NI 43-101
Technical Report

On

The Nicobat Project

Dobie Township
Northwest Ontario (NTS 52C/12NW)

Prepared For

Usha Resources Ltd.

1575 Kamloops Street
Vancouver, B.C. V5K 3W1

July 19th, 2019

Paul Pitman, *B.Sc. P.Geo. Ontario*
Geological Consultant

201 County Court Blvd, Suite 401,
Brampton, Ontario L6X 4L2
Phone: (416)-705-3421
ppitman@sympatico.ca

-and-

Luc Harnois, *PhD, P.Geo. (Ontario & Quebec)*
Geological Consultant at Ronacher McKenzie Geoscience Inc.
2015 Long Lake Road, P.O. Box 40038
Sudbury, Ontario P3E 0B2

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Important Notice

This report was prepared as a National Instrument 43-101 Technical Report, in accordance with Form 43-101F1 for Usha Resources Ltd. ("Usha Res.") by the principal geologist of PWP Consulting ("PWP"). The quality of information, conclusions and estimates herein are consistent with the level of effort involved in the consulting services and are based on the following information available at the time of preparation: (i) data supplied by outside sources, principally regional Government assessment reports and maps; (ii) exploration reports & data prepared by the vendor of the project to Usha Res., Emerald Lake Development Corp. ("Emerald Lake") and Crystal Lake Mining Corp. ("Crystal Lake") consultants (iii) independent assay laboratory results; (iv) conversations with Emerald Lake corporate officers and consultants; and (v) the assumptions, conditions, and qualifications as set forth in this report. This report is intended to be used by Usha Res. for filing as a Technical Report with Canadian Securities Regulatory Authorities containing updated material post a previous unfiled technical report dated July 15th, 2016. The project name has been changed from the Allen Project to the Nicobat Project.

This report may contain many forward-looking statements, within the meaning of the "safe-harbor" provision of the Private Securities, Litigation Reform Act of 1995, regarding Usha Res. business. Actual results could differ from those described in this report because of numerous factors, some of which are outside of the control of the author.

The authors are Paul Pitman and Luc Harnois, both Qualified Persons ("Q.P.") under the definition of National Instrument 43-101;both are registered in Ontario by PGO.

Paul Pitman, *B.Sc. P.Geo.*
Geological Consultant
201 County Court Blvd, Suite 401, Brampton,
Ontario L6X 4L2
Phone: (416)-705-3421
ppitman@sympatico.ca

Usha Resources Ltd.

SUMMARY
NICOBAT PROJECT

The NICOBAT Project (patents L-1/L-5) properties were original acquired on July, 2015 by ***Emerald Lake Development Corporation*** *for the properties potential in hosting copper, nickel and cobalt metals within the Dobie Mafic Intrusion.* ***Crystal Lake Mining Corp*** *("Crystal Lake") currently holds a 15% property interest subject to a 2% NSR interest. A 51% interest has been negotiated in an amended agreement on behalf of Usha Resources Ltd. ("Usha Res.").*

The NICOBAT Cu –Ni–Co polymetallic sulphide mineralized zone is located in Dobie Township, Concession 1, parts of Lot 9, approximately six kilometers west of the village of Emo, and 42 kilometers west of the town of Fort Francis, Ontario along Highway #11. The property is immediately adjacent to Manitou Rapids Indian Reserve #11.

In 2015 a farm house was purchased for the purpose of accommodation, core storage etc. As the farm only has surface rights a mining claim was staked over the farm property but neither is included in this revised NI 43-101 report other than to report that core is stored on the Farm property. The Farm property does not form part of the purchase agreement with Usha Res.

Historically, the Dobie Mafic Intrusion was explored from 1952 to 1972 with prospecting, trenching, soil sampling, ground geophysical surveys (magnetic, electromagnetic, induced polarization and resistivity); diamond drilling including over 220 drill holes, large diameter rotary percussion holes; and metallurgical studies on numerous bulk samples from a pit dug on the property. Not all of this work is publically available or filed in Government mining files.

Historical drilling outlined a mafic norite mineralized body measuring 335m in N-S strike, 275m in width, and 305m explored depth with a predicted plunge of 30 to 45 degrees north. Stratmat Limited (1956) reported a potential resource of 6.4 million tonnes of polymetallic sulphides. Chibtown Copper Corporation (1966) reported "indicated reserves" of 4.8 million tonnes grading 0.28% Cu, 0.24% Ni, 0.05% Co. These tonnages are mentioned here as historical results, a qualified person has not done sufficient work to classify the historical estimates mentioned above as current mineral resources or mineral reserves. The Company is not treating these historical estimates as current mineral resources or mineral reserves. No attempt at calculating a new resource using the historical data has been carried out by the previous owners (Crystal Lake or Emerald Lake) as key assumptions and methods used to prepare the historical estimates are not known. The original data are no longer available and the ground would have to be re- drilled should Usha Res. wish to provide its' investors with a resource calculation. The current mineralized zone name is referred to as Nico 1.

The mineralized body was described in the historical Government assessment data records as being comprised of at least seven high – grade "ribs or shoots", each being from 3.65m to 12m in width. One "rib or shoot", Chibtown's No.1 body, was said to contain, from surface to 105m, 204,000 tonnes grading 0.65% Cu, 0.87% Ni. The other six "ribs or shoots" were not similarly documented. All "ribs or shoots" were identified as being surrounded and enclosed within a larger body of lower-grade disseminated sulphides as described in the previous paragraph. As noted above a qualified person has not done any work to classify the historical estimate of the No. 1 body as a current mineral resource.

Prior to Usha Res.'s involvement the NICOBAT copper-nickel mineralization (Nico 1) and the surrounding area contained within the two parents was considered to have potential for additional mineralized zones of polymetallic sulphides rich in Cu –Ni –Co and PGE as well as continued exploration of the known NICOBAT mineralized zone to depth. In 2016 the roots of the mineralized zone at depth and related parts of the Dobie intrusion offered a focus for further exploration using electromagnetic methods to test for high-grade massive Ni-Cu-Co sulphide mineralization. This work was carried out in 2018, examined by the author, and documented in this report.

This review and interpretation of current exploration data on the NICOBAT Project leads the writer to conclude that the area continues to exhibit potential for (principally) copper-nickel-bearing mineralization to depth. Usha Res. proposed work in this area appears to be well-justified and well-focused and has some potential for success using geochemical surveys to guide future drilling. Drill core and surface samples from the mineralized zone (named Nico 1) contain disseminated through semi-massive magmatic-textured pyrrhotite, pentlandite and chalcopyrite mineralization hosted by pyroxenite. The semi-massive sulphide mineralization and mafic inclusions comprise a magmatic breccia within a broader unit of pyroxenite with disseminated sulphides. These geological relationships are commonly encountered in magmatic sulphide ore deposits and support the importance of effectively testing the rocks developed above the contact of the intrusion beneath the mineralization

It is suggested that a budget of $250,000 be used to carry out additional work on the Dobie patents to establish the potential for deeper mineralization. Further work would be dependent on the result of this proposed drilling.

Respectfully Submitted

{SIGNED AND SEALED}

Paul Pitman, *B.Sc. P.Geo.*
Geological Consultant
201 County Court Blvd, Suite 401,
Brampton, Ontario L6X 4L2
Phone: (416)-705-3421

{SIGNED AND SEALED}

Luc Harnois*, PhD, P.Geo.*
Ronacher McKenzie Geoscience Inc.
2015 Long Lake Road (P.O. Box 40038)
Sudbury, Ontario, P3E 0B2

2.0 INTRODUCTION AND TERMS OF REFERENCE

The following Technical Report ("the Report") presents the exploration potential of the NICOBAT Project ("NICOBAT") situated in northwestern Ontario, Canada. The closest settlement with road access is the small village of Emo located 6km to the east along highway 11. Road access is excellent. This Report was prepared at the request of **Usha Resources Ltd.** ("Usha Res. or "the Company"), a junior resource company incorporated in British Columbia, with its offices located at Vancouver, B.C. This report is current as of July 19th, 2019. Usha Res. is listed on the TSX Venture Exchange as a Capital Pool Company.

The purpose of the report is to provide an independent, updated, NI 43-101 compliant report by presenting all known facts related to the NICOBAT project and to present recommendations to the Board of Usha Res. on whether further exploration is warranted. Usha Res. has accepted that the qualifications, expertise, experience, competence and professional reputation of the principal Q.P. of this report is appropriate and relevant for the preparation of this Report. Paul Pitman of *PWP* Consulting had been involved in exploration in the Emo area over a period of several years, and in fact, was present at the discovery of Nuinsco Resources high-grade nickel #34 Zone located to the north of the patents. Mr. Pitman's experience for nickel also includes that of discovery of the Lac Rocher (Quebec) nickel-copper deposit on behalf of Nuinsco Resources.

Units and Currency

The metric system is used for units of measurement in this report, except for historical figures as specified in the report and for the sizes of mineral claims and patents which are given in acres. All dollar amounts are in Canadian funds. A list of abbreviations and definitions is provided in Table 1.

Sources of Information

The information, conclusions, opinions, and estimates contained herein are based upon information available to the P.Geo. at the time of preparation of this updated report. The data, reports and opinions supplied by other consultants and other third party sources are listed as references. The Q.P. has read all exploration reports prepared by consultants for the Company including, but not limited to, drill logs, and has verified analytical results by reviewing original documents received from Activation Laboratories ("Actlabs") of Ancaster, Ontario and SGS Canada. Both laboratories are full service certified labs offering analytical procedures.

All of the historical work that was done on the property prior to 2015 pre-dated the creation of National Instrument 43-101. This work was carried out under industry standards prevalent at the time and the P.Geo. has no reason to doubt its authenticity. An extensive review of public scientific reports published by and in the Ontario Geological Survey had been completed previously by Mr. Raoul, P.Geo. for Crystal Lake in 2015 and compiled on a map by Orix GeoScience Inc. The current author did not repeat this task.

While the P.Geo. Paul Pitman relied on corporate documents for information regarding the current status of legal title of each patent, the land status and ownership were also verified using the Government of the Ontario Land Registry office #48 (Service Ontario). Given the type of exploration work carried out to date, it is the P.Geo.'s opinion that there are no outstanding environmental problems. A site visit was made to the Project from June 15-17th, 2016 visiting many of the collar locations, examination of some of the core and conducting a field site visit to mineralized outcrops. Core was resampled to test for compatibility with previous assay values. Regarding the 2018 field data the author examined all geophysical reports and conclusions from such work. Original Lab assay sheets were examined and it was concluded that the one drill hole did not intercept any mineralized sections. Dr. Luc

Harnois was present during the geophysical work and diamond drilling in 2018. The authors personal inspection of all exploration data for 2015 and 2018 is current to the date of this report.

Reclamation of all drill sites has been carried out and clean-up of each site and verified by a site visit. No environmental orders have been issued against the Company.

Glossary of Terms

The following abbreviations have been standardized within the text. The reader is referred to Appendix I of this report for definitions of technical terms.

Table 1
Abbreviations

Co	Cobalt	**Ni**	nickel
Cu	Copper	**PGE**	platinum group elements
km	kilometers	**Pt**	platinum
kg	kilogram	**Pd**	palladium
m	meter	**Po**	pyrrhotite
mm	millimeter	**Py**	pyrite
mt	metric tonnes	**t**	tonne

3.0 RELIANCE ON OTHER EXPERTS

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Verification of property data was reviewed through the official web site of the Mining Recorder's Office, Sudbury, Ontario and Service Ontario Land Registry Office and verified on the stamped date of this report. The dataset contains spatial, digital data that is maintained by the Ontario Government as well as several datasets prepared by others that are useful to users. The P.Geo. was provided by data from Crystal Lake as well as using public disclosure on Crystal Lake's web page (crystallakeminingcorp.com/) for information regarding the current status of legal title of the patented claims, property agreements, corporate structure of Crystal Lake, and any outstanding environmental issues, of which there are none. Each press release was reviewed by the principal Q.P. and referenced in Section 19. A draft of this Report has been reviewed for factual errors by the Company. Any statements and opinions expressed in this document are given in good faith and in the belief that such statements and opinions are not false and misleading at the date of this Report.
mailto:

4.0 PROPERTY DESCRIPTION AND LOCATION

The NICOBAT Cu-Ni-Co polymetallic sulphide historical mineralized zone is located within Dobie Township, Concession 1, part of Lot 9 (the NICOBAT Property or L-1,5), approximately 6km west of Emo, Ontario. The principal deposit, the Nico 1 lies within the L1 patent and is located adjacent to Manitou Rapids Indian Reserve #11. The patents are registered in the name of Emerald Lake Development Corporation, which company holds an 85% interest. Crystal Lake holds the remaining 15% interest.

The property consists of 2 combined surface and mining right patents. The center of the property is located at UTM 0430140E and 5389640N, within Zone 15 (using NAD83) as follows;

1) ½ West, Lot 9, Conc.1 of Dobie Twp., ½ East, Lot 9, Conc.1 of Dobie Twp.;
Parcel 3810 (numbered 0104 on map); Fee simple-absolute – PIN 56037-0104 (LT); being the west half of lot 9. Concession 1, township of Chapple, district of Rainy River; and Parcel 409 (numbered 0108 on map) ; Fee Simple - absolute – PIN 56037-0108 (LT); being the east half of lot 9, concession 1, township of Chapple, district of Rainy River.

.. As the patents are renewed through payment of land taxes there is no expiry date to them.

ultation as to future exploration or development as the
ıo risks to hinder further exploration such as that already
carried out.

Figure 1 ***General Location Map (refer to Figure 2 for locations on a Service Ontario map)***

These two patents lie within Dobie Township, (NTS 52C/12NW) which is part of the Kenora Mining Division, Province of Ontario. The property is legally accessible via the east-west paved Highway 11 and is located 402 km west of Thunder Bay, Ontario and 42 km west of Fort Frances, Ontario.

There are no known environmental liabilities assigned to the Property. A drilling permit must be obtained from the Ontario Government, Natural Resources to continue with drilling. There are no further risks to perform additional work on the Property.

Current ownership of the Nicobat patents is with Crystal Lake at 15% with Emerald Lake holding the remaining 85%. Usha Res. can earn a 51% interest in the Project by issuing 1.5 million (one million, five hundred thousand) common shares of the Company no later than ten (ten) days after Regulatory Approval from the TSX Venture Exchange. The purchaser, Usha Res. shall have the right at any time to acquire up to 1.5% of the vendor held 2% NSR royalty, free and clear of any liens, charges or encumbrances whatsoever, upon payment of $CDN 2,000,000 (two million).

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

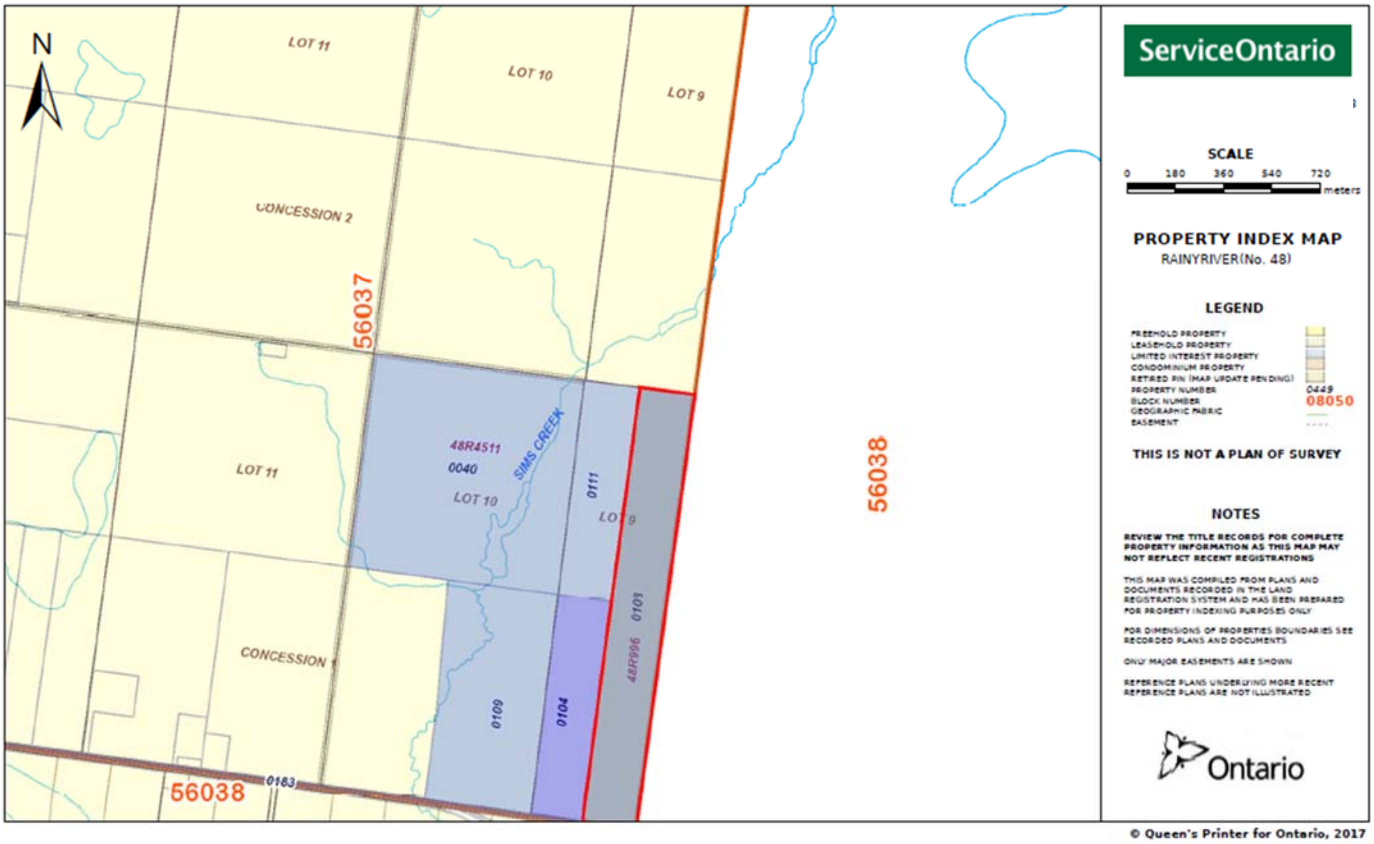


Figure 2: ***Location of Patents (0108 and 0104) and Manitou Rapids Indian Reservation (56038e)***
NICOBAT Project – Patents
Ref: Service Ontario, #48

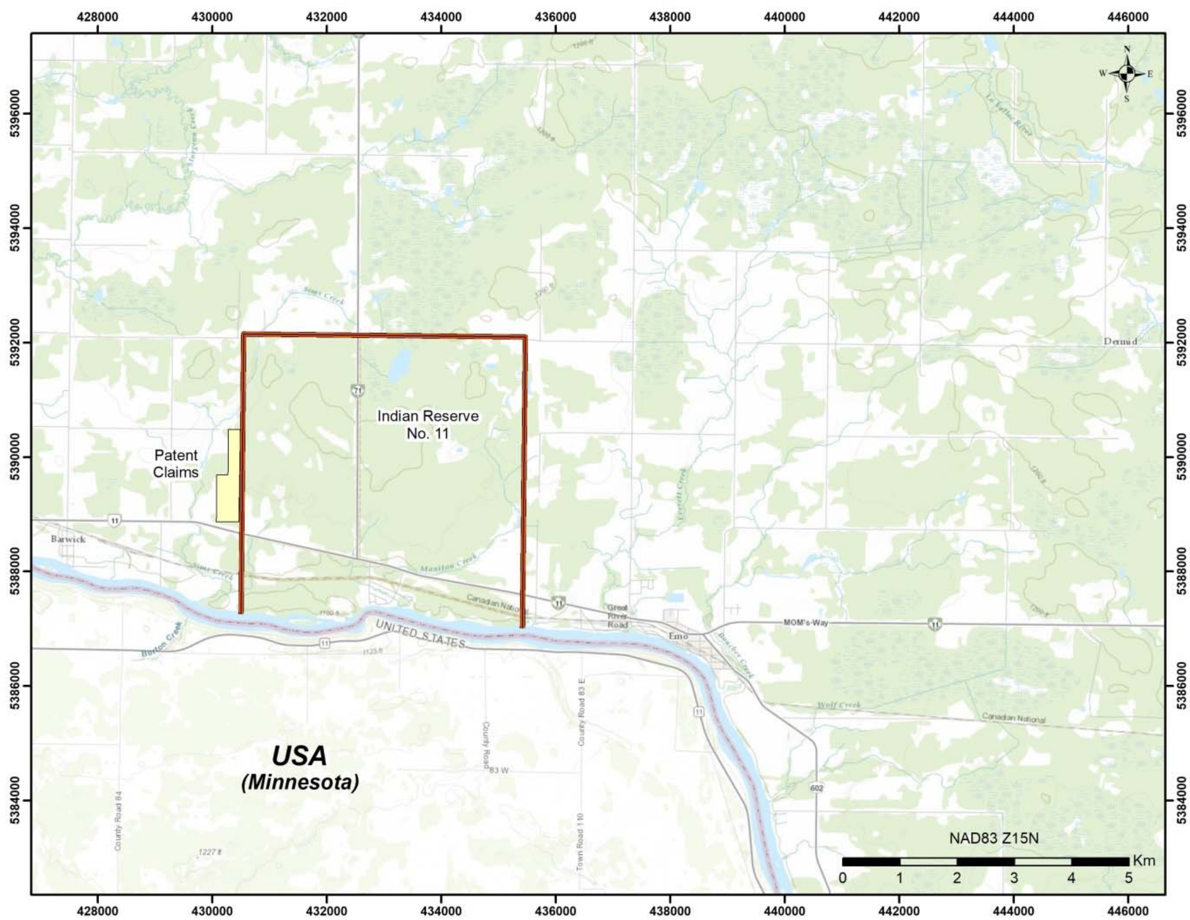


Figure 3 : ***Map of Dobie Township Land Holdings***

5.0 ACCESSIBILITY, CLIMATE, LOCAL RESOURCES, INFRASTRUCTURE, PHYSIOGRAPHY, AND FIRST NATIONS

Access to the L1/L5 patents is by travelling 200m north on the old boundary road adjacent to the Manitou Rapids Indian Reserve #11 using an all-terrain vehicle. This road is located two kilometers west of the Highway 71 / 11 junction. Access is possible year round as is the field season.

The climate is typical of Northwest Ontario with average summer temperatures of +24°C with 90mm of rainfall per month. Average winter temperatures of -18°C with 30cm of snowfall per month. Vegetation consists of plants and trees of that of a typical Boreal forest with open fields and swamps typical for northwest Ontario. Much of the property is open field, having been farmed in the past.

The property topography is relatively low relief, not exceeding ten meters in height. Over 80% of the area has been cleared and cultivated in the past. Based upon young tree growth of poplar and minor spruce (all under 15cm diameter) would indicate new growth is about 3 decades old.

The property is 200m north of a major highway close to the USA border, has a buried nature gas line crossing at the southern boundary and a CNR line running south of Highway 11. Access is excellent and all mining facilities could be obtained locally. Potential mining sites, waste disposal areas and sites for processing facilities is unknown at this time.

The geomorphology of the claim area consists of thick glaciofluvial sand and gravel deposits with minor clay components, varying from zero to over 60 meters. Limited bedrock exposures (less than 5%), consist of variable phases of the Dobie Mafic Intrusion. There are no water bodies found on the property but a small swamp (under 1 Ha) occurs on the boundary road into the property; on Manitou Rapids Indian Reserve #11. This makes truck vehicle access difficult but can be overcome with an all-terrain vehicle. A small pond, known as Sims Creek, of 4-5 Ha size, is located is adjacent patent (North Half, Lot 10, Conc.1) or 200m northwest of the NICOBAT Property.

From acquisition of the project to the date of this report, no disclosed First Nations consultation has taken place. The eastern boundary of the NICOBAT Property is attached to Manitou Rapids Indian Reserve #11. Historical exploration has been conducted on the Reserve which contains several Cu-Ni mineralized prospects.

Plate 1: ***Area Topography***

6.0 EXPLORATION HISTORY

The following tables have been compiled from the assessment files in the Kenora Resident Geologist's Office and other OGS publications and papers and/or Company (vendors) reporting. This information was gathered in part by Mr. Raoul, P.Geo. and former consultant to Crystal Lake and registered as Table 1 (pp11-14) in his Sept 14, 2015 Ni 43-101. It did not include recent work by Crystal Lake. All former work lies within the property boundaries except where noted.

Table 2: ***History of the NICOBAT Property, Dobie Township***

Company & Date	Work Completed	Summary
Fort Frances General KAF 52C12NW B-1	General Notes	March 31/52 Tour of "Emo Property" with E. Corrigan with ODM staff. Adjacent to IR#11, current NICOBAT Property, located east-west trending ridge of gabbro with scattered chalcopyrite & pyrrhotite. Located more mineralization 2.5km to the east, near present day Hwy 71. Reported values of 1% Ni in massive sulphides, within >80m zone in mineralized gabbro.
Falconbridge 1953 Manitou Rapids KAF 52C12NW B-3, B4 Young Corrigan Option	25 ddh (logs & assays) D1 – D25 Most lie outside of the property 15 ddh (logs & with assays), R1 – R15 All R series holest lie adjacent to the propertyon the Indian Reserve with only the holes noted which lie on the patents	Holes D1-D16 & D25 on NICOBAT Property Hole D1 – 133.8m with 7.16m of 0.60% Cu, 0.95% Ni. Hole Hole D16 – 142.4m with 12.35m of 0.82% Cu, 0.37% Ni and Hole D25 – 338.0m with 3.05m of 0.27% Cu, 0.04% Ni. <u>Newspaper article</u> – Dec 22/66 Chibtown Cooper Corp drilled Dobie Mineralized Zone: 1100ft long to 1000ft depth of irregular pipe with 200-250ft wide, 400ft long and plunges 30^{o}-45^{o} eastward. Estimated resource (165 ddh) of 5.2 Mt of 0.28% Cu & 0.24% Ni. Combined 0.52% Cu-Ni, 80% concentrate of 11% Cu and 7% Ni. To 350ft level, grades of 0.65% Cu & 0.85% Ni of 225,000 tons. Holes R3, R5, R6, R7 on IR#11; 200m E of D1
Stratmat 1956 Dobie Twp KAF 52C12NW B-4	ODM letter, & Reply by Company (former name of property the Young Property	Young Property (lot 6, conc 10, Dobie Twp) – request by ODM on option of property by Stratmat. Returned information by Stratmat: 5-6 phases, faulting with Cpy in fractures, multiple stages of mineralization, elevated Co, difficult with geophysics (too many anomalies), other company will not give out information.

Unknown (1956?) KAF 52C12NW E-1	Newspaper Article on Young Property	Fort Frances Times article - #30 (1956 ?) Stratmat zone 2000 tons /day with reduction plant of 300 tons /day Nearly $1,000,000 investment by Stratmat to date. Experts Dr. James A. McCuaig of Montreal (for tonnage) and resident engineer W.B. Magyar (for metallurgy).
Stratmat 1957 Manitou Rapids IR#11 J. Bolen Estate	Geophysical and Geological survey.	Survey 1 – Recon Mag Survey – 100ft intervals along 400ft line. Highs associated with magnetite – sulphides. Survey 2 – Ground EM Survey – 100ft intervals with 200ft lines. N-S anomalies with sulphides and E-W anomalies with faulting. Survey 3 – Ground EM by different method – some coincident anomalies. Survey 4 – Gravity Survey – 50ft intervals along 200ft lines. Outlined gabbro intrusion. Survey 5 – Ground EM Survey – 50ft intervals along all N-S lines. Confirms recon survey. Survey 6 & 7 - Prospecting and Mapping – anomalies were followed up locating disseminated sulphides & diabase dike.
West Range Iron Mines 1960 KAF 52C/12NW H-1	Ground Mag & 4 ddh drilling of iron formation to the north of the property	Information on the Dobie IF (aka Young-Corrigan) at the north end of the Dobie Township. Ground Mag & 4 ddh & patent ownership map at 1:15;840 – two parallel, east-west iron formations within metasedimentary rocks (gneisses).
Chibtown Copper Corp 1966 J. Bolen Estate	Dobie Report on Geology by Holbrooke	Sulphides found several locations of Po-Py, Cpy, Pent in Norite. Size – 1100 ft long by 1000ft deep at 30-45^{o} Several 030^{o}/60^{o}W trending ribs (#1) of higher grade mineralization (5-15ft wide by 400ft long) of 0.65% Cu & 0.87% Ni. Detailed drill hole map at 1 inch:100 ft Map with Location Map & Mineralized Section Chibtown (1966) reported concentrates grading 11% Cu and 7% Ni and a Cu / Ni ratio equal to 1.57/1. These results appear to indicate a lower recovery of Ni for mineralization taken from a pit located on the property
Long Lac Mineral Expl. May 28, 1968 J. Bolen Estate	Geological Summary to head office	Dave Tims, Engineer Sampling - 0.35-9.36% Cu and 0.7-2.50% Ni with up to 0.38% Co with Cu / Ni ratios from 1 / 2 to 3.7 /1. Co values were up to 0.38%. Soil samples yielding such values in Cu and Ni were described as being unusual, rare and outstanding. Bulk sampling of large diameter percussion drilling yielded unknown results. Location - Lot 9 & 10, Concession 1, Dobie Twp Rock – norite differentiates at edge of gabbro with 1 large mineralized zone and several others. Dimensions of the zone are not described. However a historical resource was calculated by Long Lac Minerals. Resource – 5.2 Mt of 0.28% Cu, 0.24% Ni, 0.05% Co (est) Potential – 2-3 Mt open pit at 2,000 tpd at $3-4/ton Recommended further work. Note that a qualified person has not carried out any work to classify the above mentioned historical resources numbers as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve.

D. Young May 30, 1968 J. Bolen Estate	Letter to Sherritt Gordon Mines for option	1952 – discovery by D. Young & E. Corrigan 1952/53 - Ground & Airborne EM & Mag, geochemical survey, 47 ddh (3,118m) by Falconbridge 1955/56 – Stratmat drilled over 15,244m and produced a metallurgical (concentrate of 1.62% Cu & 2.64% Ni with 92% Cu recovery & 83% Ni recovery). Stratmat labelled the resource as a reserve estimate at 3.0 Mt but no grade. 1968 – Long Lac Mineral Expl. did bulk sample and some metallurgical work but found high Po in the concentrate. Note that a qualified person has not carried out any work to classify the above mentioned historical resources numbers as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve
Long Lac Mineral Expl. April 23, 1969 J. Bolen Estate	Concentrate Estimate by ODM Mines Branch	Sample of drill cuttings yielded 0.18% Cu and 0.25% Ni. Minerals Pyrrhotite, Chalcopyrite, Pyrite, Pentlandite and Violarite (a supergene sulphide mineral formed due to oxidation of pentlandite nickel sulphide) and minor Galena, and Magnetite. Concentrate = 2.61% Cu, 2.10% Ni with Cu/Ni ratio equal to 1.24 /1; and 10.04 % insolubles. This test appears to indicate negligible problems with recovery of Cu as well as with Ni.
Long Lac Mineral Expl. July, 1970 J. Bolen Estate	IP & Resistivity Line Sheets by McPhar Geophysics	Young-Corrigan Option - there is no available in-depth interpretation of these surveys.
Arthur Young March 29, 1977 J. Bolen Estate	Letter to D. Thomas with part of 1968 Engineer's report	Soil sampling located 10X copper and 7X nickel above background over entire Reserve (#11). Some drilling in 1972 but no data provided. Engineer Report is 1968 by D. Tims (above). This work lies outside of the current property boundary and within the Indian Reserve. It is mentioned as it shows significant mineralization on an adjacent property
Sherritt Gordon April 5, 1977 J. Bolen Estate	Letter	Paper search by geologist found assays in Government files of 0.20 – 0.40% Cu or Ni. Sherritt Gordon wanted values of 0.5 to 1.0% for both so the project was not recommended. No property visit was made by Sherritt and no testing for PGE potential.

Ontario Dept of Mines (ODM) SMDR 000918 June 27, 1977	Emo Ni-Cu Property Visit	Property Visit by R. Beard, Kenora Resident Geologist Local: Dobie Twp, Conc. I, Lot 9, SW ½; 150m west of IR#11 – examined a pit measuring 6m x 6m on 45m sized exposed outcrop. Mentioned by the government geologists were historical resources of: 1957 Stratmat – calculated 3.0 M tons at unknown grade 1966 Chibtown Copper –calcualted 5.2 Mt at 0.28% Cu and 0.24% Ni Note that a qualified person has not carried out any work to classify the above mentioned historical resources numbers as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve ODM collected samples from the pit of - 0.28% Cu, 0.24% Ni, 0.012% Co
MDI52C12NW00011 Dobie Prospect 1984 (KAF 52C/12NW B-3)	ODM / OGS (Ontario Geological Survey) database	Dobie Prospect / Emo Prospect / Sudbury-Northrim /Young-Corrigan Prospect – Cu, Ni, Co Local: 430085E, 5389540N, Zone 15 Source: OGS 1954, Map 1954-2 in AR Resource: 5.2 Mt at 0.28% Cu, 0.24% Ni Note that a qualified person has not carried out any work to classify the above mentioned historical resources numbers as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve Bulk sample: averaged 1.23% Cu, 0.55% Ni, 0078% Co (not specified in detail) Concentrate: 1.68% Cu, 2.64% Ni (1968) Minerals: Po- Py-Pent-Cpy-Sph-Mgt and Violarite
Miscellaneous Paper 38 - Platinum Group Elements, 1986	PGE's – Pg 22-26 and Map P2047 (Regional Government geologist mapping focusing on platinum)	Sampling of Emo-Fort Frances area by M. Hailstone; Dobie Intrusion (Fletcher & Irvine, 1954) found 3 phases: 1. Coarse-grained, diabasegabbro 2. Medium-grained, hypersthenegabbro 3. Medium-grained, Norite gabbro with 1% Po-Py With localized, coarse-grained pyroxenite and anorthosite. Government sampling of Norite yielded 62 ppb Pd-Pt (palladium, platinum), 296ppm Ni, 35 ppm Cu.

		Continued on Miscellaneous Paper 38 Sample of Young- massive sulphides of Po-Cpy-Py-Pent with 2.52% Ni and trace Cu. Sampling of disseminated sulphides yielded 0.31% Ni and 0.30% Cu. A total of six samples taken but no significant PGE values were located.
Caracle Creek 2007 Crystal Lake consultants		Selected drill hole results tabulated by Caracle Creek (2007) showed 41% contained Ni greater than 1.00% with values ranging from 1.19% to 3.27% Ni.

In addition to the above logged assessment files the Ontario Department of Mines (ODM) and its' successor, the Ontario Geological Survey (OGS) carried out the following regional surveys which include the property:

1. Geological mapping in the 1953 Annual Report and production of Colored Map 1954-2 (Scale 1:63:360).

2. A data series map P2047 was produced (1980) of the summary of fieldwork/ assessment in the Dobie Township Area (Scale 1:15 840).

3. Kenora-Fort Frances Geological Compilation Series, Map 2443 byC.E. Blackburn, 1979.

4. Gold Grains in Rotasonic Drill Core and Surface Samples (1987-1988), Fort Frances-Rainy River in Report 263 and Map P3140 (Scale: 1:100,000).

5. An Airborne electromagnetic and total intensity magnetic survey was completed on the Rainy River area (1990) with Map 81535 (Scale 1:20 000), covering the NICOBAT Property.

6. Quaternary Geology, Fort Frances-Rainy River Area (1991) in Open File 5794 and map P3137 (scale 1:50,000).

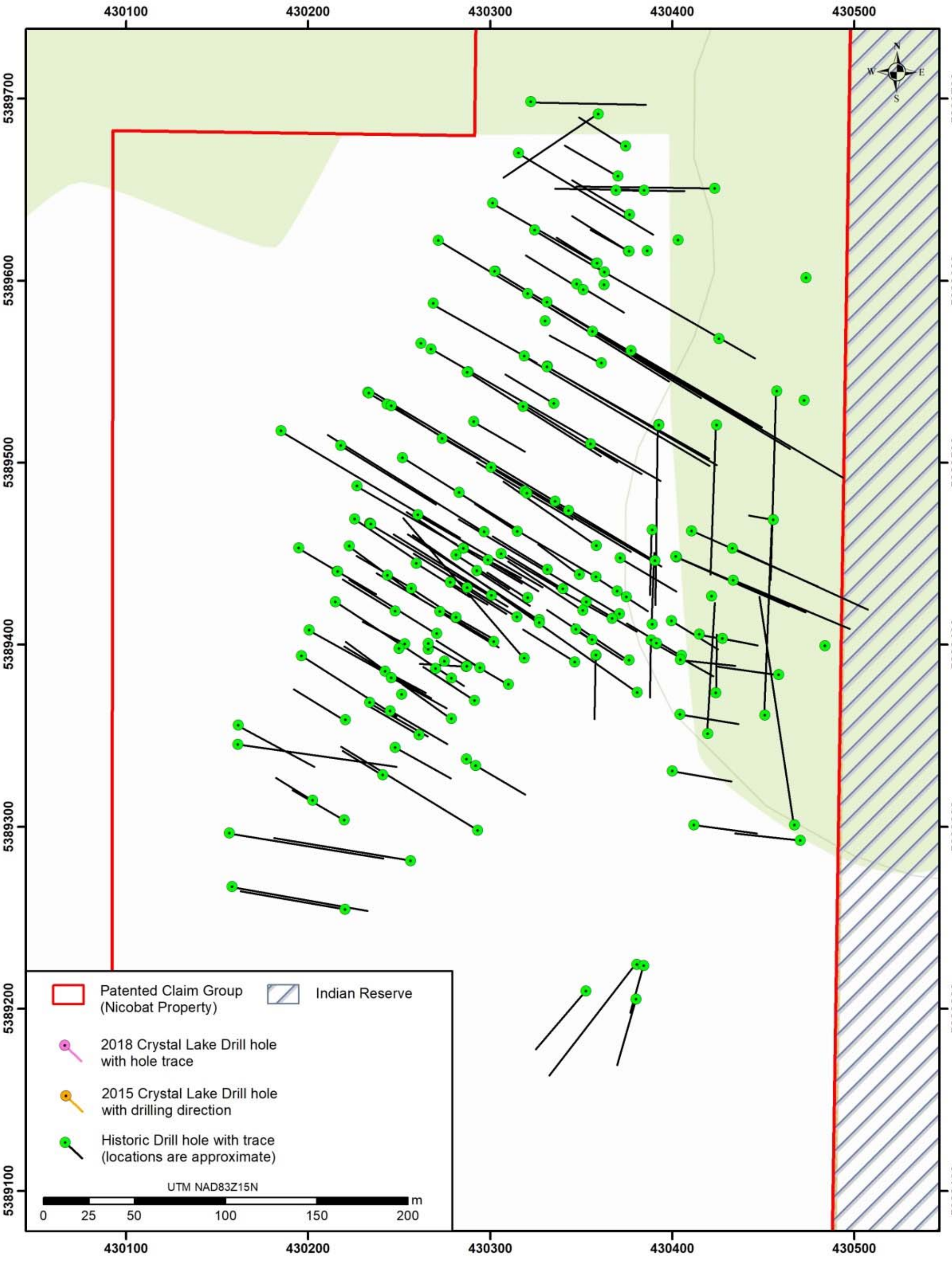


Figure 4: ***Plan Map of Historical Drill Holes Using UTM co-ordinates (5m accuracy)***
(refer to previous tables) Plus Location of recent Crystal Lake DDH

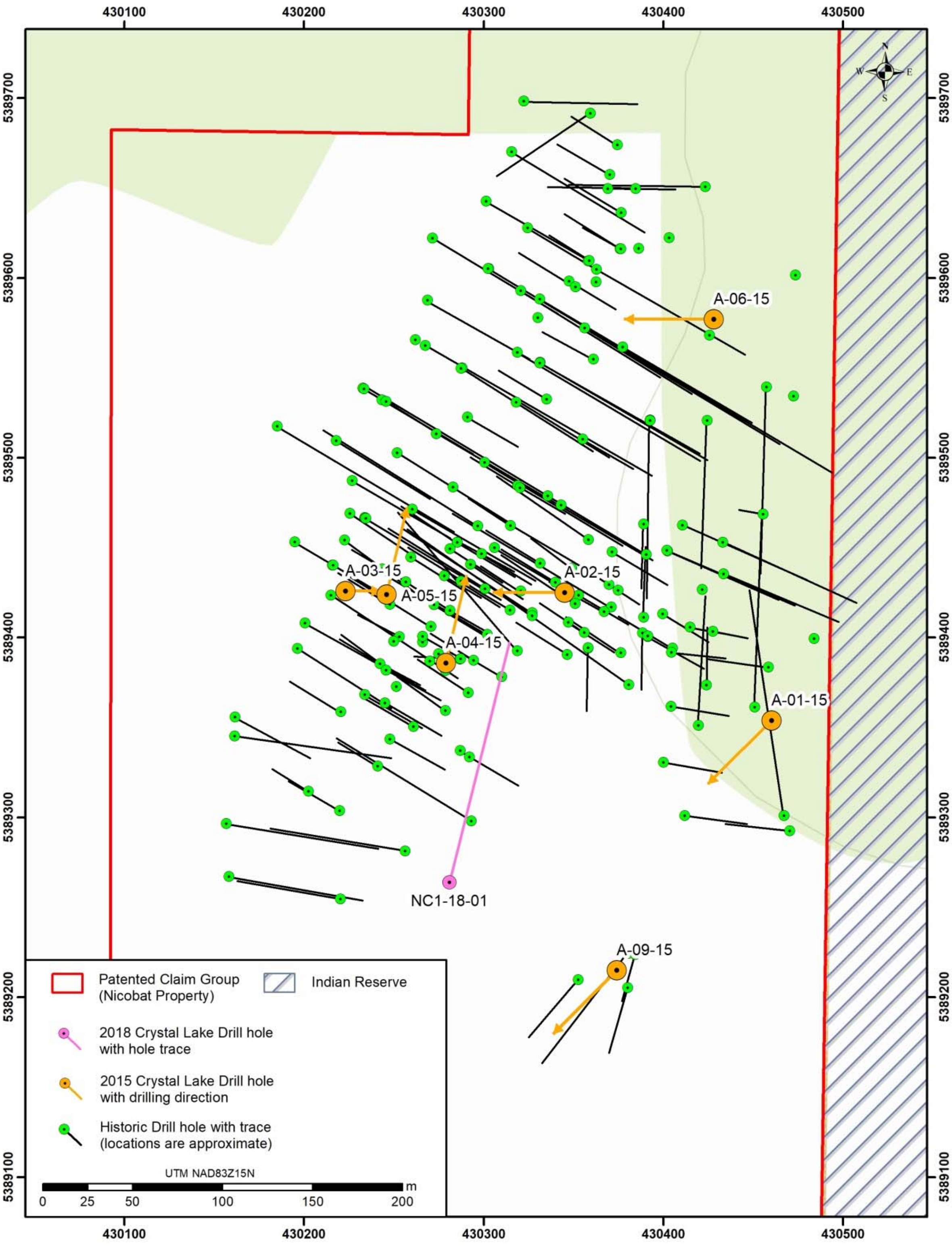


Figure 5: ***Expanded Plan Map of Historical and Recent Drill Holes***

7.0 GEOLOGIC SETTING AND MINERALIZATION

7.1 : Regional Geology

The NICOBAT property patents and enclosed sulphide deposit is located within the 2.7 billion year old Rainy River Greenstone Belt that forms the southern part of the Wabigoon Subprovince.

The Wabigoon Subprovince is a 900 km long east-west trending area of komatitic to calc-alkaline metavolcanics, that are, in turn, succeeded by clastics and chemical sediments. Into the greenstone rocks granitoid batholiths have intruded forming synformal structures in the supracrustals that often have shear zones along their axial planes. The Wabigoon basement rocks and remnant Mesozoic cover sediments are overlain by Labradorian till of northeastern provenance.

The most recent geological map of the area is the Kenora-Fort Frances Geological Compilation Series map (M2443) at 1:253:440 by C.E. Blackburn (1979). The mapping in the area of Dobie Township was based upon colored geology map 1954-2, the Emo Area at 1:63:360, by Fletcher & Irvine in the 1953 Annual Report.

In the Dobie Township area, a 6.5km long (north-south) by 4.2 km wide (east-west) mafic intrusive unit (the “Dobie Intrusion”) of gabbro to norite to diorite has intruded this metavolcanic assemblage. In the NE this mafic intrusive unit has been intruded by a felsic intrusive of granodiorite composition. Several areas of sulphide mineralization have been located in the south and southwest portions of the Dobie Intrusion as described in Section 6.0 – Exploration History.

7.2 Local (Property) Geology

Based upon mapping of Emo Area by Fletcher & Irvine (1953), the NICOBAT Property consists of the following units (from oldest to youngest):

Unit 1a, 1b: mafic massive to pillowed flows, tuffs, agglomerates and breccia: The rocks grouped under the general term “greenstone” consist predominantly of dark greyish-green, andesitic and basaltic lavas. One belt is located in Shenston township extending into the southern part of Dobie township. The lavas are mainly fine-grained hornblende and chlorite schists (now metamorphic rocks), with some coarsely crystalline textures. Pillow structures were observed in both belts, and a number of quartz veins were found cutting the north belt.

Unit 2a, 2b: felsic to intermediate flows, tuffs, agglomerates and breccia: The southern part of Dobie township consists of predominantly dacite, dacite porphyry and dacite-andesite agglomerate.

Unit 4b: sandstone, siltstone, argillite and derived schists (+/- iron formation) A unit of sediments occurs on the north end of Dobie townships. This sequence outcrops along the axis of a domed anticline and can most conveniently be separated into three units. A belt, representing the north flank of the anticline, underlies the northern part of Dobie Township and the southeast corner of Mather Township. It trends at azimuth 070^{o}, dips vertically, and is about 4km thick. It is composed of banded quartz-feldspar- biotite schist, an iron formation (Young-Corrigan), and minor amounts of conglomerate. It is intruded on the north by granite and has a contact zone of "lit par lit" about 1500m wide. The other parts are exposed farther to the east, near Emo.

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

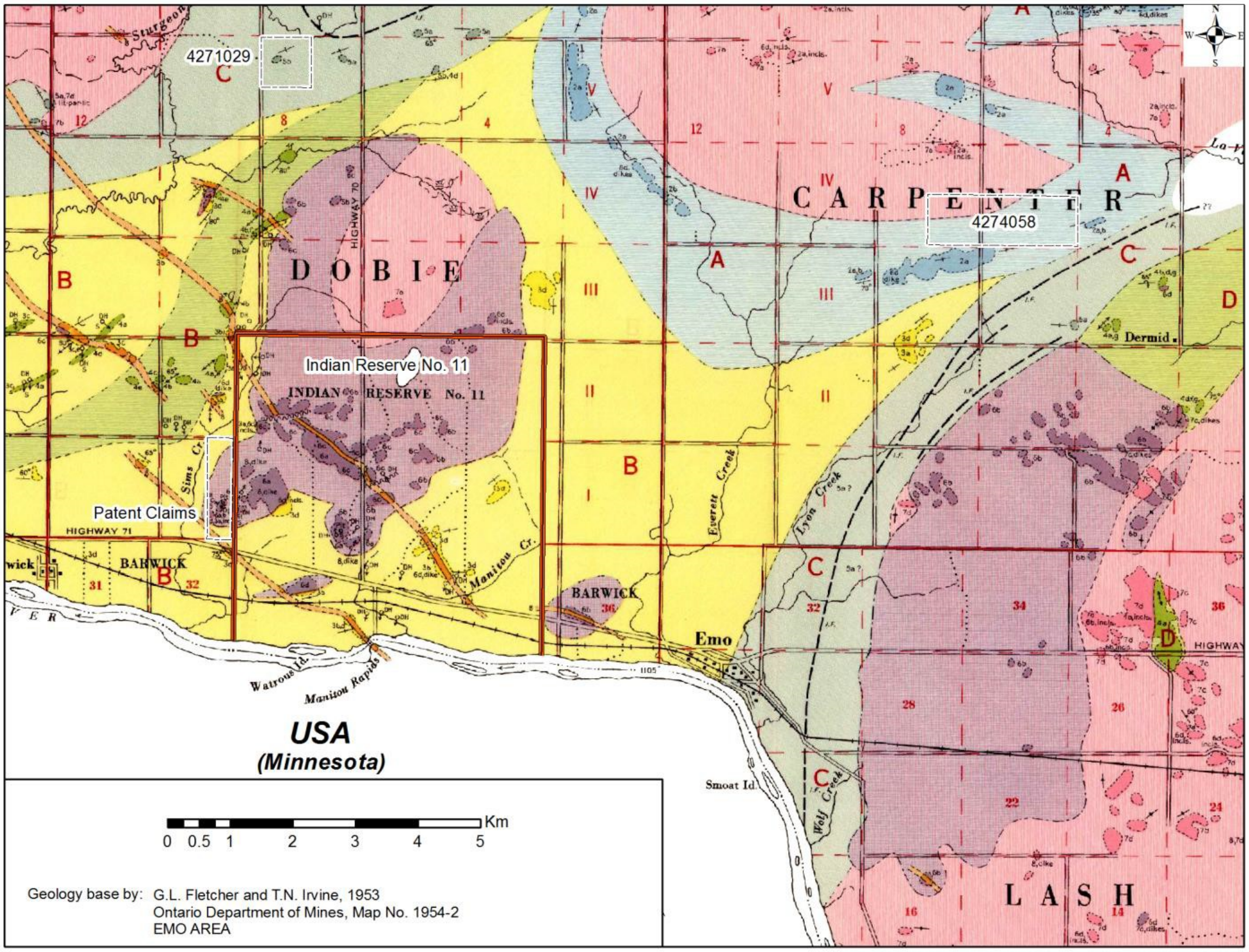
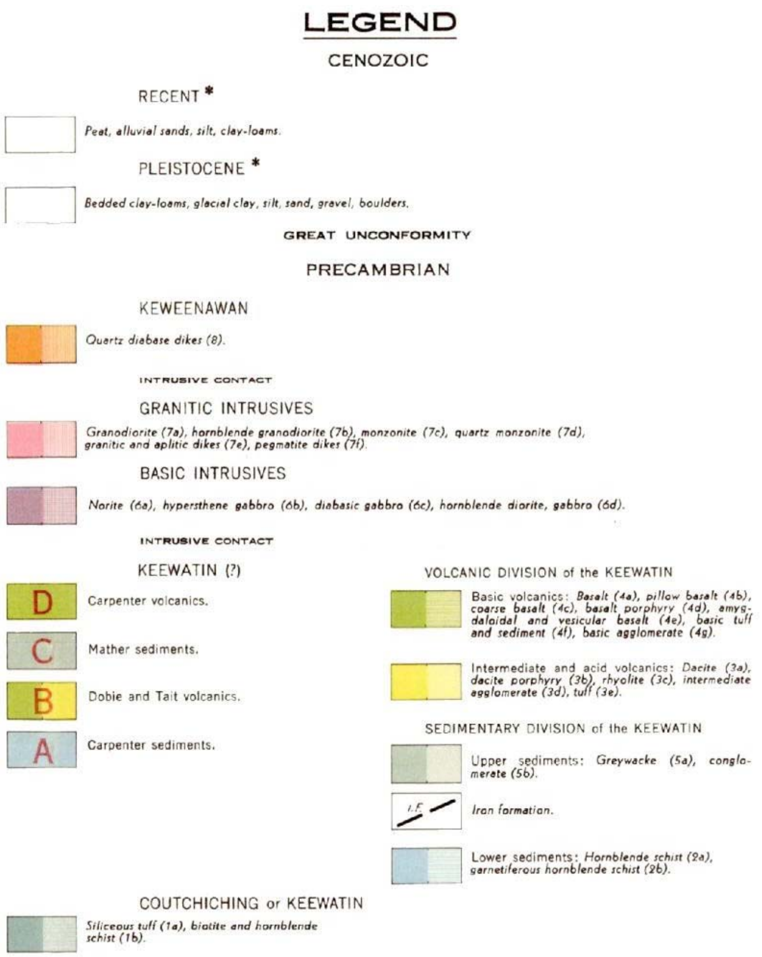


Figure 6: ***Regional and Property Geology***
1953, Map. 1954-2

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Figure 7: ***Regional & Property Geology (Legend)***



<u>Unit 7a: gabbro, norite and diorite</u> (the Dobie Intrusion): The intrusion in Dobie township is about 6.5 km long by 4.2km wide. It has a U-shaped, opening to the northeast. Differentiation has resulted in three recognizable phases (Hailstone 1989):

Coarse-grained, <u>diabase gabbro</u> - 70% labradorite, 20% augite, 10% hypersthene and uralite; Medium-grained, <u>hypersthene gabbro</u> - 50% labradorite, 30% augite, 20% hypersthene and uralite: Medium-grained, <u>norite gabbro</u> – 75% hypersthene, calcic labradorite and small amounts of olivine.

Locally, coarse-grained, pyroxenite and anorthosite occur in minor amounts. The norite (with associated nickel-bearing sulphides) occurs in two bulges on the south boundary of the intrusion. Dykes of hornblende diorite and gabbro are found in the sediments, and inclusions of similar material are found in the granites.

<u>Unit 9a: massive to foliated, equigranular and porphyritic, quartz monzonite, granodiorite, trondhjemite, quartz diorite and granite.</u> A large mass, U-shaped intrusion, consisting of pink and grey, coarse-grained to porphyritic granodiorite to granite is located in the northeast corner of the Dobie Intrusion.

<u>Unit 10: diabase dikes:</u> Diabase and quartz diabase dikes in the area range in width from five centimeters to 60m in width. They commonly trend azimuth 320° with some traced over many kilometers.

The NICOBAT sulphide mineralization (Nico 1) is hosted by a mafic intrusion, contained within what appears to be a footwall protrusion, located in the southwest region of the basal portion of the Dobie layered complex. Given the absence of any reference to intersections of footwall country rock (in over 220 historical borehole logs) it has to be assumed that either drilling terminated at too shallow a depth, or that the footwall protrusion is a steep walled, and very deep trough. The entire Nico 1 mineralized zone is contained above the 100m depth level.

The Dobie Intrusive complex measures approximately 27 square kilometers at surface. The host country rocks include a variety of fragmental lithologies including "agglomerates", intercalated clastic metasedimentary rocks and oxide facies banded iron formation.

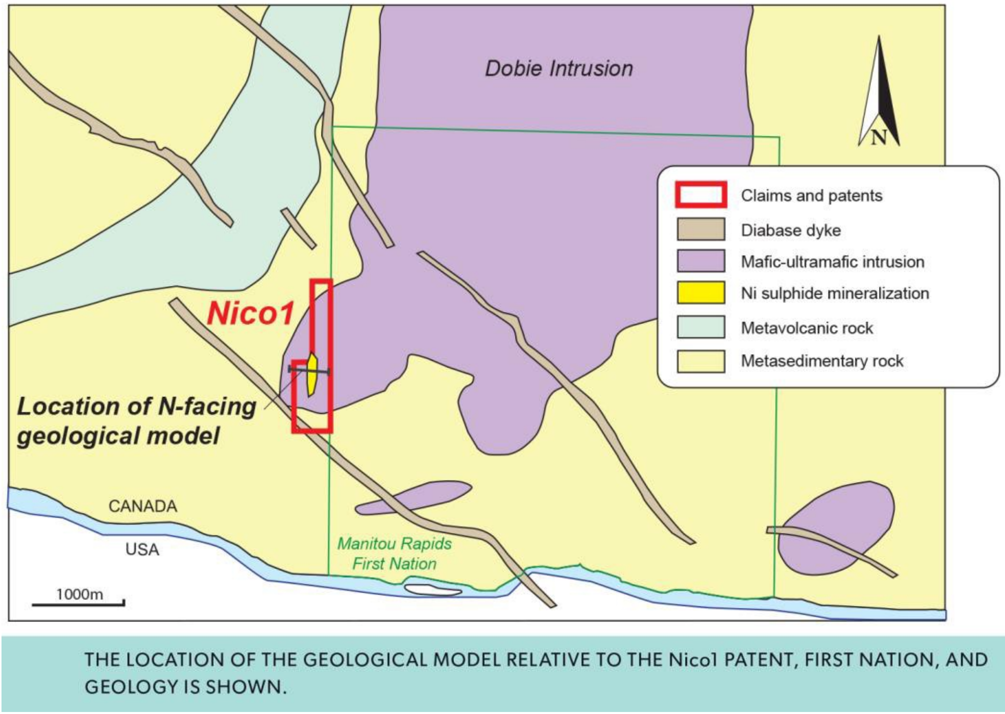


Figure 8**: Geological model at Nico 1 deposit Highlighting the Geology and the Deposit**
(from Dr. Peter Lightfoot, PhD. Internal reporting for Crystal Lake (Feb 2018)

7.3 Mineralization

Within Dobie Township, there are six known mineral occurrences, based upon the OGS' mineral deposit index. Only the Dobie prospect (Nico 1) lies within the NICOBAT Property and is the center of the Crystal Lake exploration program. Two others lie in the Indian Reserve and are not discussed.

- Dobie Prospect – Cu-Ni associated with gabbroic units (MDI52C12NW00011) -the subject of the project report.

- There are two areas to the west of the Dobie Prospect where known mineralization has been located by historical drilling but have not been given a mineral deposit index (MDI) ref: NI 43-101 by A.J. Raoul (2015). As mentioned above, both lie within the Manitou Rapids Indian Reserve #11.

The NICOBAT sulphide zones are hosted within a noritic, western sub- zone of the Dobie Gabbro/Norite. Sulphides minerals are dominated by pyrrhotite-pyrite with lesser amounts of chalcopyrite, nickeliferous pyrrhotite, pentlandite, violarite, galena and magnetite.

The mineralized area measures on surface:

- 1100 feet N-S by 900 feet E-W by at least 1,000 feet deep (based on historical data) or in metric units: 335m N-S by 270m E-W by 305m deep

Surface sampling by the OGM in 1986 on the excavated pit confirmed averaged values of 0.31% Ni and 0.30% Cu in this occurrence of disseminated mineralization. No PGE values were found on surface in the 6 samples taken. The pit is located 150m west of IR#11 and is 5m x 6m in surface area.

Plate 2*: **P.Geo. at the 1968 Pit in which Long Lac Mineral dug a bulk sample for metallurgical tests** (photo taken June 16, 2016)*

The mineralization found by historical drilling and defined as a deposit by past junior mining explorers (refer to Table 2) is composed of greater than seven high–grade “ribs or shoots”, each being from 3.66m to 12.20m (or 12 ft to 40 ft) in width. These north trending, north plunging higher grade “ribs or shoots” are entirely surrounded and enclosed within a large body, of disseminated sulphides.

Drill core and surface samples from Nico 1 contain disseminated through semi-massive magmatic-textured pyrrhotite, pentlandite and chalcopyrite mineralization hosted by gabbro. The semi-massive sulphide mineralization and mafic inclusions comprise a magmatic breccia within a broader unit of gabbro with disseminated sulphide. These geological relationships are commonly in magmatic sulphide ore deposits and support the importance of effectively testing the rocks beneath the Nico 1 mineralization.

The accompanying maps extracted from Chibtown Copper Corp. show the mineralization to be approximately 134m east of the western footwall contact of the Complex. In this illustration, it would appear that the longer body of so–called (semi) massive ore represents the No 1 “rib or shoot”. The longitudinal section, looking west, of the No1 “rib or shoot” is illustrated in Figure 12 (page 28). Presumably the same data was used by Stratmat Ltd. (April 12, 1956) but with one significant difference. Stratmat (1956-57) suggested that the mineralization is 33% wider than that illustrated by Chibtown, hence the different calculated resource number.

It should be noted that many of the “ribs or shoots” have not been thoroughly tested by the earlier explorers. None of the sulphide bodies found were tested for gold-silver or platinum group elements. Note that NewGolds gold deposit 25km to the northwest was intruded by the #34 Zone, a very rich copper-nickel massive sulphide deposit with up to 2.93% platinum mineralization. (Hardie, May, 2013). PWP Consultants was present at the time of this discovery while contracted to Nuinsco Resources (the holder of the property at that time). This information is not necessarily indicative of the mineralization on the property that is the subject of this technical report.

All comments on structural features are limited by poor exposure (under 5%) on the Patents. Such determinations are from diabase offsets. Stratigraphy has been determined by pillow structures in the mafic volcanics. In the metasediments all such stratigraphic features are obscured by metamorphic events. A comprehensive geology map on the Dobie patents has not been done by Crystal Lake; likely due to such poor exposure of outcrop.

The following two redrafted sections illustrate the irregularity of the mineralization but do not illustrate geology. A longitudinal section of one of the documented “higher-grade ribs” has not been filed in the Government records and is believed there is insufficient data to create one.

As mentioned, the mineralization as described in the historical assessment data records is described as being comprised of greater than seven high – grade “ribs or shoots” (see Figure 12), each being from 3.65m to 12m in width. One “rib or shoot”, Chibtown’s No.1 body, was said to contain from surface to 105m, 204,000 tonnes grading 0.65% Cu, 0.87% Ni. The other six “ribs or shoots” were not similarly documented. All “ribs or shoots” were identified as being surrounded and enclosed within a larger body of lower-grade disseminated sulphide mineralization. Note that a qualified person has not carried out any work to classify the above mentioned historical resource number as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve.https://www.facebook.com/trucly.hothi.180

In late 2015, Crystal Lake drilled in total 1,860 meters in 10 holes. One drill hole (A-04-15) confirmed that high-grade nickel-copper shoots do exist and are considerably better than previously recorded in the historical drilling. Hole A-04-15 intersected from surface to 63.75 meters a weighted average of 1.05% nickel and 2.18% copper (note that the true width of A-04-15 is materially narrower than the drill hole intersection).

Note that in Figure 9 (below) the outline of the higher-grade rib mineralization plunges at an average of at least 30^{o} to the northeast.

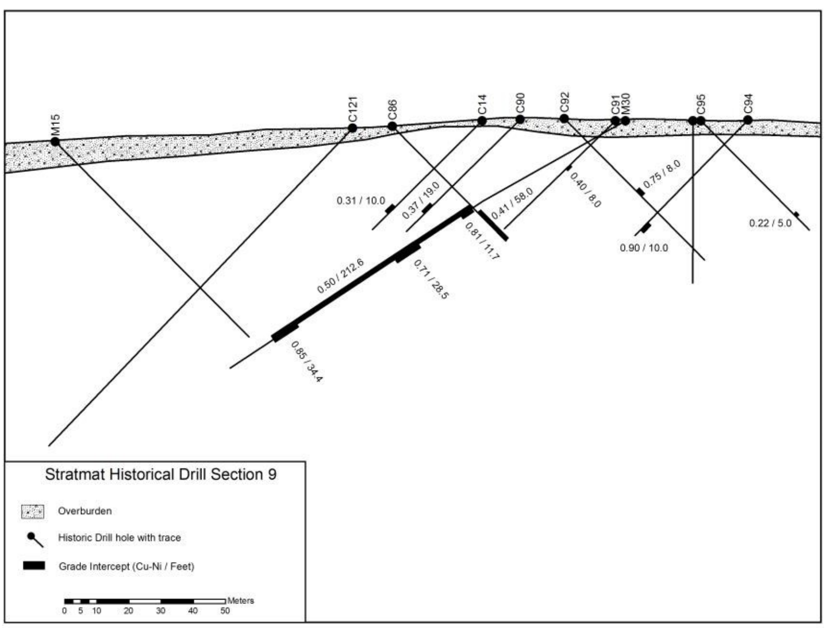


Figure 9: ***Stratmat - Typical Historical Drill Section and Down Hole Mineralization***

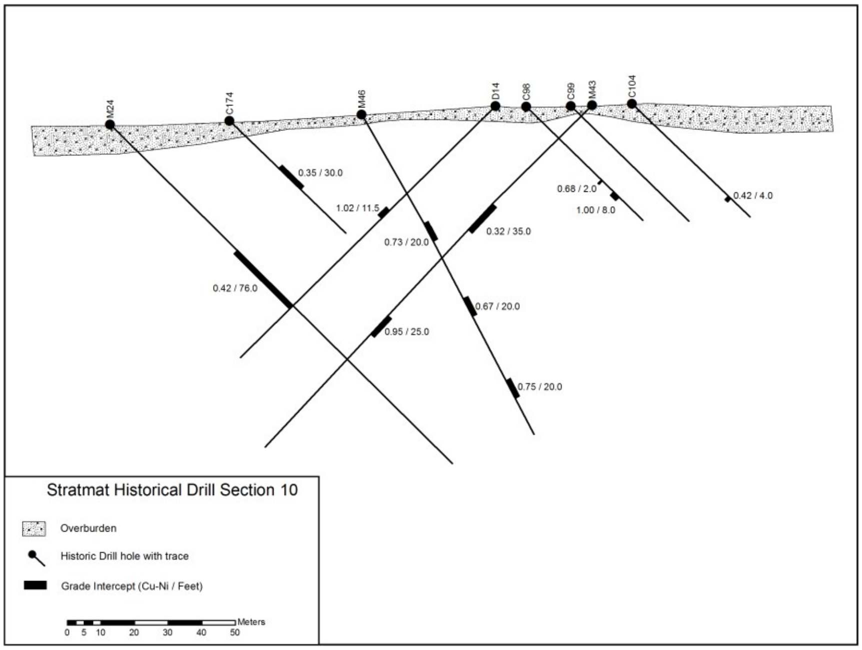


Figure 10: ***Stratmat- One Typical Historical Drill Section Illustrating Scattered Mineralization and Barren Zones***

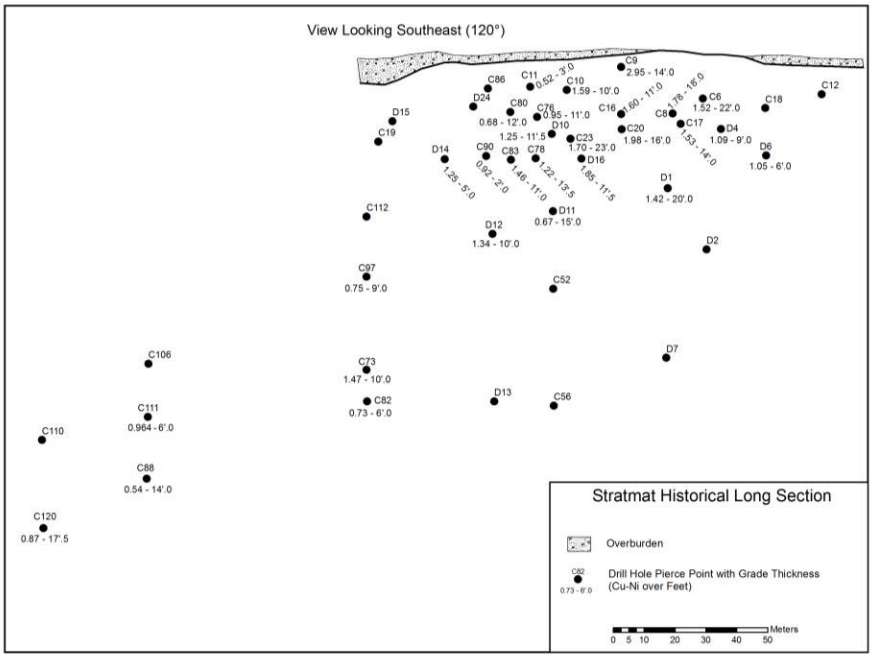


Figure 11*: **Longitudinal Section of the No. 1 Zone Nico 1 Deposit***
Ref: Chibtown Copper Corp. (1966) from OGS Assessment Files

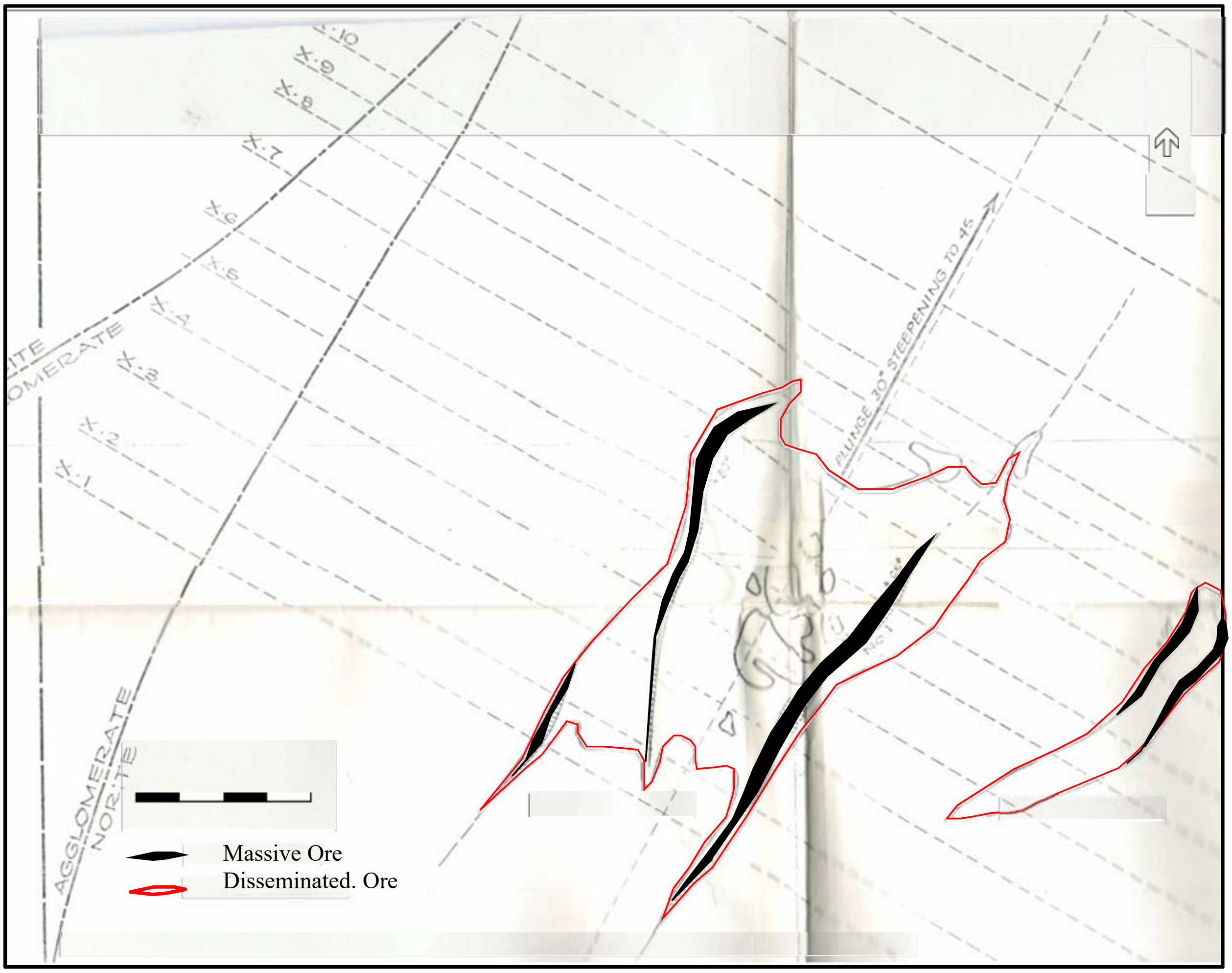


Figure *12:* ***Historical Trace of A Few of the NICO 1 Deposit Higher Grade Zones ("ribs")***
Ref: Chibtown Copper Corp. (1966) from OGS Assessment Files

In summary, the mineralization as described in the historical assessment data records is described as being comprised of greater than seven high – grade "ribs or shoots" (see Figure 11), each being from 3.65m to 12m in width. One "rib or shoot", Chibtown's No.1 body, was said to contain from surface to 105m, 204,000 tonnes grading 0.65% Cu, 0.87% Ni. The other six "ribs or shoots" were not similarly documented. All "ribs or shoots" were identified as being surrounded and enclosed within a larger body of lower-grade disseminated sulphide mineralization. Note that a qualified person has not carried out any work to classify the above mentioned historical resource number as a current resource or mineral reserve. The Company is not treating the historical estimate as a current mineral resource or mineral reserve.

8.0 DEPOSIT TYPES

8.1 Magmatic Nickel Deposits [1]

Nickel ore is a vast subject so this section is necessarily brief and only an introduction to guide non-scientific readers.

Nickel is a high-luster, silver-white metal whose valuable applications have made it a significant and widely used metal. Nickel (abbreviated "Ni") is a transition element that exhibits a mixture of ferrous and nonferrous metal properties. It is both siderophile (i.e., associates with iron) and chalcophile (i.e., associates with sulfur). The bulk of the nickel mined comes from two types of ore deposits:

- laterites where the principal ore minerals are nickeliferous limonite [(Fe,Ni)O(OH)] and garnierite (a hydrous nickel silicate), or

- magmatic sulfide deposits where the principal ore mineral is pentlandite [$(Ni,Fe)_9S_8$].

Magmatic sulfide deposits containing nickel and copper ("Cu"), with or without (±) platinum-group elements ("PGE"), account for approximately 60 percent of the world's nickel production. Most of the remainder of the nickel production is derived from lateritic deposits which form by weathering of ultramafic rocks in humid tropical conditions. Magmatic Ni-Cu ± PGE sulfide deposits are spatially and genetically related to bodies of mafic and/or ultramafic rocks. The sulfide deposits form when the mantle-derived mafic and/or ultramafic magmas become sulfide-saturated and segregate immiscible sulfide liquids, commonly following interaction with continental crustal rocks.

Deposits of magmatic Ni-Cu sulfides occur with mafic and/or ultramafic bodies emplaced in diverse geologic settings. They range in age from Archean to Tertiary, but the largest number of deposits are Archean and Paleoproterozoic. Although deposits occur on most continents, ore deposits (deposits of sufficient size and grade to be economic to mine) are relatively rare; major deposits are present in Russia, China, Australia, Canada, and southern Africa. Nickel-Cu sulfide ore deposits can occur as single or multiple sulfide lenses within mafic and/or ultramafic bodies with clusters of such deposits comprising a district or mining camp. In Canada nickel sulphide deposits are typically found in clusters or "belts" often spanning 10's to 100's of kilometers. These include deposits in the Voisey's Bay area of Labrador, the Raglan (Cape Smith) belt of northern Quebec, the Thompson belt in northern Manitoba and a number of deposits in the Timmins area in the southern Abitibi. The well-known nickel deposits of the Sudbury basin, while sharing a number of features in common with these other deposits, are believed to be related to ultramafic activity triggered by a meteorite impact and are thus in a class of their own.

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[1] *Select Sources of Information*
http://www.ssina.com/overview/how.html
http://www.insg.org/ - International Nickel Study Group
http://www.worldstainless.org
http://www.nickelinstitute.org
http://www.imf.org/external/np/res/commod/index.aspx - IMF Commodity Price Forecasts
http://databank.worldbank.org/data/reports.aspx?source=Global-Economic-Monitor-(GEM)-Commodities

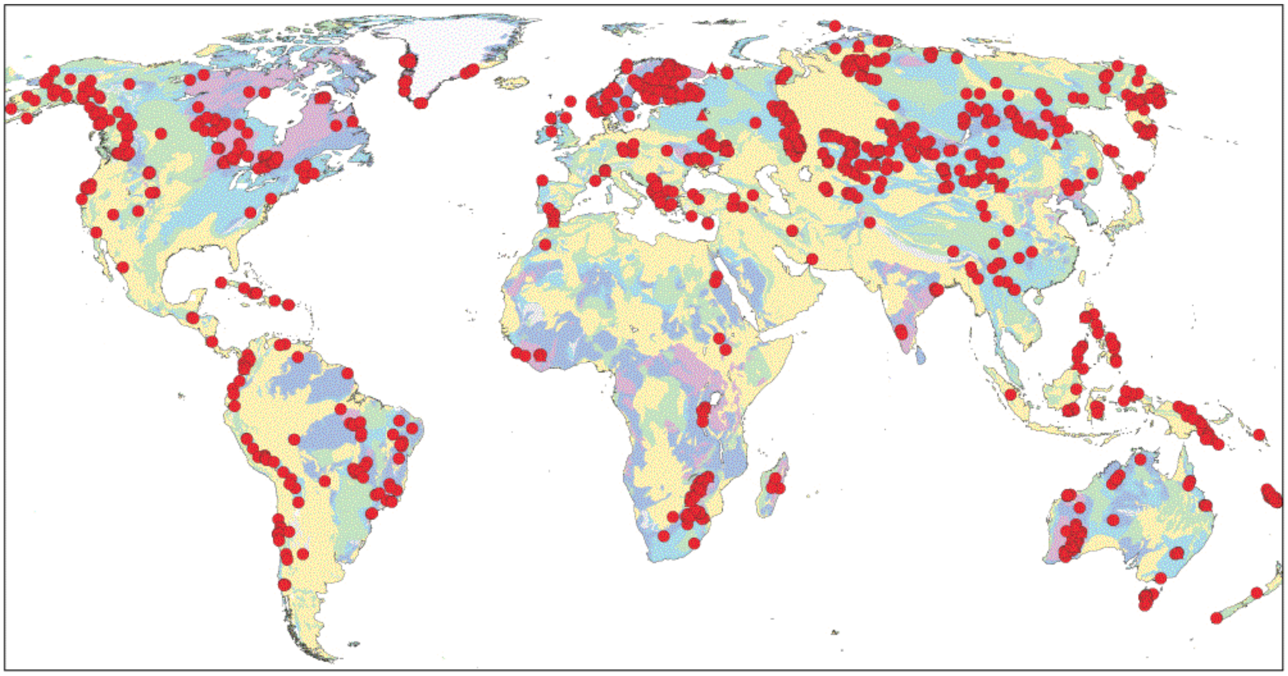


Figure 13**: *Magmatic Ni-Cu-PGE Deposits of the World***
GSC Maps of Deposits & Resources Eckstrand O.R. (undated)

Typically, deposits contain ore grades of between 0.5 and 3 percent Ni and between 0.2 and 2 percent Cu. Tonnages of individual deposits range from a few tens of thousands to tens of millions of metric tons (tonnes) bulk ore. Two giant Ni-Cu districts, with ≥10 Mt Ni, dominate world Ni sulfide resources and production. These are the **Sudbury district**, Ontario, Canada, where sulfide ore deposits are at the lower margins of a meteorite impact-generated igneous complex and contain 19.8 Mt Ni; and the **Noril'sk-Talnakh district**, Siberia, Russia, where the ore deposits are in subvolcanic mafic intrusions related to flood basalts and contain 23.1 Mt Ni. In the United States, the **Duluth Complex** in Minnesota, comprised of a group of mafic intrusions related to the 1.1 Ga Midcontinent Rift system, represents a major Ni resource of 8 Mt Ni, but deposits generally exhibit low grades (0.2 percent Ni, 0.66 percent Cu) and remain stuck in the process of being proven to be economic. This information is not necessarily indicative of the mineralization on the property that is the subject of the technical report.

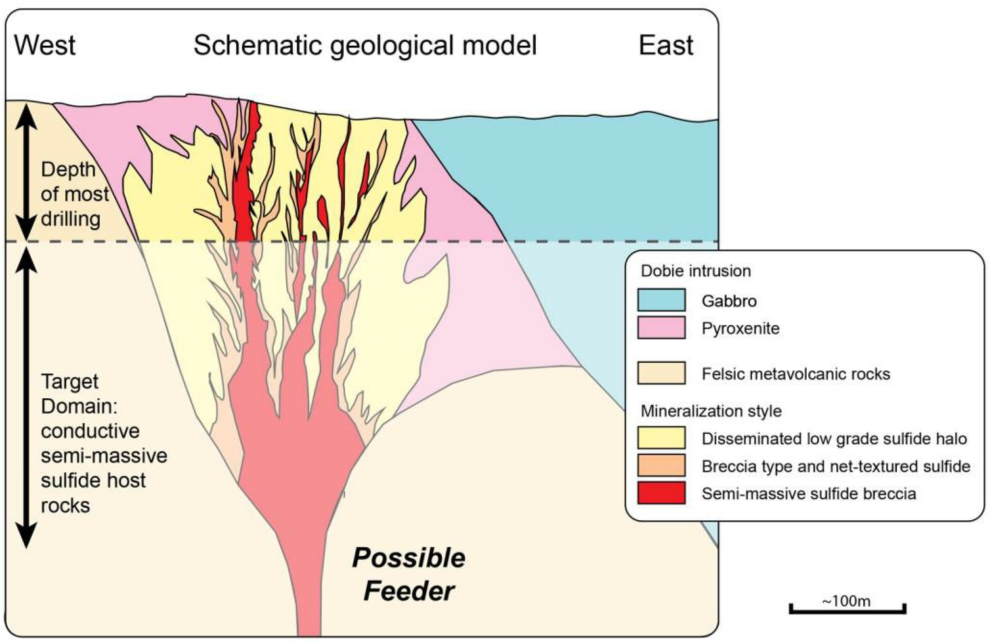
The sulfides in magmatic Ni-Cu deposits generally constitute a small volume of the host rock(s) and tend to be concentrated in the lower parts of the mafic and/or ultramafic bodies, often in physical depressions or areas marking changes in the geometry of the footwall topography. In most deposits, the sulfide mineralization can be divided into disseminated, matrix or net, and massive sulfide, depending on a combination of the sulfide content of the rock and the silicate texture. The major Ni-Cu sulfide mineralogy typically consists of an intergrowth of pyrrhotite (Fe_7S_8), pentlandite ($[Fe, Ni]_9S_8$), and chalcopyrite ($FeCuS_2$). Cobalt, PGE, and gold (Au) are extracted from most magmatic Ni-Cu ores as byproducts, although such elements can have a significant impact on the economics in some deposits, such as the Noril'sk-Talnakh deposits, which produce much of the world's palladium. In addition, deposits may contain between 1 and 15 percent magnetite associated with the sulfides.

8.2 <u>The Model</u>

Nickel is believed to be a primary component of the earth's core and largely concentrated in the core and mantle. In the near surface it is most commonly found in association with ultramafic (or mafic) rocks which are high temperature, iron-magnesium rich, typically intrusive rocks sourced from the upper mantle or very deep crustal levels. Current modeling suggests the ultramafic magma's rose toward the surface along mantle plumes – or hot spots – which produce island arc chains, ie the still forming Hawaiian Islands.

The model described below, outlines traditional thinking related to formation of nickel-copper-PGE sulphide deposits.

Within the ultramafic intrusion or flow, sulphide droplets form, often through contamination of the magma with sulphur from adjacent rock units. These sulphide droplets are convected through the magma along flow lines. As they convect through the magma they collect or scavenge nickel, copper and the platinum group elements from the magma – as all of these elements have a strong chemical affinity for sulphur. As the sulphide droplets accumulate metals they become heavier than the magma itself and begin to sink through the magma and accumulate in depressions in the base of the ultramafic.



GEOLOGICAL MODEL SHOWING THE STYLE OF MINERALIZATION AT NICO1, AND HIGHLIGHTING THE OPPORTUNITY TO EXPLORE FOR HIGHER GRADE MINERALIZATION AT DEPTH WITHIN THE PYROXENITE WHERE THERE IS VERY LITTLE DRILLING (BELOW HORIZONTAL DOTTED LINE).

Figure 14: ***Geological Model at Nico 1 deposit Highlighting the Exploration Target***
(from Dr. Peter Lightfoot, PhD. Internal reporting for Crystal Lake (Feb 2018)

8.3 Sulphide Textures – A Key to Recognizing and Navigating in Magmatic Nickel Systems

Ultimately sufficient sulphides will accumulate within these depressions to form nickel-copper-PGE orebodies. These orebodies are characterized by a number of distinct textural elements.

Working from top to bottom of the system geologists note at the highest levels broad zones of disseminated (or interstitial) sulphide mineralization. You can think of these as individual sulphide drops frozen in place within the magma – sulphides that either didn't have the time to sink before the magma crystallized or drops that didn't reach sufficient size to sink. Typically, this type of disseminated ore is seen above and lateral to the higher grade, more massive parts of the system. One of the characteristics of magmatic sulphides is that the individual sulphide grains – like the orebodies as a whole – tend to be zoned having a more copper-rich top and nickel rich base. Thus magmatic sulphide grains are typically multi-phase being comprised of separate chalcopyrite (copper-rich), pyrrhotite (iron-rich) and pentlandite (nickel-rich) phases.

A number of open pit nickel deposits have been developed within these disseminated zones which tend to be more laterally extensive than the massive sulphide zones. Often nickel systems progress no further than this disseminated phase. The large Dumont nickel deposit, located near Amos, Quebec would be an example of a large, disseminated nickel deposit which lacks appreciable semi-massive or massive sulphide zones. Average grade of this deposit varies from 0.24% to 0.34% Ni. This information is not necessarily indicative of the mineralization on the property that is subject of the technical report.

Deeper into the systems the sulphide drops begin to coalesce as they start to sink to what is known as "blebby" or "globular" ore. These "blebs" may reach several centimeters in size and range from aggregates of droplets to semi-massive sulphide "balls". This type of texture is relatively rare, as the blebs are effectively caught in place as they falling through the magma. Blebs comprised mainly of pyrrhotite with lesser pentlandite and chalcopyrite in ultramafic (peridotite) matrix.

As the sulphides continue to sink we see net-textured (or matrix) ores which are the most common ore type in most high-grade nickel deposits. Here sulphides range from 5 to as much as 50+% of the rock, forming a matrix between silicate minerals. Depending on the dynamics of the magma chamber the sulphides can be thought to have sunk between, and cemented together, earlier formed silicate minerals, or the silicates may have settled into a sulphide pool as the chamber cooled. The genesis can be argued either way but what one ends up with is a "net" of partially connected sulphide grains. In some cases there is enough connectivity between the sulphide grains for them to produce weak to moderate geophysical (electromagnetic "EM") conductor. All of the mineralization styles above will typically produce I.P. (induced polarization) anomalies.

Ultimately, at the base of the sequence, the sulphide grains will settle until they dominate the base of the depression and form massive nickel-rich sulphides. These are typically the richest parts of any magmatic nickel system but massive nickel sulphide bodies are surprisingly rare, suggesting most systems crystallize before allowing the time for, or don't have the flow dynamics or geometry to generate, formation of massive sulphides. Typically the more massive parts of the system are moderately to highly conductive.

Polished thin sections of drill core from Nico 1 were examined by Dr. Peter Lightfoot, Technical Advisor to Crystal Lake. He reports, "*examination indicate that the host rocks are pyroxenites and the mineralization comprises pyrrhotite, pentlandite, and chalcopyrite. Although there is locally some pyrite, the sulfides appear to be devoid of minerals that negatively impact process technology (e.g. arsenic-rich sulfide minerals and/or platy minerals such as talc). Examination of the pentlandite indicates that the* *bulk of this mineral occurs in granular form that can easily be liberated from pyrrhotite. Moreover, an electron microprobe study of the pyrrhotite indicates that the Ni concentrations in representative samples are in the range 0.27-0.78 wt% Ni."*

8.4 Structural Modification

Following the formation of a nickel sulphide zone subsequent activity can modify these original textures. In many cases subsequent magma pulses into the host intrusion, or even new ultramafic volcanic flows, can partially or completely erode the early formed sulphide zones. In some cases, as in the Raglan area of northern Quebec, subsequent magma pulses have led to the formation of multiple "stacked" nickel zones within the host intrusive sequence.

Subsequent deformation, after the formation of the nickel ore bodies, can have a variety of effects and modify primary magmatic textures in a variety of ways. In the Thompson nickel camp of northern Manitoba many of the better orebodies have been remobilized into regional fold noses and have steeply plunging morphologies more similar to Archean gold deposits than classic nickel sulphide deposits.

Currently nickel is in excess supply in the market place which is roughly $34 billion(US) in size. 60% of the nickel industry is operating at a cash loss as of mid-2015, nevertheless there is no shortage of current and aspiring production stories in the nickel space as participants believe the market could tip into deficit in the very near future. Nickel output in 2017 fell by 24% however nickel demand for batteries is up significantly. Experimental work continues to increase the usage of nickel in batteries from 60% to possibly 85% Ni which strongly suggests a rising demand. Production of stainless steel continues to be the main end product.

Figure 15: ***Current Nickel Pricing to the end of 2018***
(extracted from https://tradingeconomics.com/commodity/nickel)

9.0 EXPLORATION

9.1 Introduction

The historical exploration was fully described in Section 6.0. Historically, the property was worked from 1952 – 1972, with prospecting, sampling, ground geophysical surveys (magnetic, electromagnetic, induced polarization and resistivity). Over 220 diamond drill holes (as detailed in Section 6), rotasonic drill holes and metallurgical studies were carried out by various mining companies. Not all of this work, however, is written up in the public records.

Since 2015 Crystal Lake, as operator, carried out additional surveys on the Dobie patents. In 2015 and 2018 the following work described below was conducted and supervised by Crystal Lake consultants as summarized. In the absence of surface outcrop most of this exploration was of indirect measurements by geochemical and geophysical means followed by limited diamond drilling.

9.2 Mapping, Geology

No recent mapping on Dobie Township has replaced the map created in 1953 (by ODM). The Company has not mapped the patents nor sampled any outcrops due to limited surface exposures.

9.3 Structural Data

Structural interpretation cannot be determined given the limited exposure of outcrop (under 5%). The structural features that are presented on the maps have been derived by Government mapping (Fletcher & Irvine 1953), geophysical data and industry drill-hole data. Stratigraphic features were determined by from pillow structures in the mafic metavolcanic units. In the metasediments these have been obscured by subsequent metamorphic events of greenschist facies grade. The general structural trend of the area is northeast with local irregularities resulting from igneous intrusions

9.4 Geochemistry

No regional, or Dobie specific, geochemical survey programs were done in the 1950's to accompany the geological mapping. Quaternary mapping by Bajc (1991) ran some radioactive dating of fossils sites at 9,750 to 10,810 years for the Lake Agassiz glacial period regression. There are no radioactive data for the Dobie Intrusion. The nearest age date is for a diabase dike dated 1462 +/- 175 My (Wanless et. Al., 1970).

In 2015 Emerald Lake, one of the vendors, contracted Actlabs, a full service and accredited mineral laboratory in Ontario, to carry out 2 Spatiotemporal Geochemical Hydrocarbon *{"SGH"*) geochemical surveys on the NICOBAT properties. Soil samples were collected from sites on a cut grid and analyzed by Actlabs. For SGH the quality of sample or the soil horizon sampled is immaterial for interpretation therefore all samples collected are representative from the location sampled.

SGH differs from conventional geochemistry as it is an "organic", deep-penetrating geochemical survey which targets individual metals. In this instance, Ni, Cu and PGEs were analyzed and presented as separate anomalies. The author of this report superimposed the 2015 drill locations with the Ni and the PGE anomalies.

SGH is the only known organic geochemical method that, in spite of the name[1], uses "non-gaseous" semi-volatile organic compounds interpreted using a forensic signature approach. The analysis involves the testing for 162 hydrocarbon compounds in the C5-C17 carbon series. These hydrocarbons have been shown to be residues from the decomposition of bacteria and microbes that feed on the target commodity as they require inorganic elements to catalyze the reactions necessary to develop hydrocarbons and to grow cells in their life cycle. Specific classes of hydrocarbons have been successful for delineating mineral targets found at over 950 meters in depth. SGH is unique and should not be confused with other hydrocarbon tests or traditional analyses that measure C1 (methane) to C5 (pentane) or other gases. Thus, in spite of the name, SGH does not analyze for any hydrocarbons that are actually gaseous at room temperature. SGH can also be used to analyze for hydrocarbons in sample types other than soil thus the results are independent of the sample type.

Interpretation is based solely on SGH data and does not include the consideration from any other geochemistry (inorganic), geology, or geophysics that may exist related to the survey area(s). The interpretation of the SGH data is in reference to a template or group of SGH classes of compounds specific to a type of mineralization or target that is chosen by the client (i.e. in this instance copper, nickel, platinum). The various templates of SGH Pathfinder Classes that together define the forensic identification signature for a wide range of commodity target types, have been developed through years of research and have been further refined from review of case studies and orientation studies has proven to be able to also address a wide range of lithologies. Over 1,000 studies by Actlabs have refined the SGH method since first developed in 1996. In interpreting the results the SGH Pathfinder Class maps are often expected to illustrate an anomaly that is <u>a vertical projection over mineralization</u> at the shallowest location. The P.Geo. personally recommends that Crystal Lake consider testing the SGH anomalies and has personal experience in this methods success at locating deep mineral deposits.

Results of the interpretation by Actlabs of 228 samples suggest that the identified outstanding nested-segmented halo anomaly of the northern Redox zone appears to vector to the source of the intrusion where upwelling of mineralized fluids may have occurred. This is also expected to be the case for the central and southern Redox zones however, due to "*the significant larger dispersion patterns the intrusion as the source of the mineralized fluids may be quite a bit deeper*". This may also indicate that there were multiple intrusive events that took place at different times. The SGH results from the NICOBAT survey illustrate separate anomalies with signatures associated with copper, nickel and PGE. SGH has often successfully illustrated the zonation that may be present which together describe the possible structure, in this case for a Cu-Ni-PGE type target. Based on an Actlabs, SGH rating scale of 0 to 6 the results of the Dobie intrusion study on the patented ground has been rated from 5.0 to 5.5, in another words, <u>very highly rated drill targets</u>. While complex in detail SGH signatures of copper, nickel and PGE are overlapping zones define the deposit type quite well. However, the interpreter notes that as platinum or other platinum group elements are far less mobile than copper, nickel, or gold, any platinum that might be present is probably near the geometric center of the Redox cell <u>and is at a much greater depth</u>. PGE's may thus be at a depth that is not able to be detected with SGH. The SGH signature therefore for PGEs is given a lower rating of 4.0 out of a 6.0 rating number.

Maps illustrating the text above are provided below.

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[1] *Now referred to as Spatiotemporal Geochemical Hydrocarbons extractive procedures.*

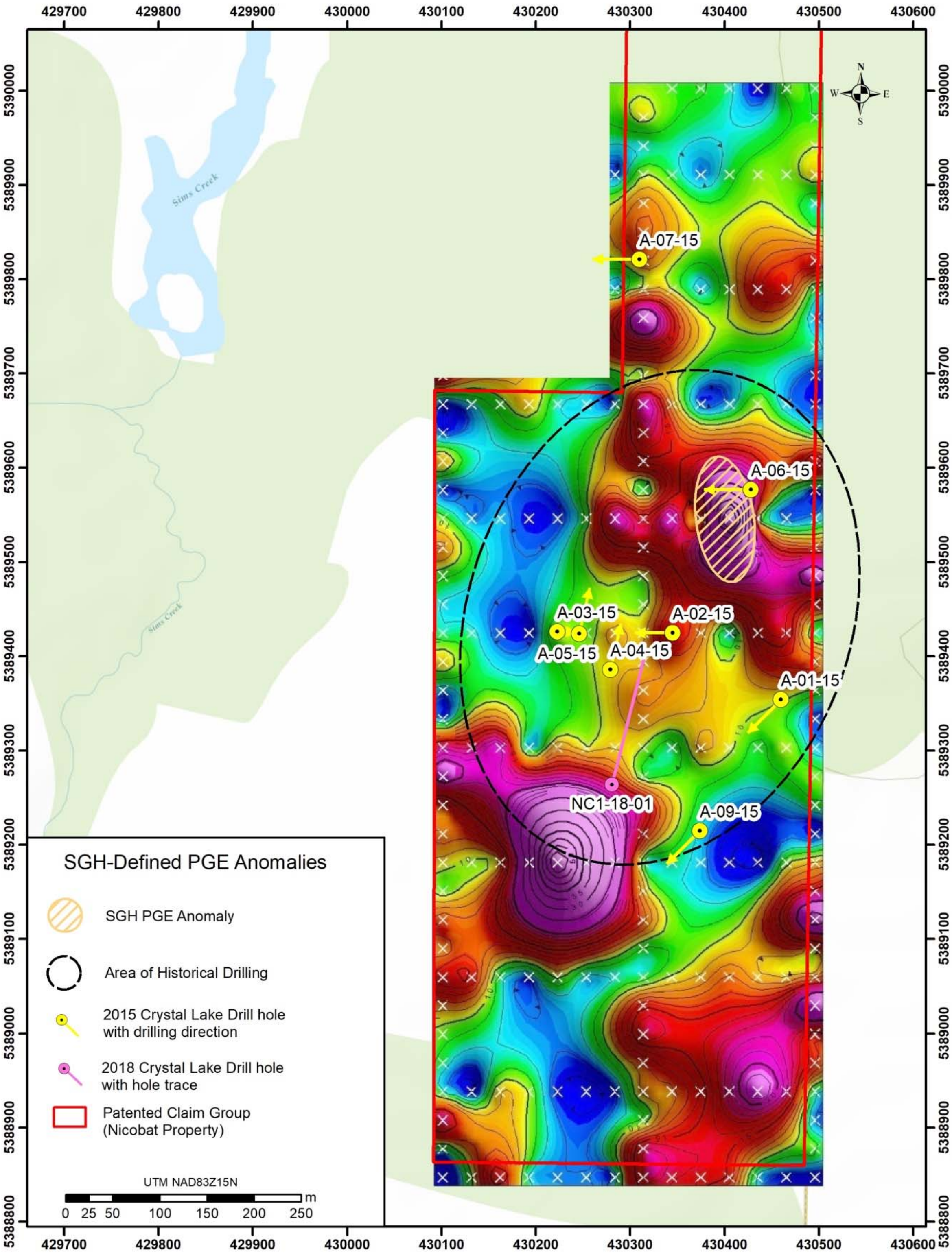


Figure **16:** ***SGH PGE Results in Relation to the Drilling; Dobie Patents***

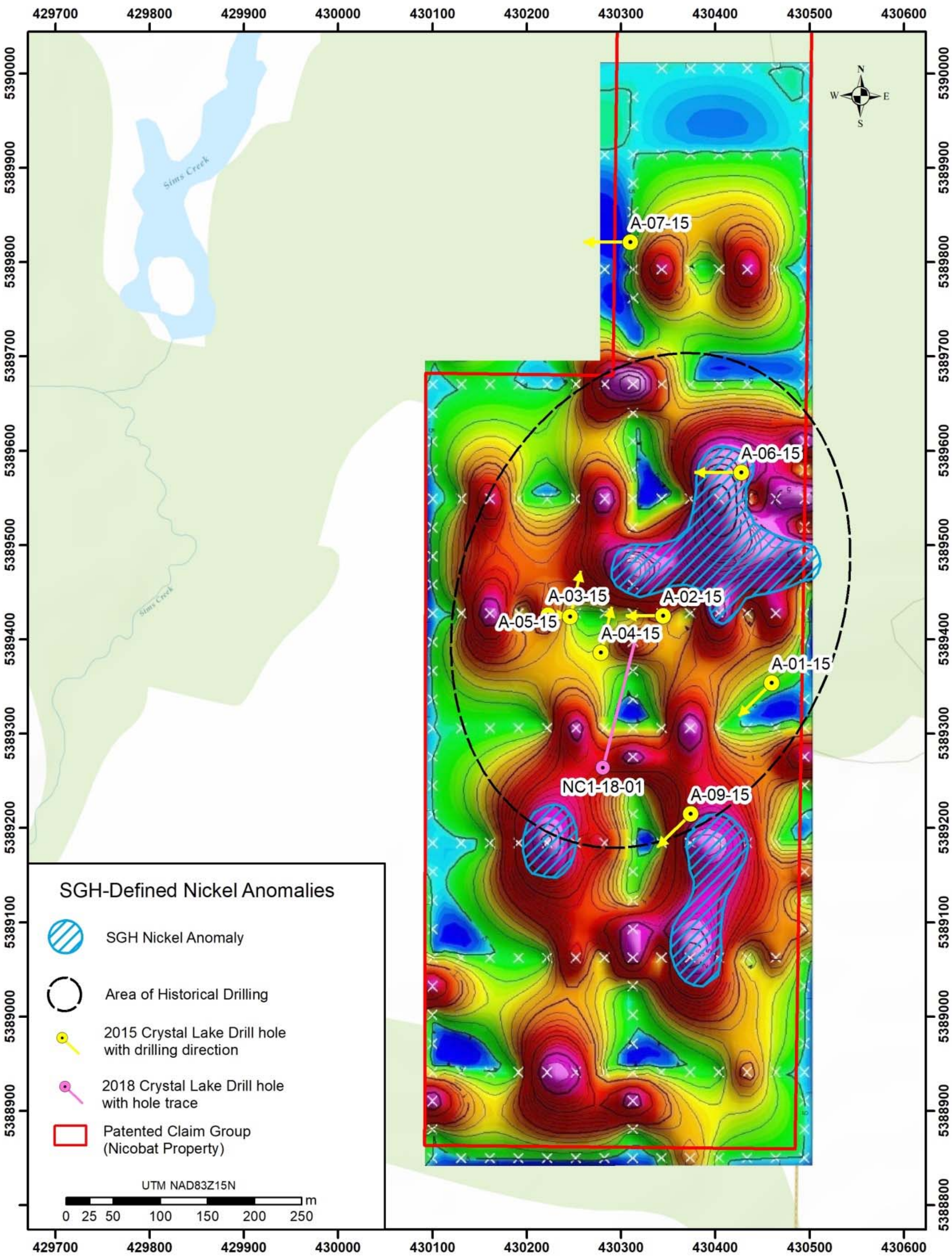


Figure 17*: **SGH Ni Results in Relation to Location of Drill Holes***

9.5 Geophysics

The following geophysical surveys were performed on and around the NICOBAT Property.

Stratmat 1957 (J. Bolen Estate)
Survey 1 – Recon Mag Survey – 100ft intervals along 400ft line. Highs associated with magnetite – sulphides.
Survey 2 – Ground EM Survey – 100ft intervals with 200ft lines. N-S anomalies with sulphides and E-W anomalies with faulting.
Survey 3 – Ground EM by different method – some coincident anomalies.
Survey 4 – Gravity Survey – 50ft intervals along 200ft lines. Outlined gabbro intrusion.
Survey 5 – Ground EM Survey – 50ft intervals along all N-S lines and confirms the reconnaissance survey.

Note that in the 1950s EM was a developing technique and depth of penetration of the survey would be less than 150 feet (45m).

Ontario Geological Survey 1990
The Rainy River area was flown by the OGS in 1990, using Airborne Electromagnetic and Total Magnetic Survey at scale 1:20,000 (maps 81506 -81537). Five EM anomalies, with a co-incident magnetic high were located on the north end of the property which may indicate sulphide mineralization. The natural gas pipeline is highlighted by the airborne survey as a non-geological conductor.

In 2015 both VLF and magnetometer surveys were carried out by Geosig Inc., based out of Quebec City, P.Q., consulting for Emerald Lake on the patent properties. Work done was in August, 2015 prior to any drilling. Figure 19 illustrates the residual magnetic signature over the patents.

Crystal Lake 2018

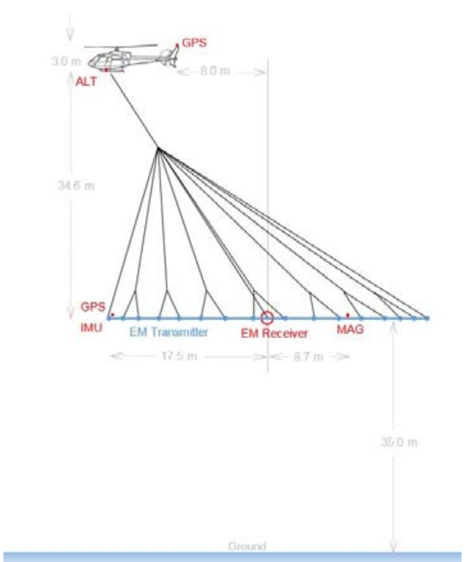


Figure 18 ***HELITEM35c Airborne System***

In 2018 a helicopter deep-penetrating time-domain electromagnetic survey was flown over numerous project areas in NW Ontario, including the two patents discussed in this report, to help evaluate the mineral potential of the Nicobat Project. CGG, through its' Toronto office is a geophysical survey company in operation since 1931 with 35 locations worldwide. CGG carried out, supervised, and provided interpretation of the HELITEM35C airborne survey. The following maps illustrate the results.

The basis of the transient electromagnetic (TEM) geophysical surveying technique relies on the premise that changes in the primary EM field produced in the transmitting loop will result in eddy currents being generated in any conductors in the ground. The eddy currents then decay to produce a secondary EM field which may be sensed in the receiver coil.

A Helitem 35C EM system was flown using a 35m diameter loop at a height of 35m and 15 Hz frequency from March 16-22, 2018. A total area measuring 1,500 by 3,500m was covered at a line spacing of 125m. No magnetic or TEM anomalies were located by the airborne EM survey (see attached figures, below)

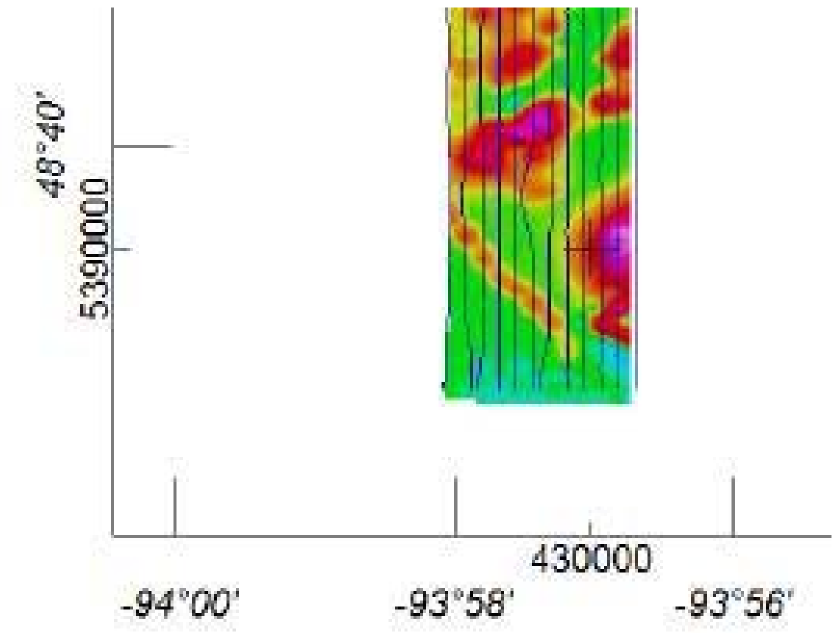


Figure 19: ***HELITEM35c Residual Magnetics Properties***

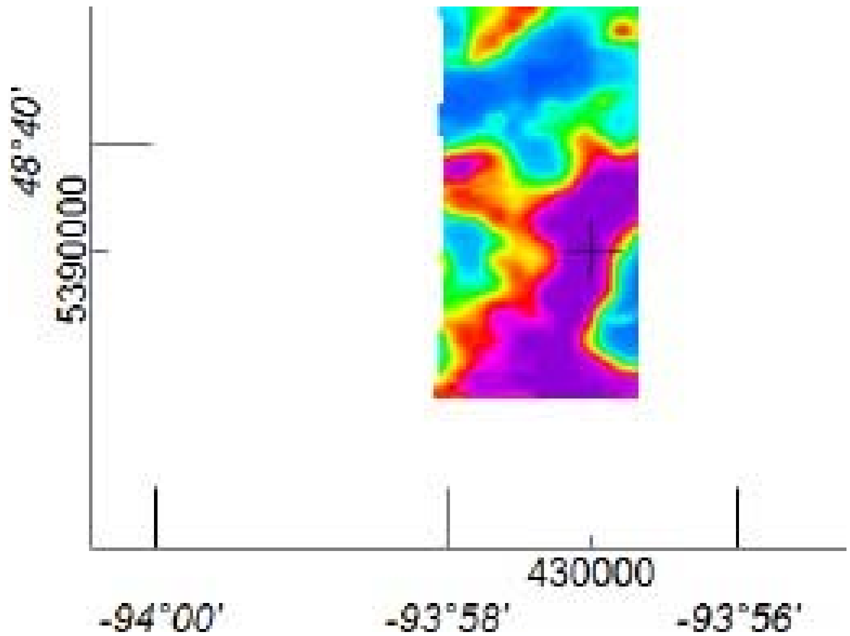


Figure 20: ***HELITEM35c Conductivity DB_7 Channel (04)***

In addition to airborne work, Lamontagne, from March 15-April 20 2018, carried out a UTEM5 14ch surface survey and BHUTEM4 borehole survey of Holes A-04-15 and NC1-18-01 to a depth of 685metres with an estimated 200 metre reactive range to the side of the boreholes. The UTEM-5 system was chosen as it was designed to detect very conductive nickel sulphide bodies. This geophysical system is widely used by nickel producers due to its ability to detect and discriminate between highly conductive bodies such as those produced by massive nickel sulphides. The above surveys were carried out to detect or outline deeper features and potential depth continuations of shallow features. The readings taken on surface were sufficient to detect such a body to within 400 – 500 meters depth. A total of 10.775 km was surveyed on E-W Lines picketed at 200m line spacing from Line 0 to 1600N. The downhole surveys of Holes A-04-15 and NC1-18-01 were both surveyed to a depth of 685m using loops from 500 to 1650 by 1500m in size. A 15 to 20m station interval was measured. Lamontagne is a Canadian company based in Kingston that specializes in deep geophysical exploration.

The UTEM5 system collects 3-component EM data from large transmitter loops – three coupling angles – simultaneously translating to superior target definition and improved detection of all targets. BH UTEM 4 is the newest generation down-Hole probe EM system. It can be used to probe drill holes up to 3,400 metres deep. Magnetic, inclinometer and temperature data profiles can be plotted in addition to the EM data. Location of the survey grids, reading taken and the results of these surveys are presented in the profile diagrams below. Surveys on both holes failed to detect an anomaly that would suggest the presence of massive sulphides. A possible cause of the lack of a highly conductive response could have been due to the fact that the EM transmitter loop was not coupled with a potential body which had to be tabular in shape steeply dipping to the west with a north-south strike. The data was examined by Bob Lo, M.Sc, MBA, P.Eng, a noted expert in interpreting down-hole geophysical data.

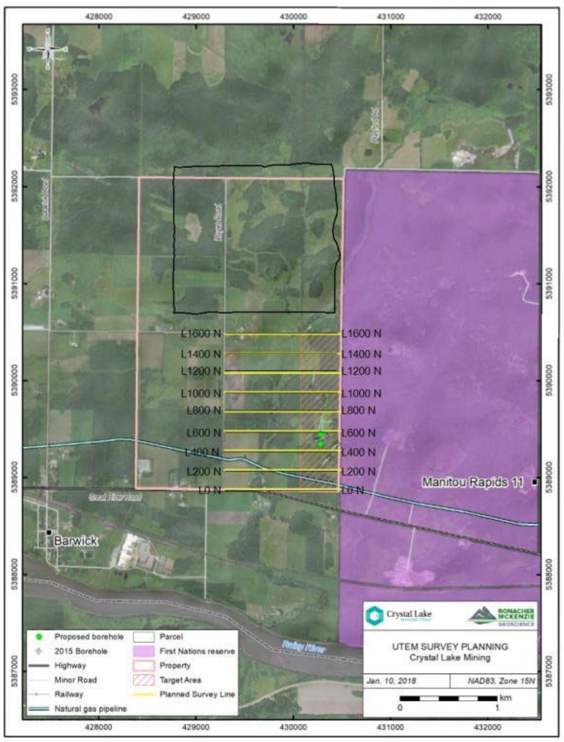
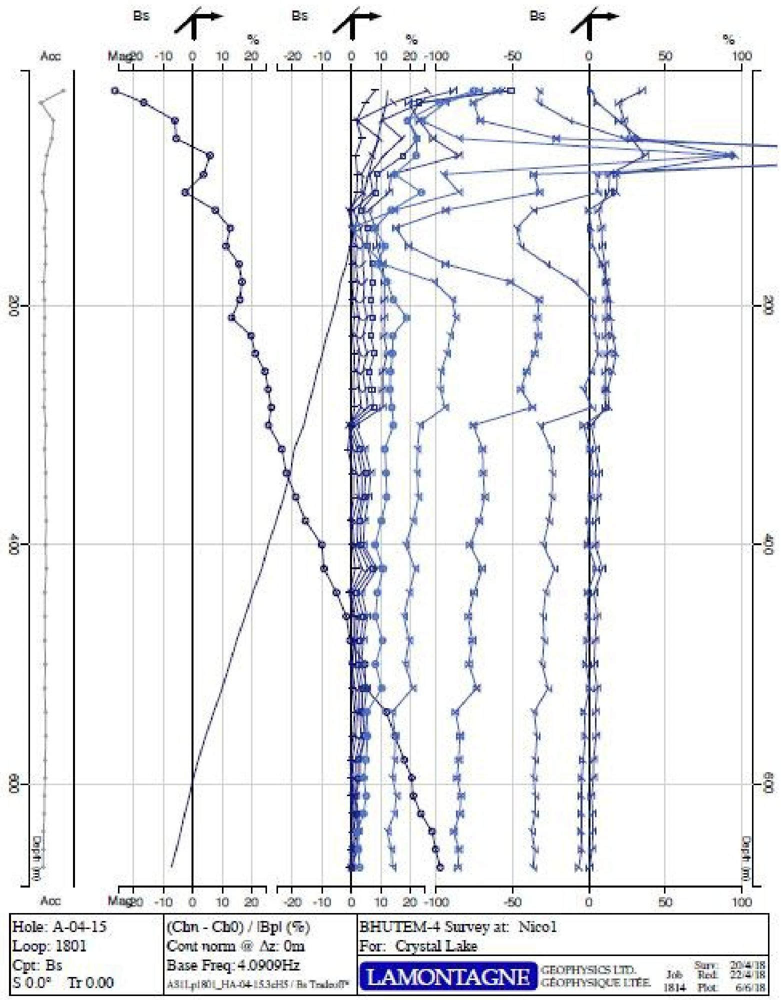


Figure 21: ***Location of Two Grids and Survey Stations Established for Down-Hole UTEM Survey***



A04-15 - Loop 1801 Profiles PS 22

Figure 22: ***Typical Profile of Down-Hole Data for Hole A04-15 to a depth of 685metres Illustrating the Subsurface Mineralization to 75metres but nothing below***

10.0 2015 & 2018 CRYSTAL LAKE DRILL PROGRAMS

As previously mentioned, the historical drilling was summarized in Section 6 of this report. Details of this exploration are scanty and not well recorded. The locations of the historical drilling (see Figures 4 and 5) are as accurate as the historical data permits but should not be used to calculate a possible resource number. All resources previously quoted are historical and cannot be verified with original logs and assay sheets and confirmatory drilling. *A qualified person has not done sufficient work to classify the historical estimates mentioned in previous sections of this report as current mineral resources or mineral reserves. The Company is not treating these historical estimates as current mineral resources or mineral reserves.*

The following assay data/hole data is extracted from reports by Falconbridge, 1953 and are representative of the mineralization intersected in the historical holes. *Holes not assayed are not tabulated below:*

Hole D1 – 133.8m with 7.16m of 0.60% Cu, 0.95% Ni.
Hole D2 – 113.4m with 8.29m of 0.32% Cu, 0.39% Ni.
Hole D3 – 69.5m with 7.10m of 0.48% Cu, 0.40% Ni.
Hole D4 – 58.2m with 4.12m of 0.43% Cu, 0.66% Ni.
Hole D5 – 63.6m with 11.13m of 0.31% Cu, 0.19% Ni.
Hole D6 – 62.5m with 5.95m of 0.48% Cu, 0.32% Ni.
Hole D7 – 62.2m with 8.23m of 0.29% Cu, 0.42% Ni.
Hole D9 – 88.7m with 1.52m of 0.12% Cu, 0.95% Ni and 5.98m of 0.35% Cu, 0.17% Ni.
Hole D10 – 81.4m with 4.57m of 0.77% Cu, 0.49% Ni.
Hole D11 – 157.9m with 5.70m of 0.41% Cu, 1.10% Ni. and with 3.29m of 0.40% Cu, 0.38% Ni.
Hole D12 – 102.4m with 3.57m of 0.45% Cu, 0.17% Ni and 6.13m of 0.88% Cu, 0.36% Ni.
Hole D13 – 127.4m with 6.40m of 0.43% Cu, 0.15% Ni.
Hole D14 – 105.2m with 3.45m of 0.20% Cu, 0.84% N Hole D15 – 80.2m with 0.46m of 0.56% Cu, 0.13% Ni.
Hole D16 – 142.4m with 12.35m of 0.82% Cu, 0.37% Ni and 4.57m of 0.42% Cu, 0.48% Ni
Hole D25 – 338.0m with 3.05m of 0.27% Cu, 0.04% Ni.

Holes R3, R5, R6, R7 on IR#11; 200m E of hole D1 Hole R3 151.2m with no assays.
Hole R5 – 34.5m with 1.22m of 0.34% Cu, 0.31% Ni.
Hole R6 – 35.4m with 2.44m of 0.25% Cu, 0.14% Ni.

In 2015 Crystal Lake drilled 9 holes of NQ core on the property using Full Force Drilling Ltd. out of Peachland, B.C. Emerald Lake was in charge of the project with work being supervised by their consultants on behalf of Crystal Lake. Work was completed in the Fall of 2015 with the program finishing on October 16. Daily work sheets from Full Force were examined to confirm final depths of the holes and any notes on recovery. Original assay sheets were provided by Actlabs to verify core logs.

A site visit was made by the author to substantiate hole locations, outcrops (pit) and review some of the drill core. Core was taken and check assays carried out at 2 independent labs (see Appendix IV). Cross-sections on only the deepest hole (A-04-15) were drawn as it was the deepest hole and the best mineralized. (figures 23 to 26). The results are deemed reliable and there are no factors that could impact the accuracy of the assay data.

In 2018 one new hole (NC1-18-01) was drilled to a depth of 700m (measured downhole). The core was logged by a certified P.Geo. Dr. Luc Harnois, of Ronacher McKenzie Geoscience. In addition Hole A-04-15 was extended from 300m to 700m depth and logged by the same P.Geo., Dr. Harnois. The log for NC1-18-01 is appended in the Appendix. Core was not re-assayed as no mineralized sections were intersected No mineralization was intersected in the extended hole A-04-15. All original assay sheets from a full-service accredited Lab were examined by the author for accuracy.

Plate 3: ***2015 Crystal Lake Drill Hole Collar***

Plate 4: ***Drill Hole Collar***

Holes surveyed by Laird Tomalty, field & logistics manager April, 2016

Table3: ***Summary of 2015 Drill Data***

Hole ID	Easting	Northing	Azi	Dip	Total Depth	Total Depth	Start Date	End Date
	NAD 83	NAD 83			(feet)	(meters)		
A-0-15	431715	5396626	262.8	-45	300	91.43	26-Sep-15	28-Sep-15
A-01-15	430460	5389354	225	-45	500	152.39	10-Oct-15	11-Oct-15
A-02-15	430345	5389425	270	-45	580	176.78	29-Sep-15	01-Oct-15
A-03-15	430223	5389426	90	-45	580	176.69	07-Oct-15	10-Oct-15
A-04-15	430279	5389386	13	-40	1000	304.72	04-Oct-15	07-Oct-15
A-05-15	430246	5389424	13	-40	890	271.27	01-Oct-15	03-Oct-15
A-06-15	430428	5389577	270	-45	680	207.24	09-Oct-15	10-Oct-15
A-07-15	430310	5389821	270	-50	380	115.79	12-Oct-15	13-Oct-15
A-09-15	430374	5389215	225	-45	500	152.40	15-Oct-15	17-Oct-15

Table4: ***Summary of 2018 DDH***

(summary log had to be created from various Excel files)

Hole ID	Easting	Northing	Azi	Dip	Total Depth	Total Depth	Start Date	End Date
	NAD 83	NAD 83			(feet)	(meters)		
NC1-18-01	430281	5389264	14	-50	2,296	700	24-Mar-18	not stated
A-04-15 (drilled Deeper)	430279	5389386	13	-40	To 2,296	To 700m (extension)	17-Mar-18	23-Mar 18

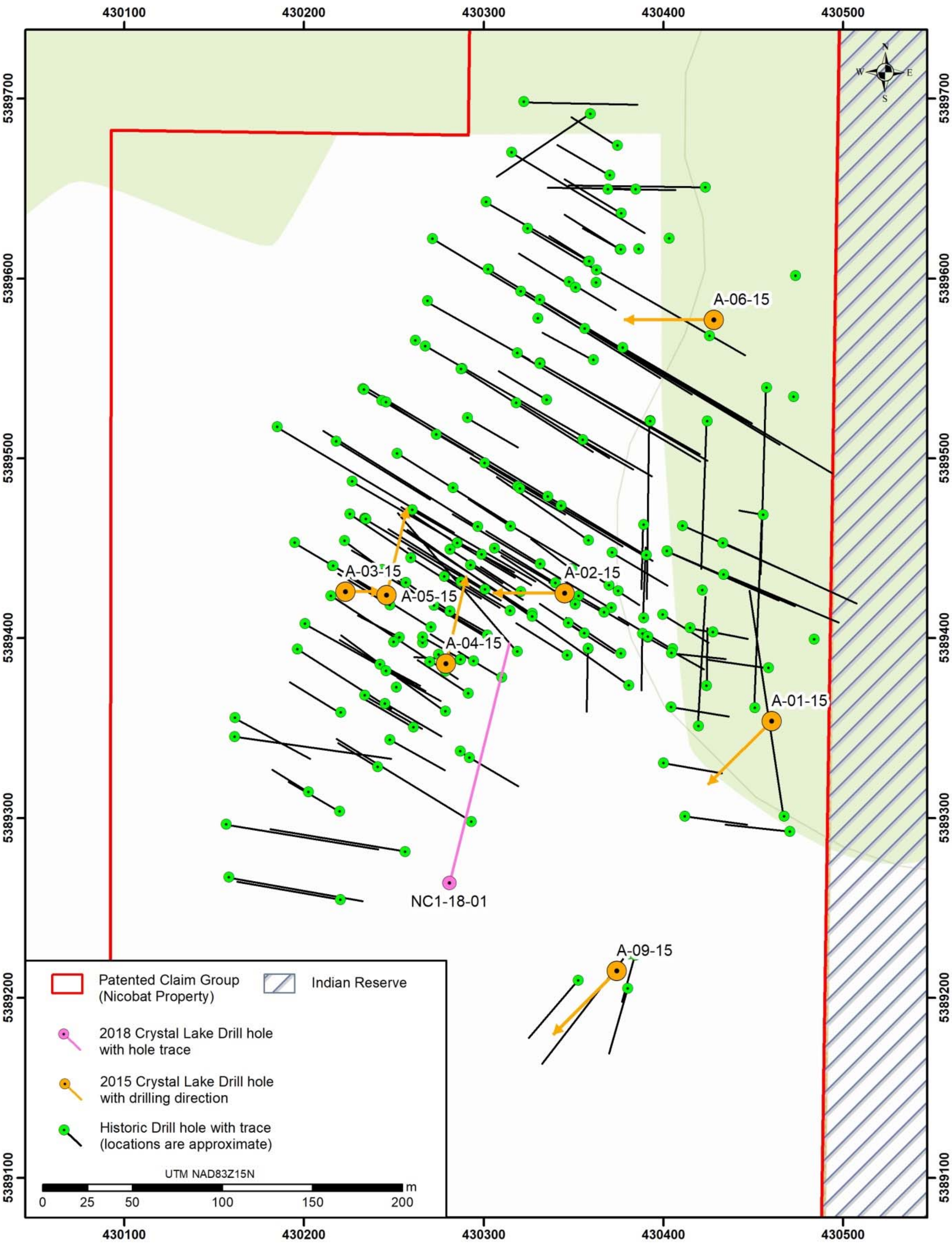


Figure 23**: *2015 & 2018 Crystal Lake DDHs on Plan Map of Historical Drill Holes***

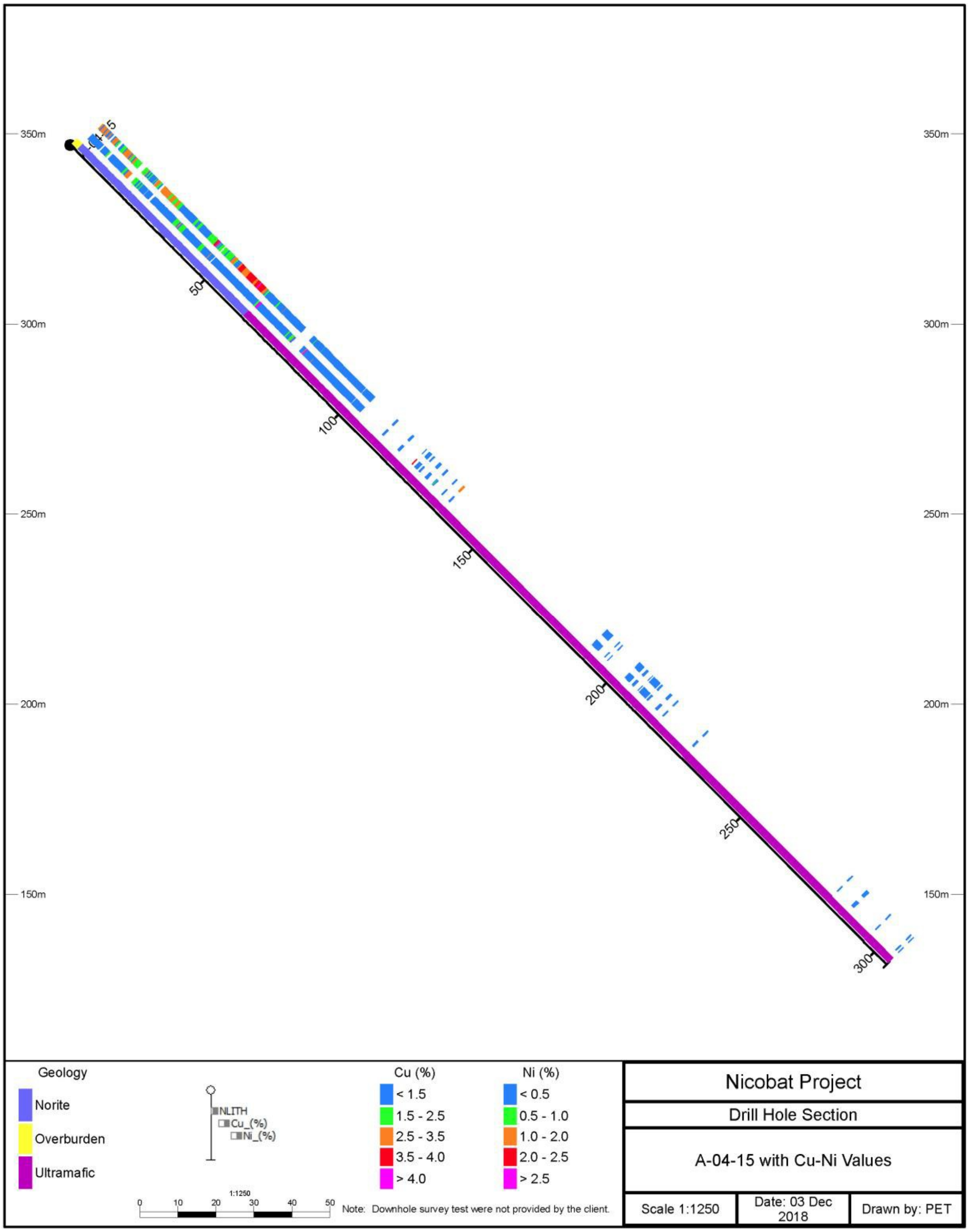


Figure 24**: *Cu/Ni Values on DDH A-04-15 Cross Section***

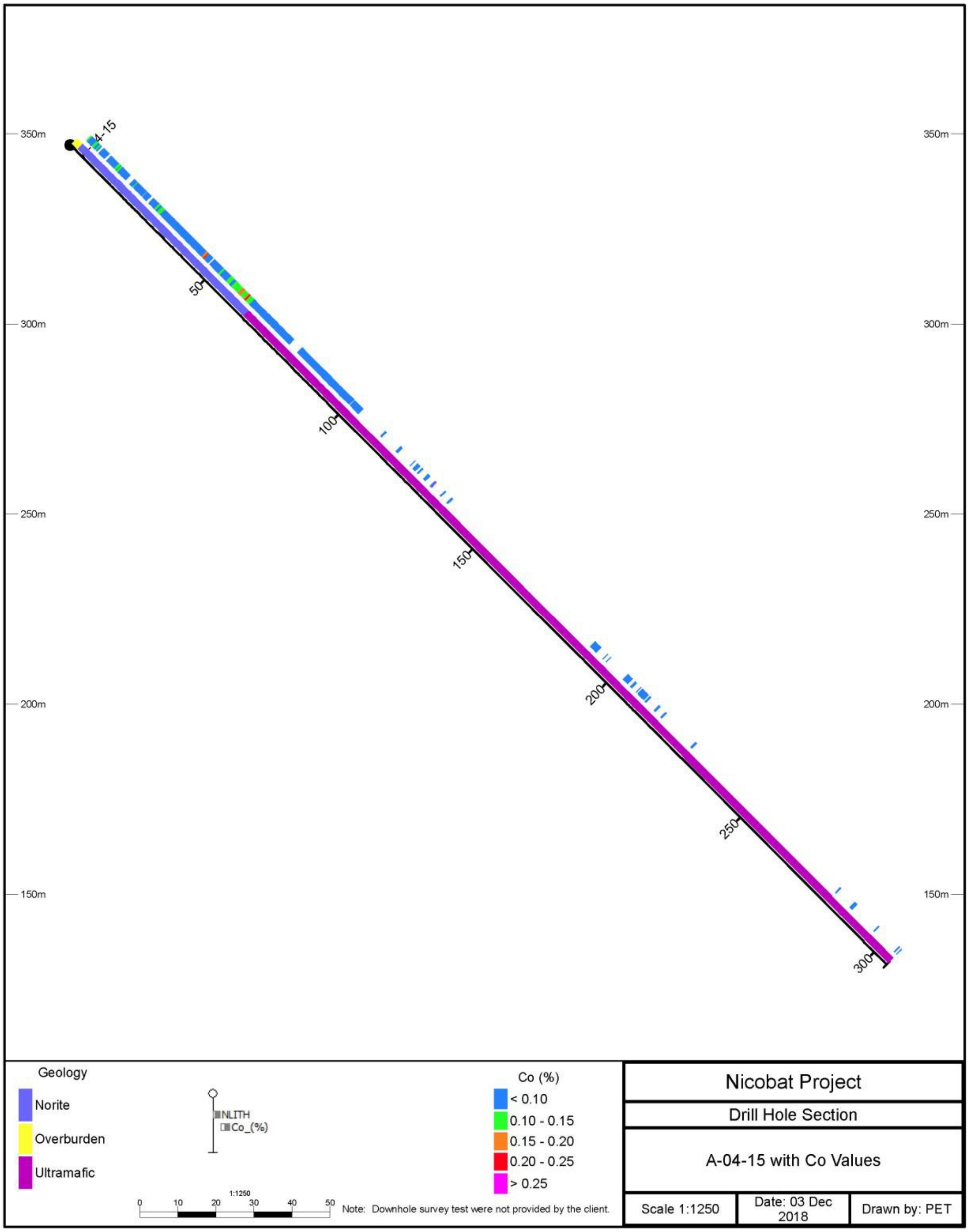


Figure 25**: *Co Values on DDH A-04-15 Cross Section***

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

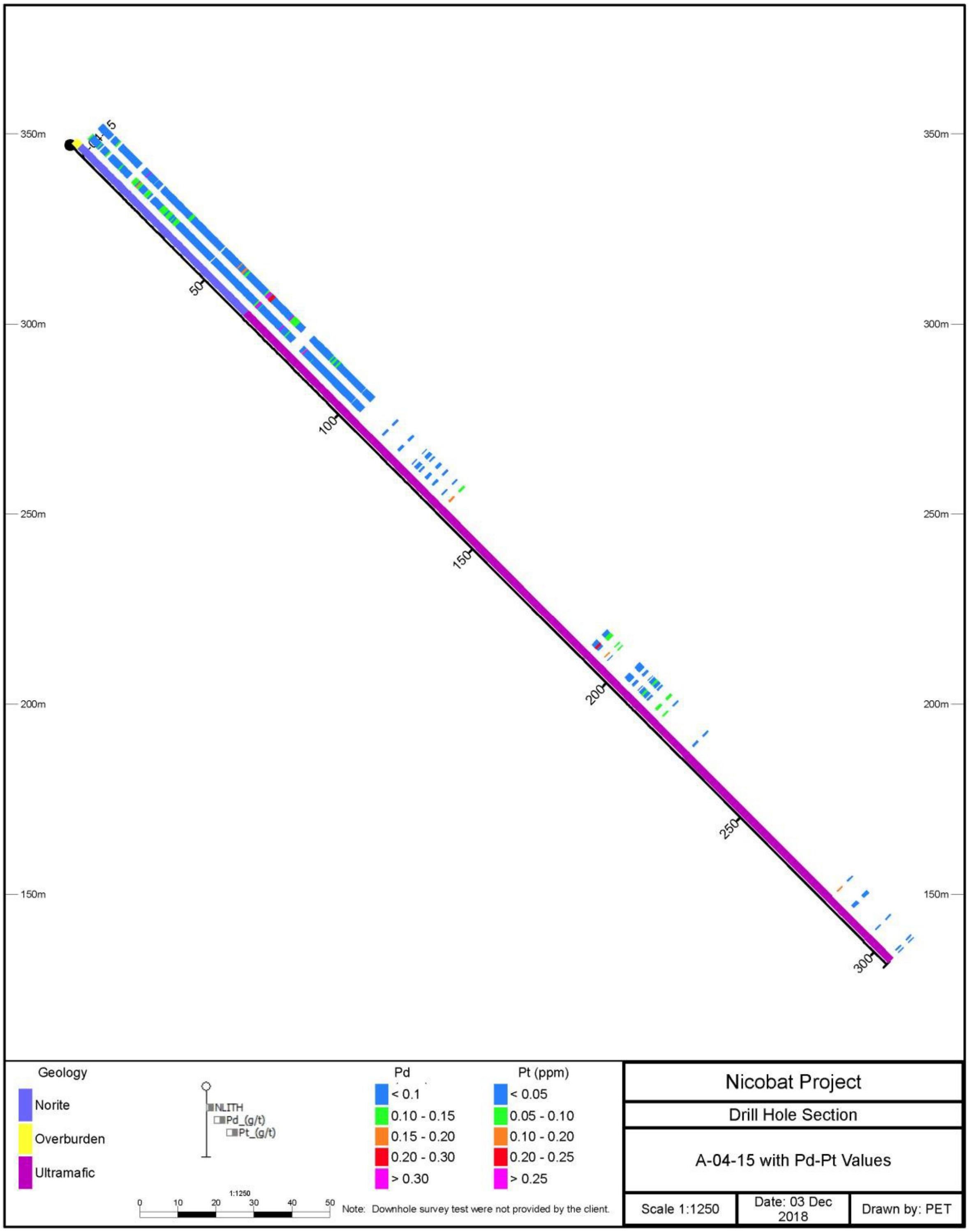


Figure 26**: *PGE Values on DDH A-04-15 Cross Section***

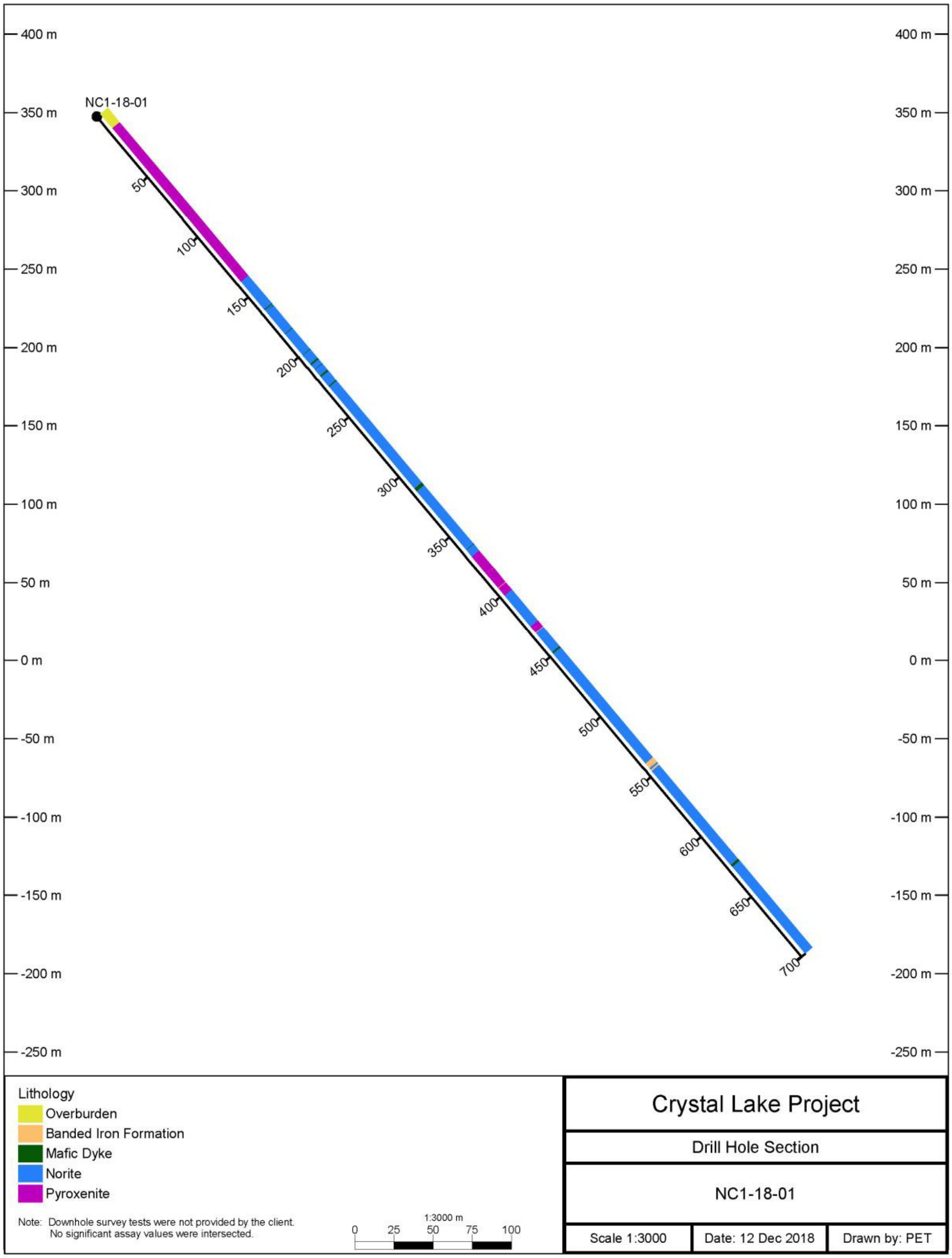


Figure 27: ***DDH NC1-18-01 Cross Section***

10.1 Observations on 2015 & 2018 Crystal Lake Drill Program

Out of the 9 holes drilled in the 2015 program only one hole A-04-15 showed significant values of copper and nickel. This hole was drilled down the north plunge direction of the deposit into one of the higher-grade “ribs” and may or may not have stayed within the higher grade section as the higher values were not continuous to the end of the hole. (see Figure 24) As a reminder and comparison, historical drill results recorded in the 1950s intersected several “shoots” of higher than average grade of which only one had a resource calculated on it. Each shoot was measured from 3.65m to 12m in width. One “rib or shoot”, Chibtown’s No.1 body, was said to contain from surface to 105m, 204,000 tonnes grading 0.65% Cu, 0.87% Ni. The other six “ribs or shoots” were not similarly documented. All “ribs or shoots” were identified as being surrounded and enclosed within a larger body of lower-grade disseminated sulphide mineralization. *Note that a qualified person has not done sufficient work to classify the historical estimate mentioned above as current mineral resource or mineral reserve. The Company is not treating these historical estimates as current mineral resources or mineral reserves. Note too that no calculations can be made for determining an accurate width of the mineralized zone as only one hole was drilled into this shoot.*

Crystal Lake’s hole A-04-15 however, confirms the earlier historical drill hole data and gives greater clarity as to average grades since it was drilled down-plunge. From surface to 30m an average grade of 0.78% Ni and 1.86% Cu were assayed. This betters the Chibtown historical resource mentioned in the previous paragraph and surface bedrock values. Individual assays of copper and nickel are recorded within the sections averaged (see Table 5 below). What is intriguing, and represents the exploration potential of the NICOBAT deposit in 2016 is the depth extent of the mineralization and whether these shoots lead to a massive sulphide zone at depth. It can be assumed that any massive sulphides would be of higher grades given the genetic model sought. . It is not known in 2016 if Hole A-04 deviated from the rib or petered out. A geophysical UTEM survey, carried out in 2018, however, down Hole A-04, did not find any anomalies indicative of a massive sulphide deposit to depth. Hole A-04-15 was extended in 2018 to 700m depth but no mineralization was logged or assayed.

Table 5**: Nickel – Copper Values in *DDH A-04-15***

From	To	Core Length	NI	Cu
(m)	(m)	(m)	%	%
2.07	32.16	30.09	0.78	1.86
42.84	46.15	3.31	0.98	1.11
53.95	63.75	9.8	1.92	0.17
63.75	101.29	37.54	0.24	0.71
111.87	137.16	25.29	0.07	0.13
190.24	216.53	26.29	0.04	0.1

The other drill holes did not produce any significant values other than confirming the presence of the surrounding lower grade mineralization. Hole NC1-18-01 drilled to a depth of 700m did not intersect any high grade ribs and a down-hole UTEM survey did not detect any off-hole indications of massive sulphides.

The relationship between the sample length in hole A-04-15 and the true width of the mineralization is unknown and cannot be determined from just the one hole intersection.

11.0 **SAMPLE PREPARATION, ANALYSES AND SECURITY**

All core in 2015 was delivered to Activation Laboratories Ltd. (Actlabs), Ancaster, Ontario for sample preparation and assay. Actlabs is a full service, licensed and highly respected laboratory with offices worldwide and is independent of the Company and Vendor. Before shipping all samples were stored in a locked shed and sealed in buckets when shipped. An electric core saw was used to split the core with 50% of the core retained onsite. This core remains securely locked in a core facility. Core was split onsite at the property and prepared and analyzed by Actlabs for Cu, Ni, Co, Au, Ag, Re, Pt, Pd. Au, Ag, Pt, Pd were analyzed by a fire assay method while Cu, Ni and Co were analyzed by ICP. No preparatory work was carried out by Crystal Lake. Actlabs received the samples, dried them and crushed each sample prior to assay. Actlabs inserted their own blanks and duplicates to test the accuracy of the equipment and accuracy of the results. Crystal Lake personnel relied on Actlabs for sample checks and standards to be inserted in the assaying procedures. The author is confident that the sample preparation and analytical procedures carried out by Crystal Lake and Actlabs was adequate and conformed to industry standards. No confirmation assays were carried out by another Laboratory. In 2018 the drill core was sent to SGS, an international accredited mineral processing Laboratory, for assaying. Processing was by sodium peroxide fusion/ICP-MS package (34 elements). The author visited the core facility and is satisfied that all normal precautions were taken for security of the sample. Both Laboratories are internationally respected for their services. Actlabs and SGS are accredited by the Standards Council of Canada (SCC) and accredited to international quality standards through the International Organization for Standardization/International Electrotechnical Commission (ISO/IEC) 17025 plus CAN-P-1579 (Mineral Analysis).

12.0 **DATA VERIFICATION**

12.1 SITE VISIT

Luc Harnois (Ph.D., P.Geo.), senior project geologist for Ronacher McKenzie Geoscience, was on the property from 15th March 2018 to 6th April 2018. During his stay on the property, hole A-04-15 was drilled (extended) from 300m to 700m, and hole NC1-18-01 was drilled from 0 to 700m. The work done and the observations by Dr. Harnois include:

- Locating holes A-04-15 and NC1-18-01
- Core logging
- Core sampling

Figure 28. Drill hole A-04-15, 17 March 2018.

Figure 29. Reflex APS on NC1-18-01, 24 March 2018. APS data: LAT 48deg 39min 9.0601s, LONG 93deg 56min 47.8674sec, ELEV 350.3m. The collar is at UTM (NAD83, zone 15) 430281.1E, 5389263.8N, ELEV 347.3m (ground level).

Core logging and sampling was done by Dr. Harnois. Core cutting and sampling was done on site. Standards (OREAS70b and OREAS73a), as well as blanks and duplicates were inserted in the sampling sequence for quality control. 15% of all the bags sent to the SGS laboratory for analysis were standards, blanks and duplicates. Dr. Harnois was present when SGS picked up the drill core samples.

Figure 30. Core logging facility (white building to the left) and core storage (smaller white building in the middle). The doors of both buildings were locked when the logger and helpers were not present on site. Angus Road, near Emo, Ontario, 24 March 2018.

Figure 31. Core logging facility, 24 March 2018. The door to the left leads to the core saw room.

A transient electromagnetic (TEM) airborne survey over the property was also done in March 2018 (Figures 32 and 33).


Figure 32. TEM survey by CGG, 18 March 2018.


Figure 33. TEM survey by CGG, 18 March 2018.

According to a search of the Ontario Assessment Files Database (OAFD), the System for Electronic Document Analysis and Retrieval (more commonly known as SEDAR), and the Crystal Lake Mining website, there was no more work done on the property after April 2018.

12.2 Data Verification

Crystal Lake did not perform any data verification of assay results. No blanks or standard samples were inserted into the samples sent to the Laboratories. Actlabs and SGS perform routine assay checks however and nothing unusual was recorded by either Lab. Check assays taken by Paul Pitman on 2015 core confirmed the reliability of the original results (Appendix 1V). All assay data is deemed reliable by the principal author. In 2018 standards from Ore Research and Exploration (OREAS) were inserted to check on the SGS Laboratory. As well blanks were also inserted. OREAS of Australia provides reference materials to mining companies to provide geologists with an effective means of ensuring quality control. SGS Mineral Services of Toronto, Canada is one such participating Laboratory.

13.0 **MINERAL PROCESSING AND METALLURGICAL TESTING**

No modern mineral processing or metallurgical tests have been conducted to date. In 1956 Stratmat drilled over 15,244m of core using a bulk sample for metallurgical work. This work resulted in a concentrate of 2.64% Ni and 1.62% Cu with 83% recovery for nickel and 92% for copper. Additional details are unknown and no full report of this work exists in the public domain other than the above mentioned information

In 1966 Chibtown Copper produced an 80% concentrate of 7% Ni and 11% Cu from a head grade of combined 0.52% Cu-Ni. Cobalt assays were up to 0.38% Co but averaged only 0.05% Co. In 1968 Long Lac Mineral Explor. took a bulk sample for metallurgical work from the pit but full results were not reported other than stating that a concentrate of 2.10% Ni and 2.61% Cu was the result of the testing. The Company reported that the drill cuttings from 2015 drilling averaged0.25% Ni and 0.18% Cu.

Details of historical metallurgical work are scanty with very little information provided in the Mining Files of the Ontario Government.

14.0 **MINERAL RESOURCE ESTIMATES**

A mineral resource has not been identified by Crystal Lake or the Company. Detailed data from the earlier exploration drilling are not available and what is available cannot be used for a resource estimate *as quoted in Section 6 (Long Lac Mineral Exploration, 1968).* A qualified person has not done sufficient work to classify the historical estimates mentioned under Section 6 as current mineral resources or mineral reserves. The Company is not treating these historical estimates as current mineral resources or mineral reserves.

15.0 **ADJACENT PROPERTIES**

There are no other properties in the area of the NICOBAT Project that are being explored for copper-nickel ore bodies. Work is not taking place on the Manitou Rapids Indian Reserve #11 which holds moderate potential for discovery. Work to the north on NewGold's Rainy River Project located just north and west of the town of Emo in Richardson Township is focused on gold, but as mentioned earlier, intruded into the gold zone is the #34 Massive Sulphide Zone, a rich plug of copper-nickel-PGE and gold discovered by Nuinsco Resources. This information was publically disclosed at the time of discovery in 1995 and fully described in the Victory Nickel website (http://www.victorynickel.ca). This information however, is not necessarily indicative of the mineralization on the property that is the subject of this report.

16.0 **OTHER RELEVANT DATA AND INFORMATION**

The Q.P. is not aware of any further information that is not included in this report.

17.0 **INTERPRETATIONS AND CONCLUSIONS**

The NICOBAT Project, as presented in this report, is a base-metal project in which a nickel-copper-PGE polymetallic sulfide zone has been partially outlined by historical drilling and further work is proposed. Historical drilling by Chibtown Copper outlined several lenses which aggregated to a potential 4.8 to 6.35 million mt averaging 0.24% Ni and 0.28% Cu. Note that a qualified person has not done sufficient work to classify the above historical estimate as a current mineral resource or mineral reserve. The Company is not treating these historical estimates as current mineral resources or mineral reserves. Details, such as logs and method of calculation of this work are unavailable; the point to be made by the author of this report is that a body of mineralized norite may host higher-grade mineralization to depth if indirect evidence of the presence of massive sulphide mineralization can be located by deep geochemical surveys presenting targets for diamond drilling. It is the writer's opinion that the SGH geochemical data strongly suggests that further deep drilling is warranted and that the data points to potentially undiscovered sulphide mineralization.

There are no risks in the reliability of the data presented in this report. The projects mineral potential depends on the results from future drilling campaigns.

The exploration area is protected by patented lands with excellent infrastructure, rail and power. The project is led by Dr. Peter Lightfoot, technical advisor to Crystal Lake. Dr. Lightfoot is a retired geologist from Inco and Vale with decades of international experience in copper-nickel ores.

The polymetallic sulphides (copper-nickel-cobalt-PGEs) located within the two patented claims describe a N–S trending linear noritic target measuring 305 m by an average of 210m in width to a depth of 245m or deeper. Historically, metallurgical tests on bulk samples from the near surface mineralization yielded concentrates grading up to 11% Cu and 7% Ni. This mineralization remains possibly open to the north (down plunge) and perhaps to depth as defined by geochemical survey results. Recent drilling in 2015 confirmed that the historical information is correct and that higher-grade "ribs" are present, surrounded by lower-grade nickel-copper mineralization. Grades from hole A-04-15 are quite good and the indicated deep targets located by the SGS geochemical survey then massive sulphides with expected higher-grades may be found further down plunge.

While downhole and surface geophysics failed to outline any anomalies to depth of the high-grade shoots, drilling of hole NC1 18-01 was located at the southern end of the patents. Since the shoots plunge northward it is proposed to drill one deep 700m hole at the northern end of the project centered on the SGH geochemical anomaly. Testing of this deep geochemical anomaly has been ignored by previous explorers. The following budget has been designed to further exploration efforts on the NICOBAT Project.

18.0 RECOMMENDATIONS

The following budget is considered reasonable using current costs to establish whether deep mineralized targets on the patented ground can be located by one further drill test. In 2018 a total of $ 523,215 was spent in exploration expenditures. (details outlined in Appendix V). Additional programs (Phase II) would be dependent upon the results of the proposed work. Note the budget has been constructed for a field program only. Corporate costs are not included, nor are HST since the HST would be recaptured by Usha Res.

Table 6 ***Proposed Budget for 2019 Exploration***

Purpose/Category	Unit Cost**	Total Costs/	Notes
Field Head Office/Administration			
House rent for geos - Emo	$500/mo	$ 1,000	
Emo Motel costs - drillers	$500/day	$ 5,000	
communications (phone/ cell)	110/mo	$ 1,000	
long distance to USA	75/mo	$ 300	
internet	75/mo	$ 200	
office and logging supplies		$ 1,000	
Labor Costs			
Contract Field Geologist	$1,000/day	$ 15,000	*Logging core, manage drill*
Report Writing/Assay comp.	$100/hr	$ 5,000	*Revise NI 43-101 ?*
Field Tech /core cutting	$ 250.00/day	$ 7,000	*Billed on a daily project basis*
Travel/Vehicle Rentals			
airfare/mobilization to site	variable	$ 5,000	
truck rental	$ 1,500/mth	$ 2,000	
other field services 4wheel carts	$1,500/mth	$ 1,500	
Line Re-location, establish pickets			
Grid location, drill site recon	$1,000/day	$ 3,000	
Housing& Equipment Costs			
Food, heating, taxes, electricity	$100/day x 3mo	$ 1,000	
Geophysics			
UTEM Downhole of 2109 holes		$ 20,000	
interpretation of survey/mob etc		$ 2,000	
Geochemistry			

Grid tightening of SGS 2019 urvey		$ 25,000	
Interpretation, report costs		$ $5,000	
Contract drilling Costs			
Direct Costs of vertical 700m hole		$ 100,000	
Other contract costs; fuel etc		$ 25,000	
Contingency (Overruns) @ 10%		$ 25,000	
	Total	**$ 250,000**	

19.0 REFERENCES

The following references were used in making this report, taken principally from the Kenora Assessment Files, Resident Geologist's Office, Ontario Geological Survey for area 52C12NW and from the files of Crystal Lake.

File #	File Name	Year	Work
52C12NW A-1	Dobie-General		Gen. Rep.
52C12NW B-1	Falconbridge Expl.	1953	DD
52C12NW B-2	Falconbridge Expl.	1953	DD
52C12NW B-3	Falconbridge Expl.	1953	DD, Ass
52C12NW B-4	Falconbridge Expl.	1953	DD, Ass
52C12NW E-1	Stratmat Ltd.	1956?	Article
52C12NW F-1	Prospecting Airways	1953	DD
52C12NW H-1	Great West Mining & Smelting	1953-56	Fieldtrip
MDI52C12NW00011	Dobie Prospect	June 13, 2005	

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Raoul, A., 2013. *Unpublished Summary of the Dobie Cu-Ni Deposit*. Dated June 3, 2013, pg. 8. Sections were derived from the Estate of the late Jack Bolen PGeo, Consulting Geologist of Fort Frances, Ontario.

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Paul W. Pitman ***B.Sc., P.Geo.***

CONSULTING GEOLOGIST

CERTIFICATE of QUALIFIED PERSON

I, Paul W. Pitman, BSc., P.Geo., residing in Brampton, Ontario do hereby certify that;

1. I am an independent consulting geologist since 1983 and the President of PWP Consulting.

2. This certificate applies to the technical report entitled "NI 43-101 Technical Report on the Nicobat Project , Northwest Ontario, Canada" (the "Technical Report"), dated July 19th, 2019 and am the principal author and responsible for all sections of this report except for field confirmation of 2018 work. I am independent of Usha Resources Ltd and the vendors of the Property; Crystal Lake Mining Corp. and Emerald Lake Development Corporation.

3. I am an honors graduate of Carleton University, 1969 in geology and have been practicing continuously as a professional since graduation. I have been the principal of a geological consulting practice for a period of 35 years.

4. I am in good standing as a registered member of the Association of Professional Geoscientists of Ontario.

5. I have read the definition of "qualified person" set out in National Instrument 43-101 ("NI-43-101") and certify that by reason of my education, affiliation with a professional association (as defined in NI 43-101) and past relevant work experience, I fulfill the requirements to be a "qualified person" for the purposes of NI 43-101.

6. I made a site visit to the project (June 15-17th, 2016) visiting many of the DDH collar locations, sampled core and toured the property looking at outcrops.

7. I am independent of the issuer applying all of the tests in section 1.5 of NI 43-101 and have had no prior involvement with the project that is the subject of the Technical Report.

8. As of the date of this certificate and the effective date of the Technical Report, to the best of my knowledge, information and belief, the Technical Report contains all scientific and technical information that is required to be disclosed to make the Technical Report not misleading.

9. I have read NI 43-101 and Form 43-101FI. The Technical Report has been prepared in compliance therewith.

10. I consent to the filing of the Technical Report with any stock exchange and other regulatory authority and any publication by them for regulatory purposes, including electronic publication in the public company files on their websites accessible by the public.

Dated at Brampton, this 19th day of July, 2019

{SIGNED AND SEALED}

Paul W. Pitman, *B.Sc.* (P.Geo. Ontario Reg. No. 0575)

201 County Crt. Suite 201, Brampton, Ontario L6X 4L2 Phone (416) 705-3421

Luc Harnois
Ronacher McKenzie Geoscience Inc.
Sudbury, ON, Canada
luc.harnois@rmgeoscience.com
☏ **514-237-7003**

CERTIFICATE OF QUALIFICATIONS

I, Luc Harnois, do hereby certify that:

1. I am Senior Project Geologist at Ronacher McKenzie Geoscience Inc.
2. I am responsible for Section 12.1 (Data Verification/Site Visit) of the report titled "Technical Report on the Nicobat Project Dobie Township Northwest Ontario (NTS 52C/12NW)" dated July 19, 2019, and prepared for Usha Resources Ltd.
3. I am a graduate of Université du Québec à Montréal, Department of Earth Sciences, Montréal, 1980. I completed a M.Sc. (Université du Québec à Montréal, Department of Earth Sciences, Montréal, 1983) and a Ph.D. (Carleton University, Department of Geology, Ottawa, 1987).
4. I am a member in good standing of Ordre des Géologues du Québec (OGQ; member #478) and the Association of Professional Geologists of Ontario (PGO; member # 1355). I am qualified as a "Qualified Person" for the purpose of this report by virtue of my education, affiliation to a professional association and past relevant work experience.
5. I have been employed in the mineral exploration field worldwide (including Canada, West Africa, China) for an aggregate total of 15 years, mostly in gold, base metal, and Cu-Ni-PGE exploration, in positions ranging from junior geologist to project manager.
6. I have read the definition of "Qualified Person" set out in the National Instrument 43-101 ("NI 43-101") and certify that by reason of my education, affiliation with a professional association (as defined in NI 43-101) and past relevant work experience, I fulfill the requirements to be a "Qualified Person" for the purposes of NI 43-101.
7. I visited the property from 15 March 2018 to 6 April 2018. During which time I worked on this property doing core logging and core sampling.
8. I am independent of the issuer as described in section 1.5 of the National Instrument 43-101. I am also independent of the vendors.
9. I have no prior involvement with the property that is subject of this report.
10. I have read the National Instrument 43-101 and this report has been prepared in compliance with this Instrument.
11. That, as of the date of this technical report, to the best of my knowledge, information, and belief, the technical report contains all scientific and technical information that is required to be disclosed to make the technical report not misleading.

Dated this 19th day of July 2019

{SIGNED AND SEALED}

____
Luc Harnois, Ph.D., P.Geo.
Ronacher McKenzie Geoscience Inc.

APPENDIX I
GLOSSARY OF TERMS

AEM ------Airborne Electromagnetic
Ag--------- Silver
Al ----------aluminum
Al2O3 ----- aluminum
As ---------- Arsenic
Au ----------gold
Ba---------- barium
Be---------- beryllium
Bi -----------bismuth
C ------------carbon
Ca----------- calcium
CaO----------calcium oxide
Cd----------- cadmium
Co------------cobalt
CO2----------carbon dioxide
Cr ------------chromium
Cr2O3------- chromium
oxide Cu---- copper
DDH----------diamond drill hole
DW------------drilled width
E --------------East
EM----------- electromagnetic
Fe ------------- iron
Fe2O3---------iron oxide-ferric-oxide, hematite)
Fe3O4---------iron oxide-Ferrous oxide,
magnetite HLEM--------horizontal loop
electromagnetic
IP--------------induced polarization
K --------------potassium
K2O-----------potassium oxide
Li ------------- lithium
LOI------------loss on ignition (total water)
Mg----------- magnesium
Mo -----------molybdenum
Mt-------------million tonne
N ------------- North
NW ---------- northwest
Na -------------sodium
Na2O----------sodium Oxide
NAD 83-------North American Datum of
1983 northeast
NI--------------National Instrument
Ni ------------- nickel
NSR-----------Net Smelter Return
NTS-----------National Topographic System
OGS-----------Ontario Geological Survey
P ---------------phosphorous
PGE------------Platinum Group Elements
P2O5-----------phosphorous oxide
Pb-------------- lead
Pd-------------- palladium
pH--------------measurement of acidity
Pt ---------------platinum
QA/QC--------Quality Assurance/Quality Control
S--------------- south
Sul ------------- sulphides
Sb -------------- antimony
SE -------------- southeast
Se --------------- selenium
SiO2-------------silicon dioxide
Sn --------------- tin
SO2--------------sulphur dioxide
Sr -----------------strontium
Sum -------------summation
SW-------------- southwest
Ti---------------- titanium
TiO2-------------titanium oxide
Th--------------- thallium
TW---------------true width
U ----------------- uranium
U3O8-------------uranium oxide
UTM-------------Universal Transvere Mercator
W ---------------- west
Y -----------------yttrium
Zn ---------------- zinc

APPENDIX II

2015 DRILL RECORDS

Hole ID	Easting	Northing	Azi	Dip	Total Depth	Total Depth	Start Date	End Date
	NAD 83	NAD 83			(feet)	(meters)		
A-0-15	431715	5396626	262.8	-45	300	91.43	26-Sep-15	28-Sep-15
A-01-15	430460	5389354	225	-45	500	152.39	10-Oct-15	11-Oct-15
A-02-15	430345	5389425	270	-45	580	176.78	29-Sep-15	01-Oct-15
A-03-15	430223	5389426	90	-45	580	176.69	07-Oct-15	10-Oct-15
A-04-15	430279	5389386	13	-40	1000	304.72	04-Oct-15	07-Oct-15
A-05-15	430246	5389424	13	-40	890	271.27	01-Oct-15	03-Oct-15
A-06-15	430428	5389577	270	-45	680	207.24	09-Oct-15	10-Oct-15
A-07-15	430310	5389821	270	-50	380	115.79	12-Oct-15	13-Oct-15
A-09-15	430374	5389215	225	-45	500	152.40	15-Oct-15	17-Oct-15

2018 DRILL RECORDS

Hole ID	Easting	Northing	Azi	Dip	Total Depth	Total Depth	Start Date	End Date
	NAD 83	NAD 83			(feet)	(meters)		
NC1-18-01	430281	5389264	14	-50	2,296	700	24-Mar-18	not stated
A-04-15 (drilled deeper	430279	5389386	13	-40	To 2,296	To 700m (extension)	17-Mar-18	23-Mar 18

Hole A-0-15

DIAMOND DRILL LOG — **COMPANY**

						Downhole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-0-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		25.6	-45.3	262.8					
PROPERTY:	Farm	EASTING:	431,715.00	LOGGED BY:	Frank Puskas							AZIMUTH:	262.8
COMMENCED:	26-Sep-15	NORTHING:	5,396,626.00	COMMENTS:								DIP:	-45
COMPLETED:	28-Sep-15	CORE SIZE:	NQ									ELEVATION:	352 m
												LENGTH:	91.44 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Rock		ALTERATION Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	3.35				Overburden																
3.35	7.92				Ultramafic: mafic / ultramafic; massive, porphyritic femag (oikiocrysts); patchy areas of disseminated (fg to coarse H-1 type);sulphides;																
7.92	19.81				Ultramafic: mafic / ultramafic; ditto previous;increase in sulphides as discontinuous bands or vein - like; w eak sulphide alignment approximately 75 degrees East. Sulphide textures not supportive of in - situ segregation and settling; sulphide texturing typical of "outer lateral and / or peripheral halo"of sulphide to a replacement body.																
19.81	57.91				Ultramafic: mafic / ultramafic as previous, absence of alteration reflective of hydrothermal								187064	20.12	21.34	1.22	3	< 5	10	0.107	0.148
					alteration; relative increase in sulphides is significant w ith sulphide texturing varying from								187065	21.34	22.86	1.52	10	< 5	< 5	0.107	0.1
					med grained disseminated (H-2 type) to extensive interstitial (ie flood sulphides of 'no-seeum								187066	22.86	23.77	0.91	6	7	6	0.219	0.226
					variety up to 20 %) to globby (up to 40%) 2 to 20 mm); interestingly glooby sulphide								187067	23.77	24.69	0.91	8	6	< 5	0.253	0.157
					mineralization yields the identical appearance to so - called ' sheep - shit ore at Sudbury;								187068	24.69	25.04	0.35	25	10	< 5	0.377	0.277
					increase in sulphides comes increase in host rock detexturing; bands of globby sulphides								187069	26.00	26.18	0.18	14	21	13	0.15	0.146
					exhibit divergent trends in anastomosing fashion thereby generating 2 to 9 inch inclusions of								187070	28.04	28.96	0.91	15	48	29	0.08	0.064
					host rock; sulphide globules are not smooth w alled but instead exhibit embryoidal - like								187071	30.94	31.09	0.15	32	27	14	0.356	0.172
					projections into host rock; ;globules are elongate and describe a fabric trending approximately								187072	40.90	41.76	0.85	13	32	13	0.143	0.198
					75 degrees E								187073	44.20	44.62	0.43	48	19	11	0.218	0.547
													187074	57.79	57.92	0.13	17	64	19	0.108	0.272
57.91	62.48				Ultramafic: ditto previous but sulphides as few er massive bands								187075	57.92	58.83	0.91	7	20	8	0.042	0.05
62.48	83.52				Ultramafic: ditto previous ; interval w ith maximum sulphides extends from 65 feet to 274 feet for an uncorrected thickness of 309 feet																
83.52	91.44				Ultramafic: ditto previous but sulphides markedly decreased; sulphides as disseminations (m g to f g H-1, H-2)																

Hole A-01-15

DIAMOND DRILL LOG — **COMPANY**

						Downhole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-01-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:									
PROPERTY:	Allen	EASTING:	430,460.00	LOGGED BY:								AZIMUTH:	225
COMMENCED:	10-Oct-15	NORTHING:	5,389,354.00	COMMENTS:								DIP:	-45
COMPLETED:	11-Oct-15	CORE SIZE:	NQ									ELEVATION:	352
												LENGTH:	152.4 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Rock		ALTERATION Ep	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	6.11				Overburden:										
6.11	12.19				Pyroxenite: A dark green, massive, medium grained unit. Dominant minerals appear to be pyroxene (w ith olivine crystalized w ithin), phyllosilicates. Matrix is too fine grained to discern. Unit has w eak to moderate, patchy magnetics.										
12.19	44.82				Mafic Aphanite: Dark grey, massive, (mafic) aphanitic unit w ith bands of moderate epidote/plagioclase alteration. Plagioclase content increases to 20% creating a halo around bands of epidote alt. Unit is moderately to strongly magnetic throughout (possible disseminated magnetite observed, very fine grained), magnetic intensity decreases w hen epidote alteration and increases feldspar present . Unit is somew hat blocky. Trace sulphides, up to 1% occurring locally w ith quartz veining.	2	187190	18.90	18.92	0.02	22	99	27	0.689	0.393
44.82	96.62				Gabbro: Similar to the above unit how ever the unit has coarsened to medium to coarse grained. Feldspar content has also increased overall to roughly 3-20%. Unit is moderately to strongly magnetic throughout, decreased intensity w hen moderate epidote alteration present. Trace sulphides. Magnetite believed to be observed	2	187191	87.80	88.40	0.60	44	84	46	0.242	0.069
96.62	124.99				Volcaniclastic Sediment: Unit is extremely chaotic. Bedding/banding is occasionally observed. Bedding is also observed to be overprinted. Cross cutting features observed. Unit is dark grey in colour, w ith beigey, pinkish and purplish bands/beds. Possible intercalating units. Weak to moderate deformation - could also be due to bedding environment. Unit is altered but difficult to discern by w hat.		187192	110.60	111.55	0.95	20	47	23	0.082	0.086
124.99	152.40				Volcaniclastic Sediment: Dark grey, aphanitic volcanoclastic unit. Bedding can occasionally be observed locally. This unit is less chaotic then above unit. Dark grey unit is most dominant but intercalating units/cross cutting features present.										

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-02-15

DIAMOND DRILL LOG **COMPANY**

						Downhole Tests						
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO. A-02-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		40	-44.1	248.9				
PROPERTY:	Allen	EASTING:	430,345.00	LOGGED BY:	Frank Puskas	85	-44.6	259.6				AZIMUTH: 250
COMMENCED:	29-Sep-15	NORTHING:	5,389,425.00	COMMENTS:		131	-45.6	244.8				DIP: -45
COMPLETED:	01-Oct-15	CORE SIZE:	NQ			176	-45.5	261.2				ELEVATION: 348
												LENGTH: 176.78 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Rock		ALTERATION Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	3.35				Overburden																
3.35	7.92				Norite: mafic (norite) to ultramafic (peridotite- olivine pyroxenite); specks of disseminated								184406	1.22	1.37	0.15	23	54	33	0.118	0.042
					sulphides (type H-1) w ith high matrix sulphide flooding (15 to 20 %, and high in chalcopyrite);								184407	3.89	4.88	0.99	21	38	15	0.425	0.639
					bands of massive sulphide (also referred to as masu) containing 50% sulphides containing								184408	4.88	6.10	1.22	12	31	22	0.333	0.675
					beaded (rather than prismatic) inclusions of silicates and indicative of a later introduction								184409	6.40	6.55	0.15	16	42	12	0.279	0.503
					of potentially more nickeliferous sulphides; these bands are oriented 60 degrees TCA																
					(ie 75 degrees E); correlating this mineralization to BH- 4 strongly suggests its representative																
					of a copper -rich halo zone (w ith high sulphide flooding rich in chalcopyrite) and																
					subsequently impregnated by masu veins (potentially rich in Ni)																
7.92	11.66				Norite: ditto previous; sulphides exhibit several textures ranging from disseminated								184410	10.85	11.13	0.27	14	41	17	0.144	0.201
					(varieties H-1 and H-2 ; 5 % to 7%), w ith veins of masu (silicate inclusions in massive																
					sulphides w ith 90 % sulphides are beaded and prismatic) are typical of later stage sulphide																
					emplacement invariably carrying free pentlandite and understandably rich in Ni ; present also																
					are veinlets of chalcopyrite (flood textures)																
11.60	24.38				Norite: ditto previous; sulphides exhibit subcircular entities (6 - 8 mm) w ith zoned sulphides								184411	13.53	13.59	0.06	12	53	10	0.04	2.16
					such that chalcopyrite encircles pyrrhotite; these subcircular entities are considered								184412	17.37	17.68	0.30	15	39	17	0.134	0.169
					representative of sulphide solution entry channels; late stage massive sulphide veins, 1.3 cm																
					w ide, w ith beaded inclusions (some veins have large prismatic pyroxenes) are common and																
					trend approximately 45 degrees to the W; these veins contain 60 -80 % sulphides and																
					commonly found to be zoned w ith mantles of flood - textured chalcopyrite;																
24.38	62.18				Norite: ditto previous; sulphides present as previous secyions; mafic / ultramafic host rock								184413	28.35	28.74	0.40	24	40	64	0.377	0.234
					variably but more commonly highly impregnated by matrix (ie flood) sulphides of seeum and								184414	28.74	29.14	0.40	40	45	21	0.37	0.327
					no- seeum varieties;w hen flood sulphides reach 50 % then the host rock cryptocrystalline								184415	29.14	29.44	0.30	27	33	20	0.252	0.182
					fabric becomes markedly compromised so that the silicates begin to reorganize into various								184416	30.94	31.12	0.18	26	37	18	0.243	0.126
					flow patterns more commonly parallel to core axis; veins of massive sulphides can occur at								184417	31.39	31.62	0.23	22	46	74	0.203	0.396
					angles varying from 45 to 60 to 300 degrees TCA; Veins of masu (pyrrhotite - pentlandite?)								184418	36.12	36.36	0.24	17	52	16	0.114	0.304
					are commonly margined on both contacts by high concentrations of chalcopyrite exhibiting								184419	40.46	40.77	0.30	35	70	23	0.112	0.875
					flood textures; although in need of further testing measurements made on a few veins								184420	44.35	44.83	0.48	25	41	23	0.298	0.316
					show ed the chalcopyrite margins w ere relatively thicker up - hole (hanging w all side); bands								184421	50.90	51.08	0.18	41	47	38	0.23	0.172
					of flood chalcopyrite can occur on their ow n;								184422	55.47	55.68	0.21	30	39	42	0.306	0.291
													184423	58.22	58.31	0.09	22	30	11	0.104	0.314
62.18	82.95				Norite: ditto previous; Textural varieties of sulphide persist w ith ; sulphide bands anastomose								184424	61.36	61.45	0.09	60	23	13	1.12	0.268
					thereby creating inclusion like bodies of host rock; the margins of these "inclusions' are not								184425	63.40	64.10	0.70	68	37	16	1.03	0.294
					hydrothermally altered and actual contact is made diffuse by sulphide addition to inclusion								184426	64.10	64.62	0.52	16	35	39	0.255	0.309
					matrix; from collar to end of significant sulphides at 272.15 feet yields a corrected thickness								184427	64.62	65.32	0.70	56	110	< 5	0.346	0.916
					of 200 feet of continuous mineralization .								184428	65.32	66.35	1.03	18	23	< 5	0.984	1.23
													184429	66.35	66.87	0.52	52	27	20	1.66	0.351
82.95	95.10				Norite: section of host rock mafic / ultramafic essentially barren w ith few bands (1 inch to 2								184430	66.87	67.87	1.01	70	22	16	1.01	0.119
					inches w ide) of masu w ith beaded inclusions (few prismatic) and 90 % sulphides w ith flow								184431	67.87	68.65	0.78	23	57	22	0.46	0.115
					fabric at 75 degrees TCA ; sulphide bands at essentially perpendicular TCA; bands of								184432	68.65	68.72	0.07	37	74	71	1.04	0.25
					chalcopyrite trend 80 degrees TCA; section w ith numerous separate 6mm globules of flood								184433	68.72	69.52	0.80	26	82	40	0.372	0.161
					sulphides (solution channels?); subjectively this section is considered to represent a septa								184434	69.52	71.04	1.52	57	61	14	0.42	0.212
					of country rock separating tw o separate fissures of sulphide								184435	71.04	72.66	1.62	81	28	41	0.528	0.188
													184436	72.66	74.18	1.52	96	36	29	0.396	0.143
95.10	125.58				Norite: ditto same host composition as previous intervals' sulphides present, up to 10 to 14 %,								184437	74.18	75.70	1.52	77	36	35	0.331	0.17
					are disseminated (cg H-1 < H-2) and interstitial flood sulphides (predominantly chalcopyrite);								184438	75.70	76.99	1.29	87	44	24	0.296	0.145
					bands of sulphide are 1 inch to several inches w ide composed of masu w ith beaded								184439	76.99	78.56	1.57	171	36	20	0.523	0.187
					inclusions and high sulphide up to 90%; sulphides are typical of outer haloes and as such								184440	78.56	80.04	1.48	213	36	13	0.324	0.207
					this interval is considered to belonging to an adjacent mineralized fissure.; from 330 to 400								184441	80.04	80.35	0.30	69	51	< 5	0.25	1.15
					feet the disseminated sulphides are cg H-1 and H-2.								184442	80.35	80.70	0.35	240	88	61	0.723	0.423
													184443	80.70	82.66	1.97	221	33	15	0.628	0.229
125.58	135.76				Norite: ditto previous host rock comprised of mafic (norite) - ultramafic (olivine peridotite /								184444	82.66	82.95	0.29	232	34	32	1.04	0.836
					pyroxenite); devoid of sulphide mineralization; entire section is devoid of obvious structure in								184445	83.11	83.82	0.71	443	33	33	1.38	0.345
					particular fault gouge.								184446	83.82	83.97	0.15	270	40	19	0.683	0.156
													184447	85.80	86.35	0.55	74	23	15	0.199	0.118
135.76	147.25				Banded Iron Formation: oxide (magnetite) facies alternating w ith lean iron formation								184448	86.35	91.44	5.09	41	71	46	0.262	0.145
					intercalations; this lithology is extreemly crenulated illustrative of open and chevron - style								184449	91.44	95.10	3.66	42	33	22	0.215	0.094
					folding and deformation; absence of fault gouge w ith excellent core recovery; deformation of								184450	100.58	102.11	1.52	42	104	65	0.247	0.113
					BIF is soft sediment variety and more prevalent bedding w ould appear to be subhorizontal and								184451	123.77	124.26	0.49	110	664	215	0.172	0.429
					at high angle to the preceding sulphide intersections; w idths of individual beds of high grade								184452	124.45	124.75	0.30	218	845	139	0.308	0.913
					magnetite measure in inches. It can be speculated that this iron formation is a w estern								184453	124.75	125.58	0.82	53	305	159	0.127	0.178
					extension of the Carpenter Tw p iron formation and the southw estern extension of the iron								187051	135.76	137.04	1.28	30				
					formation in vicinity of the ELDC FARM claims.								187052	137.04	137.74	0.70	30				
													187053	137.74	138.04	0.30	30				
147.25	176.78				Metasediments: sequence of country rock sediments , lean ironstones , and detritals, barren								187054	138.04	138.59	0.55	30				
					of sulphides, absence of imposed structures of shear / mylonite origin.								187055	138.59	139.29	0.70	30				
													187056	139.29	140.21	0.91	30				
													187057	140.21	141.27	1.07	30				
													187058	141.27	141.55	0.27	30				
													187059	141.55	143.26	1.71	30				
													187060	143.26	144.81	1.55	30				
													187061	144.81	146.30	1.49	30				
													187062	146.30	147.25	0.94	30				
													187063	147.25	147.86	0.61	30				

Hole A-03-15

DIAMOND DRILL LOG — **COMPANY**

						Dow nhole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:		DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-03-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		85	-45.2	85.8					
PROPERTY:	Allen	EASTING:	430,223.00	LOGGED BY:	Frank Puskas	131	-45.9	92.5				AZIMUTH:	85
COMMENCED:	07-Oct-15	NORTHING:	5,389,426.00	COMMENTS:		176	-46.3	94.8				DIP:	-45
COMPLETED:	10-Oct-15	CORE SIZE:	NQ									ELEVATION:	346 m
												LENGTH:	176.69 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Roc k		ALTERATION Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	4.42				Overburden																
4.42	7.62				Norite: mafic (norite) / ultramafic (pyroxenite) exhibiting schillar textured pyroxenes; section is																
					barren of sulphides																
7.62	10.67				Norite: ditto previous lithology; sulphide -bearing; sulphides are pin point sized to fg H-1 to H-2																
					and from 2% to 4%																
10.67	13.72				Norite: ditto previous lithology; fg pin point disseminated sulphides 3 to 5%																
13.72	36.58				Norite: ditto previous; sulphides exhibit a textural change to mg-cg H-1 and H-2 (H-2 more								184455	16.03	17.53	1.49	24	71	44	0.272	0.142
					dominant) and w ith flood sulphides (no-seeum variety) from 5 to 7 % follow ed dow nhole								184456	17.53	19.05	1.52	31	68	37	0.279	0.15
					by 7 to 10 % follow ed further dow nhole (108 feet) by 10 to 12%; sulphides are more								187076	21.79	22.35	0.56	25	43	14	0.397	0.236
					chalcopyritic and subjectively indicative of so - called copper - halo mineralization; matrix								184457	19.05	20.57	1.52	24	64	40	0.252	0.148
					flooding by sulphides (no - seeum variety up to 25%) is particularly common (107 feet to								184458	20.57	21.79	1.22	20	63	53	0.374	0.239
					115.25 feet) w here accompanied by transecting,vein - like bodies of chalcopyrite; other vein -								184459	22.35	23.32	0.97	18	53	28	0.314	0.198
					like bodies contain silicate inclusions both beaded variety and prismatic variety. Veins								184460	23.32	24.99	1.68	23	47	46	0.292	0.168
					anastomose thereby defining "inclusions" of host rock								184461	24.99	26.52	1.52	15	40	56	0.32	0.2
													184462	26.52	28.04	1.52	14	33	25	0.31	0.211
36.58	44.50				Norite: ditto previous; sulphides occur as cg disseminations (H-1 < H-2), 5% to 7% w ith								184463	28.04	29.57	1.52	17	29	19	0.282	0.23
					matrix - flooded chalcopyritic sulphides; section w ould appear representative of so - called								184464	29.57	31.09	1.52	20	29	21	0.251	0.283
					copper halo								184465	31.09	32.61	1.52	38	31	11	0.373	0.325
													184466	32.61	33.07	0.46	37	36	23	0.235	0.327
44.50	49.07				Norite: ditto previous; sulphide content diminishing to 2 to 6 % H-1,H-2; high chalcopyrite								184467	34.14	35.13	0.99	59	26	17	0.482	0.423
					indicative of copper halo								184468	35.13	35.43	0.30	34	46	28	0.597	0.433
													184469	35.43	35.66	0.23	43	31	30	0.479	0.27
49.07	62.79				Norite: ditto previous; sulphide content of fg H-1 (w ith reduced H-2) at 2 to 5%; section								187077	35.66	36.58	0.91	21	53	13	0.522	0.335
					reflective of outermost halo								184470	37.49	39.01	1.52	25	30	16	0.251	0.235
													184471	39.01	40.54	1.52	22	32	31	0.217	0.205
62.79	70.26				Norite: ditto previous; sulphides have become coarser grained and content increased to 7 %.;								184472	40.54	42.06	1.52	13	35	23	0.264	0.201
					probably indicative of minor variations to be expected in any zone								184473	43.08	44.50	1.42	45	41	47	0.393	0.219
													184474	44.50	47.85	3.35	148	38	20	0.397	0.21
70.26	85.80				Norite: ditto previous; sulphides represented by fg disseminations of H-1 H-2 up to3%; minor								184475	69.49	70.26	0.76	74	52	45	0.441	0.123
					no - seeum flood sulphides								184476	90.98	91.59	0.61	145	31	< 5	0.304	0.444
													184477	91.65	91.77	0.12	46	27	7	0.182	0.414
85.80	94.24				Pyroxenite: host rocks are magnetite- bearing olivine pyroxenites; sulphides are disseminated								184478	92.45	94.24	1.79	88	23	9	0.237	0.101
					H-1 w ith minor H-2 , 2%; cut by veins of massive sulphides (can be pyrrhotitc or																
					chalcopyritic) w ith pentlandite (having tested positively w ith iron filing pow der); areas w ith																
					chalcopyrite flooding and no - seeum flooding																
94.24	176.78				Pyroxenite: ditto previous; essentially barren host rock w ith sporadic areas exhibiting 1/2% to																
					2 % disseminated sulphides;																

Hole A-04-15 *(see end table)*

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-05-15

DIAMOND DRILL LOG | **COMPANY**

						Dow nhole Tests								
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI		HOLE NO.	A-05-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:	Kristien Wiebe	40	-45	342.9	268	-44.8	324			
PROPERTY:	Allen	EASTING:	430,246.00	LOGGED BY:		85	-45.2	244					AZIMUTH:	13
COMMENCED:	01-Oct-15	NORTHING:	5,389,424.00	COMMENTS:		131	-45.2	250					DIP:	-40
COMPLETED:	03-Oct-15	CORE SIZE:	NQ			177	-45.2	274					ELEVATION:	347
						222	-44.8	247					LENGTH:	271.27 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Roc k		ALTERATION Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	4.80				Overburden																
4.80	229.21				Pyroxenite: A dark grey-green, medium grained massive unit. Tw o types of disseminated								187168	7.62	8.23	0.61	54	20	9	0.151	0.071
					sulphides present in pin point and club-boomerang H-1 form. Sulphide percentage ranges from								187169	8.84	12.50	3.66	71	56	25	0.385	0.185
					1-7% throughout unit. The first type of sulphide is brassy in colour, the unit is also w eakly to								187170	16.46	17.07	0.61	62	51	28	0.231	0.167
					moderately magnetic leading me to believe the sulphide could be pyrrhotite. The second								187171	18.90	19.20	0.30	54	38	19	0.151	0.154
					sulphide is believed to be chalcopyrite, brassy yellow in colour. Pyrrhotite seems to be								187172	24.99	25.60	0.61	59	54	17	0.317	0.209
					occurring in a higher % then the second sulphide. Olivine observed w ithin pyroxene. Unit								187173	29.57	30.18	0.61	82	28	10	0.465	0.209
					begins to become medium to coarse grained w ithin first 40ft.								187174	31.70	32.00	0.30	58	75	22	3.89	0.094
													187175	37.40	37.58	0.18	106	76	28	0.337	0.355
					19.02 - 19.05: Quartz vein w ith 15% massive chalco pyrite blebs. Quartz vein is a mottled								187176	40.26	40.55	0.29	16	22	8	1.14	0.46
					w hite to grey in colour								187177	46.63	47.24	0.61	66	66	11	0.568	0.43
					31.88 - 31.90: Sulphides (chalcopyrite) occurring w ith patchy quartz veining								187178	55.17	55.47	0.30	421	31	8	1.07	0.054
					37.03 - 37.06: Weak ductile deformation w ith quartz/carbonate veinlets, blebby massive								187179	62.00	62.12	0.12	241	27	18	0.901	0.141
					chalcopyrite occurring w ithin vein								187180	66.75	66.84	0.09	166	34	12	1.51	0.203
					37.22 - 37.28: Massive blebs up to 1cm w ide and 2.5cm long, tw o types of sulphides								187181	74.37	74.68	0.31	137	55	24	0.259	0.191
					occurring together. Believed to be pyrrhotite (magnetic) and chalcopyrite. Blebs seem								187182	77.72	78.33	0.61	605	190	98	0.686	1.36
					to be follow ing quartz/carb veinlet								187183	153.89	153.95	0.06	54	80	42	0.238	0.114
					40.26 - 40.55: Massive chalcopyrite occurring in thin veins/seams and massive blebs								187184	153.94	153.95	0.01	93	240	66	0.272	0.139
					w ithin quartz/carbonate veining								187185	172.16	172.83	0.67	86	73	52	0.448	0.145
					44.47 - 45.02: Dark grey aphanitic mafic dyke. Sharp contacts. Basaltic dyke(?)								187186	173.13	173.45	0.32	116	173	64	0.49	0.345
					55.47 - 57.91: Dark grey aphanitic mafic dyke. Sharp contacts. Basaltic dyke(?). Frequent								187187	196.01	196.31	0.30	43	96	51	0.097	0.07
					carbonate veinlets, 0.5% fine grained disseminated cubic pyrite																
					58.46 - 59.62: Relatively sharp low er contact, gradual upper contact. Pyroxene and																
					feldspar prevalent. Possible gabbroic intrusion (?)																
					57.91 - 73.15: Unit becomes chlorite rich, more of a green grey in colour																
					78.03 - 78.33: Fine, hair like sulphide flooding/lattice w ork																
					80.18 - 80.50: Milky w hite quartz vein, sharp upper contact w ith alteration halo. Low er																
					contact not as sharp, seams of host rock contained w ithin vein.																
					86.26 - 87.78: Dark grey, aphanitic mafic dyke (basalt?) sharp contacts. Becomes blocky																
					tow ards end of dyke																
					153.64 - 153.93: Massive sulphide is follow ing the deformation of a brittle ductile fault.																
					Tw o types of sulphide present																
					154.23 - 212.14: Trace sulphides overall, up to 2% H1 CB coarse grained sulphide. Weak																
					patchy magnetics																
					184.12 - 184.13: Milky w hite quart vein.																
					196.60 - 196.92: Diorite dyke, relatively sharp contacts, trace fine grained massive																
					sulphides (pyrite) that occur in tiny globs, occasionally interconnected. Pyroxenite																
					contacts appear w eakly to moderately deformed.																
					203.91 - 204.52: Weak patchy epidote alteration																
					226.16 - 226.77: Ghost like carbonate (?) veinlets - due to deformation/alteration.																
					Veinlets tend to follow similar foliation																
229.21	237.74				Gabbro: The lithology alternates very gradually from coarse grained to fine grained								187188	239.57	240.18	0.61	70	76	35	0.171	0.039
					intermittently. Gabbro or medium grained pyroxenite? Trace sulphides. Very gradational																
					upper and low er contact, difficult to deduce w here one begins and ends																
237.74	246.89				Pyroxenite: A dark grey-green, medium grained massive unit. Tw o types of disseminated																
					sulphides present in pin point and club-boomerang H-1 form. Sulphide percentage ranges																
					from 1-7% throughout unit. The first type of sulphide is brassy in colour, the unit is also																
					w eakly to moderately magnetic leading me to believe the sulphide could be pyrrhotite.																
					The second sulphide is believed to be chalcopyrite, brassy yellow in colour. Pyrrhotite																
					seems to be occurring in a higher % then the second sulphide. Olivine observed w ithin																
					pyroxene. Unit begins to become medium to coarse grained w ithin first 40ft.																
					239.57 - 240.49: Tw o types of sulphide present. Unit is w eakly magnetic. Sulphides are																
					believed to be chalcopyrite and pyrrhotite although sulphide presenting as pyrrhotite also																
					appears as a brassy silver locally. Sulphides begin to form a hair like lattice locally																
246.89	248.72				Intermediate Dyke: Chill margin present on upper and low er contacts. Unit is fine grained								187189	247.22	247.23	0.01	25	92	49	0.094	0.046
					and massive. 811.10-812.04 unit has a slight pinkish/peach hue - due to Kspar(?). Trace																
					to 0.5% fine grained disseminated pin point pyrite. Ghost like lenticular carbonate veinlets																
					present.																
248.72	249.05				Feldspathic Dyke: Tw o types of feldspar present (plagioclase and potassium feldspar?)																
					as w ell as dark grey mafic. Trace fine grained pin point pyrite. Foliation intensifies dow n																
					hole, brittle ductile fault in proximity to low er contact.																
249.05	271.27				Pyroxenite: Massive, coarse grained pyroxenite. Unit is w eakly to moderately magnetic																
					throughout. Trace to 1% H1, PP sulphide																

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-06-15

DIAMOND DRILL LOG

COMPANY

						Downhole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-06-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		24	-45.2	274.2					
PROPERTY:	Allen	EASTING:	430,428.00	LOGGED BY:	Kristien Wiebe	70	-45.5	280.2				AZIMUTH:	270
COMMENCED:	09-Oct-15	NORTHING:	5,389,577.00	COMMENTS:		116	-45.6	269.8				DIP:	-45
COMPLETED:	10-Oct-15	CORE SIZE:	NQ			161	-45.7	270.4				ELEVATION:	351
						207	-45.7	266.5				LENGTH:	207.26 m

INTERVAL (metres)		% Rec	Vein Densit	Roc k		ALTERATION							SAMPLE				ASSAYS				
FROM	TO					Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	9.46				Overburden																
9.46	183.18				Pyroxenite: A dark grey/green medium grained, massive unit w ith trace sulphide (PY).								187204	18.32	18.62	0.30	< 2	< 5	< 5	0.007	0.013
					Unit is NOT magnetic.								187226	22.86	23.47	0.61	3	< 5	< 5	< 0.001	< 0.003
													187225	38.44	38.72	0.28	49	< 5	< 5	0.088	0.016
					18.29 - 24.69: Feldspar becomes more pronounced (plag)								187205	82.32	83.24	0.92	21	46	24	0.059	0.046
					30.08 - 30.50: Milky w hite quartz vein w ith bit of relic host rock throughout. Bright red								187206	88.70	89.31	0.61	11	36	15	0.035	0.036
					mineral (is it an oxide or a feld?) visible w ithin bits of relic lithology.								187207	89.95	90.24	0.29	26	50	17	0.068	0.077
					30.50 - 33.53: very blocky, oxide often present on fractured surfaces								187208	92.96	93.88	0.92	27	63	28	0.114	0.08
					37.49 - 37.80: Fracture nearly parallel to core axis. Brittle ductile deformation. Sericite-								187209	93.88	94.79	0.91	24	59	32	0.111	0.085
					hematite-carbonate alt present along fracture								187210	99.36	100.28	0.92	16	53	22	0.01	0.015
					47.21 - 47.26: Pinkish quartz vein								187211	110.97	111.25	0.28	22	38	24	0.058	0.026
					49.71 - 50.01: Intermittent quartz veining w ith w eak to moderate foliation, core is								187212	114.31	114.60	0.29	6	48	25	0.009	0.043
					moderately oxidized/w eathered. Bright red alteration similar to quartz vein at 98.7ft								187213	116.77	117.06	0.29	33	116	27	0.084	0.21
					occurring as stringers along quartz veining.								187214	118.88	119.80	0.92	43	70	33	0.341	0.128
					81.71 - 85.65: Patchy occurrences of sulphide. Tw o types of sulphide occurring								187215	128.32	129.25	0.93	60	84	44	0.354	0.099
					simultaneously + 0.1-0.5% chalcopyrite. Pyrite and pyrrhotite believed to be the tw o								187216	178.64	178.95	0.31	34	120	53	0.034	0.043
					dominant types of occurring sulphide. Club-boomerang sulphide is developed but not																
					enough to form a connecting lattice																
					85.65 - 88.41: Trace pin point, occasional blebby sulphide																
					88.14 - 94.79: Patchy sulphide, occurring as clusters of C-B, begins to develop into lattice																
					only locally. Chalco present along w ith dominant pyrrhotite (?) follow ed by pyrite. Up to																
					10% sulphide only locally. Occasional globs.																
					94.79 - 116.74: Trace pin point, occasional blebby sulphide. Up to 1% sulphide locally																
					117.05 - 118.89: Up to 10% sulphide locally																
					118.89 - 120.40: Sulphides occur more consistently and begin to occur as slight clusters																
					120.40 - 128.32: Sulphide occurrence become more patchy, similar style as above unit.																
					128.32 - 129.54: tw o types of sulphide, chalcopyrite and pyrrhotite and or pyrite.																
					129.84 - 137.16: Weak patchy chlorite alteration. Sw aths of core appear slightly chlorite altere																
					178.31 - 183.18: Trace globby/blebby sulphide, tw o types of sulphide. Pyrrhotite and																
					chalcopyrite (?). Up to 1% locally.																
183.18	207.26				Basalt: A dark grey, aphanitic to fine grained, massive unit . Moderately to strongly								187217	183.18	183.51	0.33	58	474	191	0.056	0.063
					magnetic. Moderate, very patchy sericite/epidote alteration. Trace sulphide overall.								187224	183.51	184.43	0.92	< 2	20	10	< 0.001	< 0.003
													187218	188.37	188.38	0.01	15	< 5	< 5	0.024	< 0.003
					183.18 - 183.79: Delicate sulphide lattice w ork present w ithin constrained blebs. Massive								187219	196.63	197.54	0.91	2	< 5	< 5	0.009	< 0.003
					sulphide appears to be filling a hairline fracture, sulphides also create halo. Chalcopyrite								187220	197.54	197.85	0.31	3	< 5	< 5	0.008	< 0.003
					and Pyrrhotite occurring simultaneously. A 1inch w ide band of coarse grained silicates								187221	197.85	198.76	0.91	4	< 5	< 5	0.004	< 0.003
					present, limited sulphides w ithin band.								187222	202.39	203.30	0.91	3	< 5	< 5	< 0.001	< 0.003
					196.90 - 197.83: A blocky, brittle ductile deformed zone w ith moderate sericite/chlorite								187223	206.35	207.26	0.91	< 2	< 5	< 5	< 0.001	< 0.003
					alteration. Sulphides occurring as faint veinlets follow ing hairline fractures.																

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-07-15

DIAMOND DRILL LOG | **COMPANY**

						Downhole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-07-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		24	-48	275.4					
PROPERTY:	Allen	EASTING:	430,310.00	LOGGED BY:	Kristien Wiebe	70	-47.9	275.2				AZIMUTH:	270
COMMENCED:	12-Oct-15	NORTHING:	5,389,821.00	COMMENTS:		116	-48	274.5				DIP:	-50
COMPLETED:	13-Oct-15	CORE SIZE:	NQ									ELEVATION:	346
												LENGTH:	116.12 m

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Rock		ALTERATION Sil	Ser	Ep	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	10.99				Overburden												
10.99	32.61				Pyroxenite: Dark grey/green, medium to coarse grained, massive pyroxenite. Weak		2										
					patchy magnetics. Trace pin point, fine grained, H1 pyrite, up to 1% locally.												
					18.31 - 18.59: Brittle ductile deformation, core is fractured parallel to coarse axis. Strong												
					sericite alteration												
32.61	36.90				Gabbro: A deformed, coarse grained, feldspar rich (plagioclase?) unit w ith intermittent	3			187193	33.83	34.14	0.31	23	< 5	< 5	0.071	0.006
					cross-cutting fine grained basaltic(?) dykes. Intermittent moderate to strong foliation.				187194	34.14	34.44	0.30	88	< 5	< 5	0.22	0.003
					Unit is not magnetic. Unit appears w eakly to moderately silicified in places				187195	34.44	34.75	0.31	89	< 5	< 5	0.218	< 0.003
									187196	34.75	35.05	0.30	32	< 5	< 5	0.108	0.005
					34.14 - 34.44: Massive, flooded sulphide, still occurring as disseminated (no globs).				187197	35.05	35.36	0.31	617	< 5	< 5	0.386	< 0.003
					Delicate lattice sulphides connected locally. Unit still appears to be stationary. Sulphides				187198	35.36	35.66	0.30	178	< 5	< 5	0.196	0.003
					are medium grained				187199	35.66	35.97	0.31	61	< 5	< 5	0.163	0.003
					34.44 - 34.75: 30%, host lithology still appears to be stationary. Sulphide often follow ing				187200	35.97	36.27	0.30	30	7	< 5	0.136	0.006
					w eak/moderate foliation. Delicate lattice forming locally. Sulphides are medium grained.				187201	36.27	36.58	0.31	24	5	< 5	0.132	0.004
					34.75 - 35.05: angular breccia, brittle deformation (no sulphides w ithin breccia). Dark grey				187202	36.58	36.90	0.32	17	< 5	< 5	0.098	0.004
					aphanitic intrusion parallel to core axis. Host rock is moderately foliated. Unit still												
					appears to be subhedral. Sulphides are medium grained.												
					35.05 - 35.36: Sulphide follow ing foliation, 20-40%. With foliation it is difficult to discern												
					if host silicates are stationary or not. Sulphides are medium grained. Difficult to discern												
					if host silicates are stationary due to foliation.												
					35.36 - 35.66: Strong foliation. Sulphide is fine grained and disseminated. No-see-um												
					sulphides, delicate hair like lattice w ork occasionally. 30-40% sulphides.												
					35.66 - 35.97: Foliation intensity is decreased. Fine grained disseminated sulphides,												
					30-40%. No-see-um sulphide present. Delicate lattice w ork very rarely fully connected,												
					ball and prism flooding observed only locally												
					35.97 - 36.27: Similar to sulphides in above unit how ever the ball and prism sulphides are												
					slightly more defined, able to observe subhedral host silicates locally.												
					36.27 - 36.58: Unit is blocky, sulphides similar to tw o units above.												
					36.58 - 36.90: Sulphides w ith more developed ball-prism flooding. No-see-um, delicate												
					lattice w ork. Host silicates can be observed as subhedral.												
36.90	64.63				Pyroxenite: A dark grey, massive, medium grained pyroxenite. Moderate patchy epidote			2	187203	54.86	54.88	0.02	10	< 5	< 5	0.002	< 0.003
					alteration. Unit is moderately to strongly magnetic w ith magnetic intensity drastically												
					decreasing w hen epidote alteration present. Trace pin point sulphides overall, up to												
					1% locally.												
64.63	67.39				Basalt: A dark grey, aphanitic, massive unit. Weakly to moderately magnetic. A ghost like,												
					very faint irregular spotty texture is visible under certain light, coarse.												
67.39	76.20				Volcaniclastic: Unit strongly resembles chaotic volcanoclastic unit w ithin A-01-15.												
					Aphanitic to fine grained, darky grey unit, frequently cross cut by mauvish and peachy												
					(felsic) irregular intrusions. Angular to rounded brecciated clasts of varying size.												
76.20	115.24				Diorite: Aphanitic to fine grained grey unit. Appears to be about 40-50% silicates (quartz?),												
					40% hornblende/amphibole(mafic), 10% light pin point specs (carbonate or phyllosilicate?),												
					1% k-feld?. Unit is massive, no visible bedding features or settling. Occasional messy												
					quartz like alteration veinlets - they appear deformed and irregular, lightish grey/mauve.												
115.24	116.12				Basalt: Dark grey/green, aphanitic, massive unit.												

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-09-15

DIAMOND DRILL LOG — **COMPANY**

						Down hole Tests							
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-09-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		30	-44.2	347.6					
PROPERTY:	Allen	EASTING:	430,374.00	LOGGED BY:	Kristien Wiebe	61	-44.4	247.1				AZIMUTH:	225
COMMENCED:	15-Oct-15	NORTHING:	5,389,215.00	COMMENTS:		107	-44.1	248.9				DIP:	-45
COMPLETED:	17-Oct-15	CORE SIZE:	NQ			152	-44.2	251				ELEVATION:	346
												LENGTH:	152.4

INTERVAL (metres) FROM	TO	% Rec	Vein Densit	Roc k		ALTERATION Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	36.97				Overburden																
36.97	45.72				Pyroxenite: A grey, coarse grained, generally massive unit w ith w eak foliation occurring																
					only locally. Unit is NOT magnetic. Frequent brittle ductile faults w ith fault gauge near top																
					of unit. Anastomosing quartz veins occurring locally.																
					40.84 - 45.72: Unit becomes fine to medium grained. Trace pyrite overall, present as																
					seems and also painted on some fracture surfaces																
					43.62 - 43.89: Quartz vein w ith patchy oxide staining (and patchy green alteration)																
45.72	46.42				Pyroxenite: Compositional variation (regional composition). Suggestive of primary																
					bedding (rapid bedding possibly observed). Increase in garnet size and overall % along																
					bedding planes. Unit is structurally interesting, folding/fold axis visible.																
46.42	48.10				Felsic Intrusive: Unit is light beige grey in colour																
48.10	53.34				Pyroxenite: Above garnet pyroxenite unit continues. Varying degrees of bedding texture.								187151	49.68	50.29	0.61	3	< 5	< 5	0.012	0.006
					Garnet size varies from medum-coarse to coarse grained.																
53.34	77.36				Aphanite: Unit is fine grained and garnitiferous. Dark grey, fine grained matrix w ith medium																
					grained garnets Trace painted pyrite along some fractured surfaces																
					58.46 - 60.05: Clayey sand that has been w ashed aw ay by drilling (noted by drillers in core																
					box). A void and or fault. Fault gauge present, w hat chips are remaining in box appear																
					to be strongly foliated and platy.																
					60.66 - 60.96: Brittle ductile deformation																
77.36	88.18				Granodiorite: A light grey unit w ith a sharp upper contact (contact appears more fine																
					grained), grain size coarsens dow n unit. Trace painted pyrite occurring locally along																
					fractured surfaces.																
88.18	91.23				Aphanite: Dark grey, very fine grained to aphanitic. Ductile deformation throughout w ith																
					varying degrees of intensity. Large irregular quartz blebs (largest is 4cm w ide). Quarts																
					veinlets are boodinaged. Painted/platy sulphide along fractures and quartz seams.																
					Biotite content seems to increase in areas locally, grain size also increases in these																
					areas - often associated w ith irregular boodinaged quarts veinlets and quartz blebs.																
91.23	93.06				Granodiorite: Chilled upper contact, biotite rich																
93.06	105.16				Aphanite: Above unknow n aphanite unit continues.								187152	93.76	94.49	0.73	4	< 5	< 5	0.021	0.006
					93.06 - 110.49: Unit becomes garnet rich, ductile deformation is also more prevalent.																
					Sw aths/bands (up to 1ft w ide) of fine and coarse grained garnets. Painted/plated pyrite																
					occurring along fractures - appears as coarse massive blebs. Sulphides also occurring																
					along foliation/fold controlled seams. Pyrrhotite occurring locally																
105.16	152.40				Aphanite: Bands/sw aths of ductile deformation present. Deformation is running parallel								187153	106.19	106.68	0.49	13	< 5	< 5	0.017	0.005
					to core axis. Moderate foliation in places, unit is relatively massive in others. Sulphides								187154	109.94	110.34	0.40	6	< 5	< 5	0.008	0.005
					occur locally as massive blebs, painted along some fracture surfaces. Sulphides								187155	150.57	150.60	0.03	< 2	< 5	< 5	0.002	0.005
					follow ing same foliation/bands as garnets. Garnets 3-15%. Pyrrhotite occurring locally,																
					pyrite appears to be the most common sulphide.																
					109.12 - 109.42: Quartz brecciation/veining. Coarse muscovite and biotite crystals																

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole A-04-15

DIAMOND DRILL LOG — **COMPANY**

								Dow nhole Tests					
STATE:	Ontario	NTS:	NAD83	CONTRACTOR:	Full Force	DEPTH	DIP	AZI	DEPTH	DIP	AZI	HOLE NO.	A-04-15
DISTRICT:	Rainy River	ZONE:		DATE LOGGED:		30	-45.2	82.1	259	-46	27.2		
PROPERTY:	Allen	EASTING:	430,279.00	LOGGED BY:	Frank Puskas	76	-45.3	37.9	304	-45.8	30.3	AZIMUTH:	8
COMMENCED:	04-Oct-15	NORTHING:	5,389,386.00	COMMENTS:		122	-45.7	16.3				DIP:	-45.2
COMPLETED:	07-Oct-15	CORE SIZE:	NQ			168	-46	32.8				ELEVATION:	347 m
						213	-46.1	24.8				LENGTH:	304.72 m

INTERVAL (metres)		% Rec	Vein Densit	Roc k		ALTERATION							SAMPLE				ASSAYS				
FROM	TO					Sil	Ser	Py	Cly	Chl	Cal	He	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (%)	Ni (%)
0.00	2.07				Overburden																
2.07	44.04				Norite: medium grained, massive sulphides predominantly comprised of mono and hex								182008	2.07	2.53	0.46	23	103	35	0.32	1.75
					pyrrhotite w ith irregularly distributed chalcopyrite w ith subordinate pentlandite; appearance								182009	2.53	2.83	0.30	10	38	15	0.059	0.112
					of mineralization is identical to textures exhibited at Sudbury (Little Frood Stobie for example)								182010	2.83	3.87	1.04	14	88	10	0.848	1.17
					and in both cases the inclusions (from 1 inch to1.5 feet) are products of sulphide								182011	3.87	4.18	0.30	13	45	18	0.259	0.291
					emplacement (ie sulphidization); variation in degrees of sulphidization produces								182012	4.18	4.79	0.61	16	76	14	0.62	1.19
					corresponding degrees of host rock detexturing; relative sulphide concentration increases								182013	4.79	5.43	0.64	10	31	13	0.048	0.084
					from disseminated to silicate flooded (w hispy variety contain approximately 25% sulphides								182014	5.43	5.79	0.37	8	100	9	0.449	1.61
					and referred to as "no-seeums" for obvious reasons) to flow aligned liberated silicates in								182015	5.79	6.10	0.30	4	30	12	0.04	0.149
					flood sulphides (greater than 50%) to (masu) sulphides (greater than 90%;); the presence of								182016	6.71	7.10	0.40	18	36	21	0.068	0.096
					high volumes of flood sulphides and masu are invariably accompanied by flow fabric w hich								182017	7.10	8.32	1.22	16	65	39	0.962	1.13
					characteristically parallels the core axis; inclusions can exhibit sulphides.								182018	8.23	8.53	0.30	15	47	16	0.348	0.205
													182019	8.53	8.84	0.30	17	103	87	1.77	0.822
44.04	64.01				Norite: massive sulphides w ith relatively minor inclusions. Sulphides present as w ith								182020	9.60	10.21	0.61	13	38	16	0.095	0.075
					previous interval except pentlandite more prevalent as grains (2 - 4 mm) or pentlandite trains;								182021	10.21	11.13	0.91	15	71	23	1.01	0.519
					textural varieties present include husky flooded (noseeum flood minor) and masu; flow fabric								182022	11.13	11.43	0.30	4	32	15	0.018	0.028
					accompanying sulphide emplacement prominent and orientation as previously noted; inclusion								182023	11.43	12.50	1.07	25	70	4	0.937	1.15
					population markedly decreases w ith depth and size (2 to 4 inches);sulphide emplacement								182024	12.50	13.11	0.61	11	61	5	0.976	1.41
					appears to be in tw o stages w ith the inclusion -free masu being last								182025	13.11	13.41	0.30	11	36	16	0.305	0.225
													182026	13.41	13.81	0.40	9	104	2	0.588	1.95
64.01	304.72				Ultramafic: chalcopyrite prominent as monomineralic bands / veins, and marginal facies to								182027	13.81	14.33	0.52	24	87	27	1.04	0.761
					pyrrhotite zones and bands; indicative of so - called "copper halo"; chalcopyrite veining								182028	14.33	14.63	0.30	11	34	18	0.196	0.131
					appears to be of multiple ages w ith predominant orientation being at high angles to core and								182029	14.63	15.24	0.61	15	31	26	2.06	1.17
					less commonly parallel to core axis. In actuality the Cu halo for the described body of								182030	15.24	15.70	0.46	12	53	40	0.854	0.519
					mineralization probably ends at 763 feet representing a thickness of 553 feet. The remaining								182031	15.70	16.76	1.07	80	44	10	2.59	0.707
					section (234 feet) probably represents the intervening barren septa of host ultramafic								182033	18.29	19.05	0.76	49	111	47	2	0.893
					follow ed by the copper halo of the immediately adjacent body (or cell) of mineralization.								182034	19.05	19.39	0.34	46	100	17	1.62	0.852
					The chalcopyrite veining appears to postdate the matrix sulphides w hich are texturally								182035	19.39	19.60	0.21	24	138	9	1.18	1.53
					disseminated to flood (no - seeum variety and husky varieties);								182036	19.60	19.96	0.37	19	66	27	0.363	0.16
					Pentlandite restricted to pyrrhotite veins trending either at high angles or parallel to cre axis								182037	19.96	20.27	0.30	92	154	251	1.94	0.739
													182038	20.27	20.73	0.46	21	106	35	0.461	0.442
													182039	20.73	21.03	0.30	270	111	20	1.61	0.693
													182040	21.03	21.38	0.35	18	43	20	0.06	0.073
													182041	21.38	22.40	1.02	17	43	19	0.077	0.083
													182042	22.40	22.56	0.15	23	78	30	0.83	0.542
													182043	22.56	22.78	0.23	24	54	28	0.105	0.078
													182044	22.96	23.82	0.86	38	123	12	0.898	1.04
													182045	23.82	24.23	0.41	43	107	18	1.27	0.919
													182046	24.23	24.31	0.08	52	65	10	1.43	0.857
													182047	24.31	24.54	0.23	14	45	24	0.153	0.058
													182048	25.31	25.76	0.45	17	65	18	0.57	1.18
													182049	25.76	26.15	0.40	14	69	22	1.02	1.03
													182050	26.15	27.48	1.33	16	78	< 5	0.645	1.13
													182051	27.48	27.89	0.41	15	65	17	1.15	1.44
													182052	27.89	28.04	0.15	15	81	33	0.38	1.41
													182053	28.04	28.63	0.59	87	72	26	0.578	0.975
													182054	28.63	29.03	0.40	18	110	16	0.459	1.64
													182055	29.03	29.69	0.66	18	116	20	0.351	1.44
													182056	29.69	29.88	0.20	17	104	17	0.822	0.982
													182057	29.88	30.48	0.60	12	101	< 5	0.553	0.964
													182058	30.48	30.94	0.46	21	96	11	0.951	1.14
													182059	30.94	31.29	0.35	27	105	12	1.02	1.34
													182060	31.29	32.16	0.87	22	136	23	0.426	0.958
													182061	32.16	32.77	0.61	17	55	24	0.12	0.13
													182062	32.77	32.99	0.23	21	137	16	0.768	0.435
													182063	32.99	33.53	0.54	27	77	25	0.362	0.122
													182064	33.53	34.75	1.22	45	108	26	2.43	0.384
													182065	34.75	35.05	0.30	19	56	27	0.387	0.135
													182066	35.05	35.36	0.30	79	75	14	3.31	0.22

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Hole A-04-15 *(continued)*

Hole A-04-15 (continued)	182067	35.36	35.71	0.35	17	43	21	0.327	0.08
	182068	35.71	36.62	0.91	85	53	84	2.26	0.418
	182069	36.62	37.11	0.48	276	58	38	2.05	0.306
	182070	37.11	37.49	0.38	16	46	24	0.223	0.097
	182071	37.49	38.10	0.61	49	70	10	0.617	0.572
	182072	38.10	38.53	0.43	11	68	16	0.666	0.476
	182073	38.53	38.95	0.43	27	49	18	0.232	0.217
	182074	38.95	39.62	0.67	26	77	44	1.04	0.581
	182075	39.62	40.54	0.91	37	74	18	1.47	0.343
	182076	40.54	41.15	0.61	21	54	18	0.609	0.223
	182077	41.15	41.91	0.76	20	58	32	0.707	0.312
	182078	41.91	42.55	0.64	16	45	19	0.215	0.083
	182079	42.49	42.84	0.35	22	56	28	0.222	0.254
	182080	42.84	44.04	1.19	57	65	29	1.86	0.729
	182081	44.04	44.95	0.91	18	62	5	1.14	0.746
	182082	44.95	45.18	0.23	19	65	48	1.31	0.796
	182001	45.18	45.45	0.26	10	75	2	0.057	2.29
	182002	45.45	45.51	0.07	12	46	6	0.166	0.458
	182003	45.51	45.82	0.30	12	53	2	0.273	2.11
	182004	45.82	46.07	0.26	9	57	1	0.119	2.79
	182005	46.07	46.15	0.07	15	43	2	0.767	1.79
	182006	46.15	46.38	0.23	12	39	16	0.407	0.337
	182007	46.38	46.60	0.23	43	33	4	3.17	0.57
	182083	46.60	46.91	0.31	85	43	21	0.359	0.193
	182084	46.91	47.60	0.68	33	51	34	1.39	0.72

Hole NC-1-18-01

DIAMOND DRILL LOG		COMPANY			
			Downhole Tests		
STATE: Ontario	NTS: NAD83	CONTRACTOR:	DEPTH / DIP / AZI / DEPTH / DIP / AZI	HOLE NO.	NC1-18-01
DISTRICT: Rainy River	ZONE:	DATE LOGGED:			
PROPERTY: Crystal Lake	EASTING: 430,281.00	LOGGED BY:		AZIMUTH:	14
COMMENCED: ####	NORTHING: 5,389,264.00	COMMENTS:		DIP	-50
COMPLETED:	CORE SIZE: NQ			ELEVATION:	347 m
				LENGTH	700 m

INTERVAL (metres) FROM	TO	%	Vei	Rock		ALTERATION Sil	Se	Py	Cl	C	C	H	SAMPLE No.	FROM (m)	TO (m)	LENGTH (m)	ASSAYS Au (ppb)	Pd (ppb)	Pt (ppb)	Cu (ppm)	Ni (ppm)
0.00	12.00				n								A00345241	12.00	13.00	1.00					
													A00345242	20.00	21.00	1.00					
12.00	84.95				Pyroxenite: massive, dark-green, medium-grained; local calcite-chlorite filled fractures; trace								A00345243	30.00	31.00	1.00					
					fine-grained disseminated po w ith local cpy blebs.								A00345244	40.00	41.00	1.00					
													A00345245	Control Sample							
					81.7 - 82.0: quartz vein w ith opx and trace po and cpy.								A00345246	50.00	51.00	1.00					
													A00345247	60.00	61.00	1.00					
													A00345248	66.00	67.00	1.00					
													A00345249	74.00	75.00	1.00					
													A00345250	Standard OREAS 70b							
													A00345251	84.00	84.95	0.95					
84.95	85.20				Mafic Dike: msv, med-grn, fg, mafic dike w ith sharp ctc's at 27 to CA;																
85.20	139.90				Pyroxenite: massive, fine to medium-grained, dark-green; minor irregular calcite veinlets up to								A00345252	95.00	96.00	1.00					
					0.5m w ide; local zones of moderate, patchy silica alteration; trace to 0.5%, fine-grained								A00345253	100.00	101.00	1.00					
					disseminated po and trace cpy.								A00345254	110.00	111.00	1.00					
													A00345255	120.00	121.00	1.00					
													A00345256	129.00	130.00	1.00					
													A00345257	133.00	134.00	1.00					
													A00345258	135.00	136.00	1.00					
													A00345259	137.00	138.00	1.00					
													A00345260	Blank							
139.90	162.95				Norite: fine-grained, gray w ith sharp upper contact; minor fractures; moderate to strong,								A00345261	139.00	139.90	0.90	N.A.	N.A.	N.A.	35	36
					patchy silica alteration; 2% fine-grained, disseminated po; core is strongly magnetic but not								A00345262	141.00	142.00	1.00	N.A.	N.A.	N.A.	24	15
					w here silica altered.								A00345263	143.00	144.00	1.00	N.A.	N.A.	N.A.	35	16
													A00345264	145.00	146.00	1.00	N.A.	N.A.	N.A.	27	59
													A00345265	Control Sample							
													A00345266	147.00	148.00	1.00	N.A.	N.A.	N.A.	12	28
													A00345267	149.00	150.00	1.00	N.A.	N.A.	N.A.	71	33
													A00345268	151.00	152.00	1.00	N.A.	N.A.	N.A.	27	10
													A00345269	153.00	154.00	1.00	N.A.	N.A.	N.A.	84	11
													A00345270	Standard OREA 73a							
													A00345271	155.00	156.00	1.00	N.A.	N.A.	N.A.	68	28
													A00345272	157.00	158.00	1.00	N.A.	N.A.	N.A.	23	14
													A00345273	159.00	160.00	1.00	N.A.	N.A.	N.A.	15	12
													A00345274	161.00	162.00	1.00	N.A.	N.A.	N.A.	30	11
162.95	163.60				Mafic Dike: green-gray, fine-grained w ith sharp, irregular contacts.																
163.60	164.45				Norite: massive, fine-grained, gray; 3% disseminated, fine-grained po; core is strongly																
					magnetic.																
164.45	164.73				Mafic Dike: massive, fine-grained, green-gray w ith sharp contacts at 13 degrees to core axis;								A00345275	164.40	164.73	1.33	N.A.	N.A.	N.A.	34	53
					strongly magnetic w ith trace, disseminated po																

Paul W. Pitman, *B.Sc., P.Geo.* **Luc Harnois**, *PhD, P.Geo..*

Hole NC-1-18-01 *(continued)*

164.73	183.28	Norite: massive, fine to medium-grained; locally silicified; minor chlorite coated fractures; 3%	A00345276	166.00	167.00	1.00	N.A.	N.A.	N.A.	27	37
		disseminated po.	A00345277	168.00	169.00	1.00	N.A.	N.A.	N.A.	19	12
			A00345278	170.00	171.00	1.00					
			A00345279	172.00	173.00	1.00					
			A00345280	Blank							
			A00345281	174.00	175.00	1.00					
			A00345282	176.00	177.00	1.00					
			A00345283	178.00	179.00	1.00					
			A00345284	180.00	181.00	1.00					
			A00345285	Control Sample							
			A00345286	182.00	183.00	1.00					
183.28	183.66	Mafic Dike: massive, fine-grained, greenish-gray; strongly magnetic.									
183.66	201.08	Norite: massive, medium-grained, dark-gray to gray; locally strongly silicified; 3% diss po;	A00345287	184.00	185.00	1.00					
		minor, narrow quartz veinlets.	A00345288	186.00	187.00	1.00					
			A00345289	188.00	189.00	1.00					
			A00345290	Standard OREAS 70b							
			A00345291	190.00	191.00	1.00					
			A00345292	192.00	193.00	1.00					
			A00345293	194.00	195.00	1.00					
			A00345294	196.00	197.00	1.00					
			A00345295	198.00	199.00	1.00					
			A00345296	200.00	201.00	1.00					
201.08	201.24	Mafic Dike: massive, fine-grained, greenish-gray; sharp contacts; non magnetic.									
201.24	208.55	Norite: massive, medium-grained, gray to dark gray; locally silicified; trace disseminated,	A00345297	202.00	203.00	1.00					
		fine-grained po.	A00345298	204.00	205.00	1.00					
			A00345299	206.00	207.00	1.00					
			A00345300	Blank							
208.55	209.54	Mafic Dike: massive, fine-grained, greenish-gray, ultramafic? Dike; mod to strongly magnetic,	A00345301	208.00	209.00	1.00					
		sharp contacts at 40 degrees to core axis; approx 1% fine-grained, disseminated sulphides									
209.54	212.94	Norite: masssive, medium-grained, dark, greenish-gray; 2% fine, disseminated po.	A00345302	210.00	211.00	1.00					
212.94	213.32	Mafic Dike: massive, fine-grained, green; mod to strongly magnetic; sharp contacts at 40									
		degrees to core axis; approx. 3% fine disseminated po.									
213.32	218.30	Norite: massive, medium-grained, dark green-gray; local patchy silicification; approx 3%	A00345303	214.00	215.00						
		fine disseminated po.	A00345304	216.00	217.00						
			A00345305	Control Sample							
218.30	219.33	Mafic Dike: massive, fine-grained, green, non magnetic; sharp contacts.									
219.33	226.70	Norite: massive, medium-grained, dark green-gray; minor quartz & calcite-quartz veinlets;	A00345306	220.00	221.00						
		w eak silica alteration; approx 3% fine disseminated po.	A00345307	222.00	223.00						
			A00345308	224.00	225.00						
			A00345309	226.00	226.70						
			A00345310	Standard OREAS 73a							
226.70	227.50	Mafic Dike: massive, fine-grained, green; mod to strongly magentic; contacts poorly defined;									
		approx 2% fine diss sulphides, po, py.									
227.50	312.13	Norite: massive, medium-grained, dark-gray to gray; mod to strongly magnetic; mod, narrow ,	A00345311	228.00	229.00	1.00					
		quartz and calcite veinlts up to 5 cm w ide w ith 1-3% disseminated sulphides; local,	A00345312	230.00	231.00	1.00					
		patchy, moderate silica alteration; overall 1-3% diss po and trace cpy.	A00345313	232.00	233.00	1.00					
			A00345314	234.00	235.00	1.00					
			A00345315	236.00	237.00	1.00					
			A00345316	238.00	239.00	1.00					
			A00345317	240.00	241.00	1.00					
			A00345318	242.00	243.00	1.00					
			A00345319	244.00	245.00	1.00					
			A00345320	Blank							
			A00345321	246.00	247.00	1.00					
			A00345322	248.00	249.00	1.00					
			A00345323	250.00	251.00	1.00					
			A00345324	252.00	253.00	1.00					
			A00345325	Control Sample							
			A00345326	254.00	255.00	1.00					
			A00345327	256.00	257.00	1.00					
			A00345328	258.00	259.00	1.00					
			A00345329	260.00	261.00	1.00					
			A00345330	Standard OREAS 70b							
			A00345331	262.00	263.00	1.00					
			A00345332	264.00	265.00	1.00					
			A00345333	266.00	267.00	1.00					
			A00345334	268.00	269.00	1.00					
			A00345335	270.00	271.00	1.00					
			A00345336	272.00	273.00	1.00					
			A00345337	274.00	275.00	1.00					
			A00345338	276.00	277.00	1.00					
			A00345339	278.00	279.00	1.00					
			A00345340	Blank							
			A00345341	280.00	281.00	1.00					
			A00345342	282.00	283.00	1.00					
			A00345343	284.00	285.00	1.00					
			A00345344	286.00	287.00	1.00					
			A00345345	Control Sample							
			A00345346	288.00	289.00	1.00					
			A00345347	290.00	291.00	1.00					
			A00345348	292.00	293.00	1.00					
			A00345349	294.00	295.00	1.00					
			A00345350	Standard OREAS 73a							
			A00345351	296.00	297.00	1.00					
			A00345352	298.00	299.00	1.00					
			A00345353	300.00	301.00	1.00					
			A00345354	302.00	303.00	1.00					
			A00345355	304.00	305.00	1.00					
			A00345356	306.00	307.00	1.00					
			A00345357	308.00	309.00	1.00					
			A00345358	310.00	311.00	1.00					
312.13	314.46	Mafic Dike: massive, fine-grained, gray to green-gray; sharp contacts; w eakly magnetic;	A00345359	312.13	313.00	0.87					
		1% diss py.	A00345360	Blank							

Hole NC-1-18-01 *(continued)*

314.46	363.22	Norite: massive, medium-grained, green, w eakly magnetic; minor, narrow , quartz-calcite-	A00345361	314.00	314.46	1.46
		sulphide veinlets w ith up to 7% py, po, cpy; overall 3% diss py,po; local, patchy, mod to	A00345362	316.00	317.00	1.00
		srtong silica alteration.	A00345363	318.00	319.00	1.00
			A00345364	320.00	321.00	1.00
			A00345365	Control Sample		
			A00345366	322.00	323.00	1.00
			A00345367	324.00	325.00	1.00
			A00345368	326.00	327.00	1.00
			A00345369	328.00	329.00	1.00
			A00345370	Standard OREAS 70b		
			A00345371	330.00	331.00	1.00
			A00345372	332.00	333.00	1.00
			A00345373	334.00	335.00	1.00
			A00345374	335.00	336.00	1.00
			A00345375	338.00	339.00	1.00
			A00345376	340.00	341.00	1.00
			A00345377	342.00	343.00	1.00
			A00345378	344.00	345.00	1.00
			A00345379	348.00	349.00	1.00
			A00345380	Blank		
			A00345381	350.00	351.00	1.00
			A00345382	352.00	353.00	1.00
			A00345383	354.00	355.00	1.00
			A00345384	356.00	357.00	1.00
			A00345385	Control Sample		
			A00345386	358.00	359.00	1.00
			A00345387	360.00	361.00	1.00
			A00345388	362.50	363.22	0.72
363.22	363.66	Mafic Dike: massive, fine-grained, green; w eakly magnetic.				
363.66	369.05	Norite: massive, medium-grained, green; mod magnetic; 3% diss po.	A00345389	366.00	367.00	1.00
			A00345390	Standard OREAS 73a		
			A00345391	368.60	369.00	1.00
369.05	383.39	Pyroxenite: massive, medium-grained, green; mix of multiple fg, green mafic dikes and	A00345392	370.00	370.40	0.40
		inclusions, 8-15 cm thick, contacts are sharp but irregular; w k to mod, patchy silica alteration;	A00345393	372.00	373.00	1.00
		1-3 % fine diss py and po.	A00345394	374.00	375.00	1.00
			A00345395	375.00	376.00	1.00
			A00345396	376.00	377.00	1.00
			A00345397	377.00	379.00	2.00
			A00345398	380.00	381.00	1.00
			A00345399	382.00	383.00	1.00
			A00345400	Blank		
			A00345401	383.00	383.39	0.39
383.39	383.59	Iron Formation: layered, black to dark-brow n, alternatining po-rich and siliceous beds 1-10mm	A00345402	383.39	383.59	0.20
		thick; approx 70% magnetite and 5% diss po.				
383.59	395.02	Pyroxenite: massive, medium-grained, green; mix of mulitple fg, green mafic dikes and				
		inclusions, 8-15 cm thick and mg pyroxenite/norite; sharp, irregular contacts; 1-3% diss	A00345403	383.59	384.00	0.41
		py, po.	A00345404	384.00	385.00	1.00
			A00345405	Control Sample		
			A00345406	385.00	386.00	1.00
			A00345407	388.00	389.00	1.00
			A00345408	390.00	391.00	1.00
			A00345409	394.00	395.02	1.02
			A00345410	Standard OREAS 70b		
395.02	395.42	Iron Formation: layered, fine-grained, light-gray to dark-brow n; alternating po-rich and	A00345411	395.02	395.42	
		magnetite-rich beds, 1-10mm thick; approx 50% sulphides.				
395.42	401.50	Pyroxenite: massive, medium-grained, green; mix of mulitple fg, green mafic dikes and	A00345412	395.42	396.40	0.98
		inclusions, 8-15 cm thick and mg pyroxenite/norite; sharp, irregular contacts; 1-3% diss	A00345413	396.40	397.00	0.60
		py, po; local, patchy, mod-str silica alteration.	A00345414	397.00	398.00	1.00
			A00345415	398.00	399.00	1.00
			A00345416	399.00	400.00	1.00
			A00345417	400.00	401.00	1.00
			A00345418	401.00	401.50	0.50

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Hole NC-1-18-01 *(continued)*

401.50	427.32	Norite: massive, medium-grained, green; mix of multiple fgr green mafic dikes and inclusions,	A00345419	401.50	402.50						
		8-20 cm in thickness and mgr-cgr norite and pyroxenite; contacts are sharp but irregular;	A00345420	Blank							
		possible, narrow iron formation unit; overall 1-6% disseminated py,po and local cpy blebs.	A00345421	402.50	403.50	1.00					
			A00345422	403.50	404.50	1.00					
			A00345423	404.50	405.50	1.00					
			A00345424	407.00	408.00	1.00					
			A00345425	Control Sample							
			A00345426	409.00	410.00	1.00					
			A00345427	411.00	412.00	1.00					
			A00345428	413.00	414.00	1.00					
			A00345429	414.00	415.00	1.00					
			A00345430	Standard OREAS 73a							
			A00345431	415.00	416.00	1.00					
			A00345432	416.00	417.00	1.00					
			A00345433	417.00	418.00	1.00					
			A00345434	418.00	418.50	0.50					
			A00345435	418.50	419.50	1.00					
			A00345436	421.00	422.00	1.00					
			A00345437	423.00	424.00	1.00					
			A00345438	426.50	427.32	0.82					
427.32	432.50	Pyroxenite: massive, medium-grained, green; mix of mulitple fg, green mafic dikes and	A00345439	427.32	427.52	0.20					
		inclusions, 8-20 cm thick and mg pyroxenite/norite; sharp, irregular contacts; 1% diss	A00345440	Blank							
		py, po; local, patchy, mod-str silica alteration.	A00345441	427.52	428.50	0.98					
			A00345442	431.50	432.50	1.00					
432.50	432.95	Iron Formation: layered, fine-grained, light -gray to dark-brow n; alternating po-rich and	A00345443	432.50	432.95	4.50					
		siliceous beds, 1-10mm thick; bedding at 52 degrees to core axis; approx 30% magnetite.									
432.95	448.90	Norite: massive, medium-grained, green; mix of multiple fgr green mafic dikes and inclusions,	A00345444	432.95	434.00	1.05					
		8-20 cm in thickness and mgr-cgr norite and pyroxenite; contacts are sharp but irregular;	A00345445	Control Sample							
		local, narrow iron fromation bed overall 1-8% disseminated py,po.	A00345446	434.00	435.00	1.00					
			A00345447	435.00	436.00	1.00					
		443.63-443.75: iron formation.	A00345448	436.00	437.00	1.00					
			A00345449	437.00	438.00	1.00					
			A00345450	Standard OREAS 70b							
			A00345451	441.00	441.85	0.85					
			A00345452	441.85	443.00	1.15					
			A00345453	443.00	443.50	0.50					
			A00345454	443.50	444.00	0.50					
			A00345455	447.00	447.50	0.50					
			A00345456	447.50	448.20	0.70					
448.90	450.00	Mafic Dike: massive, fine-grained, green amfic dike w ith sharp contacts.									
450.00	541.75	Norite: mix of multiple fgr green mafic dikes and inclusions, 8-20 cm in thick and mg-cg	A00345457	452.00	453.00	1.00	N.A.	N.A.	N.A.	35	159
		pyroxenite and some norite, contacts are sharp but irregular; local, narrow qtz-cal veinlets	A00345458	453.00	453.45	0.45	N.A.	N.A.	N.A.	23	232
		and narrow sulphide (po?) stringers up to 10 cm thick; local, patchy silica alteration; overal	A00345459	453.45	454.00	0.55	0.50	5	1	62	213
		1-10% sulphides as disseminations and local stringers and semi-massive veinlets.	A00345460	Blank							
			A00345461	454.00	455.00	1.00	N.A.	N.A.	N.A.	32	212
			A00345462	455.00	456.00	1.00	N.A.	N.A.	N.A.	51	203
			A00345463	460.00	461.00	1.00	N.A.	N.A.	N.A.	56	238
			A00345464	461.00	462.00	1.00	N.A.	N.A.	N.A.	63	53
			A00345465	Control Sample							
			A00345466	462.00	463.00	1.00	N.A.	N.A.	N.A.	99	84
			A00345467	463.00	464.00	1.00	N.A.	N.A.	N.A.	343	86
			A00345468	464.00	465.00	1.00	N.A.	N.A.	N.A.	63	204
			A00345469	465.00	466.00	1.00	N.A.	N.A.	N.A.	45	147
			A00345470	Standard OREAS 73a							
			A00345471	466.00	467.00	1.00	N.A.	N.A.	N.A.	129	181
			A00345472	467.00	468.00	1.00	N.A.	N.A.	N.A.	86	180
			A00345473	468.00	469.00	1.00	N.A.	N.A.	N.A.	77	240
			A00345474	469.00	470.00	1.00	N.A.	N.A.	N.A.	33	155
			A00345475	470.00	471.00	1.00	0.50	5	0.5	273	80
			A00345476	471.00	472.00	1.00	0.50	5	1	712	42
			A00345477	472.00	473.00	1.00	0.50	5	0.5	568	97
			A00345478	473.00	474.00	1.00	0.50	5	1	499	169
			A00345479	474.00	475.00	1.00	0.50	5	0.5	635	176
			A00345480	Blank							
			A00345481	475.00	476.00	1.00	0.50	5	0.5	416	93
			A00345482	476.00	477.00	1.00	0.50	5	0.5	410	13
			A00345483	477.00	478.00	1.00	0.50	5	0.5	397	13
			A00345484	478.00	479.00	1.00	0.50	5	0.5	508	12
			A00345485	Control Sample							
			A00345486	479.00	480.00	1.00	0.50	5	0.5	508	12
			A00345487	480.00	481.00	1.00	0.50	5	0.5	597	12
			A00345488	481.00	482.00	1.00	0.50	5	0.5	762	14
			A00345489	482.00	483.00	1.00	0.50	5	0.5	655	12
			A00345490	Standard OREAS 70b							
			A00345491	483.00	483.60	0.60	0.50	5	0.5	701	13
			A00345492	483.60	484.40	0.80	0.50	5	0.5	715	11
			A00345493	484.40	485.00	0.60	N.A.	N.A.	N.A.	566	11
			A00345494	485.00	486.00	1.00	N.A.	N.A.	N.A.	794	13
			A00345495	486.00	487.00	1.00	N.A.	N.A.	N.A.	375	11
			A00345496	487.00	488.00	1.00	N.A.	N.A.	N.A.	238	11
			A00345497	488.00	489.00	1.00	N.A.	N.A.	N.A.	70	12
			A00345498	489.00	490.00	1.00	N.A.	N.A.	N.A.	36	11
			A00345499	490.00	491.00	1.00	N.A.	N.A.	N.A.	51	25

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Hole NC-1-18-01 *(continued)*

			A00345500	Blank		
			A00345501	491.00	492.00	1.00
			A00345502	492.00	493.00	1.00
			A00345503	493.00	494.00	1.00
			A00345504	494.00	495.00	1.00
			A00345505	Control Sample		
			A00345506	495.00	496.00	1.00
			A00345507	496.00	497.00	1.00
			A00345508	497.00	498.00	1.00
			A00345509	498.00	499.00	1.00
			A00345510	Standard OREAS 73a		
			A00345511	499.00	500.00	1.00
			A00345512	500.00	501.00	1.00
			A00345513	501.00	502.00	1.00
			A00345514	503.00	504.00	1.00
			A00345515	505.00	506.00	1.00
			A00345516	507.00	508.00	1.00
			A00345517	513.00	514.00	1.00
			A00345518	514.00	515.00	1.00
			A00345519	515.00	516.00	1.00
			A00345520	Control Sample		
			A00345521	516.70	517.35	0.65
			A00345522	517.35	517.65	0.30
			A00345523	517.65	518.65	1.00
			A00345524	528.00	529.00	1.00
			A00345525	Control Sample		
			A00345526	538.00	539.00	1.00
541.75	545.55	Iron Formation: siliceous metasandstone w ithout primary sedimentary structures preserved;				
		sharp low er contact.				
545.55	546.70	Norite: medium-grained, green; mix of multiple fg, green mafic dikes and inclusions 3-15 cm				
		thick and mg to cg norite; contacts are sharp but irregular; 1% fine disseminated po.				
546.70	547.85	Iron Formation: siliceous metasandstone w ithout primary sedimentary structures preserved;				
		sharp contacts.				
547.85	626.12	Norite: green; mg to cg norite w ith rare small mafic inclusions/dikes and not much sulfides	A00345527	548.00	549.00	1.00
		(max 1-2%); locally silicified, mainly along fractures; possible inclusion of metasediment;	A00345528	564.00	565.00	1.00
		1-2% fine diss py,po; local, patchy silica alteration.	A00345529	579.00	580.00	1.00
			A00345530	Standard OREAS 70b		
		632.90-633.05: metasediments	A00345531	594.00	595.00	1.00
			A00345532	609.00	610.00	1.00
			A00345533	624.00	625.00	1.00
626.12	628.00	Mafic Dike: massive, fine-grained, green; 2% diss py.				
628.00	700.00	Norite: medium-grained, green; mix of multiple fg, green mafic dikes and inclusions 3-15 cm	A00345534	637.00	638.00	1.00
		thick and mg to cg norite; contacts are sharp but irregular; 1% fine disseminated po.	A00345535	653.00	654.00	1.00
		local, patchy silica alteration.	A00345536	667.00	668.00	1.00
			A00345537	686.00	687.00	1.00
	700.00	EOH	A00345538	699.00	700.00	1.00

APPENDIX III
June, 2016 Field Visit

From June 15-17 the author visited the NICOBAT Property and examined collar locations, pit and core. The core is safely stored in a locked garage with camera surveillance. Hole A-04-15 was viewed, mineralization noted and two samples were taken for verification. One of each identical sample from quartered core was sent to Actlabs, Ancaster, ON. and to Chemex Labs in Sudbury. The core was taken from labelled boxes from the same intervals as previous samples.

Following are photos from the field visit:


Picking core for assaying


Hole A-04-15
54
55
56
57
59
60
182060

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APPENDIX IV
Check Assay Verification

Original Assay Data (focusing on Ni, Cu values)

Hole A-04-15

Samples 187251 and 187252	90.97 – 101.48 feet	1.14% Ni, 0.91% Cu
Samples 187253 and 187254	101.48 – 102.63 feet	1.34% Ni, 1.02% Cu

Report Number: A16-05843

Report Date: 7/7/2016

Analyte Symbol	**Au**	**Pd**	**Pt**	**Cu**	**Ni**
Unit Symbol	ppb	ppb	ppb	%	%
Detection Limit	2	5	5	0.001	0.003
Analysis Method	FA-ICP	FA-ICP	FA-ICP	ICP-OES	ICP-OES
187252	**28**	**70**	**12**	**0.731**	**1.07**
187254	**92**	**74**	**21**	**1.08**	**0.939**

SD16100904 - Finalized
CLIENT : PCHBPMGE - PWP Consulting
# of Samples : 2
DATE RECEIVED : 2016-06-24 DATE FINALIZED : 2016-07-11
PROJECT : Sierra Iron Ore
CERTIFICATE COMMENTS :
PO NUMBER :

	Ni-OG62	**Cu-OG62**	**PGE-ICP23**	**PGE-ICP23**	**PGE-ICP23**
SAMPLE	Ni	Cu	Au	Pt	Pd
DESCRIPTION	%	%	ppm	ppm	ppm
187251	1.175	0.71	0.013	<0.005	0.095
187253	1.01	0.954	0.011	0.007	0.089

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APPENDIX V
2018 Field Expenditures**

Ronacher McKenzie Geoscince Inc							
Feb-18					9984.95		
Mar-18					11226.6		
May-18					28272.2		
Jun-18					3195.58		
June 4 2018					13155.6		
Sep-18					449.21		
Nov-18					2101.8		
Dec 4 2018					3640.12		
Dec 21 2018		retainer			13000		
					85026		**85026.02**
Dog Barron					2000		**2000**
Full Force Drilling							
March 1 2018		retainer			25000		
March 21 2018					30079.4		
March 23 2018					58310.9		
April 18 2018					23709.4		
May 29 2018					24811.8		
					161912		**161911.6**
LAB Contracting					2938		**2938**
CGG		air borne survery			222384		**222384**
Luc Gagnon					6050		**6050**
Lightfoot Geoscince Inc							
Feb-18					10791.7		
Mar-18					6780		
Apr-18					9469.32		
July -Sep 2018					5250		
Dec-18					10615.2		
					42906.2		**42906.2**
					Total		**523215.82**

***Summary of expenditures provided by Crystal Lake*