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CANADIAN EXPLORATION SERVICES LTD

PALISADE RESOURCES CORP.

**Q2306 – Waldman Professor Property
Magnetometer and VLF EM Surveys**

C Jason Ploeger, P.Geo. – February 27, 2017

PALISADE RESOURCES CORP.

Abstract

CXS was contracted by Palisade Resources Corp. to perform approximately 3.0 kilometres of magnetometer and VLF EM surveys over the Waldman Professor Property.

PALISADE RESOURCES CORP.

**Q2306 – Waldman Professor Property
Magnetometer and VLF EM Surveys**

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TABLE OF CONTENTS

1. SURVEY DETAILS.....3

1.1 PROJECT NAME 3

1.2 CLIENT..... 3

1.3 LOCATION 3

1.4 ACCESS 4

1.5 SURVEY GRID..... 4

2. SURVEY WORK UNDRTAKEN.....5

2.1 SURVEY LOG 5

2.2 PERSONNEL 5

2.3 SURVEY SPECIFICATIONS 5

3. OVERVIEW OF SURVEY RESULTS.....6

3.1 SUMMARY 6

LIST OF APPENDICES

- APPENDIX A: STATEMENT OF QUALIFICATIONS**
- APPENDIX B: THEORETICAL BASIS AND SURVEY PROCEDURES**
- APPENDIX C: INSTRUMENT SPECIFICATIONS**
- APPENDIX D: LIST OF MAPS (IN MAP POCKET)**

LIST OF TABLES AND FIGURES

Figure 1: Location of the Waldman Professor Property 3

Figure 2: Claim Map with the Waldman Professor Traverses 4

Figure 4: Magnetometer Plan of Waldman Professor on Google Earth 6

Table 1: Survey Log..... 5

1. SURVEY DETAILS

1.1 PROJECT NAME

This project is known as the **Waldman Professor Property**.

1.2 CLIENT

Palisade Resources Corp.

69 Young St.
Suite 1010
Toronto, Ontario
M5E 1K3

1.3 LOCATION

The Waldman Professor Property is in Best Township approximately 4.5 km south of Cobalt, Ontario. The survey area covers a portion of mining claim 4275174 located in Gillies Limit Township, within the Larder Lake Mining Division.

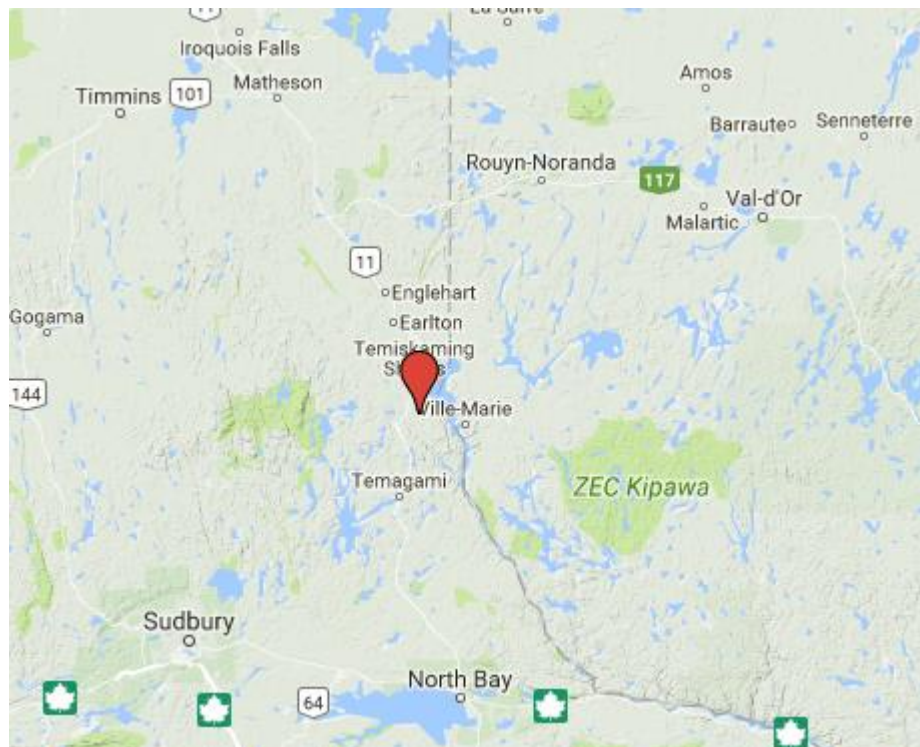


Figure 1: Location of the Waldman Professor Property

1.4 ACCESS

Access to the property was attained with a 4x4 truck on the Silverfields Road. The Silverfields Road heads south from Coleman Road which is accessed by highway 11B approximately 7 kilometres north of Latchford, Ontario.

1.5 SURVEY GRID

The traversed lines were established using a GPS in conjunction with the execution of the survey. The GPS operator would establish sample locations while remaining approximately 12.5m in front of the magnetometer/VLF EM operator. GPS waypoints, magnetic and VLF EM samples were taken every 12.5m along these controlled traverses. The GPS used was a Garmin GPSMAP 62s with an external antenna for added accuracy.

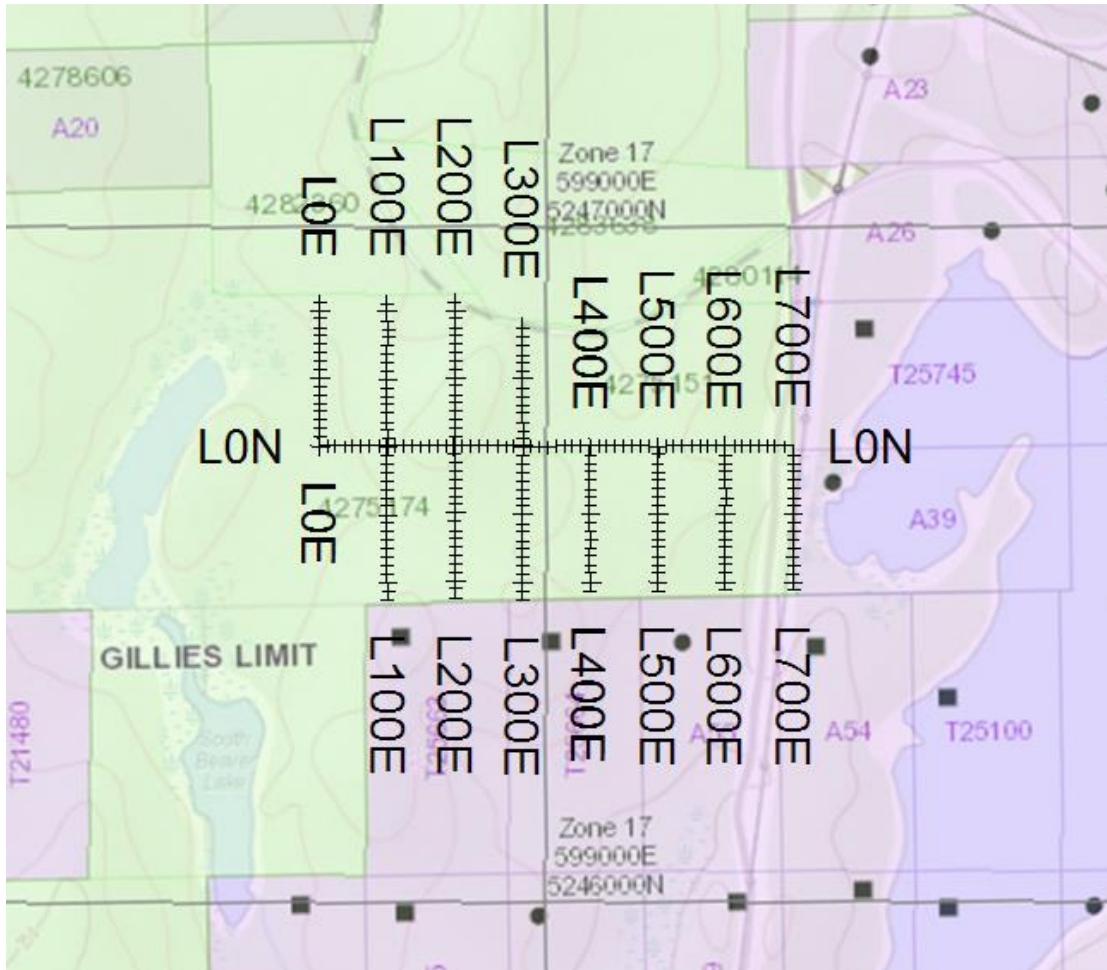


Figure 2: Claim Map with the Waldman Professor Traverses

2. SURVEY WORK UNDERTAKEN

2.1 SURVEY LOG

Date	Description	Line	Min Extent	Max Extent	Total Survey (m)
February 22, 2017	Locate survey area and conduct magnetometer and VLF EM surveys.	0E	0N	225N	225
		100E	225S	225N	450
		200E	225S	225N	450
		300E	225S	187.5N	412.5
		400E	212.5S	0N	212.5
		500E	212.5S	0N	212.5
		600E	212.5S	0N	212.5
		700E	212.5S	0N	212.5
		0N	0E	700E	700

Table 1: Survey Log

2.2 PERSONNEL

Ryan Lavalley of Sudbury, Ontario conducted all the magnetic data collection while Claudia Moraga of Britt, Ontario was responsible for the GPS control and GPS way-point collection.

2.3 SURVEY SPECIFICATIONS

The survey was conducted with a GSM-19 v7 Overhauser magnetometer/VLF with a second GSM-19 magnetometer for a base station mode for diurnal correction.

A total of 3.0875 line kilometers of magnetometer was read over the Waldman Professor Property on February 22, 2017. This consisted of 96 magnetometer samples taken at a 12.5 metre sample interval.

3. OVERVIEW OF SURVEY RESULTS

3.1 SUMMARY

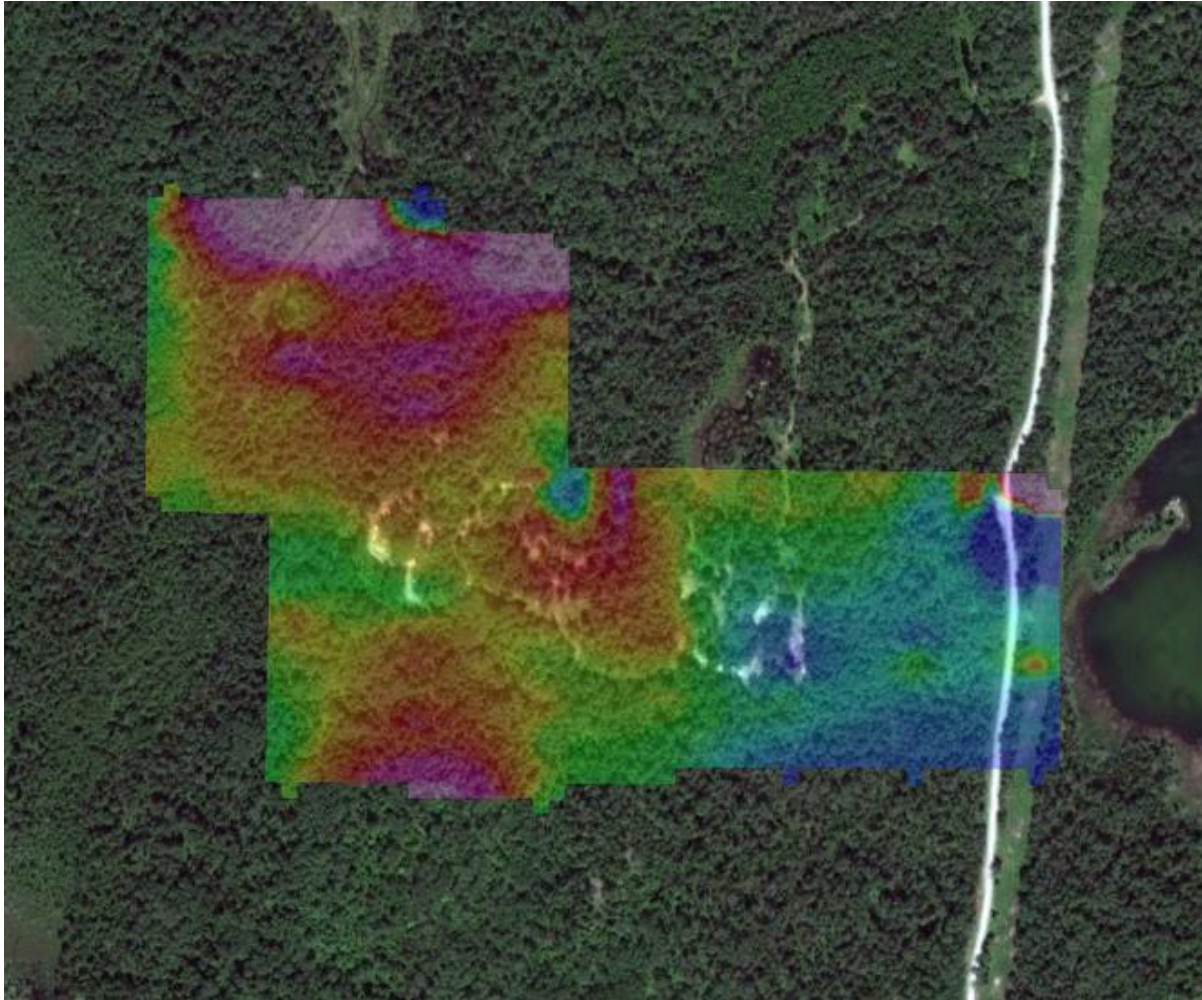


Figure 3: Magnetometer Plan of Waldman Professor on Google Earth

Culture was noted on the east side of the survey area, which represented a road and power line corridor. This corridor appeared to affect the data in both the magnetic and VLF EM readings.

The magnetometer survey indicates the presence of various magnetic signatures. The north region of the survey is characterized by an elevated magnetic response. This most likely represents an outcropping of Nipissing Diabase. This signature appears to extend southward but is subdued, which most likely indicates the diabase dips either below another rock unit, such as a sediment, or below overburden.

Magnetically depressed linear signatures occur over the property. These most likely represent areas of magnetite depletion which are related structural alteration. These make zones will make ideal targets for further exploration.

The VLF response appears to be associated with a narrow trend of magnetically elevated points. This may represent a mineralized band or contact, or a strong resistivity contrast between geologic units.

APPENDIX A

STATEMENT OF QUALIFICATIONS

I, C. Jason Ploeger, hereby declare that:

1. I am a professional geophysicist with residence in Larder Lake, Ontario and am presently employed as a Geophysicist and Geophysical Manager of Canadian Exploration Services Inc. of Larder Lake, Ontario.
2. I am a Practising Member of the Association of Professional Geoscientists, with membership number 2172.
3. I graduated with a Bachelor of Science degree in geophysics from the University of Western Ontario, in London Ontario, in 1999.
4. I have practiced my profession continuously since graduation in Africa, Bulgaria, Canada, Mexico and Mongolia.
5. I am a member of the Ontario Prospectors Association, a Director of the Northern Prospectors Association and a member of the Society of Exploration Geophysicists.
6. I do not have nor expect an interest in the properties and securities of **Palisade Resources Corp.**
7. I am responsible for the final processing and validation of the survey results and the compilation of the presentation of this report. The statements made in this report represent my professional opinion based on my consideration of the information available to me at the time of writing this report.



C. Jason Ploeger, P.Geo., B.Sc.
Geophysical Manager
Canadian Exploration Services Inc.

Larder Lake, ON
February 27th, 2017

APPENDIX B

THEORETICAL BASIS AND SURVEY PROCEDURES

TOTAL FIELD MAGNETIC SURVEY

Base station corrected Total Field Magnetic surveying is conducted using at least two synchronized magnetometers of identical type. One magnetometer unit is set in a fixed position in a region of stable geomagnetic gradient, and away from possible cultural effects (i.e. moving vehicles) to monitor and correct for daily diurnal drift. This magnetometer, given the term 'base station', stores the time, date and total field measurement at fixed time intervals over the survey day. The second, remote mobile unit stores the coordinates, time, date, and the total field measurements simultaneously. The procedure consists of taking total magnetic measurements of the Earth's field at stations, along individual profiles, including Tie and Base lines. A 2 meter staff is used to mount the sensor, in order to optimally minimize localized near-surface geologic noise. At the end of a survey day, the mobile and base-station units are linked, via RS-232 ports, for diurnal drift and other magnetic activity (ionospheric and spheric) corrections using internal software.

For the gradiometer application, two identical sensors are mounted vertically at the ends of a rigid fiberglass tube. The centers of the coils are spaced a fixed distance apart (0.5 to 1.0m). The two coils are then read simultaneously, which alleviates the need to correct the gradient readings for diurnal variations, to measure the gradient of the total magnetic field.

VLF EM SURVEY

The frequency domain VLF electromagnetic survey is designed to measure both the vertical and horizontal in-phase (IP) and Quadrature (OP) components of the anomalous field from electrically conductive zones. The sources for VLF EM surveys are several powerful radio transmitters located around the world which generate EM radiation in the low frequency band of 15-25kHz. The signals created by these long-range communications and navigational systems may be used for surveying up to several thousand kilometers away from the transmitter. The quality of the incoming VLF signal can be monitored using the field strength. A field strength above 5pT will produce excellent quality results. Anything lower indicates a weak signal strength, and possibly lower data quality. A very low signal strength (<1pT) may indicate the radio station is down.

The EM field is planar and horizontal at large distances from the EM source. The two components, electric (E) and magnetic (H), created by the source field are orthogonal to each other. E lies in a vertical plane while H lies at right angles to the direction of propagation in a horizontal plane. In order to ensure good coupling, the strike of possible conductors should lie in the direction of the transmitter to allow the H vector to pass through the anomaly, in turn, creating a secondary EM field.

The VLF EM receiver has two orthogonal aeriels which are tuned to the frequency of

the transmitting station. The direction of the source station is located by rotating the sensor around a vertical axis until a null position is found. The VLF EM survey procedure consists of taking measurements at stations along each line on the grid. The receiver is rotated about a horizontal axis, right angles to the traverse and the tilt recorded at the null position.

APPENDIX C

GSM 19



Specifications

Overhauser Performance

- Resolution: 0.01 nT
- Relative Sensitivity: 0.02 nT
- Absolute Accuracy: 0.2nT
- Range: 20,000 to 120,000 nT
- Gradient Tolerance: Over 10,000nT/m
- Operating Temperature: -40°C to +60°C

Operation Modes

- Manual: Coordinates, time, date and reading stored automatically at min. 3 second interval.
- Base Station: Time, date and reading stored at 3 to 60 second intervals.
- Walking Mag: Time, date and reading stored at coordinates of fiducial.
- Remote Control: Optional remote control using RS-232 interface.
- Input/Output: RS-232 or analog (optional) output using 6-pin weatherproof connector.

Operating Parameters

- Power Consumption: Only 2Ws per reading. Operates continuously for 45 hours on standby.
- Power Source: 12V 2.6Ah sealed lead acid battery standard, other batteries available
- Operating Temperature: -50°C to +60°C

Storage Capacity

- Manual Operation: 29,000 readings standard, with up to 116,000 optional. With 3 VLF stations: 12,000 standard and up to 48,000 optional.
- Base Station: 105,000 readings standard, with up to 419,000 optional (88 hours or 14 days uninterrupted operation with 3 sec. intervals)
- Gradiometer: 25,000 readings standard, with up to 100,000 optional. With 3 VLF stations: 12,000, with up to 45,000 optional.

Omnidirectional VLF

Performance Parameters: Resolution 0.5% and range to $\pm 200\%$ of total field.
Frequency 15 to 30 kHz.

Measured Parameters: Vertical in-phase & out-of-phase, 2 horizontal components, total field coordinates, date, and time.

Features: Up to 3 stations measured automatically, in-field data review, displays station field strength continuously, and tilt correction for up to $\pm 10^\circ$ tilts.

Dimensions and Weights: 93 x 143 x 150mm and weighs only 1.0kg.

Dimensions and Weights

Dimensions:

Console: 223 x 69 x 240mm

Sensor: 170 x 71mm diameter cylinder

Weight:

Console: 2.1kg

Sensor and Staff Assembly: 2.0kg

Standard Components

GSM-19 magnetometer console, harness, battery charger, shipping case, sensor with cable, staff, instruction manual, data transfer cable and software.

Taking Advantage of a “Quirk” of Physics

Overhauser effect magnetometers are essentially proton precession devices except that they produce an order-of magnitude greater sensitivity. These "supercharged" quantum magnetometers also deliver high absolute accuracy, rapid cycling (up to 5 readings / second), and exceptionally low power consumption.

The Overhauser effect occurs when a special liquid (with unpaired electrons) is combined with hydrogen atoms and then exposed to secondary polarization from a radio frequency (RF) magnetic field. The unpaired electrons transfer their stronger polarization to hydrogen atoms, thereby generating a strong precession signal-- that is ideal for very high-sensitivity total field measurement. In comparison with proton precession methods, RF signal generation also keeps power consumption to an absolute minimum and reduces noise (i.e. generating RF frequencies are well out of the bandwidth of the precession signal).

In addition, polarization and signal measurement can occur simultaneously - which enables faster, sequential measurements. This, in turn, facilitates advanced statistical averaging over the sampling period and/or increased cycling rates (i.e. sampling speeds).

- The unique Overhauser unit blends physics, data quality, operational efficiency, system design and options into an instrumentation package that ... ex-

ceeds proton precession and matches costlier optically pumped cesium capabilities

APPENDIX C

GARMIN GPS MAP 62S



Physical & Performance:	
Unit dimensions, WxHxD:	2.4" x 6.3" x 1.4" (6.1 x 16.0 x 3.6 cm)
Display size, WxH:	1.43" x 2.15" (3.6 x 5.5 cm); 2.6" diag (6.6 cm)
Display resolution, WxH:	160 x 240 pixels
Display type:	transflective, 65-K color TFT
Weight:	9.2 oz (260.1 g) with batteries
Battery:	2 AA batteries (not included); NiMH or Lithium recommended
Battery life:	20 hours
Waterproof:	yes (IPX7)
Floats:	no
High-sensitivity receiver:	yes

Interface:	high-speed USB and NMEA 0183 compatible
------------	---

Maps & Memory:	
Basemap:	yes
Preloaded maps:	no
Ability to add maps:	yes
Built-in memory:	1.7 GB
Accepts data cards:	microSD™ card (not included)
Waypoints/favorites/locations:	2000
Routes:	200
Track log:	10,000 points, 200 saved tracks

Features & Benefits:	
Automatic routing (turn by turn routing on roads):	yes (with optional mapping for detailed roads)
Electronic compass:	yes (tilt-compensated, 3-axis)
Touchscreen:	no
Barometric altimeter:	yes
Camera:	no
<u>Geocaching-friendly:</u>	yes (paperless)
<u>Custom maps compatible:</u>	yes
Photo navigation (navigate to geotagged photos):	yes
Outdoor GPS games:	no
Hunt/fish calendar:	yes

Sun and moon information:	yes
Tide tables:	yes
Area calculation:	yes
Custom POIs (ability to add additional points of interest):	yes
Unit-to-unit transfer (shares data wirelessly with similar units):	yes
Picture viewer:	yes
Garmin Connect™ compatible (online community where you analyze, categorize and share data):	yes

- *Specifications obtained from www.garmin.com*

APPENDIX D

LIST OF MAPS (IN MAP POCKET)

Magnetometer Plan Map (1:2500)

- 1) Q2306-PALISADE-WALDMAN PROFESSOR-Mag-Cont

VLF EM Plan Map (1:2500)

- 2) Q2306-PALISADE-WALDMAN PROFESSOR-VLF-NML

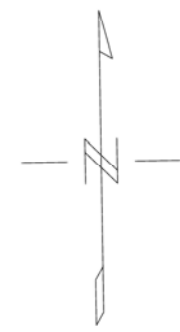
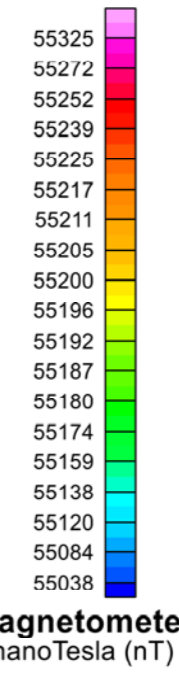
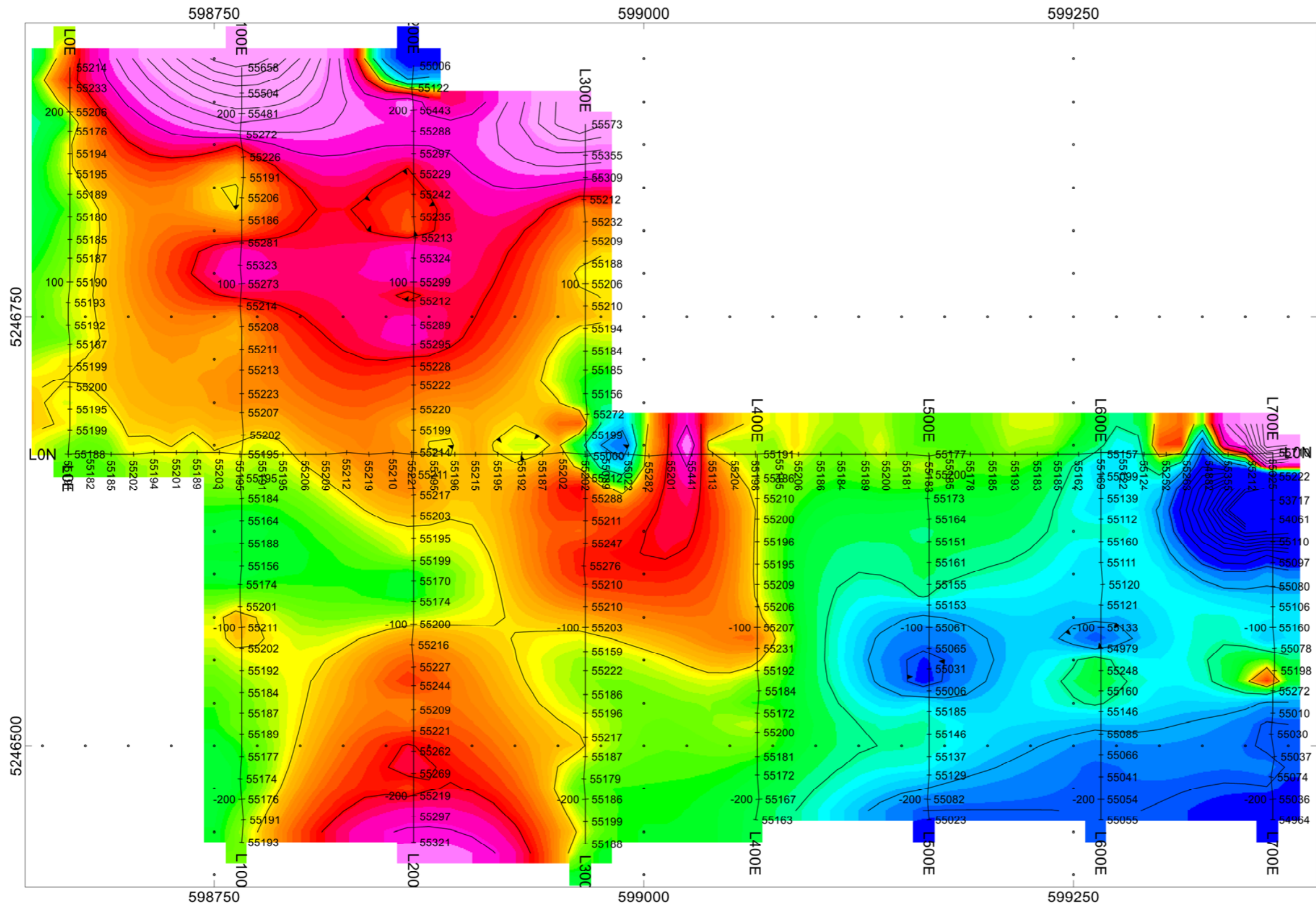
Claim Map with Magnetic Traverses (1:20000)

- 3) Q2306-PALISADE-WALDMAN PROFESSOR-Traverses

TOTAL MAPS = 3

877.504.2345 | info@cxsltd.com | www.cxsltd.com





PALISADE RESOURCES CORP.

WALDMAN PROFESSOR PROPERTY
Gillies Limit Township, Ontario

TOTAL FIELD MAGNETIC CONTOURED PLAN MAP
Base Station Corrected

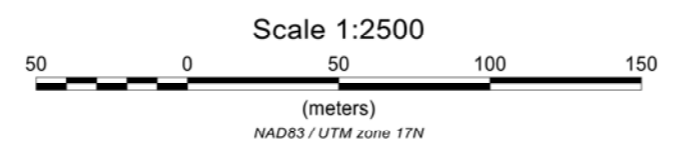
Posting Level: 0nT
Field Inclination/Declination: 74degN/12degW
Station Separation: 12.5 meters
Total Field Magnetic Contours: 50nT

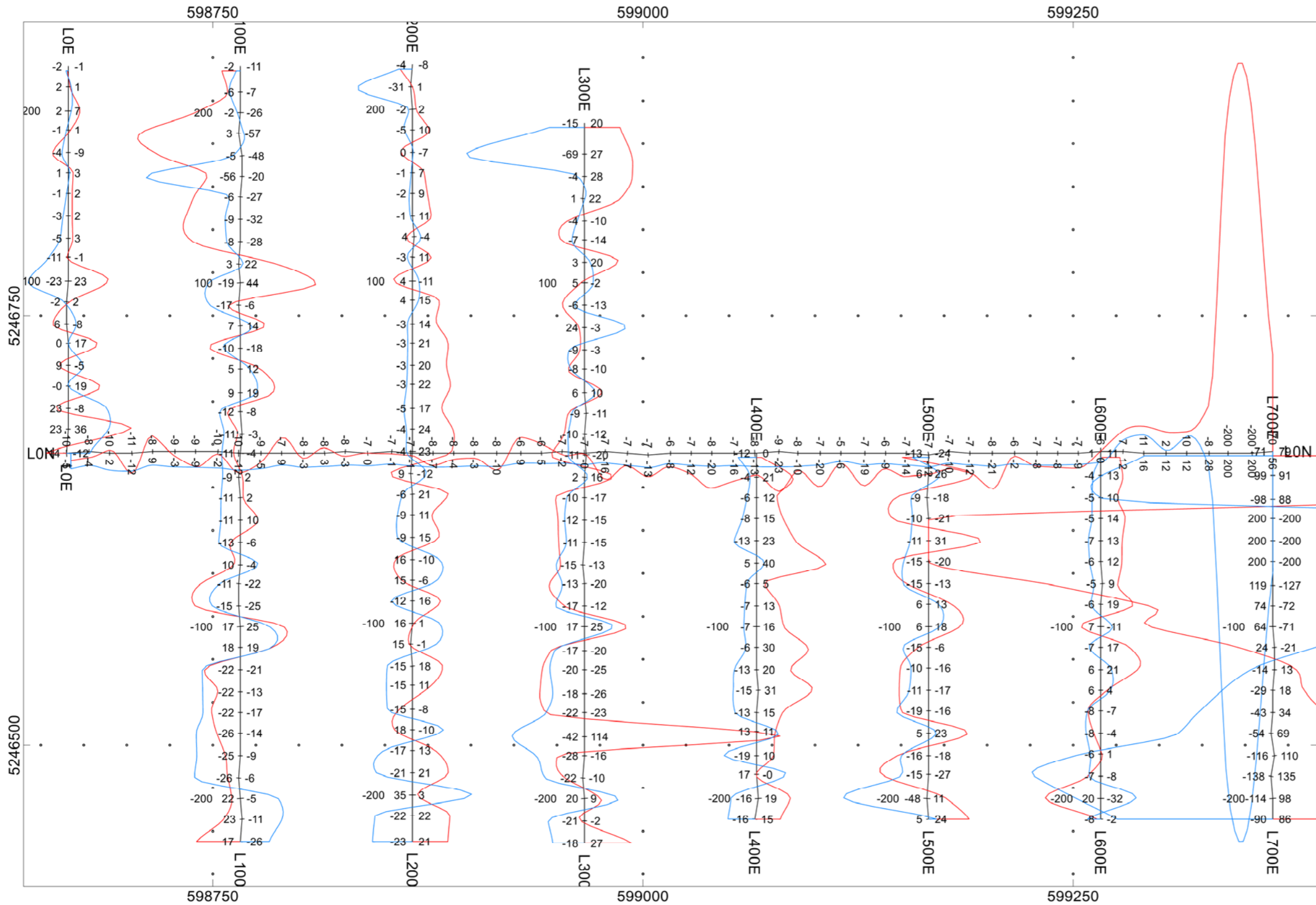
GSM-19 OVERHAUSER MAGNETOMETER/VLF v7

Operated By: Ryan Lavalley
GPS Operated By: Claudia Moraga
Processed by: Claudia Moraga
Map Drawn By: C Jason Ploeger, P.Geo.
February 2017



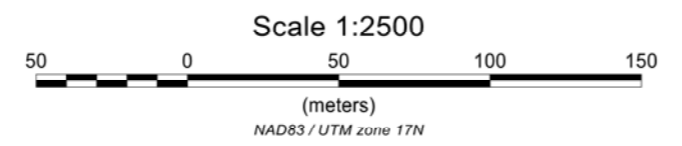
Drawing: Q2307-PALISADE-WALDMAN PROFESSOR-MAG-CONT





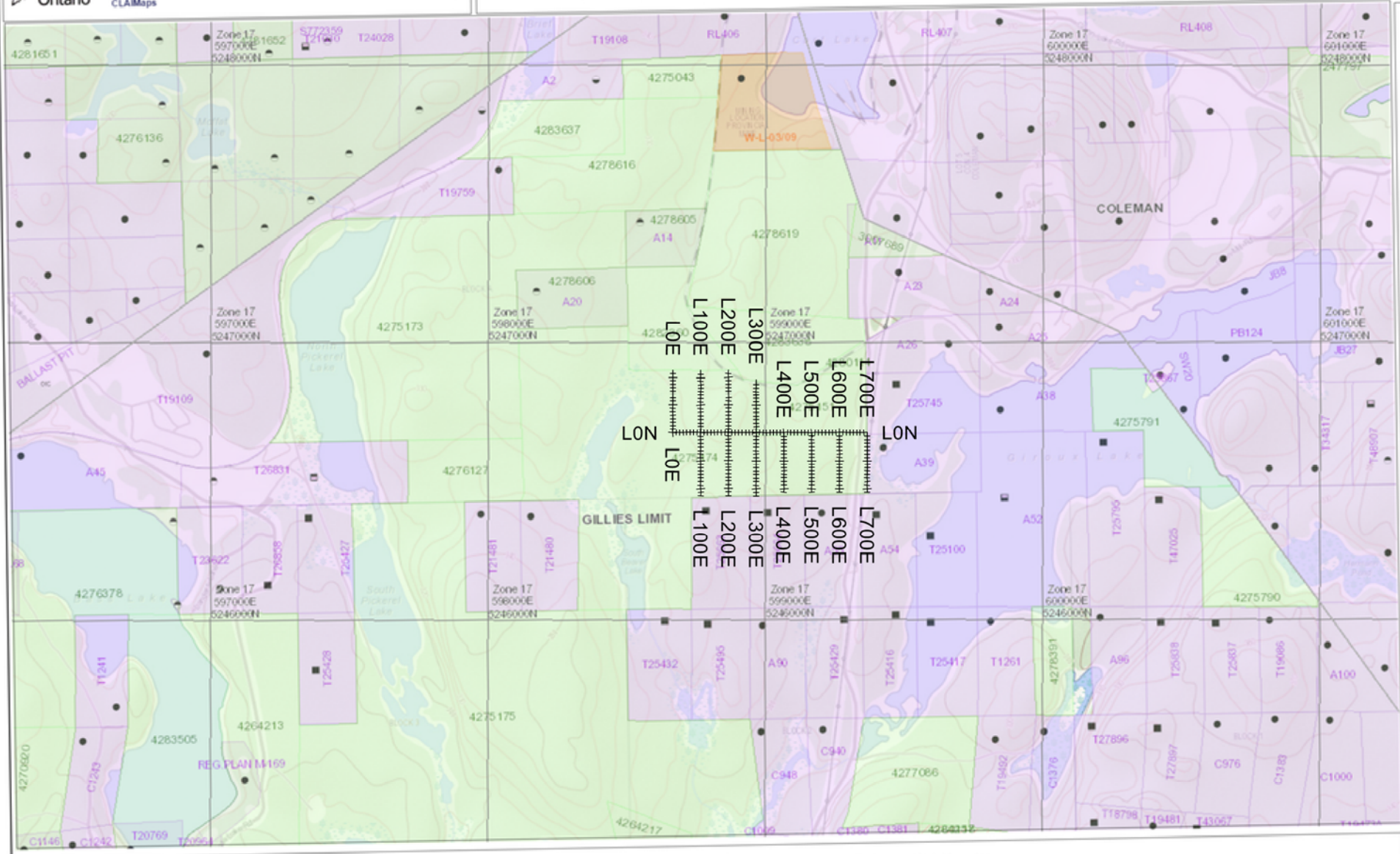
PALISADE RESOURCES CORP.
WALDMAN PROFESSOR PROPERTY
Gillies Limit Township, Ontario

VLF IN PHASE/OUT PHASE PROFILE
 25.2kHz NML - LaMORE USA
 In Phase: Posted Right/Bottom (Red)
 Out Phase: Posted Left/Top (Blue)
 Vertical Profile Scales: 2.5 %/mm
 Station Separation: 12.5 meters
 Posting Level: 0
 GSM-19 VLF v7



Operated By: Ryan Lavalley
 GPS Operated By: Claudia Moraga
 Processed by: Claudia Moraga
 Map Drawn By: C Jason Ploeger, P.Geo.
 February 2017





Legend

- Administration Boundaries**
 - Strong Divisions
 - Resident Geogical District
 - Townships and Areas
 - UTM Grid
 - Geographic Lat Fabric
 - Other Federal Land
- Mineral Tenure Grid**
 - Ontario Tenure Grid
- Alienations**
 - Indigenous
 - Notice
- Unpatented Claim**
 - Active
 - Recorded
 - Pending
 - Deposition
- Disposition Symbols**
 - Camp
 - Deposition Unintentional/Pending
 - Freehold Patent Mining Rights Only
 - Freehold Patent Surface Rights Only
 - Freehold Patent Surface and Mining Rights
 - Land Use Permit
 - Leasehold Patent Mining Rights Only
 - Leasehold Patent Surface Rights Only
 - Leasehold Patent Surface and Mining Rights
 - License of Occupation Mining Use Only
 - License of Occupation Surface Use Only
 - License of Occupation Surface and Mining Rights
 - License of Occupation Uses Not Specified
 - Order in Council
 - Tower
 - WPLA
- Geology Layers**
 - ARIS Sites
 - ARIS Features
 - Dike Holes
 - Mineral Occurrences



Projection: Web Mercator



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