a small but high-grade amethyst deposit that is currently being mined. The property also contains a two-unit claim to the south of the mine that is very prospective for similar parallel amethyst veins.

PROPERTY DESCRIPTION

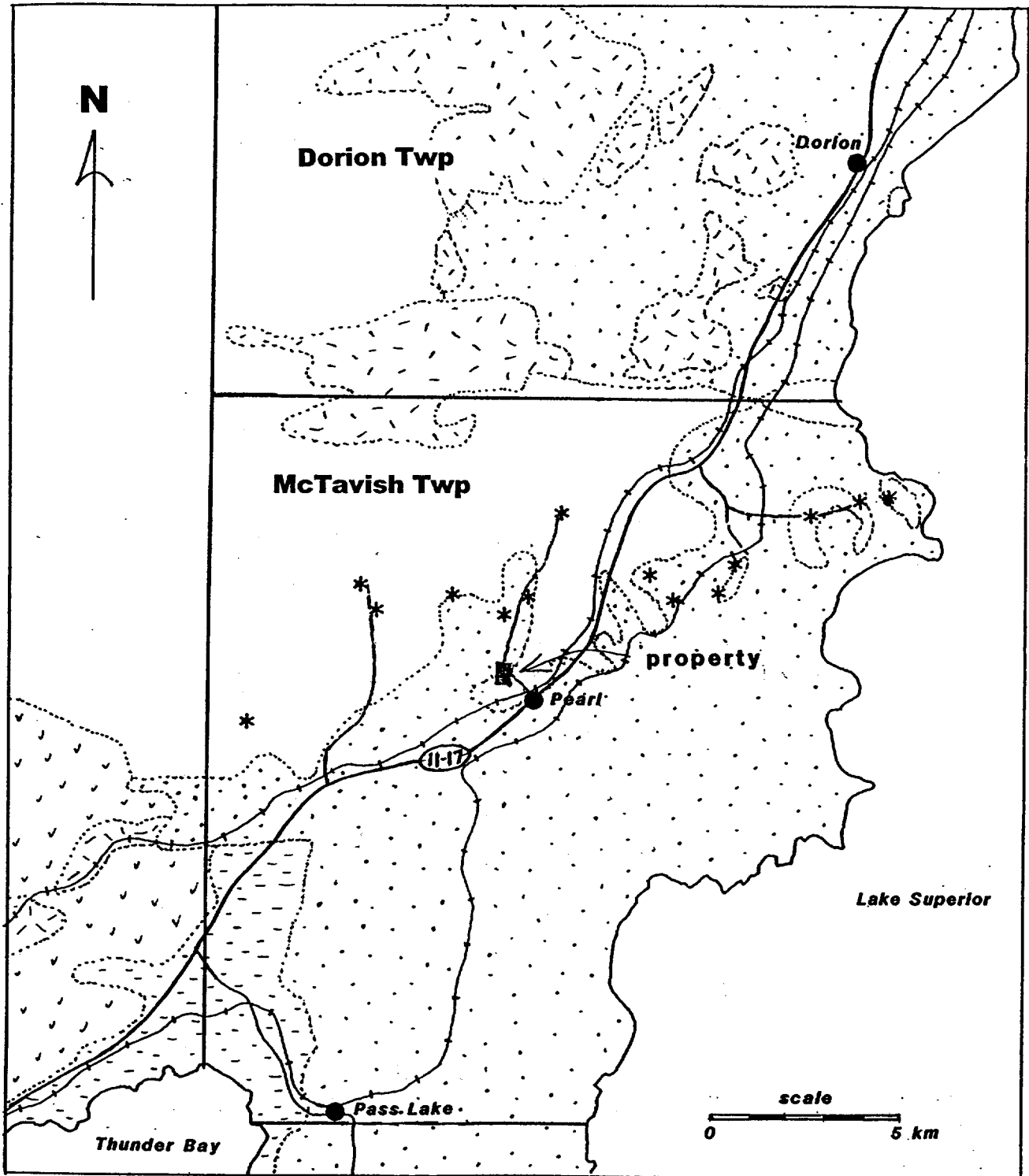
The property consists of two unpatented mining claims. TB.1209542 claim, which contains approximately 16 hectares (40 acres), hosts the deposit. The legal description is the Northwest Quarter of the Northeast Quarter of Lot 5 Concession IV in McTavish Township. It was recorded on March 24, 1995, and requires \$400 assessment work by March 24, 2003 to remain in good standing. TB.1184997 is contiguous to the south whose legal description is the southwest quarter of the northeast quarter of Lot 5 and the northwest quarter of the southeast quarter of Lot 5, Concession IV, of about 80 acres. It requires \$800 assessment work by April 2003 to remain in good standing. No other taxes are applicable. Ownership of the property was transferred to Mr. Robert M. Boyd of Macomb, Michigan, U.S.A., from Breezy Mountain Amethyst Mines Ltd. in June 2000.

LOCATION AND ACCESS

The property is located within McTavish Township, claim map G-175, latitude 48° 40' 45", longitude 88° 40' 37". It is approximately 50 km east of the City of Thunder Bay, Ontario. The property is located 1 km north of Highway 11-17 via No. 5 Road North at Pearl, Ontario. Access to the property is provided by an all-weather gravel road, the Pearl Lake Mine road, which connects five amethyst mines with Highway 11-17, for 1.8 km. Then, one proceeds on a narrow bush road, controlled by the property, 600 m (2000 feet) to the mine-site. Another access is located at the south end of the property directly off the Pearl Lake Mine Road. That access is gated and locked by Mr. Dave Bak of Pass Lake, ON, who uses that road for logging and amethyst mining.

PREVIOUS EXPLORATION

The area was first prospected for silver in the late 1800's. A lead-zinc-silver prospect, the Detroit-Algoma Mine; was discovered in 1871 about 400 m on strike to the northeast of the property. Mineralization there consists of galena and sphalerite in amethystine quartz veins. A shaft was sunk and mill installed in 1910 where development ceased in 1914. That deposit is presently being mined for amethyst on surface by Mr. Clark Noyes. A staking rush for uranium occurred in the area in 1977 upon release of a Federal-Provincial reconnaissance geochemistry survey. Most of the north half of McTavish Township was staked by Saarberg Interplan Corp.



Property Location

Legend



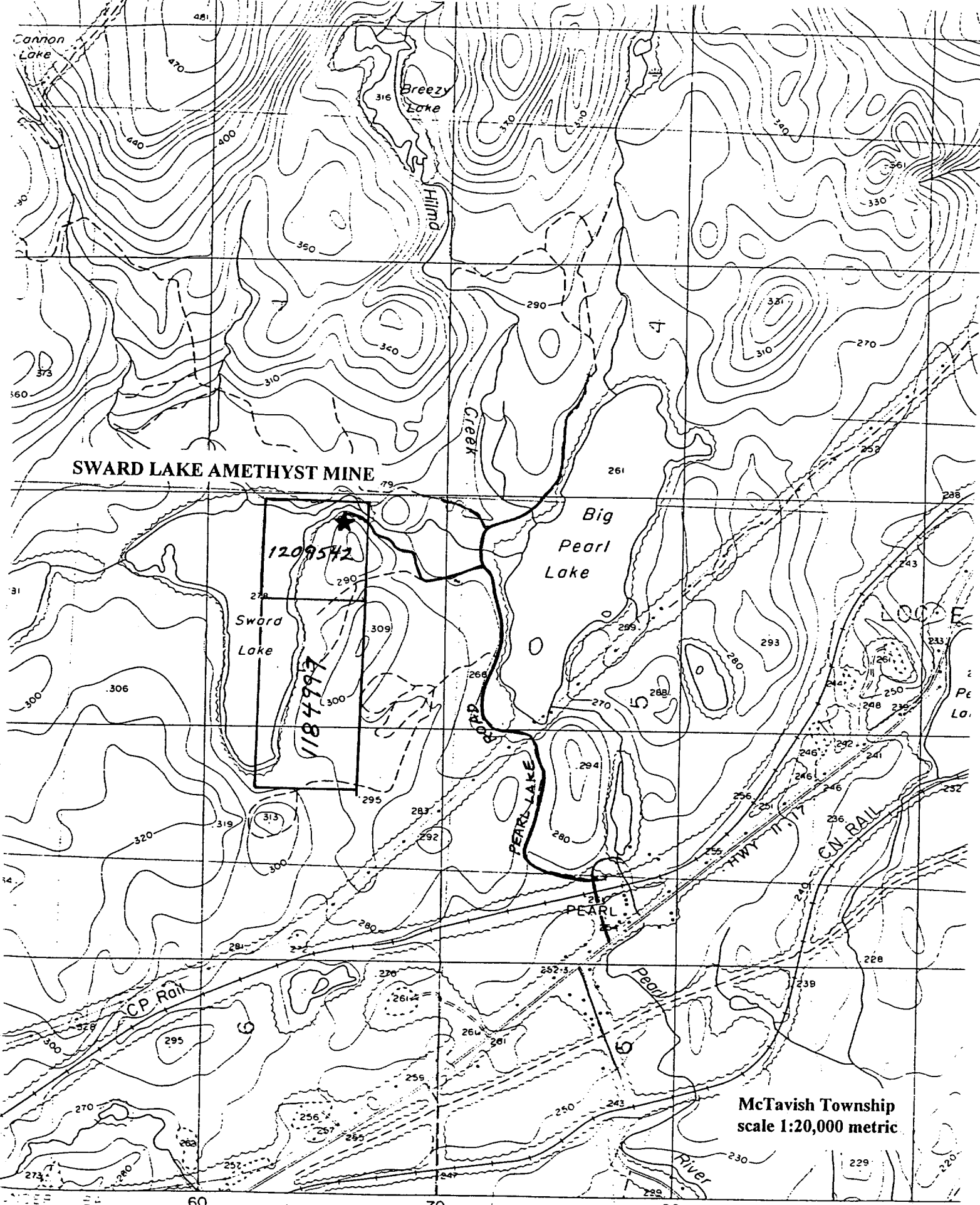
-  Diabase
-  Sibley Group
-  Anmikle Group
-  Metavolcanic Rocks
-  Granitic Rocks
- * Amethyst Occurrence

Figure 1



SWARD LAKE AMETHYST MINE

1209542

1184997

**McTavish Township
scale 1:20,000 metric**

60 70 80 90
88°40'

and subsequently came open in 1983. Since that time interest in the area has been mainly for amethyst.

The main vein on the property is located near the outflow of Sward Lake and was first uncovered when that area was dammed and a flume built to supply water to the rail stop at Pearl in the late 1800's. The vein was mined for amethyst by the late Mr. Gunnard Noyes who sunk three pits on the vein between 1967 and 1970. The late Jim Barrett connected two of these pits with further mining from the 1970's to the 1980's. The property has remained idle since then and came open in 1994 which was staked by the author in 1995.

Mr. Mark O'Brien, Geologist, with the Ministry of Northern Development and Mines conducted a property visit at the mine in 1997 and filed report MDI # TB0881 on the deposit in their Mineral Deposit File at Thunder Bay.

GENERAL GEOLOGY

Tanton (1931) published Map 214A and described the veins and prospects in the area which experienced a minor exploration resurgence at that time. The township was most recently mapped by McIlwaine (1971) at a scale of 1 inch to 1/4 mile. It was released as an uncoloured preliminary map. McIlwaine mapped Archean-aged basement rocks of migmatitic metasediments and four phases of granitoids. These basement rocks are unconformably overlain by Sibley Group sedimentary rocks consisting of near flat-lying conglomerates, sandstones and limestones. These were deposited in a shallow sea in Proterozoic times. All of the rocks were then intruded by dikes and sheets of diabase.

The north half of McTavish Township contains numerous normal faults derived from basinal downwarping of the Sibley sedimentary rocks. Thus, the faults often define granite/sedimentary rock contacts and strike at 060 to 090. The faults are variably occupied by amethystine quartz veins containing minor amounts of galena, sphalerite and chalcopyrite. The exposed unconformity between the granites and the Sibley sediments in this area is the reason it is an amethyst district.

PROPERTY GEOLOGY

The dominant rock type within the property is coarse-grained to medium-grained granite containing 1 to 2% black biotite, 2 to 4% clear quartz phenocrysts and 94% red and white feldspars. There is a set of tight, widely spaced joints, relatively vertical, at 030° and 140° respectively. The granite also contains a minor amount of migmatized biotitic metasediments and are Archean in age. A minor amount of red Sibley sandstone is found along the banks of Pearl Creek.

PROSPECTING

The mineralization at the mine site was previously mapped into a local grid by 100 metre tape and Silva compass for base line control. Elevations were estimated by an H.I. stick. The detailed map at 1:250 was filed for assessment work in 1999. Locations were verified by GPS from a property visit by Mark O'Brien, MNDM geologist. A report by him was filed with Mineral Deposits Section, Thunder Bay Assessment Office, Ministry of Northern Development and Mines.

Prospecting was done south of the mine in 2000 and 2001 in order to test for similar parallel faults that may contain amethystine quartz vein and veinlet zones. All outcrop mapped is within the granite except for just north of the line post on the east boundary of TB.1184997, where sandstone felsenmeer (frost-heaved slabs) containing amethyst was seen. This area is on the south-east side down-slope from a prominent granite ridge which probably forms a fault graben contact with Sibley Group sandstone. As the felsenmeer contains amethyst veinlets, this entire contact is prospective for an amethyst deposit.

CONCLUSIONS AND RECOMMENDATIONS

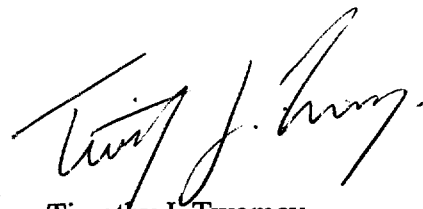
The vein system that hosts the amethyst mine is located within a regional fault structure. Other parallel fault structures likely occur south of the mine within claim TB.1184997. The most likely area to test is just north of the line post on the east boundary of TB.1184997, where sandstone felsenmeer (frost-heaved slabs) with amethyst indicate a local and shallow source. Therefore, detailed prospecting is recommended in order to define the likeliest part for stripping. An overgrown logging road from the early 1980's originates from the Pearl Lake Mine access road and is an ideal access for a backhoe or bulldozer.

CERTIFICATE OF QUALIFICATIONS

I, Timothy J. Twomey, of Box 88, Balmertown, Ontario, P0V 1C0, do hereby certify as follows concerning my Prospecting Report on Landholdings of the Sward Lake Amethyst Mine, dated October 15, 2001:

1. I am a 1983 graduate of Lakehead University, Thunder Bay, Ontario, holding a Bachelor of Science (Honours) degree in Geology.
2. Breezy Mountain Amethyst Mines Ltd., of which I am sole owner, has transferred 100% interest in the Sward Lake Amethyst Mine to Mr. Robert M. Boyd of Macomb, Michigan, USA.
3. This report is based on my own work on the property as well as literature review of Assessment Files, Resident Geologists Office, MNDM, Thunder Bay.

October 15, 2001
Balmertown, Ontario



Timothy J. Twomey
B.Sc (Hons) Geology

REFERENCES

Assessment Files, Resident Geologists Office, MNDM, Thunder Bay, Ontario.

McIlwaine, W.H.

1971: McTavish Township (North Half), District of Thunder Bay; Ontario Dept. of Mines and Northern Affairs, Prelim. Geol. Ser. Map P.720, scale 1 inch to 1/4 mile.

Tanton, T.L.

1931: Fort William and Port Arthur, and Thunder Cape Map Areas, Thunder Bay District, Ontario; Canada Department of Mines, Memoir 167.

Ministry of
Northern Development
and Mines

Ministère du
Développement du Nord
et des Mines



GEOSCIENCE ASSESSMENT OFFICE
933 RAMSEY LAKE ROAD, 6th FLOOR
SUDBURY, ONTARIO
P3E 6B5

Date: 2002-JAN-14

ROBERT MARCY BOYD
17493 TOWER ST.
MACOMB, MICHIGAN
48044 UNITED STATES

Tel: (888) 415-9845
Fax: (877) 670-1555

Submission Number: 2.22428
Transaction Number(s): W0140.31092

Dear Sir or Madam

Subject: Approval of Assessment Work

We have approved your Assessment Work Submission with the above noted Transaction Number(s). The attached Work Report Summary indicates the results of the approval.

At the discretion of the Ministry, the assessment work performed on the mining lands noted in this work report may be subject to inspection and/or investigation at any time.

If you have any question regarding this correspondence, please contact LUCILLE JEROME by email at lucille.jerome@ndm.gov.on.ca or by phone at (705) 670-5858.

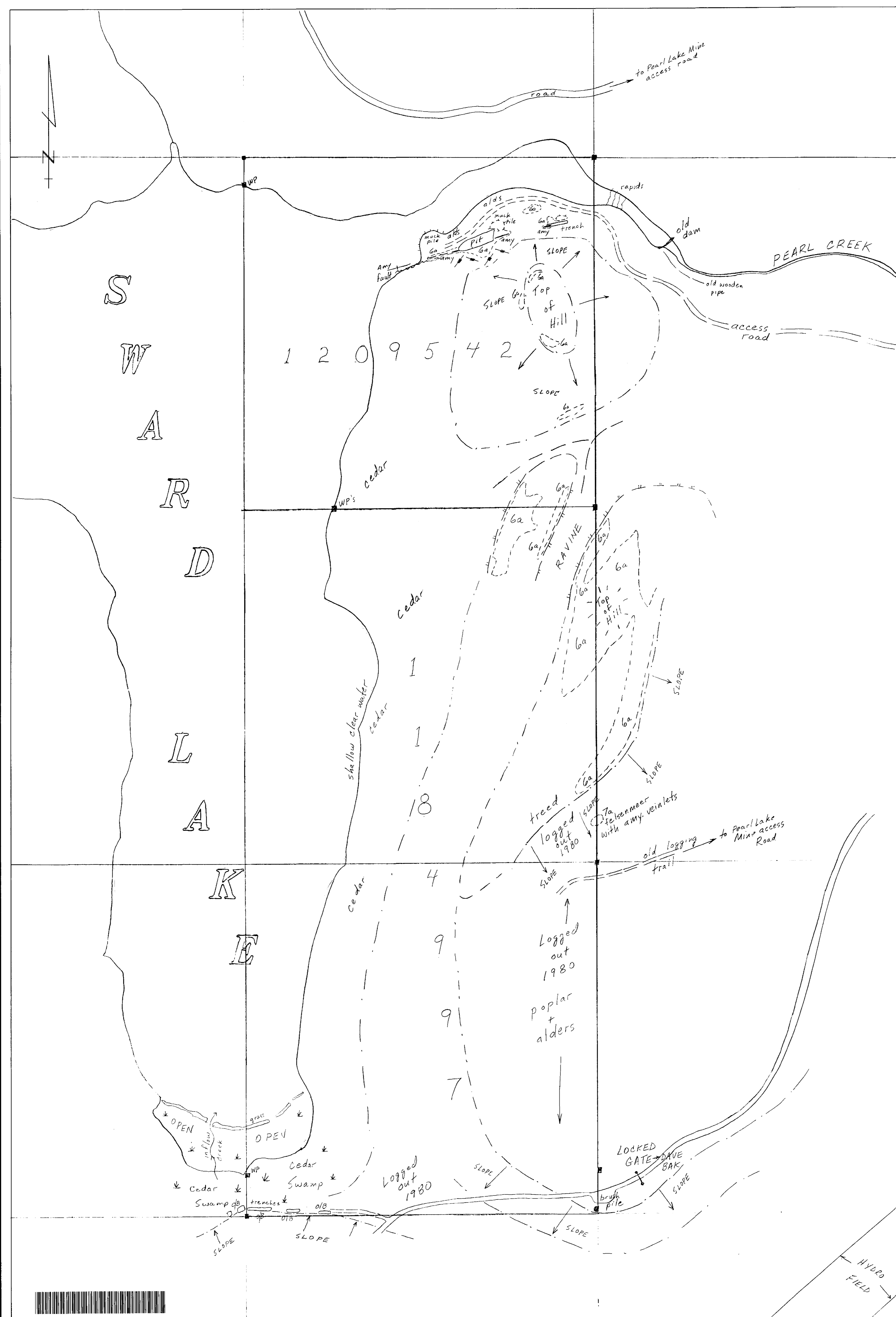
Yours Sincerely,

A handwritten signature in black ink, appearing to read "Ron Gashinski".

Ron Gashinski
Senior Manager, Mining Lands Section

Cc: Resident Geologist
Robert Marcy Boyd
(Claim Holder)

Assessment File Library
Robert Marcy Boyd
(Assessment Office)



LEGEND

- PROTEROZOIC**
- 7 SIBLEY GROUP SEDIMENTARY ROCKS**
7a sandstone
 - ARCHEAN**
 - 8 GRANODIORITIC TO GRANITIC ROCKS**
8a Undeformed and deformed granitoid
8b Quartz-feldspar porphyry dike
8c Feldspar porphyry dike
 - 5 TONALITIC TO GRANODIORITIC ROCKS**
5a Massive to foliated, biotite bearing
 - 4 MAFIC TO ULTRAMAFIC ROCKS**
4a Gabbro
4b Serpentinite, hornblende
 - 3 METASEDIMENTARY ROCKS**
3a Biotite-quartz-feldspar schist
3b Oxide iron formation
 - 2 INTERMEDIATE TO FELSIC METAVOLCANIC ROCKS**
2a Quartz-eye tuff
2b Sericite schist
2c Tuff, fragmental
 - 1 MAFIC TO INTERMEDIATE METAVOLCANIC ROCKS**
1a Massive, fine-grained
1b Massive, medium to coarse-grained
1c Pillow lava
1d Chlorite schist

- SYMBOLS**
- Geological contact (observed, interpreted)
 - Foliation (inclined)
 - Joint (inclined, vertical)
 - Shear
 - Z-fold with plunge
 - Outcrop
 - Small outcrop
 - Boulder

SYMBOLS

- Ledge, cliff
- Swamp
- Drainage direction
- Lineament
- Claim post

ABBREVIATIONS

- | | |
|------|----------------|
| sil | silicification |
| py | pyritic |
| gnt | garnets |
| mag | magnetic |
| ep | epidote |
| carb | iron carbonate |

TREE TYPES

- | | |
|-----|----------|
| po | poplar |
| ba | balsam |
| jp | jackpine |
| ced | cedar |
| ald | alders |
| br | birch |
| sp | spruce |

SCALE: 1 : 2000



SWARD LAKE AMETHYST MINE
McTAVISH TOWNSHIP, ONTARIO

GEOLOGY SURVEY

NTS 52 A/10

DATE: MARCH 2001 SCALE: 1 : 2000
DRAWN BY: TJT

