



42A015E0030 2.3222 TECK

010

Assessment Report

Spectrometer Radiometric Survey

Group 11 Dymont-Kidston Claims

Teck Township, Larder Lake Mining Division

RECEIVED

FEB 14 1980

MINING LANDS SECTION

Tarzwil, Ontario

L. M. Dymont

January 25, 1979

SUMMARY

During the summer of 1979 a program of general prospecting was carried out. A spectrometer was carried to check areas of known contact between greenstone and syenite. A distinct variation was noted and a grid was cut over the claim group and a radiometric survey was run in the hope aiding the prospector in a later program of mapping the property geologically.

INTRODUCTION

The claim group was staked in Dec. 1977. During the summer of 1978, general prospecting and sampling was done, also during this period flag and compass lines were put in. A VLF-EM survey and Magnetometer survey was done and can be found in the Assessment files. Further prospecting and sampling was done in 1979 and a proper grid was cut.

LOCATION AND ACCESS

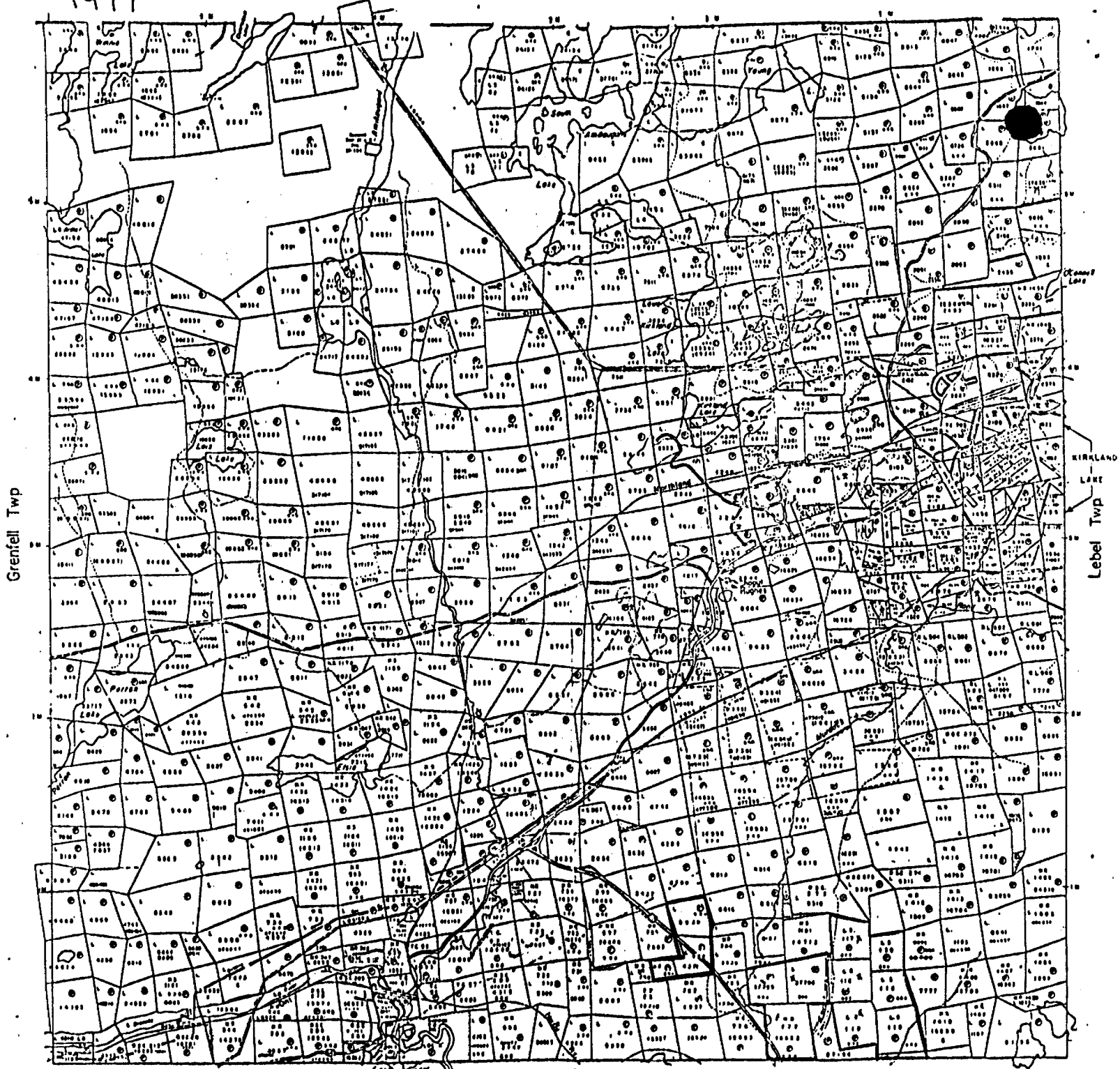
The claim group is located near the southeast corner of Teck twp. (NTS 42 A/1), approximately 2 miles due south of Kirkland Lake. Access to the group is excellent as Hwy. 112 passes through the group.

PREVIOUS WORK

A search of the Kirkland Lake District Geologists files failed to locate any work filed on these claims.

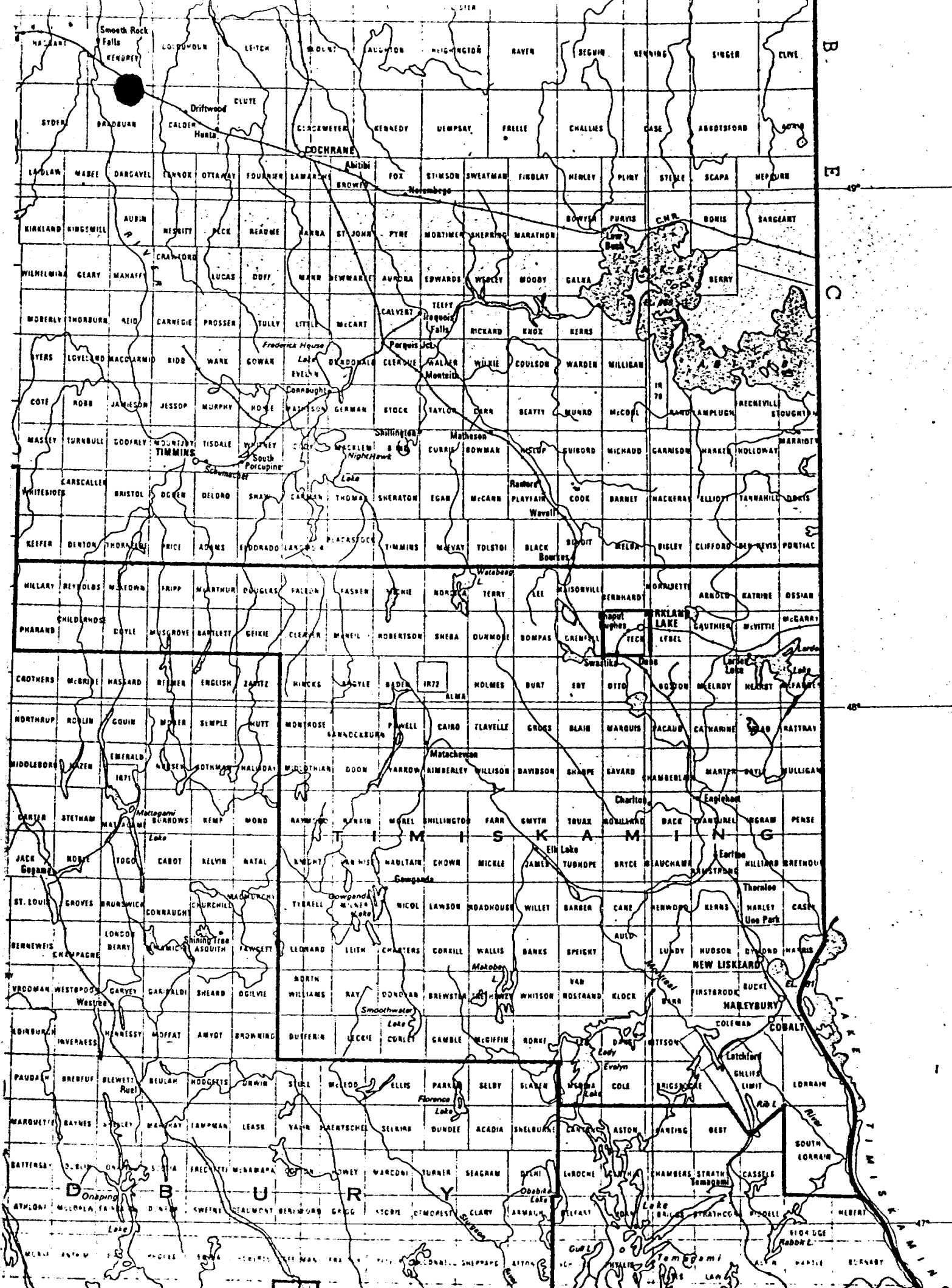
HECK TP. 1" = 40 CHAINS (1/2 MI)
1977

Bernhardt Twp.



Ollio Twp.

Group #1



Smooth Rock Falls

COCHRANE

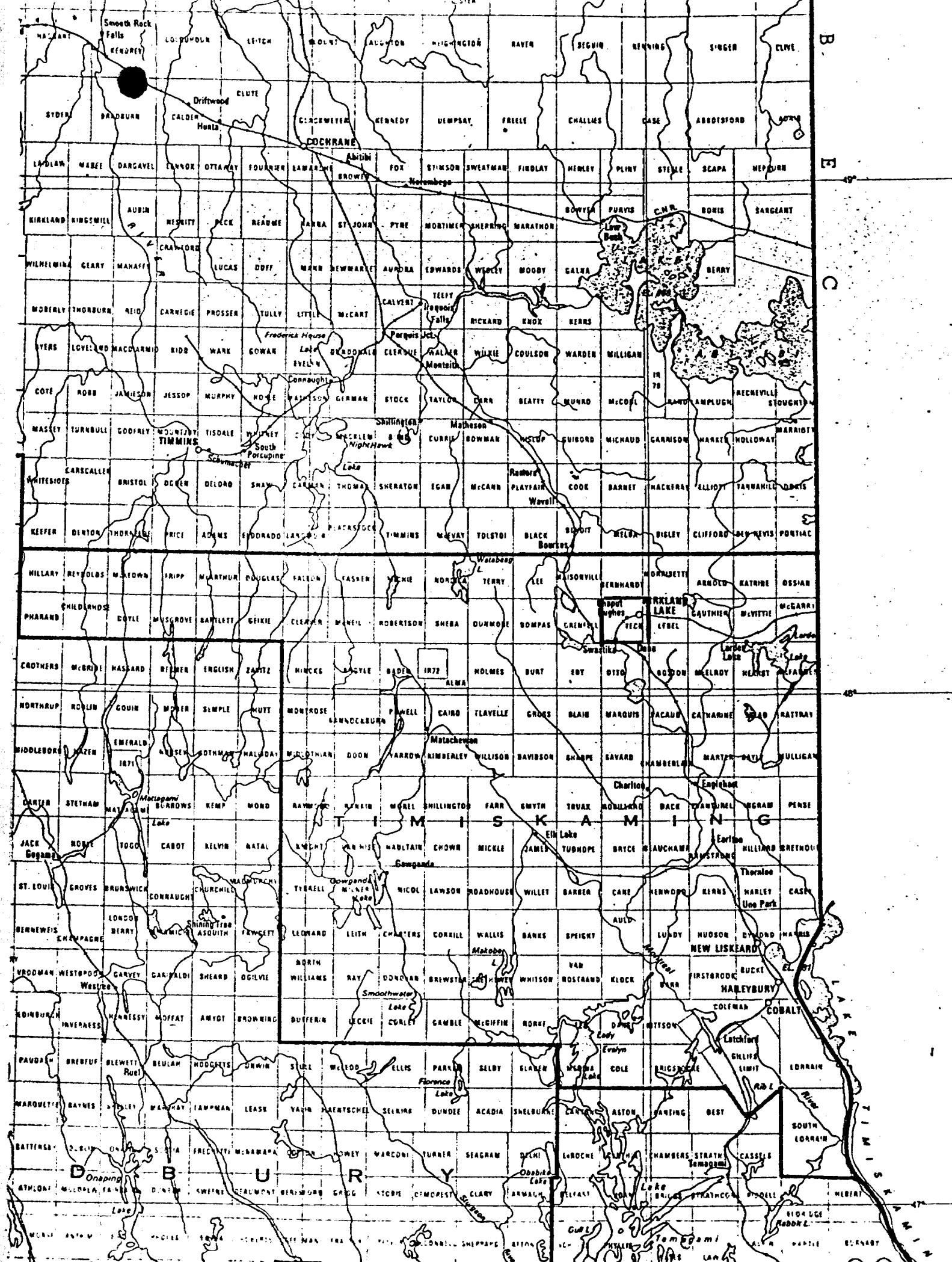
ARKLAK L. LAKE

TIMISKAMING

NEW LISKEARD

HALEYBURY

COBALT



Smooth Rock Falls

COCHRANE

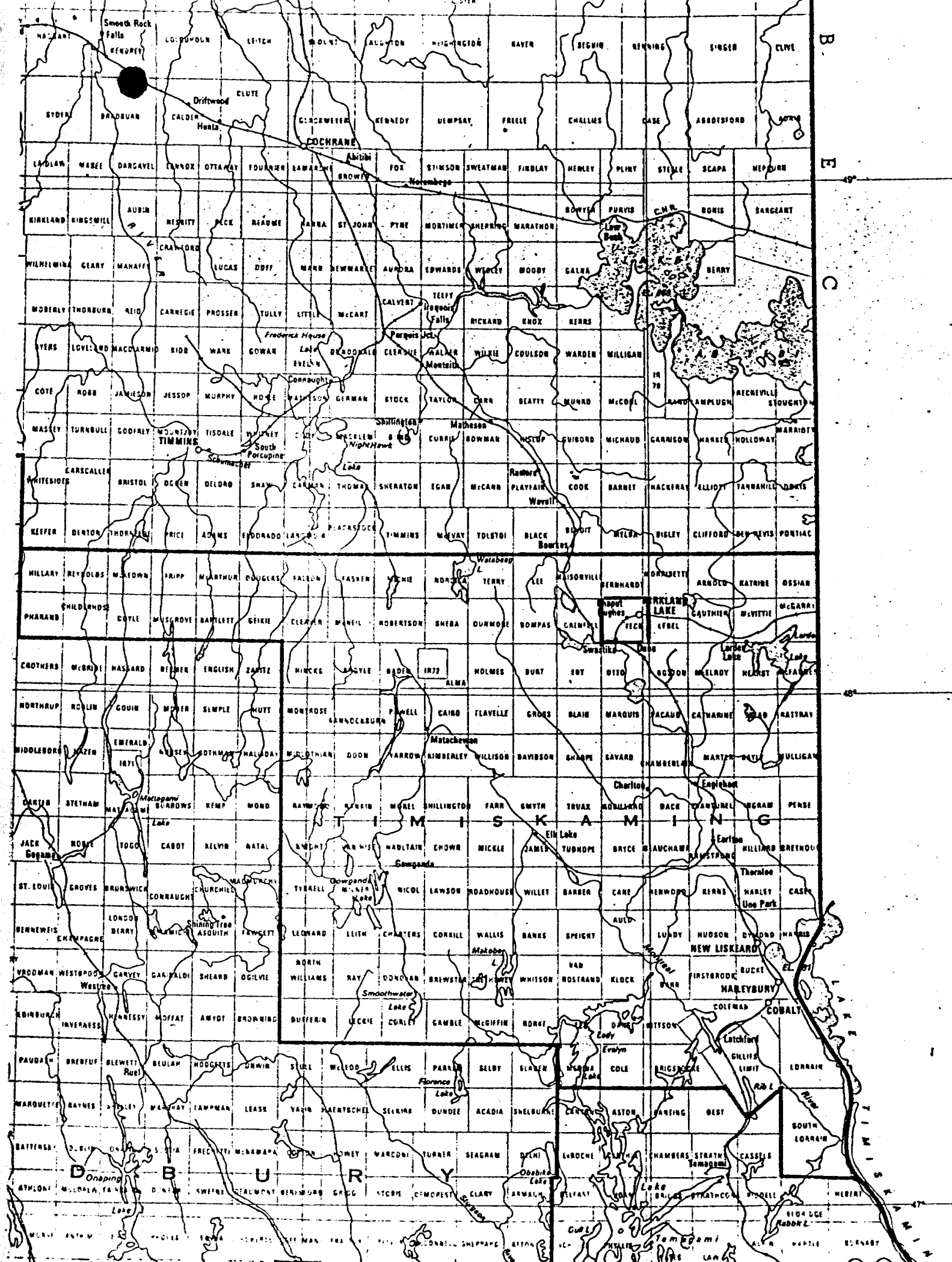
ARKLAK L. LAKE

TIMISKAMING

NEW LISKEARD

HALEYBURY

COBALT



Smooth Rock Falls

COCHRANE

ARKLAK L. LAKE

TIMISKAMING

NEW LISKEARD

HALEYBURY

COBALT

SURVEY METHOD

A grid was cut and chained. A McPhar TV-1A spectrometer was used and was left continuously running while only the 100 foot stations were noted. Topographical features and geological features were noted for future mapping reference.

SURVEY RESULTS

As was expected the syenite and greenstone showed up as contourable entities. Although a distinct contact was not obtained as hoped. The syenites showed up in the 10 to 25 counts per second range and the greenstone as 10 or less counts per second.

During general prospecting prior to the survey, a contact between syenite and greenstone just ^{EAST} of the property at 50 feet east of station 3 south on line 23 east was found to read 125 counts per second.

CONCLUSION AND RECOMMENDATIONS

The Radiometric survey served its purpose by aiding the prospector in the future program of detailed mapping of the property. It also pinpointed areas of interest for general prospecting in the upcoming field season



42A01SE0030 2.3222 TECK

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Assessment Report

Radem VLF-EM Survey

Group 1 Dymont-Kidston Claims

Teck township

Larder Lake Mining Division

RECEIVED

FEB 14 1980

MINING LANDS SECTION

Jomi Minerals & Expediting Ltd.

Tarzwell, Ontario

Nov. 23, 1979

Report by

L. Mike Dymont

SUMMARY

In the month of June, 1979, a Radem VLF-EM survey was carried out over a group of 3 claims (495720, 495721, 495722), held in Teck Twp., Larder Lake Mining Division herein referred to as the Dymont-Kidston claims.

INTRODUCTION

The claim group was staked in December, 1977. During the summer of 1978, general prospecting and sampling was done and some reconnaissance lines were run with a VLF-EM. A program of linecutting was carried out and a Proton Magnetometer survey was done and compiled and can be found in the ODM assessment files. (f.2.2903).

LOCATION AND ACCESS

The claim group is located near the southeast corner of Teck township (NTS 42 A/1) approximately 2 miles south of Kirkland Lake on Highway 112. Access to the claim group is excellent, as the southwestern corner of the group is at the junction of Highway 112 and Murdock Creek.

PREVIOUS WORK

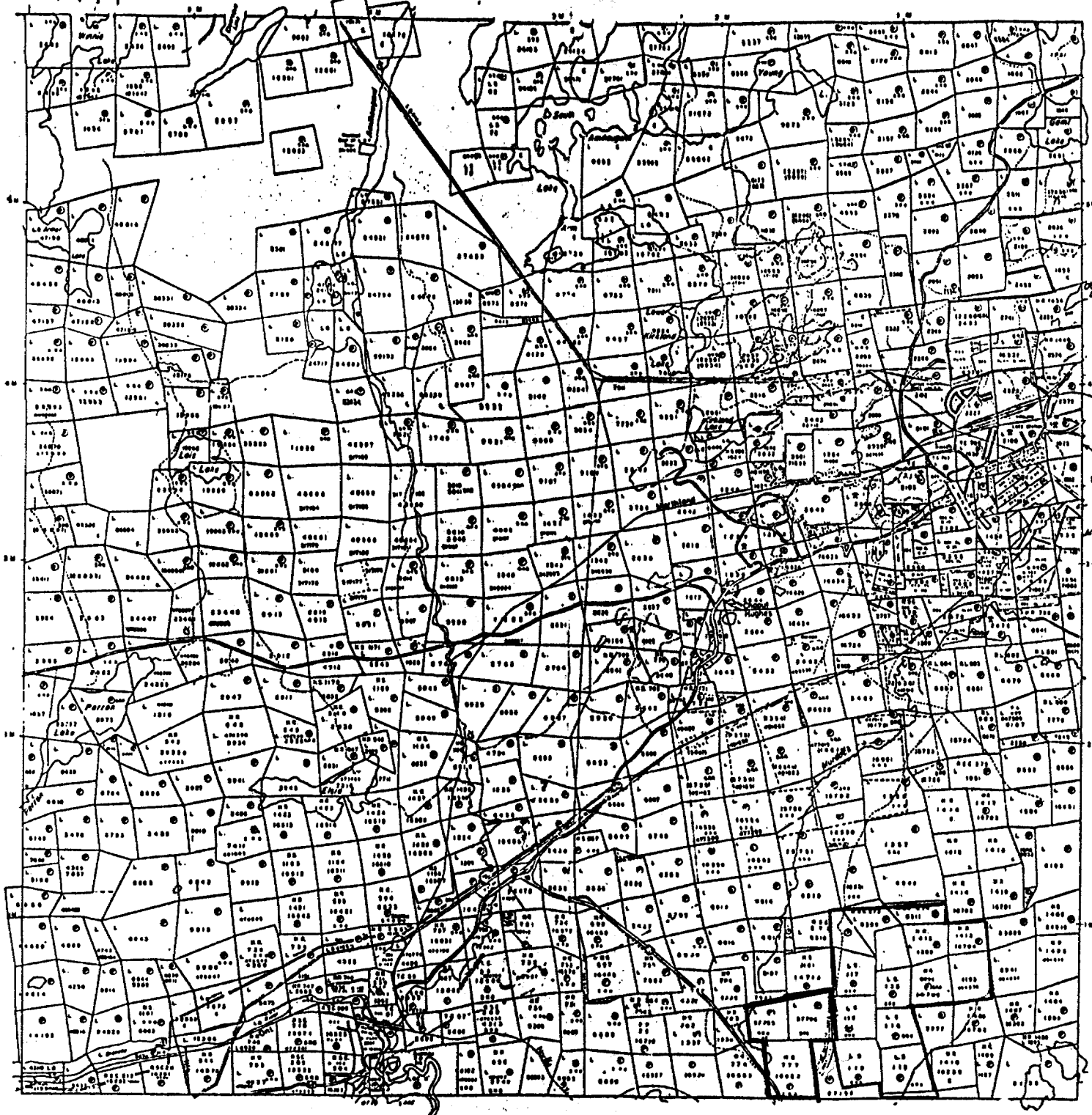
A search of the Kirkland Lake District Geologist's assessment files failed to locate any work filed on these claims. Personal communication with a relative of a former holder gave interesting facts but only hearsay.

1977

Bernhardt Twp.

DYMENT-KIDSTON Prop.
Group 1
Teck twp.

Grenfell Twp.



Otto Twp.

SC/

KIRKLAND
LAKE
Lebel Twp.

SURVEY METHOD

(a) Dip Angle of Resultant field- This is the angle of inclination, measured from the horizontal in degrees, of the direction of the resultant VLF field. The VLF field is normally horizontal (0 dip). The dip angle measurement is independent of the strength of the field and the gain setting of the Radem receiver. When plotted on a profile the dip angles usually form a crossover pattern above the conductor as with the standard vertical Loop EM method. To measure the dip angle the Radem is held with the instrument face horizontal and rotated until a null is obtained. This aligns the Radem with the direction of the VLF field. The Radem is then held vertically and tilted from right to left until another null is obtained. The instrument is held steady in this position and the dip angle read from the inclinometer.

(b) Horizontal Component of the Field Strength- This is simply the strength of the field in the horizontal plane. It is the maximum reading obtained from the Field Strength meter when the instrument is rotated in the horizontal plane. The field strength of VLF stations drifts with time. A base station should be established in a normal area and the Radem adjusted to a Horizontal Field Strength of "100" on the "0 - 300" scale by means of the volume control pct. This base station should be read every one to two hours as in a magnetic survey.

SURVEY RESULTS

EM crossovers were noted on the profile map. These anomalies have been designated A, B, C, D, E. A separate map for field strength was contoured and correlated well with the EM crossovers. Shearing is the suspected cause of D and E. Further prospecting and trenching will be required, along with detailed geological mapping to arrive at an opinion of the cause of A, B, C.

CONCLUSION & RECOMMENDATION

The VLF-EM survey has fulfilled its requirement, in further aiding the Prospector in pinning down overburden covered areas of interest on his property. A more conventional EM instrument used on this property in the future, would certainly be of assistance. The next stage of the program for the prospector will be detailed geological mapping, stripping and trenching in the upcoming field season.



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.

FEB 14 1980

MINING LANDS SECTION

Type of Survey(s) RADIOMETRIC

Township or Area TECK

Claim Holder(s) L.M. DYMENT

Survey Company JOMI MINERALS & EXPEDITING LTD.

Author of Report L.M. DYMENT

Address of Author RR #1 TARZWELL, ONT.

Covering Dates of Survey LINECUTTING JULY 9-16 1979
SURVEY NOV 1-2 1979
(linecutting to office)

Total Miles of Line Cut 2.7 (note small claim)

MINING CLAIMS TRAVERSED
List numerically

(prefix)	(number)
L	495737
L	495738
L	495739

<u>SPECIAL PROVISIONS</u> <u>CREDITS REQUESTED</u>	DAYS per claim
Geophysical	
-Electromagnetic	
-Magnetometer	
-Radiometric	<u>40</u>
-Other	
Geological	
Geochemical	

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

ENTER 20 days for each additional survey using same grid.

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

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

DATE: JAN 25/1979 SIGNATURE: [Signature]
Author of Report or Agent

Res. Geol. _____ Qualifications 2.2903

Previous Surveys

File No.	Type	Date	Claim Holder

TOTAL CLAIMS _____

If space insufficient, attach list

OFFICE USE ONLY

GEOPHYSICAL TECHNICAL DATA

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

Number of Stations 158 Number of Readings 158
Station interval 100 Line spacing 400
Profile scale
Contour interval 2 Counts Per Second

MAGNETIC

Instrument TV-1A McPHAR
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

SELF POTENTIAL

Instrument _____ Range _____

Survey Method _____

Corrections made _____

RADIOMETRIC

Instrument M⁴PHAR TV-1A

Values measured Counts Per. Second.

Energy windows (levels) 100, 1000, 10,000, 100,000

Height of instrument 3 feet Background Count 10 C.P.S.

Size of detector 43 Cu. Centimetres

Overburden minimal See Teck 1945-1
(type, depth - include outcrop map)

OTHERS (SEISMIC, DRILL WELL LOGGING ETC.)

Type of survey _____

Instrument _____

Accuracy _____

Parameters measured _____

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 _____



Ministry of Natural Resources

File _____

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.

Type of Survey(s) ELECTROMAGNETIC
Township or Area Teck
Claim Holder(s) L. M. Dymant
Survey Company Jomi Minerals & Expediting Ltd.
Author of Report L. M. Dymant
Address of Author RR #1 Tarzwell, Ont. POK 1V0
Covering Dates of Survey June 6-7 1979
Total Miles of Line Cut 3.5

MINING CLAIMS TRAVERSED
List numerically
Table with columns for prefix and number. Contains entries: L 495720, L 495721, L 495722. TOTAL CLAIMS 3

SPECIAL PROVISIONS
CREDITS REQUESTED
Table with columns: Geophysical, Geological, Geochemical. Rows: Electromagnetic (20), Magnetometer, Radiometric, Other, Geological, Geochemical.

AIRBORNE CREDITS (Special provision credits do not apply to airborne surveys)
Magnetometer _____ Electromagnetic _____ Radiometric _____
DATE: Nov. 23/1979 SIGNATURE: [Signature]
Author of Report or Agent

Res. Geol. L.D. Qualifications 2.29034 on this File
Previous Surveys
File No. Type Date Claim Holder

Table with 4 columns: File No., Type, Date, Claim Holder. Multiple empty rows for data entry.

OFFICE USE ONLY

If space insufficient, attach list

GEOPHYSICAL TECHNICAL DATA

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

Number of Stations 163 Number of Readings 163
Station interval 100' Line spacing 400'
Profile scale 1" - 20
Contour interval 25%

MAGNETIC

Instrument
Accuracy - Scale constant
Diurnal correction method
Base Station check-in interval (hours)
Base Station location and value

ELECTROMAGNETIC

Instrument Crone Radem VLF
Coil configuration Vertical
Coil separation Infinite
Accuracy
Method: [x] Fixed transmitter [] Shoot back [] In line [] Parallel line
Frequency Annapolis, Maryland 21.4 KHz (specify V.L.F. station)
Parameters measured Tilt angles; Field Strength (total or horizontal)

GRAVITY

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

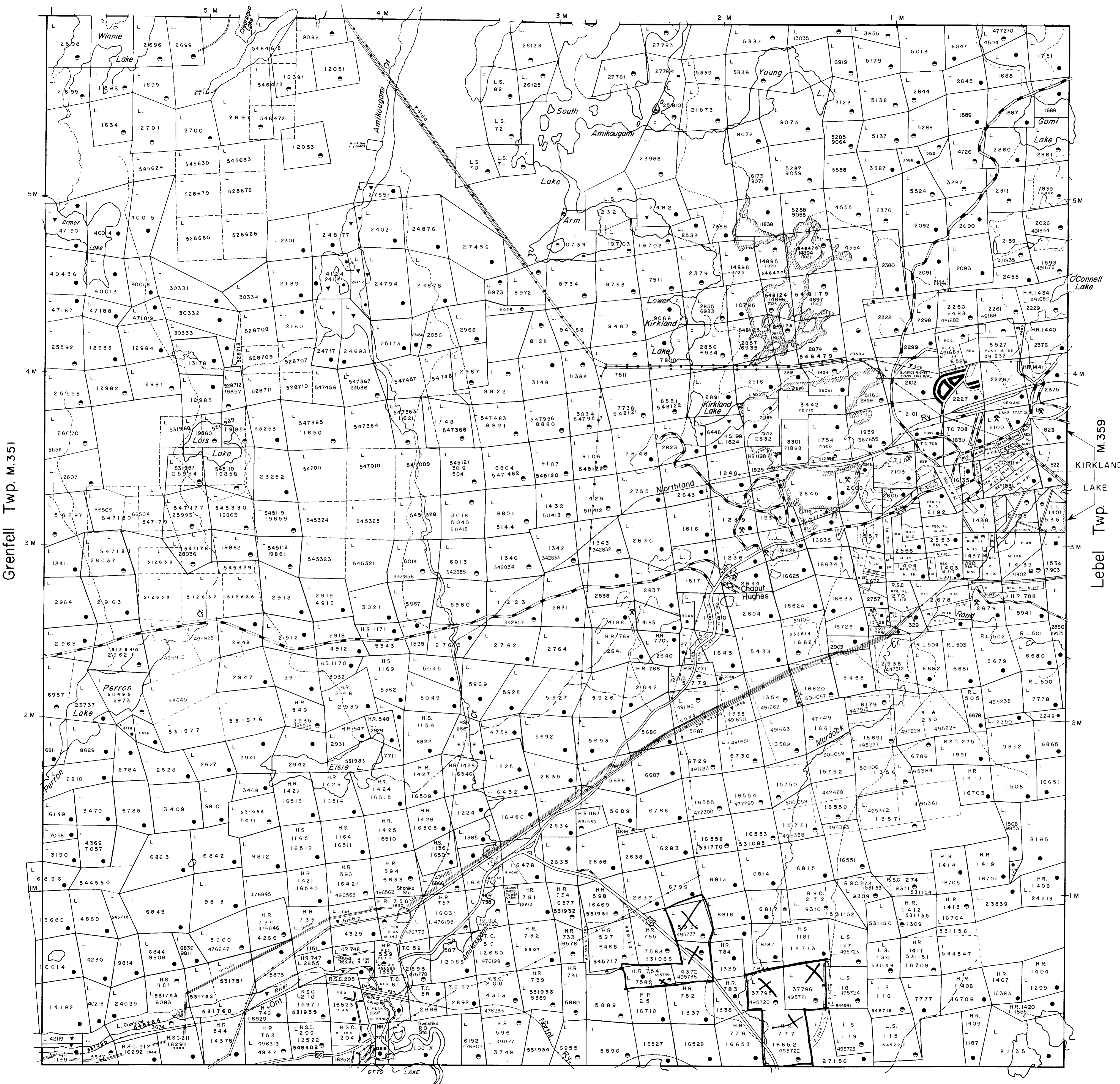
INDUCED POLARIZATION

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

Bernhardt Twp. M.327

THE TOWNSHIP
2.3222 OF
TECK
DISTRICT OF
TIMISKAMING
LARDER LAKE
MINING DIVISION
SCALE: 1-INCH = 20 CHAINS



DISPOSITION OF CROWN LANDS

PATENT, SURFACE AND MINING RIGHTS	●
" SURFACE RIGHTS ONLY	○
" MINING RIGHTS ONLY	○
LEASE, SURFACE AND MINING RIGHTS	■
" SURFACE RIGHTS ONLY	■
" MINING RIGHTS ONLY	■
LICENCE OF OCCUPATION	▼
ROADS	—
IMPROVED ROADS	—
KING'S HIGHWAYS	—
RAILWAYS	—
POWER LINES	—
MARSH OR MUSKEG	—
MINES	—
CANCELLED	—

NOTES

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

Areas shown thus for slime disposal.

Mining claim L.5779 - Mining Rights subject to Sec 36 of the Mining Act (R.S.O. 1950)

DATE OF ISSUE
FEB 15 1980
SURVEYS AND MAPPING
BRANCH

Grenfell Twp. M.351

M.359
KIRKLAND LAKE
Lebel Twp.

Otto Twp. M.379

PLAN NO.-M. 392
ONTARIO
MINISTRY OF NATURAL RESOURCES
SURVEYS AND MAPPING BRANCH






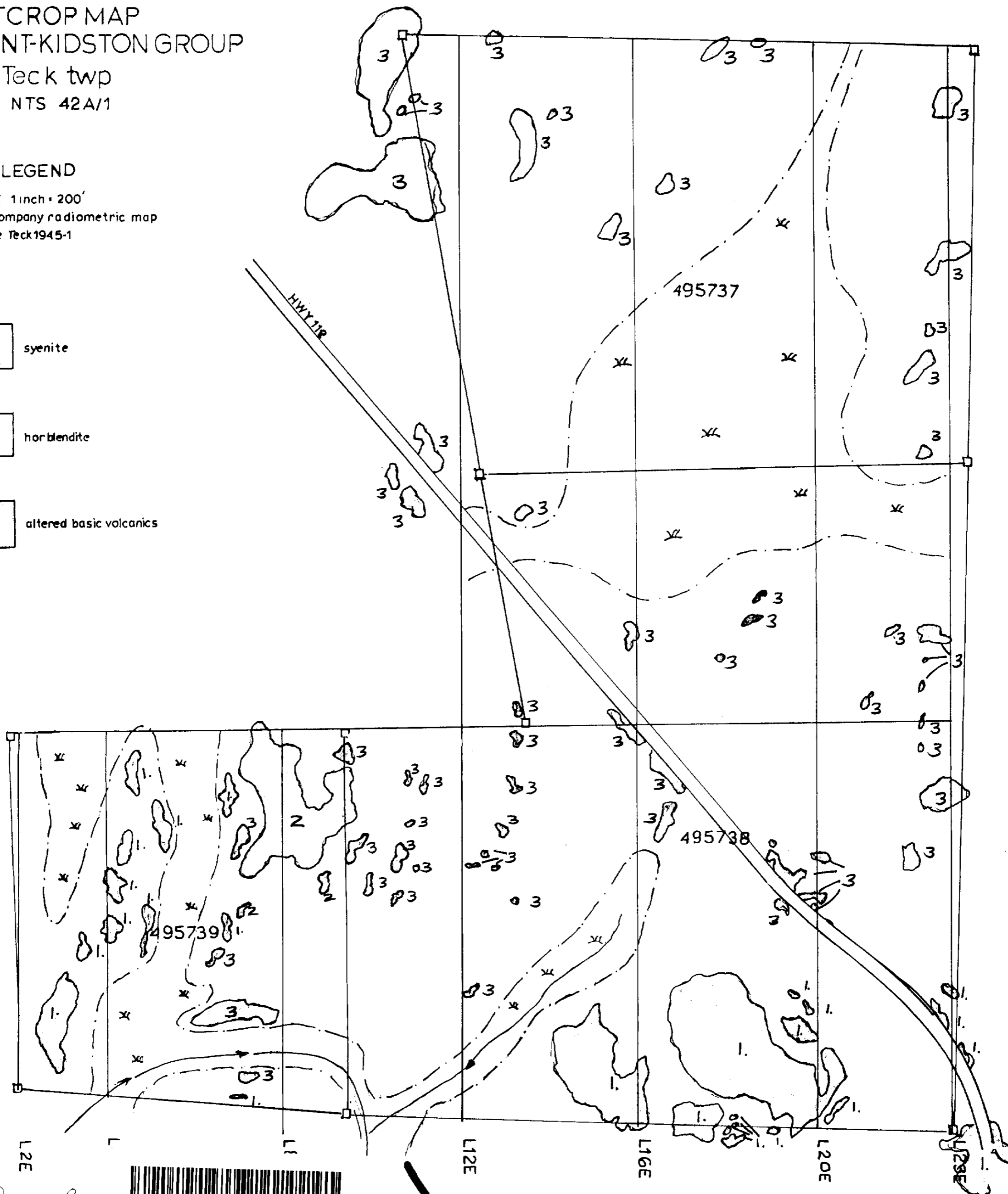
OUTCROP MAP
DYMENT-KIDSTON GROUP

Teck twp
NTS 42A/1

LEGEND

SCALE 1 inch = 200'
To accompany radiometric map
Source Teck1945-1

- 3  syenite
- 2  hornblende
- 1.  altered basic volcanics



RADIOMETRIC SURVEY
 DYMMENT-KIDSTON GROUP
 Teck twp.
 LARDER LAKE MINING DIV
 NTS 42A/1

LEGEND
 SCALE: 1 inch = 200'
 INSTRUMENT: McPhar TV-1A Spectrometer
 READING: total counts per minute

[Handwritten Signature]

survey pin

Patent
 HR 754

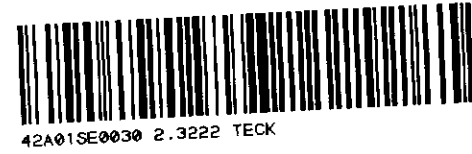
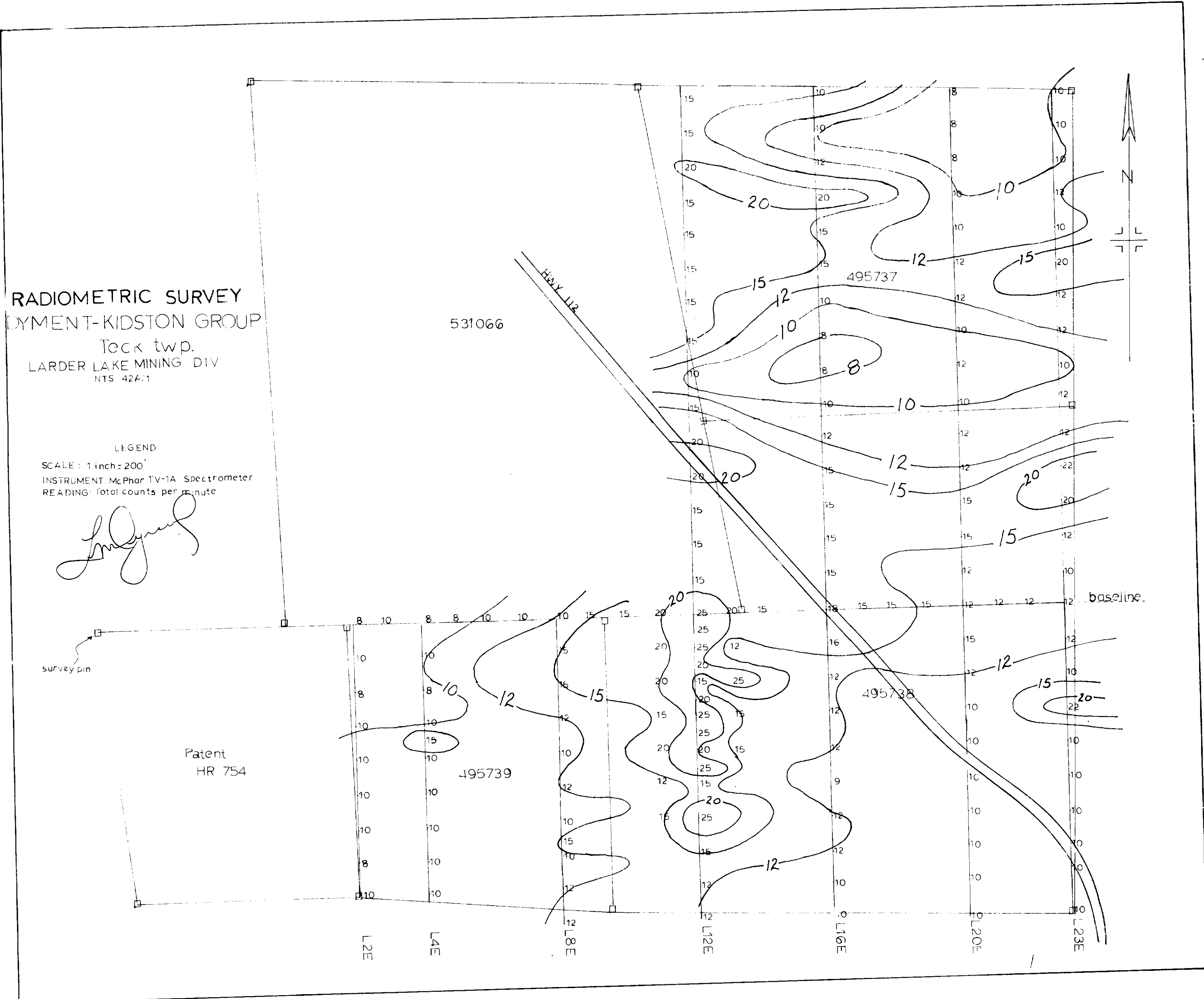
531066

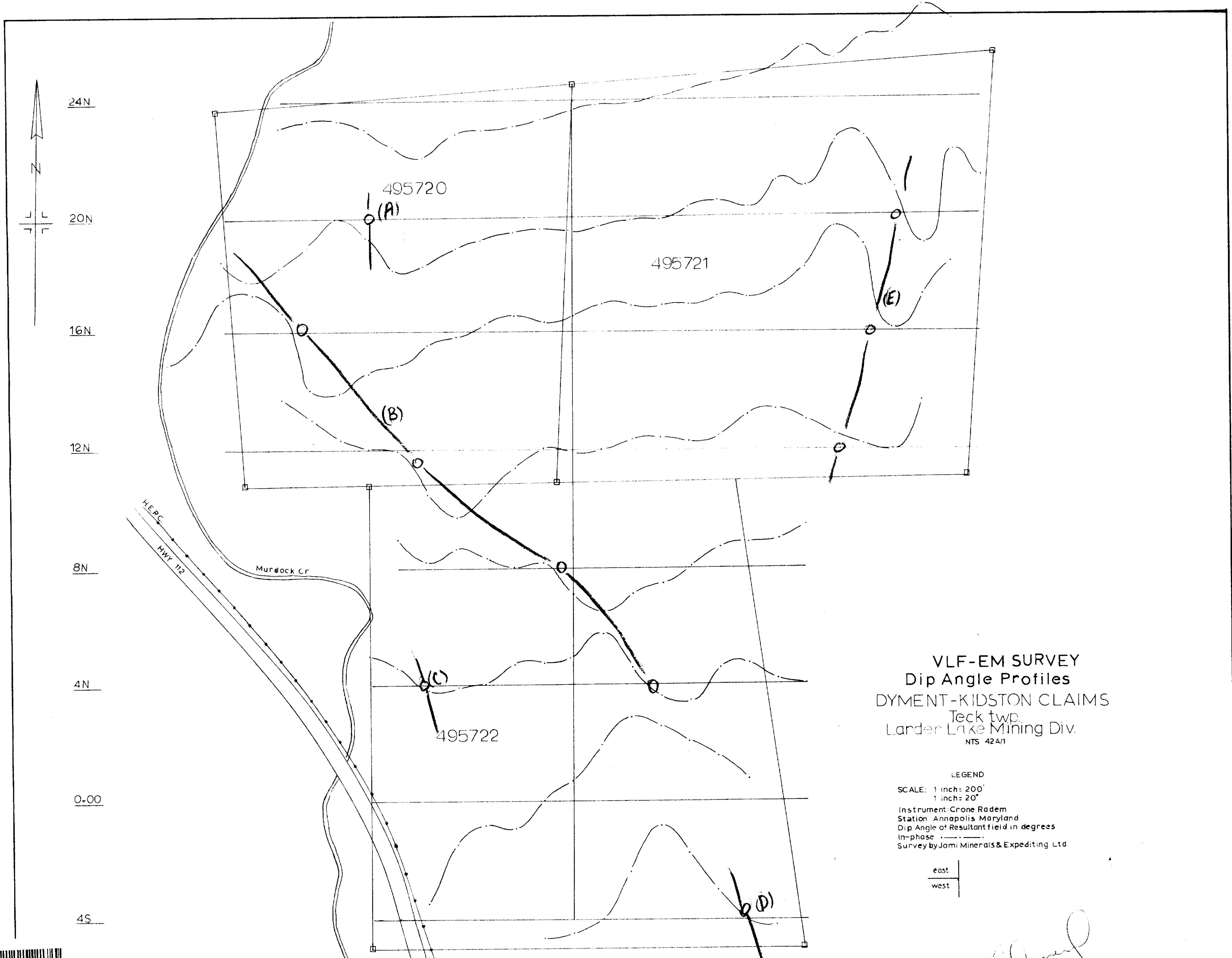
495739

495737

495738

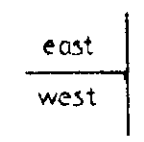
baseline



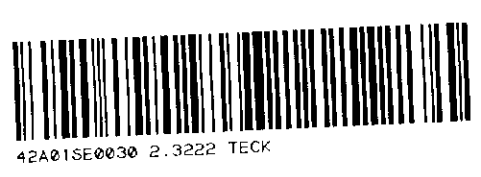


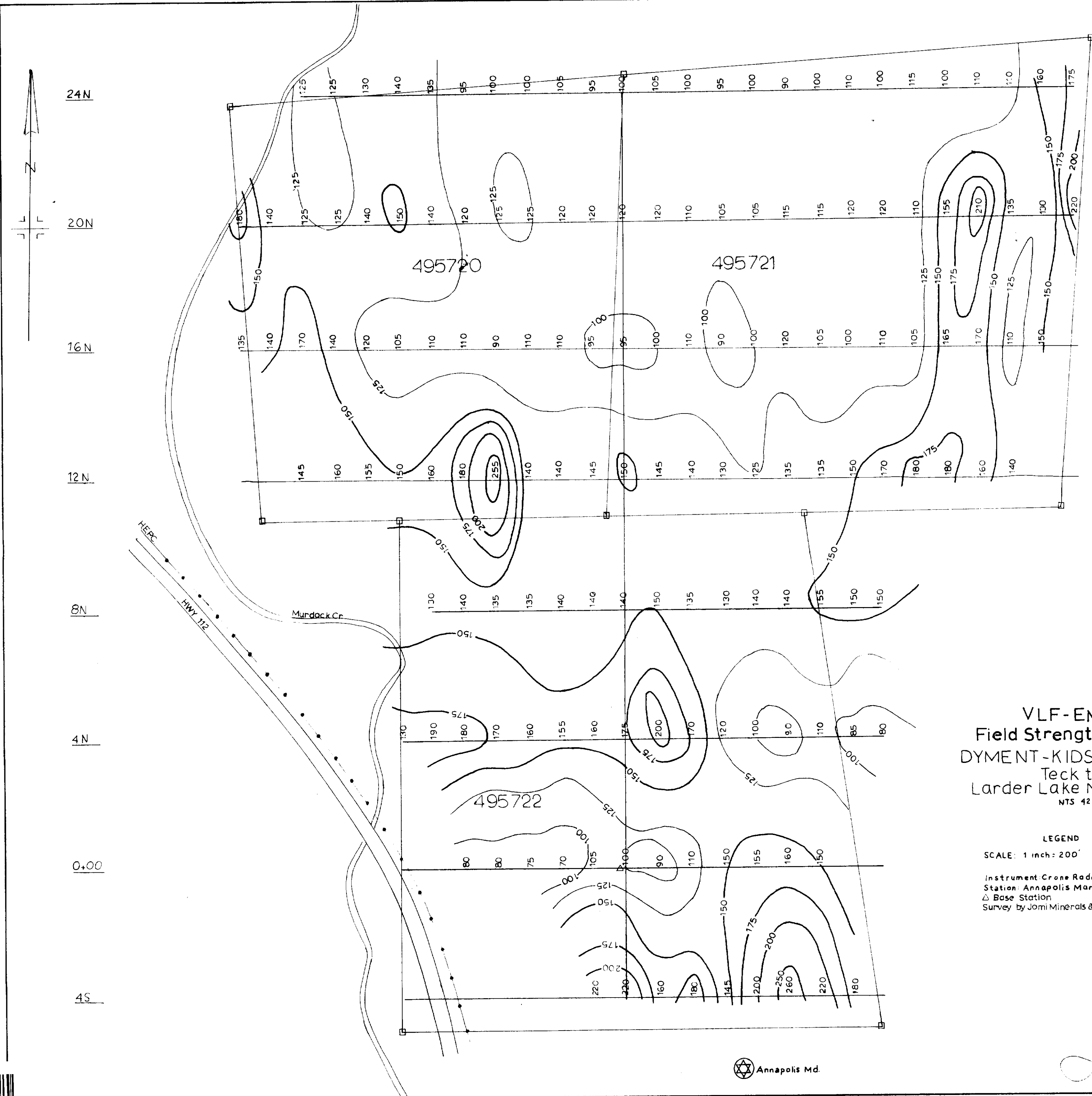
VLF-EM SURVEY
 Dip Angle Profiles
 DYMENT-KIDSTON CLAIMS
 Teck twp.
 Larder Lake Mining Div.
 NTS 42A/1

LEGEND
 SCALE: 1 inch = 200'
 1 inch = 20'
 Instrument: Crone Radem
 Station: Annapolis Maryland
 Dip Angle of Resultant field in degrees
 In-phase:
 Survey by Jomi Minerals & Expediting Ltd.



[Handwritten signature]





VLF-EM SURVEY
 Field Strength Contours
 DYMENT-KIDSTON CLAIMS
 Teck twp
 Larder Lake Mining Div.
 NTS 42A/1

LEGEND
 SCALE: 1 inch = 200'
 Instrument Crone Radem
 Station Annapolis Maryland
 △ Base Station
 Survey by Jomi Minerals & Expediting

J. Jomi

☆ Annapolis Md.

