A-712

Suite 903, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

REPORT ON AN
AIRBORNE MAGNETIC AND VLF-EM SURVEY
ARMIT LAKE AREA
SAVANT TOWNSHIP
PATRICIA MINING DIVISION, ONTARIO

for

UMEX INC.

by

TERRAQUEST LTD.
Toronto, Canada

September 14 , 1987

Suite 905, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

TABLE OF CONTENTS

LIST OF FIGURES

LIST OF MAPS IN JACKET

Note: There are two survey areas, therefore there are two of each of the above listed maps.

Suite 905, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

1. INTRODUCTION

This report describes the specifications and results of a geophysical survey carried out for Umex Inc. of 1211-150 King Street WEst, Toronto, Ontario, M5H 1J9 by Terraquest Ltd., 905 - 121 Richmond Street West, Toronto, Canada. The field work was performed on July 6, 1987 and the data processing, interpretation and reporting from July 7 to September 14, 1987.

The purpose of a survey of this type is two-fold. One is to prospect directly for anomalously conductive and magnetic areas in the earth's crust which may be caused by, or at least related to, mineral deposits. A second is to use the magnetic and conductivity patterns derived from the survey results to assist in mapping geology, and to indicate the presence of faults, shear zones, folding, alteration zones and other structures potentially favourable to the presence of gold and base-metal concentration. To achieve this purpose the survey area was systematically traversed by an aircraft carrying geophysical instruments along parallel flight lines spaced at even intervals, 100 meters above the terrain surface, and aligned so as to intersect the regional geology in a way to provide the optimum contour patterns of geophysical data.

2. THE PROPERTY

ARMIT LAKE AREA (A-712.1)

The Armit Lake property is located 80 kilometres northeast of Sioux Lookout, 25 kilometres northwest of the settlement of Savant Lake in the Patricia Mining Division of Ontario. The latitude and longitude are 57 degrees 27 minutes, and 90 degrees 56 minutes respectively, and the N.T.S. reference is 52J/7.

The claim numbers are shown in figure 2A (Armit Lake Claim Map, G-1933) and listed below:

Pa	911491-911535	(35)	
	921742-921743 ✓	(2)	..... 37 claims

SAVANT TOWNSHIP (A-712.2)

The Savant Township property is located 90 kilometres east of Sioux Lookout and 45 kilometres northeast of the settlement of Savant Lake in the Patricia Mining Division of Ontario. The property lies along the east shore of Savant Lake in the southeast corner of Savant Township. The latitude and longitude are 50 degrees 31 minutes, and 90 degrees 20 minutes respectively, and the N.T.S. reference is 52J/9.

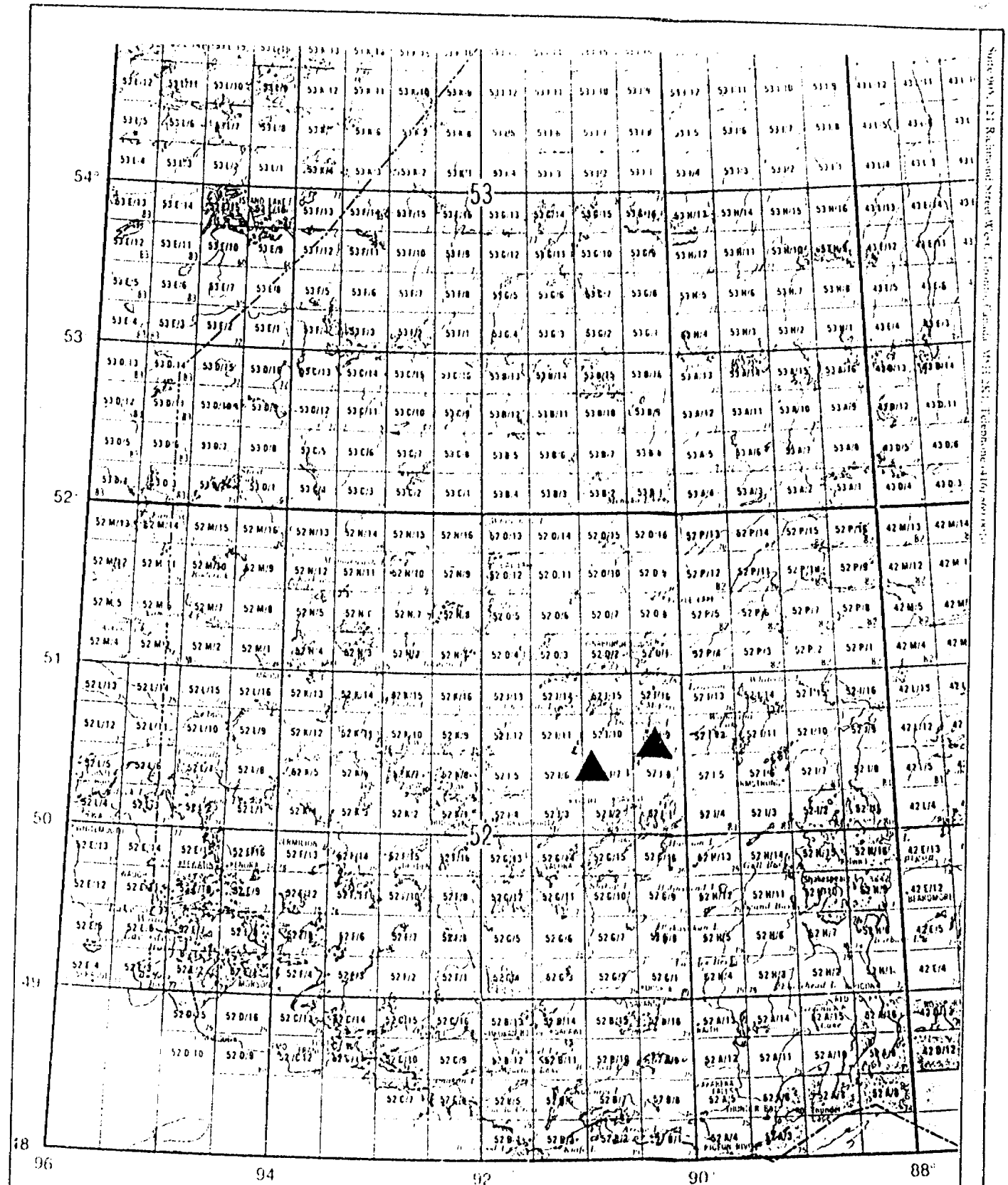


FIGURE 1. General Location

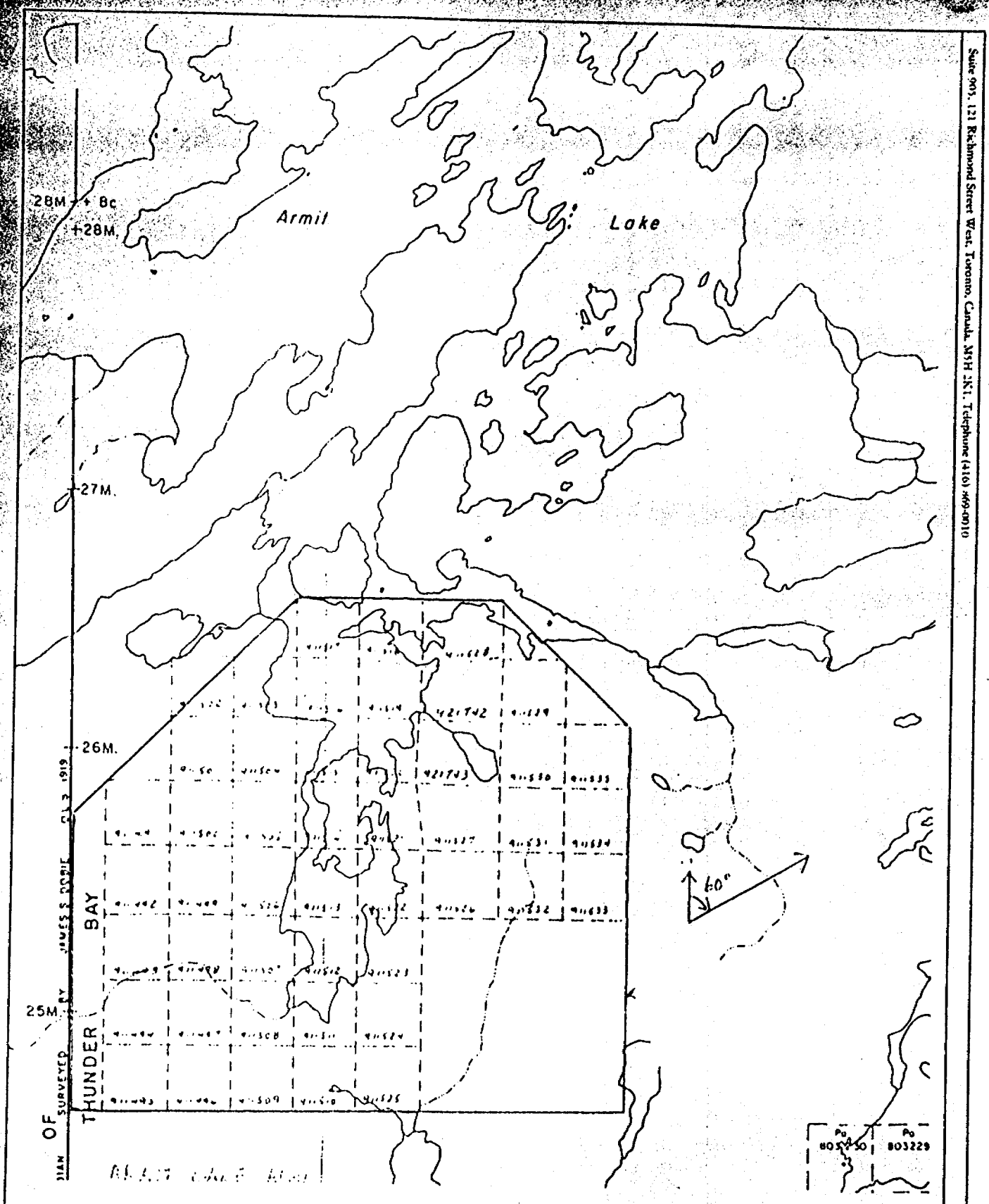


FIGURE 2A. Claim Location Map
(exact locations not certified)

Suite 903, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0910

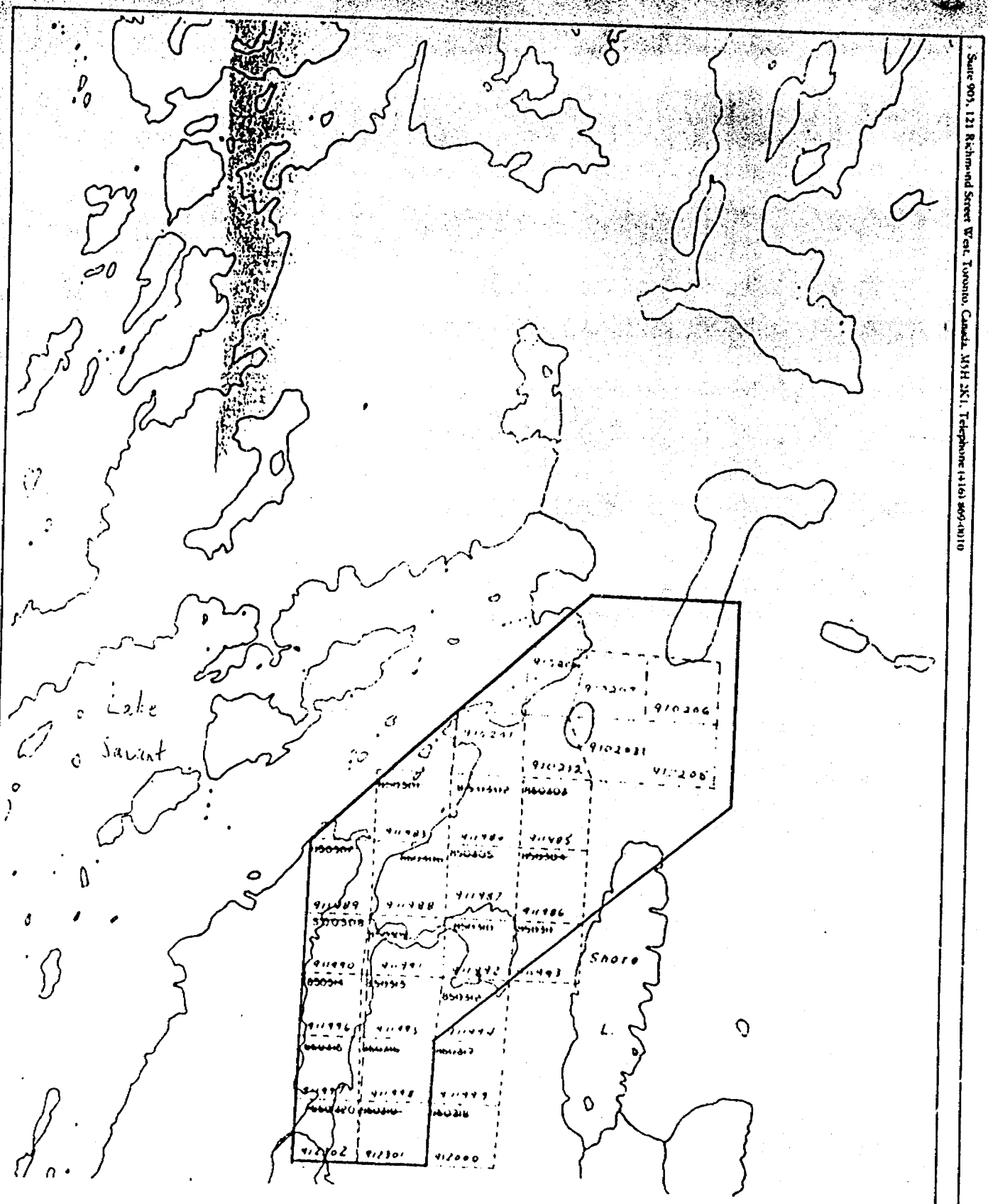


FIGURE 2B. Claim Location Map
(exact locations not certified)

Suite 903, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (+1 61) 869-0810

The claim numbers are shown in figure 2B (Savant Township Claim Map, G-2885) and listed below:

Pa	910201-910203 ✓	(3)	
	910205-910208 ✓	(4)	
	911983-912000	(18)	
	912301-912302 ✓	(2)	..... 27 claims

3. GEOLOGY

Map References

1. Map 37J: Savant Lake Gold Area. scale 1:126,720. O.D.M. 1928.
2. Map 2064: Highstone Lake-Miniss Lake Area, East Sheet. scale 1:63,360. O.D.M. 1964.
3. Map 2442: Sioux Lookout-Armstrong, Geological Compilation Series. scale 1:253,440. O.G.S. 1980.
4. Map P.54: Highstone Lake-Miniss Lake Area. scale 1:63,360. O.D.M. 1959.
5. Map P.2218: Hooker-Fitchie Lakes Sheet. scale 1:63,360. O.G.S. 1979.

The Armit Lake area is underlain predominantly by mafic to intermediate metavolcanics. A narrow horizon of clastic metasediments crosses the property twice, folded about an east-west trending fold axis. An iron formation is associated with these sediments. Granodiorite of the Dickson Lake stock borders the property to the east. Metamorphosed granodiorite and granite occurs in batholithic proportions to the north and southwest of the property. An exposure of altered ultramafic rocks occurs along the southeastern shore of Armit Lake close to the northern edge of the property. The dominant structural patterns trend to the east and northeast parallel to the Kashaweogama Lake fault system and the Miniss River fault system.

Iron occurs as an iron formation associated with the metasediments and within the metavolcanics at the south end of Armit Lake. A diamond drill hole to the southeast of the property has intersected pyrite, pyrrhotite and chalcopyrite.

The Savant Township property is underlain predominantly by mafic to intermediate metavolcanics and hosts an iron formation along the northern edge. Diamond drill holes within these rocks have intersected copper, silver, gold, zinc and lead mineralization. Granodiorite occurs to the southeast in batholithic proportions. The dominant structural systems trend to the east-northeast and northeast.

Suite 909, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0810

4. SURVEY SPECIFICATIONS

4.1 Instruments

The survey was carried out using a Cessna 206 aircraft, registration C-GGLS, which carries a magnetometer and a VLF electromagnetic detector.

The magnetometer is a high sensitivity airborne proton (Overhauser) type with the sensor element mounted in a towed bird at a distance of 14 metres below and 24 metres behind the aircraft. It's specifications are as follows:

Resolution:	0.01 gamma
Accuracy:	0.03 gamma for 2 readings per second
Cycle time:	0.5 second
Range:	20000-100000 gammas
Gradient tolerance:	Up to 5000 gammas per meter
Model:	GSM-11
Manufacturer:	GEM Systems Inc., 105 Scarsdale Rd., Don Mills, Ontario, M3B 2R5

The VLF-EM unit uses three orthoganol detector coils to measure (a) the total field strength of the time-varying EM field and (b) the phase relationship between the vertical coil and both the "along line" coil (LINE) and the "cross-line" coil (ORTHO). The LINE coil is tuned to a transmitter station that is ideally positioned at right angles to the flight lines, while the ORTHO coil transmitter should be in line with the flight lines. It's specifications are:

Accuracy:	1%
Reading interval:	1/2 second
Model:	TOTEM 2A
Manufacturer:	Herz Industries, Toronto

The VLF sensor is mounted in the left wing tip extension.

Other instruments are:

- King KRA-10A Radar altimeter
- UDAS-100 data processor with Digidata nine track tape recorder, manufactured by Urtec Ltd., Markham, Ontario.
- Geocam video camera and recorder for flight path recovery, manufactured by Geotech Ltd., Markham, Ontario.

Suite 905, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

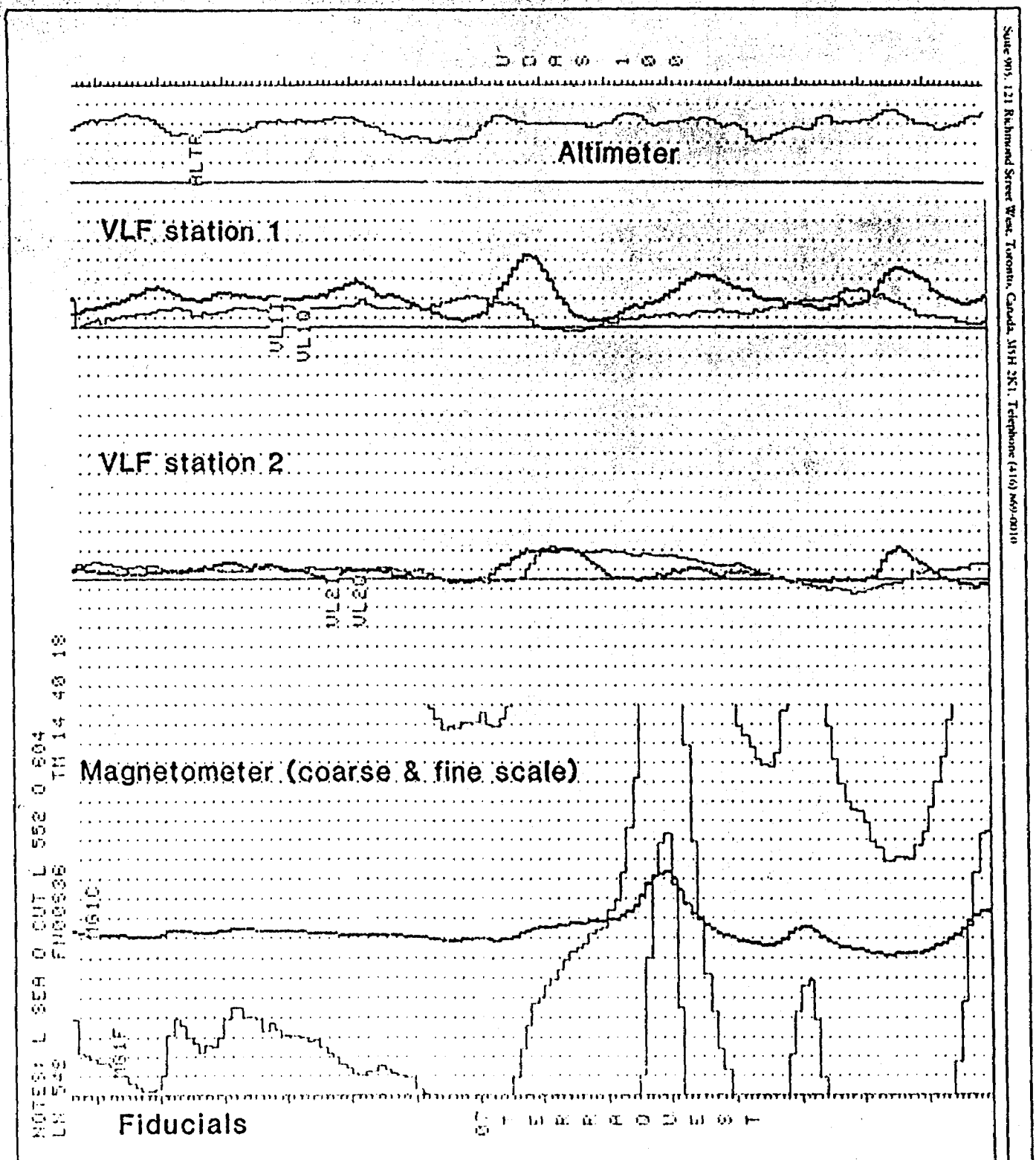


FIGURE 3. Sample of analogue data

Suite 903, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

4.2 Lines and Data

a) Line spacing: 100 metres
b) Line direction: Armit Lake Area 045 degrees
Savant Township Area 315 degrees
c) Terrain clearance: 100 metres
d) Average ground speed: 193 km/hr.
e) Data point interval: Magnetic: 11 metres
VLF-EM: 11 metres
f) Tie Line interval: 2 kilometres
g) Channel 1 (LINE): NLK Seattle, 24.8 kHz
h) Channel 2 (ORTHO): NSS Annapolis, 21.4 kHz
i) Line km over total survey area: 230 km
j) Line km over claim groups: 165 km

4.3 Tolerances

a) Line spacing: Any gaps wider than twice the line spacing and longer than 10 times the line spacing were filled in by a new line.
b) Terrain clearance: Portions of line which were flown above 125 metres for more than one km were reflown if safety considerations were acceptable.
c) Diurnal magnetic variation: Less than ten gammas deviation from a smooth background over a period of two minutes or less as seen on the base station analogue record.
d) Manoeuvre noise: nil

4.4 Photomosaics

For navigating the aircraft and recovering the flight path, mosaics of aerial photographs were made from existing air photos.

5. DATA PROCESSING

Flight path recovery was carried out in the field using a video tape viewer to observe the flight path as recorded by the Geocam video camera system. The flight path recovery was completed daily to enable reflights to be selected where needed for the following day.

The magnetic data was levelled in the standard manner by tying survey lines to the tie lines. The IGRF has not been removed. The total field was contoured by computer using a program provided by Dataplotting Services Inc. To do this the final levelled data set is gridded at a grid cell spacing of 1/10th of an inch at map scale.

The vertical magnetic gradient is computed from the total field data using a method of transforming the data set into the frequency

Suite 915, 121 Richmond Street West, Toronto, Canada M5H 2K1. Telephone (416) 869-0010

domain, applying a transfer function to calculate the gradient, and then transforming back into the spatial domain. The method is described by a number of authors including Grant, 1972 and Spector, 1968. The computer program for this purpose is provided by Paterson, Grant and Watson Ltd. of Toronto.

The VLF data was treated automatically so as to normalize the non conductive background areas to 100 (total field strength) and zero (quadrature). The algorithms to do this were developed by Terraquest and will be provided to anyone interested by application to the company.

All of these dataprocessing calculations and map contouring were carried out by Dataplotting Services Inc. of Toronto.

INTERPRETATION

6.1 General Approach

To satisfy the purpose of the survey as stated in the introduction, the interpretation procedure was carried out on both the magnetic and VLF data. On a local scale the magnetic gradient contour patterns were used to outline geological units which have different magnetic intensity and patterns or "signatures". Where possible these are related to existing geology to provide a geological identity to the units. On a regional scale the total field contour patterns were used in the same way.

Faults and shear zones are interpreted mainly from lateral displacements of otherwise linear magnetic anomalies but also from long narrow "lows". The direction of regional faulting in the general area is taken into account when selecting faults. Folding is usually seen as curved regional patterns. Alteration zones can show up as anomalously quiet areas, often adjacent to strong, circular anomalies that represent intrusives. Magnetic anomalies that are caused by iron deposits of ore quality are usually obvious owing to their high amplitude, often in tens of thousands of gammas.

Grant, F.S. and Spector A., 1970: Statistical Models for Interpreting Aeromagnetic Data; Geophysics, Vol 35

Grant, F.S., 1972: Review of Data Processing and Interpretation Methods in Gravity and Magnetics; Geophysics 37-4

Spector, A., 1968: Spectral Analysis of Aeromagnetic maps; unpublished thesis; University of Toronto, 1968.

Suite 903, 111 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

VLF anomalies are categorized according to whether the phase response is normal, reverse, or no phase at all. The significance of the differing phase responses is not completely understood although in general reverse phase indicates either overburden as the source or a conductor with considerable depth extent, or both. Normal phase response is theoretically caused by surface conductors with limited depth extent.

Areas showing a smooth response somewhat above background (ie. 110 or so) are likely caused by overburden which is thick enough and conductive enough to saturate at these frequencies. In this case no response from bedrock is seen.

The VLF-EM conductor axes have been identified and evaluated according to the Terraquest classification system (Figure 4). This system correlates the nature and orientation of the conductor axes with stratigraphic, structural and topographic features to obtain an association from which one or more origins may be selected. Alternate associations are indicated in parentheses.

6.2 Interpretation

The magnetic and VLF-EM data are shown in contoured format on maps at a scale of 1:10,000 in the back pocket. An interpretation is also provided. The following notes are intended to supplement the maps.

ARMIT LAKE AREA (A-712.1)

The total magnetic field has a relief of approximately 2,900 gammas and shows the strong sweeping responses of the iron formation. The vertical magnetic gradient data shows greatly improved resolution and has been used to delineate the stratigraphy and structure.

The strong magnetic responses correlate well with the mapped metasediments (Unit 3) and associated iron formation. The clastic metasediments by themselves are not expected to possess strong magnetic susceptibilities. The interpreted widths are probably exaggerated due to the strong responses of the iron formation, overwhelming the responses from adjacent areas. The thickening of this unit to the southwest is probably related to fold thickening. The magnetics outline two other interpreted iron formations to the east with probable associated metasediments, not shown on the current geological maps. Alternatively, these magnetic horizons may occur within the metavolcanics.

The exposure of ultramafics (Unit 5) correlates with a strong magnetic response that appears to crosscut the responses from the easternmost iron formation. The mafic to intermediate metavolcanics

Suite 405, 121 Richmond Street West, Toronto, Canada, M5H 2K1 Telephone (416) 364-9019

TERRAQUEST LTD.

FIGURE 4

TERRAQUEST CLASSIFICATION OF VLF-EM CONDUCTOR AXES

SYMBOL	CORRELATION	ASSOCIATION: Possible Origins
a , A	Coincident with magnetic stratigraphy	Bedrock magnetic horizons: stratabound mineralogic origin or shear zone
b , B	Parallel to magnetic stratigraphy	Bedrock non-magnetic horizons: stratabound mineralogic origin or shear zone
c , C	No correlation with magnetic stratigraphy	Association not known: possible small scale stratabound mineralogic origin, fault or shear zone, overburden
d , D	Coincident with magnetic dyke	Dyke or possible fault: mineralogic or electrolytic
f , F	Coincident with topographic lineament or parallel to fault system	Fault zone: mineralogic or electrolytic
ob , OB	Contours of total field response conform to topographic depression	Most likely overburden: clayey sediments, swampy mud
cul , CUL	Coincident with cultural sources	Electrical, pipe or railway lines

NOTES

1 - Upper case symbols denote a relatively strong total field strength

2 - Underlined symbols denote a relatively strong quadrature response

3 - Mineralogic origins include sulphides, graphite, and in fault zones, gouge

4 - Electrolytic origins imply conductivity related to porosity or high moisture content

(Unit 1) correlate with moderate to weak magnetic responses and the granodiorite (Unit 8) of the Dickson Lake stock correlates with weak magnetic responses.

Two east and two northeast trending faults have been interpreted from displacements of magnetic strata. Several others may be interpreted with increasing subjectivity.

The VLF-EM survey shows moderate to strong conductive zones. Most of them have been interpreted to be associated with fault or shear zones trending to the northeast and a few to the northwest. This type of conductivity may be related to minerals such as gouge, sulphides or graphite along the fault, or to ionic activity such as water along the structure or to clay in an overlying topographic depression.

Several shorter conductor axes coincide with the iron formation and clastic metasediments. These possess potential for stratiform sources and should be followed up on the ground using EM or IP methods.

SAVANT TOWNSHIP AREA (A-712.2)

The total magnetic field has a relief of approximately 5,360 gammas along a broad northeast trending unit that curves to the south along the western side of the property. The gradient away from this magnetic feature dominates the remaining areas. The vertical magnetic gradient shows improved resolution of this magnetic unit and enhances the definition of the weaker magnetic trends.

The strong magnetic responses correlate with the mapped iron formation and suggest that it curves southwards along the western side of the property beneath the bay.

The mafic to intermediate metavolcanics (Unit 1) correlate with moderate magnetic responses. Some horizons (Unit 1m) within the mafic metavolcanics show a total field magnetic relief of up to 400 gammas. These are probably related to increased concentrations of magnetic minerals such as magnetite or pyrrhotite or possibly to more mafic compositions such as conformable intrusives.

The metamorphosed felsic to intermediate intrusives (Unit 7) to the southeast correlate with weak magnetic responses. Subtle variations within this rock type shown on the vertical derivative magnetic map may be related to original compositions or possibly to the degree of metamorphism of these rocks.

Numerous east-west trending faults or shear zones have been interpreted from the magnetic data and one northwest trending structure. Other northwest trending structures are suspected but are

Suite 601, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

difficult to define, suggesting that they may be overridden by the east trending faults. Any northeast trending faults would be difficult to detect as they would parallel the magnetic stratigraphy.

The VLF-EM responses are moderate with variable quadrature responses. Those conductors that parallel the flight lines possess poorly defined and ambiguous quadrature responses. Most of the conductor axes are associated with the east-west faulting across the property and a few to the northwest trending faults. Six conductor axes coincide with the iron formation and therefore possess potential for sulphide or graphite origins along the stratigraphic horizons. These should be followed up on the ground using either IP or EM methods.

7. SUMMARY

An airborne combined magnetic and VLF-EM mapping survey has been carried out at 100 metre line intervals with data reading stations at 11 metres along the flight lines. All data is produced on maps at a scale of 1:10,000.

The magnetic data has been used to modify and update the existing geology and has shown a number of new contacts and faults. A number of VLF-EM conductor axes were found of which most are associated with structure and a few are believed to be have potential sulphide origins and have been recommended for additional investigation.

TERRAQUEST LTD.

2.8305.

Charles O. Barrie, M.Sc.
Geologist

Suite 903, 121 Richmond Street West, Toronto, Canada, M5H 2K1. Telephone (416) 869-0010

900

Endogoki Lake Area G-2028

52J/07SW
TWP of SAVANT
M-1882
Scale: 1"=40chains

Benner Twp.

4M
3M
2N
1M

SOUTH

LAKE

Shore

L.

PROJECTED

52J/09SW

52J/08NW

1M 2M 3M 4M 5M

McGillis Twp. G-2881

TRAVERSE MONUMENT

DISPOSITION OF

TYPE OF DOCUMENT

PATENT, SURFACE & MINING
" , SURFACE RIGHTS O
" , MINING RIGHTS ON
LEASE, SURFACE & MINING
" , SURFACE RIGHTS ON
" , MINING RIGHTS ONL
LICENCE OF OCCUPATION
ORDER-IN COUNCIL
RESERVATION
CANCELLED
SAND & GRAVEL

NOTE: MINING RIGHTS IN PARC
1913, VESTED IN ORIGI
LANDS ACT, R.S.O. 197

SCALE: 1 INCH = 40 CHA

FEET
0 1000 2000

0 200 1000
METRES

TOWNSHIP

SAVANT

M.N.R. ADMINISTRATIVE

SIOUX LOOKOU

MINING DIVISION

PATRICIA

LAND TITLES / REGISTR

THUNDER BA

Ministry of Natural Resources
Ontario

MAY 1985

RUNWAY LK M-1835

525/07NW
AREA of ARMIT LK
M-2744
Scale:
1" = 40 chains

SURVEYED BY JAMES B. DORE O.L.S. 1918

THUNDER BAY DISTRICT

MERIDIAN OF DISTRICT

Normandy Lake

Dickson Lake

Gayo Lake

Marchington R.

Kashaweogama Lake

Id. No. 69

West Part of 69

East Part of 69

Lake

Fairchild

26M.
25M.
24M.
23M.
22M.
1M.
2M.
3M.
4M.
5M.
6M.

109
110
94
96
72

7TH. BASE LINE SURVEYED BY BEATTY & BEATTY O.L.S. 1927

SIP 1987

HOUGHTON LK M-2165

80° 22' 30"

Ministry of Northern Development and Mines

Ontario

Report of Work

(Geophysical, Geological, Geochemical and Expenditures)

#87-165

Mining Act 2.10355

Instructions: – Please type or print. 021+28
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." columns.
– Do not use shaded areas below.

MINING LANDS

Type of Survey(s): Airborne Magnetometer and VLF-EM

Township or Area: Armit Lake Area G-1933

Claim Holder(s): UMEX Inc

Prospector's Licence No.: T-133

Address: P.O. Box 22, Sun Life Tower, 150 King St. West, Toronto, Ontario. M5H 1J9

Survey Company: Terraquest Ltd.

Date of Survey (from & to): 09 07 87 (Day Mo. Yr.) 09 07 87 (Day Mo. Yr.)

Total Miles of line Cut: ---

Name and Address of Author (of Geo-Technical report): Charles Barrie, Terraquest Ltd., 905-121 Richmond St. W., Toronto, Ontario. M5H 2K1

Credits Requested per Each Claim in Columns at right

Special Provisions		Days per Claim
For first survey: Enter 40 days. (This includes line cutting)	Geophysical	
	· Electromagnetic	
	· Magnetometer	
For each additional survey using the same grid: Enter 20 days (for each)	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Man Days		Days per Claim
Complete reverse side and enter total(s) here	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Airborne Credits		Days per Claim
Note: Special provisions credits do not apply to Airborne Surveys.	Electromagnetic	40
	Magnetometer	40
	Radiometric	

RECEIVED SEP 16 1987 MINING LANDS SECTION

RECEIVED SEP - 8 1987 A.M. P.M. 7 8 9 10 11 12 1 2 3 4 5 6

Mining Claims Traversed (List in numerical sequence)

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.	Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
Pa	911491		Pa	911514	
	911492			911515	
	911493			911516	
	911494			911517	
	911495			911518	
	911496			911519	
	911497			911520	
	911498			911521	
	911499			911522	
	911500			911523	
	911501			911524	
	911502			911525	
	911503			911526	
	911504			911527	
	911505			911528	
	911506			911529	
	911507			911530	
	911508			911531	
	911509			911532	
	911510			911533	
	911511			911534	
	911512			911535	
	911513				

Total number of mining claims covered by this report of work: 45

Pa. 911491

Expenditures (excludes power stripping)

Type of Work Performed:

Performed on Claim(s):

Calculation of Expenditure Days Credits

Total Expenditures: $ ÷ 15 = Total Days Credits

Instructions: Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
3600	SEPT. 8 1987	
	Date Approved as Recorded: 1987.10.08	Approved by:

Date: 03 Sept. 1987

Recorded Holder or Agent (Signature): David Unger

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: David Unger, c/o Umex Inc, P.O. Box 22, Sun Life Tower, 150 King St. W., Ste. 1211, Toronto, Ontario. M5H 1J9

Date Certified: 03 Sept. 1987

Certified by (Signature): David Unger

(85/12/02)

Mar. 23/1988

Ministry of Northern Development and Mines
Ontario

Report of Work
(Geophysical, Geological, Geochemical and Expenditures)

022

Instructions: – Please type or print.
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." column.
– Do not use shaded areas below.

Mining Act 2.10355

Mining Lands

Type of Survey(s)
Airborne Magnetometer and VLF-EM

Township or Area
Armit Lake Area G-1933

Claim Holder(s)
UMEX Inc

Prospector's Licence No
T-133

Address
P.O. Box 22 , 150 King Street West, Suite 1211, Toronto,Ontario M5H 1J9

Survey Company
Terraquest Ltd.

Date of Survey (from & to)
09 07 87 09 07 87

Total Miles of line Cut
--

Name and Address of Author (of Geo Technical report)
Charles Barrie, Terraquest Ltd. 240 Adelaide Street West, Toronto,Ontario M5H 1W7

Credits Requested per Each Claim in Columns at right

		Days per Claim
Special Provisions For first survey: Enter 40 days. (This includes line cutting) For each additional survey: using the same grid: Enter 20 days (for each)	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	
Man Days Complete reverse side and enter total(s) here	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	
Airborne Credits Note: Special provisions credits do not apply to Airborne Surveys.		Days per Claim
	Electromagnetic	40
	Magnetometer	40
	Radiometric	

Mining Claims Traversed (List in numerical sequence)

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.	Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
Pa	921742				
	921743				

RECEIVED
FEB 02 1988
MINING LANDS SECTION

RECEIVED
JAN 19 1988
PATRICIA MINING DIVISION

Total number of mining claims covered by this report of work. 2

Expenditures (excludes power stripping)

Type of Work Performed

Performed on Claim(s)

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

Instructions
Total Days Credits may be apportioned at the claim holder's choice. Enter number of days credits per claim selected in columns at right.

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
160	Jan. 18, 1988	
	Date Approved as Recorded 12 Feb 88	Branch Director

Date: January 15,1988
Recorded Holder or Agent (Signature): David Unger

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
David Unger, UMEX Inc, 150 King Street West, P.O. Box 22, Toronto,Ontario M5H 1J9

Date Certified: January 15, 1988
Certified by (Signature): David Unger

1362 (85/12)

Ontario

Ministry of Northern Development and Mines

MINING LANDS

Report of Work

(Geophysical, Geological, Geochemical and Expenditures)

#87-166

Mining Act 210355

Oct 28

Instructions: – Please type or print.
– If number of mining claims traversed exceeds space on this form, attach a list.
Note: – Only days credits calculated in the "Expenditures" section may be entered in the "Expend. Days Cr." columns.
– Do not use shaded areas below.

Type of Survey(s): Airborne Magnetometer and VLF-EM

Township or Area: Savant Township G-2885

Claim Holder(s): UMEX Inc

Prospector's Licence No.: T-133

Address: P.O. Box 22, Sun Life Tower, 150 King St. W., Ste. 1211, Toronto, Ontario. M5H 1J9

Survey Company: Terraquest Ltd.

Date of Survey (from & to): 09 07 87 (Day Mo. Yr.) | 09 07 87 (Day Mo. Yr.)

Total Miles of line Cut: ---

Name and Address of Author (of Geo-Technical report): Charles Barrie, Terraquest Ltd., 905-121 Richmond St. W., Toronto, Ontario, M5H 2K1

Credits Requested per Each Claim in Columns at right

Special Provisions		Days per Claim
For first survey: Enter 40 days. (This includes line cutting)	Geophysical	
	· Electromagnetic	
	· Magnetometer	
For each additional survey: using the same grid: Enter 20 days (for each)	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Man Days		Days per Claim
Complete reverse side and enter total(s) here	Geophysical	
	· Electromagnetic	
	· Magnetometer	
	· Radiometric	
	· Other	
	Geological	
	Geochemical	

Airborne Credits		Days per Claim
Note: Special provisions credits do not apply to Airborne Surveys.	Electromagnetic	40
	Magnetometer	40
	Radiometric	

RECEIVED SEP 16 1987 MINING LANDS SECTION

Mining Claims Traversed (List in numerical sequence)

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.
Pa	911983	
	911984	
	911985	
	911986	
	911987	
	911988	
	911989	
	911990	
	911991	
	911992	
	911993	
	911994	
	911995	
	911996	
	911997	
	911998	
	911999	
	912000	
	912301	
	912302	
	985930	
	985931	

Mining Claim Prefix	Mining Claim Number	Expend. Days Cr.

PATRICIA MINING DIV. RECEIVED SEP - 8 1987 A.M. 7 8 9 10 11 12 1 2 3 4 5 6 P.M.

Expenditures (excludes power stripping)

Type of Work Performed

Performed on Claim(s)

Calculation of Expenditure Days Credits

Total Expenditures: S ÷ 15 = Total Days Credits

Instructions: 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 number of mining claims covered by this report of work: 22

Pa. 911983

For Office Use Only

Total Days Cr. Recorded	Date Recorded	Mining Recorder
1760	SEPT. 8/87	
	Date Approved as Recorded: 1987 10.08	Branch Director

Date	Recorded Holder or Agent (Signature)
03 Sept. 1987	

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: David Unger, c/o UMEX Inc, P.O. Box 22, Sun Life Tower, 150 King St. W., Ste. 1211, Toronto, Ontario. M5H 1J9

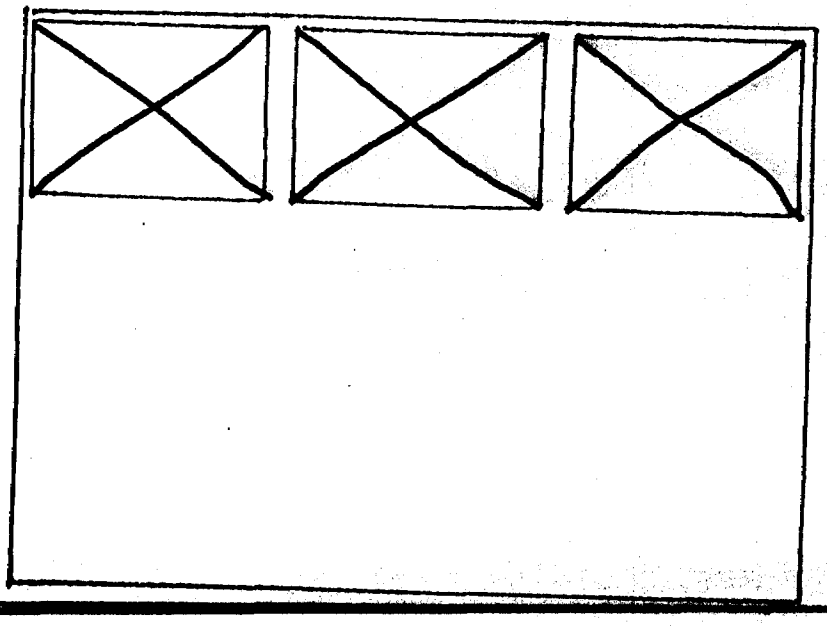
Date Certified	Certified by (Signature)
03 Sept. 1987	

SEE ACCOMPANYING MAP(S) IDENTIFIED AS

52J/09SW-0030 ## 1-3

LOCATED IN THE MAP CHANNEL IN THE FOLLOWING SEQUENCE

(X)



FOR ADDITIONAL INFORMATION SEE MAPS:

52J/09SW-0030 # 4-8

LEGEND

Terrain Clearance	100 meters
Line Spacing	100 meters
TOTAL MAGNETIC FIELD	
1000 gammas	———
250 gammas	———
50 gammas	———
10 gammas	———

UMEX INC.

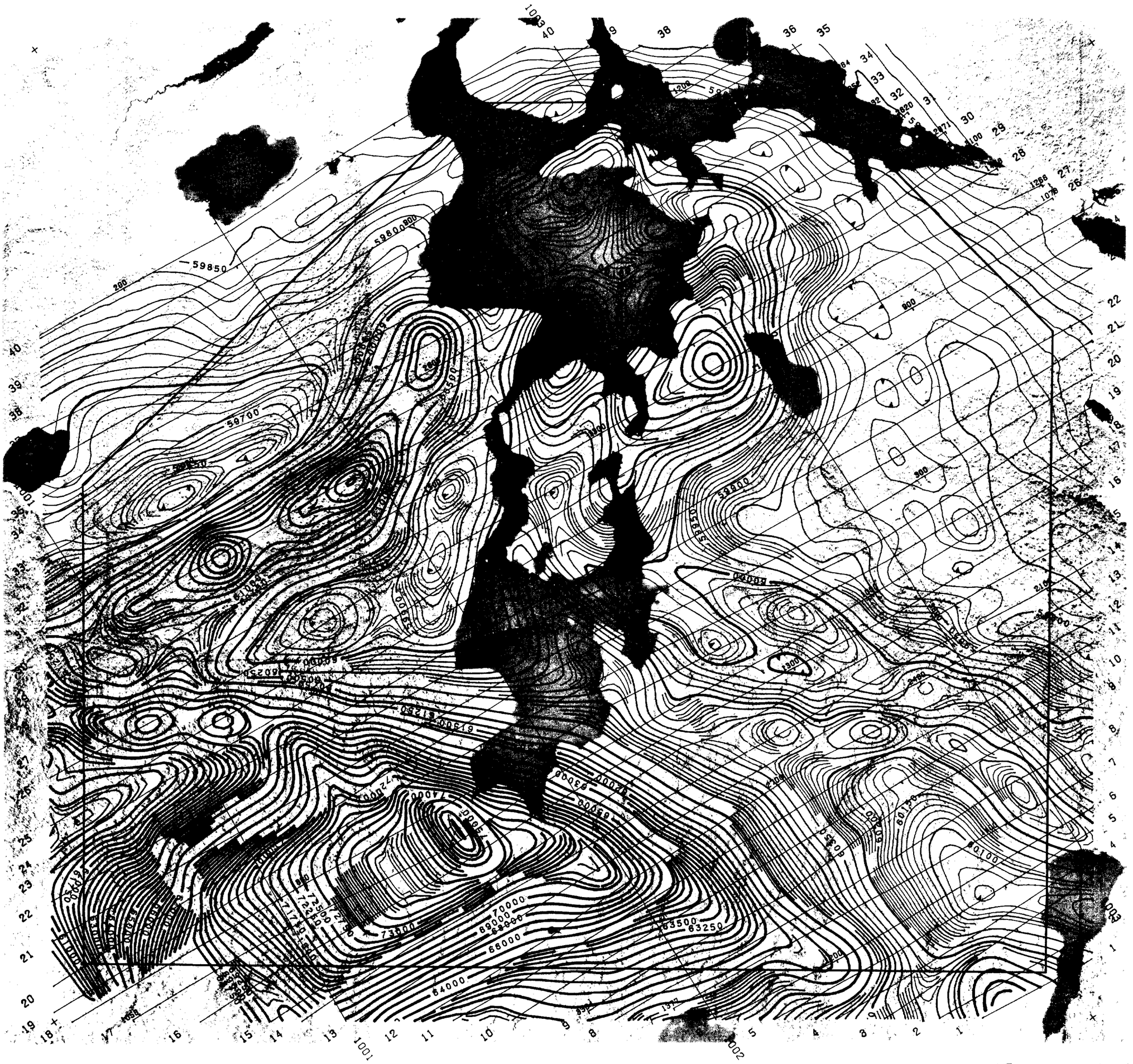
AIRBORNE MAGNETIC SURVEY
TOTAL MAGNETIC FIELD

SAVANT TOWNSHIP
ONTARIO

N.T.S. NO. 52J/9	DRAWING NO. A-712.2-1
SCALE: 1:10,000	DATE: September 1987

TERRAQUEST LTD.
TORONTO, CANADA

2.10355



2.10355

LEGEND

Terrain Clearance	100 meters
Line Spacing	100 meters

TOTAL MAGNETIC FIELD

1000 gammas	———
250 gammas	———
50 gammas	———
10 gammas	———

UMEX INC.

AIRBORNE MAGNETIC SURVEY
TOTAL MAGNETIC FIELD

ARMIT LAKE AREA
ONTARIO

NTS NO. 52J/7 DRAWING NO. A-712.1-1

SCALE 1:10,000 DATE September 1987

TERRAQUEST LTD.
TORONTO CANADA

52J/09SW-0030, #2

LEGEND

Terrain Clearance	100 meters
Line Spacing	100 meters

VERTICAL MAGNETIC GRADIENT

25.00 **gammas/meter**	———
5.00 **gammas/meter**	———
1.00 **gammas/meter**	———
0.20 **gammas/meter**	———

UMEX INC.

AIRBORNE MAGNETIC SURVEY

VERTICAL MAGNETIC GRADIENT
Calculated From Total Field

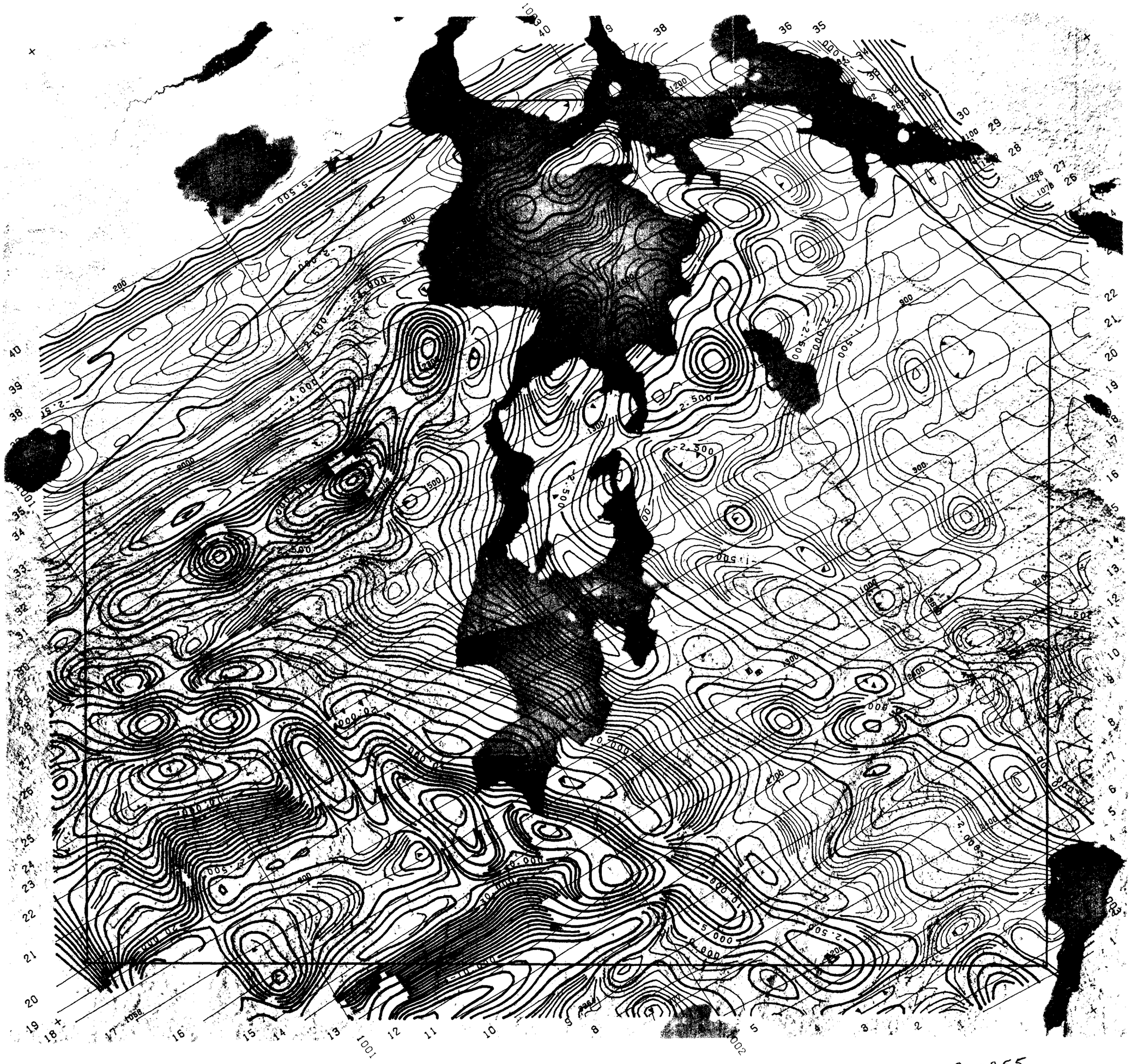
SAVANT TOWNSHIP
ONTARIO

N.T.S. NO. 52J/9 | DRAWING NO. A-712.2-2

SCALE 1:10,000 | DATE September 1987

TERRAQUEST LTD.
TORONTO CANADA

2.10355



2.10355

LEGEND

Terrain Clearance	100 meters
Line Spacing	100 meters

VERTICAL MAGNETIC GRADIENT

10.000 gammas/meter	
2.500 gammas/meter	
.500 gammas/meter	
.100 gammas/meter	

UMEX INC.

AIRBORNE MAGNETIC SURVEY

VERTICAL MAGNETIC GRADIENT
Calculated From Total Field

ARMIT LAKE AREA
ONTARIO

N.T.S. NO. 52J/7	DRAWING NO. A-712.1 2
SCALE 1:10,000	DATE September 1987

TERRAQUEST LTD.
TORONTO CANADA

2.10355

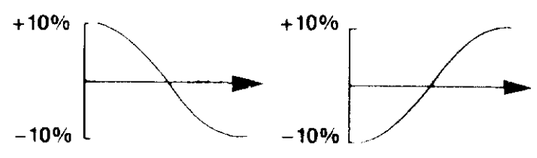
VLF Transmitter
NLK Seattle, 24.8 kHz
Azimuth 276

LEGEND

Terrain Clearance ..... 100 meters
Line Spacing ..... 100 meters

TOTAL FIELD STRENGTH (Contours)
50%
10%
2%

QUADRATURE (Profiles)
Normal Slope Reverse Slope



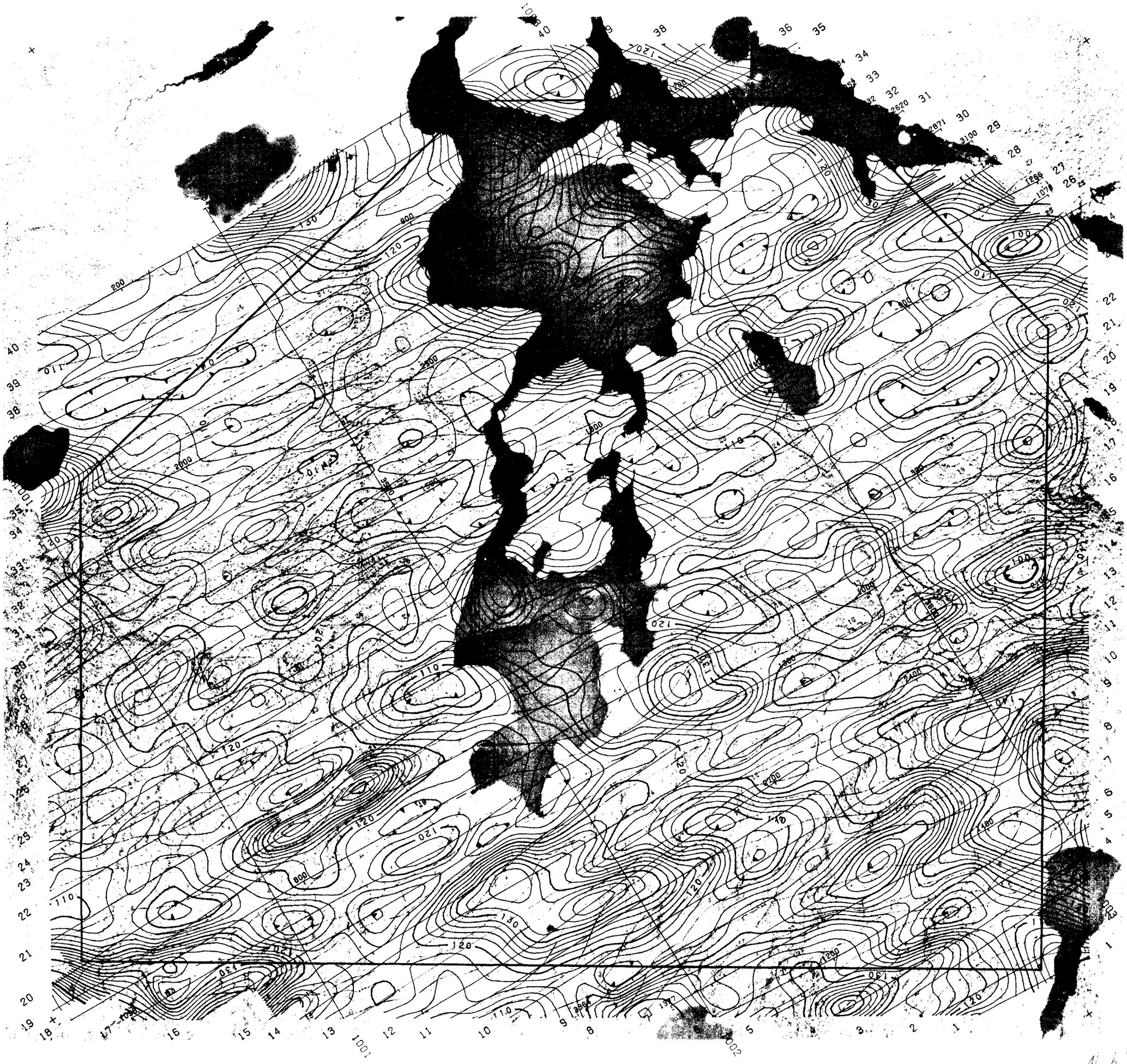
UMEX INC.

AIRBORNE VLF-EM SURVEY
CONTOURS OF TOTAL FIELD STRENGTH
PROFILES OF QUADRATURE

SAVANT TOWNSHIP
ONTARIO

NTS NO. 52J/9 DRAWING NO. A-712.2-3
SCALE 1:10.000 DATE September 1987

TERRAQUEST LTD.
TORONTO, CANADA



2.10355

LEGEND

Terrain Clearance ..... 100 meters
Line Spacing ..... 100 meters

TOTAL FIELD STRENGTH (Contours)
50%
10%
2%

QUADRATURE (Profiles)
Normal Slope Reverse Slope

+10% −10% +10% −10%

VLF Transmitter
NLK Seattle, 24.8 kHz
Azimuth 276

UMEX INC.

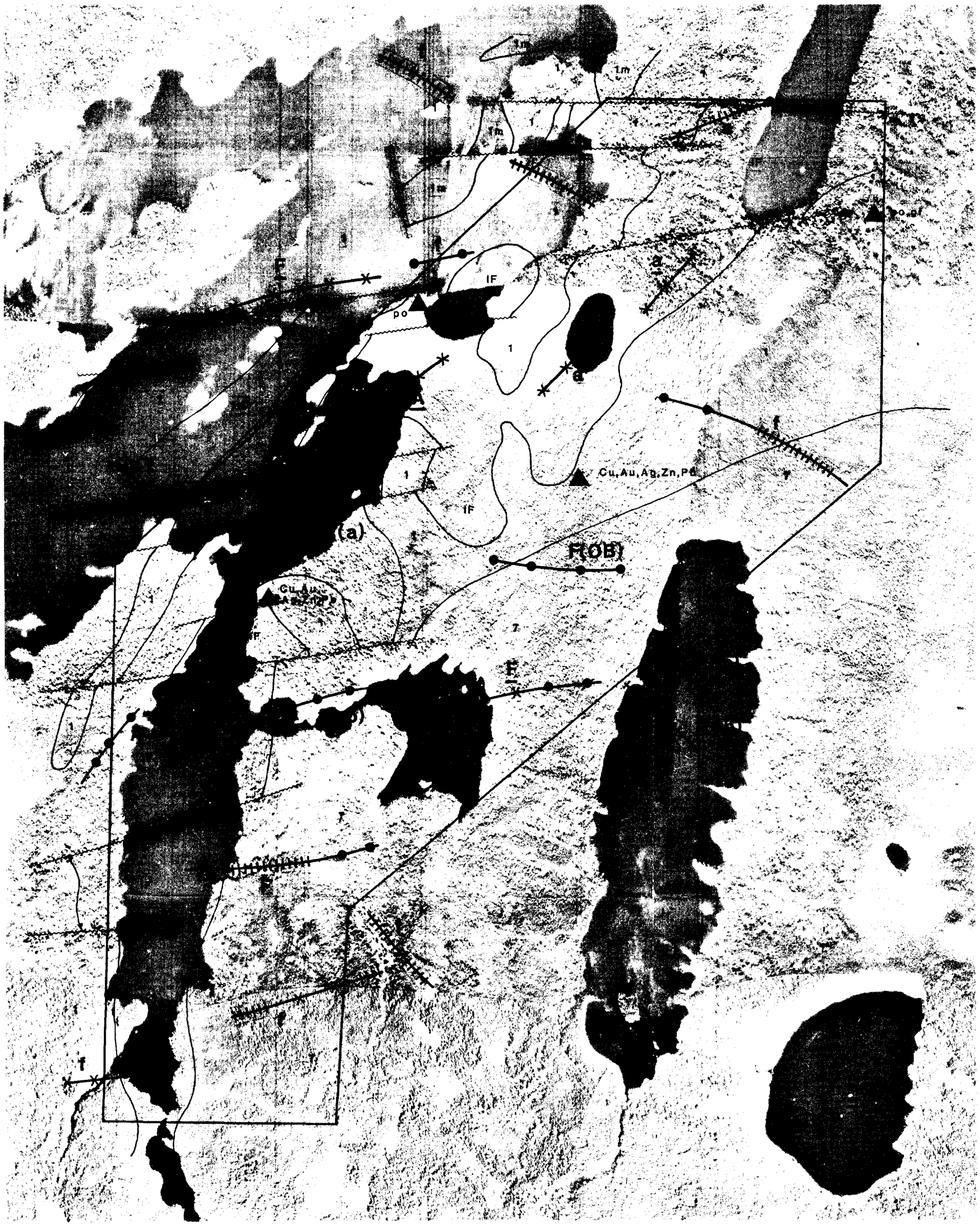
AIRBORNE VLF-EM SURVEY
CONTOURS OF TOTAL FIELD STRENGTH
PROFILES OF QUADRATURE

ARMIT LAKE AREA
ONTARIO

N.T.S. NO 52J/7	DRAWING NO A-712.1-3
SCALE 1:10,000	DATE September 1987

TERRAQUEST LTD.
TORONTO, CANADA

52J/09SW-0030, #6



2.10355

VLF Transmitter
NLK Seattle, 24.8 kHz
Azimuth 276

LITHOLOGY

7	Metamorphosed Felsic to Intermediate Intrusives
1m	Magnetic unit within 1.
1	Mafic to Intermediate Metavolcanics
IF	Iron Formation

LEGEND

Terrain Clearance ..... 100 meters
Line Spacing ..... 100 meters

INTERPRETATION

Contact
Fault
Property Boundary

VLF-EM Conductor Axes

normal quadrature
reverse quadrature
total field only

See text for classification of VLF-EM conductor axes

UMEX INC

INTERPRETATION

SAVANT TOWNSHIP
ONTARIO

N.T.S. NO 52J/9 | DRAWING NO A-712.2-4
SCALE 1:10,000 | DATE September 1987

TERRAQUEST LTD.
TORONTO CANADA

52J/09SW-0030,#7

2.10355

VLF Transmitter
NLK Seattle, 24.8 kHz
Azimuth 276

LITHOLOGY

8	Granodiorite
7	Metamorphosed Granodiorite
5	Ultramafics
3	Argillite, Siltstone
1	Mafic to Intermediate Metavolcanics
IF	Iron Formation

LEGEND

Terrain Clearance ..... 100 meters
Line Spacing ..... 100 meters

INTERPRETATION

Contact
Fault
Property Boundary

VLF-EM Conductor Axes

normal quadrature
reverse quadrature
total field only

See text for classification of VLF-EM conductor axes

UMEX INC.

INTERPRETATION

ARMIT LAKE AREA
ONTARIO

NTS NO. 52J/7 | DRAWING NO. A-712.1-4
SCALE 1:10,000 | DATE September 1987

TERRAQUEST LTD.
TORONTO CANADA