

**HPQ SILICON RESOURCES INC.**

**National Instrument 43-101-compliant  
*TECHNICAL EVALUATION REPORT*  
*OF THE*  
**METALLURGICAL QUARTZ POTENTIAL**  
*OF THE*  
**RONCEVAUX QUARTZ PROJECT**  
**MATAPEDIA AREA,**  
**GASPÉSIE REGION,**  
**PROVINCE OF QUEBEC****

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## 1.0 SUMMARY

In September 2016, Mr. Bernard J. Tourillon, Chairman and CEO of HPQ Silicon Resources Inc., (“HPQ” or “HPQ Silicon”) mandated the author to prepare a National Instrument 43-101 compliant Technical Evaluation report for its Roncevaux Quartz Project host to a high purity quartz vein system. HPQ Silicon is a well-established mineral exploration company active in the Province of Quebec where it is involved, on its own or with various partners, in the acquisition exploration and development of high purity silica occurrences and gold prospects. The objective of the company’s management is to become a vertically integrated producer of silicon metal, solar grade silicon metal and poly silicon aimed at the solar energy semiconductors and high-tech industries. For this purpose, it has assembled a portfolio of mineral properties with prospective high purity quartz occurrences of which the Roncevaux project is the most advanced. (see HPQ Silicon website for other projects).

Since 1979, the author has acquired pertinent experience in the evaluation prospecting and development of several types of ore deposits. For the purpose of this report he has undertaken an independent technical review of the project area and its economic mineral potential in compliance with the Canadian NI 43-101 disclosure standards for mineral projects. The author considers the Roncevaux project as an exploration project of merit with the potential of supplying high purity grade quartz to be processed into added value silicon metal.

This report describes the materially significant aspects of the property and recommends an exploration program. The author has reviewed the information available as listed under “References” and presents the summary of the information he deems material to this technical report including all pertinent files available on various websites and the websites of the Ministère de l’Énergie et des Ressources naturelles (MERN) of the Province of Quebec.

The Roncevaux Project is located in the Gaspésie Region of the Province of Québec, some 700 km east of Montreal and 460 km from Quebec City. The mineral property is made-up of 33 contiguous map designated claims covering a total area 1,895.54 ha. It is host to the Roncevaux quartz vein occurrence.

The Roncevaux Project lies in gently rolling Appalachian terrain. The topography is made-up of hills, mountains, plateaus and broad valleys oriented NW-SE. On the property, the relief is relatively abrupt with steep-sided hills with altitudes ranging from 500m to 650 m above sea level in the Notre-Dame range. The project area is readily accessible from a network of public and forestry roads travelling southwest from the village Sainte-Florence on provincial highway 132 and following the newly improved bush road along range 2 of Matalik township for about 25 km. The general infrastructure in the area is very good.

The first recorded account of mapping and exploration in the Matapedia River basin area began with the investigation of W.E. Logan in 1844 and his

colleague A. Murray in 1846. A.P. Low visited the area in 1884, and many others followed during the ensuing 133 years. The most comprehensive geological mapping available is the synthesis of the area into the Gaspé regional geology completed by Slivitsky et al (1991). Stratigraphy was reinterpreted and integrated into the Appalachian Geology by Brisebois and Morin (2003).

The first known account of exploration work carried-out on the Roncevaux quartz vein was reported by prospector Marc-Yvan Beaulieu in his 1992 report (GM 57622) on the prospecting of the Knoble gold prospect located about 3.0 km to the northeast of the Roncevaux occurrence. While looking for signs of mineralization Beaulieu came across a boulder field filled with blocks of white quartz mixed-in the glacial drift. Detailed prospecting, trenching and shallow drilling followed. The vein was uncovered and sampled in two trenches.

In 2002, geologist Jean-Paul Barrette completed an extensive prospecting program to better understand the geology and economic potential of the Roncevaux vein. The field activities consisted in the excavation of five additional trenches and sampling across the quartz vein. Oriented at 310° and spaced 50 to 75 m apart, the trenches exposed the vein system for a strike length of over 340 m.

The mapped quartz vein is milky white and varies in thickness between 3 and 12 m (between TR-A and TR-2). The thickening of the vein is presumably caused by folding and faulting. About 30 cm of the footwall and hanging walls of the structure are brecciated with wall rock clasts making up to 20% of the vein.

Analytical results from 14 chip, selected and channel (from Tr-2) samples show SiO<sub>2</sub> content ranging between 99.03% to 99.36%. Combined major oxide concentration and LOI show concentrations of 0.60% to 0.86%: Fe<sub>2</sub>O<sub>3</sub>, MgO and Al<sub>2</sub>O<sub>3</sub>. Furthermore, 17 samples collected from the vein and surrounding host rocks were analysed for gold. Only three samples returned significant anomalous concentrations of 38, 121 and 201 ppb Au associated with the presence of pyrite.

Based on the exposed strike length of the vein (340 m) and a varying width between 3 and 12 m geologist J.P. Barrette, estimated a geological resource of 414,700 Mt carrying a grade of 99.2% SiO<sub>2</sub> down to a presumed vertical continuity of the vein to -50 m. (This resource is historic in nature and does not meet the requirements for resource categorization as set out in the NI43-101 regulation).

J.P. Barrette concludes that it is possible that the Roncevaux vein may extend laterally along strike and down-dip and could be part of a network of similar parallel veins.

The last field work on the Roncevaux Project was completed on behalf of Uragold Bay Resources (HPQ Silicon's former name) during the fall of 2015, by the ETE (Eau, Terre, Environment) division of the INRS (Institut National de Recherche Scientifique), based in Quebec City. Under the supervision of senior research geologist Marc Richer-LaFlèche, PhD., a technical team completed a detailed geological, geochemical and geophysical survey program centered around the trenched section of the Roncevaux quartz vein.

A reference grid was established to cover the trench areas and extending to the West. Of the historic excavation, four trenches (II, III, V and VI) were thoroughly cleaned by mechanical means and two new trenches (I and IV) were excavated. Details of the completed program and its results are presented in a comprehensive report, (Richer-LaFlèche, 2016). Highlights and results of the program are presented in section 7.2 of this report.

The Roncevaux Project area lies within the Gaspé Peninsula, a major component of the Appalachian Geological Province that stretches from Alabama in the Southeast USA to Newfoundland. The Gaspé Peninsula is composed of three tectonostratigraphic domains: (1) In its northern portion, rocks of the Humber and Dunnage zones (Cambro-Ordovician), have been deformed during the Middle to Late Ordovician by the Taconic Orogeny and during the Middle Devonian by the Acadian Orogeny; (2) The rocks aged between 461,0 to 398,0 Ma from the Upper Ordovician to Devonian are in faulted contact (Shickshock South Fault) with the earlier sequences of Cambro-Ordovician age and have been deformed during the Acadian Orogeny during the Middle Devonian; (3) The rock formations deposited between the Late Devonian and the Carboniferous are in discordant contact with the earlier domains and were deformed by the Alleghenian Orogeny during the Late Pennsylvanian-Permian Period. (See Figure 5, d'Hulst, 2007).

The structure of the Gaspésie Belt is made-up of three tectonic zones related to NE trending Acadian regional folding. The Aroostook-Percé Anticlinorium and both the Connecticut Valley-Gaspé and the Baie des Chaleurs Synclinoriums are characterised by secondary folding of variable wavelengths and a foliation of varying intensity depending on the zone. These three zones are bounded by faults of regional extent (Shickshock-South Fault and the Sainte-Florence Fault) or are cut by faults (Grand Pabos Fault). The shape of this portion of the Appalachian Province is considered to have been formed by NW-SE compressional tectonics resulting from an angular convergence during the Acadian Orogeny. ( D'Hulst, 2007)

Intense magmatic activity during the Silurian-Devonian period has resulted in the formation of several volcanic centers and intrusions. The volcanic systems are composed of mafic to felsic lavas of continental affinities with local arc signature. They are host to various types of mineralization including epithermal. Several intrusive bodies of intermediate to felsic composition are found throughout the region and some are related to significant metallic

mineralization such as the rhyodacitic and monzonitic plutons of the Porphyry Mountain and Gaspé Copper mine.

The Roncevaux Project lies within the southern domain in the central portion of the Connecticut Valley-Gaspé synclinorium. It is bounded to the north by the Shickshock-South fault and to the south by the Restigouche fault. This basin is filled with fine to very coarse grained siliciclastic rocks, various types of limestones, felsic to mafic volcanic and intrusive rocks. The rocks of the Roncevaux vein area belong to the Fortin Group and the few outcrops visited by the INRS-ETE technical team in September 2015 were made-up of sandstones and siltstones with lesser units of shales and mudstones. The rocks are folded faulted and fractured. Bedding (So) appears sub-vertical (85°) with an average strike of N231°.

Data collected from mapping of the trenches and various ground geophysical surveys by the ETE-INRS team revealed that the quartz vein network was injected along a faulted contact between a siltstone and sandstone rich sequence on the NW hanging wall and a more argillaceous and mudstone rich sequence to the SE foot wall. The vein system is about 8.0 m thick comprising a narrow footwall (0,35 m to 1.5 m) contact zone containing brecciated wall rock fragments. Due to a thicker overburden, the hanging wall contact was only visible in trench VI where it exhibits similar features as the footwall contact zone.

Narrow channel samples were taken from all the silica rich rock exposures at the bottom of the six trenches. The 35 composite samples collected were sent to the INRS-ETE Centre certified laboratory facility in Quebec City.

The analytical results revealed that the SiO<sub>2</sub> content varies across the width of the vein system with the lowest concentrations in the contact zones of the foot and hanging walls where wall rock and brecciated fragments of sedimentary rocks most likely contaminated the intruding silica melt. Low silica values 92.0% to 96.0% SiO<sub>2</sub> are compensated with other higher major oxide content notably Al<sub>2</sub>O<sub>3</sub> (4.02%) and Fe<sub>2</sub>O<sub>3</sub> (1.81%) and other oxides (TiO<sub>2</sub>, Fe<sub>2</sub>O<sub>3</sub>, MnO, MgO, CaO, Na<sub>2</sub>O, K<sub>2</sub>O, P<sub>2</sub>O<sub>5</sub>, and S). Minor chemical species (Ba, Cd, Co, Cr, Cu, La, Sc, V, Zn and Zr ppm) are also in higher concentrations in the contact zone rich in wall rock breccia fragments. The central portion of the vein network has characteristics of high purity quartz with SiO<sub>2</sub> content averaging +99.00% over the entire width of the massive body and with the sum of the other major oxides at less than 1.00% by weight.

The geochemistry of ultra-trace elements suggest that the Roncevaux vein hydrothermal fluids were emplaced in an oxidizing environment and that the fluorine content is compatible with the P<sub>2</sub>O<sub>5</sub>-CaO (major oxides) concentration and most likely reflect the presence of fluoroapatite in the quartz of the vein.

Quartz is one of the most common mineral of the Earth's crust and quartz veins of all sizes are common in a wide range of tectonic and hydrothermal settings but very few of these vein occurrences can qualify as having high purity quartz content of economic interest. High purity quartz is defined as raw material that has SiO<sub>2</sub> concentration in the 99.995% range with a very low tolerance for impurities where the most determinant factor is to establish the composition of the other 0.005%. 'Specific expertise in geology chemical analysis and high purity processing is required to convert raw quartz into a high-value final product. Depending on the geological setting, fluids and/or mineral inclusions need to be removed by applying tailor-made technology. Remnant hydrothermal fluids from which quartz was formed and many different minerals inclusions occur in raw quartz such as iron oxides phosphates and heavy minerals (Anzaplan website).

Depending on the required final quality and value processing of raw quartz into high purity quartz involves advance comminution technology physical thermal and chemical steps. Comminution reduces raw quartz to liberate mineral impurities and to the needed product size. Further physical and chemical steps are needed to separate or dissolve the impurities.

On October, the 2nd, 2016, the author completed a site visit to the Roncevaux Project area. All the excavated and sampled trenches in the prospect area and described in the INRS-ETE report were inspected, photographed and locations were recorded using a hand-held GPS device.

The main quartz vein exposed in the trenches appears to be intensely sheared, recrystallized and fractured.

The cuts along the road leading to a nearby newly built electrical wind turbine farm have exposed numerous blocks of white quartz. This occurrence confirms the presence of the main Roncevaux quartz vein at least for another 125 m towards the east from the last trench excavated (Trench VI).

On September 30, 2015 HPQ-Silicon announced a newly signed partnership with PyroGenesis Canada Inc., a world leader in the development manufacturing and commercialization of advanced metallurgical plasma processes. The partnership granted to HPQ a worldwide exclusive right to the usage of the PUREVAP™ Quartz Vaporisation Reactor technology, a patent pending one step proprietary process that uses a plasma arc within a vacuum furnace to produce high purity metallurgical grade silicon and solar grade silicon from high purity quartz. The purpose of the partnership is to transform HPQ Silicon high purity quartz into solar grade silicon metal with a significant added value end product for the company. The one step transformation offers lower operational costs for producing silicon compared to current practice, lower CO<sub>2</sub> emission and the removal of phosphate, potassium, magnesium, zinc calcium and other impurities from the silica.

The Roncevaux project area was initially prospected for its gold potential. Considering the limited exploration carried-out in the area this potential remains untested. In 1992, Prospector M. Beaulieu found and sampled a white quartz vein with a thickness of about 3.60 m outcropping along a small feeder stream to the nearby Roland Creek. This occurrence is now located on claim CDC2407448 part of the Roncevaux project area. Significant gold values were outlined from outcrops samples: (up to 1,51 g/t Au). Core samples from 4 short holes drilled in the structure also returned anomalous Au concentrations of 8,26 g/t Au, 0,58 g/t Au, 0,49 g/t Au and 0,34 g/t Au from unspecified core length. The anomalous gold values are also associated with high As, Sb and Zn analytical values (See Figure 10 and GM 57622).

During his sampling program on the Roncevaux vein in 2002, J.P. Barette PGeo. collected samples for gold whenever sulphide minerals were noted in the vein or its wall rocks. Low values not exceeding 0.20 g/t Au were obtained from few samples (See Figure 10 and GM 60610).

TSX Venture-listed Fancamp Exploration Ltd. holds the title to a group of 6 mineral claims (map designated) to the northeast of the Roncevaux project area (see Figures 3 and 12) which separates HPQ's two claim blocks. This property is host to the Knoble Creek gold occurrence where concentrations of 0.56 to 4.66 g/t Au are reported from three quartz vein spaced 200 m apart striking 280°. The veins are 3.0 to 4.0 m thick and mineralized with pyrite, chalcopyrite, arsenopyrite and galena, (see Figure 12 and GM57165).

The author considers the Roncevaux Quartz Project as a grass root project with significant upside potential to develop into a high purity quartz resource suitable for the production of high value silicon metal applications. The project area also has a potential for primary gold mineralization from related quartz veins outlined with very limited historical prospecting.

It is recommended to carry-on with the evaluation of the potential of the Roncevaux quartz vein system to develop it into a significant orebody that could provide high purity quartz feed to a silicon metal processing plant for many years to come. In order to assess this potential, it is recommended to conduct a two-phase core drilling program to test the down dip and lateral continuity and quality of the quartz vein system in the vicinity of the prospecting trenches and its lateral extensions towards the NE and SW. Furthermore, metallurgical test work should be conducted on the quartz vein samples. based on the results of the first phase of the proposed program HPQ Silicon should follow-up with the second phase metallurgical test work as proposed by PyroGenesis which should also provide significant technical input into the design of a 200 TPD pilot plant which HPQ Silicon intends to commission as soon as feasible.

The first phase of the program should provide the basis for the calculation of a geological resource and cover a minimum of 3 drilling fences, each with

two drill holes oriented at a right angle to the main strike of the vein and a dip to vertically intercept the quartz vein system at 50 m and 100 m below surface on each fence. This drilling should confirm the continuity of the mineralized structure and provide sufficient samples to assess the grade and quality of the vein impurity components. To provide sizable vein samples, large diameter HQ size (63.5 mm) drilling core barrel should be used. Provision should be made to carry the next phase of the metallurgical test work. A budget of \$25,000 is allocated to the prospecting for gold over the entire project area. The budget of the first phase of the proposed geological program for high purity quartz is set at \$275,000.

Should the results of the first phase of drilling succeed in outlining the down dip continuity of the Roncevaux quartz vein system, the second phase of the program should provide for additional core drilling of the target to establish a significant resource estimation in the indicated category. Provision is made for drilling 1,200 m distributed in fences along the orebody. Provision is also provided to conduct a bulk sample for the purpose of metallurgical test work. A budget of \$473,000.00- is proposed for the second phase. The overall program is budgeted at \$748,000.00.

## 2.0 INTRODUCTION

### 2.1 Background, Authorization and Purpose

In early September 2016, Mr. Bernard J. Tourillon, Chairman and CEO of HPQ Silicon Resources Inc., (“HPQ” or “HPQ Silicon” and formerly “Uragold Bay Resources Inc.”) mandated the author to prepare a National Instrument 43-101-compliant technical evaluation report for its Roncevaux Quartz Project host to a high purity quartz vein system. HPQ Silicon is a well-established mineral exploration company active in the Province of Quebec, where it is involved on its own and with various partners, in the acquisition, exploration and development of high purity silica occurrences and gold prospects. Company’s management current objective is to become a vertically integrated producer of silicon metal, solar grade silicon metal and poly-silicon aimed at the solar energy semiconductors and high tech industries, For this purpose, it has assembled a portfolio of mineral properties with prospective high purity quartz occurrences of which the Roncevaux project is the most advanced. (see HPQ Silicon website for other projects).

Since 1979, the author has acquired pertinent experience in the evaluation, prospecting and development of several types of ore occurrences and deposits. For the purpose of this report he has undertaken an independent technical review of the project area and its economic mineral potential in compliance with the Canadian NI 43-101 disclosure standards for mineral projects. The author considers the Roncevaux project as an exploration project of merit.

This report describes the materially significant aspects of the property and recommends an exploration program. The author has reviewed the information available as listed under “References” and presents the summary of the information he deems material to this technical report including all pertinent files available on various websites and the websites of the Ministère de l’Énergie et des Ressources naturelles (MERN) of the Province of Quebec.

The author has verified the land tenure by reliance on copies of the official government records presented in the GESTIM website of the MERN of the Province of Quebec. Some of the technical data presented in this report is derived from historical reports, maps and various studies found on the website of the MERN and companies involved in the business of mineral resources exploration and development. While the author has made every effort to accurately transcribe and convey the contents of these documents, he cannot guarantee their accuracy validity or completeness. The authors of these files and documents are not or were not necessarily qualified persons within the context of NI 43-101 at the time the files were produced.

The author visited the Roncevaux project area on October 2<sup>nd</sup> 2016 and has examined the mineralized quartz vein occurrences as exposed in various exploration trenches and described in the reports referred to herein.

## 2.2 Units

The unit prices for various contractors, laboratory charges, professional fees, etc. as presented in the proposed budget (Section 26) have been researched and are within the going rates for companies active in the various mining areas of the Province of Quebec. The currency unit used is the Canadian Dollar (\$). The Metric System or International System (SI) of units is the primary system of measure and length used in this report.

All the geographical coordinates used in this report are those provided on official maps of the Province of Quebec and given by the local government to locate the permits.

## 2.3 Qualifications of the Author

Mr Benoît M. Violette, P.Geo is a graduate from the University of Ottawa with the degree B.Sc. (Honours) Geology in 1979. Over the last 38 years, he has acquired valuable experience exploring and developing resources for several types of mineral commodities and in all phases of mineral exploration and development in Canada, the USA and in several African countries.

Mr Violette is a member (no. 678) of the “Ordre des Géologues du Québec”, which is an official and government regulated professional association in the Province of Quebec, Canada.

## 3.0 RELIANCE ON OTHER EXPERTS

Land tenure information has been obtained from the records available on the website which provided the official transcripts from the office of the MERN mining registry (See Annex 1). In addition, the existence and validity of any undisclosed agreements between any third parties and HPQ Silicon are not reflected in our review. The consultant has relied on representations by HPQ Silicon management claiming that the company has clear and full ownership of the mineral property hereafter described.

***The author of this Technical Report is not responsible for any omissions in, and does not guarantee, and makes no warranty as to the accuracy of all information received from outside sources. The author has made all reasonable efforts to outline any land tenure or environmental issues relating to the Property and will disclaim all responsibility for missing or inaccurate Property information.***

## **4.0 PROPERTY LOCATION AND DESCRIPTION**

### **4.1 Location**

The Roncevaux Project is located in the Gaspésie Region of the Province of Québec (see Figure 1 and Figure 2) some 700 km east of Montreal and 460 km from Quebec City. It is located on crown land on NTS map sheet 22B/03 (1:50,000 scale).

### **4.2 Tenure Rights**

The Roncevaux project is made-up of 33 map-designated claims covering a total of 1,895,54 ha in 1 block. An initial four claims were staked by the company in early 2014 to cover the main quartz vein occurrence and progressively 29 more claims were added in the year that followed (see Figure 3 and Annex 1). At the time of writing of this report, all the claims were in good standing and are registered under HPQ Silicon Resources Inc.

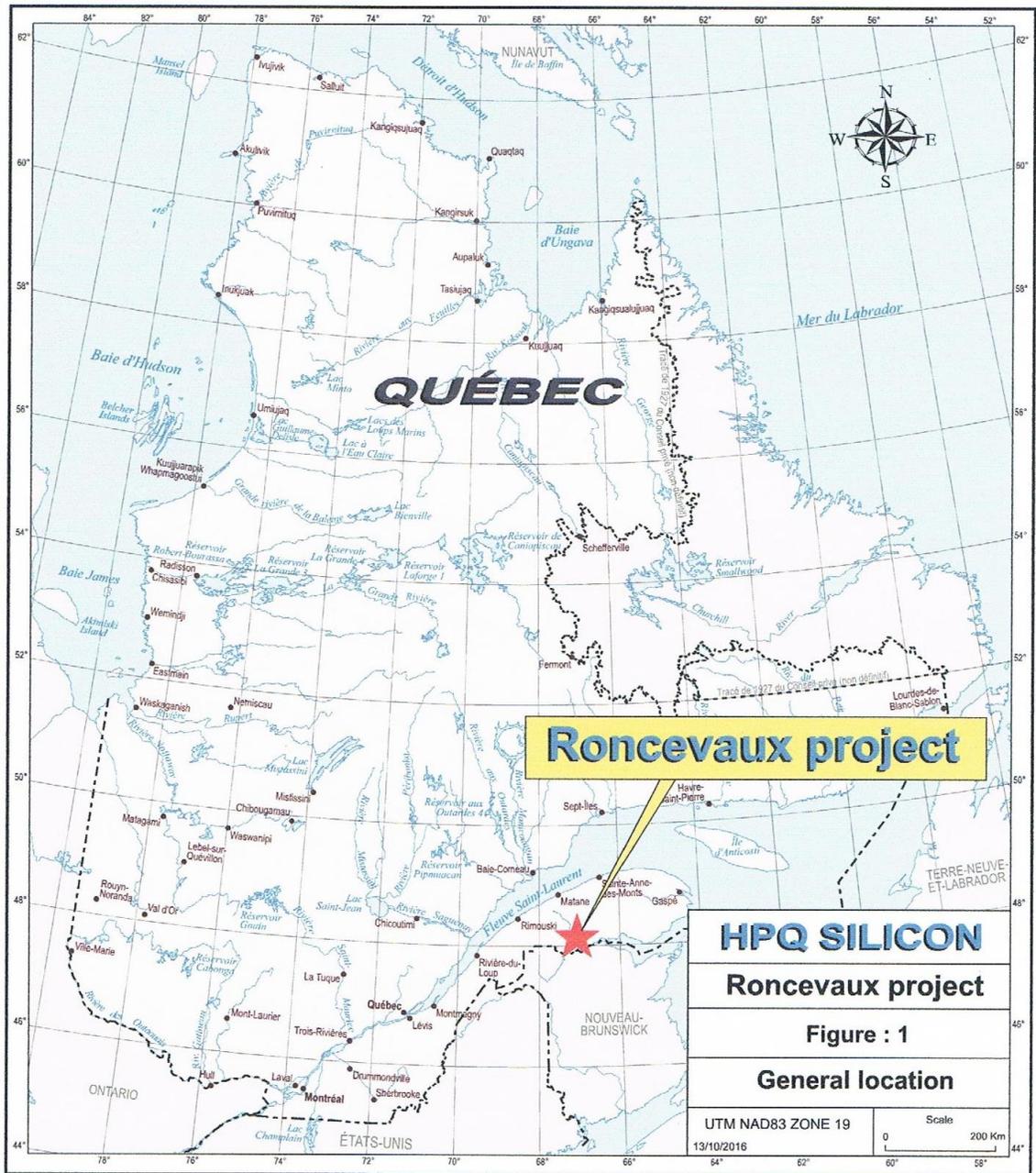
### **4.3 Royalties and related information**

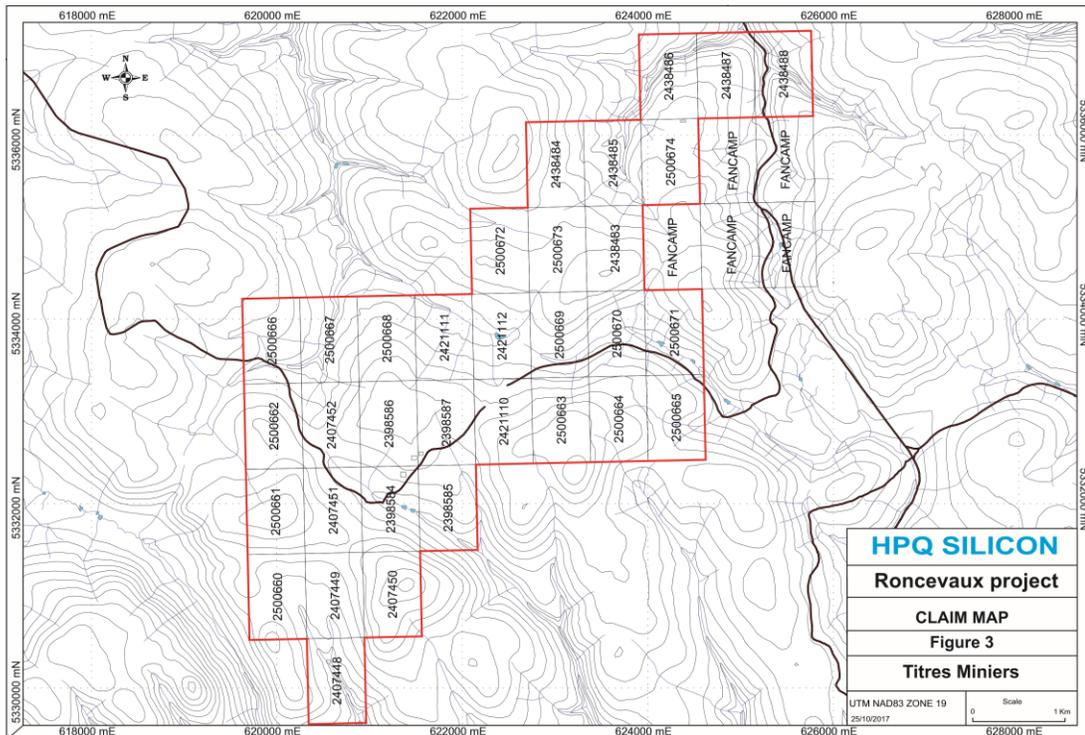
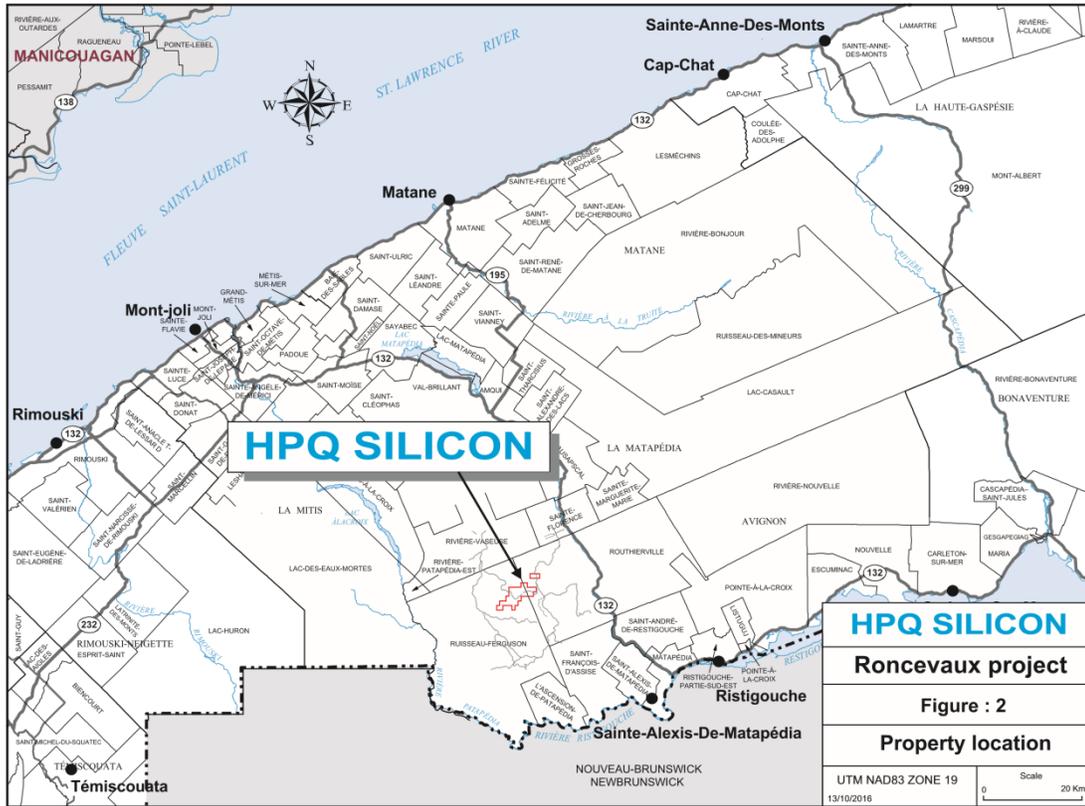
To our knowledge, HPQ Silicon has no financial obligation towards any third party regarding the payment of royalties on the sales and marketing of any commodities eventually mined from the Roncevaux project. However, in the Province of Quebec there are various duties, royalties and taxes that could be payable by private parties holding mining titles. The provincial Mining Code provides for all the taxes, charges, royalties and other fees owed to the Treasury by a mining title owner in respect of his mining activities, to the exclusion of any other form of taxation.

This principle does not, however, prevent the tax agencies from claiming additional taxes. When applicable, the tax provisions of the Mining Code provide a certain guaranty of stability in the event that the Mining Code is amended.

### **4.4 Environmental Liabilities**

There are no known environmental liabilities currently affecting the Roncevaux quartz project.





#### **4.5 Other Relevant Factors**

The author is not aware of any significant factors or risks affecting access, titles or the right or ability to perform work on the project area.

#### **5.0 PHYSIOGRAPHY, ACCESS, CLIMATE, INFRASTRUCTURE AND LOCAL RESOURCES.**

##### **5.1 Physiography**

The Roncevaux Project lies in gently rolling Appalachian terrain. The topography is made-up of hills, mountains, plateaus and broad valleys oriented NW-SE. On the property the relief is relatively abrupt with steep-sided hills with altitudes ranging from 500 to 650 m above sea level in the Notre-Dame range. The creeks and rivers of the area are part of the south-flowing Matapédia River basin that flows into the Baie des Chaleurs.

##### **5.2 Access**

The project area is readily accessible from a network of public and forestry roads travelling southwest from the village Sainte-Florence along Provincial Highway 132 and following the newly improved bush road along range 2 of Matalik township for about 25 km to a crossroad located close to the quartz vein occurrence. (See Figure 4).

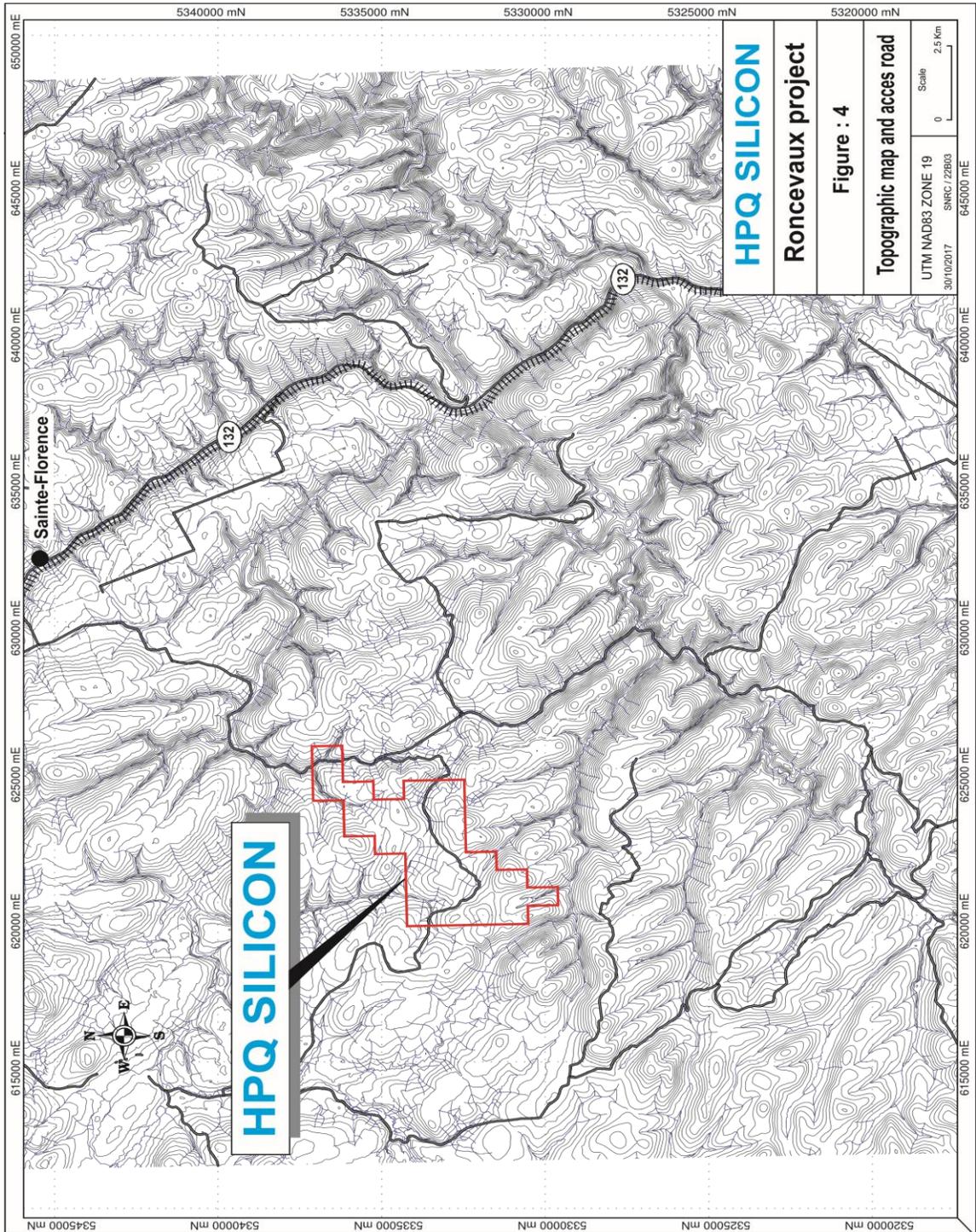
##### **5.3 Climate and Vegetation**

The region surrounding the project area experiences a cool humid continental climate with warm summers and cold winters with July average highs in the 22.7°C range and January highs in the -10°C range. Precipitations are moderate with yearly average in the order of 1,129 mm. The ground is usually covered with snow from late November to mid-April.

The property is largely covered with forest with a mix of hardwood trees including birch, maple and some poplar and conifers such as white pine, spruce and cedar. Locally, there are areas of second and third growth populated with alders and shrubs. Part of the Matapédia River basin, general drainage is towards the south to the Baie des Chaleurs.

##### **5.4 Infrastructure and Local Resources**

There are good infrastructures in the area. Several towns and villages such as Matane, Amqui and Causapsal located to the north of the project area offer modern amenities such as airport, deep sea port, railways, hospitals, lodging and skilled manpower. A Quebec Hydro high voltage power line crosses the property. The active local population lives of farming, forestry, fishing, tourism and public services.



## 6.0 HISTORY/PREVIOUS WORK

The first recorded account of mapping and exploration in the Matapedia River basin area began with the investigation of W.E. Logan in 1844 and his colleague A. Murray in 1846. A.P. Low visited the area in 1884, followed by Ells in 1885, and by L.W. Bailey and W. McInnes in 1884-85, the latter work resulting in the first geological map of the region in 1888. Later, between 1928 to 1931, F.J. Alcock and G.W. Crickney surveyed the area as part of a large regional mapping effort. Following up in 1953, E. Aubert and de la Rue published a general geological map of the Matapedia-Matane region. In 1953, H.W. McGarrigle completed a geological survey as part of a compilation of the geological map of the Gaspé Peninsula. The most comprehensive geological mapping is the synthesis of the area into the Gaspé regional geology completed by Slivitsky et al (1991). Stratigraphy was reinterpreted and integrated into the Appalachian Geology by Brisebois and Morin (2003).

The first known account of exploration work carried-out on the Roncevaux quartz vein was reported by prospector Marc-Yvan Beaulieu in his 1992 report (GM 57622) on the prospecting of the Knoble gold prospect located about 3,0 km to the northeast of the Roncevaux quartz occurrence. While looking for signs of mineralization, Beaulieu came across a boulder field filled with blocks of white quartz mixed-in the glacial drift. Detailed prospecting, trenching and shallow drilling were completed on the zone in the following weeks. The vein was uncovered and sampled in two trenches. Where exposed, the vein appeared oriented at 245° and with apparent thickness between 3.0 and 12.0 m. Four analysed samples averaged 99,932% SiO<sub>2</sub>.

In 2002, geologist Jean-Paul Barrette completed an extensive prospecting program to better understand the geology and economic potential of the Roncevaux vein. The work program was carried-out on behalf of J.M. Marin and J.Y. Lavoie, the two local prospectors holding the mineral claims to Roncevaux at the time. The field activities consisted of prospecting geological mapping the excavation of five trenches and sampling across the quartz vein (see GM60610).

The original trench by prospector M.Y. Beaulieu in 1992 was cleaned-up and three additional trenches were excavated to the east and two to the west oriented parallel to the original one. Oriented at 310° and paced 50 to 75 m apart, the trenches exposed the vein system for a strike length of over 340 m.

The quartz vein mapped in the trenches is milky white and varies in width between 3.0 to 12.0 m (between TR-1 and TR-2). The thickening of the vein is most probably caused by folding and/or faulting. About 30 cm of the footwall and hanging walls of the structure are brecciated with wall rock clasts making up to 20% of the vein.

In the other trenches the vein narrows down splays and carries a larger percentage of wall rock fragments. A tectonic breccia is mapped near the contact

with the vein. The clast-rich portion of the vein is considered as being part of the wall rock and is not considered potential vein material as such.

The host rock to the vein system is a quartz arenite and conglomerate sequence interbedded with pelitic mudstones. The rocks are showing a penetrative schistosity and are folded and faulted with axis parallel to the contact (218-250°/45-85°). The wall rocks are friable and exhibit carbonate alteration.

Analytical results from 14 selected chips and channel (in Tr-2) samples are showing content ranging between 99.03% to 99.36% SiO<sub>2</sub>. The samples are 2 to 3 m long and all show some impurities such as traces of chlorite and hematite stains. Combined major oxide concentration and LOI show concentrations of 0.60% to 0.86%: Fe<sub>2</sub>O<sub>3</sub>, MgO and the highest concentration being Al<sub>2</sub>O<sub>3</sub> confirming the contaminated nature of the contact zones. Furthermore, 17 samples collected from the vein and surrounding host rocks were analysed for gold. Only three returned significant anomalous concentrations of 38, 121 and 201 ppb Au associated with the presence of pyrite in the vein.

Based on the exposed strike length (340 m) and a varying width between 3 and 12 m of the vein, geologist J.P. Barrette, estimated a geological resource of 414,700 Mt carrying a grade of 99.2% SiO<sub>2</sub> down to a presumed vertical continuity of the vein to -50 m. (Note: this resource is historic in nature and does not meet the requirements for resource categorization as set out in NI43-101 regulation).

J.P. Barrette concludes that it is possible that the Roncevaux quartz vein may extend laterally along strike and down-dip and could be part of a network of similar parallel veins. According to his understanding of the high purity quartz market, the Roncevaux vein would be of sufficient quality to satisfy the ferro-silicon, the silicon carbide and the thermal fiberglass markets but does not meet the minimum quality requirement for the production of silicon metal set at a minimum of 99.5% SiO<sub>2</sub> content in 2004.

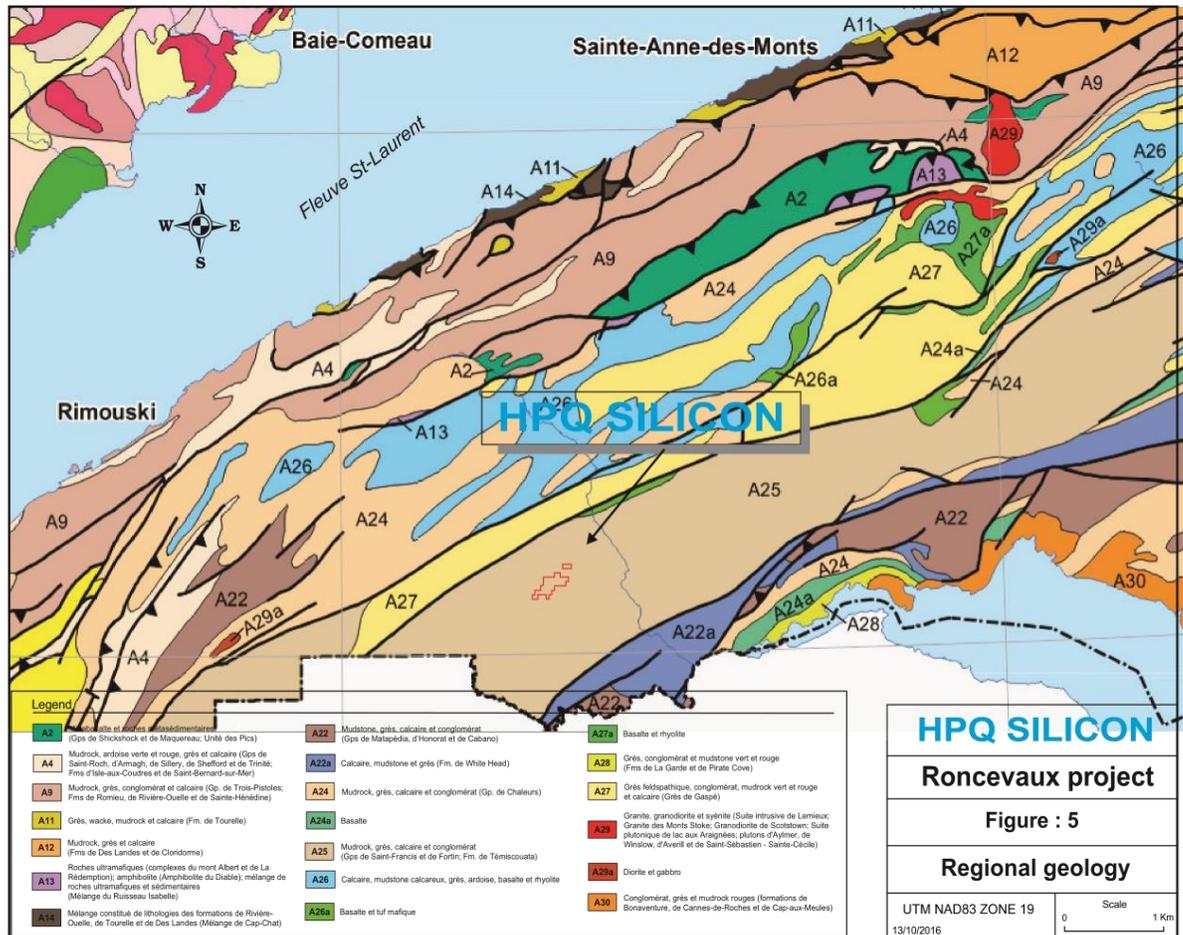
## **7.0 GEOLOGICAL SETTING AND MINERALIZATION**

### **7.1 Regional Geology**

The Roncevaux Project area lies within the Gaspé Peninsula, a major component of the Appalachian Geological Province that stretches from Alabama in the southeast USA to Newfoundland. The Gaspé Peninsula is composed of three tectonostratigraphic domains: (1) In its northern portion, rocks of the Hunber and Dunnage zones (Cambro-Ordovician) have been deformed during the Middle to Late Ordovician by the Taconic Orogeny and during the Middle Devonian by the Acadian Orogeny; (2) The rocks aged between 461,0 to 398,0 Ma from the Upper Ordovician to Devonian are in faulted contact (Shickshock South Fault) with the earlier sequences of Cambro-Ordovician age and have been deformed during the Acadian Orogeny during the Middle Devonian; (3) The rock formations deposited between the Late Devonian and the Carboniferous are in discordant contact with

the earlier domains and were deformed by the Alleghenian Orogeny during the Late Pennsylvanian-Permian Period. (See Figure 5), (d’Hulst, 2007).

The Gaspé Belt is divided in three major structural zones from north to south: the Connecticut Valley-Gaspé Synclinorium, the Aroostook-Percé Anticlinorium and the Baie des Chaleurs Synclinorium. The belt is preserved in four distinct rock groups presented in the following younging sequence: (1) Late Ordovician to Basal Silurian Honorat and Matapédia Groups composed of fine grain deep sea facies carbonaceous and silico-clastic sequences; (2)



Silurian to early Devonian shallow platform carbonaceous facies sequences of the Chaleurs Group covered by (3) Lower Devonian (416 to 398 Ma) deep carbonaceous platform and basin facies of the Upper Limestone Gaspé Group themselves covered by (4) Lower to Middle Devonian (416 to 385 Ma) coastal facies of the Gaspé Sandstone Group. Only the Upper sequences of the Upper Silurian age Matapédia Group are found in the two synclinoriums bordering the Aroostook-Percé Anticlinorium. The Lower Devonian units of the limestone groups and the Gaspé Sandstones are missing in the Baie des Chaleurs Synclinorium. Including the Upper units of the Matapédia Group all four assemblages are preserved in the Connecticut Valley-Gaspé Synclinorium. The siliceous clastic of

the Fortin Group (Upper Devonian) deposited in a narrow and deep trough oriented NE-SW represent lateral facies change of the Upper Limestone and the York Lake Formation part of the Gaspé Sandstones and are host to the Roncevaux quartz vein occurrence.

Three major unconformities are recognised in the stratigraphic sequences of the Gaspé Fold Belt: (1) The Taconic unconformity is related to the deposition of the rocks of the Gaspé Belt following the Taconic orogeny during the Late Ordovician; (2) The Salinic unconformity is angular and/or erosional of Late Silurian age and is related to the Salinic pulse; (3) The Acadian unconformity follows the Acadian Orogeny during the Middle Devonian. It is identified as an angular unconformity that brings in contact the Carboniferous sequences resting on the older sequences of the Cambrian, Ordovician, Silurian and Devonian in the south of the Gaspésie region.

The structure of the Gaspésie Belt is made-up of three tectonic zones related to NE trending Acadian regional folding. The Aroostook-Percé Anticlinorium and both the Connecticut Valley-Gaspé and the Baie des Chaleurs Synclinoriums are characterized by secondary folding of variable wavelengths and a foliation of varying intensity depending on the zone. These three zones are bounded by faults of regional extent (Shickshock-South Fault and the Sainte-Florence Fault) or are cut by faults (Grand Pabos Fault). Most of the regional faults exhibit early right lateral strike slip displacements but the Acadian deformation is also associated with compressive structures where tight folding and the faults exhibit strike slip movement with an average 30° angle with the regional faults. This portion of the Appalachian is the result of a NW-SE compression caused by an angular convergence during the Acadian Orogeny (D'Hulst, 2007).

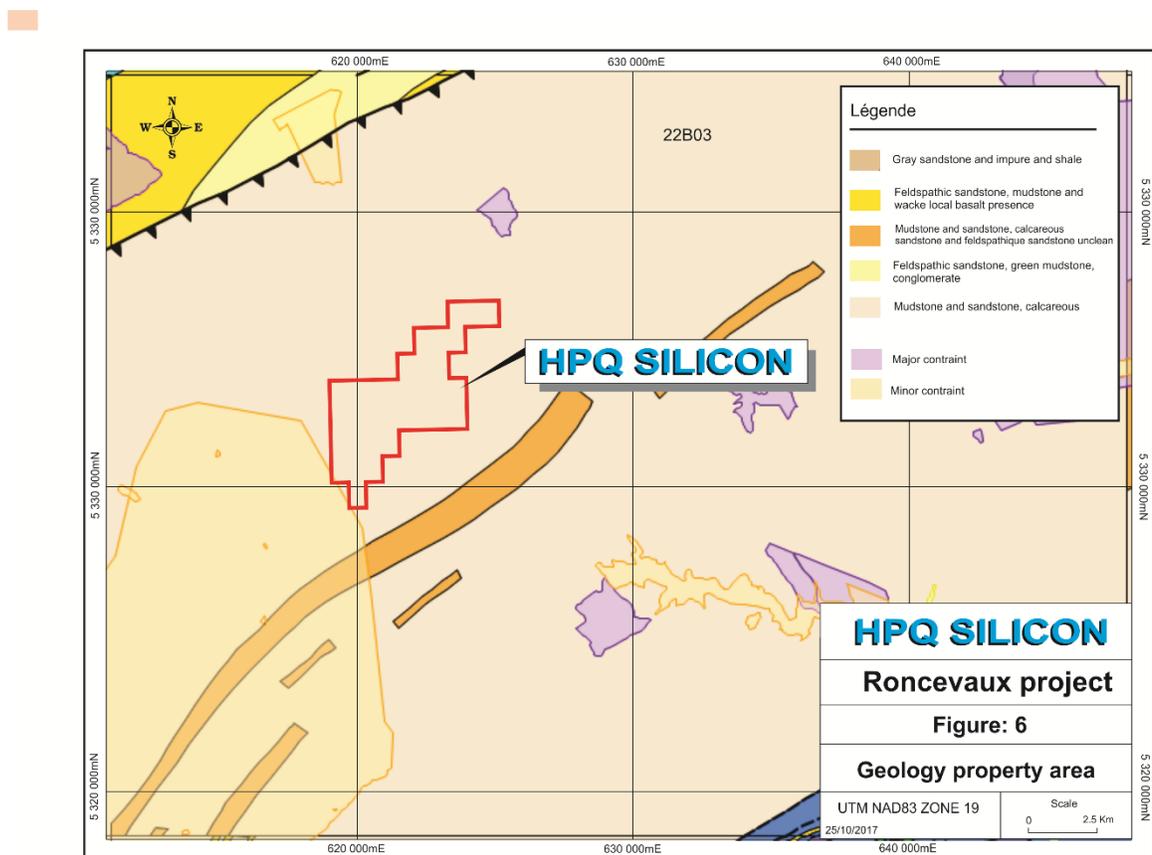
Intense magmatic activity during the Silurian-Devonian period has resulted in the formation of several volcanic centers and intrusions. The volcanic systems are composed of mafic to felsic lavas of continental affinities with local arc signature. They are host to various types of mineralization including epithermal. Several intrusive bodies of intermediate to felsic compositions are found throughout the region and some are related to significant metallic mineralization such as the rhyodacitic and monzonitic plutons of the Porphyry Mountain and Gaspé Copper mine.

## **7.2 Geology of the Project Area and Mineralization**

There is no official detailed geological map available specific to the Roncevaux Project area. The property lies within the southern domain in the central portion of the Connecticut Valley-Gaspé synclinorium. It is bounded to the north by the Shickshock-South fault and to the south by the Restigouche fault. This basin is filled with fine to very coarse grained siliciclastic rocks, various types of limestones, felsic to mafic volcanic and intrusive rocks. The northern domain is occupied by the Upper Gaspé Limestones, platformal limestones lacking penetrative cleavage and the southern domain occupied by the Fortin Group, a thick sequence of tightly

folded clay belt (flysch sequence). The project is located about 8.0 km to the SE of the Ste-Florence fault zone, which defines the contact between the two formations (See Figure 6).

The rocks of the Roncevaux vein area belongs to the Fortin Group and the few outcrops visited by the INRS-ETE technical team in September 2015 were made-up of sandstones and siltstones with lesser units of shales and mudstones. The rocks are folded, faulted and fractured. Bedding (So) appears sub-vertical (85°) with an average strike of N231°. Foliation S1 is well developed in the shales and mudstones and dips 66° to the NW along a strike averaging N228°. Well developed and tight fracture networks are exposed in the trenches. A first group has a similar attitude to S<sub>1</sub> while a second group runs NW83° with a sub-vertical dip and a third group with variable dips runs N175°.



Data from mapping of the trenches and resistivity survey (discussed in Section 9 of this report) revealed that the polyphase quartz vein was injected along a faulted contact between a siltstone- and sandstone-rich sequence on the NW hanging wall and a more argillaceous- and mudstone-rich sequence to the SE footwall. The vein system averages about 8,0 m in thickness comprising a narrow footwall (0,35 m to 1.5 m) contact zone containing brecciated wall rock fragments. Due to a thicker overburden the hanging wall contact was only visible in trench VI

where it exhibits similar features as the footwall contact zone. The middle portion of the structure reveals high purity white quartz vein with an apparent thickness of not less than 4.5 m (in trench I) and 8.0 m (in trench VI) (see Figure 7 and Figure 8).

## 8.0 DEPOSIT TYPE

Quartz is one of the most common mineral of the Earth's crust and quartz veins of all sizes are common in a wide range of tectonic and hydrothermal settings but very few of these vein occurrences can qualify as having high purity quartz content of economic interest. High purity quartz is defined as vein material that has SiO<sub>2</sub> concentration in the 99.995% range with a very low tolerance for impurities where the most determinant factor is to establish the make-up the other 0.005%. *“Specific expertise in geology, chemical analysis and high purity processing is required to convert raw quartz into a high-value final product. Depending on the geological setting, fluids and/or mineral inclusions need to be removed by applying tailor-made technology. Remnant hydrothermal fluids from which quartz was formed and many different minerals inclusions occur in raw quartz such as iron oxides, phosphates, and heavy minerals” (Dorfner Azaplan website).*

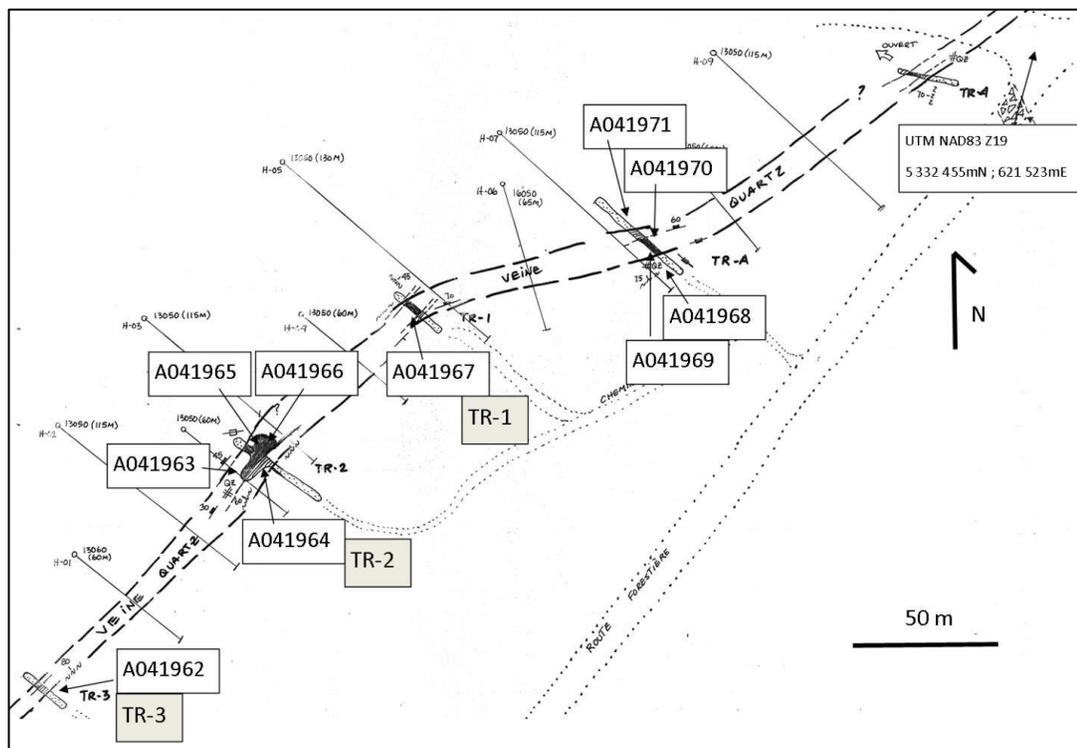
Depending on the final quality and value processing of raw quartz into high purity quartz involves advance comminution technology together with physical thermal and chemical steps. Comminution reduces raw quartz to liberate the mineral impurities and to reach the required product size. Further physical and chemical steps are needed to separate or dissolve the impurities.

Today, US based Unimin Corp./Sibelco is the most significant worldwide producer of high purity quartz from pegmatite deposits in North Carolina, USA. Another important supplier is Norwegian Crystallites which has been producing high purity quartz from its Drag facilities in western Norway and from several underground and open pit mines since mid-1996 when the company changed ownership.

## 9.0 EXPLORATION

### 9.1 Trench Sampling

To date, field exploration by HPQ Silicon (or Uragold Bay) has been limited to the prospecting of the area known quartz vein occurrence. In June 2014, Uragold Bay Resources mandated Acton Vale-based consulting geologist, Steven Lauzier to complete a sampling program over the historical quartz occurrences on the Roncevaux claims. Once in the field the sampling crew located the six trenches excavated by Barrette in 2002 but was unable to collect representative samples directly from the bedrock since all the trenches were filled with loose debris and vegetation. Nevertheless, ten representative samples of white quartz were collected from stockpiles and dumps found on the side of the trenches and left behind following the sampling program completed by geologist J.P. Barrette. Eventually they were sent to the INRS Laboratory in Quebec City for processing, (see Steven Lauzier 2014 and Figure xxx for sample location, 2014 and Annex 2 for sample listing).

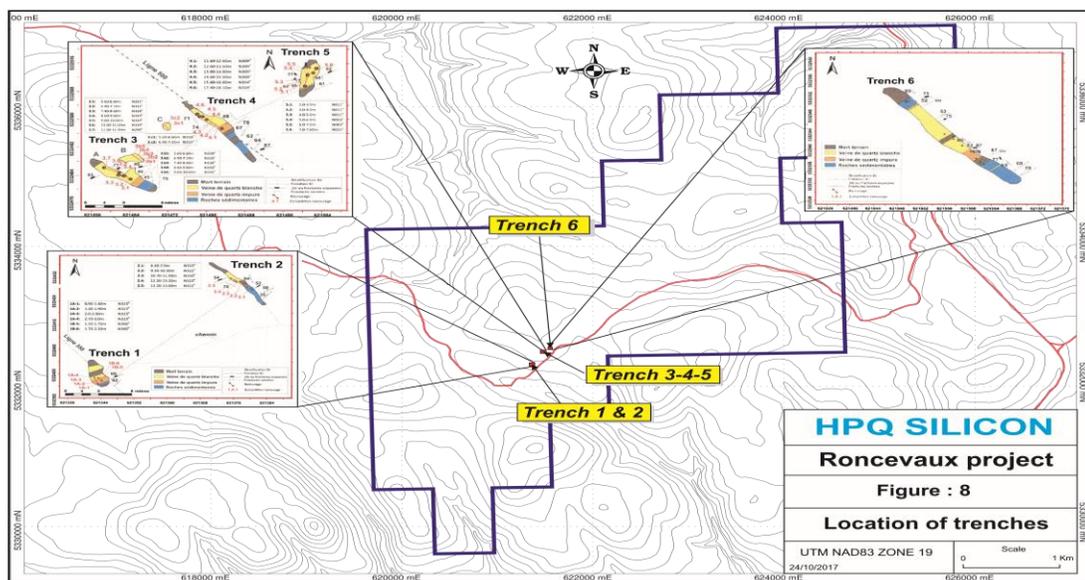


**Figure 7 : Roncevaux Quartz Vein Sampling by S. Lauzier (2014)**

The last field work on the Roncevaux Project was also completed on behalf of Uragold Bay Resources in the fall of 2015, by the ETE (“Eau, Terre, Environnement”) division of the INRS (“Institut National de Recherche Scientifique”), based in Quebec City. The INRS is a Centre for Graduate Studies

dedicated to fundamental and applied research, graduate studies and training of researchers out of its four facilities, three of which are located in the Greater Montreal area in addition to the Quebec City campus. The ETE division is concerned with water, natural resources and the environment. Under the supervision of senior research geologist Marc Richer-LaFlèche, PhD., a technical team completed a detailed geological, geochemical and geophysical survey program centred around the trenched section of the Roncevaux quartz vein.

A reference grid comprising 12 lines spaced 50 m apart was established to cover the area of the trenches and extended 300 m towards the west to cover the possible extension of the Roncevaux vein along strike. Of the historic excavation, four trenches (II, III, V and VI) were thoroughly cleaned mechanically and two new trenches (I and IV) were excavated. At the bottom of each trench, narrow channel (5.0 cm) samples were taken from all the silica- rich rock exposures. A total of 35 composite samples were collected and sent to the certified laboratory facility of the INRS-ETE Centre in Quebec City. They were analysed along with the 10 samples collected by Steven Lauzier, P. Geo., during his June 2014 quartz stockpile sampling program. Geological maps and samples collected from the trenches by the INRS are presented in the following figures and tables.



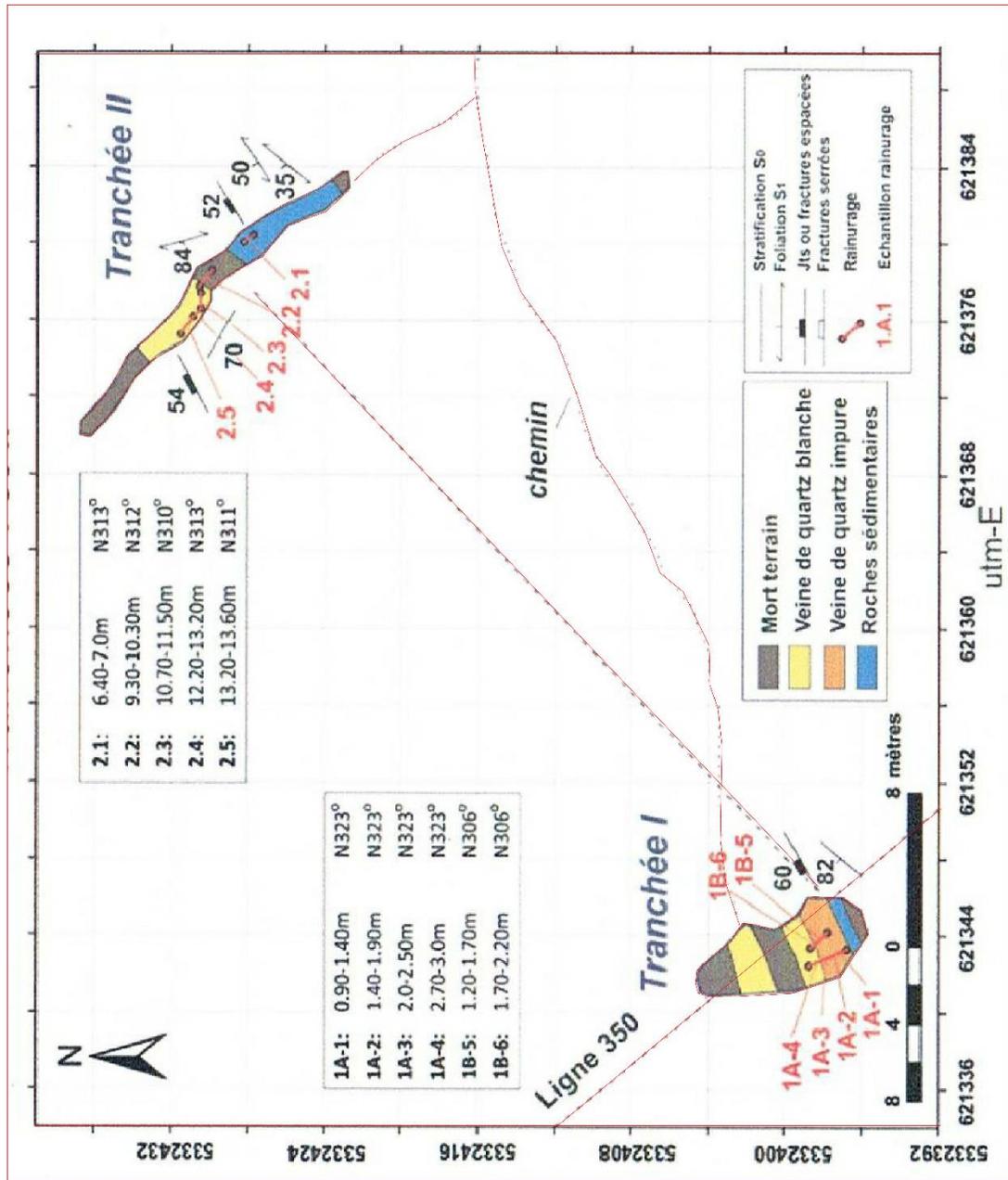


Figure 9: Geology and Samples from Trenches I and II

**Table 1: . Analytical Results of the Trench I Channel Samples**

<b>No terrain</b>	<b>1.A.1</b>	<b>1.A.2</b>	<b>1.A.3</b>	<b>1.A.4</b>	<b>1.B.5</b>	<b>1.B.6</b>
No labo INRS	16-620	16-615	16-610	16-611	16-624	16-621
SiO <sub>2</sub> (% pds)	98.00	77.20	100.00	99.00	95.00	96.00
TiO <sub>2</sub> (% pds)	0.07	0.48	0.01	0.01	0.07	0.11
Al <sub>2</sub> O <sub>3</sub> (% pds)	1.44	10.50	0.36	0.35	2.16	1.81
Fe <sub>2</sub> O <sub>3</sub> (% pds)	0.89	3.94	0.19	0.19	0.75	0.97
MnO (% pds)	0.01	0.03	0.01	0.01	0.02	0.01
MgO (% pds)	0.13	0.99	0.01	0.01	0.09	0.18
CaO (% pds)	< 0.0011	0.04	0.40	0.39	0.01	0.02
Na <sub>2</sub> O (% pds)	0.25	0.56	0.34	0.31	0.32	0.20
K <sub>2</sub> O (% pds)	0.36	2.40	0.09	0.08	0.55	0.45
P <sub>2</sub> O <sub>5</sub> (% pds)	0.01	0.06	0.27	0.28	0.02	0.02
Soufre (% pds)	< 0.007	0.01	0.01	< 0.006	< 0.007	< 0.006
Ba (ppm)	34	326	5	6	58	54
Cd (ppm)	< 3	< 2.7	< 3	< 3	< 3	< 3
Co (ppm)	< 7	6	< 7	< 6	< 7	< 6
Cr (ppm)	38	87	25	30	39	65
Cu (ppm)	40	45	< 10	< 9	40	18
La (ppm)	3	18	4	< 3	< 3	4
Sc (ppm)	1	10	1	1	2	2
V (ppm)	10	95	< 7	< 6	20	17
Zn (ppm)	55	124	< 10	< 9	76	30
Zr (ppm)	20	142	< 2.4	2	18	31

**Table 2: . Analytical Results of the Trench II Channel Samples**

No terrain	2.1	2.2	2.3	2.4	2.5
No labo INRS	16-613	16-609	16-622	16-619	16-612
SiO <sub>2</sub> (% pds)	78.70	93.00	100.00	98.00	92.00
TiO <sub>2</sub> (% pds)	0.54	0.23	0.01	0.02	0.16
Al <sub>2</sub> O <sub>3</sub> (% pds)	9.80	2.85	0.26	0.16	4.02
Fe <sub>2</sub> O <sub>3</sub> (% pds)	3.56	1.20	0.12	0.08	1.81
MnO (% pds)	0.03	0.01	0.00	0.00	0.03
MgO (% pds)	1.05	0.20	0.01	0.00	0.15
CaO (% pds)	0.13	0.03	0.04	< 0.0009	0.01
Na <sub>2</sub> O (% pds)	2.90	0.41	0.18	0.18	0.68
K <sub>2</sub> O (% pds)	1.02	0.72	0.11	0.07	0.91
P <sub>2</sub> O <sub>5</sub> (% pds)	0.10	0.04	0.03	< 0.01	0.03
Soufre (% pds)	< 0.007	< 0.007	< 0.006	< 0.006	< 0.007
Ba (ppm)	157	87	7	2	110
Cd (ppm)	< 3	< 3	< 2.5	< 2.4	< 3
Co (ppm)	10	< 7	< 6	< 6	< 7
Cr (ppm)	99	53	15	21	55
Cu (ppm)	< 9	56	< 8	< 8	< 10
La (ppm)	22	6	< 2.5	< 2.4	5
Sc (ppm)	9	4	< 0.5	< 0.5	5
V (ppm)	84	30	< 6	< 6	30
Zn (ppm)	51	22	9	< 8	18
Zr (ppm)	167	83	< 2.2	4	49

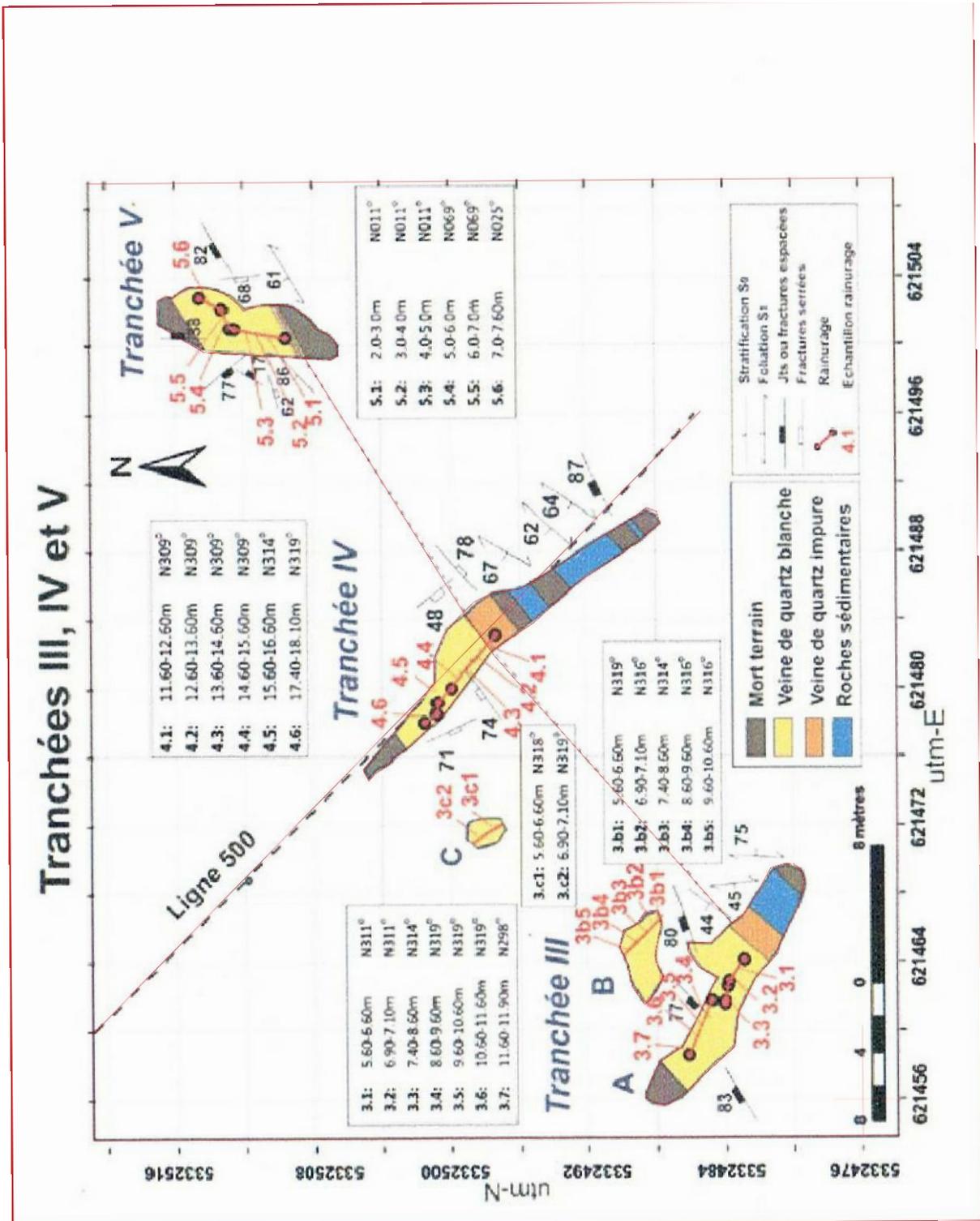


Figure 10: Geology and Samples of Trenches III, IV and V

**Table 3: . Analytical Results of the Trench 3 Channel Samples**

<b>No terrain</b>	<b>3.1</b>	<b>3.2</b>	<b>3.3</b>	<b>3.5</b>	<b>3.6</b>	<b>3.7</b>
No labo INRS	16-626	16-618	16-617	16-616	16-632	16-623
SiO <sub>2</sub> (% pds)	94.00	97.00	100.00	98.00	97.00	101.00
TiO <sub>2</sub> (% pds)	0.01	0.06	0.01	0.05	0.06	0.00
Al <sub>2</sub> O <sub>3</sub> (% pds)	0.15	1.12	0.23	0.70	1.61	0.10
Fe <sub>2</sub> O <sub>3</sub> (% pds)	0.10	0.81	0.11	0.24	0.59	0.05
MnO (% pds)	0.00	0.00	0.00	0.00	0.01	0.00
MgO (% pds)	0.01	0.15	0.01	0.03	0.03	0.00
CaO (% pds)	0.02	0.01	0.01	0.00	0.00	< 0.001
Na <sub>2</sub> O (% pds)	0.11	0.33	0.22	0.26	0.57	0.15
K <sub>2</sub> O (% pds)	0.06	0.20	0.11	0.21	0.27	< 0.05
P <sub>2</sub> O <sub>5</sub> (% pds)	0.02	< 0.012	0.01	< 0.013	< 0.012	< 0.011
Soufre (% pds)	< 0.005	< 0.007	< 0.006	< 0.007	< 0.007	0.01
Ba (ppm)	3	17	4	17	22	2
Cd (ppm)	< 2.2	< 3	< 2.7	< 3	< 3	< 2.7
Co (ppm)	< 5	< 7	< 6	< 7	< 7	< 6
Cr (ppm)	47	25	17	30	65	41
Cu (ppm)	< 7	27	< 9	20	13	< 9
La (ppm)	< 2.2	3	< 2.7	< 3	< 3	< 2.7
Sc (ppm)	< 0.4	1	< 0.5	1	1	< 0.5
V (ppm)	< 5	10	< 6	9	10	< 6
Zn (ppm)	< 7	13	16	< 10	12	< 9
Zr (ppm)	< 1.8	14	< 2.3	17	16	< 2.3

**Table 4: . Analytical Results of the Trench IV Channel Samples**

No terrain	4.1.A	4.1.6	4.2	4.3	4.4	4.5	4.6
No labo INRS	16-638	16-628	16-629	16-643	16-639	16-642	16-641
SiO <sub>2</sub> (% pds)	96.00	75.90	99.00	98.00	98.00	96.00	97.00
TiO <sub>2</sub> (% pds)	0.06	0.63	0.00	0.00	0.01	0.06	0.06
Al <sub>2</sub> O <sub>3</sub> (% pds)	0.67	10.70	0.08	0.02	0.17	1.46	1.24
Fe <sub>2</sub> O <sub>3</sub> (% pds)	0.33	3.87	0.07	0.01	0.05	0.37	0.29
MnO (% pds)	0.01	0.03	0.00	< 0.0001	< 0.0001	0.01	0.00
MgO (% pds)	0.04	1.02	0.00	< 0.0001	0.00	0.03	0.03
CaO (% pds)	0.03	0.10	0.00	< 0.0008	< 0.001	0.01	0.01
Na <sub>2</sub> O (% pds)	0.13	2.00	0.12	0.08	0.12	0.60	0.37
K <sub>2</sub> O (% pds)	0.19	1.73	0.08	0.04	0.08	0.19	0.26
P <sub>2</sub> O <sub>5</sub> (% pds)	0.02	0.10	< 0.011	< 0.009	< 0.011	< 0.012	0.01
Soufre (% pds)	< 0.006	< 0.007	< 0.006	< 0.005	< 0.006	0.01	< 0.006
Ba (ppm)	18	252	2	< 0.3	3	18	24
Cd (ppm)	< 2.5	< 3	< 2.6	< 2.1	< 2.5	< 3	< 2.6
Co (ppm)	< 6	10	< 6	< 5	< 6	< 7	< 6
Cr (ppm)	30	118	23	17	19	51	39
Cu (ppm)	10	12	< 9	9	< 8	11	< 9
La (ppm)	< 2.5	27	< 2.6	< 2.1	< 2.5	< 3	4
Sc (ppm)	1	10	< 0.5	< 0.4	< 0.5	1	1
V (ppm)	< 6	94	< 6	< 5	< 6	< 7	< 6
Zn (ppm)	23	53	< 9	< 7	< 8	40	25
Zr (ppm)	14	190	< 2.2	< 1.8	< 2.2	18	17

**Table 5: . Analytical Results of the Trench V Channel Samples**

No terrain	5.1	5.3	5.4	5.5	5.6
No labo INRS	16-634	16-649	16-635	16-636	16-654
SiO <sub>2</sub> (% pds)	86.70	100.00	99.00	97.00	100.00
TiO <sub>2</sub> (% pds)	0.30	0.00	0.00	0.00	0.00
Al <sub>2</sub> O <sub>3</sub> (% pds)	5.35	0.04	0.15	0.15	0.11
Fe <sub>2</sub> O <sub>3</sub> (% pds)	1.99	0.02	0.06	0.13	0.08
MnO (% pds)	0.03	0.00	0.00	0.00	0.00
MgO (% pds)	0.27	0.00	0.00	0.01	0.00
CaO (% pds)	0.03	< 0.001	< 0.0011	< 0.0009	< 0.001
Na <sub>2</sub> O (% pds)	0.93	0.11	0.11	0.11	0.08
K <sub>2</sub> O (% pds)	0.98	0.05	0.07	0.07	0.08
P <sub>2</sub> O <sub>5</sub> (% pds)	0.05	< 0.012	< 0.012	< 0.011	< 0.011
Soufre (% pds)	< 0.007	< 0.006	< 0.007	< 0.006	0.01
Ba (ppm)	126	1	2	3	2
Cd (ppm)	< 3	< 3	< 3	< 2.5	< 2.6
Co (ppm)	8	< 6	< 7	< 6	< 6
Cr (ppm)	96	12	39	32	30
Cu (ppm)	20	< 9	< 9	< 8	< 9
La (ppm)	14	< 3	< 3	< 2.5	< 2.6
Sc (ppm)	5	< 0.5	< 0.5	< 0.5	< 0.5
V (ppm)	45	< 6	< 7	< 6	< 6
Zn (ppm)	25	< 9	13	< 8	11
Zr (ppm)	102	< 2.3	< 2.4	< 2.1	< 2.2

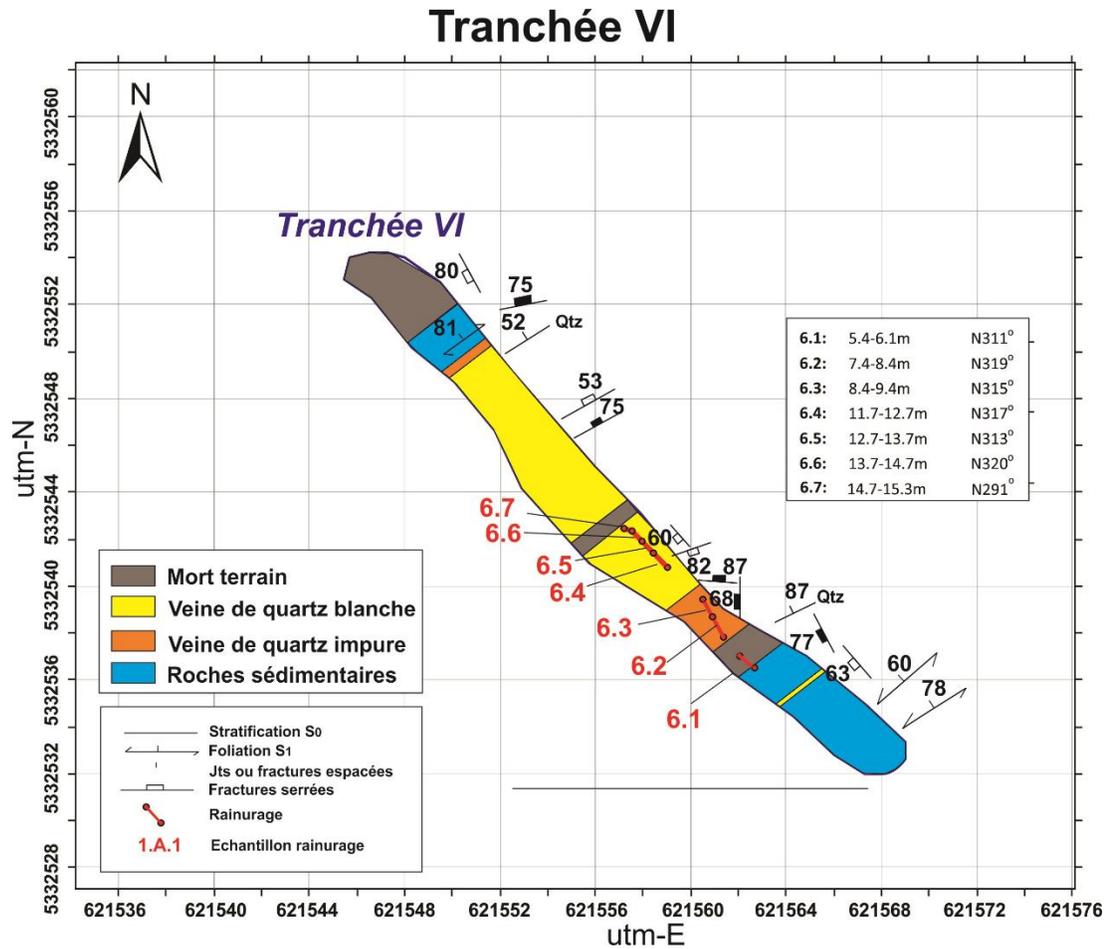


Figure 11: Geology and Samples of Trench VI

Table 6: . Analytical Results of the Trench VI Channel Samples

No terrain	6.1	6.2	6.3	6.4	6.5	6.6	6.7
No labo INRS	16-653	16-652	16-647	16-645	16-648	16-651	16-644
SiO <sub>2</sub> (% pds)	99.00	99.00	99.00	99.00	98.00	99.00	97.00
TiO <sub>2</sub> (% pds)	0.00	0.01	0.00	0.02	0.02	0.01	0.04
Al <sub>2</sub> O <sub>3</sub> (% pds)	0.11	0.11	0.10	0.33	0.64	0.14	0.74
Fe <sub>2</sub> O <sub>3</sub> (% pds)	0.05	0.04	0.05	0.14	0.21	0.09	0.54
MnO (% pds)	0.00	0.00	0.00	0.00	0.00	0.00	0.01
MgO (% pds)	0.00	0.00	0.00	0.01	0.01	0.01	0.10
CaO (% pds)	< 0.001	< 0.001	0.0008	0.01	0.0009	0.0011	0.00
Na <sub>2</sub> O (% pds)	0.10	0.09	0.08	0.16	0.29	0.07	0.08

K <sub>2</sub> O (% pds)	0.07	0.08	0.07	0.09	0.10	0.10	0.20
P <sub>2</sub> O <sub>5</sub> (% pds)	< 0.011	< 0.011	< 0.009	< 0.013	< 0.011	< 0.013	< 0.012
Soufre (% pds)	< 0.006	0.01	< 0.005	< 0.007	< 0.006	< 0.007	< 0.006
Ba (ppm)	3	5	3	4	8	4	18
Cd (ppm)	< 2.6	< 2.6	< 2.2	< 3	< 2.5	< 3	< 3
Co (ppm)	< 6	< 6	< 5	< 7	< 6	< 7	< 6
Cr (ppm)	30	18	51	16	15	30	27
Cu (ppm)	< 9	10	7	< 10	< 8	< 10	< 9
La (ppm)	< 2.6	< 2.6	< 2.2	< 3	< 2.5	< 3	< 3
Sc (ppm)	< 0.5	< 0.5	< 0.4	< 0.6	1	< 0.6	1
V (ppm)	< 6	< 6	< 5	< 7	< 6	< 7	< 6
Zn (ppm)	< 9	9	< 7	19	10	30	18
Zr (ppm)	< 2.2	< 2.3	< 1.9	< 2.6	4	< 2.5	5

The analytical results revealed that the SiO<sub>2</sub> content varies across the width of the vein system with the lowest concentrations in the contact zones of the foot and hanging walls where wall rock and brecciated fragments of sedimentary rocks have most likely contaminated the intruding silica melt. Low silica values 92.0% (sample 2.5) to 96.0% (sample 1.B.6) SiO<sub>2</sub> are compensated with other higher major oxide content, notably Al<sub>2</sub>O<sub>3</sub> (4.02%) and Fe<sub>2</sub>O<sub>3</sub> (1.81%) and other oxides (TiO<sub>2</sub>, Fe<sub>2</sub>O<sub>3</sub>, MnO, MgO, CaO, Na<sub>2</sub>O, K<sub>2</sub>O, P<sub>2</sub>O<sub>5</sub>, and S). Minor chemical species (Ba, Cd, Co, Cr, Cu, La, Sn, V, Zn and Zr ppm) also exhibit higher concentrations in the contact zone rich in host rock breccia fragments. The central portion of the vein network shows characteristics of high purity quartz with SiO<sub>2</sub> content averaging +99.00% over the entire width of the massive body and with the sum of the other major oxides at less than 1.00% by weight.

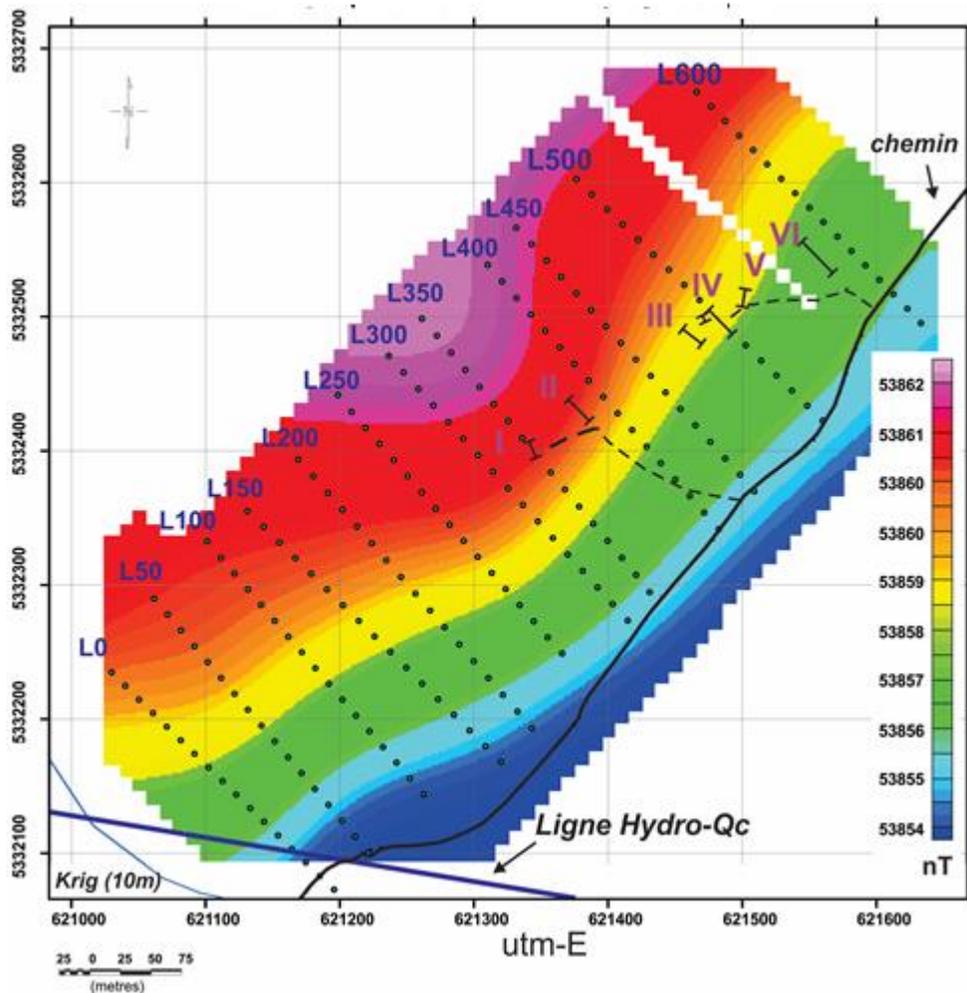
It is suggested that since the channel samples were collected near surface that a certain degree of contamination arising from surface water run-off over time may have percolated in the well-developed fracture network and deposited oxide minerals rich in Fe and Al creating a negative bias with respect to the total SiO<sub>2</sub> concentration of the central portion of the vein system.

The geochemistry of ultra-trace elements suggest that the Roncevaux vein hydrothermal fluids were emplaced in an oxidizing environment and that the fluorine (F) content is compatible with the P<sub>2</sub>O<sub>5</sub>-CaO (major oxides) concentration and most likely reflects the presence of fluoroapatite in the quartz of the vein system.

## 9.2 Geophysical Surveying

With the objective of identifying a recognizable signature for the Roncevaux vein that could be applied to find and outline similar bodies elsewhere on the property, various ground geophysical techniques were tested over the grid area. The completed surveys were horizontal loop electromagnetic (Promis-10 and GEM-2 systems) and magnetometer (GSM-19) along with geo-electrical tomography (ABEM Terrameter LS). Details of the completed program and the results are presented in two comprehensive reports by Richer-LaFlèche, (2016).

In most cases a thick and continuous highly resistive with low magnetic susceptibility quartz vein should exhibit a recognisable signature with the surrounding host rocks. In the present case, the host rocks have a moderate resistivity comparable to the vein rendering the identification of its traces under the surfacial cover rather uncertain. Also, the vein system is highly fractured which tends to lower its resistivity to a level comparable to the sedimentary rocks. Furthermore, the magnetic susceptibility contrast between the vein system and host rock is rather moderate. Nevertheless, data processing of the magnetic survey clearly locates the quartz vein system in the contact zone of the weakly magnetic sequence to the SE and the highly magnetic domain to the NW.



**Figure 12: Roncevaux trench area, total magnetic field corrected to pole (From Richer-Laflèche, June 2016).**

Apart from the resampling, geological, geochemical studies and geophysical surveys completed by Lauzier and the INRS-ETE on the Roncevaux vein system in 2014 and 2015 and summarized in this report, HPQ Silicon has not performed any other exploration activities over the project area.

On October 2, 2016, the author of this report completed a site visit to the Roncevaux Project area. All the trenches excavated and sampled in the prospect area and described in the INRS-ETE report (Richer-LaFlèche, 2016) were inspected, photographed and their locations were recorded in a hand-held GPS device.

The main quartz vein exposed in the trenches appears to be intensely sheared, recrystallized and fractured. Exposure in trench TR II clearly shows that the vein

system is poly-phased where a set of tightly spaced narrow quartz veins cut across the main body. (See Figure 9).



**Figure 13 : Fractured white quartz injected with quartz veinlets.**

The cuts along the road which crosses the property and leads to a nearby newly-built electrical wind turbine farm have exposed numerous blocks of white quartz. This occurrence confirms the presence of the main Roncevaux quartz vein for at least another 125.0 m towards the east from the last excavated trench (Trench VI) (see figure 10).

Furthermore, about 400 kg of cobble and small boulder size of white quartz vein fragments were collected from the dumps of all the visited trenches. The samples were bagged and sealed with tie wraps and transported to a warehouse in Acton Vale from which they will be dispatched to various laboratories for continued analytical and metallurgical characterization.



**Figure 14: Field of white quartz boulders near road cut 125 m east of TR VI.**

## **10.0 DRILLING**

None of the mineral occurrences described in this report have been drilled by HPQ Silicon Resources.

## **11.0 SAMPLING METHOD AND APPROACH**

The sampling program by Steven Lauzier in June 2014 was completed along the following protocol: «To ensure samples and data are collected properly, a clear chain of custody of samples is established from the collection site to the laboratory. The samples were taken on site along stockpiled material containing quartz blocs and along the outcrops in the trenches with a hammer and a chisel. Samples weighing approximately 10,0 kg each and a 3,0 kg duplicate were bagged onsite and placed into larger rice bags of 2 to 3 samples that were then transported by pick-up truck to the SL Exploration office in Acton Vale.

The property's quartz is to be characterized by analysing the chemical composition of the samples, by doing thermal shock tests and by observing the lump quartz size. All the samples and the duplicates contain a block that range in size between 10cm<sup>3</sup> to drill core size block to allow thermal testing. After duplicate analysis, the Issuer intends to ship the 10 kg samples to end-users of silica

products. The duplicate is to be shipped by courier for analysis at a certified laboratory».

The samples collected by the INRS team were taken from narrow channels cut (5.0 cm) with a diamond saw at the bottom of the cleaned-up trenches. Often, the white vein surface exhibited a reddish tinge probably related to the percolation of mineral precipitate from meteoric water circulating through the rock. At the laboratory, the samples were thoroughly cleaned in hot water and with nylon brushes, following which they were oven dried at 50°C.

The samples were then crushed with a high tempered steel jaw crusher. and split to 50 g aliquots to be pulverized in a rotary ceramic rock pulveriser to avoid contamination. The quartz powders were attacked in a lithium metaborate and tetraborate solution, followed by a complete dissolution in trace-metals quality nitric acid and then analysed with the ICP-AES and ICP-MS analytical methods in the INRS-ETE laboratory facility in Quebec City.

The analytical results on all the samples processed from the 2014 and 2015 sampling programs are presented in annex 3 along with standards and blanks.

## **12.0 DATA VERIFICATION**

The author has not established any data QA/QC verification procedures to validate the analytical results presented in this report. The partial or entire resampling of the trenches would have required elaborated logistics support and several days in the field. Furthermore, the author believes that the project is at an early stage of development and samples collected to date from the various trenches by J.P. Barette (2003), Lozier (2014) and Richer-Laflèche (2015) are representative of the SiO<sub>2</sub> content and other major oxides but should be cautious when analysing the trace elements concentration, since an exposure to near surface weathering over a long period of time may have altered the primary concentration of these critical elements in the bedrock and affect significantly the quality of the desirable end product.

Nevertheless, during his site visit, the author has collected selectively white quartz samples from stockpiles and dumps in the trenches area. The samples are stored in a secured warehouse in Acton Vale and should be part of next batch to be analysed and included in further test program.

## **13.0 MINERAL PROCESSING AND METALLURGICAL TESTING**

On September 30, 2015 HPQ-Silicon (then Uragold Bay Resources Inc.) announced a newly signed partnership with PyroGenesis Canada Inc. a world leader in the development, manufacturing and commercialization of advanced metallurgical plasma processes. The partnership granted HPQ Silicon a worldwide exclusive right to the usage of the PUREVAP™ Quartz Vaporisation Reactor technology, a patent pending one step proprietary process that uses a plasma arc within a vacuum furnace to produce high purity metallurgical grade silicon and solar

grade silicon from quartz. The purpose of the partnership is to transform HPQ Silicon high purity quartz deposits into high purity solar grade silicon metal with a significant value-added end product for the company. The one step transformation offers lower operational cost for producing silicon metal compared to current practice, lower CO<sub>2</sub> emission and the removal of phosphate, potassium, magnesium, zinc, calcium, and other impurities from the silica.

#### **14.0 MINERAL RESOURCE ESTIMATES**

This section is not applicable to the present status of the Roncevaux Quartz Project.

#### **15.0 MINERAL RESERVE ESTIMATES**

This section is not applicable to the present status of the Roncevaux Quartz Project.

#### **16.0 MINING METHODS**

This section is not applicable to the present status of the Roncevaux Quartz Project.

#### **17.0 RECOVERY METHODS**

This section is not applicable to the present status of the Roncevaux Quartz Project.

#### **18.0 PROJECT INFRASTRUCTURE**

There is no mining infrastructure in the area of the Roncevaux Quartz Project.

#### **19.0 MARKET STUDIES AND CONTRACTS**

This section is not applicable to the present status of the Roncevaux Quartz Project.

#### **20.0 ENVIRONMENTAL STUDIES, PERMITTING AND SOCIAL OR COMMUNITY IMPACT**

This section is not applicable to the present status of the Roncevaux Quartz Project.

## **21.0 CAPITAL AND OPERATING COSTS**

This section is not applicable to the present status of the Roncevaux Quartz Project.

## **22.0 ECONOMIC ANALYSIS**

This section is not applicable to the present status of the Roncevaux Quartz Project.

## **23.0 ADJACENT PROPERTIES**

TSX Venture-listed Fancamp Exploration Ltd. holds the title to a group of 6 mineral claims (map designated) to the northeast of the Roncevaux project area (see Figure 12) and which separates HPQ's two claim blocks. This property is host to the Knoble Creek gold occurrence where concentrations of 0.56 to 4.66 g/t Au are reported from three quartz vein spaced 200 m apart striking 280°. The veins are 3.0 to 4.0 m thick and mineralized with pyrite, chalcopyrite, arsenopyrite and galena, (see Figure 12 and GM57165).

## **24.0 OTHER RELEVANT DATA AND INFORMATION**

The Roncevaux project area was initially prospected for its gold potential. Considering the limited exploration carried-out in the area this potential remains relatively untested. Before the discovery of the Knoble occurrence, in 1992, Prospector M. Beaulieu found and sampled a white quartz vein with a thickness of about 3.60 m outcropping along a small feeder stream to the nearby Roland Creek. This occurrence is now located on claim CDC2407448 part of the Roncevaux project area. Significant gold values were outlined from outcrops samples: 1.51 g/t Au. Core samples from 4 short holes drilled in the structure also returned Au anomalous concentrations of 8.26 g/t Au, 0.58 g/t Au, 0.49 g/t Au and 0.34 g/t Au from unspecified core length. The anomalous gold values are also associated with high As, Sb and Zn analytical values, ( See Figure 12 and GM 57622).

During his sampling program on the Roncevaux vein in 2002, J.P. Barette PGeo. collected samples for gold whenever sulphide minerals were noted in the vein or its wall rocks. Low values not exceeding 0.20 g/t Au were obtained from few samples See Figure 10 and GM 60610.

## **25.0 INTERPRETATION AND CONCLUSIONS**

The Roncevaux silica occurrence is a hydrothermal vein system intruded in a shear zone developed at the contact between two contrasting rheological units part of the deformed terrigenous sedimentary rocks package of the Fortin Formation. Since its discovery in 1992 by prospector Marc Beaulieu the vein occurrence has

been sampled from trenches exposing a wide (3 to 12 m) white quartz vein along a strike length of about 340 m. The vein system shows zonation and chemical contamination along the contact zones with brecciated wall rock. Field observations and limited magnetic survey suggest that the quartz vein extends along strike for at least 125 m to the SW and the NE beyond the limits of the trenches.

The geochemistry of the vein system confirms its high purity silica content of 99.35% SiO<sub>2</sub>.

The author considers the Roncevaux Quartz Project as a grass root project with significant upside potential to develop into a high purity quartz resource suitable for high value-added silicon metal applications. The project area also has a potential for primary gold deposit related to the quartz veining system found in the area.

## **26.0 RECOMMENDATIONS**

It is recommended to assess the full potential of the Roncevaux quartz vein system to develop it into a significant orebody that could provide high purity quartz feed to a silicon metal processing plant for many years to come. In order to assess this potential, it is recommended to conduct a two-phase core drilling program to test the down dip the NE and SW lateral continuity and the quality of the quartz mineralization in the vicinity where the vein system has been exposed in the prospecting trenches. Furthermore, HPQ Silicon should conduct the first phase metallurgical test work program as proposed by PyroGenesis. This should provide significant technical input for the design of a 200 TPD pilot plant that HPQ Silicon intends to commission in the course of 2017.

The company should also consider completing a prospecting program to test the gold potential related with the multiple quartz veins found of the property.

### **26.1 Phase 1**

The first phase of the program should provide the basis for the confirmation of a geological resource. It should cover a minimum of 3 drilling fences, each with two drill holes oriented at right angle to the main strike of the vein and a dip to vertically intercept the quartz vein system at 50 m and 100 m below surface on each fence. This drilling should confirm the continuity of the mineralized structure and provide sufficient samples to assess the grade and the nature of the vein impurity components. To provide sizable vein samples, large diameter HQ size (63.5 mm) core barrel should be used for drilling. Provision should be made to carry the first phase of the metallurgical test work. The budget of the first phase of the proposed program is set at \$275,000. This amount includes \$25,000 for Gold exploration.

## 26.2 Phase 2

Should the results of the first phase of drilling succeed in outlining the down dip continuity of the Roncevaux quartz vein system the second phase of the program would provide for additional core drilling of the target to establish a significant resource estimation in the indicated category. Provision is made for 1,200 m of drilling distributed in fences along the orebody. Allocations are also provided to conduct a bulk sample for the purpose of metallurgical test work. A budget of \$473,000 is proposed for the second phase, the overall program is budgeted at \$748,000.

## 26.3 Budget

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**HPQ SILICON RESOURCES LTD.  
RONCEVAUX QUARTZ PROJECT  
PROPOSED EXPLORATION PROGRAM 2017-2018**

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<b>PHASE 1: GEOLOGICAL RESOURCE DRILLING</b>	
- Diamond drilling: 700 m @ \$200/m: including mobilization & demobilization, fuel, camp & logistics, drilling, site moves, core trays, logging and sampling, sample prep and shipping, analytical, etc.	\$140 000
- drilling supervision and report	\$ 25 000
- Metallurgical test work (estimated)	\$ 60 000
- Gold prospecting activities: geological mapping, outcrop stripping and sampling: 1 geologist, 2 technicians for 1 month, transport and lodging @ \$15,000 per month.	\$15,000
- Au assays (200 samples), data compilation & report;	\$10,000
<b>Sub-total Phase 1</b>	<b>\$250,000</b>
- Contingency (10%)	\$25,000
<b>- Total Phase 1</b>	<b>\$275,000</b>
<b>PHASE 2: INDICATED RESOURCES DRILLING</b>	
- Diamond drilling: 1200 m@ \$200/m: including mobilization & demobilization, fuel, camp & logistics, drilling, site moves, core trays, logging and sampling, sample prep and shipping, analytical, etc.	\$ 240 000
- Bulk sampling	\$ 50 000
- - Project supervision and report	\$ 25 000
Metallurgical test work (estimated)	\$ 50 000
Contingency (10%)	\$ 36 500
<b>TOTAL PHASE 2</b>	<b>\$ 473,000</b>
<b>TOTAL PROPOSED BUDGET (PHASE 1+2)</b>	<b>\$ 748,000</b>

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Respectfully submitted

A handwritten signature in black ink, appearing to read "Benoit M. Violette", is centered on a light green rectangular background.

Benoit M Violette, P.Geo.

## 27.0 REFERENCES

Barrette, Jean-Paul, 2003, « Rapport des travaux d'exploration minière sur la veine de quartz pur. Projet Silice Roncevaux, Canton Roncevaux, Gaspésie », GM 60610, 45 p.

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### Websites visited

[canadianmetalsinc.com](http://canadianmetalsinc.com)

[nordicmining.com](http://nordicmining.com)

[unimin.com](http://unimin.com)

[dorfneranzaplan.com](http://dorfneranzaplan.com)

[MERN.gouv.qc.ca](http://MERN.gouv.qc.ca)

**28- CERTIFICATE OF QUALIFICATIONS: BENOIT M. VIOLETTE, P,Geo.**

I, Benoît M. Violette, do hereby certify that:

I reside at 2-3374 Lacombe Ave., Montreal, Québec, Canada H3T 1L8.

I graduated with a B.Sc (Honours) in Geology from the University of Ottawa in 1979 and I have practised my profession continuously since then.

I am a member of the “Ordre des Géologues du Québec”, member no 678.

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

I am the author of the technical report titled: **National Instrument 43-101-compliant Technical Evaluation Report of the Metallurgical Quartz Potential of the Roncevaux Quartz Project, Matapédia Area, Gaspésie Region, Province of Quebec.**

I have visited the project area on October the 2nd, 2016.

I have not had any prior involvement with the mineral property that is the subject of the Technical Report. I am not aware of any material fact or material change with respect to the subject matter of the Technical Report that is not reflected in the Technical Report, the omission to disclose which would make the Technical Report misleading.

I am independent of HPQ Silicon Resources Inc., applying all the tests in section 1.5 of NI 43-101.

Neither I, nor any affiliated entity of mine, is at present under an agreement, arrangement or understanding or expects to become an insider, associate, affiliated entity or employee of HPQ Silicon Resources Inc., or any associated or affiliated entities.

Neither I, nor any affiliated entity of mine own, directly or indirectly, nor expect to receive, any interest in the projects or securities of HPQ Silicon Resources Inc. or any associated or affiliated companies.

I have read the NI 43-101 and Form 43-101F1 and have prepared the Technical Report in compliance with this NI 43-101 and Form 43-101F1; and in conformity with generally accepted Canadian mining industry practices.

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.

**Signed and sealed this 31st day of May, 2017 and up dated September 25, 2017.**



Benoît M. Violette, P.Geo.



**ANNEX 1  
Roncevaux Quartz Project**

**HPQ Silicon Resources Inc. Roncevaux Project : Mining Titles Description : 2017-09-25**

Feuille	No titre	Date Renouv	Date d'inscription	Date d'expiration	Nbre Renouv	Superficie (Ha)	Excédents	Travaux requis	Droits requis	Détenteur(s) (	Transfert
SNRC 22B03	2398584	2017-11-29 23:59	2014-01-31 00:00	2018-01-30 23:59	1	57,45	33691,17	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2398585	2017-11-29 23:59	2014-01-31 00:00	2018-01-30 23:59	1	57,45	383,05	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2398586	2017-11-29 23:59	2014-01-31 00:00	2018-01-30 23:59	1	57,45	43622,57	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2398587	2017-11-29 23:59	2014-01-31 00:00	2018-01-30 23:59	1	57,45	855,97	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2438486	2018-01-17 23:59	2016-03-21 00:00	2018-03-20 23:59	0	57,41	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2438487	2018-01-17 23:59	2016-03-21 00:00	2018-03-20 23:59	0	57,41	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2438488	2018-01-17 23:59	2016-03-21 00:00	2018-03-20 23:59	0	57,41	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2438483	2018-01-17 23:59	2016-03-21 00:00	2018-03-20 23:59	0	57,43	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2438484	2018-01-17 23:59	2016-03-21 00:00	2018-03-20 23:59	0	57,42	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2438485	2018-01-28 00:00	2016-12-07 00:00	2018-03-31 00:00	1	57,42	0	780	64,9	HPQ-Silicon	Non
SNRC 22B03	2407448	2018-05-14 23:59	2014-07-16 00:00	2018-07-15 23:59	1	57,47	385,57	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2407449	2018-05-14 23:59	2014-07-16 00:00	2018-07-15 23:59	1	57,46	385,57	780	64,09	HPQ-Silicon	Oui

SNRC 22B03	2407450	2018-05-14 23:59	2014-07-16 00:00	2018-07-15 23:59	1	57,46	385,57	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2407451	2018-05-14 23:59	2014-07-16 00:00	2018-07-15 23:59	1	57,45	385,57	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2407452	2018-05-14 23:59	2014-07-16 00:00	2018-07-15 23:59	1	57,45	385,56	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2421110	2018-11-07 23:59	2015-01-09 00:00	2019-01-08 23:59	1	57,45	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2421111	2018-11-07 23:59	2015-01-09 00:00	2019-01-08 23:59	1	57,44	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2421112	2018-11-07 23:59	2015-01-09 00:00	2019-01-08 23:59	1	57,44	0	780	64,09	HPQ-Silicon	Oui
SNRC 22B03	2500660	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,46	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500661	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,45	0	780	64,09	HPQ-Silicon r	Non
SNRC 22B03	2500662	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500663	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,45	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500664	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,45	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500665	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,45	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500666	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500667	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon	Non

SNRC 22B03	2500668	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon r	Non
SNRC 22B03	2500669	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon r	Non
SNRC 22B03	2500670	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon r	Non
SNRC 22B03	2500671	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,44	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500672	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,43	0	780	64,09	HPQ-Silicon	Non
SNRC 22B03	2500673	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,43	0	780	64,09	HPQ-Silicon r	Non
SNRC 22B03	2500674	2019-06-14 23:59	2017-08-16 00:00	2019-08-15 23:59	0	57,42	0	780	64,09	HPQ-Silicon r	Non
ToTal :	33					1895,54	80 480,60 \$	25,740,00 \$	2 115,78 \$		

**ANNEX 2**  
**Roncevaux Quartz Project**  
**Sample Listing, Steven Lauzier, 2014**

Trench ID	Sample ID	Description
#3	A41962	97-98% of white, medium to coarse grained subhedral to euhedral quartz crystals. Impurities include trace amount of greenish black shale clast and iron oxides. Iron carbonate (ankerite) is orange, fine grained and oxidized. This sample was taken in the stockpile.
#2	A41963	98-99% of white, medium to coarse grained subhedral to euhedral quartz crystals. 1-2% of fine grained ankerite and oxides. This sample was taken in the stockpile.
#2	A41964	99% of white, medium to coarse grained subhedral to euhedral quartz crystals. Trace to 1% of fine grained ankerite and oxides. This sample was taken in the stockpile.
#2	A41965	Same as A41964. This sample was taken in the outcrop revealed by the trench.
#2	A41966	Same as A41964. This sample was taken in the outcrop revealed by the trench.
#1	A41967	Same as A41963. This sample was taken in the stockpile.
#A	A41968	Same as A41963. This sample was taken in the stockpile.
#A	A41969	Same as A41963. This sample was taken in the stockpile.
#A	A41970	Same as A41963. This sample was taken in the stockpile.
#A	A41971	Same as A41963. This sample was taken in the stockpile.

## ANNEX 3: ICP-AES Analytical Results of the Samples Collected in 2014 and 2015 from the Roncevaux Quartz Project

### ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			Si 251.611	Ti 334.941	Al 396.152	Fe 238.204	Mn 257.610
			% SiO2	% TiO2	% Al2O3	% Fe2O3	% MnO
# échant.		# labo					
41966-B	échant. 2014	16-582	97	0.0005	0.021	0.0109	0.0002
41971-B	échant. 2014	16-583	99	< 0.0003	0.021	0.0176	< 0.0001
41966	échant. 2014	16-584	98	0.0018	0.07	0.024	0.0002
41971	échant. 2014	16-585	99	0.0018	0.032	0.0098	< 0.0001
41968-B	échant. 2014	16-586	99	0.0075	0.164	0.0787	0.0013
41969-B	échant. 2014	16-587	97	0.0029	0.078	0.037	0.0002
41965	échant. 2014	16-588	100	< 0.0003	0.039	0.0115	< 0.0001
41968	échant. 2014	16-589	99	0.0005	0.037	0.0066	< 0.0001
41762	échant. 2014	16-590	99	< 0.0003	0.003	0.0051	0.0002
41755	échant. 2014	16-591	101	< 0.0003	0.005	0.005	0.0006
41757	échant. 2014	16-592	98	< 0.0003	0.005	0.0122	0.0004
41963	échant. 2014	16-593	97	< 0.0003	0.022	0.018	0.0002
41756	échant. 2014	16-594	102	< 0.0003	0.0089	0.0061	< 0.0001
41967-B	échant. 2014	16-595	98	0.0058	0.183	0.059	0.001
41765-B	échant. 2014	16-596	100	0.0004	0.006	0.0049	< 0.0001
41760	échant. 2014	16-597	97	0.0003	0.0132	0.0098	0.0003
41967	échant. 2014	16-598	96	< 0.0003	0.018	0.0124	< 0.0001
41761	échant. 2014	16-599	96	< 0.0003	0.009	0.0024	< 0.0001
41964-B	échant. 2014	16-600	99	< 0.0002	0.0162	0.0021	< 0.0001
41964	échant. 2014	16-601	99	< 0.0003	0.065	0.0058	< 0.0001
41962	échant. 2014	16-602	100	< 0.0003	0.031	0.0049	< 0.0001
41962-B	échant. 2014	16-603	101	0.0004	0.0167	0.0176	0.0002
41970	échant. 2014	16-604	101	< 0.0003	0.0127	0.0021	< 0.0001
41965-B	échant. 2014	16-605	99	< 0.0003	0.0165	0.0025	< 0.0001

41969	échant. 2014	16-606	99	0.0003	0.0168	0.0048	< 0.0001
41963-B	échant. 2014	16-607	99	0.0017	0.025	0.0107	0.0002
41970-B	échant. 2014	16-608	100	0.0009	0.03	0.0131	0.0002
2.2	échant. 2015	16-609	93	0.23	2.85	1.2	0.0082
1.A.3	échant. 2015	16-610	100	0.0083	0.359	0.194	0.0051
1.A.4	échant. 2015	16-611	99	0.0081	0.352	0.19	0.005
2.5	échant. 2015	16-612	92	0.163	4.02	1.81	0.0331
2.1	échant. 2015	16-613	78.7	0.538	9.8	3.56	0.0279
2.4	échant. 2015	16-614	97	0.0402	0.879	0.393	0.0118
1.A.2	échant. 2015	16-615	77.2	0.477	10.5	3.94	0.0294
3.5	échant. 2015	16-616	98	0.0509	0.695	0.243	0.0022

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			Mg 280.270	Ca 396.847	Na 588.995	K 766.491	P 213.618
			% MgO	% CaO	% Na2O	% K2O	% P2O5
# échant.		# labo					
41966-B	échant. 2014	16-582	0.0003	< 0.0011	0.12	< 0.05	< 0.012
41971-B	échant. 2014	16-583	< 0.0001	< 0.001	0.12	0.06	< 0.011
41966	échant. 2014	16-584	< 0.0001	0.004	0.11	< 0.05	< 0.011
41971	échant. 2014	16-585	< 0.0001	< 0.0011	0.12	< 0.05	< 0.012
41968-B	échant. 2014	16-586	0.023	0.245	0.15	0.06	< 0.012
41969-B	échant. 2014	16-587	0.0011	< 0.0011	0.15	< 0.05	< 0.012
41965	échant. 2014	16-588	< 0.0001	< 0.0011	0.18	0.06	< 0.012
41968	échant. 2014	16-589	< 0.0001	< 0.0011	0.2	< 0.05	< 0.012
41762	échant. 2014	16-590	< 0.0001	< 0.0011	0.2	< 0.06	< 0.013
41755	échant. 2014	16-591	< 0.0001	< 0.0011	0.21	< 0.06	< 0.013
41757	échant. 2014	16-592	< 0.0001	< 0.001	0.19	< 0.05	< 0.012
41963	échant. 2014	16-593	< 0.0001	< 0.001	0.2	< 0.05	< 0.012
41756	échant. 2014	16-594	< 0.0001	< 0.0011	0.19	< 0.05	< 0.012
41967-B	échant. 2014	16-595	0.0023	< 0.0011	0.26	0.09	< 0.012
41765-B	échant. 2014	16-596	< 0.0001	< 0.0011	0.23	0.07	< 0.012

41760	échant. 2014	16-597	< 0.0001	< 0.001	0.21	0.06	< 0.012
41967	échant. 2014	16-598	< 0.0001	< 0.0011	0.23	< 0.06	< 0.013
41761	échant. 2014	16-599	< 0.0001	< 0.001	0.22	0.07	< 0.012
41964-B	échant. 2014	16-600	< 0.0001	< 0.001	0.21	< 0.05	< 0.011
41964	échant. 2014	16-601	< 0.0001	< 0.0011	0.26	0.09	< 0.013
41962	échant. 2014	16-602	< 0.0001	< 0.0011	0.25	< 0.05	< 0.012
41962-B	échant. 2014	16-603	< 0.0001	0.003	0.21	0.05	< 0.011
41970	échant. 2014	16-604	< 0.0001	< 0.0011	0.24	< 0.05	< 0.012
41965-B	échant. 2014	16-605	< 0.0001	< 0.001	0.23	0.06	< 0.012
41969	échant. 2014	16-606	< 0.0001	< 0.0011	0.22	0.07	< 0.012
41963-B	échant. 2014	16-607	< 0.0001	< 0.001	0.23	< 0.05	< 0.011
41970-B	échant. 2014	16-608	< 0.0001	< 0.0011	0.23	0.08	< 0.013
2.2	échant. 2015	16-609	0.198	0.034	0.41	0.72	0.04
1.A.3	échant. 2015	16-610	0.0059	0.397	0.34	0.09	0.27
1.A.4	échant. 2015	16-611	0.0056	0.388	0.31	0.08	0.28
2.5	échant. 2015	16-612	0.149	0.0148	0.68	0.91	0.03
2.1	échant. 2015	16-613	1.05	0.126	2.9	1.02	0.099
2.4	échant. 2015	16-614	0.0457	0.055	0.26	0.23	0.04
1.A.2	échant. 2015	16-615	0.99	0.035	0.56	2.4	0.06
3.5	échant. 2015	16-616	0.0312	0.0019	0.26	0.21	< 0.013

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			S 180.669	Ba 455.403	Cd 226.502	Co 230.786	Cr 267.716
			% Soufre	ppm Ba	ppm Cd	ppm Co	ppm Cr
# échant.		# labo					
41966-B	échant. 2014	16-582	< 0.007	5.1	< 3	< 7	10
41971-B	échant. 2014	16-583	0.017	2.5	< 2.6	< 6	30
41966	échant. 2014	16-584	< 0.006	3.8	< 2.6	8	19
41971	échant. 2014	16-585	< 0.007	4.2	< 3	< 7	< 7

41968-B	échant. 2014	16-586	0.02	11.2	< 3	< 6	< 6
41969-B	échant. 2014	16-587	< 0.007	3.7	< 3	< 7	< 7
41965	échant. 2014	16-588	< 0.007	2.5	< 3	< 7	22
41968	échant. 2014	16-589	0.011	3	< 3	< 7	190
41762	échant. 2014	16-590	< 0.007	3	< 3	< 7	< 7
41755	échant. 2014	16-591	< 0.007	< 0.4	< 3	< 7	8
41757	échant. 2014	16-592	< 0.006	0.9	< 2.7	< 6	< 6
41963	échant. 2014	16-593	< 0.007	0.9	< 3	< 7	< 7
41756	échant. 2014	16-594	< 0.007	< 0.4	< 3	< 7	< 7
41967-B	échant. 2014	16-595	< 0.007	2.4	< 3	< 7	8
41765-B	échant. 2014	16-596	< 0.007	3.6	< 3	< 7	< 7
41760	échant. 2014	16-597	< 0.006	< 0.4	< 2.7	< 6	< 6
41967	échant. 2014	16-598	< 0.007	< 0.4	< 3	< 7	< 7
41761	échant. 2014	16-599	< 0.007	< 0.4	< 3	< 7	< 7
41964-B	échant. 2014	16-600	< 0.006	< 0.4	< 2.6	< 6	< 6
41964	échant. 2014	16-601	< 0.007	1.4	< 3	< 7	< 7
41962	échant. 2014	16-602	< 0.007	0.9	< 3	< 7	< 7
41962-B	échant. 2014	16-603	< 0.006	< 0.4	< 2.5	< 6	< 6
41970	échant. 2014	16-604	< 0.007	0.8	< 3	< 7	< 7
41965-B	échant. 2014	16-605	< 0.007	< 0.4	< 3	< 7	< 7
41969	échant. 2014	16-606	< 0.007	0.6	< 3	< 7	< 7
41963-B	échant. 2014	16-607	< 0.006	0.5	< 2.5	< 6	31
41970-B	échant. 2014échant. 204	16-608	< 0.007	0.7	< 3	< 7	< 7
2.2	échant. 2015	16-609	< 0.007	87.1	< 3	< 7	53
1.A.3	échant. 2015	16-610	0.013	5.2	< 3	< 7	25

1.A.4	échant. 2015	16-611	< 0.006	5.9	< 3	< 6	30
2.5	échant. 2015	16-612	< 0.007	110	< 3	< 7	55
2.1	échant. 2015	16-613	< 0.007	157	< 3	10	99
2.4	échant. 2015	16-614	< 0.006	24	< 2.7	< 6	40
1.A.2	échant. 2015	16-615	0.007	326	< 2.7	6	87
3.5	échant. 2015	16-616	< 0.007	16.8	< 3	< 7	30

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			Cu 327.395	La 408.671	Sc 361.383	V 292.401	Zn 206.200	Zr 343.823
			ppm Cu	ppm La	ppm Sc	ppm V	ppm Zn	ppm Zr
# échant.		# labo						
41966-B	échant. 2014	16-582	12	< 3	< 0.5	< 7	< 9	< 2.4
41971-B	échant. 2014	16-583	< 9	< 2.6	< 0.5	< 6	< 9	< 2.3
41966	échant. 2014	16-584	< 9	< 2.6	< 0.5	< 6	< 9	< 2.3
41971	échant. 2014	16-585	< 9	< 3	< 0.5	< 7	16	< 2.4
41968-B	échant. 2014	16-586	< 9	< 3	< 0.5	< 6	13	< 2.3
41969-B	échant. 2014	16-587	< 9	< 3	< 0.5	< 7	< 9	< 2.4
41965	échant. 2014	16-588	< 10	< 3	< 0.5	< 7	17	< 2.4
41968	échant. 2014	16-589	19	< 3	< 0.5	< 7	< 9	< 2.4
41762	échant. 2014	16-590	11	< 3	< 0.6	< 7	20	< 2.5
41755	échant. 2014	16-591	11	< 3	< 0.6	< 7	< 10	< 2.6
41757	échant. 2014	16-592	< 9	< 2.7	< 0.5	< 6	< 9	< 2.3
41963	échant. 2014	16-593	< 9	< 3	< 0.5	< 7	< 9	< 2.4
41756	échant. 2014	16-594	13	< 3	< 0.5	< 7	< 10	< 2.5
41967-B	échant. 2014	16-595	< 10	< 3	< 0.5	< 7	12	< 2.5
41765-B	échant. 2014	16-596	< 9	< 3	< 0.5	< 7	11	< 2.4
41760	échant. 2014	16-597	< 9	< 2.7	< 0.5	< 6	21	< 2.3
41967	échant. 2014	16-598	< 10	< 3	< 0.6	< 7	< 10	< 2.5
41761	échant. 2014	16-599	9	< 3	< 0.5	< 7	< 9	< 2.3
41964-B	échant. 2014	16-600	10	< 2.6	< 0.5	< 6	14	< 2.2

41964	échant. 2014	16-601	< 10	< 3	< 0.6	< 7	< 10	< 2.5
41962	échant. 2014	16-602	< 9	< 3	< 0.5	< 7	< 9	< 2.4
41962-B	échant. 2014	16-603	12	11	< 0.5	< 6	< 8	< 2.1
41970	échant. 2014	16-604	< 9	< 3	< 0.5	< 7	< 9	< 2.4
41965-B	échant. 2014	16-605	14	< 3	< 0.5	< 7	< 9	< 2.4
41969	échant. 2014	16-606	< 10	< 3	< 0.5	< 7	< 10	< 2.5
41963-B	échant. 2014	16-607	14	< 2.5	< 0.5	< 6	11	< 2.1
41970-B	échant. 2014	16-608	< 10	< 3	< 0.6	< 7	< 10	< 2.5
2.2	échant. 2015	16-609	56	6	3.6	30	22	83
1.A.3	échant. 2015	16-610	< 10	4	0.7	< 7	< 10	< 2.4
1.A.4	échant. 2015	16-611	< 9	< 3	0.6	< 6	< 9	2.4
2.5	échant. 2015	16-612	< 10	5	4.7	30	18	49
2.1	échant. 2015	16-613	< 9	22	9	84	51	167
2.4	échant. 2015	16-614	< 9	4	1.4	< 6	< 9	12.3
1.A.2	échant. 2015	16-615	45	17.7	10.1	95	124	142
3.5	échant. 2015	16-616	20	< 3	0.9	9	< 10	16.7

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			Si 251.611	Ti 334.941	Al 396.152	Fe 238.204	Mn 257.610
			% SiO2	% TiO2	% Al2O3	% Fe2O3	% MnO
3.3	échant. 2015	16-617	100	0.0067	0.233	0.108	0.0019
3.2	échant. 2015	16-618	97	0.0567	1.12	0.809	0.0047
1.A.1	échant. 2015	16-620	98	0.0676	1.44	0.891	0.0079
1.B.6	échant. 2015	16-621	96	0.107	1.81	0.97	0.0116
2.3	échant. 2015	16-622	100	0.0087	0.257	0.122	0.0029
3.7	échant. 2015	16-623	101	0.0043	0.102	0.051	0.0006
1.B.5	échant. 2015	16-624	95	0.0687	2.16	0.75	0.016
3.B.1	échant. 2015	16-625	98	0.0046	0.094	0.045	0.0002
3.1	échant. 2015	16-626	94	0.0075	0.154	0.1	0.0022
3.B.5	échant. 2015	16-627	99	0.0082	0.163	0.082	0.0038
4.I.6	échant. 2015	16-628	75.9	0.627	10.7	3.87	0.0302

4.2	échant. 2015	16-629	99	0.0031	0.084	0.069	0.0005
3.C.1	échant. 2015	16-630	98	0.001	0.037	0.024	0.0001
3.B.4	échant. 2015	16-631	101	0.0581	0.482	0.143	0.0005
3.6	échant. 2015	16-632	97	0.0609	1.61	0.585	0.0067
3.B.2	échant. 2015	16-633	100	0.02	0.196	0.102	0.0003
5.1	échant. 2015	16-634	86.7	0.304	5.35	1.99	0.0323
5.4	échant. 2015	16-635	99	0.0034	0.148	0.055	0.0021
5.5	échant. 2015	16-636	97	0.0037	0.15	0.128	0.0029
3.C.2	échant. 2015	16-637	99	0.0013	0.041	0.025	0.0002
4.I.A	échant. 2015	16-638	96	0.0638	0.666	0.333	0.0063
4.4	échant. 2015	16-639	98	0.0073	0.171	0.05	< 0.0001
3.B.3	échant. 2015	16-640	98	0.0176	0.312	0.144	0.0015
4.6	échant. 2015	16-641	97	0.0592	1.24	0.288	0.0034
4.5	échant. 2015	16-642	96	0.0617	1.46	0.37	0.0059
4.3	échant. 2015	16-643	98	0.0005	0.019	0.0116	< 0.0001
6.7	échant. 2015	16-644	97	0.0413	0.74	0.54	0.0054
6.4	échant. 2015	16-645	99	0.0153	0.332	0.138	0.0021
2.4	échant. 2015	16-646	100	0.0316	0.283	0.18	0.0026
6.3	échant. 2015	16-647	99	0.0044	0.1	0.046	0.0006
6.5	échant. 2015	16-648	98	0.0241	0.636	0.21	0.0046
5.3	échant. 2015	16-649	100	0.0008	0.038	0.0154	0.0002
5.7	échant. 2015	16-650	98	0.022	0.466	0.196	0.0025
6.6	échant. 2015	16-651	99	0.0056	0.139	0.09	0.0028
6.2	échant. 2015	16-652	99	0.0071	0.109	0.038	0.0004
6.1	échant. 2015	16-653	99	0.0023	0.11	0.054	0.0021

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			<b>Mg 280.270</b>	<b>Ca 396.847</b>	<b>Na 588.995</b>	<b>K 766.491</b>	<b>P 213.618</b>
			<b>% MgO</b>	<b>% CaO</b>	<b>% Na2O</b>	<b>% K2O</b>	<b>% P2O5</b>
3.3	échant. 2015	16-617	0.0055	0.0098	0.22	0.11	0.012
3.2	échant. 2015	16-618	0.15	0.0095	0.33	0.2	< 0.012
1.A.1	échant. 2015	16-620	0.133	< 0.0011	0.25	0.36	0.014

1.B.6	échant. 2015	16-621	0.182	0.023	0.2	0.45	0.021
2.3	échant. 2015	16-622	0.0086	0.037	0.18	0.11	0.03
3.7	échant. 2015	16-623	0.0014	< 0.001	0.15	< 0.05	< 0.011
1.B.5	échant. 2015	16-624	0.094	0.0085	0.32	0.55	0.016
3.B.1	échant. 2015	16-625	0.0013	< 0.0011	0.17	0.09	< 0.012
3.1	échant. 2015	16-626	0.0061	0.0171	0.11	0.06	0.016
3.B.5	échant. 2015	16-627	0.0063	0.003	0.16	0.09	< 0.012
4.I.6	échant. 2015	16-628	1.02	0.103	2	1.73	0.095
4.2	échant. 2015	16-629	0.001	0.0015	0.12	0.08	< 0.011
3.C.1	échant. 2015	16-630	< 0.0001	< 0.001	0.12	0.08	< 0.012
3.B.4	échant. 2015	16-631	0.0165	< 0.0011	0.15	0.17	< 0.012
3.6	échant. 2015	16-632	0.0321	0.0011	0.57	0.27	< 0.012
3.B.2	échant. 2015	16-633	0.0046	< 0.001	0.11	0.08	< 0.011
5.1	échant. 2015	16-634	0.267	0.03	0.93	0.98	0.05
5.4	échant. 2015	16-635	0.0023	< 0.0011	0.11	0.07	< 0.012
5.5	échant. 2015	16-636	0.0058	< 0.0009	0.11	0.07	< 0.011
3.C.2	échant. 2015	16-637	0.0011	< 0.001	0.11	0.06	< 0.012
4.I.A	échant. 2015	16-638	0.0378	0.028	0.13	0.19	0.019
4.4	échant. 2015	16-639	0.0027	< 0.001	0.12	0.08	< 0.011
3.B.3	échant. 2015	16-640	0.0231	0.0065	0.07	0.12	< 0.012
4.6	échant. 2015	16-641	0.0308	0.0074	0.37	0.26	0.014
4.5	échant. 2015	16-642	0.0261	0.0057	0.6	0.19	< 0.012
4.3	échant. 2015	16-643	< 0.0001	< 0.0008	0.08	0.04	< 0.009
6.7	échant. 2015	16-644	0.1	0.0026	0.08	0.2	< 0.012
6.4	échant. 2015	16-645	0.0098	0.005	0.16	0.09	< 0.013
2.4	échant. 2015	16-646	0.0053	< 0.0011	0.16	0.1	< 0.013
6.3	échant. 2015	16-647	0.0028	< 0.0008	0.08	0.07	< 0.009
6.5	échant. 2015	16-648	0.0126	< 0.0009	0.29	0.1	< 0.011
5.3	échant. 2015	16-649	0.0005	< 0.001	0.11	0.05	< 0.012
5.7	échant. 2015	16-650	0.011	0.022	0.15	0.15	0.02
6.6	échant. 2015	16-651	0.0075	< 0.0011	0.07	0.1	< 0.013
6.2	échant. 2015	16-652	0.0048	< 0.001	0.09	0.08	< 0.011
6.1	échant. 2015	16-653	0.0016	< 0.001	0.1	0.07	< 0.011

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			S 180.669	Ba 455.403	Cd 226.502	Co 230.786	Cr 267.716
			% Soufre	ppm Ba	ppm Cd	ppm Co	ppm Cr
3.3	échant. 2015	16-617	< 0.006	3.7	< 2.7	< 6	17
3.2	échant. 2015	16-618	< 0.007	16.6	< 3	< 7	25
1.A.1	échant. 2015	16-620	< 0.007	34	< 3	< 7	38
1.B.6	échant. 2015	16-621	< 0.006	53.5	< 3	< 6	65
2.3	échant. 2015	16-622	< 0.006	6.8	< 2.5	< 6	15
3.7	échant. 2015	16-623	0.007	2.2	< 2.7	< 6	41
1.B.5	échant. 2015	16-624	< 0.007	58	< 3	< 7	39
3.B.1	échant. 2015	16-625	< 0.007	2.3	< 3	< 7	26
3.1	échant. 2015	16-626	< 0.005	2.7	< 2.2	< 5	47
3.B.5	échant. 2015	16-627	< 0.007	2.9	< 3	< 7	21
4.I.6	échant. 2015	16-628	< 0.007	252	< 3	10	118
4.2	échant. 2015	16-629	< 0.006	1.5	< 2.6	< 6	23
3.C.1	échant. 2015	16-630	< 0.007	0.4	< 3	< 7	45
3.B.4	échant. 2015	16-631	0.008	11.5	< 3	< 7	30
3.6	échant. 2015	16-632	< 0.007	22	< 3	< 7	65
3.B.2	échant. 2015	16-633	< 0.006	3.4	< 2.6	< 6	42
5.1	échant. 2015	16-634	< 0.007	126	< 3	8	96
5.4	échant. 2015	16-635	< 0.007	2.2	< 3	< 7	39
5.5	échant. 2015	16-636	< 0.006	3.3	< 2.5	< 6	32
3.C.2	échant. 2015	16-637	0.007	1.2	< 3	< 6	< 6
4.I.A	échant. 2015	16-638	< 0.006	18	< 2.5	< 6	30

4.4	échant. 2015	16-639	< 0.006	2.7	< 2.5	< 6	19
3.B.3	échant. 2015	16-640	< 0.007	6.4	< 3	< 7	20
4.6	échant. 2015	16-641	< 0.006	24	< 2.6	< 6	39
4.5	échant. 2015	16-642	0.008	18	< 3	< 7	51
4.3	échant. 2015	16-643	< 0.005	< 0.3	< 2.1	< 5	17
6.7	échant. 2015	16-644	< 0.006	18	< 3	< 6	27
6.4	échant. 2015	16-645	< 0.007	3.9	< 3	< 7	16
2.4	échant. 2015	16-646	< 0.007	4.3	< 3	< 7	132
6.3	échant. 2015	16-647	< 0.005	2.8	< 2.2	< 5	51
6.5	échant. 2015	16-648	< 0.006	7.6	< 2.5	< 6	15
5.3	échant. 2015	16-649	< 0.006	0.8	< 3	< 6	12
5.7	échant. 2015	16-650	< 0.006	8.7	< 2.6	< 6	17
6.6	échant. 2015	16-651	< 0.007	3.5	< 3	< 7	30
6.2	échant. 2015	16-652	0.012	4.9	< 2.6	< 6	18
6.1	échant. 2015	16-653	< 0.006	2.7	< 2.6	< 6	30

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

			<b>Cu 327.395</b>	<b>La 408.671</b>	<b>Sc 361.383</b>	<b>V 292.401</b>	<b>Zn 206.200</b>	<b>Zr 343.823</b>
			<b>ppm Cu</b>	<b>ppm La</b>	<b>ppm Sc</b>	<b>ppm V</b>	<b>ppm Zn</b>	<b>ppm Zr</b>
3.3	échant. 2015	16-617	< 9	< 2.7	< 0.5	< 6	16	< 2.3
3.2	échant. 2015	16-618	27	3	0.6	10	13	14
1.A.1	échant. 2015	16-620	40	3	1.3	10	55	20
1.B.6	échant. 2015	16-621	18	4	2.4	17	30	31
2.3	échant. 2015	16-622	< 8	< 2.5	< 0.5	< 6	9	< 2.2
3.7	échant. 2015	16-623	< 9	< 2.7	< 0.5	< 6	< 9	< 2.3
1.B.5	échant. 2015	16-624	40	< 3	1.8	20	76	17.5
3.B.1	échant. 2015	16-625	< 9	< 3	< 0.5	< 7	12	< 2.4

3.1	échant. 2015	16-626	< 7	< 2.2	< 0.4	< 5	< 7	< 1.8
3.B.5	échant. 2015	16-627	< 10	< 3	< 0.5	< 7	< 10	< 2.4
4.1.6	échant. 2015	16-628	12	27	10.2	94	53	190
4.2	échant. 2015	16-629	< 9	< 2.6	< 0.5	< 6	< 9	< 2.2
3.C.1	échant. 2015	16-630	< 9	< 3	< 0.5	< 7	< 9	< 2.3
3.B.4	échant. 2015	16-631	13	< 3	0.6	< 7	< 10	20
3.6	échant. 2015	16-632	13	< 3	1.4	10	12	15.8
3.B.2	échant. 2015	16-633	< 9	< 2.6	< 0.5	< 6	< 9	4
5.1	échant. 2015	16-634	20	14	5.4	45	25	102
5.4	échant. 2015	16-635	< 9	< 3	< 0.5	< 7	13	< 2.4
5.5	échant. 2015	16-636	< 8	< 2.5	< 0.5	< 6	< 8	< 2.1
3.C.2	échant. 2015	16-637	< 9	< 3	< 0.5	< 6	< 9	< 2.3
4.1.A	échant. 2015	16-638	10	< 2.5	0.8	< 6	23	14.2
4.4	échant. 2015	16-639	< 8	< 2.5	< 0.5	< 6	< 8	< 2.2
3.B.3	échant. 2015	16-640	11	< 3	< 0.5	< 7	< 9	3
4.6	échant. 2015	16-641	< 9	4	0.7	< 6	25	17
4.5	échant. 2015	16-642	11	< 3	1	< 7	40	18
4.3	échant. 2015	16-643	9	< 2.1	< 0.4	< 5	< 7	< 1.8
6.7	échant. 2015	16-644	< 9	< 3	0.8	< 6	18	5
6.4	échant. 2015	16-645	< 10	< 3	< 0.6	< 7	19	< 2.6
2.4	échant. 2015	16-646	13	< 3	< 0.6	< 7	13	7
6.3	échant. 2015	16-647	7	< 2.2	< 0.4	< 5	< 7	< 1.9
6.5	échant. 2015	16-648	< 8	< 2.5	0.6	< 6	10	4
5.3	échant. 2015	16-649	< 9	< 3	< 0.5	< 6	< 9	< 2.3
5.7	échant. 2015	16-650	10	< 2.6	0.9	< 6	23	5
6.6	échant. 2015	16-651	< 10	< 3	< 0.6	< 7	30	< 2.5
6.2	échant. 2015	16-652	10	< 2.6	< 0.5	< 6	9	< 2.3
6.1	échant. 2015	16-653	< 9	< 2.6	< 0.5	< 6	< 9	< 2.2

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

5.6	échant. 2015	16-654	100	0.0037	0.11	0.0778	0.002	
2.2 DUP	échant. 2015	16-655	92	0.228	2.86	1.2	0.0081	
				<b>Si 251.611</b>	<b>Ti 334.941</b>	<b>Al 396.152</b>	<b>Fe 238.204</b>	<b>Mn 257.610</b>

			% SiO2	% TiO2	% Al2O3	% Fe2O3	% MnO
BL F1-1	standard	16-656	< 0.012	< 0.0002	< 0.001	< 0.0006	< 0.0001
BHVO2-1	standard	16-832	49.8	2.74	13.2	12.2	0.154
BCR-2	standard	16-833	54.1	2.29	13.2	14	0.182
RGM-1	standard	16-834	73.3	0.254	13.3	1.69	0.0316
BIR-1	standard	16-835	48	0.95	15.3	11.2	0.158
DTS-1	standard	16-836	41	0.0033	0.186	8.27	0.11
sarm 1	standard	16-837	74.2	0.0847	11.5	1.77	0.0148

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

5.6	échant. 2015	16-654	0.0044	< 0.001	0.08	0.08	< 0.011
2.2 DUP	échant. 2015	16-655	0.198	0.035	0.27	0.68	0.04
			<b>Mg 280.270</b>	<b>Ca 396.847</b>	<b>Na 588.995</b>	<b>K 766.491</b>	<b>P 213.618</b>
			<b>% MgO</b>	<b>% CaO</b>	<b>% Na2O</b>	<b>% K2O</b>	<b>% P2O5</b>
BL F1-1	standard	16-656	< 0.0001	< 0.0008	< 0.04	< 0.04	< 0.009
BHVO2-1	standard	16-832	7	11.2	2.3	0.55	0.24
BCR-2	standard	16-833	3.51	7.11	3.3	1.8	0.32
RGM-1	standard	16-834	0.258	1.28	4.1	4.3	0.03
BIR-1	standard	16-835	9.4	13.1	1.9	< 0.05	< 0.012
DTS-1	standard	16-836	49.8	0.126	< 0.05	< 0.05	< 0.012
sarm 1	standard	16-837	0.0294	0.822	3.4	4.9	< 0.013

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

5.6	échant. 2015	16-654	0.01	2.3	< 2.6	< 6	30
2.2 DUP	échant. 2015	16-655	< 0.006	87.4	< 2.7	< 6	54
			<b>S 180.669</b>	<b>Ba 455.403</b>	<b>Cd 226.502</b>	<b>Co 230.786</b>	<b>Cr 267.716</b>

			% Soufre	ppm Ba	ppm Cd	ppm Co	ppm Cr
BL F1-1	standard	16-656	< 0.005	< 0.3	< 2.1	< 5	< 5
BHVO2-1	standard	16-832	0.022	126	< 2.6	45	290
BCR-2	standard	16-833	0.037	664	< 2.1	38	15
RGM-1	standard	16-834	< 0.007	813	< 3	< 7	< 7
BIR-1	standard	16-835	< 0.007	6	< 3	51	390
DTS-1	standard	16-836	< 0.006	< 0.4	< 2.7	142	3960
sarm 1	standard	16-837	0.014	108	< 3	< 7	11

## ANALYSE D'ÉCHANTILLONS PAR ICP-AES

Client: Uragold Bay Resources inc.

Laboratoire INRS Centre Eau Terre et Environnement (responsable S. Prémont , M.Sc. Chimiste)

5.6	échant. 2015	16-654	< 9	< 2.6	< 0.5	< 6	11	< 2.2
2.2 DUP	échant. 2015	16-655	47	7	3.1	32	40	79
			<b>Cu 327.395</b>	<b>La 408.671</b>	<b>Sc 361.383</b>	<b>V 292.401</b>	<b>Zn 206.200</b>	<b>Zr 343.823</b>
			<b>ppm Cu</b>	<b>ppm La</b>	<b>ppm Sc</b>	<b>ppm V</b>	<b>ppm Zn</b>	<b>ppm Zr</b>
BL F1-1	standard	16-656	< 7	< 2.1	< 0.4	< 5	< 7	8
BHVO2-1	standard	16-832	114	14.4	32	370	97	180
BCR-2	standard	16-833	16	23	33	491	126	193
RGM-1	standard	16-834	17	22	4.4	13	30	230
BIR-1	standard	16-835	117	< 3	44	370	72	17
DTS-1	standard	16-836	14	< 2.7	3.5	7	40	< 2.3
sarm 1	standard	16-837	17	106	< 0.6	< 7	40	280