

84-1311-

10/85

REPORT OF WORK
GEOPHYSICAL SURVEYS ON THE
DON, FIR, PAT AND SILVER GAL MINERAL CLAIMS
N.T.S. 82M/03W
51°05'N Latitude 119°24'W Longitude
KAMLOOPS MINING DIVISION

Owner : Orell Resources Ltd.

Operator: Noranda Exploration Company, Limited
(No Personal Liability)

Authors : L. Bradish
Division Geophysicist

G. Shevchenko
Junior Geologist
Vancouver, B.C.
November, 1984

GEOLOGICAL BRANCH
ASSESSMENT REPORT

12,848

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INTRODUCTION

The Don, Fir, Pat, and Silver Gal mineral claims are part of the Silver Lichen claim group which is owned by Orell Resources Ltd., and operated by Noranda Exploration Company, Limited.

From April 2nd. to April 6th., and September 19th. and September 20th., 1984, 16.2 kilometers of grid line were established. 10.2 kilometers of Horizontal Loop E.M. (H.L.E.M.) and 13.2 kilometers of total field magnetometer surveys were completed by October 1984.

LOCATION AND ACCESS

The claims, located at the headwaters of Snuffbox Creek, are centered at latitude $51^{\circ}05'N$ and longitude $119^{\circ}24'W$. The property is flanked by Scotch Creek to the southeast and Kwikoit to the west (Figure 1).

The claims are accessible by a paved secondary road that leaves the Trans Canada Highway at Squilax and a good gravel logging road at Scotch Creek. The secondary logging road which directly accesses the property leaves Scotch Creek Road at the 18.5 kilometer mark.

TOPOGRAPHY

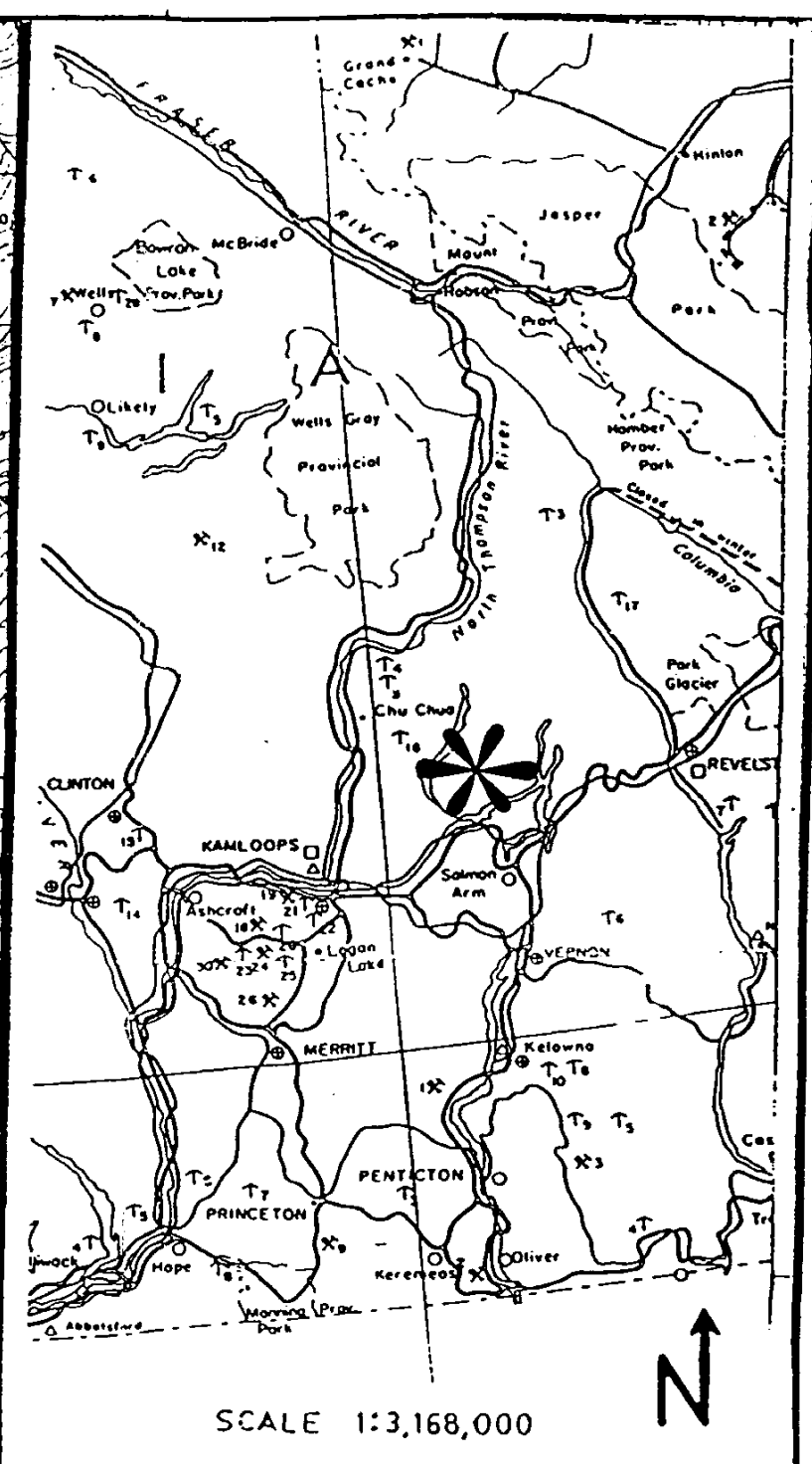
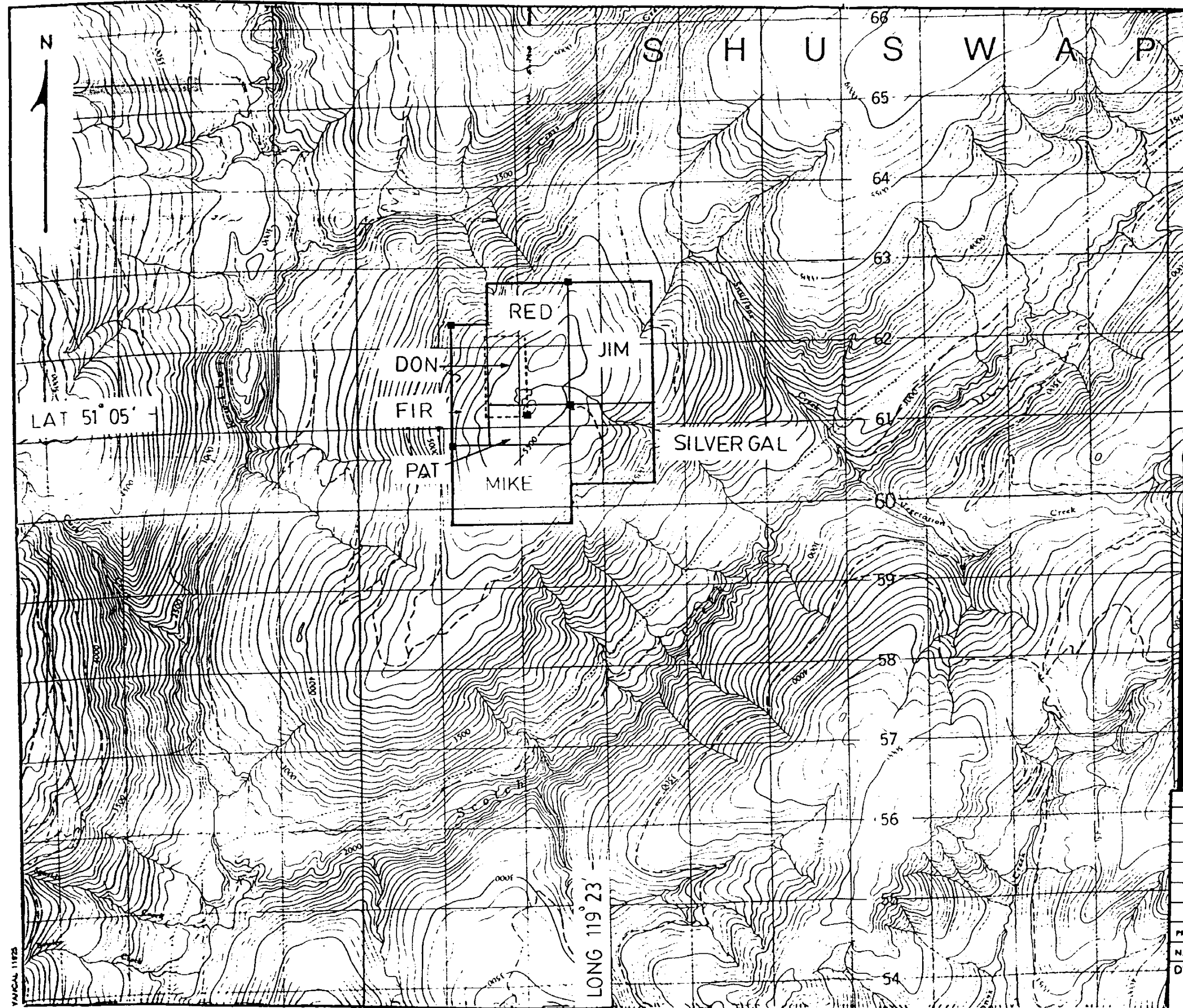
The claim group is situated on gently sloping to steep terrain between elevations 1200 meters and 1700 meters.

The property is moderately timbered with various logged areas.

CLAIM STATUS

The following claims are part of the Silver Lichen claim group which is owned by Orell Resources Ltd., 2411 Lakeshore Rod N.E., Salmon Arm, B.C., and operated by Noranda Exploration Company, Limited (No Personal Liability), 1050 Davie Street, Vancouver, B.C.

<u>Claim Name</u>	<u>Record No.</u>	<u>Units</u>	<u>Expiry Date</u>
Don	001082	2	November 3/84
Fir	000562	3	October 12/85
Pat	000596	2	November 1/84
Silver Gal	002164	6	October 9/84



REVISED	ORELL OPTION	
	LOCATION MAP	
	SILVER LICHEN CLAIM GROUP	
PROJ. No. 25	SURVEY BY: _____	DATE: _____
N.T.S. 32M/3	DRAWN BY: _____	SCALE: 1:50000
DWG. No.	NORANDA EXPLORATION	
	OFFICE: VANCOUVER	

VANCOUVER 11725

INSTRUMENTATION

5.1 Horizontal Loop E.M. Survey

The SE-88 unit differs from the normal HLEM systems such as the MaxMin 11 in that it measures without regard to phase, the ratio of signal amplitude between two frequencies which are transmitted and received simultaneously. A low frequency of 112 Hz is used as a reference frequency. The signal difference is integrated or averaged over a period of time in order to improve the signal to noise ratio thus giving a sensitivity that rivals the normal HLEM in Phase/Quadrature systems.

The survey parameters employed on the follow-up programme are as follows:

Soil Separation	: 100 meters
Frequencies	: 3037, 1012, 337 Hz
Reference Frequency	: 112 Hz
Integration Period	: 16 or 8 seconds
Reading Interval	: 25 meters
Measurement	: ration of amplitude between reference and signal frequencies (%).

5.2 Magnetometer Survey

The magnetometer survey completed on the grid employed a GEM field and base station magnetometer system with a usable reading accuracy of ± 1 gamma. All applicable corrections to the field data were carried out. The magnetic datum is set at 57,600 gammas.


6.0 DISCUSSION OF RESULTS

The final grid was constructed in two work phases. The first grid controlled by the 10000E Baseline was completed during the late winter of 1984. The HLEM survey defined a number of anomalous responses of which only three appear to be of further interest. Those intercepts are located at L.11100N/9850E, L.11200N/9850E, and L.11400N/9760E. These responses suggest the source to be near a surface bedrock conductor of low conductivity and the data also indicates the conductor axis define a contact or boundary between resistive and conductive packages. A weak magnetic dipole (230 nT) was recorded over the anomaly on L.11200N. On Lines 11800N and 12000N the HLEM survey recorded responses typical of a broad underlying conductive package. Note that a typical edge response is recorded at L.12000N/10125E.

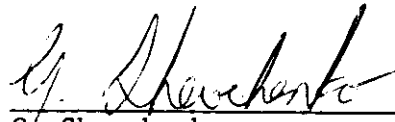
The second grid which is controlled by the 11000E Baseline was constructed and surveyed during the summer of 1984. The HLEM survey identified one source of bedrock conductivity at L.11600N/11100E, however, the large positive shoulder to the grid west would possibly indicate the response is due to the edge of a conductive sheet. Within this anomalous area there is insufficient data to resolve the source of the E.M. response. Additional surveying with a shorter coil spacing would be required. No magnetic signature of interest was recorded over this zone.

7.0 CONCLUSIONS

The geophysical surveys identified one target that warrants a first priority rating. This zone extending from L.11100N/9850E to L.11400N/9760E is a low conductivity bedrock source with weak magnetic response. The second priority area is the "zone" located at 11600N/11100E, however, additional HLEM work is required to better define the source.



L. Bradish



G. Shevchenko

APPENDIX 1
STATEMENT OF COSTS

NORANDA EXPLORATION COMPANY, LIMITED

STATEMENT OF COST

PROJECT *ORELL - SILVER LICHEN GROUP* DATE OCTOBER 1984
TYPE OF REPORT GEOPHYSICS & LINECUTTING

a) Wages:

No. of Days 28

Rate per Day \$ 104.70

Dates From:

Total Wages 28 x \$ 104.70 \$2931.60

b) Food and Accommodation:

No of days 28

Rate per day \$ 40.00

Dates From:

Total Cost 28 x \$40.00 \$1120.00

c) Transportation:

No of days 28

Rate per day \$77.79

Dates From:

Total Cost 28 x \$77.79 \$2178.12

d) Instrument Rental:

Type of Instrument

No of days

Rate per day \$

Dates From:

Total Cost x \$

Type of Instrument

No of days

Rate per day \$

Dates From:

Total Cost x \$

f) Analysis
(See attached schedule)

g) Cost of preparation of Report

Author	\$ 209.40
Drafting	209.40
Typing	209.40

h) Other:

Contractor	\$2000.00
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\$8857.92

Total Cost

e) Unit costs for GEOPHYSICS

No of days 10

No of units 10.2 km

Unit costs 335.52 /km

Total Cost	10.2	x	\$3422.38
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Unit Costs for Linecutting

No. of Days 18

No. of Units 16.2

Unit Costs 335.52/km

TOTAL COST	\$5435.54
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\$8857.92

APPENDIX 11
STATEMENT OF QUALIFICATIONS

STATEMENT OF QUALIFICATIONS

I, Lyndon Bradish of Vancouver, Province of British Columbia, do hereby certify that:

1. I am a Geophysicist residing at 1826 Trutch Street, Vancouver British Columbia.
2. I am a graduate of the University of British Columbia with a B.Sc. (geophysics).
3. I am a member in good standing of the Society of Exploration Geophysicists, Canadian Institute of Mining and the Prospector's and Developer's Association.
4. I presently hold the position of Division Geophysicist with Noranda Exploration Company, Limited and have been in their employ since 1973.

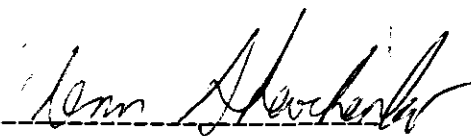


L. Bradish.

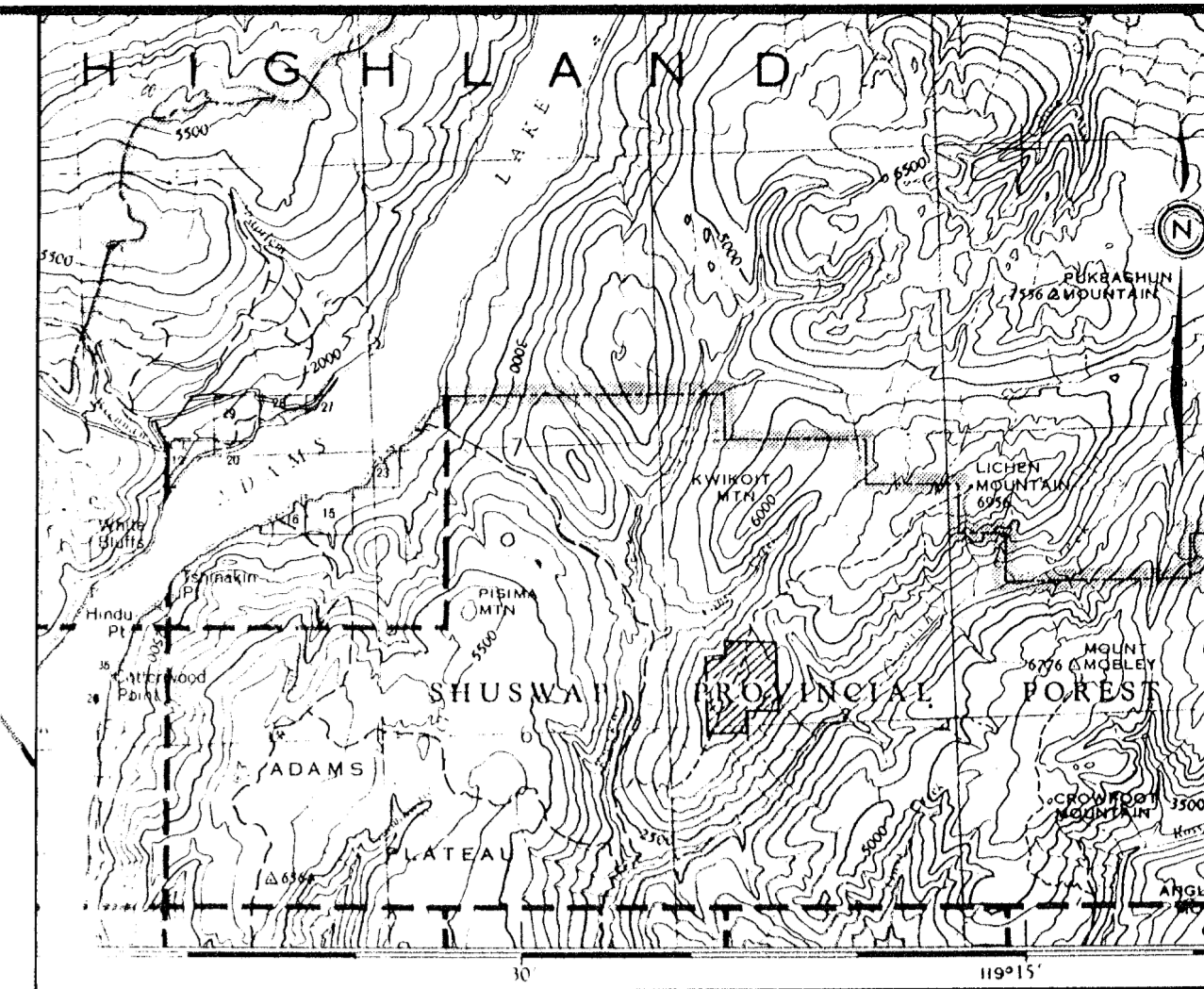
STATEMENT OF QUALIFICATIONS

I, Glenn Shevchenko of the City of Vancouver, Province of British Columbia do hereby certify that:

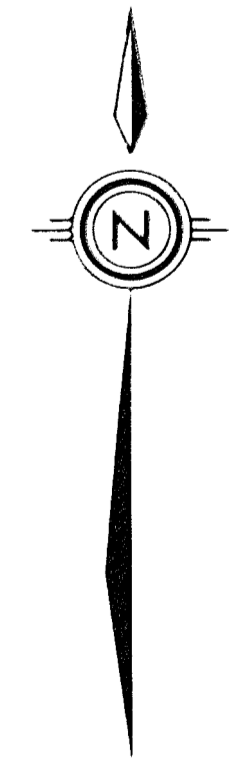
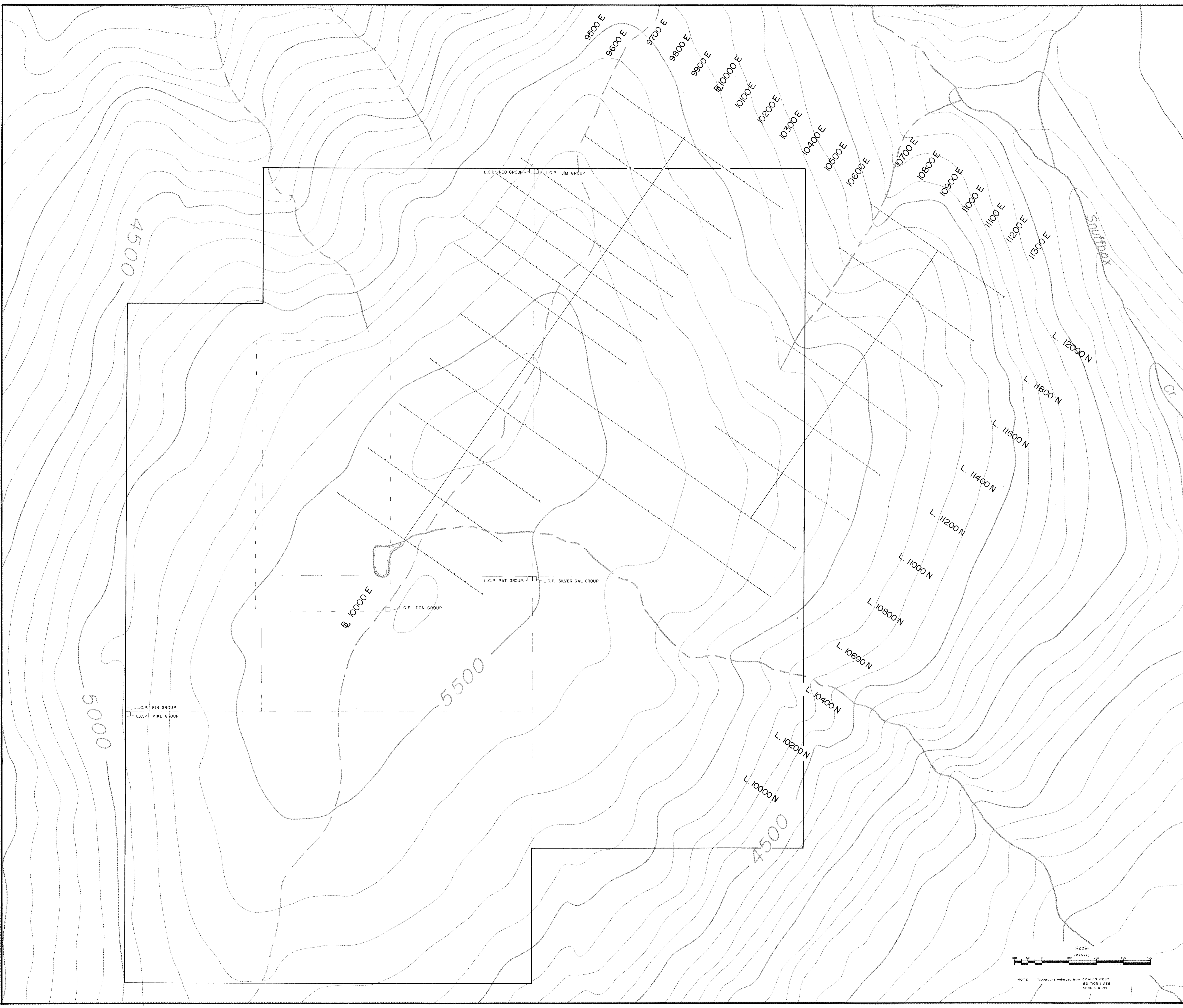
1. I am a graduate of Concordia University, Montreal, Quebec, with a Bachelor of Science Degree in Geology.
2. I have been active in the field of exploration for 8 years.
3. I have been a temporary employee with Noranda Exploration Company, Limited since May, 1984.



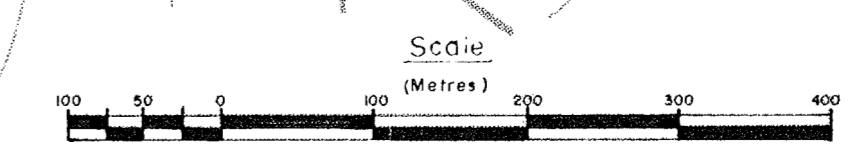
Glenn Shevchenko



Scale 1:250,000

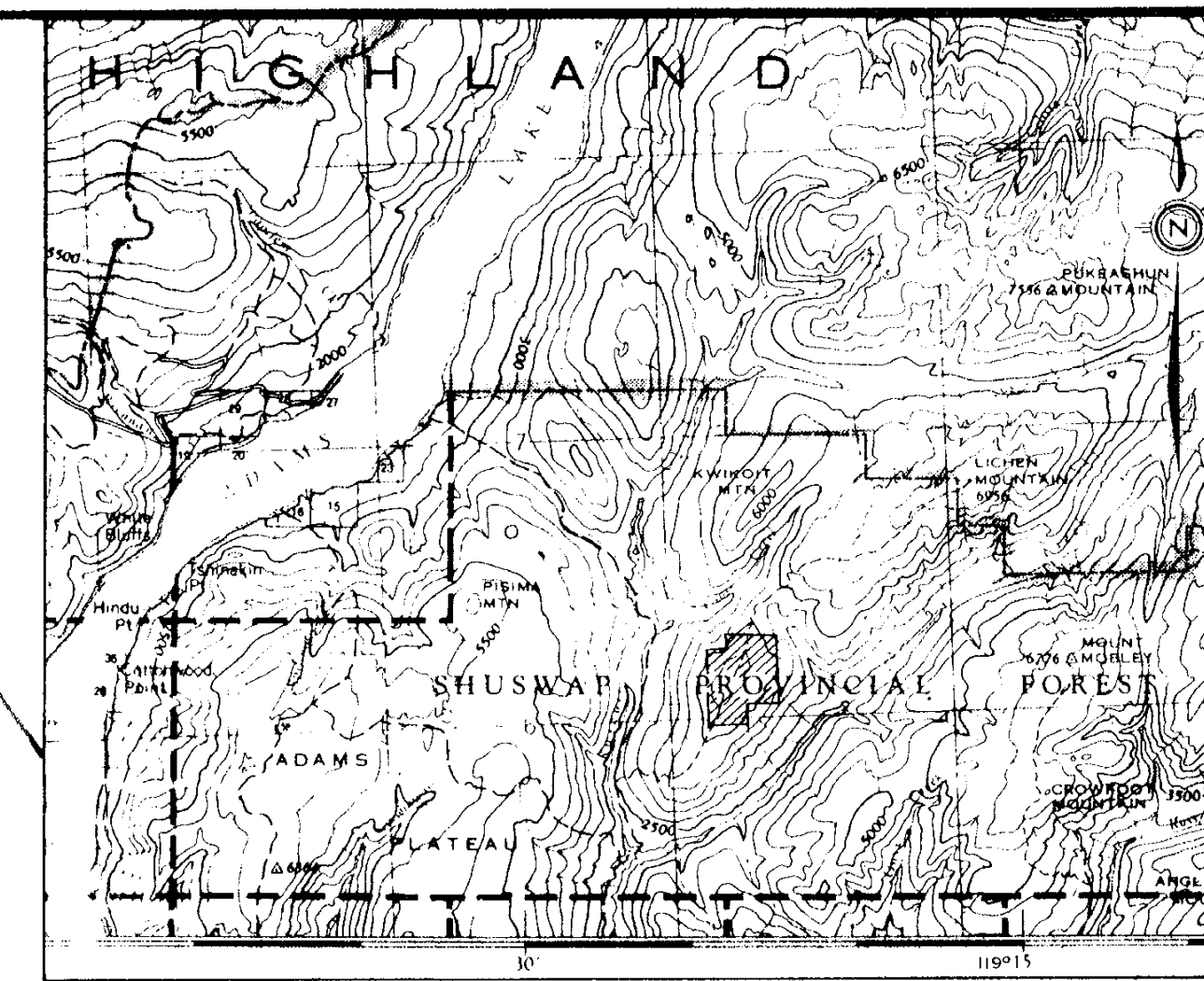


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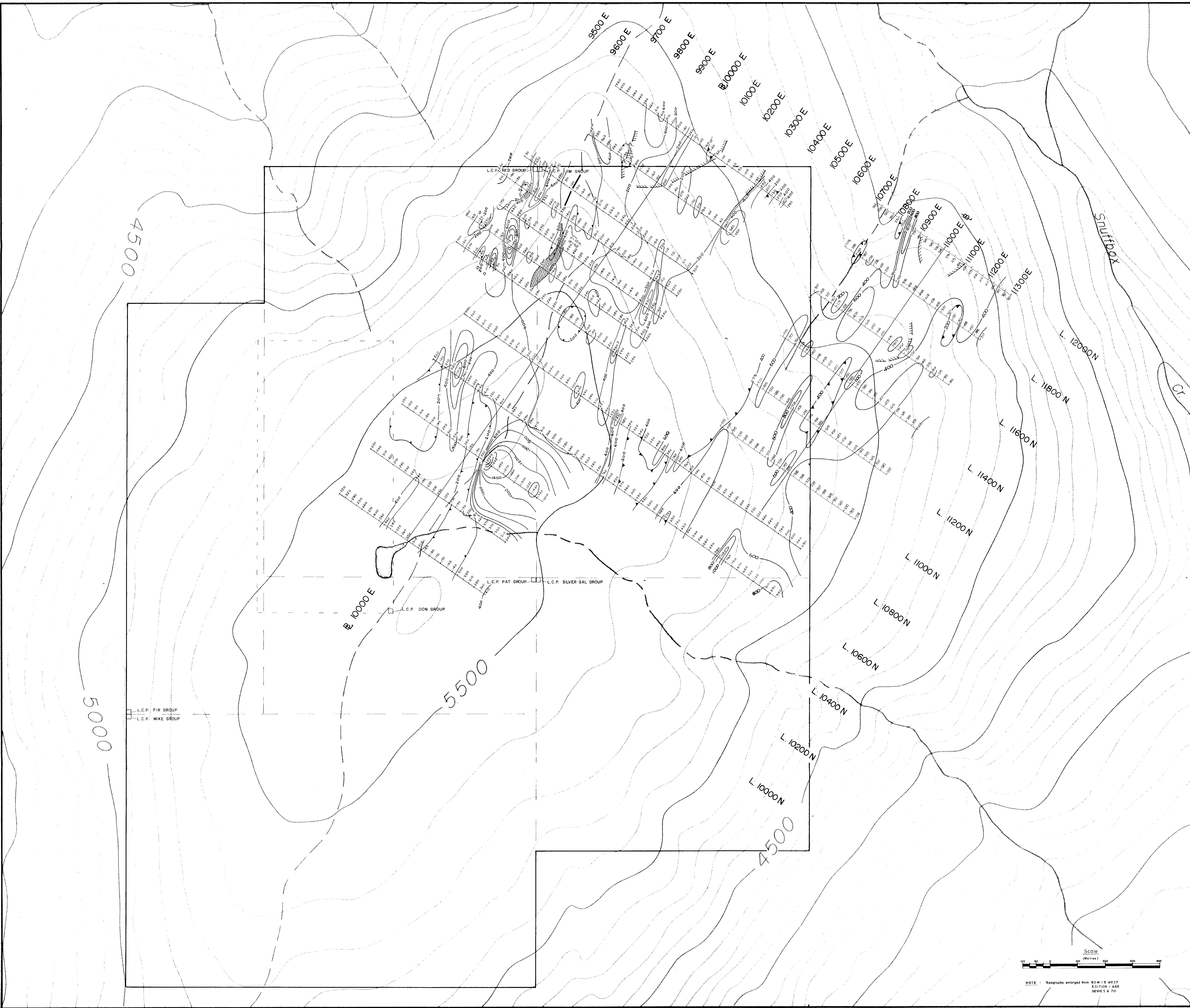


NOTE: Topography enlarged from 92 M / 3 WEST EDITION 1/88E SERIES A 72

REVISED	ORELL JOINT VENTURE	
<i>Ar.</i>		
PROJ. No. 25	SURVEY BY	DATE Apr / 84
N.T.S. B2 M/3 W	DRAWN BY	SCALE 5000
DWG No. 1	NORANDA EXPLORATION	
	OFFICE Vancouver	



FROM NEW EDITION, 1971
 SERIES A 701
 LOCATION MAP
 Scale: 1:250,000

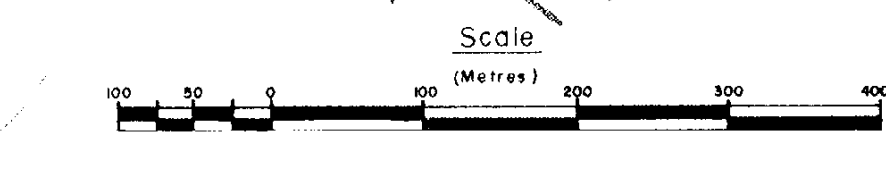
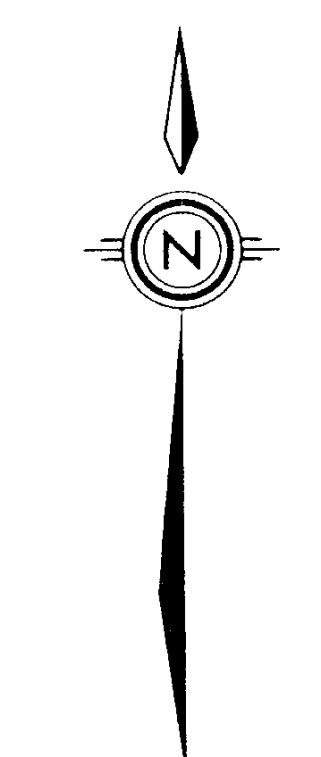


LEGEND

- INSTRUMENT : Ulmimag
- FIELD MEASUREMENT : Total
- DATUM : 57,600^N
- CONTOURS : At 200^m intervals
- SURVEY DATE : Apr. 5, 6 / 84
- OPERATOR : K.L., W.K.
- Conductor axis
- Hires
- Lores

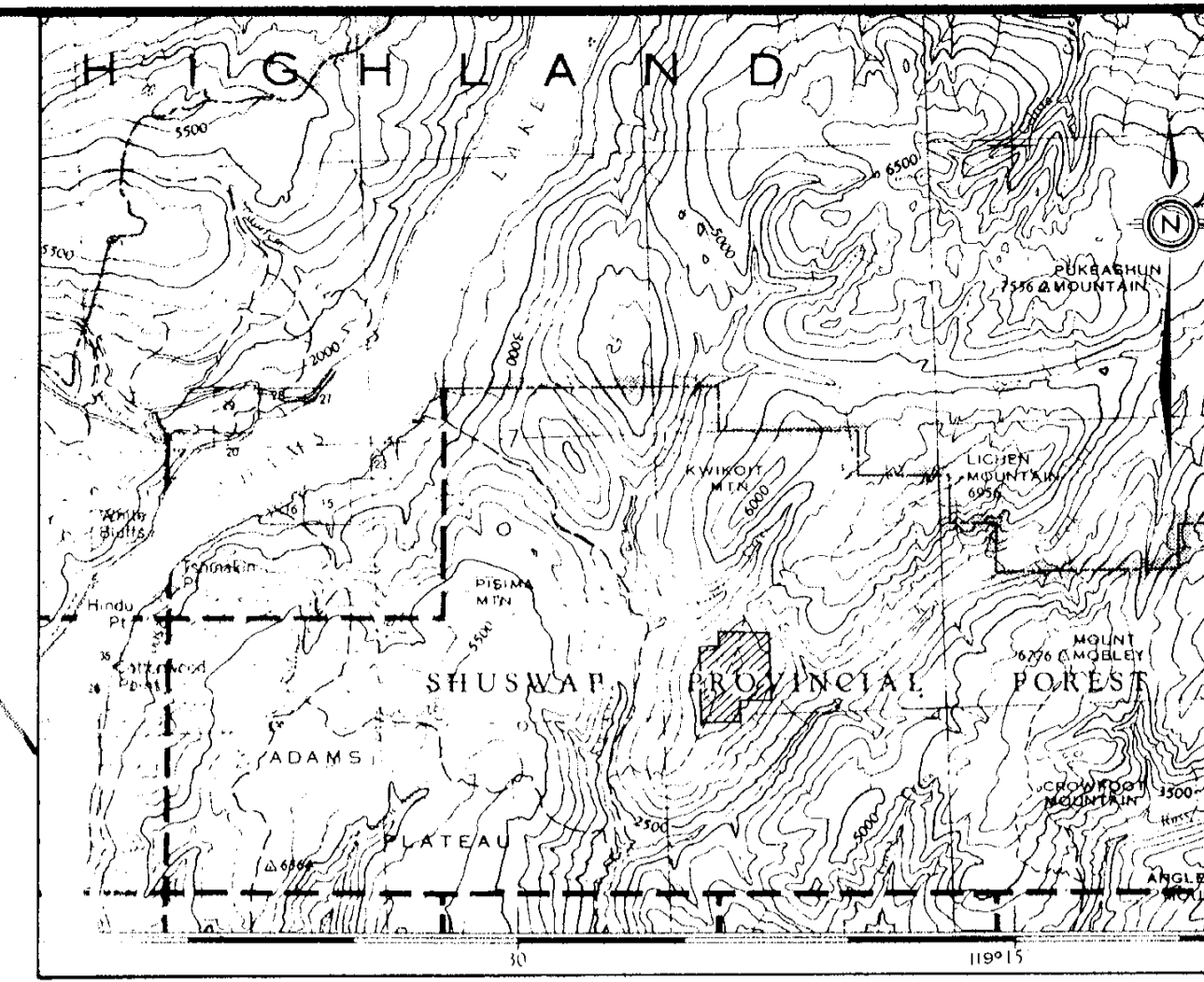
**GEOLOGICAL BRANCH
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NOTE: Topography enlarged from B.M. & WEST EDITION 1 A SE SERIES A 721

REVISED B	ORELL JOINT VENTURE	
	MAGNETOMETER SURVEY	
PROJ. No. 25	SURVEY BY: K.L., W.K.	DATE: Apr / 84
N.T.S. 82 M/3 W	DRAWN BY: W.M.R.	SCALE: 1:5000
DWG. No. 2	NORANDA EXPLORATION	
	OFFICE: Vancouver	

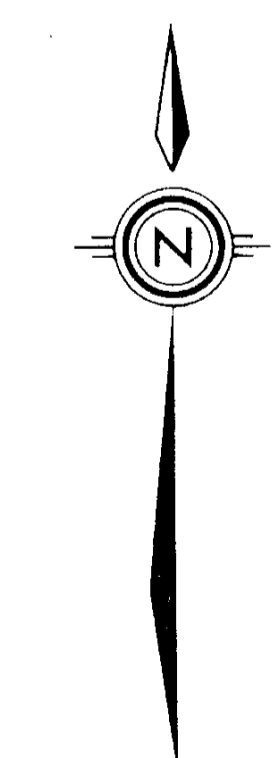


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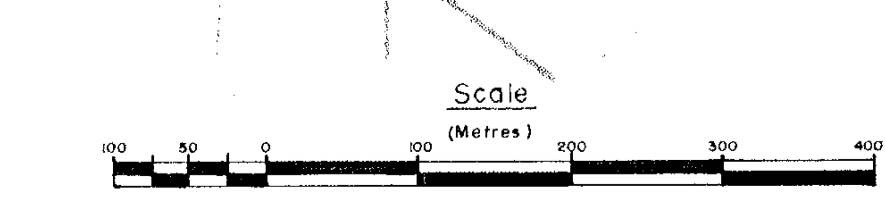


LEGEND

- INSTRUMENT : SE - 88
- COIL SPACING : 100 m.
- FREQUENCY : Low - 337 Hz
Mid - 1012 Hz
High - 3037 Hz
- INTEGRATION TIME : 16 sec.
- REF. FREQ. : 112 sec.
- PROFILE SCALE : 1 cm = 20 %
- Conductor axis
- Hi res.
- Lo res.



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NOTE: Topography enlarged from BC M 73 WEST EDITION 1 A SE SERIES A 721

REVISED	ORELL JOINT VENTURE	
	H.L.E.M. SURVEY	
PROJ. No. 25	SURVEY BY: K.L.	DATE: Apr / 84
N.T.S. 82 M/3 W	DRAWN BY: (traced) W.M.R.	SCALE: 1:5000
DWG No. 3	NORANDA EXPLORATION	
	OFFICE: Vancouver	