



**BC Geological Survey
Assessment Report
38101**



Ministry of Energy, Mines & Petroleum Resources
Mining & Minerals Division
BC Geological Survey

**Assessment Report
Title Page and Summary**

TYPE OF REPORT [type of survey(s)]: Geological & Geochemical

TOTAL COST: 50,400

AUTHOR(S): Jeffrey D. Rowe SIGNATURE(S): _____

NOTICE OF WORK PERMIT NUMBER(S)/DATE(S): _____ YEAR OF WORK: 2018

STATEMENT OF WORK - CASH PAYMENTS EVENT NUMBER(S)/DATE(S): 5724157/ December 28, 2018
5745465/ June 20, 2019

PROPERTY NAME: Crown

CLAIM NAME(S) (on which the work was done): Tenures 394820, 394822, 508809, 508810, 1036954

COMMODITIES SOUGHT: Au, Ag, Cu, Pb Zn

MINERAL INVENTORY MINFILE NUMBER(S), IF KNOWN: 104B-014, 015, 019, 618, 201, 671, 672, 202, 166, 341, 242, 289, 168, 169, 674

MINING DIVISION: Skeena NTS/BCGS: 104B/ 8

LATITUDE: 56 ° 21 ' 56 " LONGITUDE: 130 ° 16 ' 09 " (at centre of work)

OWNER(S):
1) Tudor Gold Corp. 2) _____

MAILING ADDRESS:
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Vancouver, BC V6C 3N6

OPERATOR(S) [who paid for the work]:
1) Tudor Gold Corp. 2) Teuton Resources Corp.

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PROPERTY GEOLOGY KEYWORDS (lithology, age, stratigraphy, structure, alteration, mineralization, size and attitude):
The Crown property is an early-stage VMS and vein type Au-Ag-Cu-Pb-Zn prospect located in north-central British Columbia, within the Stikine Terrane, which is the locale for several major deposits in the region, and it is underlain by similar lithologic units to those that host the world class Eskay Creek VMS deposit as well as the high grade gold-silver deposits at Brucejack (4 kilometres to the north) and copper-gold porphyry deposits at KSM (3 kilometres to the north)

REFERENCES TO PREVIOUS ASSESSMENT WORK AND ASSESSMENT REPORT NUMBERS: AR 36681, 35763, 35635, 34406, 34246, 33956

TYPE OF WORK IN THIS REPORT	EXTENT OF WORK (IN METRIC UNITS)	ON WHICH CLAIMS	PROJECT COSTS APPORTIONED (incl. support)
GEOLOGICAL (scale, area)			
Ground, mapping	Recon mapping, evaluation	394820, 394822, 508809, 508810,	20,000
Photo interpretation		1036954	
GEOPHYSICAL (line-kilometres)			
Ground			
Magnetic			
Electromagnetic			
Induced Polarization			
Radiometric			
Seismic			
Other			
Airborne			
GEOCHEMICAL (number of samples analysed for...)			
Soil			
Silt			
Rock	96 - 35 elem ICP + Au fire assay	394820, 394822, 508809, 508810,	30,400
Other		1036954	
DRILLING (total metres; number of holes, size)			
Core			
Non-core			
RELATED TECHNICAL			
Sampling/assaying			
Petrographic			
Mineralographic			
Metallurgic			
PROSPECTING (scale, area)			
PREPARATORY / PHYSICAL			
Line/grid (kilometres)			
Topographic/Photogrammetric (scale, area)			
Legal surveys (scale, area)			
Road, local access (kilometres)/trail			
Trench (metres)			
Underground dev. (metres)			
Other			
TOTAL COST:			50,400

2018
GEOCHEMICAL &
GEOLOGICAL RECONNAISSANCE
on the
CROWN PROJECT

Upper Unuk River Area

(N.T.S. 104B/8)

Skeena Mining Division,

Northwestern British Columbia

Approximately centered at

Latitude 56° 21' 56'' N, Longitude 130° 16' 09'' W

UTM 421600 E, 6247500 N (NAD83 Z9)

Prepared for

Tudor Gold Corp.

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April 11, 2019

(Revised Sep. 6, 2019)

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1.0 Summary

The Crown Project covers 183.5 square kilometres adjacent to the KSM Cu-Au-Ag-Mo deposits and the Valley of the Kings gold-silver deposit (Brucejack Mine), and is 13 km north of the historic Granduc Cu-Au-Ag mine. This report details reconnaissance geological exploration and rock geochemical sampling that was undertaken in three separate parts of the Crown project area in search of gold, silver and base metals mineralization.

Directly to the north of the property, the KSM project comprises four separate deposits, Kerr, Sulphurets, Mitchell and Iron Cap; spread over an area measuring about two by ten kilometres. Together they hold resources of 2.9 billion tonnes with an average grade of 0.54 g/t Au, 0.21% Cu, 2.7 g/t Ag and 44 ppm Mo (Seabridge Gold website). The Crown claims lie just 3 km south of the Kerr deposit, near the southern extension of the KSM trend. The property is also situated near the south end of the Brucejack Fault, along which a number of gold showings are located, extending northerly several kilometres from the Valley of the Kings (VOK) gold-silver deposit.

The Crown project area is underlain by volcanic and sedimentary rocks of the Upper Triassic Stuhini Group and the Lower Jurassic Hazelton Group that formed in successive island arc environments. The northwestern claim area is underlain by an Eocene granitic batholith that is probably an outlier from the extensive Coast Range intrusions found farther to the west. Smaller intrusions of Triassic to mid-Jurassic diorite are present in the western property area cutting Stuhini Group rocks. Other intrusions may be present, however, due to extensive glacial ice coverage on the central claims they may be hidden from view. These lithologic units comprise the same rock types that host many of the nearby mineral deposits, several of which are closely associated with small stocks of Early Jurassic age.

Reconnaissance rock sampling was undertaken in 2018 in three different parts of the property by a team of geologists, providing anomalous precious metals values from quartz sulphide veins and narrow breccia/ stockwork zones but, most significantly, from a showing of banded pyrite in a siliceous matrix that resembles an exhalative horizon with underlying sulphide-rich feeder veins.

The property is largely covered by glacial ice but the fact that it is adjacent to high-grade vein deposits and large Au-Cu porphyry deposits makes it a very prospective target area to explore for various styles of mineralization. In addition, Eskay Creek-equivalent stratigraphy is present on the east side of the property where exhalative-style mineralization has been discovered. The rapid ablation of the icefields in some parts of the property has provided new bedrock exposures with

potential to contain mineralization on surface that was previously unknown. Accordingly, part of the geological reconnaissance and sampling that was undertaken in 2018 was targeting recently exposed areas at the edges of icefields. Further geological reconnaissance, prospecting and geochemical exploration is warranted around some of the anomalous 2018 sample stations and if further compelling evidence is found then geophysical surveying should be conducted to test areas at depth and under ice cover.

2.0 Location, Access, and Physiography

The Crown project is located in the Skeena Mining Division in northwestern British Columbia, approximately 45 kilometres north-northwest of the village of Stewart and 30 km southeast of the road accessible Eskay Creek mine site, which is connected to highway 37 by a 55 kilometre-long, gated, gravel access road (figs. 1 and 2). The east side of the property is close to a gravel road that runs north from Stewart to the Scottie Gold project, and from there continues northerly to adjacent mineral prospects. The west side of the property is 12 km north of the historic Granduc minesite, which is connected to the Stewart-Scottie Gold access road by a 17 km-long un-maintained tunnel. The center of the property is at approximately $56^{\circ} 21' 56''$ N latitude and $130^{\circ} 16' 09''$ W longitude, or UTM 421600 E, 6247500 N (NAD83 Z9) on NTS map sheet 104B/8.

Access to the property currently is via helicopter from a base in Stewart, 45 km to the south-southeast. Stewart is 330 road-km, about a 4 hour drive, via highways 16, 37 and 37A from Smithers, which receives regular scheduled flights from major centers. During the exploration season, helicopters may also be based at Bob Quinn airstrip, located 60 km north of the property.

The Northwest Transmission powerline, which extends along highway 37 to a substation near Bob Quinn Lake, could provide a potential future supply of readily accessible power. The powerline is 40 km east of the property.



Figure 1. Crown project location in northwest BC

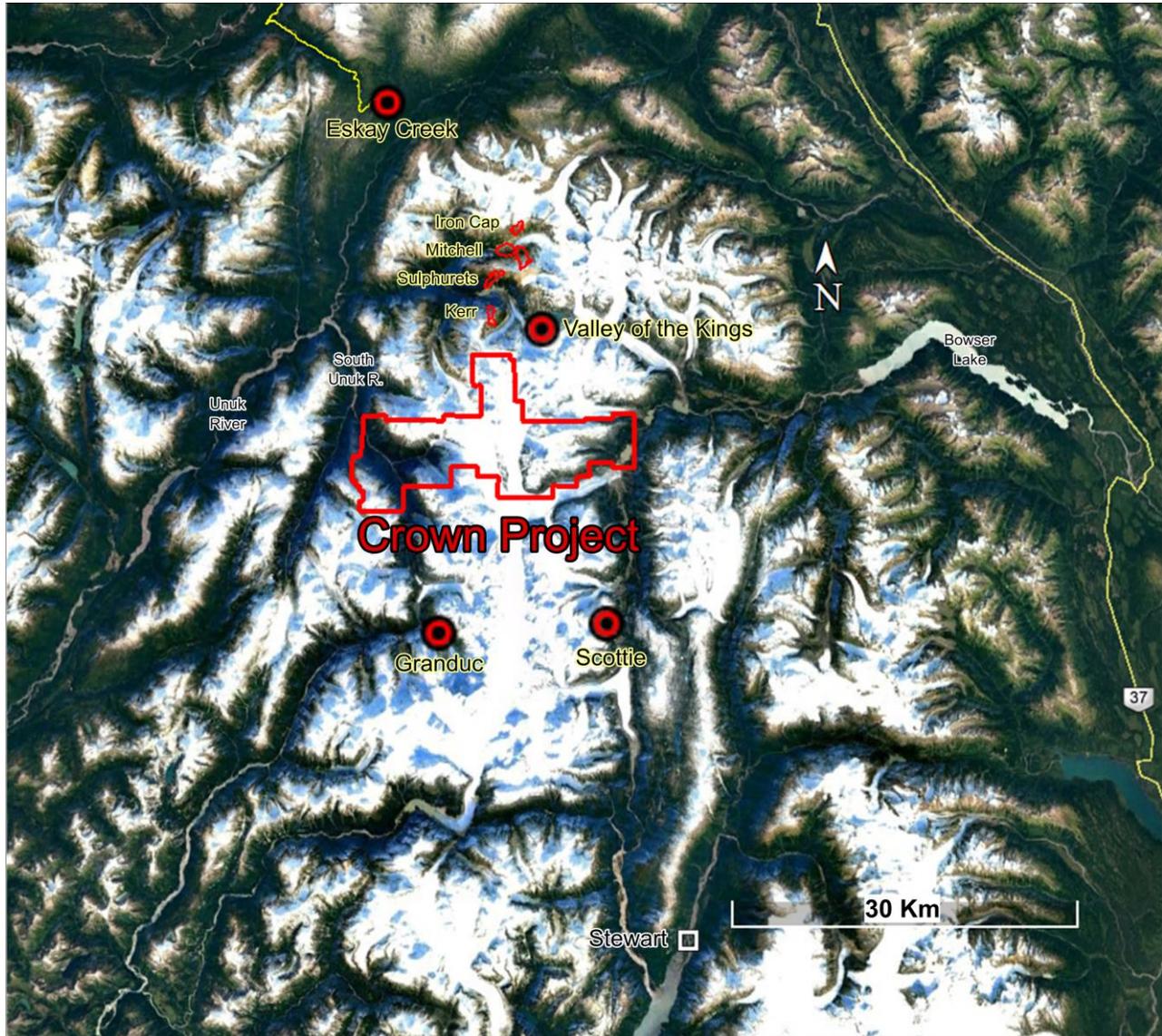


Figure 2. Crown project, located in the upper Unuk River area, is adjacent to several major mineral deposits; some of which are current or past producing mines

The claims cover some of the highest peaks in the region, rising above several glacier-filled valleys, with elevations of many peaks over 2100 m, and up to 2500 m in the northern and central claims. Broad expanses of glacial ice cover the central and east-central parts of the property (fig. 2). The western claims have the largest amount of bedrock exposure, found on the steep mountainsides flanking the northwest flowing South Unuk River. On the eastern claims east-trending, steep-sided valleys also have extensive bedrock exposures. The lowest elevations are on the western claims, along the South Unuk River, where it drops from 520 m to 360 m as it crosses the property. On the east edge of the property a small pond at the toe of an east-trending glacier lies at 510 m elevation.

Small streams cascade down many of the steep hillsides to join larger creeks that flow westerly into the South Unuk River or easterly into a river that drains into Bowser Lake, 20 km to the east.

The tree line lies at about 1,250 m ASL, below which relatively sparse forests of mostly hemlock and balsam fir are developed, primarily on the western and far eastern claims. Above tree line the hillsides are generally steep and rocky with limited vegetation of grasses and low brush. Lower slopes of glaciated valleys commonly are blanketed in boulder and gravel till that extends several hundred metres upslope from the ice. Soil development is very poor, consisting of either glacial till or talus fines.

The climate is generally that of a northern coastal rainforest, with subarctic conditions at high elevations. Precipitation is high with an annual total precipitation (rainfall and snow equivalents) estimated to be somewhere between the historical averages for the Eskay Creek Mine and Stewart, BC. These range from 801 to 1,295 mm of rain and 572 to 1,098 cm of snow, respectively (data to 2005) (Ghaffari et al., 2016). Normal field work can be conducted from about late June through to early October. Although some of the mountain peaks are very rugged and challenging for access, much of the bedrock exposure in the area can be traversed with care on foot.

3.0 Claims

The Crown property consists of 49 contiguous mineral claims covering approximately 183.5 square kilometres as shown on Figure 3 and listed in Table 1. The claims comprising the property are MTO “cell” tenures that were staked between July, 2002 and September, 2018 and most are subject to option agreements whereby Tudor can earn 100% interest in the claims, subject to royalties retained by the vendors. The assessment credits for the cost of the 2018 geological and geochemical program were applied to five of the claims to extend their expiry dates to July 10, 2019, and exploration costs are itemized in Section 11, Statement of Expenditures.

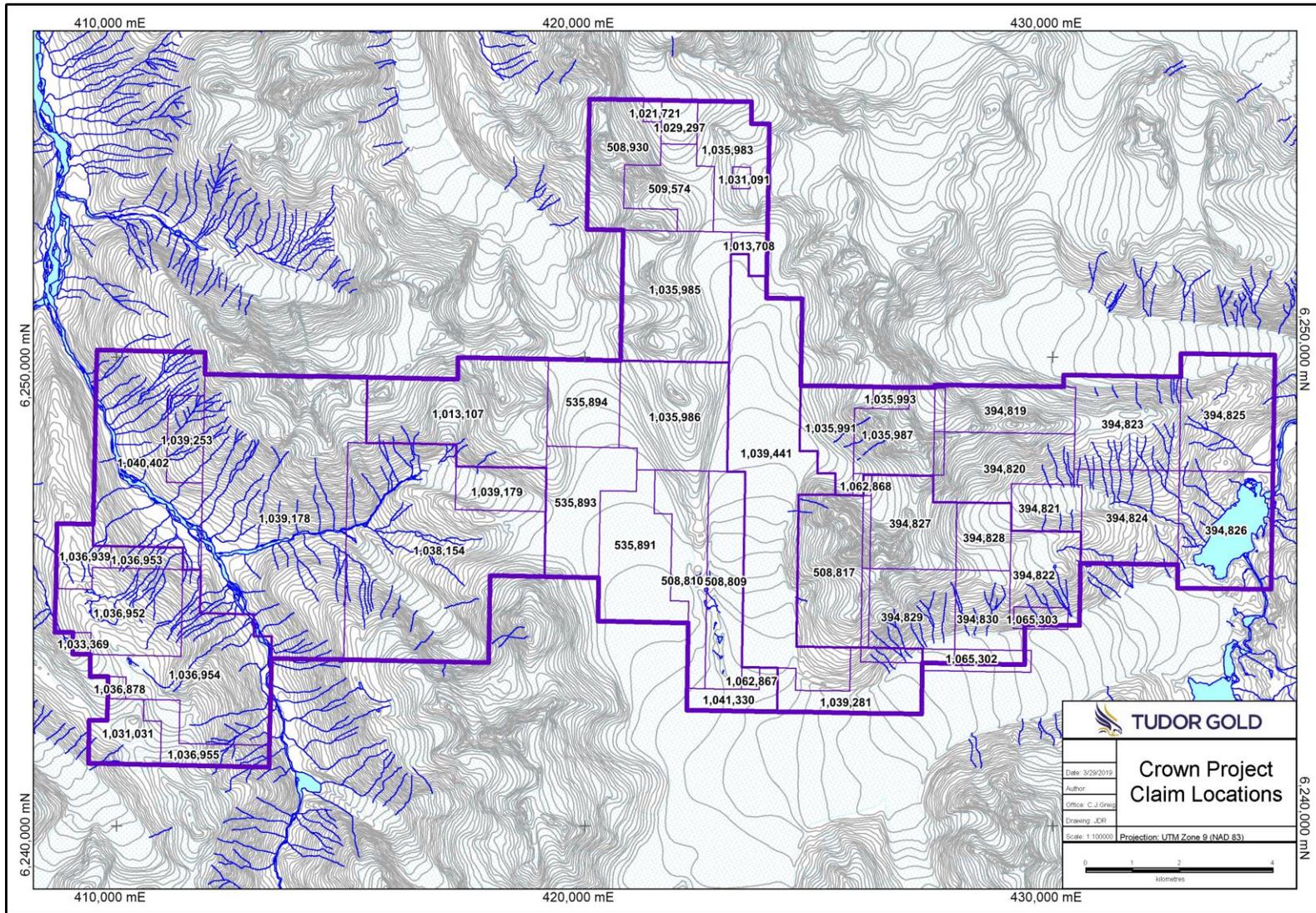


Figure 3. Crown tenures with topography

Table 1. Crown Claims List as of April 1, 2019

Tenure No.	Claim Name	Issue Date	Good To Date	Area (ha)
394819	DELTA 1	2002/JUL/02	2022/DEC/11	300.00
394820	DELTA 2	2002/JUL/02	2022/DEC/11	450.00
394821	DELTA 4	2002/JUL/02	2022/DEC/11	150.00
394822	DELTA 5	2002/JUL/02	2022/DEC/11	300.00
394823	DELTA 6	2002/JUL/02	2022/DEC/11	500.00
394824	DELTA 8	2002/JUL/02	2022/DEC/11	500.00
394825	DELTA 7	2002/JUL/02	2022/DEC/11	500.00
394826	DELTA 9	2002/JUL/02	2022/DEC/11	500.00
394827	DELTA 10	2002/JUL/02	2023/DEC/11	400.00
394828	DELTA 11	2002/JUL/02	2022/DEC/11	300.00
394829	DELTA 12	2002/JUL/02	2023/DEC/11	400.00
394830	DELTA 13	2002/JUL/02	2023/DEC/11	300.00
508809		2005/MAR/11	2022/AUG/15	358.62
508810		2005/MAR/11	2022/AUG/15	322.73
508817		2005/MAR/11	2022/JUL/15	502.05
508930	High W	2005/MAR/14	2022/JUL/15	357.89
509574	High C3	2005/MAR/23	2022/JUL/15	250.55
535891	ER3	2006/JUN/18	2022/AUG/15	448.24
535893	RIFFY1	2006/JUN/18	2023/JUL/15	394.35
535894	RIFFY 2	2006/JUN/18	2023/JUL/15	286.65
1013107		2012/SEP/22	2023/SEP/22	716.67
1013708		2012/OCT/13	2023/OCT/13	53.71
1021721	WHATS UP	2013/AUG/16	2019/DEC/30	17.89
1029297	HIGH HOPES	2014/JUN/30	2019/DEC/30	71.56
1031031		2014/SEP/18	2019/DEC/30	179.46
1031091	TUO	2014/SEP/22	2019/DEC/30	17.90
1033369		2015/JAN/14	2019/DEC/30	17.94
1035983	High 6	2005/MAR/23	2023/JUL/15	339.99
1035985	High 8	2005/MAR/11	2023/AUG/15	644.62
1035986	High 9	2005/MAR/11	2023/AUG/15	519.58
1035987	Deltaex 1	2005/MAR/11	2023/JUL/15	304.61
1035991	Extension 1	2006/JUN/29	2023/JUL/15	232.93
1035993		2006/JUN/29	2022/JUL/15	35.83
1036878		2015/JUN/23	2019/DEC/30	17.94
1036939	GRACE NW	2015/JUN/29	2019/DEC/30	125.51
1036952	GOLDEN GRACE 2	2015/JUN/29	2019/DEC/30	430.45

1036953	GRACE N	2015/JUN/29	2019/DEC/30	71.72
1036954	GRACE SE	2015/JUN/29	2019/DEC/30	699.69
1036955	GRACE S	2015/JUN/29	2019/DEC/30	161.52
1038154	STORM	2015/AUG/23	2019/DEC/30	1488.17
1039178	STORM 2	2015/OCT/08	2019/JUL/10	1792.55
1039179	STORM3	2015/OCT/08	2019/JUL/10	179.23
1039253	SHEELAGH	2015/OCT/12	2019/DEC/30	143.36
1039281	HUTTER	2015/OCT/13	2019/JUL/10	304.98
1039441	RILEY	2015/OCT/20	2019/JUL/10	1272.47
1040402	SHEELAGH 2	2015/DEC/05	2019/JUL/10	842.29
1041330	FM#1	2016/JAN/16	2020/DEC/30	107.65
1062867	ORIMAC	2018/SEP/07	2019/SEP/07	17.94
1062868	DELTAFAIR	2018/SEP/07	2019/SEP/07	17.92
			Total Area	18347.14

4.0 Regional Tectonic and Geologic Setting

The Crown property is underlain by Late Triassic to Middle Jurassic stratified volcanic and volcanoclastic rocks, volcanic flows and sedimentary units of the Stuhini and Hazelton Groups, which are found throughout much of Stikinia (Stikine Arch; fig. 4). Stikinia makes up a large part of the northern Intermontane Belt in this part of the northern Cordillera, and is bounded by rocks of the largely plutonic Coast Belt, which lie immediately adjacent to the west. Rocks making up Stikinia are almost exclusively of intra-oceanic island arc affinity, and were accreted to the North American continental margin in mid-Mesozoic time. In northwestern BC the Stikine terrane follows an arc-like trend that is known as the Stikine Arch, which hosts a number of economically significant Late Triassic to Early Jurassic porphyry copper (gold, molybdenum) deposits as well as an abundance of gold-rich mineral occurrences.

Regionally, Stikinia consists of mid-Paleozoic to Middle Jurassic oceanic volcano-sedimentary successions and coeval plutons that are commonly subdivided into Paleozoic, Triassic and Jurassic tectonic assemblages (Anderson, 1993). In the area surrounding the North Mitchell property rocks of the latter two assemblages are abundantly present.

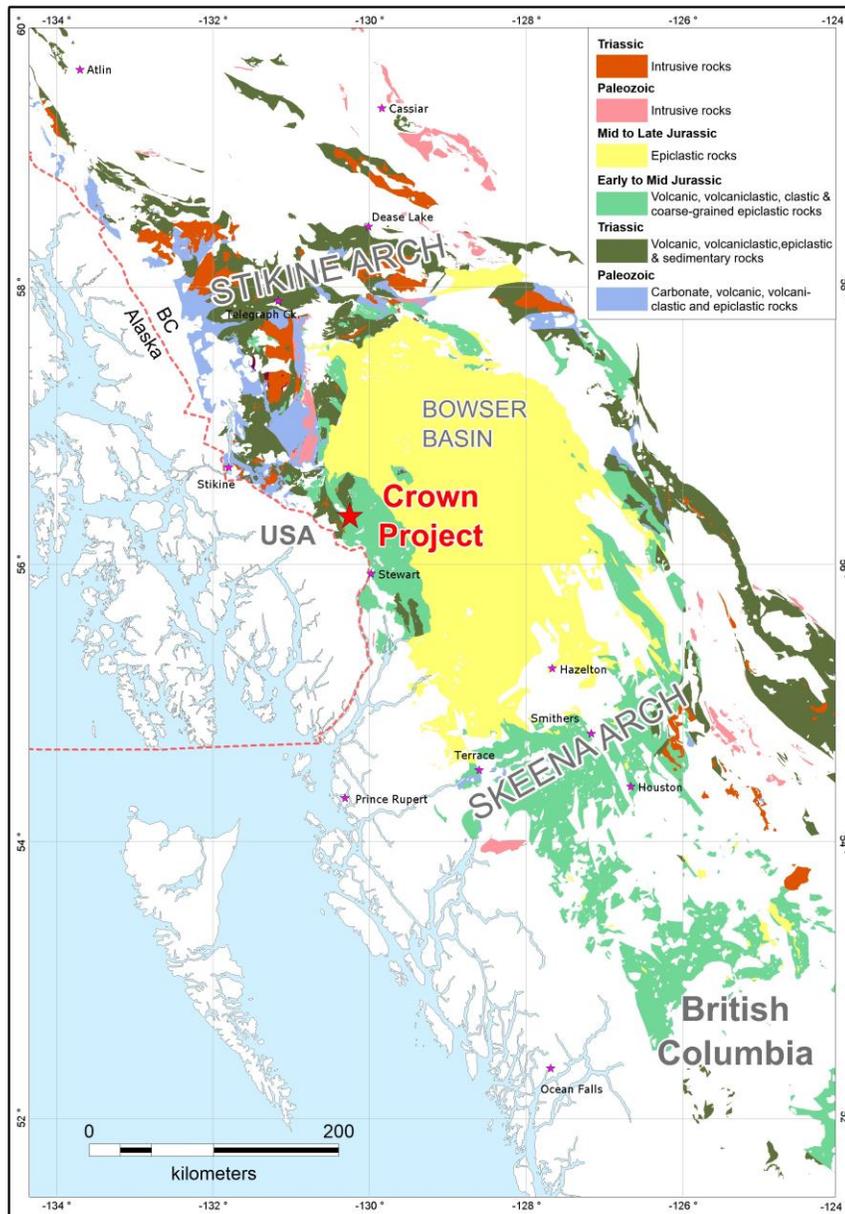


Figure 4. The Crown property location relative to Triassic and Jurassic rocks of the Stikine Arch

The property lies within a 300 km-long, northerly trending, commonly fault-bounded belt of Triassic and Jurassic rocks. Within this belt a structural feature known as the Eskay Rift was the site of deposition of Lower to Middle Jurassic volcanic and sedimentary rocks of the Hazelton Group (Alldrick, 2006). Studies have shown that the rifting may have begun in Early Jurassic time (191 Ma) (Alldrick, 2006) and that strata deposited within the Eskay rift generally have similar lithological characteristics; however, regionally they display a range of different facies

that may reflect proximity to volcanic centers. As well, some rift-fill sequences appear to have been deposited in isolation from those of adjacent rift segments, suggesting that they occupied nearby but unconnected basins (Alldrick, 2006). Deposition environments appear to have ranged from subaerial, to shallow water depth, to deep-water ocean floor settings (>1000 m). Associated exhalative mineral deposits are known within different segments of the Eskay Rift, such as at the nearby past-producing Eskay Creek deposit, as well as at the Anyox and Bonanza copper-silver deposits south of Stewart. Numerous showings comprised of similar mineralization have been found near each of these deposits, as well as along the rift zone to the north. The eastern part of the Crown property hosts lithologies from the upper part of the Hazelton Group, some of which could be equivalent to the “Eskay Creek mine stratigraphy” that hosts exhalative sulphide mineralization.

Small stocks in the area surrounding the property range in age from 195 to 187 Ma (Febbo et al., 2015) and may have partly coincided with the regional rifting events. Associated with some of these stocks, as well as the Stuhini and lower Hazelton Group rocks they intrude, are several very large porphyry Au-Cu deposits: primarily the Kerr, Sulphurets, Mitchell, Iron Cap and Snowfield deposits, all located within 3 to 12 km of the property. Additionally, lower Hazelton Group rocks host high grade epithermal gold vein stockworks at the Valley of the Kings deposit, located 4 km to the northeast.

4.1 Stratified Rocks

Souther (1972) has described the geologic history of the region as a successive series of volcanic arcs developed in marine settings ranging from sediment-poor to sediment-rich. The major stratigraphic components of the region are the Paleozoic Stikine Assemblage, and the Triassic to Jurassic Stuhini, Hazelton and Bowser Lake Groups.

The nearest Paleozoic rocks are 35 km northwest of the property and extend in a north-trending belt, ranging from 10 to 30 km wide (fig. 5). The Paleozoic rocks, shown in blue on figure 5, consist of volcanic flows and tuffs, thin-bedded clastic sedimentary rocks and limestone of Carboniferous to Lower Permian age. The predominant rock types include argillite, siltstone and conglomerate with calcareous interbeds and limestone or marble units, as well as basaltic to andesitic flows with crystal and lithic lapilli tuffs. This unconformity-bounded belt is in contact to the east with a belt of Upper Triassic and Jurassic sedimentary and volcanic rocks.

The Triassic-Jurassic belt is comprised mainly of the Stuhini and Hazelton Groups, shown in shades of green on Figure 5. The Upper Triassic Stuhini Group (fig. 5, light green) consists of a lower volcanic package with lesser intercalated sedimentary rocks, overlain by a thick upper sedimentary package with lesser interlayered volcanic rocks. Alldrick et al. (2004) have interpreted the Stuhini Group in the map area as a subaqueous accumulation of dacite, andesite and bimodal basalt-rhyolite volcanic rocks in a setting characterized by a progressively increasing accumulation of volcanoclastic sedimentary rocks with carbonate cement. The top of the Stuhini group is defined by a regional angular unconformity, overlain by Hazelton Group strata. Total thickness of Stuhini Group strata cannot be determined due to this truncation, but minimum thickness is 3,000 metres (Alldrick et al., 2004).

Gagnon et al. (2012) have noted that following deposition of the Stuhini Group, extension-controlled volcanism existed in the narrow, elongate, north-trending Eskay rift basin during the relatively short period between upper Early Jurassic and lower Middle Jurassic. Fault-controlled subsidence led to development of at least 12 north-trending sub-basins within the 300 km long by 50 km wide volcanic belt (Alldrick et al. 2005; Barresi et al. 2008). Volcanic and sedimentary units of the Hazelton Group (fig. 5, dark green) show great lateral and vertical variability because of the limited connectivity between sub-basins and the local nature of the volcanic processes. Quiescent depositional environments in some of the sub-basins were more prone to accumulation and preservation of exhalative sulphides (Alldrick et al., 2004). It has also been observed that felsic volcanism is commonly closely associated with mudstone intervals containing sulphide mineralization (Gagnon et al., 2012).

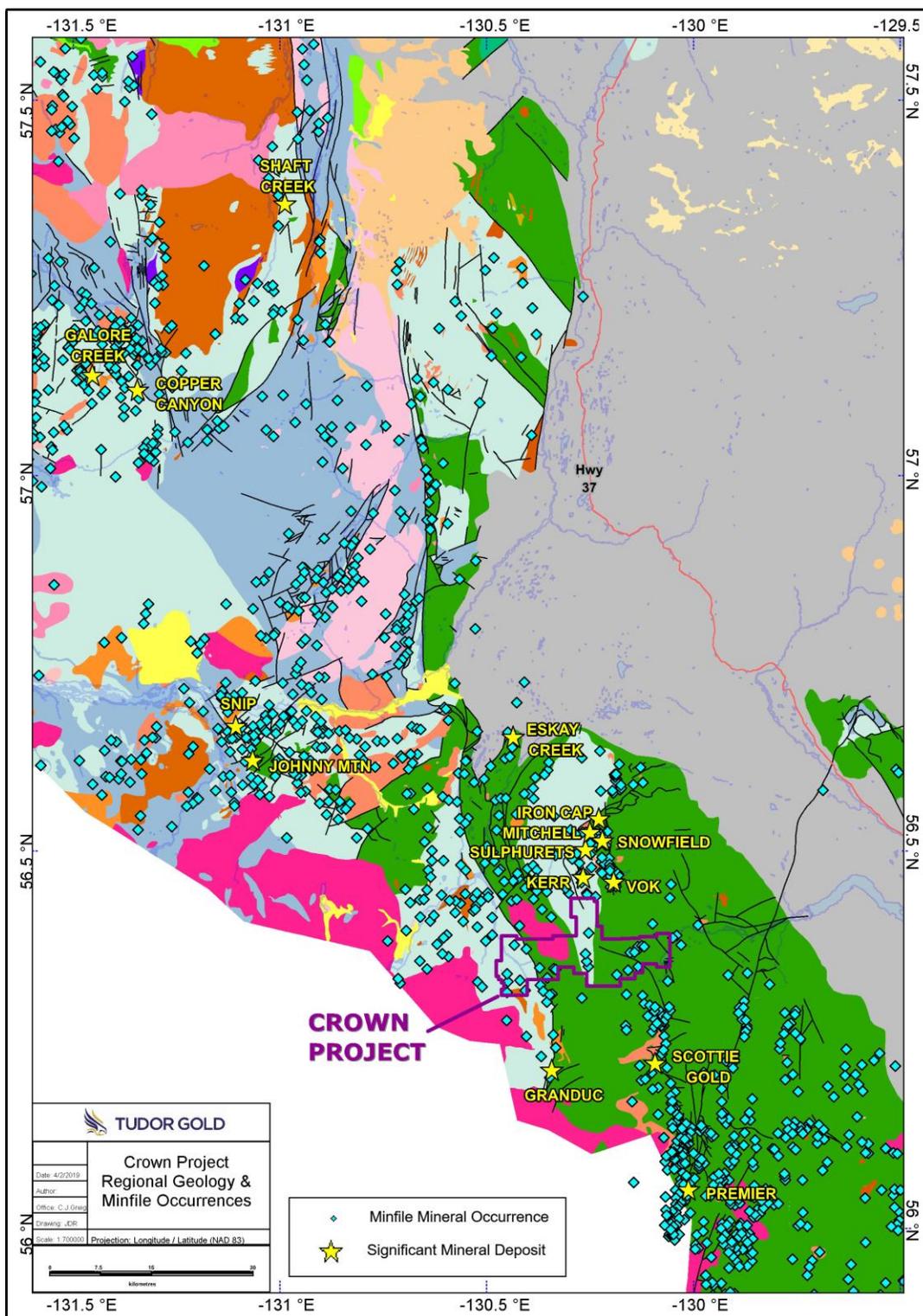


Figure 5. Geology and mineral showings in the region surrounding the Crown project (sources Massey et al., 2005 & BCGS Minfile Database) See Figure 6 for geology legend

Geology Legend

	PeEShgr - Cenozoic - Coast Plutonic Complex granitoid intrusive rocks
	QMI - Cenozoic - alkaline volcanic rocks
	Qvb - Cenozoic - basaltic volcanic rocks
	Pivk - Cenozoic - alkaline volcanic rocks
	ESvf - Cenozoic - rhyolite, felsic volcanic rocks
	JTqp - Mesozoic to Cenozoic - high level quartz phyric, felsitic intrusive rocks
	MJqm - Mesozoic - quartz monzonitic to dioritic intrusive rocks
	EJTCdg - Mesozoic - monzodioritic to gabbroic intrusive rocks
	LTrJCsy - Mesozoic - syenitic to monzonitic intrusive rocks
	MLTrP - Mesozoic - ultramafic rocks
	MLTrqd - Mesozoic - quartz dioritic intrusive rocks
	KPesc - Mesozoic to Cenozoic - Sustut Group coarse clastic sedimentary rocks
	mJKB - Mesozoic - Bowser Lake Group undivided sedimentary rocks
	ImJH - Mesozoic - Hazelton Group fine clastic sedimentary rocks and calc-alkaline volcanic rocks
	IJS - Mesozoic - Spatsizi Group undivided sedimentary rocks
	uTrSv - Mesozoic - Stuhini Group fine clastic sedimentary rocks and undivided volcanic rocks
	LDFdr - Paleozoic - dioritic to granitic intrusive rocks
	CSsc - Paleozoic - Stikine Assemblage sedimentary rocks and basaltic to rhyolitic volcanic rocks

Figure 6. Geology legend to accompany Figure 5

Within the Eskay rift, the lower part of the Hazelton Group, which consists of predominantly arc-related intermediate volcanic rocks, is separated by an unconformity from the upper Hazelton Group, comprised predominantly of bimodal rift-related volcanic rocks and fine-grained clastic rocks. The lower Hazelton Group includes a wide range of lithologies dominated by maroon and green andesitic to dacitic flows, associated volcanic breccias and tuffs, and sedimentary volcanoclastic rocks (Gagnon et al., 2012). These include the units defined in earlier geological mapping in the region; namely the Jack, Unuk River, Betty Creek and Mt. Dilworth formations. The lower Hazelton Group rocks lie unconformably on Triassic volcanic rocks of the Stuhini Group and, in some localities, Paleozoic rocks of the Stikine assemblage. Most volcanic rocks of the lower Hazelton Group are calc-alkaline to tholeiitic and most were deposited in subaerial, oxidizing environments, and likely developed into stratovolcanoes (Alldrick et al. 1989). Discontinuous siltstone beds attest to a marine emergent arc setting. The upper boundary of the

lower Hazelton Group is typically defined by an erosional surface that separates it from the overlying upper Hazelton Group.

The upper Hazelton Group specific to the region surrounding the Crown property has been defined by Gagnon et al. (2012) to include their newly proposed Iskut River Formation (previously called Salmon River Formation) in the lower part, overlain locally by Quock Formation. At the Eskay Creek type section described by Gagnon et al. (2012), rhyolite of the Iskut River Formation disconformably overlies lower Hazelton Group rocks comprised of andesitic breccia, volcanoclastic, and dacitic volcanic rocks. This unit, which has been termed “footwall rhyolite”, varies in texture from massive to auto-brecciated, and was interpreted by Bartsch (1993) to represent a series of flow-dome complexes. Overlying and inter-fingering in part with the rhyolite is a fine-grained dark grey sedimentary unit known as the “contact mudstone”. The contact is irregular along strike and is marked by rhyolite breccia, in which black mudstone fills the interstices of quench-fragmented rhyolite. Clasts in the mudstone include altered rhyolite, barite, and fragmental sulphides and sulphosalts (Roth 2002). The Eskay Creek deposit comprised stratiform volcanogenic massive-sulphide bodies at the base of the mudstone interval that were mined between 1995 and 2008, producing 2.18 million tonnes of ore with an average grade of 46 g/tonne Au and 2267 g/tonne Ag (Minfile No. 104B 008).

In excess of 150 metres of massive basalt sills and pillowed basalt flows and breccia, with thin (<1 m) intervals of bedded argillite, chert, and felsic tuff, overlie the contact mudstone. Conformably above this basalt sequence at Eskay Creek is a succession of tuffaceous mudstone, on the order of 50 metres thick, which Gagnon et al. (2012) have included in the Quock Formation. Conformably overlying the Quock Formation are thick turbidite and deltaic sedimentary sequences of the Middle to Late Jurassic Bowser Lake Group.

The Bowser Lake Group, (fig. 5, grey unit) is a thick, clastic marine sedimentary succession, including greywacke, chert pebble conglomerate, sandstone and mudstone. The lower Bowser Lake Group is a marine sequence of complexly inter-fingering deltaic, shelf, slope and submarine fan assemblages in excess of 3000 metres thick, sourced mostly from uplifted Cache Creek Group rocks in the northeast. These are overlain by several thousand metres of low energy fluvial deposits and sedimentary rocks of alluvial fan and braided stream systems.

4.2 Plutonic Rocks

Small plutonic bodies with a wide variety of compositions and ages occur near the property to the north and south and larger bodies are common in the region farther to the west and northwest (fig. 5). The oldest intrusions in the area form a belt trending north from a point about 45 km northwest of the property (fig.5, light pink). They are Late Devonian in age and together form one of the larger intrusive bodies in the region, which varies in composition from granite to hornblende diorite to local hornblendite. Other large intrusions comprised of Middle to Late Triassic hornblende quartz diorite to granodiorite (fig.5, dark orange) are found farther to the west and northwest of the property within a belt of roughly coeval Stuhini Group rocks. Localized ultramafic bodies of Middle to Late Triassic age are also found in the same area.

Sizeable stocks of Early Jurassic monzodiorite to gabbro (fig.5, medium orange) are located 25 to 45 km northwest of the property, where they cut rocks of the Stuhini and Hazelton Groups. Similar age, leucocratic porphyry plugs (Knipple and Inel Porphyry) are found near the property, to the north and south, cutting Stuhini and Hazelton Group rocks. These intrusions are part of the Texas Creek Plutonic Suite and have a number of associated mineral occurrences in the region, including the large porphyry gold-copper systems at Kerr-Sulphurets-Mitchell (KSM), 3 to 12 km north of the property, and the Red Chris porphyry copper-gold deposit, 140 km to the north-northeast. A number of small, poorly age-constrained, Triassic to Jurassic quartz diorite to quartz monzonite to syenite stocks intrude Stuhini and Hazelton Group rocks in the area surrounding the property, including two diorite stocks on the southwest claims. Some of these belong to the Copper Mountain Plutonic Suite and many may be coeval with their host volcanic rocks.

Located in the southwest part of the map area shown in Figure 5, Paleocene to Eocene granitoid stocks (fig. 5, dark pink) are probable outliers of the more massive Coast Belt plutons located farther to the west. A smaller outlier batholith of quartz monzonite is present in the northwest part of the property, intruded into Hazelton Group rocks.

Several of the plutonic episodes have mineral occurrences associated with them, especially concentrated near the contact zones of the intrusive bodies, as shown by Minfile occurrences plotted on Figure 5. Additionally, a majority of the occurrences are spatially associated with faults that trend north, northeast and northwest. These faults commonly occur along the boundaries between lithostratigraphic units and also at intrusive contacts (fig. 5). The KSM

porphyry deposits and related intrusive bodies are believed to be associated with northeast-trending, northwest-dipping thrust faults, which may extend southerly onto the Crown property.

5.0 Metallogenic Setting and Mineral Deposits

5.1 Metallogenic Setting

The Crown project lies within a mineral-rich belt of Stikine terrane rocks that flank the Coast Mountains in northwest British Columbia. This very prospective belt, also known as the “Golden Triangle”, stretches from the Stewart area on the south, to the Iskut area on the north, and is centered on the region surrounding the Crown property. It hosts a number of rich precious and base metals deposits such as Eskay Creek, Snip, Granduc, Silbak-Premier, Valley Of The Kings (Brucejack), KSM, Galore Creek, Schaft Creek and Red Chris (fig. 7). This part of British Columbia has a long and successful history of mining and mineral exploration, in spite of the sometimes challenging terrain, inclement weather, and lack of access and infrastructure. Several large-scale base and precious metals mining projects in the area are in the advanced stages of exploration or mine planning. Of particular significance to the Crown project are the nearby, large porphyry-style KSM Au-Cu deposits and, as well, there is good potential for gold-rich vein deposits such as those at the Valley of the Kings deposit; all found within similar geologic settings.

The deposits listed above are hosted by Stuhini or Hazelton Group rocks and are generally proximal to small, possibly coeval intrusions that may bear an association with mineralization. The dominant structural features in the region are north to northeast trending faults such as the Sulphurets thrust fault that lies in the hangingwall of the Kerr, Sulphurets, Snowfield and Iron Cap deposits and the Brucejack Fault, along which a number of gold occurrences are located (fig. 5). Also, in the region to the southeast, deposits of high grade base and precious metal mineralization have been discovered in structures cutting Jurassic intermediate volcanic rocks with associated intrusions, within an extensive, north-trending structural corridor that includes the Premier and Scottie Gold deposits (fig. 5).



Figure 7. Crown project location amongst significant mineral deposits in the “Golden Triangle” of northwestern BC (map credit Doubleview Capital Corp.)

Following are brief descriptions of some of the significant mineral deposits in the Golden Triangle that may provide models for exploration on the North Mitchell property.

The KSM deposits (Kerr, Sulphurets, Mitchell & Iron Cap) (fig. 5) of Seabridge Gold Inc. have been the subject of a September, 2016 preliminary feasibility study (Seabridge Gold website), which estimated measured plus indicated mineral resources totaling 2.9 billion tonnes grading 0.54 g/t gold, 0.21% copper and 2.7 g/t silver. An additional 3.0 billion tonnes are estimated in the inferred resource category grading 0.35 g/t gold, 0.31% copper and 2.2 g/t silver. Mineral bodies are associated with the “Mitchell Intrusions”, high level diorite to monzonite plugs and dikes that intrude volcanic and sedimentary rocks of the Stuhini and Hazelton Groups. The company envisages a combined open-pit/underground block caving mining operation that is scheduled to operate for 53 years. During the initial 33 years, open pit production would average 130,000 tonnes per day, thereafter reducing to 95,000 tonnes per day from underground operations. Flotation concentrate would be produced on site and trucked to Stewart, BC for shipment to smelters.

At the Brucejack project, Pretium Resources Inc. commenced commercial production of their underground mine in the Valley of the Kings zone (fig. 5) in late 2017. The deposit is described as transitional epithermal gold-silver mineralization within stockwork veining and breccias emplaced in host Hazelton Group flows, breccias, tuffs and associated sedimentary rocks. Mineralized stockwork veining is associated with zones of intense quartz-sericite-pyrite alteration that have developed along permeability boundaries within these rocks. A December, 2016 news release (Pretium Resources website) announced proven mineral reserves in the Valley of the Kings zone of 1.6 million ounces gold (3.3 million tonnes averaging 14.5 g/t Au), which is sufficient for the first three years of mine life. Proven plus probable mineral reserves in the Valley of the Kings total 8.1 million ounces gold (15.6 million tonnes grading 16.1 g/t Au). As outlined in a 2014 feasibility study, the mine will have an expected operating rate of 2700 tonnes per day, averaging 404,000 ounces of gold annually over the 18 year life of the mine, producing an estimated 7.27 million ounces of gold. Average mill feed grade is expected to be 14.1 g/t Au and the ore processing will involve gravity concentration and sulphide flotation.

The Eskay Creek deposit (fig. 5) was, during its operation, one of the world's highest valued gold-silver mines. The ore was comprised of polymetallic sulphide and sulfosalt mineralization that was deposited in a transitional environment between a hot spring and a deeper water volcanogenic massive sulphide exhalative system, and includes both feeder veins and massive sulphide bodies. Host rocks are volcanoclastic rocks of the Lower to Middle Jurassic Hazelton Group. Mining from 1995 to 2008 at Eskay Creek produced 2.1 million tonnes of ore yielding 101.65 tonnes of gold, at an average grade of 48.4 g/t Au, as well as 4942 tonnes of silver, at an average grade of 2221 g/t Ag (Minfile No. 104B 008).

The Scottie Gold deposit (fig. 5) consists of several mineralized quartz-carbonate veins, hosted by steeply east-dipping volcanoclastic rocks of the Hazelton Group cut by faults and lamprophyre, microdiorite and porphyry dykes. The veins each form an en echelon or ladder vein pattern across a 120 metre width and up to a 300 metre depth. The veins, which are up to 7 metres wide and average 2 metres wide, show variable sulphide content, with lenses of massive sulphide consisting largely of pyrrhotite and pyrite, with lesser sphalerite, chalcopyrite, galena, arsenopyrite, tetrahedrite and gold. The veins occur along near vertical fracture systems and are bordered by siliceous replacement zones with poorly defined walls. Mining was undertaken by Scottie gold Mines from 1981 to 1984, producing 2.98 M grams of gold and 1.62 M grams of silver from 160,000 tonnes of mined ore. Since that time intermittent drilling exploration has

been undertaken on the property and some non-compliant resources have been reported (Minfile No. 104B 034).

5.2 Local Mineral Occurrences

There are a number of reported mineral occurrences on the Crown property, as well as surrounding the property. Occurrences encompass several styles of mineralization, but are typically comprised of veins, disseminations or breccias with local wider zones of stockwork style mineralization that may be related to shear zones. Many of the narrower veins (generally <1m width) have returned high Ag, Pb and Zn values with lesser high Au values, but most are lacking in continuity. In the central part of the property quartz-arsenopyrite veins in brecciated rhyolitic rocks have returned gold values over respectable widths, such as 2.67 g/t Au over 13 metres. Indications of stratiform mineralization on the eastern claims include samples of argillite containing galena and sphalerite with values such as 0.48 percent zinc, 0.18 percent lead and 52.80 grams per tonne silver over 2.44 metres. In the same area argillite float boulders carry anomalous gold values ranging up to 13.89 grams per tonne gold, but the source is yet to be discovered. The occurrences on the property are recorded and described in the British Columbia Government's "Minfile" database, from which their locations are plotted on Figure 8. Summaries of the Minfile listings for all the showings located on the property are documented below.

Sheelagh Creek showing (Minfile 104B 389) in the west part of the property is hosted by Stuhini Group. The showing consists of a 2.5 to 3.5-metre wide quartz vein striking approximately 045 degrees and dipping about 75 degrees to the northwest. It is traceable over 8 metres before it disappears under the surrounding overburden/greywacke/sandstone. Mineralization consists of disseminated to semi-massive pods of pyrite. Three one-metre chip samples were taken across the face of vein and assay results averaged 15.77 grams per tonne gold and 41.83 grams per tonne silver over 3.0 metres (Assessment Report 24965). A selected grab sample yielded values of 61.37 grams per tonne gold and 109.4 grams per tonne silver (Assessment Report 24965).

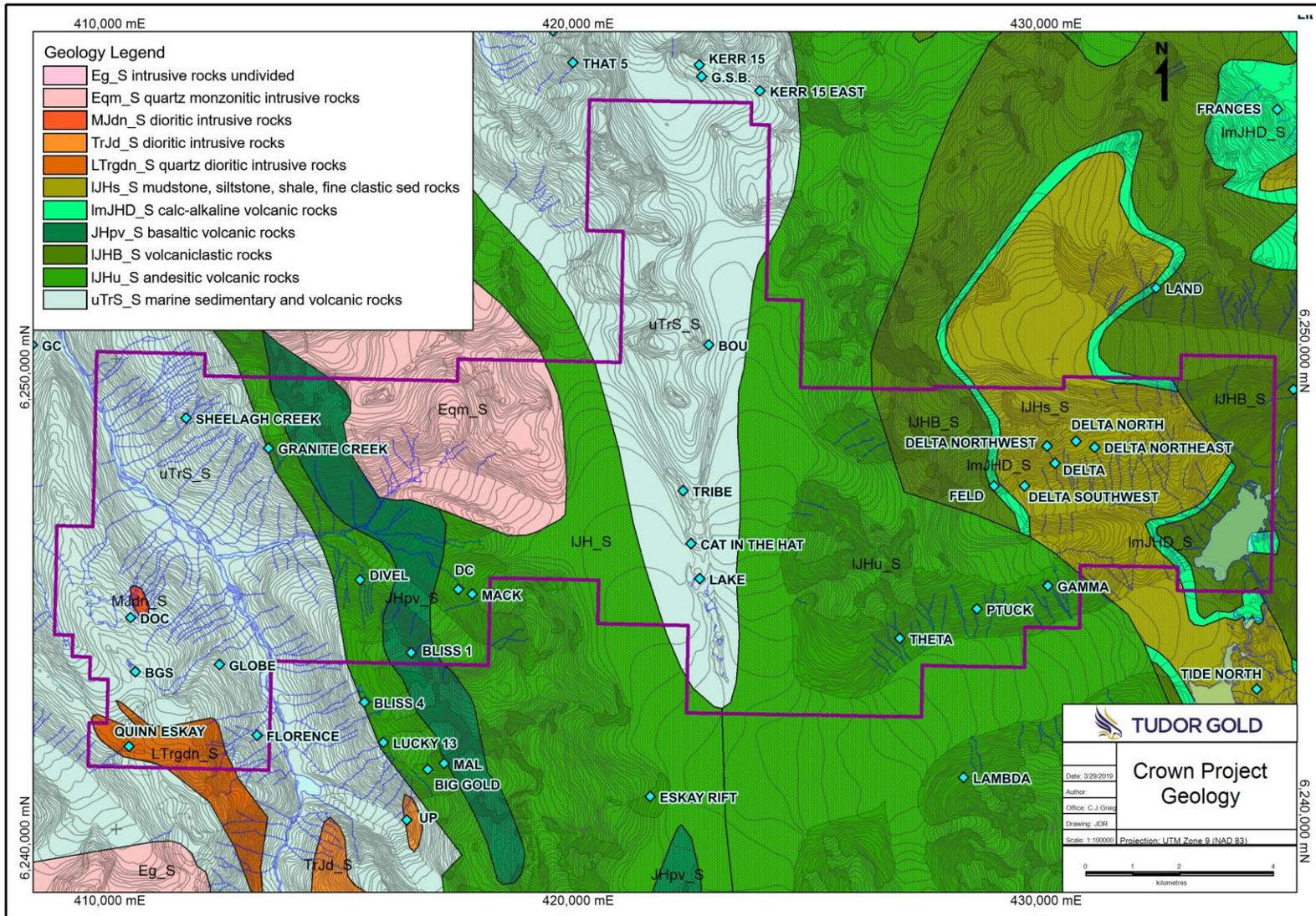


Figure 8. Geology and Minfile mineral occurrences on the Crown property (sources Massey et al., 2005 & BCGS Minfile Database)

Granite Creek showing (Minfile 104B 229) area is underlain by the northwest trending contact between Hazelton Group andesitic volcanics and Stuhini Group (on the west) marine sedimentary and volcanic rocks. Traces of copper mineralization are reported to occur in an area of amphibolitic rock just east of a cataclasite zone. Malachite stains were also observed in rock less than a kilometre to the southwest (Property File, Geology Map - Newmont Exploration of Canada Ltd., 1960s).

The **Doc** occurrence (Minfile 104B 014) is hosted by folded and metamorphosed Stuhini Group andesitic tuffs with interbedded siltstone, wacke and marble that have been intruded by irregular dioritic dykes or sills and small monzodiorite plugs of Middle Jurassic age. Several mineralized veins, composed of milky white quartz, occur in a shear zone. These veins contain from 5 to 10 percent sulphides with associated precious metals. Three different types of mineralization occur:

- 1) quartz veining with specularite and gold
- 2) quartz veining with galena, pyrite and gold
- 3) quartz veining with chalcopyrite and pyrite containing no precious metals.

The main vein structure (Q22) is about 2 metres wide and has been traced for a distance of 270 metres. The vein strikes at about 110 degrees and has a vertical to steep north dip. The main veins are comprised of massive white quartz with sparse sulphide mineralization (5-10%) consisting of galena, pyrite, chalcopyrite and sphalerite with associated specular hematite and magnetite. Precious metal values are mostly confined to the sheared edges of veins and immediately adjacent wall rock. Shear zones with very little quartz may also return good values. Sampling in 1985 revealed that 170 metres of vein structure averaged 15.43 grams per tonne gold and 59.66 grams per tonne silver across an average width of 2.3 metres (Assessment Report 15615). The veins have very restricted wallrock alteration aureoles, no apparent zoning, and appear to be limited to a few large fluid pathways. In this they display characteristics of mesothermal veins. Exploration has been concentrated on two main veins (Q22 & Q17), however there are a least seven known veins in the area.

The **BGS** (Minfile 104B 615) area is underlain by folded and metamorphosed Stuhini Group andesitic tuffs with interbedded siltstone, wacke and marble that has been intruded by irregular dioritic dikes or sills and small monzodiorite plugs of Middle Jurassic age. The showing consists of quartz vein rubble in “subcrop” exposed over an area of approximately 25 metres by 6 metres near the base of a snowfield. The vein material consists primarily of white quartz with abundant

pyrite and chalcopyrite, closely resembling the Q22/ QI7 veins of the Doc prospect, just over 1 kilometre north. Vein samples have returned up to 44.66 grams per tonne gold and 219 grams per tonne silver (Assessment Report 26256).

The **Quinn Eskay** occurrence (Minfile 104B 471) is underlain by the Stuhini Group, locally cross-cut by a small stock that displays a range of rock types including medium- to coarse-grained biotite \pm hornblende granite and granodiorite with minor quartz diorite. Pyritic mineralization occurs in quartz-carbonate veins hosted in schists and tonalites. Vein samples yielded values up to 0.828 gram per tonne gold, with up to 10.7 grams per tonne silver, 0.07 percent copper and greater than 0.5 percent lead (Assessment Report 32600).

The **Globe** showing (Minfile 104B 015) is underlain by folded and metamorphosed andesitic tuffs with interbedded siltstone, wacke and marble of the Stuhini Group. Quartz veins with galena, pyrite, specularite and associated gold are reported to occur in this area. The main vein, called the "Globe" vein, varies from 1 to 16 metres in width. One 6 metre trench sample contained a high value of 8.61 grams per tonne gold (Vancouver Stockwatch, December 17, 1987).

The **Florence** occurrence (Minfile 104B 019) area is underlain primarily by Upper Triassic volcanics which are probably correlative with the Stuhini Group. Dykes and small stocks of quartz feldspar porphyry, diabase, diorite of Tertiary age (?) are reported in the area. Nearby, a northwest trending cataclasite zone is developed along the trace of the South Unuk River. A wide (?) quartz vein carrying pyrite, chalcopyrite and galena occurs in unspecified country rock. High gold values were reported (Minister of Mines, Annual Report 1935, p. B11).

The **Divel** occurrence (Minfile 104B 215) is underlain by rocks of the Hazelton Group consisting of andesitic flows, tuffs and associated sediments that have a north to northwest structural trend. A fault with similar trend occurs immediately east of the showings. Complex alteration and deformation in the area are related to regional faulting and Jurassic and Tertiary plutonism. In addition, the degree of dynamic metamorphism increases toward the South Unuk River cataclasite zone (Grove, Bulletin 63). Galena occurs with quartz in an unspecified host rock. Traces of chalcopyrite, with up to 15 per cent pyrite are reported to occur in amphibolite outcrop a few hundred metres north and several hundred metres south of the vein.

The **Bliss 1** showing (Minfile 104B 216) is underlain by rocks of the Hazelton Group composed primarily of thick-bedded epiclastic volcanic rocks and lithic tuffs with closely associated pillow lavas, carbonate lenses and thin-bedded siltstones. A small gossan is reported to occur in basaltic (?) pillow lavas that contain up to 25 per cent pyrite and 2 per cent copper. A syenite body of unreported size and dimension outcrops approximately 300 metres west of the gossan zone. Chalcopyrite occurs in fractures within this body (Newmont Map). The syenite is likely related to the small syenite stock of Lower Jurassic or younger (?) age that occurs less than 3 kilometres to the south.

The **DC** showing (Minfile 104B 134) area is underlain by Hazelton Group composed primarily of thick-bedded epiclastic volcanic rocks and lithic tuffs with closely associated pillow lavas, carbonate lenses and thick-bedded siltstones. Galena is reported to occur, however, no details are provided.

The **Mack** occurrence (Minfile 104B 618) area is underlain by andesitic rocks of the Hazelton Group. Veins exist as simple, quartz fracture fillings up to 10 centimeters wide with minor pyrite (up to 4 percent) in millimeter-scale stringers and/or clots. Galena is present in isolated blebs or associated with the pyrite. Values of 1.63, 2.26 and 3.21 grams per tonne gold have been obtained from narrow quartz veins in outcrop; silver and copper values range widely in these samples to a maximum of 100 grams per tonne silver and 0.88 percent copper respectively, with sporadic zinc values up to 0.45 percent (Assessment Report 20676).

The area of the **Bou** showing (Minfile 104B 673) in the central part of the property is underlain by rock of the Stuhini and Hazelton Groups. Massive to disseminated mineralization consists of pyrite, chalcopyrite and arsenopyrite. The host rock is predominantly gossanous quartz-plagioclase-sericite schist. Two rock samples (B035, B037) yielded anomalous silver values of 15.3 grams per tonne and 10.1 grams per tonne with anomalous arsenic of up to 0.2 percent and trace gold (Assessment Report 18326).

The **Tribe** showing (Minfile 104B 201) is underlain by volcanic and sedimentary rocks tentatively correlated with the Hazelton Group, although more recent compilations indicate a correlation with the Stuhini Group. Host rocks consist of chert, andesite agglomerate and andesite tuff intruded by small syenite stocks. In areas of strong sericitic alteration, quartz and quartz-carbonate veins and stockworks are present that locally carry pyrite, pyrrhotite, arsenopyrite, sphalerite, and galena. The best gold assays were from samples of a stockwork zone

measuring 13 by 30 metres. The best vein assay from this zone was reported as 12.5 grams per tonne gold and 3.1 grams per tonne silver over 0.4 metre. Another sample from the same area contained 47.7 grams per tonne silver over 1.2 metres. A second vein, 30 metres to the northeast, was grab sampled, returning 28.3 grams per tonne gold and 34.3 grams per tonne silver (Assessment Report 16479).

The **Cat in the Hat** showing (Minfile 104B 672) is underlain by chert, andesite agglomerate and andesite tuff, originally tentatively correlated with the Unuk River Formation of the Hazelton Group, but more recently mapped as Stuhini Group, intruded by small syenite stocks. The showing consists of a wide stockwork zone of quartz-pyrite-arsenopyrite veinlets and fracture fillings. Within this zone, mineralization was also noted as massive pods and cement in voids between rhyolite breccia fragments. The stockwork zone has veinlets that strike in two directions; one is flat lying, with veinlets generally 1 centimeter wide with coarse cube pyrite and minor patchy arsenopyrite. The second veinlet direction is 310 degrees dipping shallowly to the northeast, with widths varying from 1 to 10 centimeters and containing finer grained pyrite and locally massive arsenopyrite.

Arsenopyrite totals 2 to 4 percent in the most fractured part of the stockwork area and, in heavily mineralized sections, the arsenopyrite may represent 20 percent of the narrow sulfide stringers. In addition to sulphides and quartz in the stockworks, pyrite and arsenopyrite occur as fine grained mineralization along minute fractures. The largest, most intensely fractured zone is at least 15 metres wide within the more extensive stockwork area. Arsenopyrite has been noted in amounts up to 40 percent as fracture filling in voids within fractured rhyolite. These pockets of arsenopyrite cemented fragments are generally sparse and usually are less than 1 metre in diameter. The stockwork zone is about 30 to 40 metres in length with overburden obscuring it to the south. It may be terminated or offset to the north by a north-south linear feature. The mineralized zone is readily apparent due to the dark red-brown weathered surface in comparison to the surrounding lighter red weathered surfaces and, within the zone, arsenopyrite mineralization is indicated by its distinct green oxidation colour.

Sampling of a gold-bearing quartz-pyrite-arsenopyrite stockwork zone exposed in a trench returned an average of 2.67 grams per tonne gold over 13 metres. Native sulphur was also reported (Assessment Report 23885). Sampling of brecciated rhyolite across an interval of 13 metres graded 2.54 grams per tonne and 1.36 percent arsenic. Further to the south, small quartz

carbonate veins were sampled carrying silver values up to 2434 grams per tonne (Assessment Report 23885).

The most prominent rock exposures consist of felsic rocks thought to be of the Mt. Dilworth Formation, locally marked by a series of intense gossans rich in pyrite and other sulphides and which, in certain discrete zones, host anomalous gold-arsenic mineralization. The felsic rocks are overlain by fine carbon-rich sediments, possibly of the Salmon River Formation, and underlain by andesitic rocks. It is suspected that zones of intense sericitic schist over widths of 2 to 3 metres represent alteration along shear zones.

The area of the **Lake** showing (Minfile 104B 671) is mapped as Stuhini Group. Carbonate alteration occurs within andesitic rocks along a contact with a syenite dike. The altered rocks contain discontinuous stringers and veins of massive to semi-massive galena and sphalerite with minor pyrite and abundant malachite stain. Sulphides form 40 percent of the rock locally. The aerial extent of the mineralization is restricted to a strike length of 50 metres and locally up to a width of 1 to 2 metres.

A grab sample assayed 20.88 grams per tonne gold, 637.38 grams per tonne silver, 66.06 percent lead, 1.53 percent zinc and 0.03 percent copper. A second grab sample about 50 m southwest of the first, assayed 4.56 grams per tonne gold, 2423.68 grams per tonne silver, 0.65 percent copper, 48.08 percent lead and 12.22 percent zinc (Assessment Report 24397).

In the eastern part of the property, the **Feld** occurrence (Minfile 104B 202) is located within a 75 to 150 metre wide band of felsic pyroclastic rock of the Mount Dilworth Formation, in upper Hazelton Group. Intense quartz-pyrite-carbonate-sericite alteration has obscured original lithologies, but they appear to be sheared tuffs. Hand trenching and rock chip sampling were undertaken over the area of most intense alteration. Two float boulders returned 3.5 to 7.0 grams per tonne gold. Best value from talus sampling was 5.2 percent zinc, 1.1 percent lead, and 26.8 grams per tonne silver (Assessment Report 16840).

The **Delta Southwest** occurrence (Minfile 104B 241) is located within a narrow band of felsic pyroclastic rock of the Mount Dilworth Formation, Hazelton Group. The mineralization occurs in an area of intense quartz-pyrite-carbonate-sericite alteration (Open File 1988-4; Fieldwork 1987). The showing area is comprised of calcareous rhyolite tuffs with flat to shallow dips. Underlying rocks consist of carbonaceous argillite with some limey sections. A steep dipping 150 degree

trending cross fault cuts these rocks. A small body of Eocene age feldspar porphyry intrudes just east of the area of interest.

A number of mineralized "minor steep dragfold nose dilations" and tension faults contain pyrite and tetrahedrite respectively. In one location visible gold was observed with the tetrahedrite. The tension faults appear to feather off of the main fault. One sample from a large gossanous outcrop containing massive pyrite assayed 2.06 grams per tonne gold, 10.63 grams per tonne silver, 0.01 percent copper, 0.11 percent lead, 0.02 percent zinc and 0.05 percent stibnite. The highest silver value obtained was 46.29 grams per tonne (Assessment Report 14607).

The area of the **Delta** occurrence (Minfile 104B 166) is underlain by Salmon River Formation siltstone sequence of the upper Hazelton Group. The sediments have been folded into synclines and anticlines with north trending fold axes. Small Eocene feldspar porphyry intrusions occur near the mineralized zone. The zone, of undetermined width, trends for several hundred metres in a north-northwest direction paralleling the eastern wall of the creek.

Reported mineralization includes very minor galena and sphalerite in argillite. A 2.44 metre wide sample taken across the zone near the glacier contained 0.48 percent zinc, 0.18 percent lead and 52.80 grams per tonne silver. Another sample from this zone taken about 600 metres to the north contained 0.62 percent copper, 0.69 percent lead, 0.76 percent zinc, 1.23 grams per tonne gold, and 10.97 grams per tonne silver. The highest silver value obtained was 95.32 grams per tonne silver (Assessment Report 14607). Reconnaissance rock geochemical sampling uncovered a number of argillite float boulders carrying anomalous gold values ranging up to 13.89 grams per tonne gold (Assessment Report 24267). The source was not located.

At **Delta Northwest** (Minfile 104B 341) a mineralized vein is hosted by sedimentary rocks of the Hazelton Group. The sediments have been folded along north trending fold axes. Small Eocene feldspar intrusions occur in the area. The vein is about 5.0 metres in length, varies from 2 to 15 centimeters in width, and appears to be a fracture filling in a silicified zone within black siltstone. The vein is composed of quartz, carbonate and massive tetrahedrite along with malachite, chalcopyrite, azurite and pyrite. Small parallel fractures in the vicinity are also mineralized, but to a much lesser degree. Two character samples from the vein contained 14,263 grams per tonne silver, 6.14 grams per tonne gold, and 17,966 grams per tonne silver, 4.32 grams per tonne gold (Assessment Report 16911).

The **Delta North** (Minfile 104B 242) area is underlain by siltstone and sandstone of the Hazelton Group. The sediments have been folded along north trending fold axes. Small Eocene feldspar porphyry intrusions cut area rocks. A large "sedex" pod containing jamesonite and siderite occurs in sedimentary rocks. One sample contained 14.41 percent lead, 2.77 percent zinc, 25.94 percent iron, 6.17 percent antimony, 1.85 grams per tonne gold, and 73.03 grams per tonne silver (Assessment Report 14607). The minerals are not indicated but are assumed to be galena, sphalerite, magnetite and stibnite.

The **Delta Northeast** (Minfile 104B 289) area is underlain by Hazelton Group intermediate volcanoclastic rocks. Small Eocene feldspar intrusions occur in this area. A mineralized zone occurs within a north trending, 100 to 150 metre wide band of sericite schist. This zone consists of small bands of pyrite, silicified sections and quartz veins. The quartz veins carry pyrite, chalcopyrite, bornite, tetrahedrite, argentite, sphalerite, galena, native gold, malachite and azurite. The sample with the highest assay contained 0.45 percent copper, 0.64 percent lead, 1.86 percent zinc, 0.34 percent antimony, 64.46 grams per tonne gold and 1357.38 grams per tonne silver (Assessment Report 14607). The Delta Northeast zone is within a broad soil anomaly defined by strongly anomalous gold, arsenic, lead, antimony and zinc that continues east of the showing (Assessment Report 31747).

Rocks in the area of the **Theta** showing (Minfile 104B 169) belong to the Hazelton Group and have been folded on a regional northwest-southeast axis, cut by faults and selective tectonism, locally hydrothermally altered and intruded by plugs of both Cenozoic and Mesozoic Age. As well, small Tertiary feldspar porphyry dykes, sills, and small plugs intrude the rocks and host related quartz-sulphide and epithermal metalliferous deposits.

Two quartz veins sampled in the southeastern corner of the Theta claim host mineralization over widths of 0.3 to 0.6 metre. The lower quartz vein, found in altered andesites, hosts galena, sphalerite, chalcopyrite and pyrite. Four samples taken from the vein over 1 to 2 metre widths ranged from 0.2 to 0.38 gram per tonne gold, 13.4 to 441.8 grams per tonne silver, 0.12 to 7.42 percent lead, 0.11 to 4.85 percent zinc, and 0.01 to 2.14 percent copper. To the north, the second quartz vein hosts lensoidal mineralization. A grab sample collected over 3 to 4 metres assayed 0.82 gram per tonne gold, 1520.0 grams per tonne silver, 19.6 percent lead, 7.75 percent zinc, and 0.64 percent copper (Assessment Report 16156).

Other nearby mineralization consists of a brecciated quartz-calcite vein which marks a contact between fine-grained andesite tuff to the north and pyritic agglomerate to the south. The vein hosts galena, sphalerite, chalcopyrite, pyrite, azurite, and malachite. The average of nine trench samples contained 1.84 grams per tonne gold, 41.41 grams per tonne silver, 0.05 percent lead, 0.27 percent zinc, and 0.08 percent copper (Assessment Report 16156). One of several rock samples taken in the vicinity assayed greater than 1500 grams per tonne silver and 0.5 to 1 gram per tonne gold (Assessment Report 31162).

The **Ptuck** showing (Minfile 104B 679) area is underlain by siltstones, sandstones and andesitic fragmentals of the Hazelton Group. The showing comprises a 5 to 10 metre wide shear zone hosting a 0.5 to 1 metre wide quartz-carbonate (ankerite?) vein with associated sphalerite +/- galena +/- chalcopyrite +/- tetrahedrite. Five samples were taken along the strike length with most significant values of 0.66 gram per tonne gold, 57.8 grams per tonne silver, 0.143 percent copper, 1.24 percent lead, and 16.60 percent zinc (Assessment Report 31747). The overall extent of the Ptuck zone is 50 by 70 metres.

Immediately to the east of Ptuck is another 15 to 20 metre-wide mineralized zone within iron-carbonate altered sedimentary rocks hosting stockwork quartz-carbonate veins. Four samples were taken in this zone with significant values of up to 251 ppb gold, 257 grams per tonne silver, 0.48 percent copper, 8.74 percent lead, and 30.10 percent zinc (Assessment Report 31747). Note that most of the highest values are from a single select sample (J992526). The trend of the shear zones and veining is variable, although generally they are striking south to southwest and dipping steeply to the west or northwest, approximately on strike with the Gamma zone.

The **Gamma** zone (Minfile 104B 168) (also called Fairweather) is underlain by dacitic fragmentals, fine-grained siliciclastics and massive andesite of the Hazelton Group. These are intruded by feldspar porphyry bodies that are highly fragmented. The zone has been trenched in a northwest orientation over approximately 120 metres. The most significantly-mineralized trench exposed a 60 cm wide quartz-pyrite-sphalerite-tetrahedrite vein striking approximately 222/45 NW. Two of the remaining three blast trenches host similar mineralization comprising quartz veining with galena, as well as quartz breccia/veining with pyrite and tetrahedrite.

Veins display open space fill textures that resemble dilational zones related to moderately to steeply northeast-dipping shearing. This southeast-striking shearing has produced a strong fracture foliation and locally truncates mineralization. Veins are not continuous, but appear to be

en echelon veins within a northwest trend. Sampling of trenches in this zone yielded gold values in the 1 to 5 grams per tonne range with anomalous silver, arsenic, copper, lead, antimony and zinc (Assessment Report 31162). Samples collected 570 metres west of the trenches, from a zone of ankerite alteration with centimeter-scale quartz-carbonate-tetrahedrite-chalcopyrite veinlets, returned silver values of up to 5750 grams per tonne (Assessment Report 31162).

Mineralization primarily consists of quartz-calcite veinlets with galena, sphalerite, chalcopyrite, pyrite and significant amounts of silver. A fault containing galena and sphalerite, as well as malachite and azurite staining, assayed 0.17 grams per tonne gold, and 60.5 grams per tonne silver. A grab sample from a quartz vein with tetrahedrite, sphalerite, and galena assayed 12,900 grams per tonne silver and 1.99 grams per tonne gold. A 2.0 metre trench channel sample from a tetrahedrite-rich shear contained over 2000 grams per tonne silver (Assessment Report 15644). A pyritized structure between 5 and 15 metres in width, extending over a 125 metre strike length, was sampled, yielding a weighted average of 4.04 grams per tonne gold over a 7.15 metre width (Assessment Report 17028).

The **Kerr** (Minfile 104B 191) mineralized area, 3 km north of Crown is one of the main target types sought on the property. It is a major Cu-Au deposit that forms a mostly continuous, north-south trending and westerly dipping, irregular body at least 1700 metres long, and up to 200 metres thick. Higher grades are associated with crackled quartz stockwork, anhydrite veining, and chlorite alteration. It is enveloped by a schistose, pyrite-rich phyllic alteration zone with low to moderate grades.

The Kerr deposit is largely hosted by assemblages of the Stuhini and Hazelton Groups, whereas the Deep Kerr deposit is largely intrusion-hosted. The Kerr occurrence is reported to lie entirely within a north-trending "tectonic shear zone" measuring 800 to 900 metres wide and 2 kilometres long. This zone is flanked by comparatively unaltered or weakly altered, fine-grained, brownish green clastic sediments and submarine volcanic rocks on the east, and by a thick unit of basaltic andesite, of possible Stuhini Group, on the west. The tectonic zone is typically composed of moderately to strongly altered and sheared rocks, interpreted to be of volcanic, subvolcanic or plutonic origin. Most of the altered zone can be described as sericite schist; however, andesitic tuffs and flows and feldspar porphyry dykes and possibly flows can be recognized in less altered areas. A later formed "swarm" of fine-grained, weakly altered andesite dykes cuts across the schistosity.

Quartz-chalcopyrite-pyrite veining is extensive and intimately associated with copper and gold mineralization, forming dense stockworks within the core of the deposit. Extensive quartz-pyrite veining overprints earlier quartz-magnetite veining and is associated with chlorite-sericite and quartz-sericite-pyrite alteration assemblages. Late, white quartz-chalcopyrite-carbonate \pm chlorite veins are distributed throughout the deposit, with higher chalcopyrite contents in higher grade areas suggesting local remobilization. A high-sulphidation overprint is visible as bornite, tennantite/enargite and dickite/pyrophyllite overprinting and upgrading core stockwork zones (Rosset and Hart, 2016). Copper and gold grades may have also been upgraded due to remobilization of metals during later and/or possibly syn-intrusive deformation.

A recent resource estimate for the Kerr deposit reported Measured plus Indicated Resources of 379 million tonnes grading 0.22 g/t gold, 0.41% copper and 1.2 g/t silver. (Seabridge Gold website, News, September 19, 2016). Inferred Resources have been significantly increased by recent drilling in the Deep Kerr zone, totalling 1.92 billion tonnes grading 0.31 g/t Au and 0.41% Cu, with conceptual underground mining by block caving.

The **Valley of the Kings** (VOK) (Minfile 104B 199) high grade gold-silver deposit on the Brucejack property (Minfile 104B 199), 4 km northeast of Crown (fig.5), is also a primary target type that is sought on the property. Surface mapping and extensive drilling at VOK have defined a broad syncline in which fragmental volcanic and clastic sedimentary rocks and minor flows of Upper Triassic to Lower Jurassic age appear to plunge moderately to the east. Variably altered volcanic rocks of intermediate composition are interpreted as forming the youngest rocks of the sequence and, along with broadly correlative coarse pyroclastic rocks, may occupy the core of the VOK syncline. Underlying these are interbedded volcanic-derived immature sedimentary rocks, including common pebble and cobble conglomerate and pebbly sandstone, which are considered correlative with the basal Jack Formation of the Hazelton Group. Thin Upper Triassic (?) rhyolite flows, as well as local siliceous exhalites have been mapped on surface and logged in drill core in the vicinity of this contact. Beneath the rhyolite is a relatively thick and generally poorly stratified sequence of fine-grained mudstone and siltstone with locally interbedded sandstone and pebble conglomerate. In the vicinity of VOK, contacts and even the unconformity appear to have been folded, commonly tightly.

High-grade gold-silver mineralization within the VOK Zone occurs as electrum, and it is generally hosted within quartz-carbonate and quartz-adularia veins and vein stockworks. While

quartz veining and stockworks are common throughout the zone, the majority of gold intersections are confined to a 75 to 100 m wide zone which closely parallels the axis of the syncline. Within that zone, the mineralization appears to have been concentrated in localized fold noses and along geologic contacts, in particular along the contact between the overlying pyroclastic rocks and the underlying conglomerate, as well as locally along the margins of flow-banded rhyolite. Additional precious metal-bearing minerals found in the VOK, typically in trace quantities, include silver sulphides, acanthite, pyargyrite and tetrahedrite, while base metal-bearing sulphides include sphalerite and galena.

The VOK mineralized zone trends approximately west-northwest to east-southeast. Its orientation mirrors that of Electrum Ridge, a pronounced topographic feature near the southern margin of the zone, and drilling to date has extended its strike to over 450 metres. The zone is up to 150 metres wide and is bound to the west by the Brucejack fault but remains open at depth and to the east. As it is elsewhere on the property, alteration at the Valley of the Kings zone is believed to be Early Jurassic in age. It consists dominantly of quartz-sericite-pyrite, with lesser sericite-chlorite. The most pervasive of the intense alteration is observed within the sedimentary and fragmental volcanic rocks.

Valley of the Kings Mineral Resource estimate of Measured plus Indicated categories, based on a cut-off grade of 5 grams per tonne gold equivalent, is 16.4 million tonnes grading 17.2 g/t gold and 15.0 g/t silver (Pretium Resources Inc. News Release, July 21, 2016).

A number of significant showings of gold-silver, plus copper, zinc and lead occur along a north-northwest trend, the “**Brucejack Trend**” that approximately follows the trend of the Brucejack fault for about 4.5 km, with most of the showings on the east side of the fault, but a few on the west side. Most of the showings consist of quartz-carbonate plus local barite veins and stockworks cutting variably sericitized, pyritized and silicified tuffs, flows and sedimentary rocks of the lower part of the Hazelton Group. Grab samples from some of the showings have returned bonanza grade gold and silver values, however, drilling in a number of the zones indicated that stockwork areas are relatively small and gold grades are quite variable. Many of the zones are associated with northwest to west-trending faults that may be splays from the Brucejack fault. Most mineralized shoots have vertical extents that are greater than their strike lengths. Crack-seal features shown by most of the veins are evidence of brittle deformation. Localized ductile strain may have generated dilatant structures that served as conduits for the hydrothermal fluids, which

deposited silica and precious metals. Mineralization has been described as transitional epithermal, located up stratigraphy from porphyritic intrusions that are believed to be the source of the mineralizing fluids. Small mineral resource estimates have been determined for a few of the showings, including the West Zone, Shore and Gossan Hill areas.

The Brucejack fault is largely covered by glacial ice to the south of VOK, but the possible projection of the fault would cross the eastern part of the Crown property.

Based on the abundance of mineral occurrences and drill-defined deposits surrounding the Crown project, there is good potential for discovery of epithermal style high grade Au-Ag, VMS style Ag-Au-Pb-Zn-Cu or porphyry style Au-Cu mineralization within the property area. Distinctive characteristics of the nearby occurrences described above will help to guide further exploration at Crown.

6.0 Previous Exploration Work

A significant amount of exploration has been undertaken in several different areas of the property and this work has been well documented in assessment reports that are referenced in Minfile summary descriptions of the mineral occurrences. The reader is referred to these assessment reports for detailed descriptions of the work programs.

One of the areas that has undergone more advanced exploration is the area encompassing the Doc and Globe showings on the western claims. Earliest work reported, circa 1900, included the exploration of two veins at Globe by trenching and driving of four adits. In the 1940's trenching and drilling of 29 holes was reported for three of the veins at the Doc showings. In the 1970's trenching and geochemical work, as well as magnetic and VLF-EM surveys were completed at Doc. In the late 1980's trenching and tunneling, with considerable underground and surface drilling was undertaken, establishing a small non-compliant resource of 91,490 tonnes grading 8.85 g/t Au for two of the Doc veins. Since that time localized airborne magnetic and EM surveys were conducted (in 1990) and limited surface sampling.

Farther east on the property, in the area of the Divel and Mack occurrences, work during the 1980's and 90's included geological mapping, silt sampling and reconnaissance rock and soil sampling.

In the central part of the property more advanced work has been undertaken in the area of the Tribe and Cat-in-the-Hat occurrences. In the late 1980's geological mapping, silt sampling and reconnaissance rock and soil sampling revealed new showings. In 1990 airborne magnetic, EM and VLF-EM surveys revealed several subparallel conductive zones. In 1994 trenching and rock sampling returned significant gold and silver values. In 2006-07 rock sampling was followed by drilling of 5 holes at Cat-in-the-Hat. One of the holes returned anomalous values in gold and arsenic.

In the eastern part of the property near the Delta showings stream sediment and rock sampling, as well as hand trenching was undertaken in 1985, discovering showings with high gold and silver values, some of which had indications of stratiform mineralization in argillite. Five holes were drilled in the Delta area in 1986. The highest value obtained was 0.375 gram per tonne gold; no anomalous silver was found. Soil geochemistry in 1986 defined a multi-element anomaly and rock samples of silicified tuff from within the anomalous area returned up to 6.8 g/t Au. Also in 1986, in the area of the Gamma showing, a pyritized agglomerate carrying anomalous values in gold and arsenic was discovered. It was trenched in 1987, returning a best value of 4.05 grams per tonne gold over a width of 7 metres. From 1989 to 1991 prospecting, sampling, trenching, geological mapping, geochemical surveys and both airborne and ground geophysical surveys were undertaken. Several targets were located as a result of this work including two prominent IP-resistivity anomalies (with coincident Mag/VLF trends) in the "M" and "J" zones. Soil sampling over the "J" zone disclosed a sharp gold-silver-lead-zinc geochemical anomaly coincident with the geophysical anomalies. In 1994-95 reconnaissance rock sampling tested for the source of high gold values in argillite float. Anomalous Pb, Zn, Ag was found in outcrop but not the source of the high gold. In 2007 an airborne EM, magnetic and radiometric survey was flown over much of the eastern part of the property. In 2009 wide-ranging reconnaissance silt, rock and soil sampling tested some of the geophysical targets and known showings were briefly investigated. At the Gamma zone a 200 metre long gold-silver-arsenic-copper anomaly in soils was defined and is open along trend to the northwest. In 2010 ridgeline reconnaissance soil sampling was conducted between the Delta showings and the Gamma zone, discovering a 500 m long multi-element anomaly within sedimentary rocks near the contact with volcanic rocks. Prospecting of the anomaly did not reveal any mineralization.

In 2016 an MT survey was conducted in the area of the Cat-in-the-Hat showing and extending east and west to define the contact zone between Stuhini and Hazelton Group rocks. The east-

west profiles appear to confirm the mapped interpretation of a north-south anticlinal axis, cored by more conductive rocks (Stuhini?) and steeply dipping limbs in contact with less conductive rocks (Hazelton?) to the east and west. In the Cat-in-the-Hat profile there is a distortion in the shape of the geophysical data, suggesting a possible fault offset. The report also states that the data suggests the possible continuation of the Sulphurets fault from the KSM deposits area in the north, extending southerly along the east limb of the anticlinal structure. This could have implications for potential KSM-style mineralization to the east of the Cat-in-the-Hat showings.

There is no record of further work undertaken in the property area until the current 2018 geological and geochemical program.

7.0 Property Geology

The general geology of the property has been interpreted from scattered bedrock exposures located between large areas of ice cover and compiled as part of a 1:250,000 scale map by geologists of the BC Geological Society (Massey et al., 2005). The geology of the property and surrounding area is shown on Figure 9 utilizing some of this regional data.

The west side of the property, in the area of the Doc and Globe occurrences, is underlain by Stuhini Group marine sedimentary and volcanic rocks (fig. 9). These rocks are characterized by schist and gneiss of upper greenschist to lower amphibolite grade metamorphism (Coates, 2017). West of the South Unuk River, Stuhini Group rocks are intruded by stocks of diorite to quartz diorite and the Doc vein showings are located adjacent to the northern stock. The eastern extent of the Stuhini Group is defined by the north-northwest trending South Unuk / Harrymel Fault, which is the western boundary of the Eskay Rift zone, and passes diagonally through the claim block east of the Sheelagh Creek showing. Several mineral occurrences lie close to this fault zone. East of the fault Hazelton Group rocks are primarily comprised of andesitic volcanics of lower greenschist facies, which are overlain (?) by a north-northwest trending linear belt of basaltic volcanics. This sequence is cut by the Lee Brant Stock, an outlier of Eocene Granitic rock that occupies the headwaters of Divelbliss Creek.

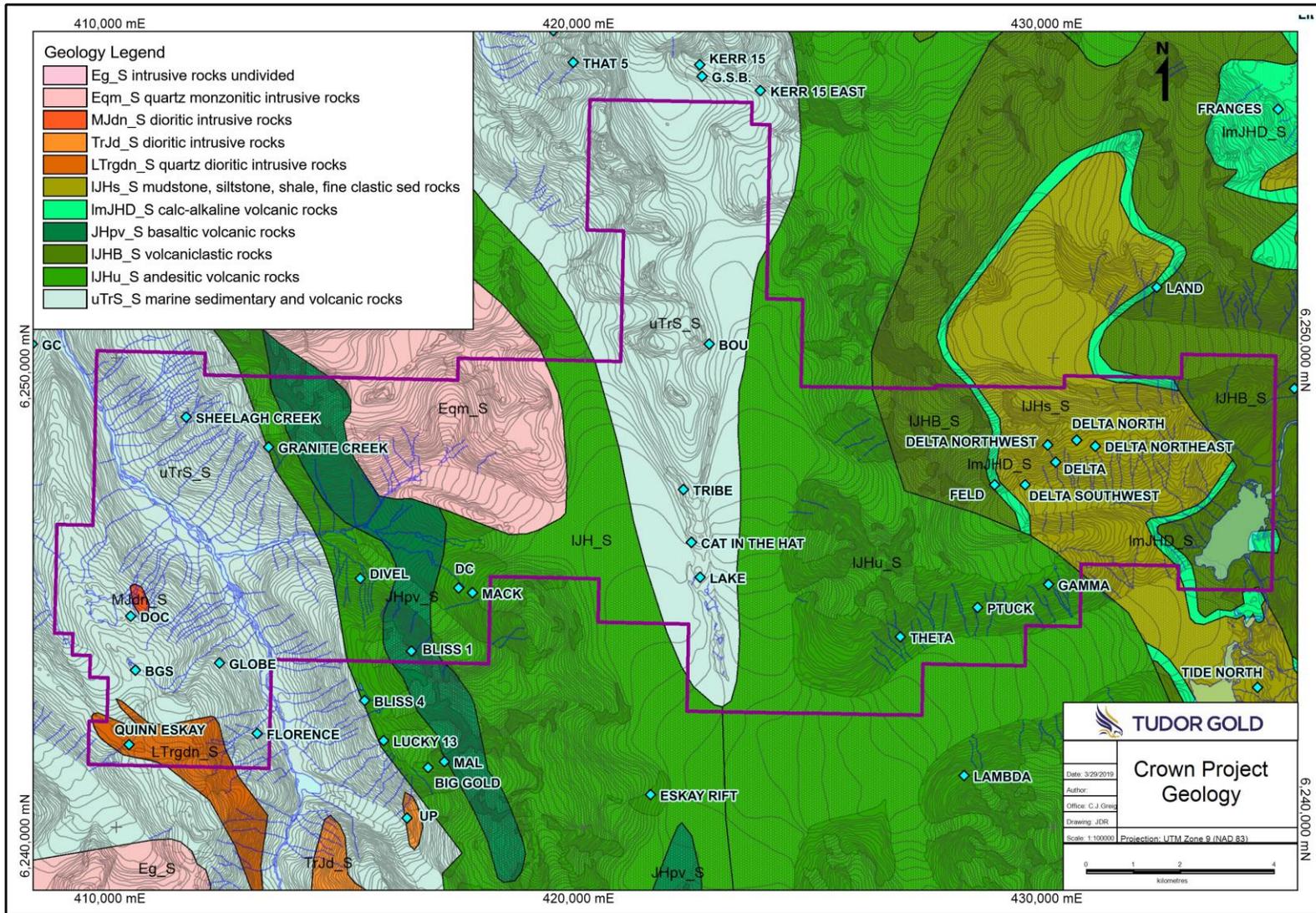


Figure 9. Geology and Minfile mineral occurrences on the Crown property (sources Massey et al., 2005 & BCGS Minfile Database)

In the central part of the property the southern extent of the McTagg Anticlinorium has been mapped, with a core of Stuhini Group rocks exposed along a north-south nunatak that emerges from a broad glacial field. MT geophysical surveying has suggested that the anticlinal limbs are steeply dipping, but there is also geophysical data that suggests that the eastern contact of Stuhini Group rocks may be thrust over Hazelton Group along the possible southern extension of the Sulphurets Thrust Fault. This contact zone is a prospective area to search for mineralization, however, within the property area it is almost entirely covered by glacial ice.

Coates (2017) comments that some of the rock types in the area of the Cat-In-the-Hat Showing, with descriptions of “rhyolite dome complexes, high sulphidation epithermal vein stockwork, native sulphur and acid sulphate “hot springs” rocks are very reminiscent of those in the Treaty Creek area which are upper Hazelton in age”. Therefore, it is possible that local faulting may have emplaced Hazelton Group rocks into the north-south belt of Stuhini Group rocks in this area.

The eastern part of the property is underlain by Hazelton Group units that appear to be folded into a north-northwest trending synform with a core of sedimentary rocks comprised of mudstone, siltstone, shale and fine clastics that host many of the mineral occurrences in the area. This stratigraphy may be equivalent to the Eskay Creek deposit host rocks and past exploration has been focused on argillite hosted Ag-Au-Pb-Zn mineralization. The sedimentary unit is underlain by a thin unit of calc-alkaline volcanic rocks. These volcanic rocks in the area of the Feld occurrence are described as a 75 to 150 metre wide band of felsic pyroclastics that may belong to the Mount Dilworth Formation. This unit is underlain by a thicker sequence of volcanoclastic rocks that are likely part of the Betty Creek Formation. No intrusions have been mapped in the central and eastern parts of the property, however, due to the extensive ice coverage they may be hidden from view.

7.1 Structural Geology

Alldrick et al. (2005) and Barresi et al. (2008) have provided convincing arguments for fault-controlled subsidence which led to development of a number of sub-basins within the 300 km long by 50 km wide Eskay Rift volcanic belt. These types of structures are interpreted to be synvolcanic (growth) faults and likely were not active past the last deposition of Hazelton rocks. The north-trending, steeply-dipping Brucejack fault that extends from the Valley of the Kings deposit and projects through the east part of the property is thought to be a reactivated segment of one of the growth faults and is spatially related to numerous gold occurrences on the Brucejack property.

During Cretaceous time the area surrounding the property was affected by two regional contractional events: an extensive westerly-directed system of thrust faulting, and the east-northeasterly directed Skeena Fold and Thrust Belt of the Bowser Basin (Evenchick, 1991). Many of the folds and thrust faults of the Skeena event trend northwest and have accommodated at least 150 km of northeasterly shortening (Evenchick, 1991).

Contractional structures show a transition from broad open folds in the Eskay Creek area to tight folds and thrust faults in the Sulphurets area. Beds in the district are generally north striking with moderate to steep dips and have been deformed into upright buckle folds. Two fold geometries are documented in the district: 1) north-northwest-plunging buckle folds with a related axial planar cleavage and 2) west-plunging buckle folds, with a variably developed steep cleavage (Febbo et al., 2015).

In the north, in the vicinity of the Eskay Creek deposit, thrust faults are rare to non-existent, whereas, McKinley (2008) reports that a series of imbricate thrusts are exposed in the Unuk Valley and the John Peaks-Mount Madge areas, to the northwest of the property. In that area thrust slices contain locally inverted stratigraphic sections of Hazelton Group rocks.

The Kerr, Sulphurets, Snowfield, and Iron Cap porphyry deposits are in the footwall of the east-vergent Sulphurets thrust fault. It is probable that the Sulphurets Fault, or splays of it, continue southerly through the central part of the Crown property, perhaps along the eastern contact of the Stuhini Group rocks.

7.2 Mineralization and Alteration

There are several known mineral showings and deposits in the area surrounding, and on, the property. These are shown on Figures 8 & 9 and discussed above in Section 5.2 (Local Mineral Occurrences).

Significant nearby deposits at the KSM property comprise porphyry Au-Cu mineralization related to large multi-stage, hydrothermal systems that developed within and above genetically related intrusions. Redistribution, and possibly further concentration of metals, occurred in some deposits during waning stages of intrusion and by later tectonic deformation. In the porphyry deposits, stockworks, veinlets and disseminations of mineralization occur in large zones of possibly economic, bulk-mineable zones within the intrusive bodies or adjacent rocks. The mineralization is spatially and genetically associated with hydrothermal alteration of the intrusive bodies and host rocks. Alteration commonly consists of phyllic quartz-sericite-pyrite, intermediate argillic, and potassium silicate zones, which have produced large expanses of gossanous rock. The mineralization may include chalcopyrite, molybdenite, tetrahedrite-tennantite and lesser galena and sphalerite. Gold typically occurs as electrum encased in fine-grained pyrite, as well as within late stage, higher grade gold-quartz veins that show epithermal-style banded textures.

High grade gold-silver mineralization in the Brucejack camp, north of the property, is generally hosted within quartz-carbonate and quartz-adularia veins and vein stockworks in what is described as a transitional epithermal environment. Mineralization and alteration are structurally and stratigraphically controlled, roughly following the contact between underlying conglomerate and overlying andesitic fragmental rocks. Gold-silver mineralization occurs as coarse electrum in multi-stage generations of veins and breccias. Sulphide mineralization present in most of the veins includes pyrite, sphalerite, galena, chalcopyrite, and pyrargyrite. Alteration associated with mineral zones consists dominantly of quartz-sericite-pyrite, with lesser sericite-chlorite and is believed to be Early Jurassic in age. The strongest alteration is observed within the sedimentary and fragmental volcanic rocks. Intense silica alteration developed along the favoured stratigraphic contact and it is believed that fluid pressure build-up below this impermeable boundary caused multi-stage fracturing and brecciation, followed by emplacement of gold-bearing veins.

8.0 Rock Geochemistry

In 2018, rock sampling was undertaken during eleven days of geological reconnaissance work by a number of different personnel in three different areas of the property. Table 2, below, shows the personnel and the days that they worked on the property, totalling 28 man-days. Personnel accessed the project area by helicopter on a daily basis from Stewart or from exploration camps in the region nearby. The reconnaissance sample locations are shown on Figure 10 along with Minfile mineral occurrences, illustrating that the sampling was generally done in areas surrounding known showings where work has been undertaken in the past. As well, the exploration focused on areas along the edges of glacial ice sheets where significant ablation may have revealed new showings since the previous work was done, some 20 to 30 years ago.

Two of the reconnaissance areas are underlain by rocks mapped as Stuhini Group marine sedimentary and volcanic rocks and one area is underlain by Hazelton Group tuffs, flows, pyroclastics and sedimentary rocks.

Table 2. Personnel sampling days on the Crown project

Date	K.Konkin	J.Auston	D.Cremonese	J.McCrea	A.Demoskoff	S.Pownall	R.Marks
15-Aug-18	x	x	x				
16-Aug-18	x	x					
17-Aug-18	x	x					
18-Aug-18	x	x	x				
19-Aug-18		x	x	x	x	x	
21-Aug-18	x	x					
23-Aug-18				x	x	x	
30-Aug-18	x	x					
04-Sep-18		x	x				
10-Sep-18				x	x		x
12-Sep-18	x						
Mandays	7	8	4	3	3	2	1

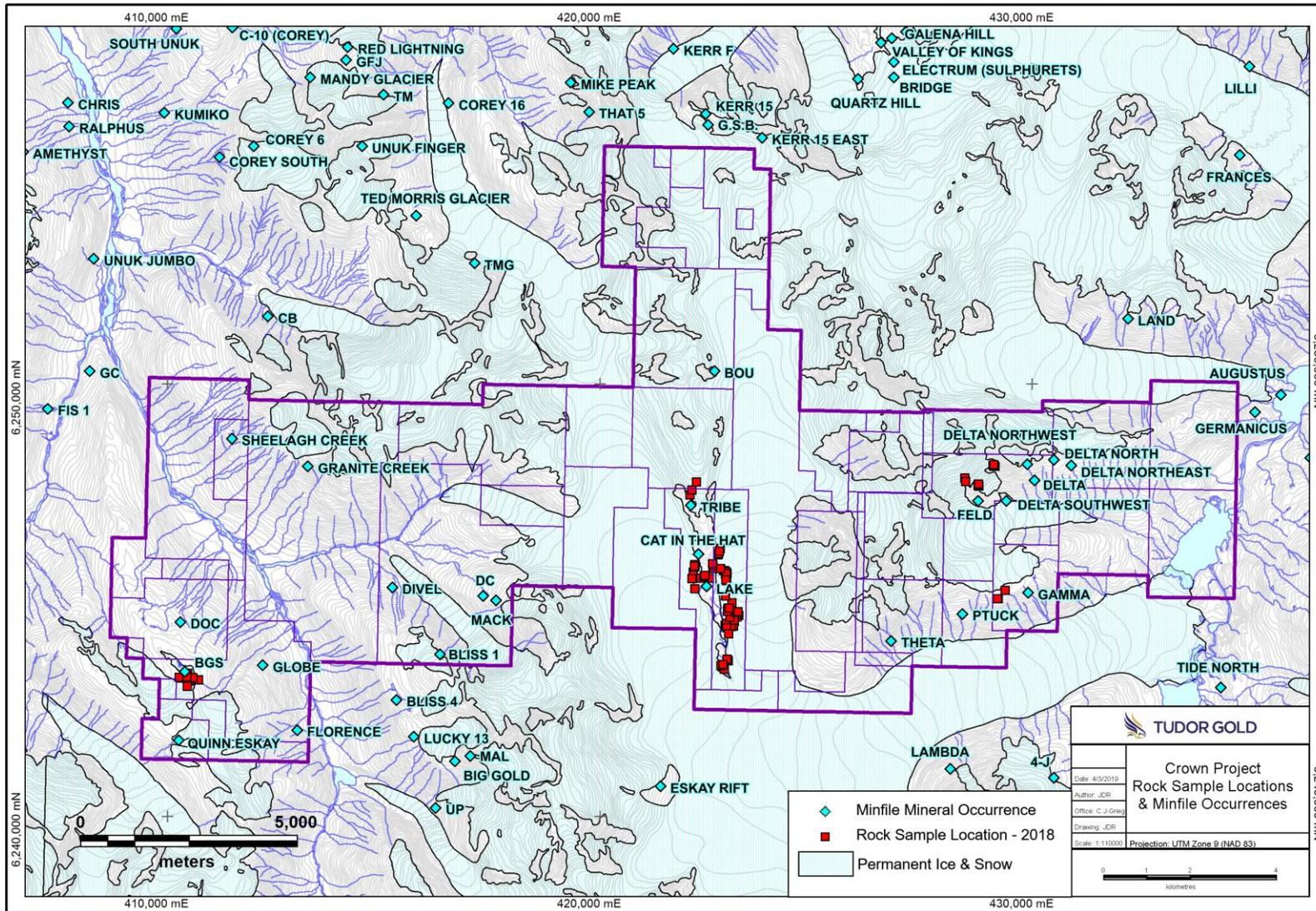


Figure 10. Crown project Minfile mineral occurrences and 2018 rock sample locations in 3 areas of the property

8.1 Geochemical Sampling Procedure & Analytical Techniques

Between August 15 and September 12, 2018 five geologists and two assistants conducted geological reconnaissance and collected 97 rock samples, primarily in areas along the edges of glacial ice sheets, covering an aggregate total area of about 2.0 square kilometres. The work was undertaken near sites that have displayed good geological potential, based on results of previous work.

Rock samples typically consisted of grab chips from float or outcrop that commonly contained veins or disseminations of sulphide minerals, or sometimes oxidized mineralization. For each sample the geologic details were described, including host rock type, any alteration observed, sulphide minerals recognized, style of mineralization, structure types and orientations, as well as comments providing more detailed information. This data, as well as UTM coordinates for each sample, is listed in Appendix II. All field measurements and figures use NAD83, Zone 9 datum.

Rock samples were placed in heavy plastic bags marked with identifying numbers, packed in sacks and transported to the offices of either Activation Laboratories Ltd. in Kamloops or ALS Global Laboratories in North Vancouver, B.C. for analysis of trace level gold and 35 additional elements.

At the lab, rock samples were dried and crushed to 70% <2 mm, riffle split to a 250 g lot, which was pulverized to 85% <75 microns. From each sample pulp, 30 grams of -75 micron-size material was analyzed for Au content (0.001 ppm to 10 ppm detection range) by fire assay and ICP-AES or AA (ActLab). As well, a suite of 35 additional elements (38 at ActLab) was analyzed by dissolving at least 0.5 g of <75 micron pulp in aqua regia solution and testing by ICP. Aqua regia digestions are able to dissolve most minerals, but although the term “near-total” is used by the lab, not all elements are quantitatively extracted in some sample matrices. Any samples that returned >10.0 ppm Au (upper detection limit), >100 ppm Ag or >10,000 ppm base metals were re-assayed with higher detection limits to provide more accurate values.

No blank samples were submitted with the field samples, as these were for reconnaissance information only; however, the laboratories conduct their own internal QA/QC testing to ensure that their equipment is properly calibrated and providing accurate results. The UTM

co-ordinates and laboratory analytical results for the 97 rock samples are attached in Appendix I.

8.2 Evaluation of Rock Geochemical Results

The results for rock samples are presented on three separate map sheets for the southwest, central and eastern parts of the property and each area is discussed separately below.

Southwest Area

Rock sample locations and sample numbers for the southwest area are shown on Figure 11, along with locations of tenures on which the samples were collected. The samples are distributed over a relatively tight area to the south of the BGS Minfile occurrence (described in Section 5.2). The permanent ice and snow areas illustrated on the figure are plotted from older records and the ice cover has been reduced in many locations, including the locations of several of the 2018 rock samples.

Maps showing values for Au, Ag, Cu, Pb and Zn are shown on Figures 12 to 16. For each element map the anomalous values are depicted by increasing symbol sizes and colours, ranging from small green diamonds for weakly anomalous, to large red diamonds for the strongest anomalies. Due to the limited sample population the author has chosen anomalous categories based on personal experience and other rock geochemical values in the region. Geochemical results for additional elements that may be of interest to the reader are tabulated in Appendices I and II.

One rock sample returned anomalous values for multi-elements. Sample 140836 gave values of 454.0 g/t Ag, 4.86% Cu, 639 ppm Pb, 962 ppm Zn and 622 ppb Au. This sample was described as a 2 cm wide quartz vein with up to 5% py, 1% cpy, with malachite staining and locally up to 5% magnetite (Appendix II). The vein trends 216/78°, cutting intermediate volcanoclastic (?) rocks. The other samples, most of which comprised narrow quartz vein material, generally returned low results, except two that had slightly elevated silver values of 1.8 and 2.2 ppm Ag.

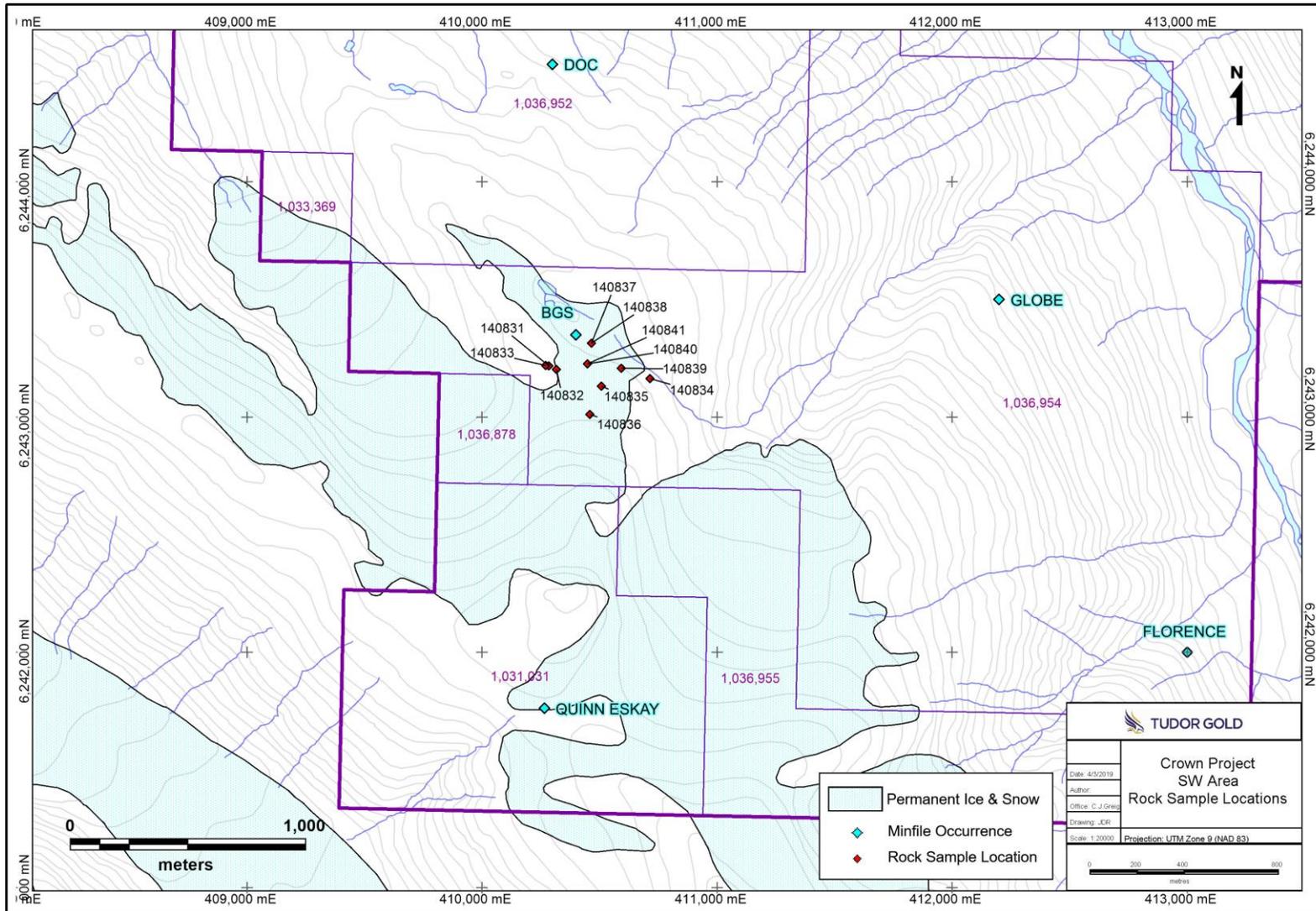


Figure 11. Crown Southwest Area rock sample locations

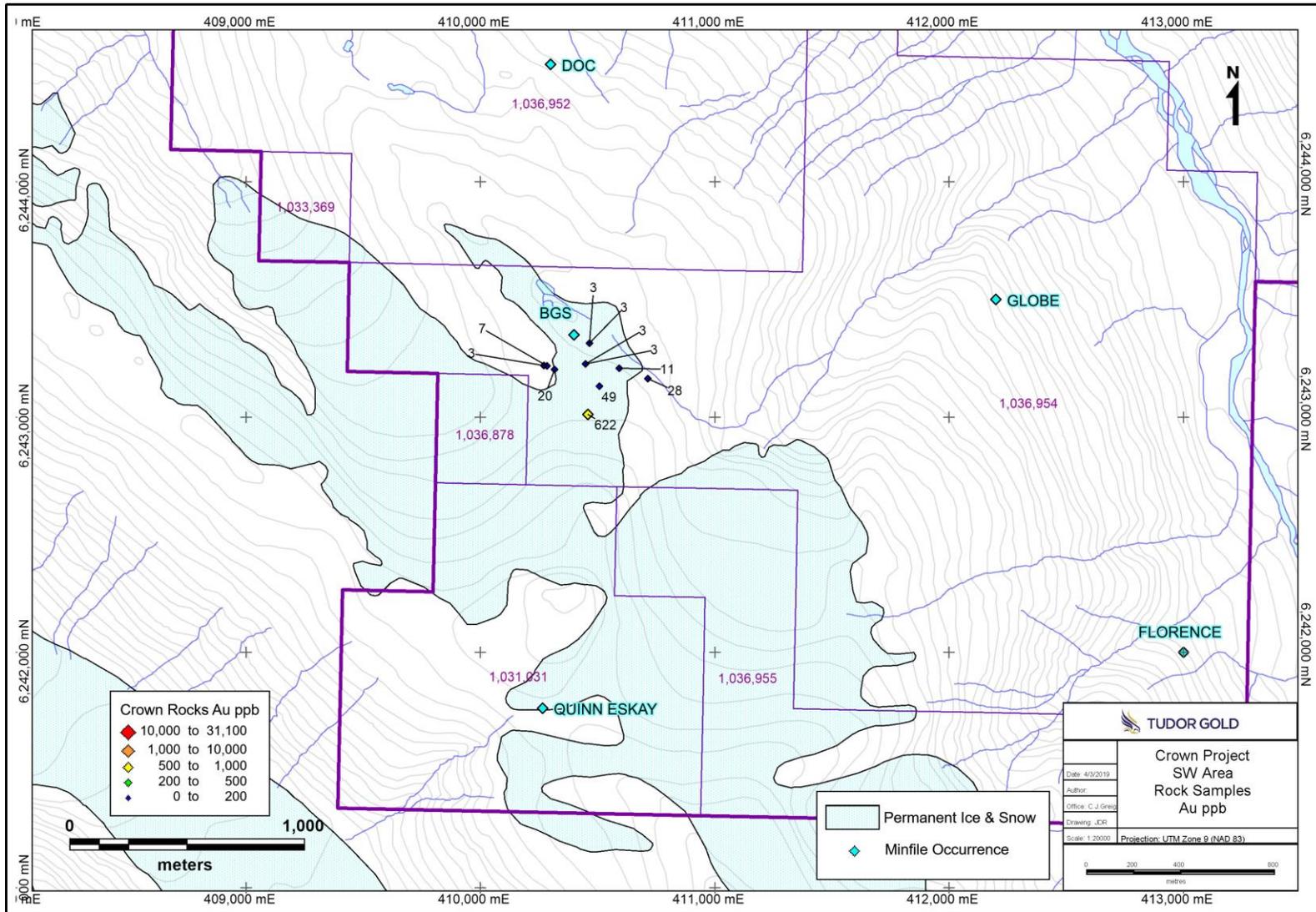


Figure 12. Crown Southwest Area rock samples Au values

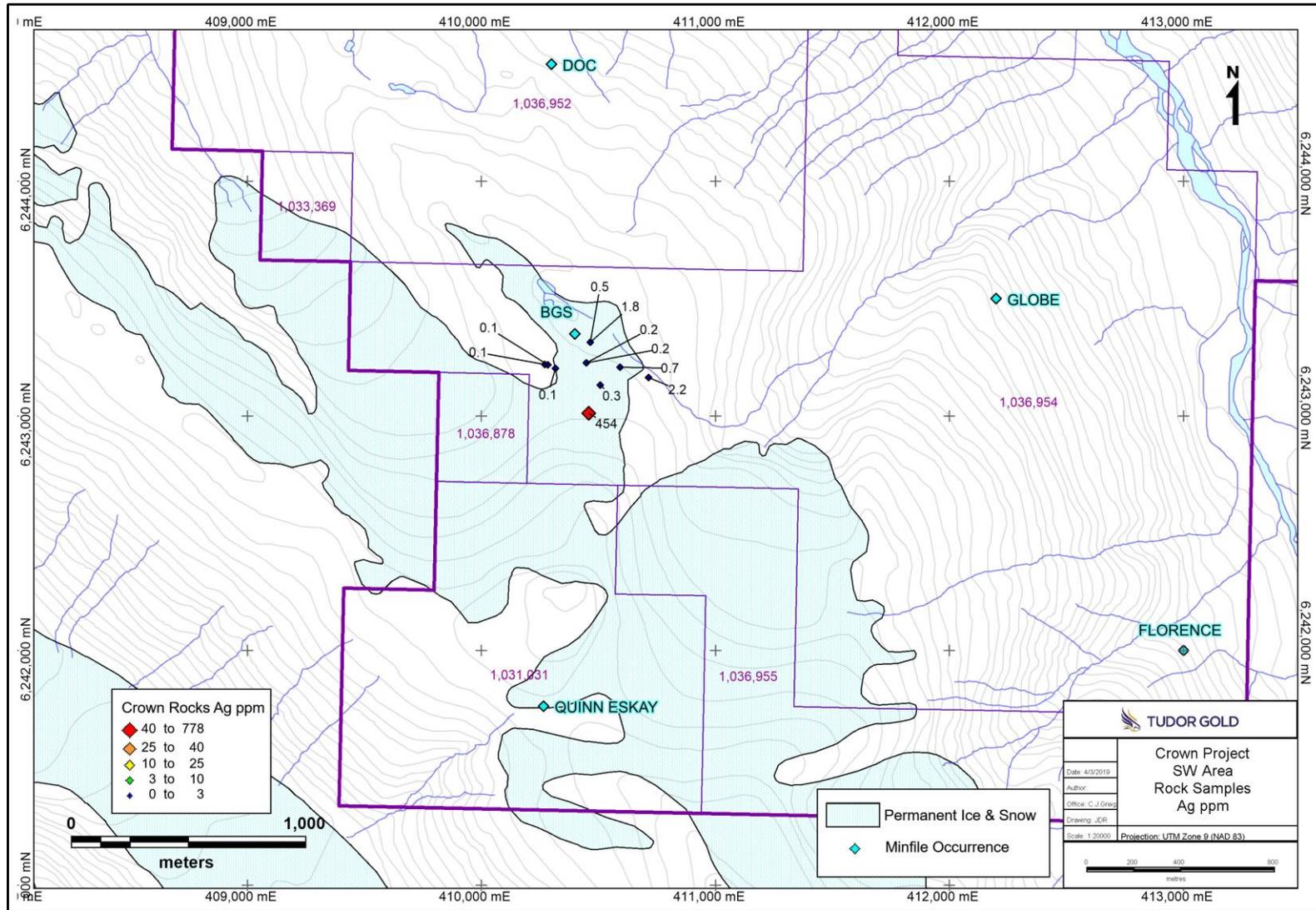


Figure 13. Crown Southwest Area rock samples Ag values

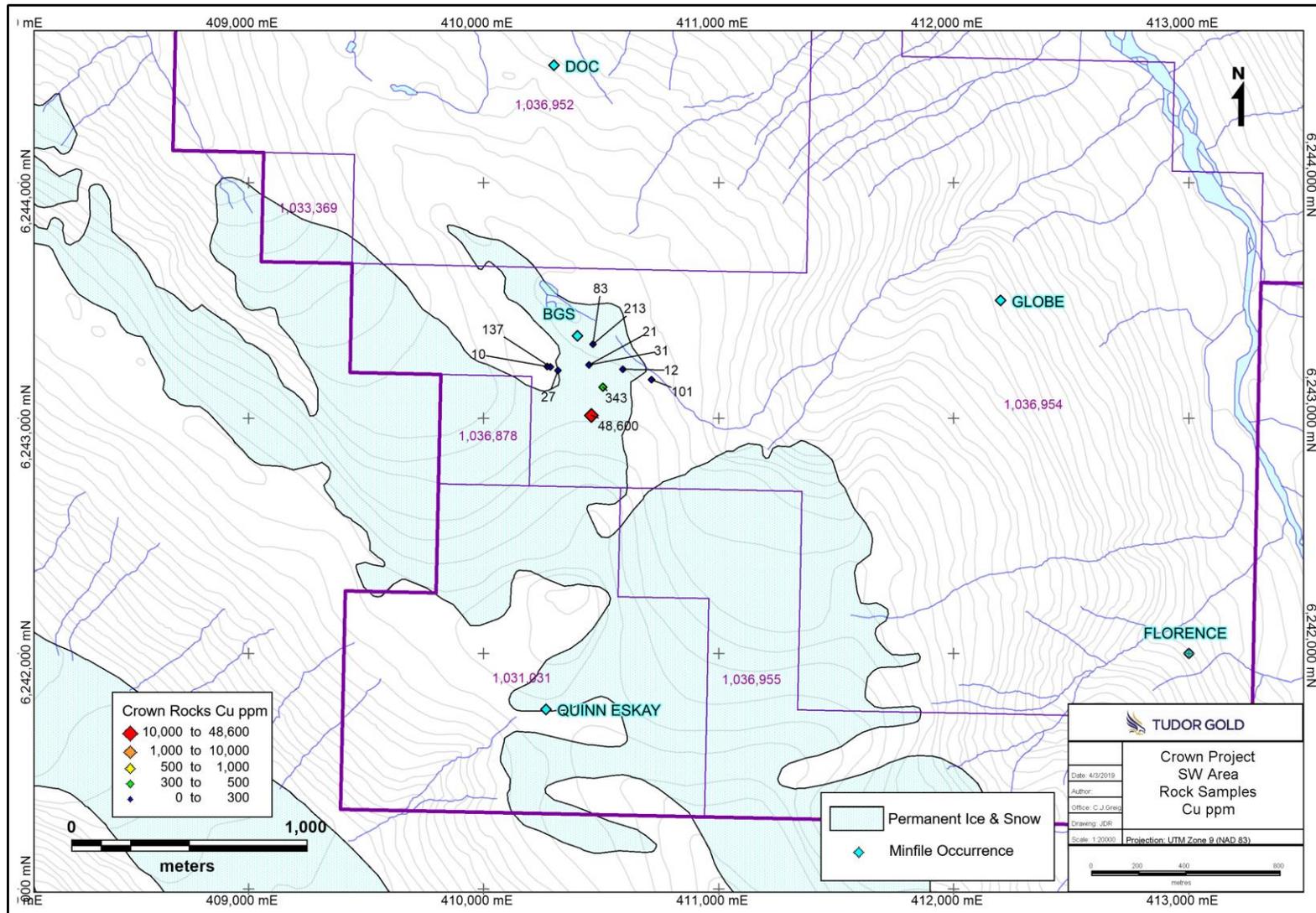


Figure 14. Crown Southwest Area rock samples Cu values

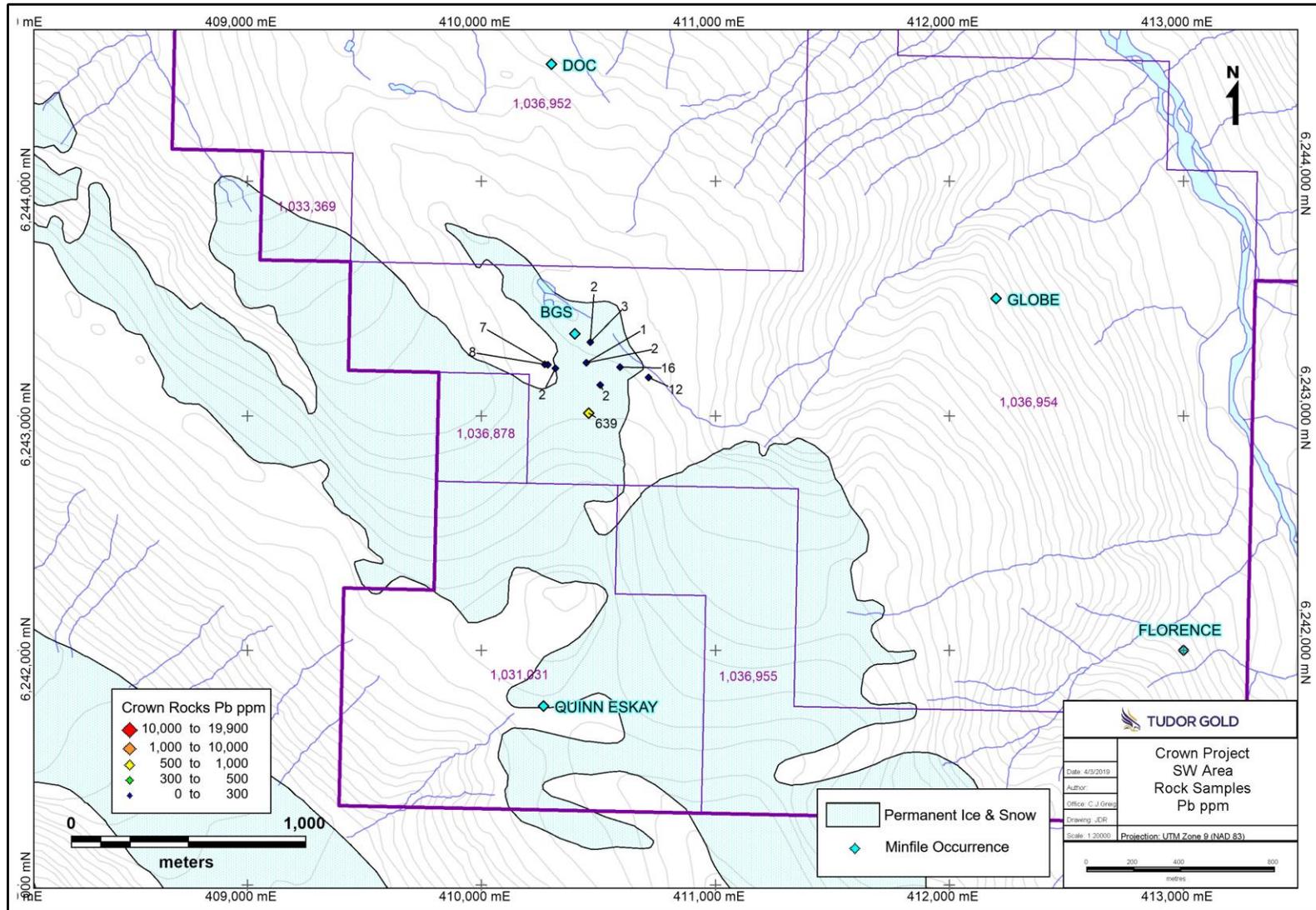


Figure 15. Crown Southwest Area rock samples Pb values

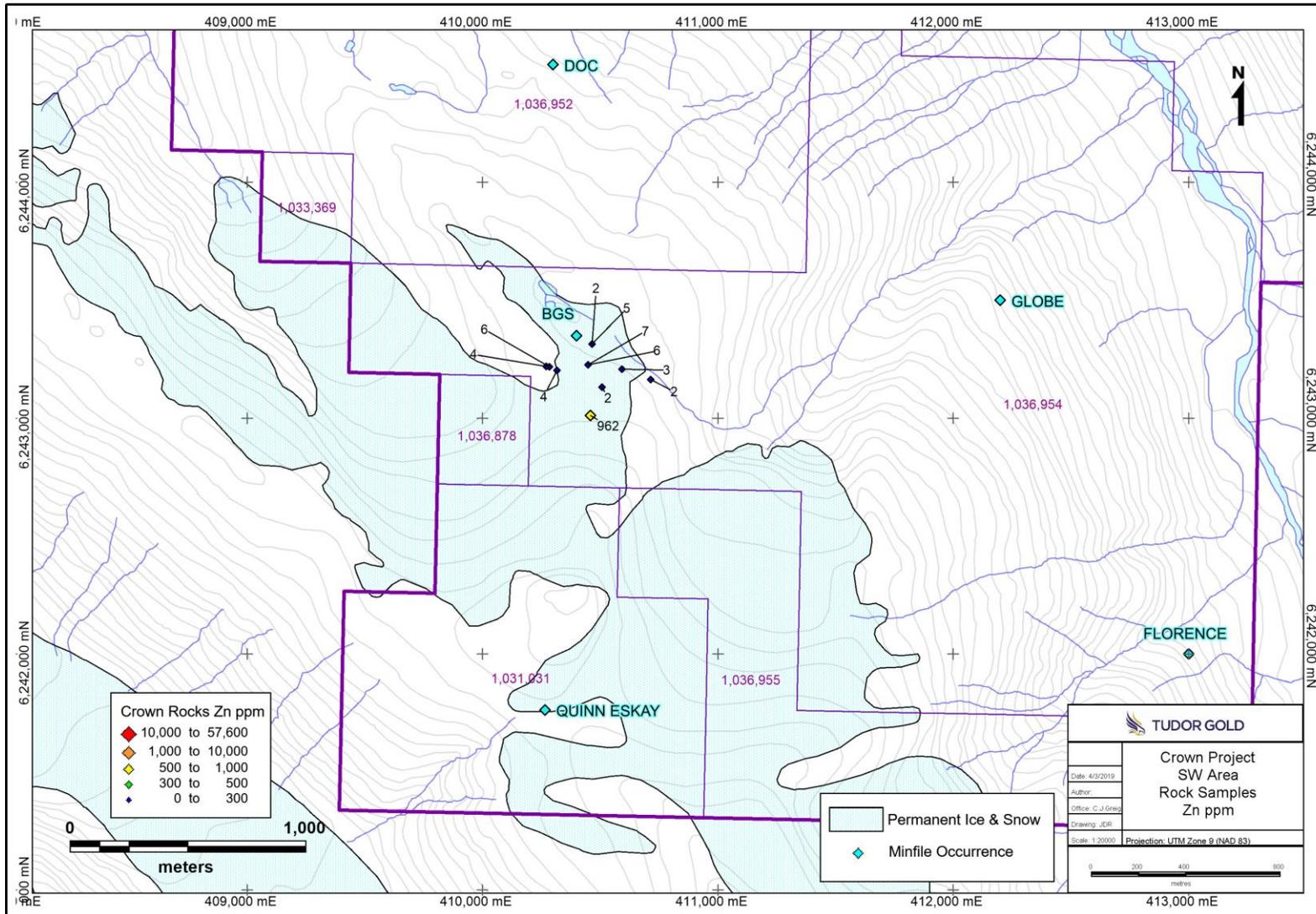


Figure 16. Crown Southwest Area rock samples Zn values

Central Area

Rock sample locations and sample numbers for the central area are shown on Figure 17, along with locations of tenures on which the samples were collected. The samples are distributed over an elongate area along the east and west edges of a north-south trending nunatak of rocks that have been mapped as Stuhini Group, but may include faulted slices of Hazelton Group rocks. The BGS Minfile occurrences called Cat-in-the-Hat and Lake (described in Section 5.2) are located near the main areas of sampling. The permanent ice and snow areas illustrated on the figure are plotted from older records and the ice cover has been reduced in many locations, including the locations of several of the 2018 rock samples.

Maps showing values for Au, Ag, Cu, Pb, Zn and As are shown on Figures 18 to 23. For each element map the anomalous values are depicted by increasing symbol sizes and colours, ranging from small green diamonds for weakly anomalous, to large red diamonds for the strongest anomalies. Due to the limited sample population the author has chosen anomalous categories based on personal experience and other rock geochemical values in the region. Geochemical results for additional elements that may be of interest to the reader are tabulated in Appendices I and II.

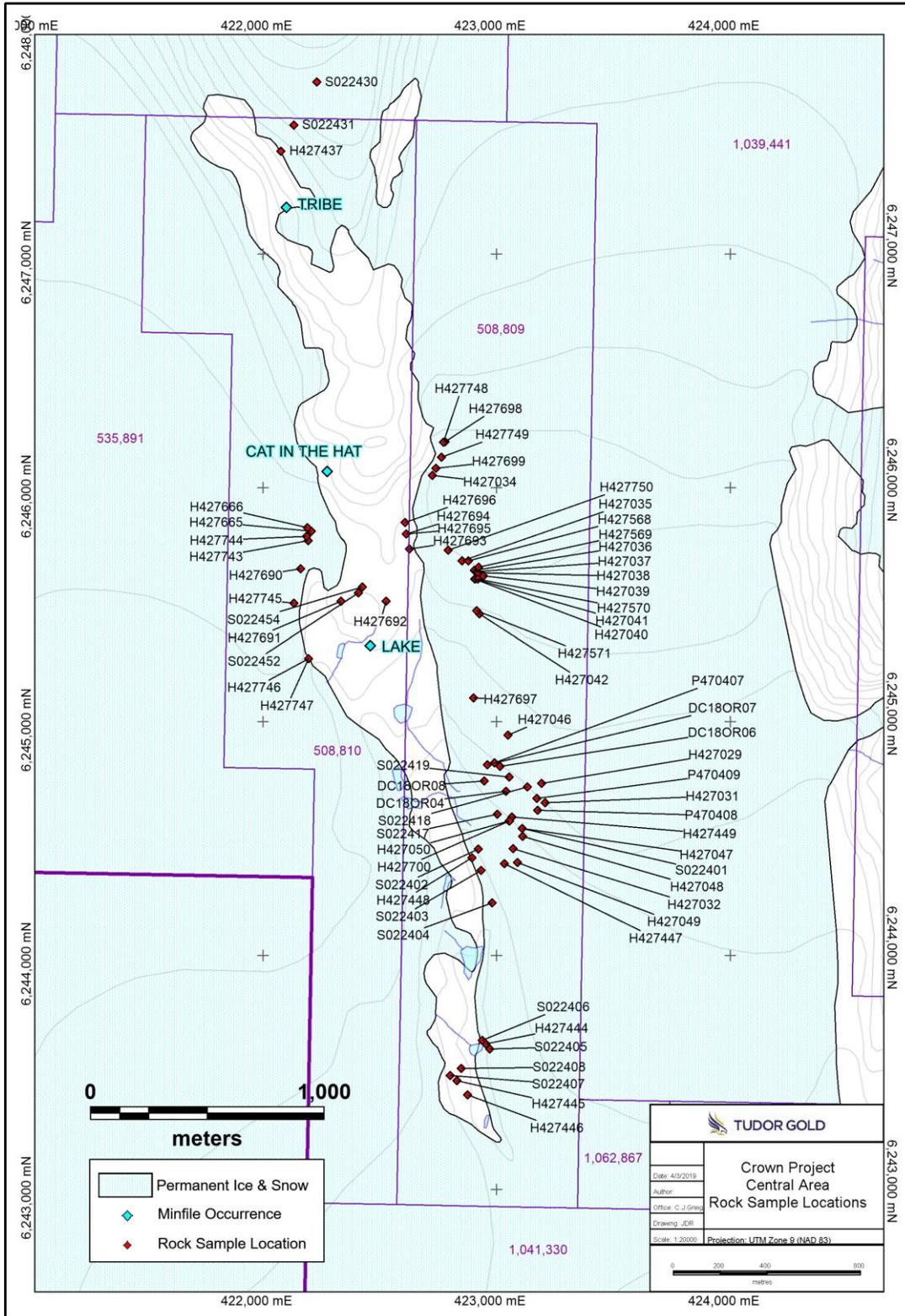


Figure 17. Crown Central Area rock sample locations

The majority of the anomalous rock samples are from an area 800 to 1200 m southeast of the Lake showing. In this area a number of high Ag values were returned, several with coincident anomalous As, and a few with anomalous Pb, Zn, Cu and/or Au (figs. 18 to 23). Two samples with elevated Au correlate best with anomalous Cu and Ag values. One of the most strongly anomalous samples (H427700) returned 778.0 g/t Ag, 1200 ppm Pb, 2340 ppm Zn, 645 ppm As, 95 ppm Cu and 8 ppb Au. It is described as a 15 by 20 cm, round, massive, white to dark grey, cryptocrystalline quartz boulder with 2-3% fine grained disseminations and veinlets of pyrite, with a trace of jasperoidal quartz and hematite/limonite (Appendix II).

Sample H427032 returned 135.0 g/t Ag, 1.29% Cu and 300 ppb Au, with low Pb, Zn and As values. It is described as a green andesite boulder cut by a quartz vein containing chrysocolla and 2% tetrahedrite. Sample S022418 returned the highest Au value, with 31.1 g/t Au, 25.9 g/t Ag, 625 ppm Cu and >10,000 ppm As. It is described as a grab sample of hornfelsed fine grained volcanoclastic (?) rock with 7-10% quartz breccia, containing semi-massive 15cm pods of partially oxidized pyrite and sulphide minerals.

At the north end of the sampled area, north of the Tribe occurrence, one other sample (H427437) has returned a strongly anomalous Au value of 1.05 g/t Au, with 26.0 g/t Ag and a slightly elevated 305 ppm Zn value. It is described as a chip sample across multiple quartz veins 10-40cm wide situated along a fault trending 152/80°. Veins contain 7% pyrite and arsenopyrite and trace galena, chalcopyrite and chrysocolla. The sulphides are dominantly in wallrock along the vein selvages.

A single sample (S022454) from the cluster of samples north of the Lake showing returned a strongly anomalous Ag value of 239.0 g/t Ag, with elevated Pb of 447 ppm, but low values for other elements. It is described as a 30 by 50 cm, sub-angular, quartz boulder with 5-7% very fine grained disseminations and veinlets of pyrite, 10-15% calcite and trace disseminated black sphalerite.

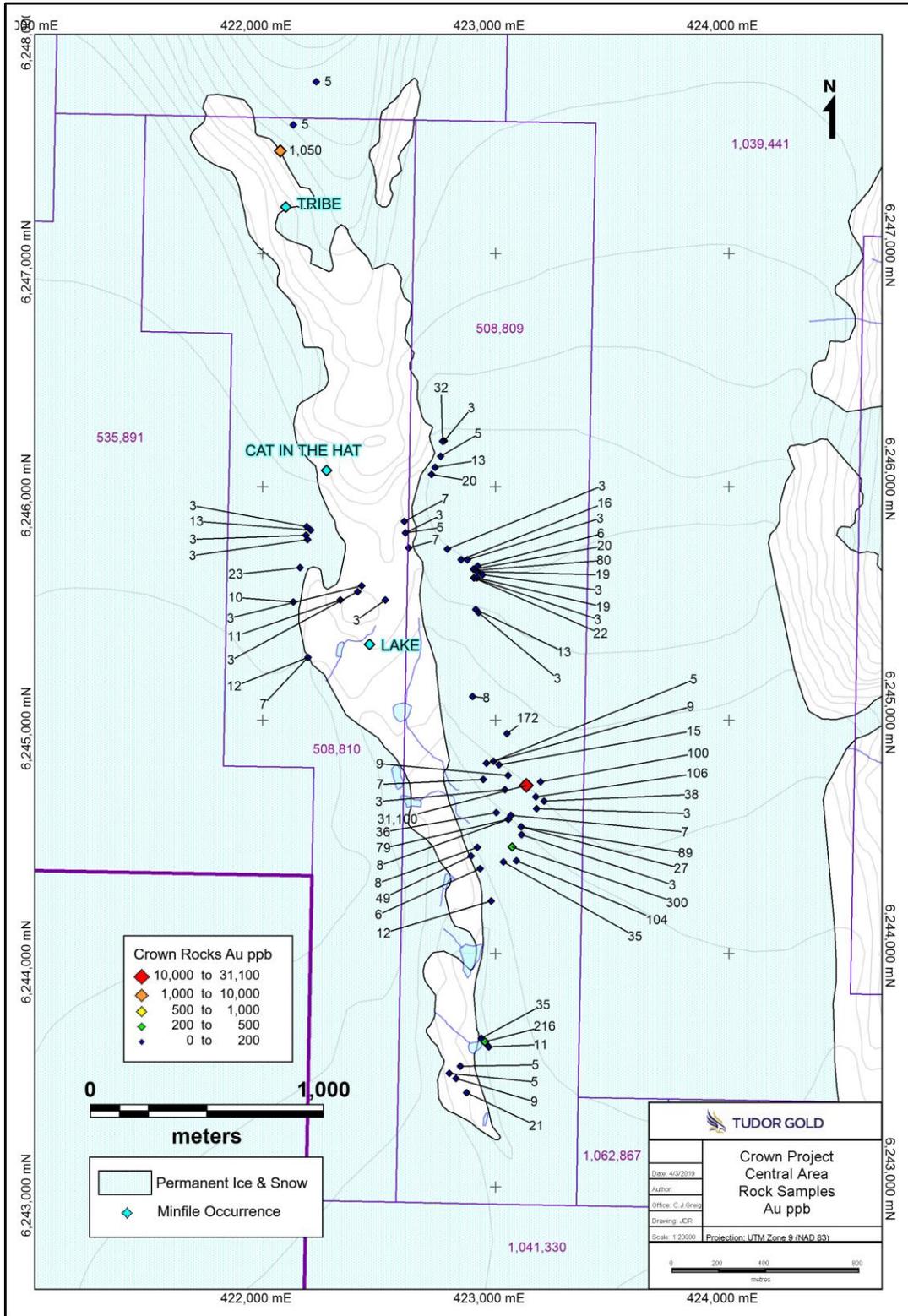


Figure 18. Crown Central Area rock samples Au values

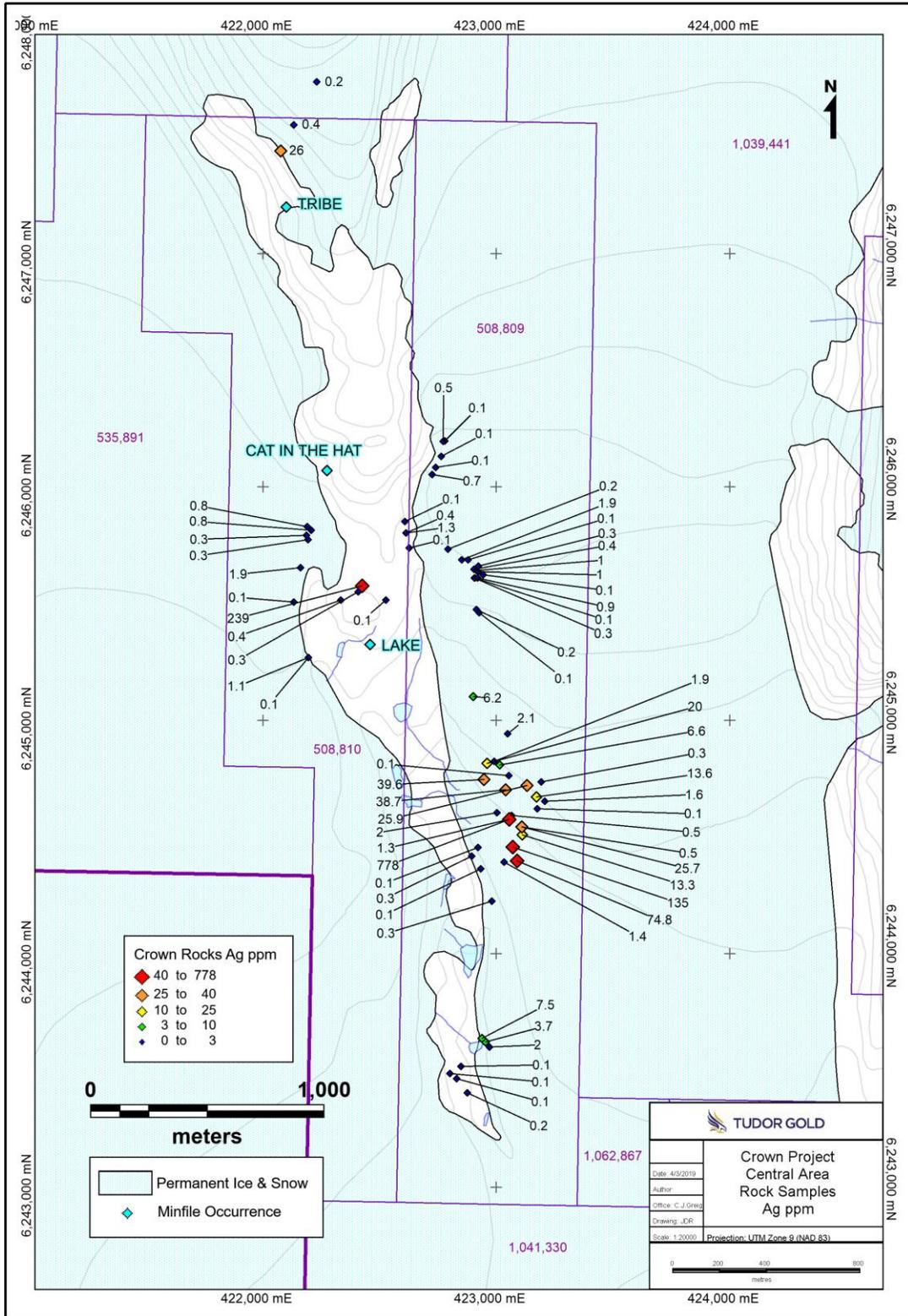


Figure 19. Crown Central Area rock samples Ag values

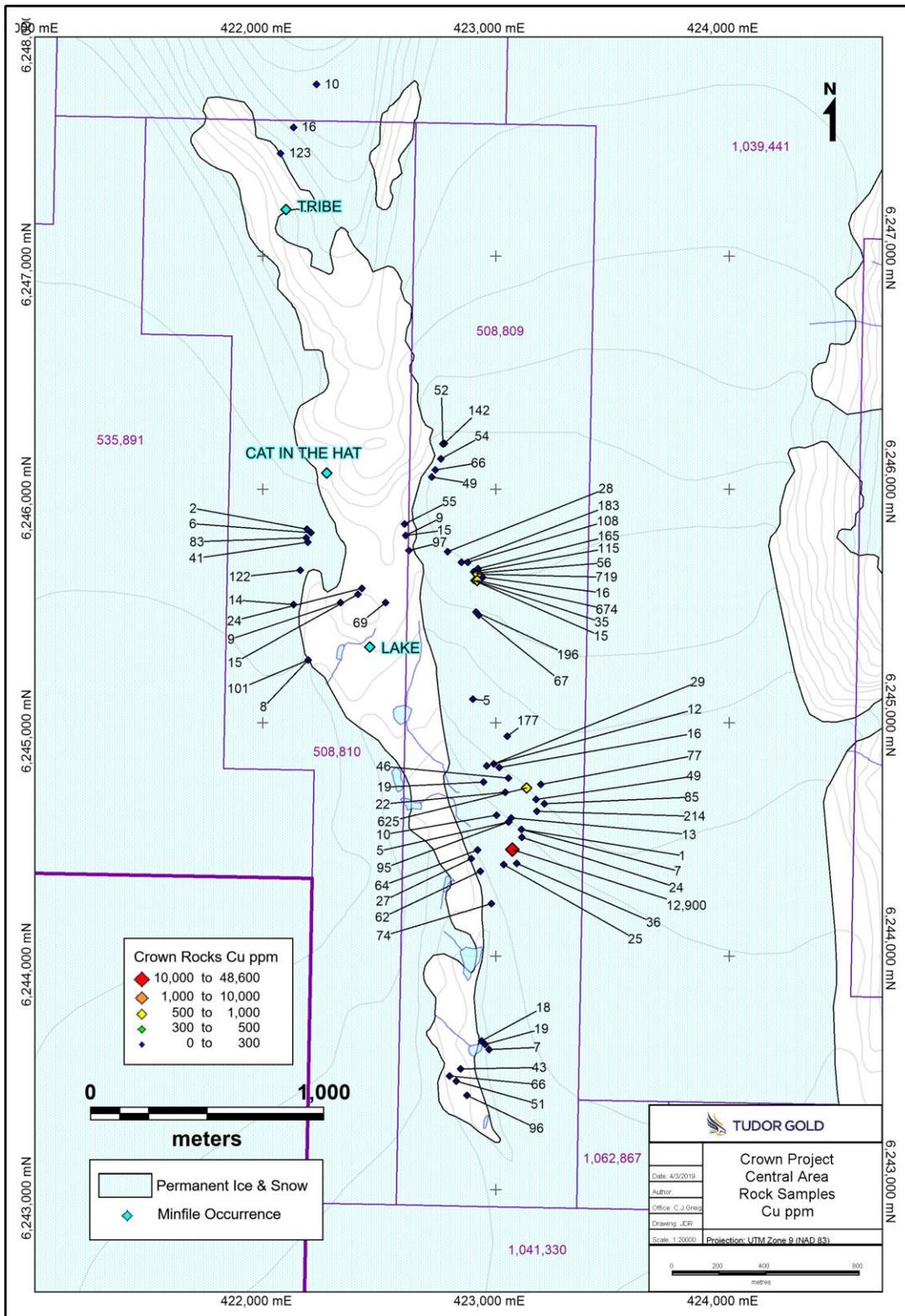


Figure 20. Crown Central Area rock samples Cu values

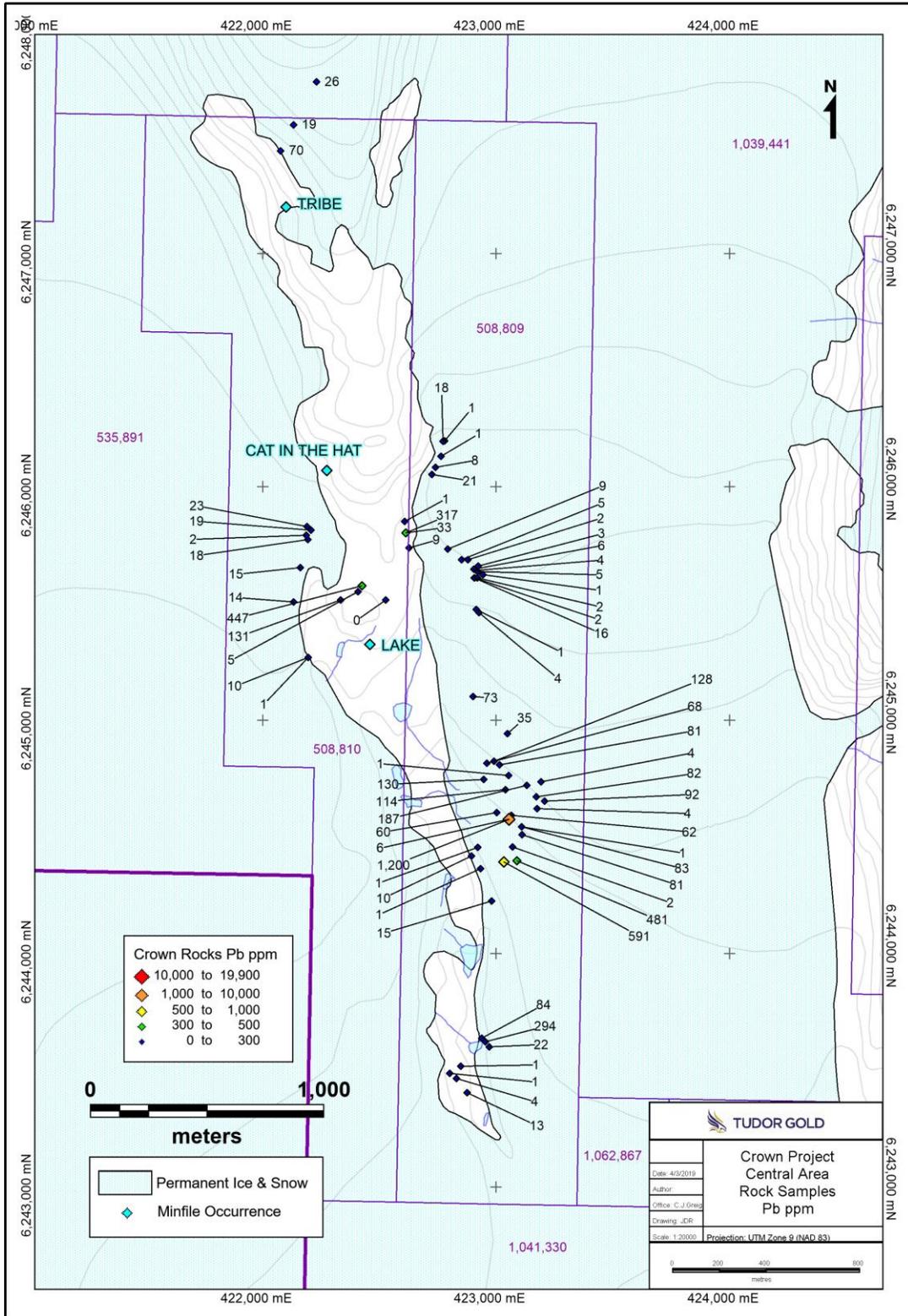


Figure 21. Crown Central Area rock samples Pb values

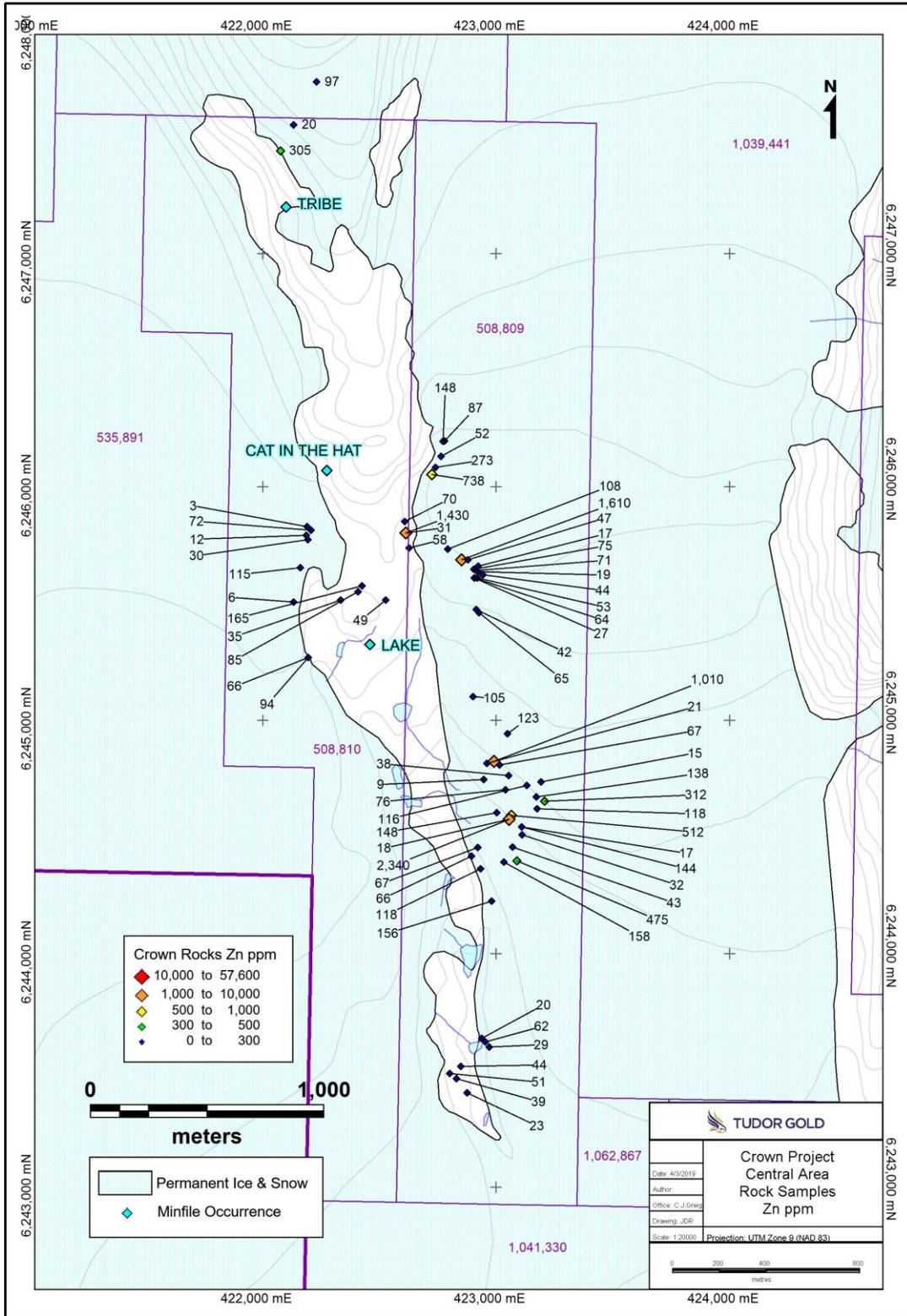


Figure 22. Crown Central Area rock samples Zn values

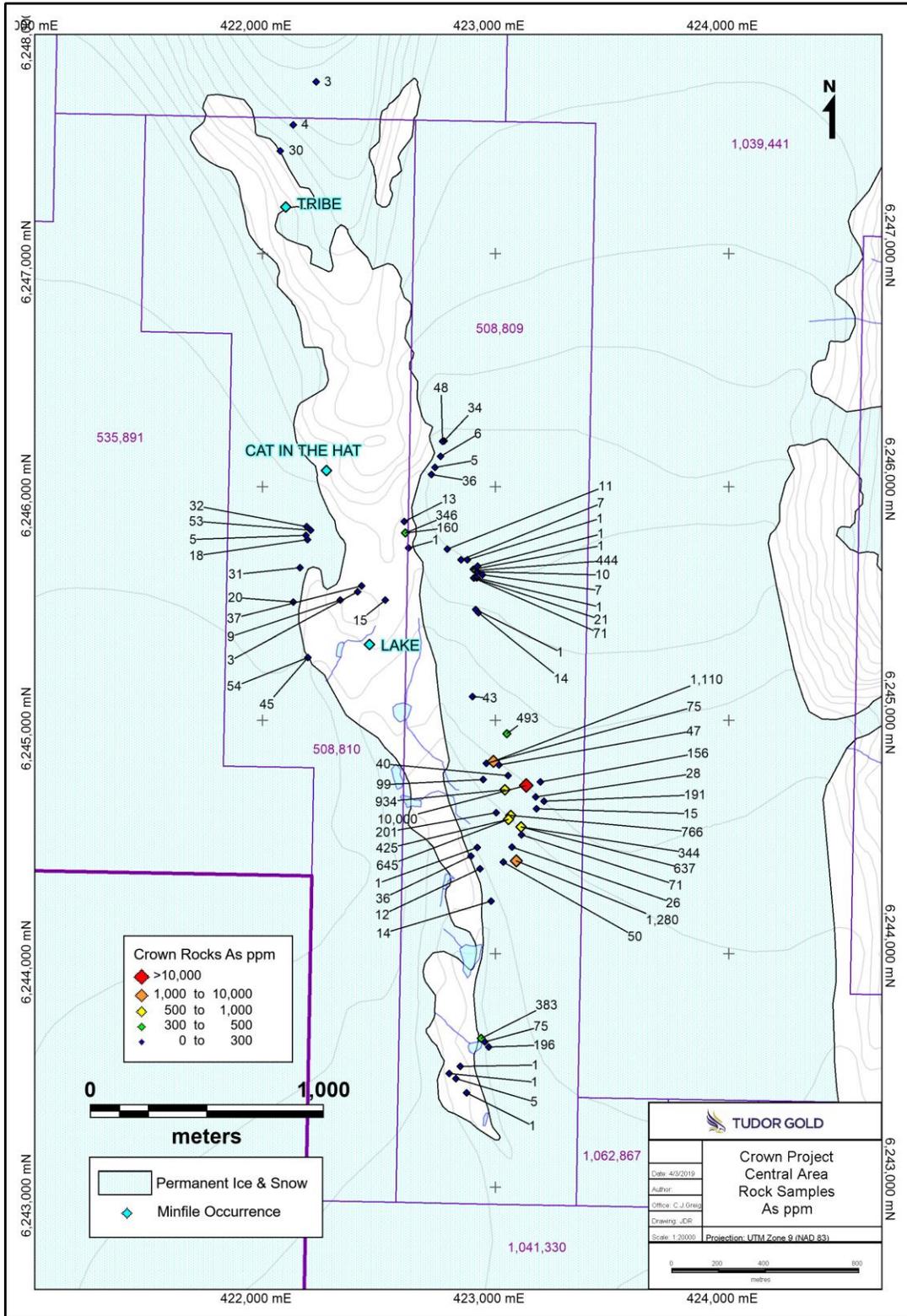


Figure 23. Crown Central Area rock samples As values

Eastern Area

Rock sample locations and sample numbers for the eastern area are shown on Figure 24, along with locations of tenures on which the samples were collected. The samples are from two areas; the northern group is in the vicinity of the Feld, Delta Southwest, Delta and Delta Northwest Minfile showings and the southern grouping is between the Gamma and Ptuck occurrences (described in Section 5.2). This eastern part of the property has been mapped as underlain by rocks of the Hazelton Group. The permanent ice and snow areas illustrated on the figure are plotted from older records and the ice cover has been reduced in many locations, including the locations of some of the 2018 rock samples.

Maps showing values for Au, Ag, Cu, Pb, Zn and As are shown on Figures 25 to 30. For each element map the anomalous values are depicted by increasing symbol sizes and colours, ranging from small green diamonds for weakly anomalous, to large red diamonds for the strongest anomalies. Due to the limited sample population the author has chosen anomalous categories based on personal experience and other rock geochemical values in the region. Geochemical results for additional elements that may be of interest to the reader are tabulated in Appendices I and II.

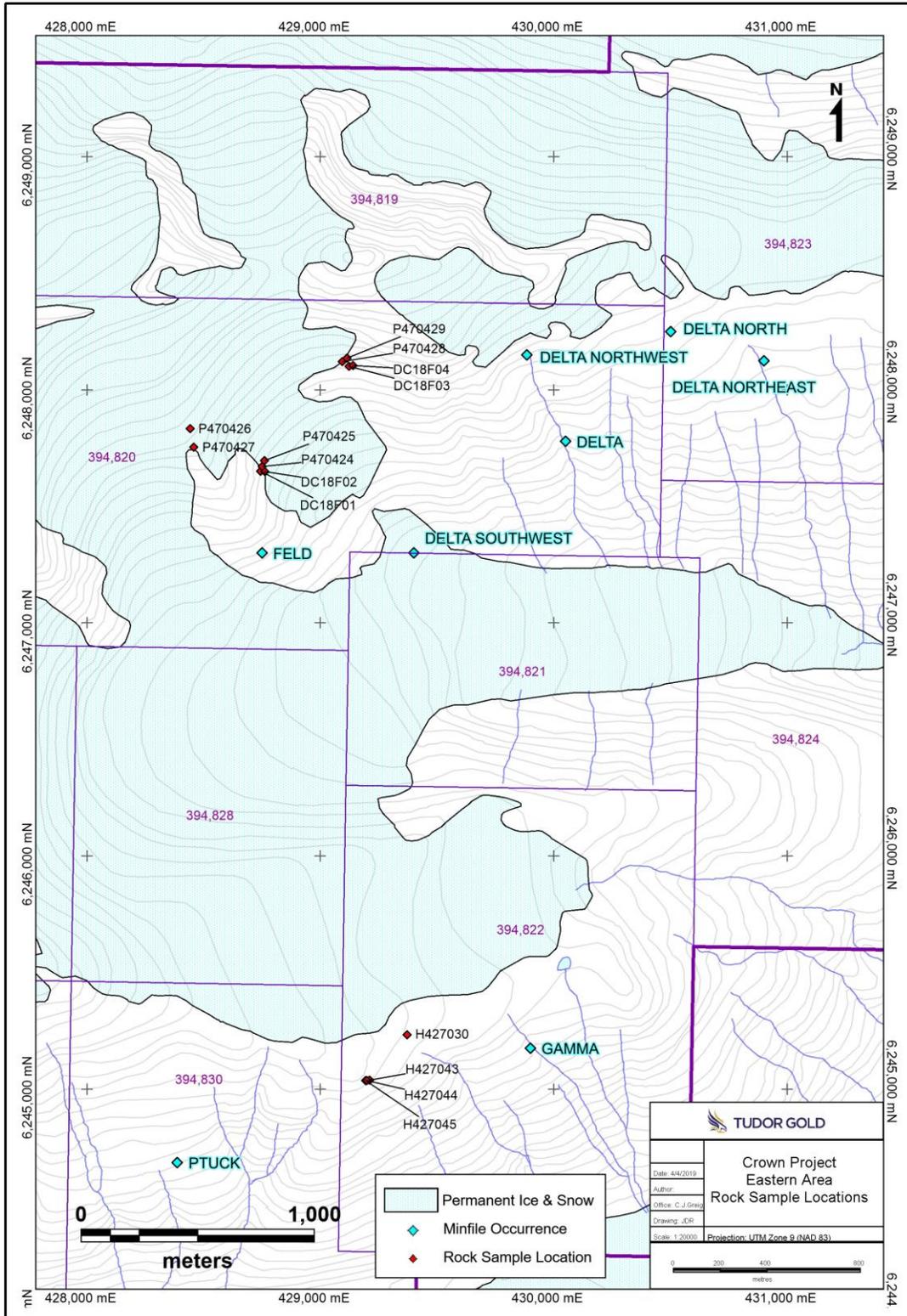


Figure 24. Crown Eastern Area rock sample locations

Three samples returned multi-gram gold values in this map sheet. In the area about 400 m north of the Feld showing sample DC18F02 returned 10.2 g/t Au, with 7.7 g/t Ag 737 ppm Cu, 463 ppm Zn and minimal Pb and As (figs. 25 to 30). There is no description for this sample, however, other samples collected within a few metres consisted of silicified siltstone containing up to 10% disseminated pyrite with minor arsenopyrite and galena and cut by narrow quartz-sulphide veins.

In the south part of the map sheet, about 750 m west of the Gamma showing, sample H427044 returned 9.3 g/t Au, 51.2 g/t Ag, 1660 ppm Cu, 766 ppm Pb, 2.43% Zn and >10,000 ppm As. This sample is from talus, but appears to be very near the source. It consists of brecciated, angular to sub-rounded siliceous black argillite fragments with 30-35% white drusy, vuggy quartz stockwork, containing 7-10% fine to medium grained disseminations and veinlets of pyrite and trace to <1% disseminated arsenopyrite (Appendix II). This is possible feeder veining to a massive, semi-flat pyrite layer in silica matrix that is located 5 m directly above this sample. Sample H427045, collected from the overlying pyritic horizon, returned 5.83 g/t Au, 20.5 g/t Ag, 439 ppm Pb, 585 ppm Zn and 2150 ppm As. This sample is from a possible siliceous exhalative horizon consisting of massive to semi-massive pyrite in white to pale grey silica, with 2-3% sharp 1-3mm fragments of black argillite. The pyrite horizon appears to overly massive white calcite and the upper contact is a baked intensely limonitic contact with overlying unaltered medium green volcanoclastic (?) rock.

Two other Ag, Pb, Zn-rich samples were collected to the north of the Feld occurrence. Sample P470426 returned 23.9 g/t Ag, 0.97% Pb, 5.76% Zn and 147 ppb Au. The sample is described as a 15cm wide quartz-iron carbonate vein with 8% galena and 7% sphalerite, within greywacke host rock. Sample P470428 returned 37.5 g/t Ag, 1.99% Pb, 5.17% Zn and 233 ppb Au. This sample is described as folded argillite cut by quartz-calcite veins with associated limonite, jarosite and galena clots comprising up to 2% of the sample.

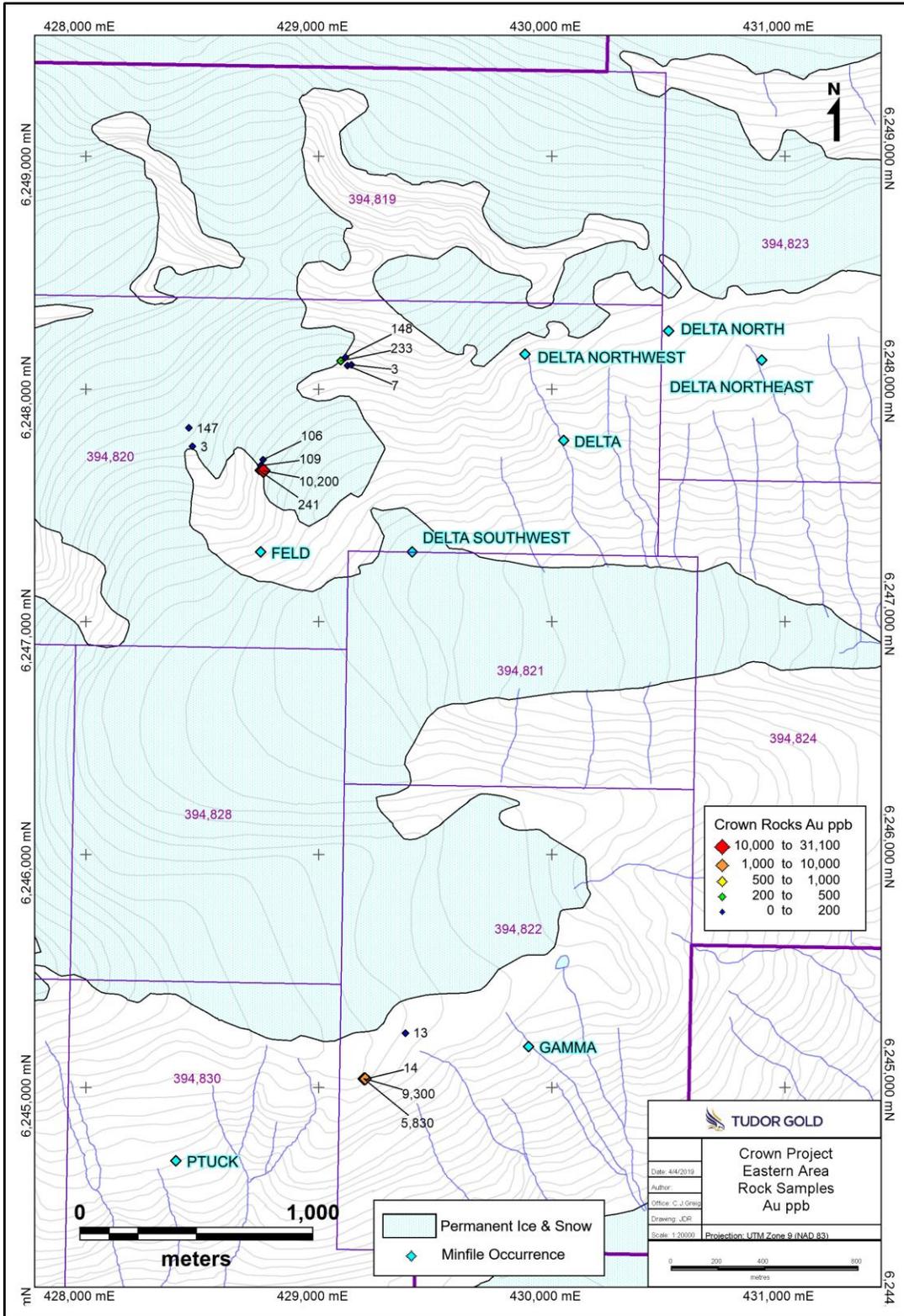


Figure 25. Crown Eastern Area rock samples Au values

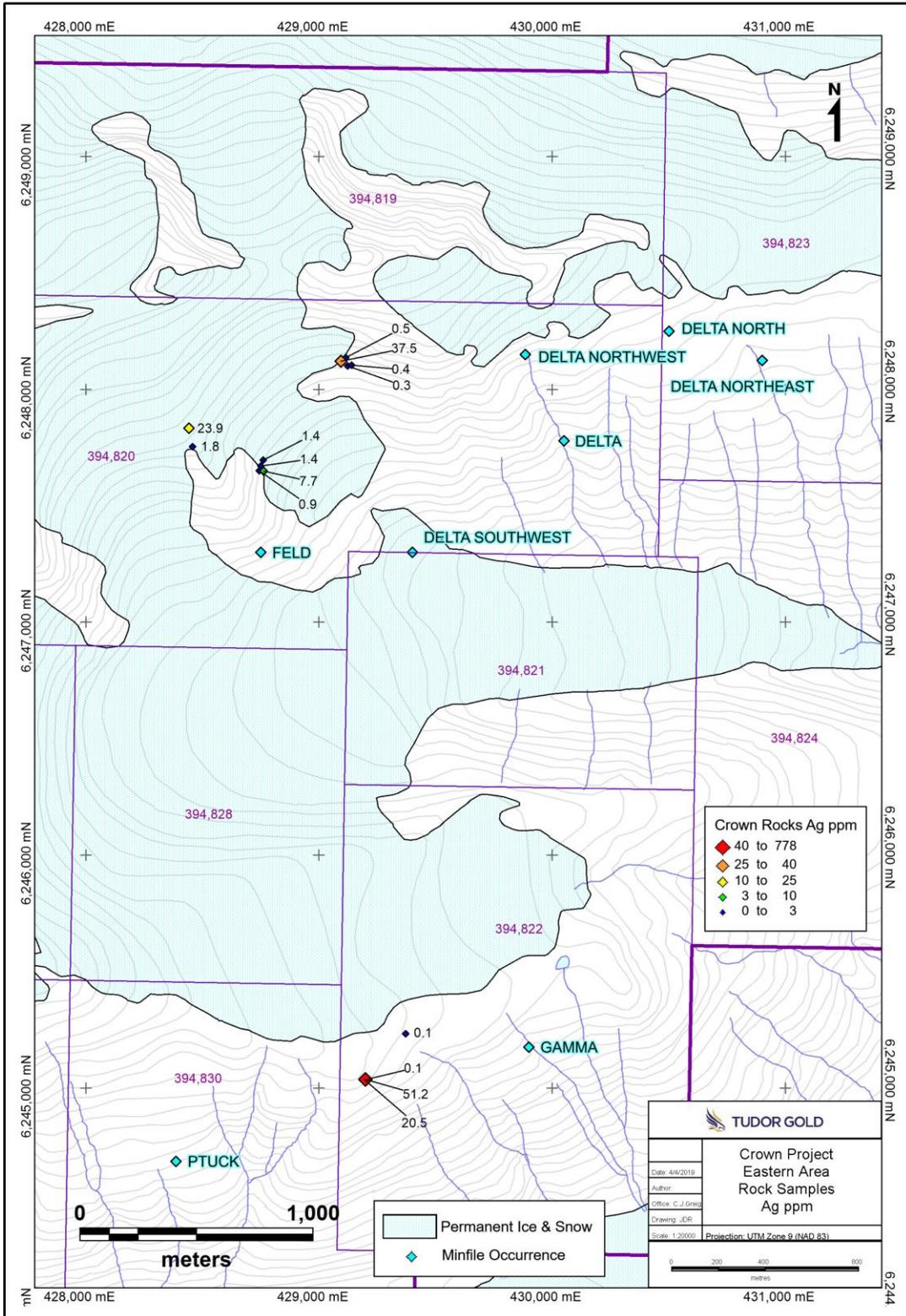


Figure 26. Crown Eastern Area rock samples Ag values

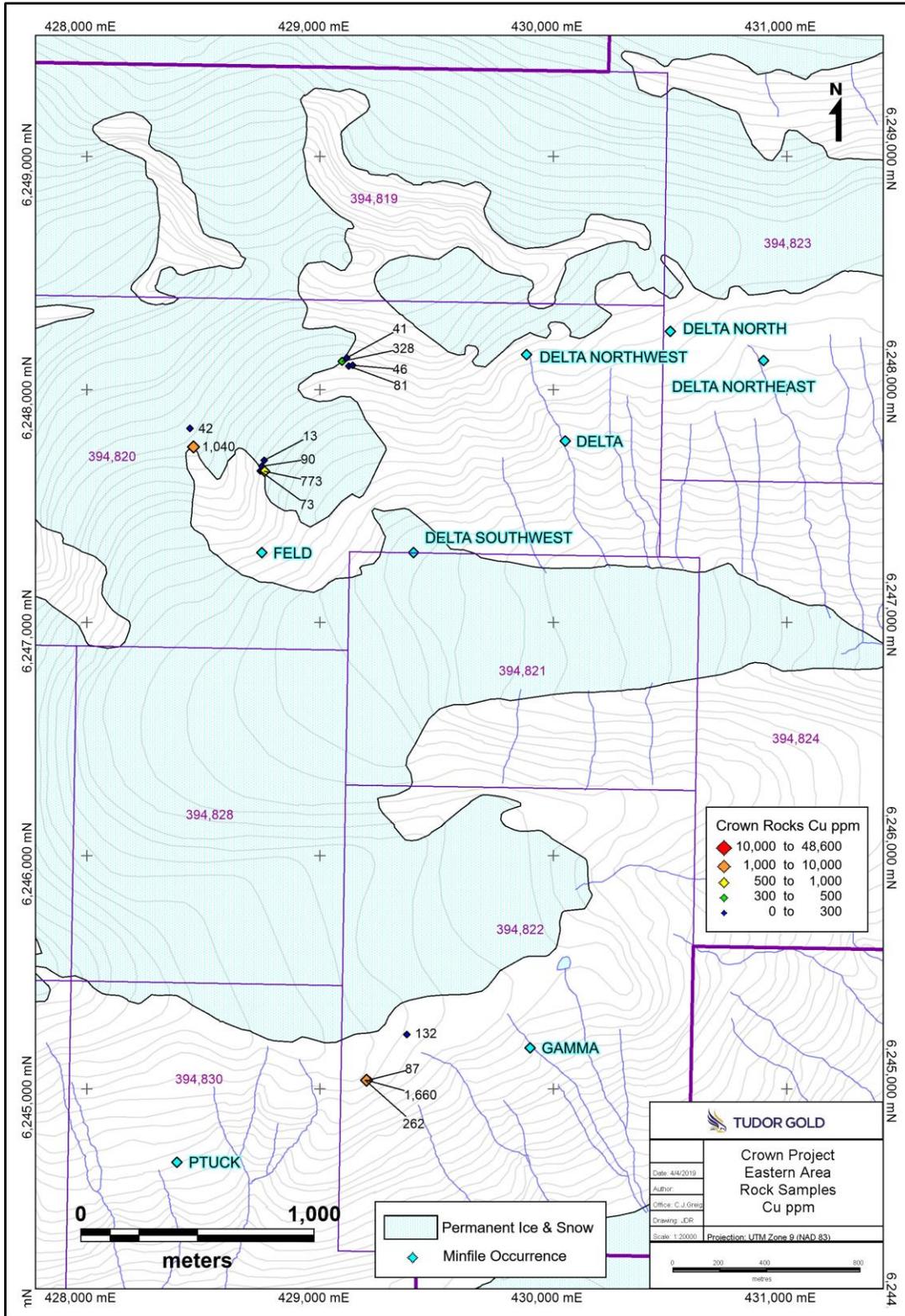


Figure 27. Crown Eastern Area rock samples Cu values

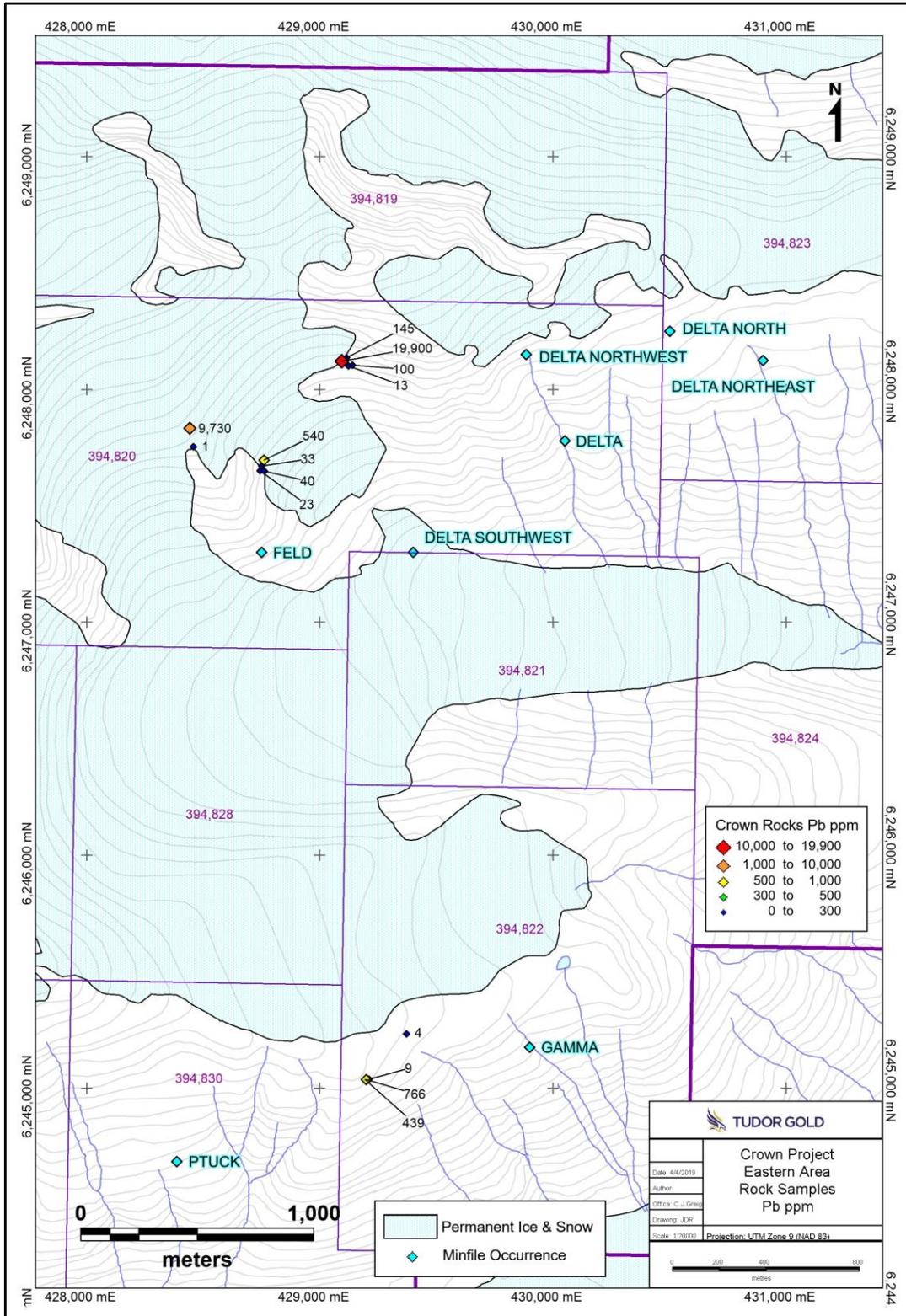


Figure 28. Crown Eastern Area rock samples Pb values

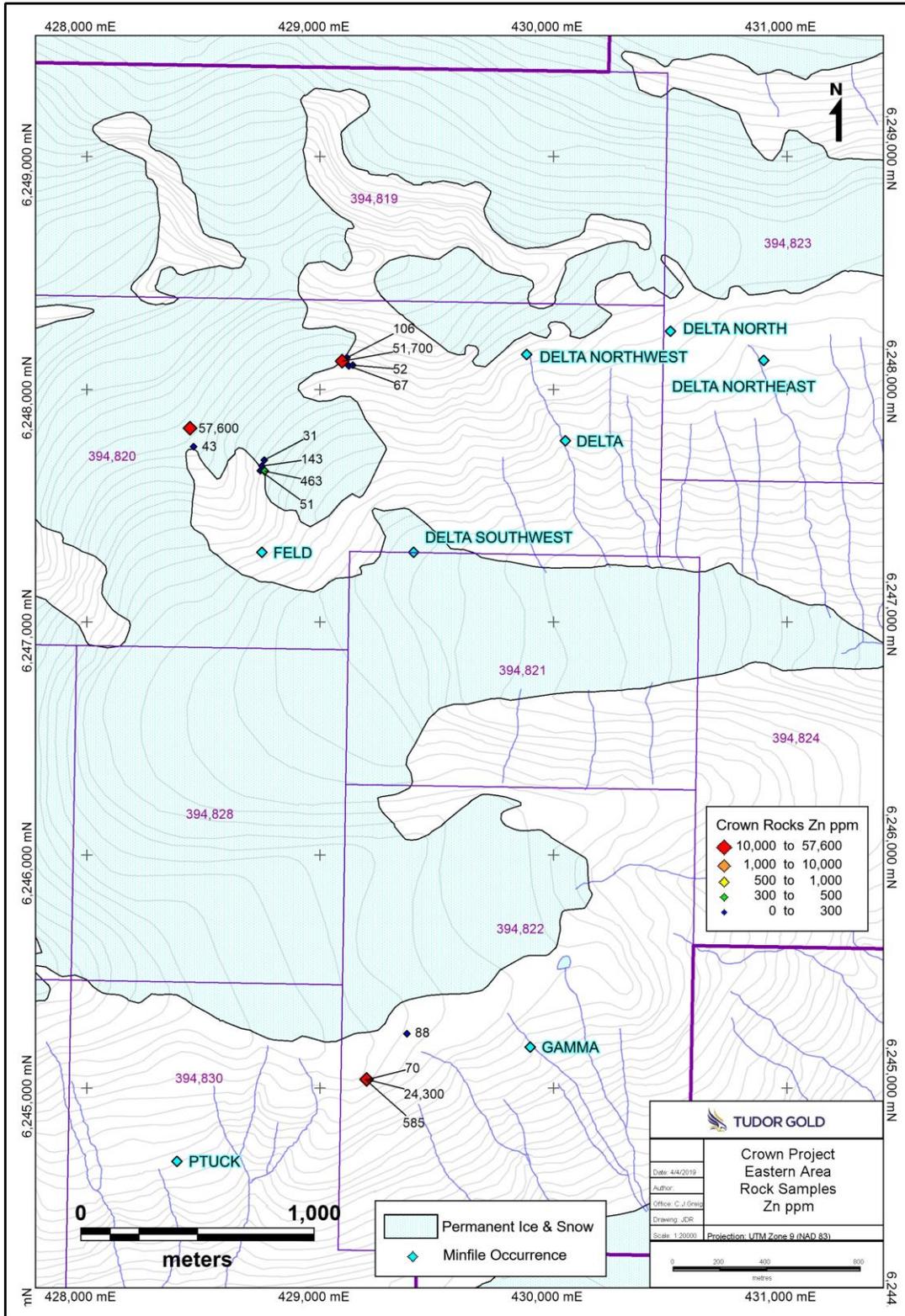


Figure 29. Crown Eastern Area rock samples Zn values

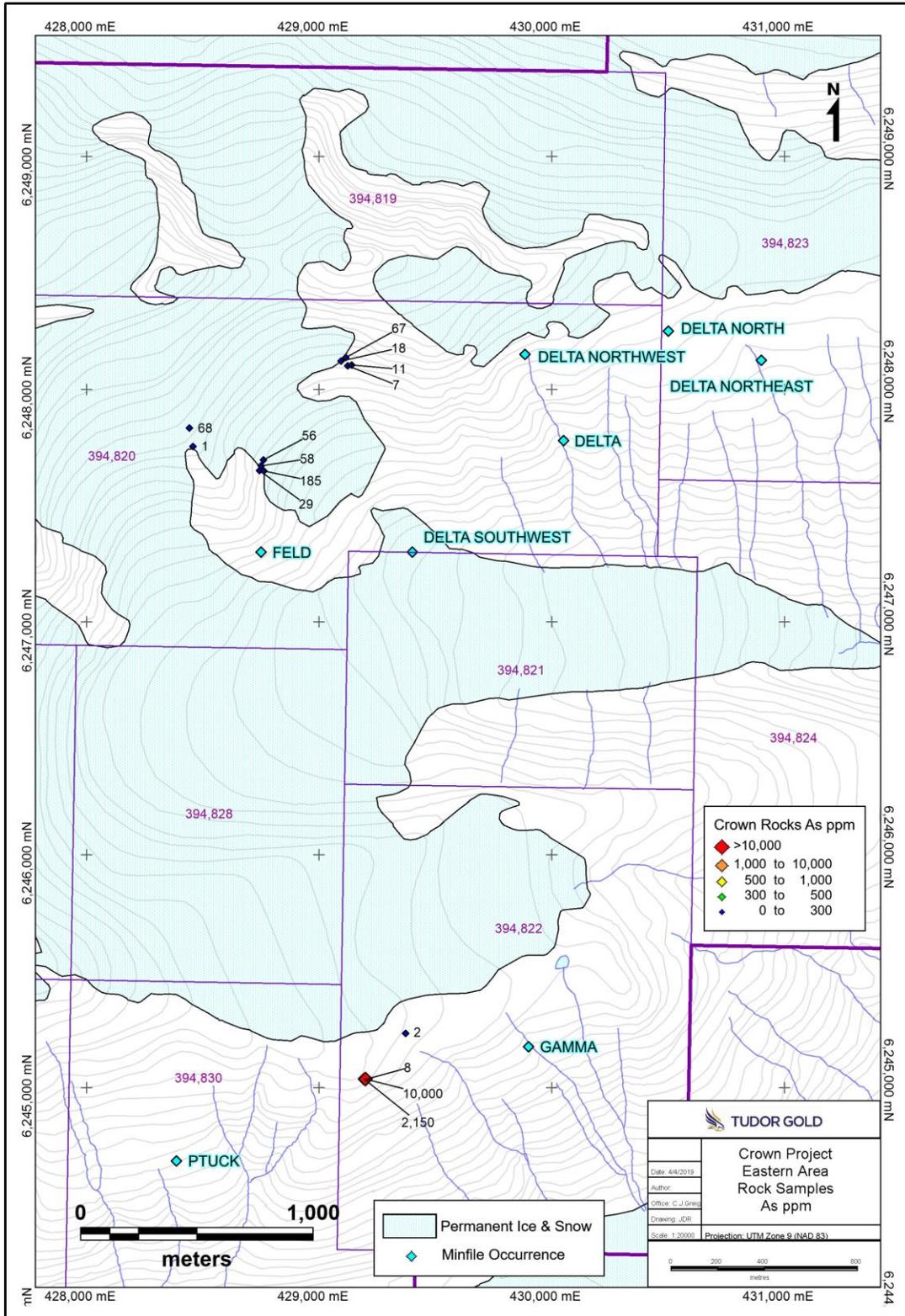


Figure 30. Crown Eastern Area rock samples As values

9.0 Conclusions and Recommendations

The 2018 exploration program on the Crown project focused on discovery of high grade precious metal veins, Eskay Creek-style VMS mineralization or Au-Cu porphyry-style mineralization, similar to that found on nearby properties. Work was undertaken in three areas of the property where previous work had revealed significant mineralization. Geological reconnaissance and rock sampling was concentrated in areas near the edges of retreating glacial ice sheets where new exposures of mineralization may be present.

In the southwestern sample area only one of the eleven samples collected returned significant results, yielding anomalous silver and copper. This sample is of limited interest since it was from a narrow, 2 cm quartz-pyrite-chalcopyrite vein.

In the central area one zone stood out, with ten moderately to strongly anomalous silver values over a distance of about 500 m, which also returned coincident anomalous arsenic, with lesser lead, zinc and gold. These samples were mostly described as quartz veins or breccia in andesite or volcanoclastic rocks that contain pyrite, arsenopyrite and tetrahedrite. The style of this mineralization appears to be similar to the nearby Cat-in-the-Hat showing that has mineralized stockwork veining over widths of up to 15 metres and has returned values such as 2.54 g/t Au, 1.36% As over 13 m.

In the eastern sample area several very significant anomalous samples were collected from rocks that may be of exhalative origin similar to Eskay Creek-type mineralization. Semi-massive pyrite in layered silica matrix returned 5.83 g/t Au, 20.5 g/t Ag, 439 ppm Pb, 585 ppm Zn and 2150 ppm As. Underlying brecciated siliceous argillite with 30-35% white drusy, vuggy quartz stockwork, containing fine disseminations and veinlets of pyrite and arsenopyrite returned 9.3 g/t Au, 51.2 g/t Ag, 1660 ppm Cu, 766 ppm Pb, 2.43% Zn and >10,000 ppm As. This may represent footwall feeder veining to the exhalative horizon. Elsewhere in the eastern sample area Ag, Pb, Zn-rich samples returned results such as 37.5 g/t Ag, 1.99% Pb, 5.17% Zn and 233 ppb Au. These were collected from quartz-iron carbonate veins with galena and sphalerite, cutting greywacke host rock, and may also represent footwall feeder veins.

Based on reconnaissance rock sampling undertaken on the Crown property it appears that the more encouraging results have come from the possible exhalative mineralization in the

eastern part of the 2018 exploration area and, secondly, that the anomalous results in the central sampling area perhaps have expanded the mineralized breccia zones that were known previously. It is recommended that further work should follow up on these two areas. Geological mapping, prospecting and additional rock sampling should be undertaken within the ice-free areas, focusing on areas of gossans or visible alteration. Detailed stream sediment sampling and slope contour soil sampling are also effective methods to test for “pathfinder elements” and help focus exploration upslope from those samples that return favourable results.

In summary, the presence on the eastern and central parts of the North Crown property of geochemically anomalous rock samples of exhalative-type, silica-pyrite bands and underlying feeder-type breccias and veins suggest the possibility of significant mineralization. Further geological and geochemical exploration is warranted and if further compelling evidence is found then geophysical surveying should be conducted to test areas at depth and under ice cover.

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- *All Assessment Reports are available on-line at
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BC Geological Survey Minfile descriptions are available on-line at
<http://minfile.gov.bc.ca/searchbasic.aspx>
BC Ministry of Energy and Mines, Exploration Assistant is available online at
http://webmap.em.gov.bc.ca/mapplace/minpot/ex_assist.cfm
All BC GSB publications are available on-line at
<http://www.empr.gov.bc.ca/MINING/GEOSCIENCE/PUBLICATIONSCATALOGUE/Pages/default.aspx>

11.0 Statement of Expenditures

Crown Project Exploration Cost Statement, March 1 - December 28, 2018					
Exploration Work Type	Details				Totals
Geological Consulting		<u>Days</u>	<u>Rate</u>	<u>Subtotal</u>	
J.Rowe - Geologist	Planning, Research, Report Writing	6	650	3,900	
K. Konkin - Geologist	Geology, Rock Sampling (0.5 d travel)	6	800	4,800	
D. Cremonese Geologist	Geology, Rock Sampling (0.5 d travel)	5	600	3,000	
J. Auston - Geologist	Geology, Rock Sampling (0.5 d travel)	9	500	4,500	
J. McCrea	Geology, Rock Sampling (0.5 d travel)	3.5	650	2,275	
A. Demoskoff	Geology, Rock Sampling (0.5 d travel)	3.5	500	1,750	
S. Pownall	Field Assistant, Rock Samp (0.5 d trav)	2.5	450	1,125	
R. Marks	Field Assistant, Rock Samp (0.5 d trav)	1.5	450	675	
C.J.Greig & Associates	GIS preparation of maps for report	3	450	1,350	
					23,375
Analytical		<u>No.</u>	<u>Rate</u>	<u>Subtotal</u>	
ALS Global Labs	Rocks 11 x \$36	11	36	396	
Activation Labs	Rocks 86 x \$34	86	34	2,924	
	Sample shipping			90	
					3,410
Transportation					
Bajo Reef Helicopters	Helicopter access to property - 8 hrs	8	1,280	10,240	
Yellowhead Helicopters	Helicopter access to property - 3 hrs	3	1,600	4,800	
					15,040
Equipment & Supplies					
	Field Supplies, Equipment, Rentals			975	
	Office Equipment, Software			100	
					1,075
Travel & Accommodation					
	Airfares, Luggage, Ground Transport			1,900	
	Food & Lodging 28 md @ 200/md	28	200	5,600	
					7,500
					-
	Total Expenditures				50,400

Note: 0.5 day travelling for each of the field personnel (pro-rated)

12.0 Author's Statement of Qualifications

I, Jeffrey D. Rowe, of 111-6109 Boundary Drive W, Surrey, British Columbia, Canada, hereby certify that:

1. I am a graduate of the University of British Columbia with a B.Sc. (Honours) (Geological Sciences, 1975) and have practiced my profession continuously from 1975 to 1999 and from 2007 to present.
2. I have been employed in the geoscience industry for over 36 years, and have explored for gold and base metals in North and South America for both senior and junior mining companies, on exploration properties as well as at a producing mine.
3. I am a member in good standing of the Association of Professional Engineers and Geoscientists of British Columbia (license #19950).
4. 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 makes the technical report misleading.
5. I have no direct or indirect interest in the property described herein, nor do I expect to receive any.
6. I am the author of the report entitled; "2018 Geochemical & Geological Reconnaissance on the Crown Project" dated April 11, 2019.

Dated at Surrey, British Columbia, this 11th day of April, 2019.

Respectfully submitted,

"J D Rowe"

Jeffrey D. Rowe, B.Sc., P.Geo.

Appendix I
Rock Sample
UTM Coordinates
&
Laboratory Analytical Certificates

SAMPLE	E_N83Z9	N_N83Z9	ELEV_M
140831	410284	6243218	1510
140832	410317	6243202	1515
140833	410270	6243220	1514
140834	410715	6243163	1468
140835	410508	6243132	1511
140836	410459	6243011	1531
140837	410466	6243314	1492
140838	410466	6243314	1492
140839	410592	6243208	1486
140840	410448	6243226	1504
140841	410448	6243226	1504

VA18227227 - Finalized

CLIENT : "TUGOLD - Tudor Gold Corp."

of SAMPLES : 3

DATE RECEIVED : 2018-08-22 DATE FINALIZED : 2018-09-25

PROJECT : "Treaty Creek"

CERTIFICATE COMMENTS : ""

PO NUMBER : " "

	Au-AA23	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Au	Ag	Al	As	B	Ba	Be	Bi	Ca	Cd	Co	Cr
DESCRIP	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm
140831	0.007	<0.2	0.52	21	<10	10	<0.5	<2	0.18	<0.5	128	7
140832	0.02	<0.2	0.49	9	<10	50	<0.5	<2	0.27	<0.5	60	17
140833	<0.005	<0.2	0.05	<2	<10	10	<0.5	<2	0.08	<0.5	10	<1

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Cu	Fe	Ga	Hg	K	La	Mg	Mn	Mo	Na	Ni	P
DESCRIP	ppm	%	ppm	ppm	%	ppm	%	ppm	ppm	%	ppm	ppm
140831	137	18.25	10	1	0.01	<10	0.48	53	2	0.01	119	520
140832	27	14.35	<10	1	0.06	<10	0.21	119	5	0.06	37	550
140833	10	>50	10	<1	<0.01	10	0.06	125	2	0.01	35	130

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Pb	S	Sb	Sc	Sr	Th	Ti	Tl	U	V	W	Zn
DESCRIP	ppm	%	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm
140831	7	>10.0	<2	<1	2	<20	0.03	<10	<10	36	<10	6
140832	2	5.71	<2	3	4	<20	0.13	<10	<10	97	<10	4
140833	8	0.04	<2	<1	5	<20	<0.01	<10	<10	325	<10	4

VA18249895 - Finalized

CLIENT : "TUGOLD - Tudor Gold Corp."

of SAMPLES : 8

DATE RECEIVED : 2018-09-14 DATE FINALIZED : 2018-10-15

PROJECT : "Doc"

CERTIFICATE COMMENTS : ""

PO NUMBER : " "

	Au-AA23	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Au	Ag	Al	As	B	Ba	Be	Bi	Ca	Cd	Co	Cr
DESCRIP	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm
140834	0.028	2.2	0.03	12	<10	<10	<0.5	<2	0.02	<0.5	25	8
140835	0.049	0.3	0.1	54	<10	10	<0.5	<2	0.2	<0.5	531	7
140836	0.622	>100	0.71	56	<10	40	<0.5	7	0.24	38.8	128	9
140837	<0.005	0.5	0.32	<2	<10	20	<0.5	<2	0.69	<0.5	45	3
140838	<0.005	1.8	0.2	<2	<10	10	<0.5	<2	0.61	<0.5	20	1
140839	0.011	0.7	0.08	2	<10	10	<0.5	<2	0.02	<0.5	14	3
140840	<0.005	0.2	1.33	2	<10	20	<0.5	<2	3.33	<0.5	60	6
140841	<0.005	0.2	1.22	6	<10	20	<0.5	<2	3.34	<0.5	42	7

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Cu	Fe	Ga	Hg	K	La	Mg	Mn	Mo	Na	Ni	P
DESCRIP	ppm	%	ppm	ppm	%	ppm	%	ppm	ppm	%	ppm	ppm
140834	101	13	<10	<1	0.01	<10	0.01	42	2	<0.01	2	10
140835	343	22	<10	<1	<0.01	<10	0.01	50	9	<0.01	114	1640
140836	>10000	11.1	<10	<1	0.04	<10	0.47	1350	4	0.01	25	180
140837	83	6.29	<10	1	0.05	<10	0.18	47	1	0.06	13	1490
140838	213	6.95	<10	<1	0.01	<10	0.41	77	1	0.03	9	690
140839	12	9.61	<10	<1	0.08	<10	0.02	32	5	0.01	12	70
140840	31	12	10	<1	0.04	<10	0.83	111	4	0.06	106	1440
140841	21	13.1	10	<1	0.03	<10	0.76	102	4	0.06	91	1430

	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41	ME-ICP41
SAMPLE	Pb	S	Sb	Sc	Sr	Th	Ti	Tl	U	V	W	Zn
DESCRIP	ppm	%	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm
140834	12	>10.0	<2	<1	1	<20	<0.01	<10	<10	2	<10	2
140835	2	>10.0	2	<1	2	<20	0.01	<10	<10	12	10	2
140836	639	4.29	14	8	8	<20	0.02	<10	<10	69	<10	962
140837	2	5.19	<2	1	21	<20	0.18	<10	<10	26	<10	2
140838	3	4.14	2	<1	8	<20	0.04	<10	<10	12	<10	5
140839	16	>10.0	<2	1	131	<20	<0.01	<10	<10	8	<10	3
140840	2	6	<2	3	11	<20	0.18	<10	<10	106	<10	6
140841	<2	4.79	<2	3	13	<20	0.16	<10	<10	130	<10	7

	Ag-OG46	Cu-OG46
SAMPLE	Ag	Cu
DESCRIP	ppm	%
140834		
140835		
140836	454	4.86
140837		
140838		
140839		
140840		
140841		

Sample No.	E_N83Z9	N_N83Z9	Elev (m)
DC18F01	428744	6247651	
DC18F02	428762	6247648	
DC18F03	429122	6248100	
DC18F04	429140	6248105	
DC18OR04	423040	6244702	1301
DC18OR06	423015	6244808	1314
DC18OR07	422961	6244816	1319
DC18OR08	422947	6244746	1313
H427029	423192	6244736	1306
H427030	429371	6245234	1518
H427031	423207	6244654	1300
H427032	423071	6244456	1265
H427034	422725	6246053	1453
H427035	422852	6245688	1428
H427036	422905	6245646	1419
H427037	422915	6245641	1415
H427038	422922	6245637	1416
H427039	422943	6245623	1415
H427040	422907	6245610	1417
H427041	422908	6245609	1417
H427042	422927	6245460	1388
H427043	429211	6245038	1538
H427044	429199	6245036	1562
H427045	429194	6245036	1563
H427046	423048	6244943	1314
H427047	423109	6244543	1283
H427048	423112	6244510	1282
H427049	423089	6244398	1244
H427050	423054	6244576	1288
H427437	422078	6247440	1708
H427444	422953	6243623	1274
H427445	422830	6243465	1311
H427446	422876	6243403	1317
H427447	423034	6244392	1252
H427448	422894	6244417	1309
H427449	423066	6244592	1292
H427568	422879	6245687	1423
H427569	422923	6245661	1418
H427570	422919	6245610	1415
H427571	422914	6245475	1396
H427665	422207	6245815	1415
H427666	422191	6245830	1416
H427690	422161	6245654	1407
H427691	422335	6245515	1468
H427692	422528	6245514	1477
H427693	422627	6245738	1466

Sample No.	E_N83Z9	N_N83Z9	Elev (m)
H427694	422613	6245803	1468
H427695	422613	6245803	1469
H427696	422608	6245851	1478
H427697	422902	6245102	1344
H427698	422779	6246197	1460
H427699	422741	6246083	1462
H427700	423056	6244576	1288
H427743	422193	6245774	1401
H427744	422187	6245792	1403
H427745	422133	6245507	1391
H427746	422195	6245270	1403
H427747	422195	6245270	1403
H427748	422773	6246196	1461
H427749	422764	6246132	1450
H427750	422793	6245733	1419
P470407	422991	6244824	1316
P470408	423175	6244621	1298
P470409	423173	6244672	1305
P470424	428751	6247671	1567
P470425	428761	6247695	1581
P470426	428442	6247833	1837
P470427	428458	6247753	1816
P470428	429094	6248121	1710
P470429	429114	6248136	1722
S022401	423109	6244543	1283
S022402	422922	6244455	1285
S022403	422933	6244364	1309
S022404	422981	6244225	1288
S022405	422970	6243600	1263
S022406	422938	6243638	1273
S022407	422801	6243487	1309
S022408	422849	6243517	1312
S022417	423003	6244604	1296
S022418	423131	6244721	1301
S022419	423054	6244763	1305
S022430	422231	6247735	1789
S022431	422132	6247552	1744
S022452	422408	6245550	1390
S022453	624450	6245600	1390
S022454	422425	6245575	1390

Results

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Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
P470414	< 5	0.6	1.7	12	176	3	4	14	169	0.71	47	< 10	< 10	< 0.5	< 2	0.63	9	4	5.35	< 10	< 1	0.37	12
P470415	14	< 0.2	< 0.5	5	1590	1	34	2	19	0.41	17	< 10	25	< 0.5	4	8.88	6	25	4.43	< 10	1	0.05	< 10
P470416	< 5	0.2	< 0.5	61	155	13	5	5	39	0.87	7	< 10	< 10	< 0.5	< 2	0.49	6	5	8.73	< 10	< 1	0.06	11
P470417	< 5	< 0.2	< 0.5	62	342	6	9	8	35	1.90	4	< 10	82	< 0.5	< 2	0.69	6	80	3.62	< 10	< 1	0.07	11
P470418	< 5	0.3	< 0.5	64	1250	3	37	5	28	1.43	< 2	< 10	26	< 0.5	< 2	0.45	11	39	4.49	< 10	< 1	0.02	< 10
P470419	> 5000	92.4	335	4690	49	2	9	> 5000	> 10000	< 0.01	12	< 10	< 10	< 0.5	4	0.01	3	33	3.41	< 10	< 1	< 0.01	< 10
P470420	1020	1.8	< 0.5	603	299	< 1	16	10	59	2.84	75	< 10	< 10	< 0.5	< 2	0.67	10	15	14.0	< 10	5	0.29	< 10
P470421	> 5000	5.6	< 0.5	1310	8	2	42	30	19	0.03	11	< 10	< 10	< 0.5	< 2	< 0.01	2	3	19.5	< 10	1	0.01	< 10
P470422	> 5000	2.2	1.5	1560	75	< 1	3	11	95	0.31	1110	< 10	< 10	< 0.5	12	0.04	23	3	17.9	< 10	3	< 0.01	< 10
P470423	2610	4.6	1.6	4520	560	5	20	7	60	2.87	33	< 10	< 10	< 0.5	6	0.54	17	37	13.6	10	4	0.05	< 10
P470424	109	1.4	0.7	90	1390	2	9	33	143	0.61	58	< 10	11	< 0.5	3	3.75	9	13	4.18	< 10	< 1	0.32	< 10
P470425	106	1.4	< 0.5	13	1760	2	4	540	31	0.35	56	< 10	15	< 0.5	3	5.84	6	9	4.70	< 10	< 1	0.17	< 10
P470426	147	23.9	650	42	3240	< 1	4	> 5000	> 10000	0.57	68	< 10	39	< 0.5	< 2	6.03	7	5	6.55	< 10	5	0.34	< 10
P470427	< 5	1.8	< 0.5	1040	1420	< 1	3	< 2	43	1.12	< 2	< 10	94	< 0.5	< 2	> 10.0	6	5	2.13	< 10	1	0.10	10
P470428	233	37.5	576	328	2640	1	16	> 5000	> 10000	1.34	18	< 10	24	< 0.5	< 2	3.72	8	13	5.04	< 10	4	0.26	< 10
P470429	148	0.5	0.7	41	603	< 1	6	145	106	0.82	67	< 10	66	< 0.5	< 2	4.75	4	18	2.01	< 10	< 1	0.20	< 10
H427437	1050	26.0	2.7	123	1170	2	3	70	305	0.40	30	< 10	< 10	< 0.5	4	3.00	6	19	3.95	< 10	2	0.20	< 10
H427438	9	1.2	< 0.5	317	928	5	10	20	50	0.53	5	< 10	19	0.7	< 2	3.30	11	9	3.06	< 10	< 1	0.40	< 10
H427439	5	0.9	8.6	99	645	9	27	20	915	1.31	3	< 10	94	< 0.5	< 2	2.69	5	69	5.64	< 10	< 1	0.12	< 10
H427442	< 5	1.1	< 0.5	10	272	3	11	9	9	0.35	17	< 10	< 10	< 0.5	< 2	0.18	6	28	4.05	< 10	< 1	0.12	< 10
H427443	< 5	0.8	< 0.5	26	1060	5	25	3	50	1.92	2	< 10	51	< 0.5	< 2	0.82	5	91	5.37	< 10	< 1	0.11	14
S022420	289	69.7	163	1280	303	2	8	> 5000	7570	0.02	63	< 10	< 10	< 0.5	< 2	0.14	3	30	1.16	< 10	< 1	0.01	< 10
S022421	731	75.0	465	5320	203	3	10	> 5000	> 10000	0.08	292	< 10	19	< 0.5	< 2	0.38	4	43	1.91	< 10	3	0.04	< 10
S022422	48	1.1	2.3	36	686	3	16	83	315	1.39	107	< 10	15	< 0.5	< 2	0.72	18	34	5.48	10	< 1	0.08	11
S022423	< 5	4.6	12.9	875	804	< 1	107	3020	1830	2.14	< 2	< 10	19	< 0.5	< 2	2.76	33	268	4.42	< 10	< 1	0.06	< 10
S022424	< 5	0.2	0.8	55	257	2	11	26	268	0.54	18	< 10	45	< 0.5	< 2	0.10	9	42	1.49	< 10	< 1	0.10	< 10
S022425	22	9.8	2.2	4880	656	7	58	21	504	2.74	54	< 10	16	< 0.5	4	6.08	35	114	4.75	10	< 1	0.03	11
S022426	< 5	0.9	< 0.5	21	85	7	15	9	429	0.83	35	< 10	13	< 0.5	< 2	0.14	5	8	3.93	< 10	< 1	0.29	< 10
S022427	< 5	0.8	0.7	97	1290	5	39	19	129	1.62	< 2	< 10	20	< 0.5	< 2	0.27	9	81	5.20	10	< 1	0.03	14
S022428	< 5	0.6	0.7	16	5760	< 1	13	4	101	0.66	12	< 10	73	< 0.5	< 2	> 10.0	2	13	2.02	< 10	< 1	0.27	15
S022429	> 5000	74.7	293	6330	82	3	3	> 5000	> 10000	0.01	305	< 10	< 10	< 0.5	< 2	0.01	1	37	1.93	< 10	< 1	< 0.01	< 10
S022430	5	0.2	< 0.5	10	500	3	2	26	97	0.60	3	< 10	158	< 0.5	< 2	0.34	3	19	2.18	< 10	< 1	0.27	27
S022431	5	0.4	< 0.5	16	128	5	2	19	20	0.47	4	< 10	17	< 0.5	5	0.11	5	19	2.81	< 10	< 1	0.26	< 10
S022432	> 5000	2.3	< 0.5	807	58	2	20	25	22	0.32	58	< 10	< 10	< 0.5	3	0.03	125	3	16.3	< 10	< 1	< 0.01	< 10
S022433	102	1.7	< 0.5	18	261	3	4	11	28	0.34	17	< 10	< 10	< 0.5	< 2	1.15	10	25	3.70	< 10	< 1	0.10	< 10
S022434	108	0.7	< 0.5	336	371	< 1	48	< 2	26	2.48	9	< 10	< 10	< 0.5	< 2	0.60	36	63	10.7	10	1	0.09	< 10
S022435	12	1.3	< 0.5	64	528	4	66	5	29	1.02	103	< 10	62	< 0.5	< 2	2.68	10	22	2.60	< 10	< 1	0.27	< 10
S022436	395	4.3	1.1	1770	143	< 1	14	24	87	0.81	24	< 10	< 10	< 0.5	< 2	0.03	7	4	18.6	< 10	5	< 0.01	< 10
DC18F01	241	0.9	< 0.5	73	1040	< 1	15	23	51	2.88	29	< 10	27	< 0.5	< 2	4.78	24	24	4.63	< 10	< 1	0.22	< 10
DC18F02	> 5000	7.7	1.2	773	156	< 1	11	40	463	0.43	185	< 10	< 10	< 0.5	2	0.05	84	4	20.0	< 10	< 1	0.14	< 10

Results

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Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Au	Pb	Zn
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	g/tonne	%	%
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	0.03	0.003	0.001
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	FA- GRA	ICP- OES	ICP- OES
P470414	0.20	0.019	0.107	4.14	4	4	6	0.10	< 20	5	< 2	< 10	17	< 10	19	6			
P470415	0.54	0.024	0.012	0.08	7	11	47	< 0.01	< 20	< 1	< 2	< 10	18	< 10	12	2			
P470416	0.83	0.045	0.162	10.4	< 2	5	3	0.18	< 20	2	< 2	< 10	84	< 10	13	10			
P470417	1.04	0.055	0.116	0.28	< 2	14	44	0.36	< 20	1	< 2	< 10	200	< 10	13	5			
P470418	1.90	0.059	0.052	1.65	4	13	3	0.25	< 20	3	< 2	< 10	166	< 10	16	30			
P470419	< 0.01	0.016	0.002	5.66	164	< 1	1	< 0.01	< 20	64	< 2	< 10	2	269	< 1	2	10.2	4.10	1.69
P470420	1.62	0.014	0.131	8.78	7	4	30	< 0.01	< 20	< 1	< 2	< 10	63	< 10	4	5			
P470421	< 0.01	0.012	0.002	> 20.0	8	< 1	< 1	< 0.01	< 20	< 1	< 2	< 10	6	< 10	< 1	8	16.3		
P470422	0.16	0.011	0.009	> 20.0	12	7	11	< 0.01	< 20	< 1	< 2	< 10	11	103	< 1	7	10.8		
P470423	1.92	0.042	0.132	8.89	7	10	32	0.22	< 20	< 1	< 2	< 10	145	< 10	7	9			
P470424	1.06	0.018	0.072	3.87	7	3	260	< 0.01	< 20	3	< 2	< 10	20	< 10	4	2			
P470425	1.75	0.038	0.052	1.38	5	5	423	< 0.01	< 20	< 1	< 2	< 10	15	< 10	15	3			
P470426	1.54	0.019	0.096	3.43	13	6	313	< 0.01	< 20	6	< 2	< 10	30	< 10	12	3	0.973	5.76	
P470427	0.92	0.034	0.072	0.36	4	4	279	< 0.01	< 20	2	< 2	< 10	67	< 10	6	1			
P470428	1.31	0.019	0.082	2.21	12	5	220	< 0.01	< 20	< 1	< 2	< 10	29	< 10	8	2	1.99	5.17	
P470429	0.43	0.025	0.048	0.67	3	2	64	0.03	< 20	< 1	< 2	< 10	29	< 10	5	2			
H427437	1.67	0.030	0.042	3.41	76	4	39	< 0.01	< 20	< 1	< 2	< 10	13	< 10	8	2			
H427438	1.06	0.063	0.127	1.36	3	7	297	0.02	< 20	2	< 2	< 10	57	< 10	5	2			
H427439	0.61	0.025	0.049	0.19	2	3	35	< 0.01	< 20	2	< 2	< 10	104	< 10	10	5			
H427442	0.20	0.073	0.027	4.25	6	6	4	0.13	< 20	1	< 2	< 10	36	< 10	12	17			
H427443	1.19	0.043	0.256	0.77	8	7	14	< 0.01	< 20	< 1	3	< 10	186	< 10	10	3			
S022420	0.01	0.022	0.002	0.91	871	< 1	17	< 0.01	< 20	3	< 2	< 10	5	< 10	< 1	< 1	2.68		
S022421	0.10	0.022	0.013	1.45	6300	3	29	< 0.01	< 20	5	2	< 10	7	< 10	1	< 1	3.43	1.07	
S022422	1.36	0.049	0.153	2.85	17	12	9	0.35	< 20	4	< 2	< 10	104	< 10	22	27			
S022423	2.45	0.046	0.032	0.50	9	8	8	0.39	< 20	3	< 2	< 10	132	< 10	12	29			
S022424	0.38	0.032	0.032	0.05	5	3	2	< 0.01	< 20	< 1	< 2	< 10	29	< 10	5	3			
S022425	1.38	0.014	0.779	0.39	5	6	105	0.10	< 20	< 1	< 2	< 10	230	< 10	14	3			
S022426	0.18	0.042	0.098	2.14	5	5	7	< 0.01	< 20	3	< 2	< 10	20	< 10	5	2			
S022427	1.08	0.073	0.050	1.47	3	12	3	0.15	< 20	2	< 2	< 10	271	< 10	17	6			
S022428	0.14	0.016	0.262	0.89	3	3	142	0.03	< 20	< 1	< 2	< 10	26	< 10	27	1			
S022429	< 0.01	0.021	0.003	2.66	767	< 1	1	< 0.01	< 20	14	< 2	< 10	< 1	22	< 1	< 1	6.16	1.05	1.56
S022430	0.12	0.060	0.016	0.07	4	1	7	0.01	< 20	< 1	< 2	< 10	6	< 10	8	5			
S022431	0.07	0.033	0.043	1.48	3	< 1	3	< 0.01	< 20	2	< 2	< 10	2	< 10	4	3			
S022432	0.12	0.011	0.012	> 20.0	16	1	< 1	0.01	< 20	3	< 2	< 10	13	< 10	< 1	6	11.5		
S022433	0.29	0.042	0.075	4.23	9	3	28	< 0.01	< 20	< 1	< 2	< 10	62	< 10	3	2			
S022434	2.16	0.038	0.198	7.03	7	11	22	0.21	< 20	1	< 2	< 10	161	< 10	6	10			
S022435	0.59	0.025	0.036	0.68	10	4	106	< 0.01	< 20	1	< 2	< 10	34	< 10	5	2			
S022436	0.48	0.013	0.019	19.7	8	5	1	< 0.01	< 20	1	< 2	< 10	36	< 10	< 1	7			
DC18F01	1.18	0.042	0.131	1.97	3	10	56	0.12	< 20	< 1	< 2	< 10	95	< 10	6	6			
DC18F02	0.04	0.013	0.028	18.2	20	2	3	< 0.01	< 20	< 1	< 2	< 10	15	< 10	1	8	10.2		

Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
DC180R-01	< 5	0.5	< 0.5	13	42	6	1	47	2	0.10	67	< 10	24	< 0.5	< 2	0.02	1	24	1.36	< 10	4	0.04	< 10
DC180R-02	< 5	0.4	0.5	1	13	6	1	9	164	0.72	< 2	< 10	< 10	< 0.5	< 2	0.01	< 1	2	1.56	< 10	2	0.23	17
DC180R-03	< 5	0.3	< 0.5	2	10	4	< 1	6	120	0.55	2	< 10	11	< 0.5	< 2	< 0.01	< 1	4	1.70	< 10	5	0.19	< 10
DC180R-04	< 5	38.7	< 0.5	22	74	5	1	114	76	0.18	934	< 10	< 10	< 0.5	< 2	0.13	6	43	6.74	< 10	3	0.12	< 10
DC180R-05	< 5	0.3	< 0.5	161	983	< 1	18	< 2	51	2.64	< 2	< 10	18	< 0.5	< 2	5.73	20	61	5.30	< 10	< 1	1.54	< 10
DC180R-06	15	6.6	< 0.5	16	2820	1	3	81	67	0.85	47	< 10	< 10	0.7	< 2	3.09	23	3	7.36	< 10	1	0.54	< 10
DC180R-07	9	20.0	< 0.5	12	2050	2	3	68	21	0.95	75	< 10	< 10	0.9	3	1.79	1	4	16.0	< 10	6	0.55	< 10
DC180R-08	7	39.6	< 0.5	19	102	1	5	130	9	0.23	99	< 10	< 10	< 0.5	2	0.18	14	5	13.8	< 10	2	0.17	< 10
DC180R-09	< 5	10.8	< 0.5	13	91	6	9	114	10	0.55	350	< 10	< 10	< 0.5	< 2	0.01	10	8	4.70	< 10	26	0.37	< 10
DC180R-10	7	10.0	< 0.5	6	81	23	29	543	49	0.24	6440	< 10	< 10	< 0.5	< 2	< 0.01	16	23	10.3	< 10	34	0.09	< 10
DC180R-11	< 5	0.3	< 0.5	2	49	4	2	13	4	0.16	23	< 10	56	< 0.5	< 2	< 0.01	< 1	32	0.56	< 10	1	0.05	< 10
DC18IF-01	17	3.3	5.8	37	2220	2	12	30	559	1.81	52	< 10	< 10	< 0.5	< 2	0.74	7	12	4.43	< 10	< 1	0.32	< 10
DC18IF-02	6	0.5	6.7	133	345	3	3	4	536	0.58	10	< 10	< 10	< 0.5	< 2	0.10	5	14	4.25	< 10	< 1	0.11	< 10
DC18-TR-01	306	2.0	< 0.5	57	821	1	16	11	28	2.20	84	< 10	< 10	< 0.5	< 2	2.39	23	40	7.94	< 10	3	0.09	< 10

Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
DC180R-01	0.02	0.019	0.002	1.51	23	< 1	2	< 0.01	< 20	< 1	< 2	< 10	1	< 10	< 1	6
DC180R-02	0.01	0.030	0.002	1.92	< 2	< 1	13	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	4	6
DC180R-03	< 0.01	0.024	0.001	2.16	3	< 1	3	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	2	6
DC180R-04	0.03	0.014	0.033	9.40	67	< 1	6	< 0.01	< 20	2	5	< 10	9	< 10	1	4
DC180R-05	1.71	0.098	0.105	1.14	4	21	74	0.24	< 20	6	< 2	< 10	213	< 10	6	2
DC180R-06	1.01	0.019	0.123	8.80	12	10	111	< 0.01	< 20	< 1	< 2	< 10	59	< 10	7	4
DC180R-07	0.99	0.017	0.115	> 20.0	25	2	56	0.01	< 20	< 1	< 2	< 10	18	< 10	2	7
DC180R-08	0.02	0.015	0.048	> 20.0	30	2	17	< 0.01	< 20	6	< 2	< 10	17	< 10	4	6
DC180R-09	0.04	0.017	0.010	5.42	30	< 1	3	< 0.01	< 20	< 1	3	< 10	3	< 10	4	5
DC180R-10	0.07	0.017	0.013	14.1	657	1	1	< 0.01	< 20	< 1	42	< 10	13	< 10	4	5
DC180R-11	0.02	0.020	< 0.001	0.26	11	< 1	2	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	< 1	3
DC18IF-01	1.66	0.052	0.096	3.17	8	8	10	0.11	< 20	< 1	< 2	< 10	35	< 10	12	12
DC18IF-02	0.40	0.065	0.030	3.86	3	3	5	0.02	< 20	4	< 2	< 10	19	< 10	7	5
DC18-TR-01	1.35	0.022	0.164	6.88	12	14	108	0.28	< 20	6	< 2	< 10	135	< 10	4	16

Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
S022437	8	< 0.2	< 0.5	52	483	7	3	< 2	49	1.99	< 2	< 10	35	< 0.5	< 2	1.74	13	8	4.97	< 10	< 1	0.09	< 10
S022438	< 5	< 0.2	< 0.5	335	466	2	18	< 2	33	2.10	< 2	< 10	35	< 0.5	< 2	1.51	27	15	5.18	< 10	< 1	0.32	< 10
S022439	< 5	< 0.2	< 0.5	276	513	2	21	< 2	35	2.39	< 2	< 10	41	< 0.5	< 2	1.68	24	19	4.91	< 10	< 1	0.42	< 10
S022440	15	< 0.2	< 0.5	50	504	< 1	14	< 2	38	3.35	< 2	< 10	29	< 0.5	< 2	2.36	17	49	3.40	< 10	< 1	0.04	< 10
S022441	18	< 0.2	< 0.5	49	512	< 1	16	< 2	41	3.43	< 2	< 10	28	< 0.5	< 2	2.34	18	48	3.42	< 10	< 1	0.03	< 10
S022442	68	0.4	< 0.5	27	86	2	3	2	5	0.46	5	< 10	12	< 0.5	4	0.03	48	21	3.69	< 10	< 1	0.03	< 10
S022443	< 5	< 0.2	< 0.5	20	764	< 1	15	< 2	45	1.65	< 2	< 10	20	< 0.5	< 2	4.94	24	31	4.18	< 10	< 1	0.06	< 10
S022444	< 5	< 0.2	0.5	14	804	< 1	19	< 2	39	2.48	< 2	< 10	23	< 0.5	< 2	7.00	16	57	5.30	< 10	1	0.09	< 10
S022445	< 5	< 0.2	< 0.5	348	399	2	82	< 2	14	2.03	< 2	< 10	12	< 0.5	< 2	1.31	74	32	5.42	< 10	< 1	0.08	< 10
S022446	< 5	< 0.2	< 0.5	61	399	< 1	8	< 2	20	2.38	< 2	< 10	62	< 0.5	< 2	1.58	10	9	3.51	< 10	< 1	0.43	< 10
H427529	< 5	< 0.2	< 0.5	45	1010	< 1	27	< 2	47	1.70	10	< 10	19	< 0.5	5	5.02	28	68	4.80	< 10	< 1	0.11	< 10
H427530	14	< 0.2	< 0.5	43	424	< 1	22	< 2	26	2.10	< 2	< 10	63	< 0.5	< 2	1.74	17	45	3.18	< 10	< 1	0.26	< 10
H427531	< 5	< 0.2	< 0.5	59	895	< 1	13	< 2	42	1.10	< 2	< 10	24	< 0.5	< 2	6.71	14	22	5.69	< 10	< 1	0.13	< 10
H427532	< 5	< 0.2	< 0.5	7	236	< 1	24	< 2	12	5.33	< 2	< 10	14	< 0.5	< 2	5.49	11	252	1.30	< 10	< 1	0.05	< 10
H427533	< 5	< 0.2	< 0.5	43	326	< 1	28	< 2	15	1.75	< 2	< 10	10	< 0.5	< 2	3.52	14	56	1.37	< 10	< 1	0.02	< 10
H427534	< 5	< 0.2	< 0.5	42	943	< 1	32	< 2	57	1.68	< 2	< 10	23	< 0.5	< 2	5.79	29	53	5.23	< 10	1	0.08	< 10
H427535	23	0.6	< 0.5	2220	464	< 1	34	< 2	30	3.41	5	< 10	19	< 0.5	< 2	1.79	118	78	11.4	< 10	< 1	0.03	< 10
H427536	13	0.4	< 0.5	383	236	4	120	< 2	16	2.64	3	< 10	13	< 0.5	< 2	1.13	117	52	5.99	< 10	< 1	0.34	< 10
H427537	< 5	0.2	< 0.5	380	304	3	44	< 2	20	2.35	< 2	< 10	12	< 0.5	< 2	0.99	98	10	5.84	< 10	1	0.61	16
H427538	< 5	< 0.2	< 0.5	84	370	6	29	< 2	20	1.64	< 2	< 10	25	< 0.5	< 2	1.38	26	49	3.62	< 10	< 1	0.46	< 10
H427033	< 5	< 0.2	< 0.5	114	269	1	12	< 2	31	2.52	4	< 10	47	< 0.5	< 2	2.08	14	12	1.61	< 10	< 1	0.14	< 10
S1	26	0.2	< 0.5	498	974	13	27	10	86	3.60	< 2	< 10	90	< 0.5	< 2	1.24	50	54	6.15	< 10	4	0.11	< 10
S2	14	< 0.2	< 0.5	130	824	2	33	7	98	3.67	9	< 10	74	< 0.5	< 2	1.00	29	63	4.45	< 10	< 1	0.08	< 10

Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
S022437	0.97	0.174	0.085	0.10	2	7	55	0.29	< 20	7	< 2	< 10	166	< 10	7	3
S022438	1.62	0.103	0.068	1.47	2	11	67	0.32	< 20	4	3	< 10	180	< 10	7	6
S022439	1.74	0.124	0.066	1.10	3	13	78	0.34	< 20	3	< 2	< 10	189	< 10	8	5
S022440	1.48	0.318	0.024	0.01	< 2	5	64	0.16	< 20	6	< 2	< 10	110	< 10	3	2
S022441	1.55	0.313	0.021	< 0.01	3	5	64	0.16	< 20	< 1	< 2	< 10	108	< 10	3	2
S022442	0.12	0.076	0.005	2.63	< 2	1	3	< 0.01	< 20	< 1	< 2	< 10	18	< 10	< 1	2
S022443	1.92	0.105	0.018	0.25	2	11	49	< 0.01	< 20	< 1	< 2	< 10	49	< 10	4	2
S022444	2.17	0.175	0.035	0.02	3	25	71	< 0.01	< 20	< 1	< 2	< 10	82	< 10	6	2
S022445	1.52	0.118	0.035	4.10	2	7	59	0.13	< 20	3	< 2	< 10	86	< 10	3	3
S022446	1.57	0.077	0.060	0.38	2	8	115	0.29	< 20	4	2	< 10	149	< 10	4	2
H427529	2.69	0.154	0.013	0.21	4	25	43	< 0.01	< 20	< 1	< 2	< 10	61	< 10	3	2
H427530	1.32	0.098	0.059	0.56	< 2	9	81	0.24	< 20	< 1	< 2	< 10	103	< 10	5	3
H427531	1.59	0.160	0.027	0.39	4	27	48	< 0.01	< 20	< 1	< 2	< 10	44	< 10	5	2
H427532	1.83	0.146	< 0.001	0.09	< 2	4	78	0.05	< 20	< 1	< 2	< 10	26	< 10	< 1	< 1
H427533	1.73	0.097	0.004	0.09	< 2	5	25	0.04	< 20	< 1	3	< 10	21	< 10	2	1
H427534	2.76	0.151	0.028	0.52	2	29	53	< 0.01	< 20	< 1	< 2	< 10	59	< 10	5	2
H427535	1.12	0.402	0.011	3.72	3	9	43	0.26	< 20	3	< 2	< 10	489	< 10	3	6
H427536	1.97	0.043	0.023	3.68	5	6	82	0.23	< 20	< 1	< 2	< 10	89	< 10	1	3
H427537	1.37	0.122	0.073	3.22	2	8	52	0.26	< 20	< 1	< 2	< 10	81	< 10	9	3
H427538	1.21	0.090	0.051	1.87	< 2	8	51	0.24	< 20	2	< 2	< 10	103	< 10	5	3
H427033	1.09	0.068	0.039	0.02	< 2	3	49	0.12	< 20	3	< 2	< 10	53	< 10	2	1
S1	1.93	0.081	0.082	0.05	2	10	78	0.15	< 20	< 1	< 2	< 10	165	< 10	6	3
S2	1.77	0.079	0.085	0.07	3	9	59	0.08	< 20	< 1	< 2	< 10	98	< 10	5	2

Results

Activation Laboratories Ltd.

Report: A18-12273

Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
H427651	6	< 0.2	< 0.5	22	626	< 1	48	28	100	2.55	< 2	< 10	10	< 0.5	< 2	1.52	28	43	4.47	< 10	< 1	0.01	< 10
H427652	58	< 0.2	1.5	37	492	5	2	119	138	1.17	2	< 10	36	0.6	< 2	0.97	6	30	3.13	< 10	< 1	0.06	17
H427653	< 5	< 0.2	< 0.5	50	412	< 1	40	4	73	2.98	< 2	< 10	11	< 0.5	< 2	1.03	27	65	4.80	< 10	< 1	0.02	< 10
H427654	20	< 0.2	< 0.5	70	240	3	11	29	42	0.52	126	< 10	32	0.6	< 2	0.83	16	8	4.63	< 10	< 1	0.43	13
H427655	38	< 0.2	< 0.5	44	114	18	3	55	18	0.47	27	< 10	63	< 0.5	< 2	0.22	6	10	2.78	< 10	< 1	0.38	19
H427656	< 5	< 0.2	< 0.5	31	511	< 1	69	3	47	2.26	< 2	< 10	< 10	< 0.5	< 2	2.16	25	107	4.28	< 10	< 1	< 0.01	< 10
H427657	6	< 0.2	< 0.5	197	1140	< 1	161	< 2	79	3.74	2	< 10	16	< 0.5	< 2	4.25	40	265	6.93	10	< 1	0.05	< 10
H427658	< 5	< 0.2	< 0.5	10	863	< 1	54	< 2	23	0.66	74	< 10	54	< 0.5	< 2	6.33	17	34	4.39	< 10	< 1	0.36	< 10
H427659	< 5	< 0.2	< 0.5	54	790	< 1	72	3	29	0.91	90	< 10	66	< 0.5	4	5.53	23	39	4.61	< 10	< 1	0.43	< 10
H427660	< 5	< 0.2	< 0.5	49	735	< 1	39	< 2	30	0.59	12	< 10	45	< 0.5	4	4.94	12	14	3.81	< 10	< 1	0.26	20
H427661	< 5	< 0.2	0.7	93	466	< 1	39	< 2	70	4.57	2	< 10	< 10	< 0.5	< 2	4.86	34	41	5.48	10	< 1	< 0.01	< 10
H427662	12	0.3	< 0.5	21	974	2	6	7	73	1.46	9	< 10	61	< 0.5	< 2	4.64	13	10	3.96	< 10	< 1	0.25	< 10
H427663	< 5	0.7	1.0	600	788	< 1	65	6	176	3.12	< 2	< 10	11	< 0.5	< 2	1.53	33	176	5.71	< 10	< 1	0.01	< 10
H427664	215	6.1	13.6	86	836	3	20	1000	1140	0.17	13	< 10	21	< 0.5	3	1.43	10	31	2.73	< 10	< 1	0.05	< 10
H427665	13	0.8	0.9	6	51	7	1	20	73	0.13	53	< 10	83	< 0.5	< 2	0.02	< 1	48	0.72	< 10	498	0.05	< 10
H427666	< 5	0.8	< 0.5	2	79	7	1	25	3	0.11	32	< 10	51	< 0.5	< 2	< 0.01	< 1	27	1.13	< 10	4	0.03	< 10
H427667	> 5000	63.0	1.9	3	4650	< 1	28	52	54	0.32	295	< 10	86	< 0.5	3	> 10.0	11	22	8.43	< 10	2	0.09	< 10
H427668	108	1.8	0.6	10	4030	< 1	49	403	27	0.81	2040	< 10	97	< 0.5	5	8.14	20	20	7.56	< 10	2	0.21	< 10
H427669	38	2.1	4.8	28	3960	< 1	79	288	227	0.41	187	< 10	50	< 0.5	3	8.12	20	20	6.76	< 10	< 1	0.20	< 10
H427670	8	0.5	2.4	12	2190	< 1	166	107	185	2.13	262	< 10	302	0.6	3	5.41	35	234	5.95	< 10	< 1	0.48	< 10
H427671	< 5	< 0.2	< 0.5	84	748	< 1	239	< 2	83	4.89	4	< 10	21	< 0.5	< 2	1.53	31	304	6.11	10	< 1	0.06	< 10
H427672	3060	40.3	0.7	3940	52	3	28	638	112	0.10	7	< 10	< 10	< 0.5	< 2	0.03	11	22	3.64	< 10	< 1	0.02	< 10
H427673	11	< 0.2	< 0.5	5	814	< 1	136	< 2	76	3.07	5	< 10	14	< 0.5	< 2	1.53	35	296	6.27	< 10	< 1	0.02	< 10
H427674	6	< 0.2	< 0.5	4	323	2	3	10	64	0.14	67	< 10	51	< 0.5	< 2	4.13	< 1	11	1.32	< 10	< 1	0.09	< 10
H427675	22	< 0.2	< 0.5	35	628	< 1	51	14	65	2.53	4	< 10	10	0.5	< 2	2.41	34	67	9.09	< 10	1	0.18	10
H427676	454	18.4	< 0.5	6	49	2	3	20	9	0.31	571	< 10	18	< 0.5	3	0.04	< 1	11	2.57	< 10	3	0.24	< 10
H427677	16	< 0.2	< 0.5	21	1060	3	10	18	85	0.92	43	< 10	61	0.6	2	4.66	9	5	3.83	< 10	< 1	0.29	< 10
H427678	10	< 0.2	< 0.5	5	20	7	< 1	19	10	0.57	380	< 10	88	< 0.5	< 2	0.03	< 1	3	1.57	< 10	< 1	0.37	28
H427679	1790	< 0.2	< 0.5	2	54	2	< 1	18	6	0.33	676	< 10	< 10	< 0.5	< 2	0.02	< 1	3	7.02	< 10	16	0.25	12
H427680	144	< 0.2	< 0.5	2	24	1	< 1	20	3	0.60	512	< 10	84	< 0.5	< 2	0.01	< 1	4	1.41	< 10	1	0.39	30
H427681	3480	0.2	< 0.5	3	87	3	1	15	11	0.28	928	< 10	< 10	< 0.5	< 2	< 0.01	< 1	3	13.4	< 10	30	0.18	< 10
H427682	187	< 0.2	< 0.5	2	37	6	< 1	22	2	0.45	694	< 10	29	< 0.5	< 2	0.02	< 1	4	3.52	< 10	< 1	0.51	25
H427683	181	9.2	< 0.5	4	103	7	2	31	6	0.44	464	< 10	44	< 0.5	3	1.04	1	4	2.08	< 10	12	0.27	16
H427684	15	0.2	< 0.5	20	9650	3	4	19	41	0.97	13	< 10	61	1.2	< 2	2.42	20	< 1	5.01	< 10	< 1	0.67	< 10
H427685	143	43.1	1.5	> 10000	323	1700	58	72	368	1.65	56	< 10	24	0.8	2	4.09	88	29	14.4	< 10	< 1	0.24	13
H427686	16	1.2	7.9	2320	1210	605	23	36	275	1.97	9	< 10	26	2.8	< 2	1.88	23	22	7.42	< 10	< 1	0.23	16
H427687	> 5000	> 100	24.8	5850	74	9	< 1	> 5000	829	0.06	3660	< 10	< 10	< 0.5	2	0.02	< 1	36	1.66	< 10	6	0.02	< 10
H427688	150	7.1	0.8	> 10000	204	3	21	14	85	2.30	33	< 10	237	< 0.5	4	1.03	36	2	3.46	< 10	< 1	0.76	10
H427689	788	> 100	461	3900	257	15	2	> 5000	> 10000	0.03	21	< 10	< 10	< 0.5	4	0.01	8	27	1.64	< 10	< 1	0.02	< 10
H427690	23	1.9	< 0.5	122	1190	4	32	16	117	0.53	31	< 10	106	< 0.5	3	0.34	13	24	2.49	< 10	< 1	0.19	12
H427691	11	0.4	< 0.5	9	50	4	< 1	137	36	0.91	9	< 10	385	< 0.5	< 2	0.01	< 1	18	0.73	< 10	2	0.31	38
H427692	< 5	< 0.2	< 0.5	69	274	< 1	75	< 2	50	1.87	15	< 10	< 10	< 0.5	< 2	1.47	35	115	12.9	< 10	< 1	0.08	< 10

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Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
H427693	7	< 0.2	< 0.5	97	419	< 1	81	9	60	2.92	< 2	< 10	< 10	< 0.5	< 2	2.78	48	55	10.00	< 10	2	0.31	< 10
H427694	< 5	0.4	3.5	9	3350	4	21	333	1460	1.10	346	< 10	11	0.9	< 2	6.31	23	53	7.98	< 10	6	0.39	< 10
H427695	5	1.3	0.9	15	252	3	7	35	32	0.74	160	< 10	< 10	< 0.5	< 2	0.24	18	6	12.6	< 10	2	0.38	< 10
H427696	7	< 0.2	< 0.5	55	577	3	69	< 2	72	1.62	13	< 10	17	< 0.5	< 2	3.03	41	81	8.39	< 10	3	0.06	< 10
H427697	8	6.2	2.1	5	2720	1	5	76	107	0.09	43	< 10	< 10	< 0.5	4	2.53	4	5	15.3	< 10	< 1	0.05	< 10
H427698	< 5	< 0.2	1.0	142	939	2	140	< 2	89	4.89	34	< 10	45	< 0.5	< 2	6.56	43	286	7.42	< 10	1	0.04	< 10
H427699	13	< 0.2	3.0	66	251	17	71	8	278	3.56	5	< 10	19	0.5	< 2	0.70	28	84	5.94	< 10	< 1	0.24	< 10
H427700	8	> 100	32.3	95	411	26	17	1260	2380	0.21	645	< 10	< 10	< 0.5	< 2	0.66	23	17	5.28	< 10	11	0.11	< 10
H427034	20	0.7	8.6	49	232	28	48	22	753	1.89	36	< 10	26	0.6	< 2	2.13	8	8	4.57	< 10	< 1	0.17	< 10
H427035	16	1.9	14.2	183	43	2	1	5	1640	0.19	7	< 10	77	< 0.5	< 2	0.01	1	19	1.04	< 10	< 1	0.17	10
H427036	20	0.4	< 0.5	115	744	< 1	41	6	76	2.47	< 2	< 10	22	< 0.5	< 2	2.01	32	105	6.60	< 10	< 1	1.35	< 10
H427037	80	1.0	< 0.5	56	23	1	64	4	72	0.56	444	< 10	< 10	< 0.5	< 2	0.16	42	17	7.35	< 10	6	0.30	< 10
H427038	19	1.0	< 0.5	719	4290	< 1	9	6	19	0.97	10	< 10	65	< 0.5	2	4.18	20	9	4.60	< 10	< 1	0.54	< 10
H427039	< 5	< 0.2	< 0.5	16	384	1	30	< 2	45	1.35	7	< 10	< 10	< 0.5	5	1.89	12	67	17.4	< 10	< 1	0.04	< 10
H427040	22	0.3	< 0.5	15	66	3	2	16	28	0.06	71	< 10	12	< 0.5	< 2	0.02	1	29	1.39	< 10	< 1	0.04	< 10
H427041	< 5	< 0.2	< 0.5	35	828	< 1	87	2	65	3.65	21	< 10	26	< 0.5	< 2	1.91	41	212	7.84	< 10	2	0.16	< 10
H427042	< 5	< 0.2	< 0.5	67	175	< 1	107	4	67	3.32	14	< 10	10	< 0.5	< 2	0.85	48	154	10.1	< 10	< 1	0.03	< 10
H427043	14	< 0.2	< 0.5	87	459	< 1	6	9	71	2.22	8	< 10	12	< 0.5	< 2	0.30	11	12	9.55	< 10	< 1	0.22	< 10
H427044	> 5000	51.2	282	1660	568	2	5	804	> 10000	1.30	> 10000	< 10	< 10	< 0.5	163	0.06	1820	12	10.8	< 10	7	0.03	< 10
H427045	> 5000	20.5	7.0	262	498	< 1	5	461	597	1.06	2150	< 10	< 10	< 0.5	11	0.04	53	4	18.1	< 10	< 1	0.03	< 10
H427046	172	2.1	0.8	177	415	3	8	37	126	0.86	493	< 10	12	< 0.5	4	0.56	28	10	7.05	< 10	< 1	0.33	< 10
H427047	89	0.5	< 0.5	< 1	69	15	3	< 2	18	0.06	344	< 10	< 10	< 0.5	< 2	< 0.01	< 1	3	16.5	< 10	3	0.03	< 10
H427048	< 5	13.3	< 0.5	24	2940	2	3	85	33	0.27	71	< 10	11	< 0.5	< 2	4.25	29	10	9.20	< 10	1	0.19	< 10
H427049	104	74.8	7.4	36	62	6	4	506	485	0.12	1280	< 10	< 10	< 0.5	< 2	0.05	1	14	6.66	< 10	3	0.09	< 10
H427050	79	1.3	< 0.5	5	108	4	10	6	18	0.07	425	< 10	< 10	< 0.5	< 2	0.05	2	7	15.5	< 10	20	0.05	< 10
S022401	27	25.7	0.9	7	141	11	7	87	147	0.26	637	< 10	< 10	< 0.5	< 2	0.23	1	4	16.5	< 10	16	0.15	< 10
S022402	8	< 0.2	< 0.5	64	773	< 1	39	< 2	68	3.51	< 2	< 10	630	< 0.5	< 2	3.90	29	141	5.92	< 10	< 1	2.92	< 10
S022403	6	< 0.2	< 0.5	62	233	< 1	62	< 2	120	1.16	12	< 10	< 10	< 0.5	< 2	1.00	32	79	15.5	< 10	5	0.17	< 10
S022404	12	0.3	< 0.5	74	1330	< 1	120	16	159	4.92	14	< 10	61	< 0.5	< 2	8.20	30	497	8.43	10	< 1	2.13	< 10
S022405	11	2.0	< 0.5	7	84	23	1	23	29	0.21	196	< 10	11	< 0.5	< 2	0.02	3	10	4.39	< 10	< 1	0.16	14
S022406	35	7.5	0.5	18	96	32	4	88	21	0.11	383	< 10	< 10	< 0.5	< 2	0.02	< 1	5	15.7	< 10	3	0.07	< 10
S022407	5	< 0.2	< 0.5	66	522	< 1	97	< 2	52	3.09	< 2	< 10	17	< 0.5	< 2	4.76	35	164	5.61	< 10	< 1	0.05	< 10
S022408	5	< 0.2	< 0.5	43	680	1	108	< 2	45	3.63	< 2	< 10	12	< 0.5	< 2	6.53	32	194	8.67	< 10	< 1	< 0.01	< 10
S022409	3650	71.8	105	202	493	1	6	> 5000	> 10000	0.05	57	< 10	13	< 0.5	< 2	0.02	6	13	4.11	< 10	< 1	0.03	< 10
S022410	40	4.2	1.2	7910	835	2	41	6	111	2.18	4	< 10	45	< 0.5	< 2	1.29	28	51	5.62	< 10	< 1	1.20	< 10
S022411	17	1.2	< 0.5	553	1490	< 1	24	24	94	0.85	3	< 10	22	1.5	< 2	3.45	15	1	21.6	< 10	< 1	0.20	< 10
S022412	13	1.1	3.7	28	1250	< 1	13	145	362	0.52	32	13	80	< 0.5	< 2	6.63	18	7	5.19	< 10	< 1	0.26	< 10
S022413	< 5	< 0.2	< 0.5	70	589	< 1	118	7	39	4.06	< 2	< 10	46	< 0.5	< 2	2.72	31	335	5.41	< 10	< 1	0.01	< 10
S022414	< 5	< 0.2	< 0.5	4	1100	2	< 1	2	3	0.15	6	< 10	25	< 0.5	< 2	6.25	< 1	29	1.01	< 10	< 1	< 0.01	< 10
S022415	9	0.2	< 0.5	6	248	8	2	25	17	0.56	27	< 10	141	< 0.5	< 2	0.02	< 1	10	2.64	< 10	< 1	0.20	25
S022416	5	0.6	0.5	7	776	10	2	29	47	0.50	22	< 10	98	0.5	3	0.22	< 1	25	2.54	< 10	< 1	0.26	27
S022417	36	2.0	< 0.5	10	216	1	< 1	63	151	0.30	201	< 10	< 10	< 0.5	< 2	0.28	16	6	8.26	< 10	< 1	0.21	< 10

Results

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Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
S022418	> 5000	25.9	3.2	625	1080	< 1	28	196	119	0.73	> 10000	< 10	< 10	< 0.5	233	0.49	168	8	18.2	< 10	< 1	0.09	< 10
S022419	9	< 0.2	< 0.5	46	551	< 1	44	< 2	39	1.46	40	< 10	< 10	< 0.5	3	5.28	20	70	11.8	< 10	< 1	0.05	< 10
H427736	183	1.5	< 0.5	62	1170	4	9	41	86	1.12	192	< 10	44	< 0.5	4	4.13	10	9	3.45	< 10	< 1	0.25	< 10
H427737	24	< 0.2	< 0.5	12	497	3	1	9	60	0.20	301	< 10	46	< 0.5	< 2	3.40	2	28	1.24	< 10	< 1	0.09	< 10
H427738	148	< 0.2	< 0.5	3	37	< 1	2	16	17	0.57	293	< 10	51	< 0.5	< 2	0.05	< 1	4	1.59	< 10	< 1	0.36	20
H427739	806	< 0.2	< 0.5	3	55	3	1	17	6	0.32	1340	< 10	11	< 0.5	5	0.11	< 1	16	3.42	< 10	9	0.25	19
H427740	178	28.5	1.9	> 10000	1600	6	52	10	237	3.47	13	< 10	33	< 0.5	< 2	0.52	77	< 1	13.8	10	< 1	0.98	< 10
H427741	57	2.7	1.8	4110	377	7	4	4	58	0.35	7	< 10	21	0.6	< 2	0.54	6	7	0.94	< 10	< 1	0.13	< 10
H427742	414	27.2	3.4	> 10000	353	2450	33	11	155	0.20	115	< 10	< 10	0.8	< 2	0.27	35	< 1	> 30.0	< 10	< 1	< 0.01	< 10
H427743	< 5	0.3	< 0.5	41	40	13	1	19	30	0.26	18	< 10	17	< 0.5	< 2	0.01	2	31	1.67	< 10	5	0.09	< 10
H427744	< 5	0.3	< 0.5	83	27	12	< 1	2	13	0.51	5	< 10	32	< 0.5	< 2	< 0.01	< 1	3	0.87	< 10	25	0.19	< 10
H427745	10	< 0.2	< 0.5	14	57	8	2	15	6	0.28	20	< 10	32	< 0.5	< 2	0.04	< 1	34	1.59	< 10	< 1	0.16	16
H427746	12	1.1	< 0.5	101	585	10	41	10	67	1.89	54	< 10	< 10	< 0.5	< 2	0.18	43	130	14.4	< 10	< 1	0.26	< 10
H427747	7	< 0.2	< 0.5	8	1480	1	36	< 2	96	2.62	45	< 10	22	< 0.5	< 2	3.49	37	253	4.51	< 10	< 1	0.04	< 10
H427748	32	0.5	1.2	52	284	22	36	19	151	1.40	48	< 10	18	< 0.5	< 2	1.01	10	5	5.63	< 10	< 1	0.27	< 10
H427749	5	< 0.2	< 0.5	54	634	< 1	48	< 2	53	1.91	6	< 10	11	< 0.5	< 2	5.28	30	53	10.0	< 10	< 1	0.07	< 10
H427750	< 5	0.2	0.6	28	25	1	< 1	9	111	0.37	11	< 10	91	< 0.5	< 2	0.01	< 1	3	0.95	< 10	< 1	0.26	14
H427029	100	0.3	< 0.5	77	3580	< 1	25	5	15	0.73	156	< 10	78	< 0.5	2	> 10.0	18	41	4.01	< 10	< 1	0.39	< 10
H427030	13	< 0.2	< 0.5	132	1340	< 1	8	4	90	3.08	2	< 10	22	< 0.5	< 2	0.89	16	13	8.95	10	< 1	0.16	< 10
H427031	38	1.6	4.5	85	1330	< 1	43	97	318	1.82	191	< 10	28	< 0.5	< 2	7.91	24	169	6.26	< 10	< 1	0.85	< 10
H427032	300	> 100	0.7	> 10000	366	< 1	19	2	44	1.47	26	< 10	34	< 0.5	< 2	2.10	15	45	2.60	< 10	369	0.12	< 10
H427638	< 5	< 0.2	< 0.5	74	788	< 1	115	< 2	47	2.34	6	< 10	65	< 0.5	< 2	5.35	27	155	5.23	< 10	1	0.38	< 10
H427639	< 5	< 0.2	< 0.5	68	285	< 1	109	< 2	45	2.66	9	< 10	16	< 0.5	< 2	2.61	26	146	2.24	< 10	< 1	0.07	< 10
H427640	10	0.4	1.4	58	342	4	32	6	125	3.03	9	< 10	11	< 0.5	< 2	2.17	8	61	5.52	< 10	< 1	0.06	< 10
H427641	21	4.5	1.5	69	378	8	21	16	121	1.99	28	< 10	18	0.9	< 2	3.91	7	87	6.05	< 10	< 1	0.07	13
H427642	< 5	1.3	0.6	96	1290	4	147	< 2	67	2.95	< 2	< 10	11	< 0.5	2	1.78	33	345	6.76	< 10	< 1	0.04	< 10
H427643	143	11.1	1.2	> 10000	753	13	11	83	99	0.76	17	< 10	38	< 0.5	6	1.79	21	10	4.63	< 10	< 1	0.74	15
H427644	< 5	< 0.2	< 0.5	81	657	< 1	228	6	61	3.38	3	< 10	24	< 0.5	< 2	0.91	40	332	6.03	< 10	< 1	0.09	< 10
H427645	< 5	< 0.2	< 0.5	40	1030	< 1	157	< 2	65	3.08	< 2	< 10	16	< 0.5	< 2	1.08	40	368	6.45	< 10	< 1	0.04	< 10
H427646	16	0.6	< 0.5	175	44	8	1	5	8	0.28	6	< 10	53	< 0.5	< 2	0.02	3	6	2.03	< 10	< 1	0.20	24
H427647	< 5	1.3	11.0	580	704	2	3	39	2210	1.96	5	< 10	41	< 0.5	< 2	0.98	17	15	3.15	< 10	< 1	0.08	< 10
H427648	19	0.2	< 0.5	54	721	1	15	23	78	2.46	19	< 10	23	1.1	5	0.80	16	10	5.02	< 10	< 1	0.43	< 10
H427649	12	< 0.2	< 0.5	11	86	53	< 1	20	36	0.28	746	< 10	18	< 0.5	5	0.24	3	25	2.72	< 10	2	0.12	< 10
H427650	48	0.8	< 0.5	31	613	3	< 1	101	46	1.22	30	< 10	14	< 0.5	< 2	1.73	5	2	3.29	< 10	< 1	0.38	< 10
H427568	< 5	< 0.2	< 0.5	108	638	< 1	111	2	47	2.45	< 2	< 10	20	< 0.5	< 2	2.68	41	360	5.66	< 10	< 1	1.45	< 10
H427569	6	0.3	< 0.5	165	411	< 1	78	3	17	2.65	< 2	< 10	27	0.7	< 2	3.85	41	140	4.11	< 10	< 1	0.21	< 10
H427570	19	0.9	< 0.5	674	646	3	11	2	53	2.77	< 2	< 10	< 10	0.5	4	0.35	49	19	9.65	< 10	2	1.25	< 10
H427571	13	0.2	< 0.5	196	500	< 1	18	< 2	42	2.23	< 2	< 10	21	< 0.5	< 2	1.24	33	58	5.09	< 10	< 1	1.38	< 10
P470401	6	< 0.2	< 0.5	28	663	8	1	11	65	1.95	3	< 10	97	0.5	< 2	1.73	5	14	3.00	10	< 1	0.18	15
P470402	5	< 0.2	< 0.5	64	945	< 1	136	< 2	43	3.01	14	< 10	18	< 0.5	< 2	5.72	34	241	5.84	< 10	< 1	0.02	< 10
P470403	< 5	< 0.2	< 0.5	84	626	< 1	87	< 2	37	5.07	< 2	< 10	12	< 0.5	< 2	4.91	25	134	4.59	< 10	< 1	0.05	< 10
P470404	10	< 0.2	< 0.5	207	1000	3	8	7	83	1.67	< 2	< 10	32	0.7	< 2	1.97	13	18	6.13	< 10	< 1	0.47	< 10

Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
P470405	123	4.1	< 0.5	830	48	14	8	41	57	0.44	29	< 10	17	< 0.5	2	0.46	16	9	4.08	< 10	< 1	0.48	28
P470406	6	17.0	1.1	> 10000	588	< 1	48	39	219	2.33	< 2	< 10	< 10	< 0.5	< 2	0.96	52	91	5.97	< 10	< 1	0.02	< 10
P470407	5	1.9	1.7	29	1950	6	9	128	1010	0.62	1110	< 10	11	< 0.5	< 2	4.22	9	37	15.4	< 10	6	0.22	< 10
P470408	< 5	< 0.2	< 0.5	214	1890	< 1	15	4	118	3.52	15	< 10	123	0.5	< 2	4.61	14	62	7.11	10	< 1	1.51	< 10
P470409	106	13.6	1.8	49	2030	1	9	82	138	2.54	28	< 10	42	< 0.5	110	6.19	26	24	7.39	10	< 1	0.69	< 10
P470410	34	8.9	3.9	436	3940	< 1	2	> 5000	303	1.61	12	< 10	66	1.0	< 2	2.06	9	5	3.13	< 10	< 1	0.92	< 10
P470411	6	< 0.2	0.9	40	138	13	34	14	227	0.71	11	< 10	71	< 0.5	< 2	0.18	4	23	3.45	< 10	< 1	0.08	< 10
P470412	> 5000	87.8	8.9	2430	43	2	2	> 5000	454	0.04	1610	< 10	< 10	< 0.5	< 2	0.02	< 1	15	2.68	< 10	6	0.02	< 10
P470413	82	0.6	< 0.5	55	1150	3	6	44	74	3.13	19	< 10	65	< 0.5	5	4.21	11	153	4.74	10	< 1	0.10	< 10
H427444	216	3.7	< 0.5	19	66	10	2	294	62	0.68	75	< 10	11	< 0.5	3	0.08	< 1	17	2.37	< 10	< 1	0.39	22
H427445	9	< 0.2	< 0.5	51	641	< 1	39	4	39	2.81	5	< 10	32	< 0.5	< 2	0.84	9	234	13.4	< 10	1	0.03	< 10
H427446	21	0.2	< 0.5	96	368	< 1	51	13	23	2.96	< 2	< 10	< 10	< 0.5	< 2	4.51	13	92	14.3	< 10	< 1	< 0.01	< 10
H427447	35	1.4	0.9	25	26	6	< 1	591	158	0.28	50	< 10	18	< 0.5	< 2	0.04	< 1	22	1.74	< 10	< 1	0.28	< 10
H427448	49	0.3	< 0.5	27	1550	2	2	10	66	2.09	36	< 10	25	< 0.5	2	7.98	9	15	6.04	< 10	< 1	0.14	< 10
H427449	7	0.5	1.1	13	1620	4	22	62	512	1.14	766	< 10	< 10	0.6	< 2	5.67	24	76	11.8	< 10	< 1	0.34	< 10

Results

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Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Ag	Cu	Pb	Zn	Au
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	%	%	g/tonne
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	3	0.001	0.003	0.001	0.03
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	ICP-OES	ICP-OES	ICP-OES	ICP-OES	FA-GRA
H427651	1.82	0.065	0.080	0.02	3	5	44	0.54	< 20	< 1	< 2	< 10	83	< 10	13	23					
H427652	0.37	0.098	0.081	0.50	< 2	6	24	0.45	< 20	3	< 2	< 10	29	< 10	21	22					
H427653	2.87	0.116	0.043	0.25	< 2	9	13	0.45	< 20	3	< 2	< 10	105	< 10	13	14					
H427654	0.11	0.019	0.273	2.27	4	7	97	< 0.01	< 20	< 1	< 2	< 10	55	< 10	7	6					
H427655	0.04	0.022	0.172	0.87	3	3	73	< 0.01	< 20	< 1	< 2	< 10	26	< 10	4	4					
H427656	1.43	0.044	0.061	0.46	2	5	53	0.52	< 20	< 1	< 2	< 10	82	< 10	13	19					
H427657	4.42	0.050	0.052	0.61	4	23	53	0.30	< 20	1	< 2	< 10	180	< 10	14	9					
H427658	2.60	0.029	0.047	0.19	9	12	74	< 0.01	< 20	1	< 2	< 10	24	< 10	8	1					
H427659	2.41	0.027	0.041	0.84	28	12	78	< 0.01	< 20	3	2	< 10	32	< 10	8	1					
H427660	2.29	0.050	0.149	0.04	4	11	113	< 0.01	< 20	< 1	2	< 10	23	< 10	9	1					
H427661	2.10	0.028	0.043	1.43	4	4	5	0.45	< 20	7	< 2	< 10	126	< 10	14	14					
H427662	0.83	0.062	0.138	1.44	4	4	240	< 0.01	< 20	< 1	< 2	< 10	56	< 10	9	2					
H427663	2.80	0.047	0.060	0.54	5	12	40	0.56	< 20	2	< 2	< 10	126	< 10	12	25					
H427664	0.36	0.047	0.044	0.92	9	8	38	< 0.01	< 20	2	< 2	< 10	19	< 10	4	2					
H427665	0.02	0.020	0.003	0.23	11	< 1	3	< 0.01	< 20	< 1	< 2	< 10	1	< 10	< 1	2					
H427666	0.01	0.021	0.001	0.31	16	< 1	2	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	< 1	5					
H427667	3.07	0.030	0.022	0.23	7	19	309	< 0.01	< 20	4	< 2	< 10	40	< 10	19	2					88.2
H427668	2.05	0.019	0.032	0.62	7	14	137	< 0.01	< 20	< 1	< 2	< 10	39	< 10	12	2					
H427669	3.38	0.015	0.052	0.42	9	13	258	< 0.01	< 20	2	< 2	< 10	25	< 10	13	2					
H427670	2.34	0.035	0.060	0.27	21	24	102	0.06	< 20	3	< 2	< 10	95	< 10	11	5					
H427671	4.68	0.243	0.053	0.83	3	2	24	0.26	< 20	< 1	< 2	< 10	77	< 10	8	4					
H427672	0.02	0.032	0.011	2.57	9	1	1	< 0.01	< 20	13	< 2	< 10	5	< 10	< 1	2					
H427673	3.25	0.034	0.058	1.79	4	7	41	0.61	< 20	4	< 2	< 10	117	< 10	11	19					
H427674	0.04	0.048	0.010	1.03	4	< 1	368	< 0.01	< 20	< 1	2	< 10	2	< 10	5	2					
H427675	2.03	0.042	0.164	6.70	4	9	40	< 0.01	< 20	< 1	2	< 10	93	< 10	8	3					
H427676	0.04	0.018	0.007	2.04	47	< 1	4	< 0.01	< 20	< 1	19	< 10	5	< 10	< 1	2					
H427677	0.38	0.040	0.129	0.96	10	5	120	< 0.01	< 20	< 1	< 2	< 10	19	< 10	9	1					
H427678	0.03	0.022	0.027	0.69	19	< 1	9	< 0.01	< 20	< 1	< 2	< 10	6	< 10	2	2					
H427679	0.02	0.017	0.004	8.00	43	< 1	3	< 0.01	< 20	< 1	35	< 10	2	< 10	< 1	3					
H427680	0.04	0.019	0.009	0.66	12	< 1	5	< 0.01	< 20	< 1	8	< 10	2	< 10	1	2					
H427681	0.02	0.013	0.001	17.3	72	< 1	1	< 0.01	< 20	< 1	44	< 10	4	< 10	< 1	5					
H427682	0.03	0.020	0.027	1.81	24	< 1	37	< 0.01	< 20	< 1	11	< 10	3	< 10	1	2					
H427683	0.03	0.016	0.002	1.50	76	< 1	38	< 0.01	< 20	< 1	47	< 10	2	< 10	3	2					
H427684	0.11	0.020	0.177	0.59	4	8	56	< 0.01	< 20	< 1	< 2	< 10	31	< 10	8	1					
H427685	0.83	0.014	2.03	4.54	3	36	45	0.04	< 20	7	< 2	< 10	210	< 10	27	3	1.76				
H427686	1.23	0.015	0.824	0.08	3	20	22	0.04	< 20	2	< 2	< 10	88	< 10	28	2					
H427687	0.02	0.020	0.006	1.59	1680	< 1	9	< 0.01	< 20	112	< 2	< 10	1	13	< 1	< 1	360		5.26		10.6
H427688	1.24	0.060	0.450	0.10	6	2	18	0.04	< 20	< 1	< 2	< 10	31	< 10	11	1	1.33				
H427689	< 0.01	0.016	0.005	5.30	78	< 1	3	< 0.01	< 20	95	< 2	< 10	< 1	69	< 1	< 1	107		11.2	5.10	
H427690	0.11	0.034	0.053	0.19	28	3	15	< 0.01	< 20	2	< 2	< 10	28	< 10	4	1					
H427691	< 0.01	0.074	0.012	0.06	< 2	< 1	17	< 0.01	< 20	3	< 2	< 10	< 1	< 10	4	9					

Results

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Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Ag	Cu	Pb	Zn	Au
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	%	%	g/tonne
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	3	0.001	0.003	0.001	0.03
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	ICP-OES	ICP-OES	ICP-OES	ICP-OES	FA-GRA
H427692	1.85	0.047	0.021	13.8	9	9	12	0.01	< 20	< 1	< 2	< 10	102	< 10	5	3					
H427693	3.21	0.022	0.032	9.39	10	13	15	0.39	< 20		2	< 2	< 10	83	< 10	10	13				
H427694	1.64	0.019	0.019	6.82	48	11	158	< 0.01	< 20	< 1	6	< 10	32	< 10	9	2					
H427695	0.21	0.016	0.074	14.8	37	3	7	0.03	< 20	2	11	< 10	37	< 10	5	4					
H427696	1.58	0.063	0.045	6.55	7	18	16	0.33	< 20	4	< 2	< 10	145	< 10	12	14					
H427697	1.18	0.012	0.007	17.9	17	1	46	< 0.01	< 20	1	< 2	< 10	7	< 10	3	4					
H427698	3.73	0.088	0.033	1.40	12	14	44	0.30	< 20	< 1	< 2	< 10	134	< 10	7	10					
H427699	4.18	0.028	0.022	3.62	17	14	8	0.52	< 20	5	< 2	< 10	85	< 10	13	13					
H427700	0.36	0.016	0.002	4.91	632	1	28	< 0.01	< 20	< 1	5	< 10	19	< 10	2	5	778				
H427034	1.53	0.044	0.097	3.20	14	6	20	< 0.01	< 20	< 1	< 2	< 10	56	< 10	6	5					
H427035	0.02	0.019	0.001	0.79	3	< 1	2	< 0.01	< 20	3	< 2	< 10	< 1	< 10	15	3					
H427036	2.32	0.141	0.146	1.81	4	15	42	0.32	< 20	< 1	< 2	< 10	166	< 10	8	3					
H427037	0.03	0.015	0.058	8.98	89	2	4	< 0.01	< 20	2	19	< 10	15	< 10	6	2					
H427038	1.36	0.031	0.067	1.34	3	2	63	0.01	< 20	2	< 2	< 10	19	< 10	12	3					
H427039	1.53	0.034	0.022	19.0	15	6	16	< 0.01	< 20	< 1	< 2	< 10	80	< 10	3	4					
H427040	< 0.01	0.019	0.001	0.95	10	< 1	1	< 0.01	< 20	2	< 2	< 10	1	< 10	< 1	< 1					
H427041	3.39	0.040	0.044	3.86	17	15	12	0.02	< 20	< 1	< 2	< 10	130	< 10	6	2					
H427042	3.56	0.048	0.040	7.01	11	22	6	0.31	< 20	< 1	3	< 10	179	< 10	13	9					
H427043	1.53	0.053	0.172	3.62	9	9	9	0.02	< 20	< 1	< 2	< 10	170	< 10	4	3					
H427044	0.65	0.015	0.027	8.71	1290	3	2	< 0.01	< 20	< 1	9	< 10	48	< 10	< 1	2				2.43	9.30
H427045	0.55	0.013	0.022	> 20.0	30	2	1	< 0.01	< 20	< 1	< 2	< 10	47	< 10	< 1	4					5.83
H427046	0.35	0.026	0.129	4.26	9	4	16	0.01	< 20	< 1	< 2	< 10	35	< 10	8	2					
H427047	0.01	0.012	< 0.001	> 20.0	1280	< 1	< 1	< 0.01	< 20	4	40	< 10	5	< 10	< 1	4					
H427048	1.68	0.015	0.067	9.69	28	9	71	< 0.01	< 20	< 1	< 2	< 10	47	< 10	7	3					
H427049	0.01	0.015	0.007	7.48	123	< 1	6	< 0.01	< 20	< 1	31	< 10	2	< 10	< 1	3					
H427050	0.01	0.011	0.004	> 20.0	903	< 1	2	< 0.01	< 20	2	76	< 10	5	< 10	< 1	3					
S022401	0.05	0.014	0.002	> 20.0	145	< 1	17	< 0.01	< 20	3	147	< 10	5	< 10	1	5					
S022402	3.46	0.106	0.199	0.14	12	15	83	0.31	< 20	12	< 2	< 10	175	< 10	6	2					
S022403	0.39	0.072	0.017	18.9	16	7	15	0.18	< 20	3	2	< 10	37	< 10	3	5					
S022404	3.19	0.180	0.243	0.59	5	21	153	0.23	< 20	< 1	< 2	< 10	195	< 10	6	2					
S022405	0.01	0.039	0.003	4.46	14	< 1	2	< 0.01	< 20	2	< 2	< 10	2	< 10	3	3					
S022406	0.01	0.019	0.002	18.9	60	< 1	1	< 0.01	< 20	< 1	< 2	< 10	4	< 10	< 1	4					
S022407	1.56	0.047	0.046	3.03	8	9	32	0.32	< 20	< 1	< 2	< 10	105	< 10	8	13					
S022408	2.51	0.032	0.034	5.02	5	10	35	0.30	< 20	2	< 2	< 10	120	< 10	8	14					
S022409	< 0.01	0.019	0.002	4.67	28	< 1	2	< 0.01	< 20	40	< 2	< 10	2	< 10	< 1	1			5.03	1.05	
S022410	1.56	0.057	0.209	0.57	6	6	90	0.33	< 20	6	< 2	< 10	81	< 10	12	3					
S022411	0.97	0.036	0.217	0.06	10	5	47	0.01	< 20	< 1	< 2	< 10	259	< 10	10	5					
S022412	1.65	0.046	0.183	0.30	14	17	339	< 0.01	< 20	< 1	< 2	< 10	36	< 10	9	2					
S022413	3.28	0.047	0.034	0.25	4	26	11	0.22	< 20	6	< 2	< 10	133	< 10	7	7					
S022414	0.21	0.015	0.036	< 0.01	3	< 1	90	< 0.01	< 20	2	< 2	< 10	12	< 10	1	1					
S022415	0.16	0.027	0.010	0.16	4	1	2	< 0.01	< 20	< 1	< 2	< 10	3	< 10	4	5					
S022416	0.21	0.017	0.005	0.04	7	1	4	< 0.01	< 20	4	< 2	< 10	3	< 10	11	17					

Results

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Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Ag	Cu	Pb	Zn	Au
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	%	%	g/tonne
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	3	0.001	0.003	0.001	0.03
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	ICP-OES	ICP-OES	ICP-OES	ICP-OES	FA-GRA
S022417	0.12	0.017	0.092	8.93	19	8	5	0.03	< 20	< 1	< 2	< 10	39	< 10	6	3					
S022418	0.61	0.017	0.020	12.6	120	4	14	< 0.01	< 20	23	< 2	< 10	30	< 10	4	4					31.1
S022419	1.40	0.042	0.006	11.5	9	10	37	< 0.01	< 20	< 1	< 2	< 10	75	< 10	2	3					
H427736	0.34	0.025	0.104	1.57	6	4	64	< 0.01	< 20	< 1	< 2	< 10	21	< 10	8	1					
H427737	0.20	0.019	0.106	0.58	12	< 1	98	< 0.01	< 20	2	2	< 10	5	< 10	7	< 1					
H427738	0.05	0.018	0.018	0.89	18	< 1	9	< 0.01	< 20	< 1	14	< 10	3	< 10	2	2					
H427739	0.02	0.015	0.004	3.82	68	< 1	10	< 0.01	< 20	< 1	64	< 10	1	< 10	< 1	2					
H427740	2.90	0.022	0.028	1.28	5	14	21	0.45	< 20	< 1	< 2	< 10	258	< 10	6	4		2.70			
H427741	0.07	0.092	0.006	0.16	< 2	< 1	13	0.11	< 20	< 1	< 2	< 10	6	< 10	8	1					
H427742	0.07	0.014	0.121	1.99	16	< 1	3	0.01	< 20	< 1	< 2	< 10	404	< 10	2	7		2.54			
H427743	< 0.01	0.022	0.004	1.36	4	< 1	2	< 0.01	< 20	2	< 2	< 10	2	< 10	1	6					
H427744	< 0.01	0.054	0.001	0.67	< 2	< 1	12	< 0.01	< 20	< 1	< 2	< 10	2	< 10	< 1	2					
H427745	< 0.01	0.020	0.002	1.27	2	< 1	6	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	4	7					
H427746	1.52	0.014	0.037	3.97	14	6	2	0.13	< 20	< 1	< 2	< 10	62	< 10	5	7					
H427747	2.60	0.063	0.097	0.42	12	19	26	0.26	< 20	4	< 2	< 10	137	< 10	12	3					
H427748	1.01	0.025	0.036	3.68	13	5	11	0.20	< 20	< 1	< 2	< 10	23	< 10	13	5					
H427749	1.40	0.042	0.024	9.53	9	12	28	0.27	< 20	3	< 2	< 10	92	< 10	6	9					
H427750	0.03	0.018	0.001	0.50	< 2	< 1	1	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	6	2					
H427029	1.83	0.020	0.090	0.75	4	8	302	< 0.01	< 20	5	< 2	< 10	27	< 10	4	< 1					
H427030	1.86	0.054	0.206	1.92	13	26	16	0.29	< 20	3	< 2	< 10	332	< 10	9	9					
H427031	2.62	0.028	0.138	2.40	20	22	190	0.08	< 20	< 1	< 2	< 10	120	< 10	5	2					
H427032	1.21	0.045	0.015	0.34	467	5	22	0.17	< 20	2	< 2	< 10	65	< 10	4	3	135	1.29			
H427638	3.42	0.022	0.038	0.05	8	13	44	< 0.01	< 20	< 1	< 2	< 10	45	< 10	5	1					
H427639	1.14	0.364	0.025	0.08	< 2	5	23	0.31	< 20	2	< 2	< 10	48	< 10	7	13					
H427640	2.22	0.044	0.122	1.35	2	6	46	0.28	< 20	< 1	2	< 10	101	< 10	11	15					
H427641	0.47	0.055	0.584	2.93	11	8	15	0.18	< 20	< 1	< 2	< 10	154	< 10	19	3					
H427642	3.21	0.108	0.059	1.95	4	17	14	0.54	< 20	4	< 2	< 10	135	< 10	12	23					
H427643	0.59	0.018	0.151	1.77	2	7	207	0.04	< 20	1	< 2	< 10	88	< 10	3	10		1.67			
H427644	4.12	0.063	0.048	0.87	2	3	7	0.28	< 20	1	< 2	< 10	65	< 10	7	4					
H427645	3.50	0.057	0.074	1.07	4	7	6	0.67	< 20	1	< 2	< 10	129	< 10	15	22					
H427646	0.07	0.029	0.017	0.02	< 2	< 1	26	0.01	< 20	< 1	< 2	< 10	43	< 10	1	4					
H427647	1.25	0.037	0.062	0.08	< 2	2	45	0.12	< 20	< 1	< 2	< 10	31	< 10	4	5					
H427648	0.65	0.035	0.126	1.48	3	7	33	< 0.01	< 20	< 1	< 2	< 10	31	< 10	7	2					
H427649	0.02	0.025	0.025	2.41	17	1	16	< 0.01	< 20	2	< 2	< 10	4	< 10	1	2					
H427650	0.33	0.028	0.091	1.51	3	3	47	< 0.01	< 20	< 1	< 2	< 10	16	< 10	4	1					
H427568	2.87	0.077	0.201	1.58	5	6	31	0.22	< 20	4	< 2	< 10	94	< 10	4	2					
H427569	1.11	0.452	0.229	1.62	4	7	159	0.13	< 20	< 1	< 2	< 10	49	< 10	3	1					
H427570	2.15	0.028	0.069	4.72	4	14	5	0.15	< 20	2	< 2	< 10	169	< 10	4	2					
H427571	1.85	0.127	0.159	0.84	2	11	31	0.22	< 20	< 1	< 2	< 10	131	< 10	4	1					
P470401	0.56	0.060	0.086	0.31	< 2	4	42	0.41	< 20	5	< 2	< 10	21	< 10	15	9					
P470402	3.46	0.063	0.080	1.40	3	24	61	0.44	< 20	2	< 2	< 10	126	< 10	11	16					

Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Ag	Cu	Pb	Zn	Au
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	%	%	g/tonne
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	3	0.001	0.003	0.001	0.03
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	ICP-OES	ICP-OES	ICP-OES	ICP-OES	FA- GRA
P470403	2.55	0.374	0.028	0.11	3	8	22	0.28	< 20	2	< 2	< 10	78	< 10	7	4					
P470404	1.59	0.112	0.086	2.07	3	13	231	0.10	< 20	< 1	< 2	< 10	117	< 10	6	3					
P470405	0.08	0.031	0.261	2.00	2	3	119	< 0.01	< 20	< 1	< 2	< 10	44	< 10	2	2					
P470406	2.35	0.037	0.028	1.76	< 2	3	17	0.30	< 20	< 1	< 2	< 10	55	< 10	6	12		1.39			
P470407	2.12	0.021	0.012	12.3	163	3	100	< 0.01	< 20	3	54	< 10	17	< 10	1	3					
P470408	2.37	0.062	0.167	0.33	12	25	139	0.26	< 20	4	< 2	< 10	154	< 10	6	2					
P470409	1.88	0.052	0.072	0.94	8	25	402	0.21	< 20	2	< 2	< 10	150	< 10	11	2					
P470410	0.38	0.048	0.166	0.88	5	4	29	< 0.01	< 20	2	< 2	< 10	21	< 10	8	< 1			0.867		
P470411	0.27	0.102	0.030	0.05	6	7	17	0.02	< 20	< 1	< 2	< 10	73	< 10	4	6					
P470412	0.01	0.024	0.003	2.31	509	< 1	2	< 0.01	< 20	266	< 2	< 10	1	< 10	< 1	< 1			7.54		54.5
P470413	3.57	0.099	0.097	0.73	9	30	26	0.64	< 20	6	< 2	< 10	159	< 10	16	9					
H427444	0.04	0.148	0.005	2.26	8	< 1	6	< 0.01	< 20	2	< 2	< 10	2	< 10	5	4					
H427445	2.60	0.051	0.025	1.09	5	14	9	0.39	< 20	7	< 2	< 10	128	< 10	3	12					
H427446	0.72	0.028	0.016	12.8	7	5	22	0.16	< 20	< 1	< 2	< 10	59	< 10	2	7					
H427447	0.04	0.030	0.002	1.62	3	< 1	2	< 0.01	< 20	1	< 2	< 10	2	< 10	4	3					
H427448	1.67	0.043	0.128	0.37	5	13	315	< 0.01	< 20	< 1	< 2	< 10	68	< 10	12	1					
H427449	1.78	0.031	0.027	11.8	102	6	110	< 0.01	< 20	< 1	49	< 10	28	< 10	3	2					

Analyte Symbol	Au	Ag	Cd	Cu	Mn	Mo	Ni	Pb	Zn	Al	As	B	Ba	Be	Bi	Ca	Co	Cr	Fe	Ga	Hg	K	La
Unit Symbol	ppb	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	%	ppm	ppm	%	ppm	ppm	%	ppm
Lower Limit	5	0.2	0.5	1	5	1	1	2	2	0.01	2	10	10	0.5	2	0.01	1	1	0.01	10	1	0.01	10
Method Code	FA-AA	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP
P470430	< 5	< 0.2	< 0.5	10	2520	< 1	< 1	9	43	1.12	< 2	< 10	360	0.5	2	6.42	3	2	2.29	< 10	< 1	0.66	21
S022447	< 5	< 0.2	< 0.5	2	238	3	< 1	10	16	0.80	40	< 10	327	0.6	< 2	0.21	< 1	10	0.36	< 10	< 1	0.48	23
S022448	9	< 0.2	< 0.5	10	167	1	< 1	17	23	0.73	482	< 10	264	< 0.5	2	0.09	< 1	5	1.01	< 10	< 1	0.49	27
S022449	< 5	2.0	1.5	14	5800	< 1	< 1	69	483	1.10	8	< 10	158	0.8	3	0.29	7	2	2.80	< 10	< 1	0.73	26
S022450	< 5	< 0.2	< 0.5	9	621	1	8	3	28	0.49	25	< 10	143	< 0.5	2	1.64	7	21	1.73	< 10	< 1	0.27	< 10
S022451	< 5	< 0.2	< 0.5	23	1970	2	9	3	132	1.89	7	< 10	97	< 0.5	5	1.73	12	10	5.39	< 10	< 1	0.25	< 10
S022452	< 5	0.3	< 0.5	15	155	1	7	5	85	0.04	3	< 10	< 10	< 0.5	3	3.55	< 1	2	16.6	< 10	< 1	< 0.01	< 10
S022453	< 5	< 0.2	< 0.5	79	917	< 1	58	6	36	1.25	6	< 10	< 10	< 0.5	17	3.96	22	32	13.1	< 10	3	0.21	< 10
S022454	< 5	> 100	1.5	24	4490	3	3	447	165	0.20	37	< 10	14	< 0.5	5	4.32	10	9	7.16	< 10	2	0.03	< 10
S022455	33	83.2	34.7	> 10000	321	1	2	> 5000	> 10000	0.02	< 2	< 10	10	< 0.5	2470	0.09	3	11	1.52	< 10	111	0.02	< 10
S022456	904	3.4	0.7	123	866	< 1	12	32	54	0.30	112	< 10	< 10	< 0.5	4	3.41	53	2	16.1	< 10	< 1	< 0.01	< 10
S022457	59	0.5	< 0.5	48	59	7	1	108	39	0.80	15	< 10	338	0.8	10	0.10	2	4	1.65	< 10	< 1	0.66	33
DC18 F03	7	0.3	< 0.5	81	1160	< 1	14	13	67	2.22	7	< 10	162	< 0.5	17	4.75	22	27	6.03	10	< 1	0.14	< 10
DC18 F04	< 5	0.4	< 0.5	46	1250	< 1	6	100	52	1.08	11	< 10	300	< 0.5	10	7.55	9	11	4.61	< 10	< 1	0.15	< 10
H427539	16	40.5	5.8	5730	675	1	< 1	> 5000	2880	0.16	< 2	< 10	14	< 0.5	1180	0.91	1	15	1.13	< 10	19	0.10	< 10
H427540	< 5	< 0.2	< 0.5	7	882	< 1	< 1	35	40	0.22	< 2	< 10	123	< 0.5	< 2	0.36	1	14	1.02	< 10	< 1	0.12	< 10
H427541	20	0.2	< 0.5	1330	1940	< 1	9	16	78	1.99	< 2	< 10	145	0.5	275	4.93	17	3	5.50	< 10	< 1	0.42	12

Analyte Symbol	Mg	Na	P	S	Sb	Sc	Sr	Ti	Th	Te	Tl	U	V	W	Y	Zr	Ag	Cu	Pb	Zn
Unit Symbol	%	%	%	%	ppm	ppm	ppm	%	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	ppm	%	%	%
Lower Limit	0.01	0.001	0.001	0.01	2	1	1	0.01	20	1	2	10	1	10	1	1	3	0.001	0.003	0.001
Method Code	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	AR-ICP	ICP-OES	ICP-OES	ICP-OES	ICP-OES
P470430	0.11	0.059	0.100	0.01	< 2	2	528	0.02	< 20	4	< 2	< 10	39	< 10	8	3				
S022447	0.04	0.072	0.005	0.05	< 2	< 1	73	< 0.01	< 20	< 1	< 2	< 10	2	< 10	3	9				
S022448	0.03	0.069	0.043	0.13	5	< 1	130	< 0.01	< 20	< 1	< 2	< 10	9	< 10	3	7				
S022449	0.06	0.032	0.125	0.40	2	3	38	< 0.01	< 20	< 1	< 2	< 10	29	< 10	9	2				
S022450	0.04	0.026	0.031	< 0.01	5	7	22	< 0.01	< 20	3	< 2	< 10	14	< 10	4	2				
S022451	1.06	0.085	0.095	0.63	3	13	109	< 0.01	< 20	< 1	< 2	< 10	97	< 10	9	2				
S022452	0.06	0.011	0.002	> 20.0	6	< 1	23	< 0.01	< 20	2	< 2	< 10	4	< 10	< 1	4				
S022453	1.19	0.016	0.002	13.4	6	4	66	0.02	< 20	1	3	< 10	37	< 10	2	3				
S022454	1.71	0.019	0.001	6.17	52	2	151	< 0.01	< 20	< 1	< 2	< 10	7	< 10	5	2	239			
S022455	0.01	0.016	0.005	1.80	24	< 1	141	< 0.01	< 20	2	< 2	< 10	< 1	< 10	< 1	< 1		1.28	6.84	1.61
S022456	0.66	0.020	0.001	19.5	16	< 1	19	< 0.01	< 20	< 1	< 2	< 10	23	42	< 1	8				
S022457	0.09	0.025	0.092	0.17	2	4	284	< 0.01	< 20	2	< 2	< 10	64	< 10	3	4				
DC18 F03	2.13	0.091	0.151	0.29	5	25	206	0.36	< 20	2	< 2	< 10	234	< 10	12	8				
DC18 F04	1.55	0.043	0.090	0.14	2	13	513	0.10	< 20	< 1	< 2	< 10	89	< 10	10	5				
H427539	0.03	0.020	0.014	0.79	10	< 1	176	< 0.01	< 20	< 1	< 2	< 10	4	< 10	2	< 1			2.55	
H427540	0.02	0.073	0.064	< 0.01	< 2	2	48	< 0.01	< 20	2	< 2	< 10	6	< 10	5	3				
H427541	1.77	0.042	0.194	0.10	< 2	7	160	< 0.01	< 20	1	< 2	< 10	58	< 10	9	2				

Appendix II
Rock Sample
Descriptions

SAMPLE	E	N	ELEV	GPS LABEL	SITE	DESCRIPTION	Lithology
140831	410284	6243218	1510	DOC1	Doc Property Aug 19, 2018	chip sample	Andesitic - intermediate volcanoclastic
140832	410317	6243202	1515	DOC2	same as above	chip sample	As above
140833	410270	6243220	1514	DOC3	same as above	chip sample	massive magnetite (likely intermediate volcanoclastic)
140834	410715	6243163	1468	DOCVN1	Doc Property Aug 23, 2018	chip sample	Quartz vein 156°/-54°
140835	410508	6243132	1511	DOC5	same as above	chip sample	Quartz vein
140836	410459	6243011	1531	DOC6	same as above	chip sample	~2cm wide quartz vein (in intermed volcanoclastics?) 216°/-78°
140837	410466	6243314	1492	RAY1	Doc Property Sept 10, 2018	chip sample	Andesitie - intermediate volcanoclastic
140838	410466	6243314	1492			chip sample	as above
140839	410592	6243208	1486	RAY2	same as above	chip sample	Quartz vein
140840	410448	6243226	1504	RAY3		chip sample	Pyrite vein in cherty siltstone
140841	410448	6243226	1504			chip sample	as above

Aug 19 and Aug 23 2018 - samples take by Jim McCrea, Sean Pownall, Andrea Demoskoff ;

Sept 10 -Jim McCrea, Andrea Demoskoff, Ray Marks, Alabama Jeff

SAMPLE	Mineralization	Alteration	Au	Ag	Al	As	B	Ba	Be	Bi	Ca	Cd	Co	Cr	Cu	Fe
140831	pyrite up to 10%, magnetite 5%	limonitic, argillic	0.007	0.1	0.52	21	<10	10	<0.5	<2	0.18	<0.5	128	7	137	18.25
140832	dissem py up to 5% , magnetite vein ~1cm thick	Argillic Alteration	0.020	0.1	0.49	9	<10	50	<0.5	<2	0.27	<0.5	60	17	27	14.35
140833	massive magnetite	limonitic	0.003	0.1	0.05	1	<10	10	<0.5	<2	0.08	<0.5	10	<1	10	50.0
140834	Pale disseminated pyrite up to 30%		0.028	2.2	0.03	12	<10	5	<0.5	<2	0.02	<0.5	25	8	101	13.0
140835	Disseminated pyrite up to 15%	limonitic fractures	0.049	0.3	0.10	54	<10	10	<0.5	<2	0.20	<0.5	531	7	343	22.0
140836	pyrite, chalcopyrite, malachite, magnetite		0.622	454.0	0.71	56	<10	40	<0.5	7	0.24	38.8	128	9	48600	11.1
140837	pyrite	Argillic Alteration	0.003	0.5	0.32	1	<10	20	<0.5	<2	0.69	<0.5	45	3	83	6.3
140838	as above	as above	0.003	1.8	0.20	1	<10	10	<0.5	<2	0.61	<0.5	20	1	213	7.0
140839	pale disseminated pyrite		0.011	0.7	0.08	2	<10	10	<0.5	<2	0.02	<0.5	14	3	12	9.6
140840	pyrite vein ~1-5cm wide	limonitic	0.003	0.2	1.33	2	<10	20	<0.5	<2	3.33	<0.5	60	6	31	12.0
140841	as above	as above	0.003	0.2	1.22	6	<10	20	<0.5	<2	3.34	<0.5	42	7	21	13.1

SAMPLE	Ga	Hg	K	La	Mg	Mn	Mo	Na	Ni	P	Pb	S	Sb	Sc	Sr	Th	Ti	Tl	U	V	W	Zn
140831	10	1	0.01	<10	0.48	53	2	0.01	119	520	7	10.00	<2	<1	2	<20	0.03	<10	<10	36	<10	6
140832	<10	1	0.06	<10	0.21	119	5	0.06	37	550	2	5.71	<2	3	4	<20	0.13	<10	<10	97	<10	4
140833	10	<1	<0.01	10	0.06	125	2	0.01	35	130	8	0.04	<2	<1	5	<20	<0.01	<10	<10	325	<10	4
140834	<10	<1	0.01	<10	0.01	42	2	<0.01	2	10	12	10.00	<2	<1	1	<20	<0.01	<10	<10	2	<10	2
140835	<10	<1	<0.01	<10	0.01	50	9	<0.01	114	1640	2	10.00	2	<1	2	<20	0.01	<10	<10	12	10	2
140836	<10	<1	0.04	<10	0.47	1350	4	0.01	25	180	639	4.29	14	8	8	<20	0.02	<10	<10	69	<10	962
140837	<10	1	0.05	<10	0.18	47	1	0.06	13	1490	2	5.19	<2	1	21	<20	0.18	<10	<10	26	<10	2
140838	<10	<1	0.01	<10	0.41	77	1	0.03	9	690	3	4.14	2	<1	8	<20	0.04	<10	<10	12	<10	5
140839	<10	<1	0.08	<10	0.02	32	5	0.01	12	70	16	10.00	<2	1	131	<20	<0.01	<10	<10	8	<10	3
140840	10	<1	0.04	<10	0.83	111	4	0.06	106	1440	2	6.00	<2	3	11	<20	0.18	<10	<10	106	<10	6
140841	10	<1	0.03	<10	0.76	102	4	0.06	91	1430	1	4.79	<2	3	13	<20	0.16	<10	<10	130	<10	7

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
DC18F01	428744	6247651		Delta			4-Sep-18	DCremonese		241		0.9		< 0.5	73
DC18F02	428762	6247648		Delta			4-Sep-18	DCremonese		10200	10.2	7.7		1.2	773
DC18F03	429122	6248100		Delta			4-Sep-18	DCremonese		7		0.3		< 0.5	81
DC18F04	429140	6248105		Delta			4-Sep-18	DCremonese		< 5		0.4		< 0.5	46
DC18OR04	423040	6244702	1301	Orion			19-Aug-18	DCremonese		<5		38.7		< 0.5	22
DC18OR06	423015	6244808	1314	Orion			19-Aug-18	DCremonese		15		6.6		< 0.5	16
DC18OR07	422961	6244816	1319	Orion			19-Aug-18	DCremonese		9		20.0		< 0.5	12
DC18OR08	422947	6244746	1313	Orion			19-Aug-18	DCremonese		7		39.6		< 0.5	19
H427029	423192	6244736	1306	Orion	grab	random	17-Aug-18	JAuston	light grey phyllitic siltstone interbedded with sandstone; hard silicified; pyrrhotite 3-4% disseminated with trace chalcopyrite; bedding 335/-32	100		0.3		< 0.5	77
H427030	429371	6245234	1518	Fairweather	chip	1	17-Aug-18	JAuston	1m chip perpendicular to bedding in a polyolithic conglomerate; sub angular clasts crystal tuff, sandstone and siltstone majority is volcanic clasts; pebble to cobble sized; black fine grained matrix with 3% disseminated pyrite and a very fine grained sulphide; bedding 315/-60	13		< 0.2		< 0.5	132
H427031	423207	6244654	1300	Orion	grab	random	17-Aug-18	JAuston	brown phyllite with sedimentary protolith fine grained; bedding/foliation 345/-70; disseminated pyrrhotite 2%, pyrite 1.5% and trace chalcopyrite	38		1.6		4.5	85
H427032	423071	6244456	1265	Orion	float	select	17-Aug-18	JAuston	green andesite boulder cut by a quartz vein containing chrysocolla and tetrahedrite 2%,	300		135	135	0.7	12900
H427034	422725	6246053	1453	Orion	random	grab	16-Aug-18	KJKonkin	S5tbd black mudstone/siltstone, interbedded with 1-10mm layers of sedimentary stratified 15-20% PY within platy mudstone layers with tr vfg diss as well	20		0.7		8.6	49
H427035	422852	6245688	1428	Orion	moraine	30x35cm	16-Aug-18	KJKonkin	very angular block, pure silica exhalite or cherty sed? Pale grey sucrosic cryptocrystalline qtz with tr-1% 1-2mm anhedral PY vlts, tr<1% fg euhedral diss PY, tr diss fg CP + bk SL,	16		1.9		14.2	183
H427036	422905	6245646	1419	Orion	select	grab	16-Aug-18	KJKonkin	dark greenish-grey hornfels V4m?, mod foliated with 15-20% pygmatic sucrosic qtz vlts/stringers with 5-7% PO, tr fg diss CP+PY,	20		0.4		< 0.5	115
H427037	422915	6245641	1415	Orion	moraine	0.7m chip	16-Aug-18	KJKonkin	square boulder WS yellow-orange with green specs, FS pale-dk grey with pale-med green 7-10% fuchasite 1-3mm blebs, siliceous felsic vol?, 7-10% diss-lenses of anhedral PY, 2-3% diss brassy euhedral PY	80		1		< 0.5	56
H427038	422922	6245637	1416	Orion	chip	1.2	16-Aug-18	KJKonkin	V4fp, hornfels, 7-10% fe-oxed drusy qtz stringers+vlts with tr diss fg PY+CP, tr-1% diss fg PO, P2sil, F2hem/lim,	19		1		< 0.5	719
H427039	422943	6245623	1415	Orion	moraine	15 cm	16-Aug-18	KJKonkin	sub-rounded boulder, charcoal grey-black hornfels V4m?, bxd by 20-25% white massive qtz with 10-15% cg semi-massive PY with 3-5% diss CP and possibly tarnished PY	< 5		< 0.2		< 0.5	16

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
DC18F01		1040	< 1	15	23		51		2.88	29	< 10	27	< 0.5	< 2	4.78	24	24	4.63	< 10	< 1	0.22	< 10	1.18
DC18F02		156	< 1	11	40		463		0.43	185	< 10	< 10	< 0.5	2	0.05	84	4	20.00	< 10	< 1	0.14	< 10	0.04
DC18F03		1160	< 1	14	13		67		2.22	7	< 10	162	< 0.5	17	4.75	22	27	6.03	10	< 1	0.14	< 10	2.13
DC18F04		1250	< 1	6	100		52		1.08	11	< 10	300	< 0.5	10	7.55	9	11	4.61	< 10	< 1	0.15	< 10	1.55
DC18OR04		74	5	1	114		76		0.18	934	< 10	< 10	< 0.5	< 2	0.13	6	43	6.74	< 10	3	0.12	< 10	0.03
DC18OR06		2820	1	3	81		67		0.85	47	< 10	< 10	0.7	< 2	3.09	23	3	7.36	< 10	1	0.54	< 10	1.01
DC18OR07		2050	2	3	68		21		0.95	75	< 10	< 10	0.9	3	1.79	1	4	16.00	< 10	6	0.55	< 10	0.99
DC18OR08		102	1	5	130		9		0.23	99	< 10	< 10	< 0.5	2	0.18	14	5	13.80	< 10	2	0.17	< 10	0.02
H427029		3580	< 1	25	4		15		0.73	156	< 10	78	< 0.5	2	> 10.0	18	41	4.01	< 10	< 1	0.39	< 10	1.83
H427030		1340	< 1	8	4		88		3.08	2	< 10	22	< 0.5	< 2	0.89	16	13	8.95	10	< 1	0.16	< 10	1.86
H427031		1330	< 1	43	92		312		1.82	191	< 10	28	< 0.5	< 2	7.91	24	169	6.26	< 10	< 1	0.85	< 10	2.62
H427032	1.29	366	< 1	19	2		43		1.47	26	< 10	34	< 0.5	< 2	2.1	15	45	2.6	< 10	369	0.12	< 10	1.21
H427034		232	28	48	21		738		1.89	36	< 10	26	0.6	< 2	2.13	8	8	4.57	< 10	< 1	0.17	< 10	1.53
H427035		43	2	1	5		1610		0.19	7	< 10	77	< 0.5	< 2	0.01	1	19	1.04	< 10	< 1	0.17	10	0.02
H427036		744	< 1	41	6		75		2.47	< 2	< 10	22	< 0.5	< 2	2.01	32	105	6.6	< 10	< 1	1.35	< 10	2.32
H427037		23	1	64	4		71		0.56	444	< 10	< 10	< 0.5	< 2	0.16	42	17	7.35	< 10	6	0.3	< 10	0.03
H427038		4290	< 1	9	5		19		0.97	10	< 10	65	< 0.5	2	4.18	20	9	4.6	< 10	< 1	0.54	< 10	1.36
H427039		384	1	30	< 2		44		1.35	7	< 10	< 10	< 0.5	5	1.89	12	67	17.4	< 10	< 1	0.04	< 10	1.53

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
DC18F01	0.042	0.131	1.97	3	10	56	0.12	< 20	< 1	< 2	< 10	95	< 10	6	6
DC18F02	0.013	0.028	18.20	20	2	3	< 0.01	< 20	< 1	< 2	< 10	15	< 10	1	8
DC18F03	0.091	0.151	0.29	5	25	206	0.36	< 20	2	< 2	< 10	234	< 10	12	8
DC18F04	0.043	0.09	0.14	2	13	513	0.1	< 20	< 1	< 2	< 10	89	< 10	10	5
DC18OR04	0.014	0.033	9.40	67	< 1	6	< 0.01	< 20	2	5	< 10	9	< 10	1	4
DC18OR06	0.019	0.123	8.80	12	10	111	< 0.01	< 20	< 1	< 2	< 10	59	< 10	7	4
DC18OR07	0.017	0.115	> 20.0	25	2	56	0.01	< 20	< 1	< 2	< 10	18	< 10	2	7
DC18OR08	0.015	0.048	> 20.0	30	2	17	< 0.01	< 20	6	< 2	< 10	17	< 10	4	6
H427029	0.02	0.09	0.75	4	8	302	< 0.01	< 20	5	< 2	< 10	27	< 10	4	< 1
H427030	0.054	0.206	1.92	13	26	16	0.29	< 20	3	< 2	< 10	332	< 10	9	9
H427031	0.028	0.138	2.4	20	22	190	0.08	< 20	< 1	< 2	< 10	120	< 10	5	2
H427032	0.045	0.015	0.34	467	5	22	0.17	< 20	2	< 2	< 10	65	< 10	4	3
H427034	0.044	0.097	3.2	14	6	20	< 0.01	< 20	< 1	< 2	< 10	56	< 10	6	5
H427035	0.019	0.001	0.79	3	< 1	2	< 0.01	< 20	3	< 2	< 10	< 1	< 10	15	3
H427036	0.141	0.146	1.81	4	15	42	0.32	< 20	< 1	< 2	< 10	166	< 10	8	3
H427037	0.015	0.058	8.98	89	2	4	< 0.01	< 20	2	19	< 10	15	< 10	6	2
H427038	0.031	0.067	1.34	3	2	63	0.01	< 20	2	< 2	< 10	19	< 10	12	3
H427039	0.034	0.022	19	15	6	16	< 0.01	< 20	< 1	< 2	< 10	80	< 10	3	4

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
H427040	422907	6245610	1417	Orion	moraine	20x35cm	16-Aug-18	KJKonkin	sub rounded boulder, qtz vein, WS limonite stained white qtz with bk oxed sulphides, FS white clean qtz, with black clots of oxed sxs, 2-3% diss fg-cg PY, tr diss CP, sucrosic white qtz with drusy cavities and watery grey massive qtz	22		0.3		< 0.5	15
H427041	422908	6245609	1417	Orion	moraine	1.0 m	16-Aug-18	KJKonkin	dk greenish grey V4m, non-magnetic boulders, P1sil with 7-10% qtz stringers qtz+cal with 2-3% diss-vlt PY,PO, CP	< 5		< 0.2		< 0.5	35
H427042	422927	6245460	1388	Orion	moraine	20x25cm	16-Aug-18	KJKonkin	very angular boulder, heavy lim/hem WS, V4fg/m, P1sil, 3-5% diss fg anhedral PY 2-3% diss fg PY vlts, 1-2% euhedral diss fg PY, med-dk grey siliceous volcanic	< 5		< 0.2		< 0.5	67
H427043	429211	6245038	1538	Fairweather	random	grab	17-Aug-18	KJKonkin	Site of grab sample 8/7/09: schistose pebble conglomerate, S3fol in fg bk gritty mudstone matrix, 3-5% fg diss anhedral PY, 1-2% mg euhedral diss PY, P2hem/lim, F1hem/lim, not that siled but rather fissil and crumbly, P3sil, fol 285/70, 20-25m downslope ESE from Trench 1 with sites KK-311, 312.	14		< 0.2		< 0.5	87
H427044	429199	6245036	1562	Fairweather	sub-crop	20x30cm	17-Aug-18	KJKonkin	in talus but appears to very near source, H7bx 30-35% white drusy, vuggy qtz stwk with very angular to sub-rounded bk argillite siled frags, 7-10% fg-mg diss+vlt PY tr<1% diss ASPY? Possible feeder to about massive PY semi-flat layer in silica matrix 5m directly above	9300	9.3	51.2		282	1660
H427045	429194	6245036	1563	Fairweather	vertical chip	0.5	17-Aug-18	KJKonkin	siiceous exhalitive horizon with massive to semi-massive PY, center of Trench 1 blast cut, bedded 200/22 and shear/fault 287/77, sample between sample KK-311 and KK-312 sites, massive PY horizon appears to be overlying massive white calcite and the upper contact is a baked intense lim oxed contact with younger unaltered med green V4m, exhalite is white to pale grey silica with 2-3% sharp 1-3mm fragements of bk argillite,	5830	5.83	20.5		7	262
H427046	423048	6244943	1314	Orion	chip	0.3	17-Aug-18	KJKonkin	schistose bk hornfels argillite, 142/83 fol., bedding/schistocity, 10-15% qtz vlts with 2-3% diss fg PO+PY, tr diss fg CP with rare bornite associated with PO blebs, PY is fg euhedral with minor blebs of anhedral PY, P2sil, tr<1% diss fg PY in schistose black argillite, WS strong hem/lim ox, FS bk-white with fresh sx	172		2.1		0.8	177

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
H427040		66	3	2	16		27		0.06	71	< 10	12	< 0.5	< 2	0.02	1	29	1.39	< 10	< 1	0.04	< 10	< 0.01
H427041		828	< 1	87	2		64		3.65	21	< 10	26	< 0.5	< 2	1.91	41	212	7.84	< 10	2	0.16	< 10	3.39
H427042		175	< 1	107	4		65		3.32	14	< 10	10	< 0.5	< 2	0.85	48	154	10.1	< 10	< 1	0.03	< 10	3.56
H427043		459	< 1	6	9		70		2.22	8	< 10	12	< 0.5	< 2	0.3	11	12	9.55	< 10	< 1	0.22	< 10	1.53
H427044		568	2	5	766		24300	2.43	1.3	> 10000	< 10	< 10	< 0.5	163	0.06	1820	12	10.8	< 10	7	0.03	< 10	0.65
H427045		498	< 1	5	439		585		1.06	2150	< 10	< 10	< 0.5	11	0.04	53	4	18.1	< 10	< 1	0.03	< 10	0.55
H427046		415	3	8	35		123		0.86	493	< 10	12	< 0.5	4	0.56	28	10	7.05	< 10	< 1	0.33	< 10	0.35

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
H427040	0.019	0.001	0.95	10	< 1	1	< 0.01	< 20	2	< 2	< 10	1	< 10	< 1	< 1
H427041	0.04	0.044	3.86	17	15	12	0.02	< 20	< 1	< 2	< 10	130	< 10	6	2
H427042	0.048	0.04	7.01	11	22	6	0.31	< 20	< 1	3	< 10	179	< 10	13	9
H427043	0.053	0.172	3.62	9	9	9	0.02	< 20	< 1	< 2	< 10	170	< 10	4	3
H427044	0.015	0.027	8.71	1290	3	2	< 0.01	< 20	< 1	9	< 10	48	< 10	< 1	2
H427045	0.013	0.022	> 20.0	30	2	1	< 0.01	< 20	< 1	< 2	< 10	47	< 10	< 1	4
H427046	0.026	0.129	4.26	9	4	16	0.01	< 20	< 1	< 2	< 10	35	< 10	8	2

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
H427047	423109	6244543	1283	Orion	moraine	35x45x50cm	17-Aug-18	KJKonkin	massive stratified layered PY in massive pale grey 10-15 siliceous exhalitive matrix with 20-25% intercalated lenses and rip-up clasts of bk siltstone as fragments in PY exhalite, PY appears fo be granular and amorphous, completely non-euhedral, part of boulder train	89		0.5		< 0.5	< 1
H427048	423112	6244510	1282	Orion	moraine	20x25cm	17-Aug-18	KJKonkin	sub-angular, 25m downslope of above massive PY boulder, siliceous exhalitive, very well silicified or purely siliceous vfg exhalitve, pale buff-grey silica with 15-20% anhedral PY stringers or groundmass, very hard rock with obvious intense WS1hem of semi-massive PY	< 5		13.3		< 0.5	24
H427049	423089	6244398	1244	Orion	moraine	15x20cm	17-Aug-18	KJKonkin	rounded qtz boulder with 15-20% diss-interstitial PY, white qtz with mottled dark grey qtz, WS1hem/lim	104		74.8		7.4	36
H427050	423054	6244576	1288	Orion	moraine	135x65x50cm	17-Aug-18	KJKonkin	huge slab/rafted tabular boulder massive brassy amorphous PY within a pale grey siliceous matix, laminated with 5-10% black argillaceous mudstone sharp fragments, intercalated within the massive PY layers	79		1.3		< 0.5	5
H427437	422078	6247440	1708	Orion	chip	2	30-Aug-18	JAuston	chip across a multiple quartz veins 10-40cm wide coming up a fault 152/-80; 7% arsenopyrite and pyrite and trace galena, chalcopyrite and chrysocolla; sulphides dominantly in wallrock and minor amounts in veins	1050		26		2.7	123
H427444	422953	6243623	1274	Orion	chip	0.3	18-Aug-18	JAuston	chip across arsenopyrite stringer in a strong QSP altered rock yellow-green to purple oxide; 7% sulphides dominantly disseminated pyrite; light grey silica	216		3.7		< 0.5	19
H427445	422830	6243465	1311	Orion	select	grab	18-Aug-18	JAuston	very strong gossan; white, yellow, orange QSP volcanic? Honeycomb textures could be relict chalcopyrite and minor observed pyrite	9		< 0.2		< 0.5	51
H427446	422876	6243403	1317	Orion	select	grab	18-Aug-18	JAuston	select grab of quartz vein and pyrite in QSP altered amygdaloidal andesite; 40% pyrite silvery anhedral and limonite clay	21		0.2		< 0.5	96
H427447	423034	6244392	1252	Orion	float	0.3x0.3x0.3	18-Aug-18	JAuston	sub angular boulder of microcrystalline grey quartz; disseminations and stringers of pyrite 5% and 0.5-1% sphalerite and galena clots	35		1.4		0.9	25
H427448	422894	6244417	1309	Orion	chip	0.25	18-Aug-18	JAuston	chip across 10cm wide calcite vein 300/-40; wallrock is a carbonate altered fine grained andesite; 1% pyrite euhedral in vein and anhedral in selvage	49		0.3		< 0.5	27
H427449	423066	6244592	1292	Orion	float	0.64x0.4x0.35	17-Aug-18	JAuston	massive pyrite with silica boulder; 35% pyrite; host is a light green felsic volcanic; trace black dendrites seen in grey quartz veins	7		0.5		1.1	13

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
H427047		69	15	3	< 2		17		0.06	344	< 10	< 10	< 0.5	< 2	< 0.01	< 1	3	16.5	< 10	3	0.03	< 10	0.01
H427048		2940	2	3	81		32		0.27	71	< 10	11	< 0.5	< 2	4.25	29	10	9.2	< 10	1	0.19	< 10	1.68
H427049		62	6	4	481		475		0.12	1280	< 10	< 10	< 0.5	< 2	0.05	1	14	6.66	< 10	3	0.09	< 10	0.01
H427050		108	4	10	6		18		0.07	425	< 10	< 10	< 0.5	< 2	0.05	2	7	15.5	< 10	20	0.05	< 10	0.01
H427437		1170	2	3	70		305		0.4	30	< 10	< 10	< 0.5	4	3	6	19	3.95	< 10	2	0.2	< 10	1.67
H427444		66	10	2	294		62		0.68	75	< 10	11	< 0.5	3	0.08	< 1	17	2.37	< 10	< 1	0.39	22	0.04
H427445		641	< 1	39	4		39		2.81	5	< 10	32	< 0.5	< 2	0.84	9	234	13.4	< 10	1	0.03	< 10	2.6
H427446		368	< 1	51	13		23		2.96	< 2	< 10	< 10	< 0.5	< 2	4.51	13	92	14.3	< 10	< 1	< 0.01	< 10	0.72
H427447		26	6	< 1	591		158		0.28	50	< 10	18	< 0.5	< 2	0.04	< 1	22	1.74	< 10	< 1	0.28	< 10	0.04
H427448		1550	2	2	10		66		2.09	36	< 10	25	< 0.5	2	7.98	9	15	6.04	< 10	< 1	0.14	< 10	1.67
H427449		1620	4	22	62		512		1.14	766	< 10	< 10	0.6	< 2	5.67	24	76	11.8	< 10	< 1	0.34	< 10	1.78

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
H427047	0.012	< 0.001	> 20.0	1280	< 1	< 1	< 0.01	< 20	4	40	< 10	5	< 10	< 1	4
H427048	0.015	0.067	9.69	28	9	71	< 0.01	< 20	< 1	< 2	< 10	47	< 10	7	3
H427049	0.015	0.007	7.48	123	< 1	6	< 0.01	< 20	< 1	31	< 10	2	< 10	< 1	3
H427050	0.011	0.004	> 20.0	903	< 1	2	< 0.01	< 20	2	76	< 10	5	< 10	< 1	3
H427437	0.03	0.042	3.41	76	4	39	< 0.01	< 20	< 1	< 2	< 10	13	< 10	8	2
H427444	0.148	0.005	2.26	8	< 1	6	< 0.01	< 20	2	< 2	< 10	2	< 10	5	4
H427445	0.051	0.025	1.09	5	14	9	0.39	< 20	7	< 2	< 10	128	< 10	3	12
H427446	0.028	0.016	12.8	7	5	22	0.16	< 20	< 1	< 2	< 10	59	< 10	2	7
H427447	0.03	0.002	1.62	3	< 1	2	< 0.01	< 20	1	< 2	< 10	2	< 10	4	3
H427448	0.043	0.128	0.37	5	13	315	< 0.01	< 20	< 1	< 2	< 10	68	< 10	12	1
H427449	0.031	0.027	11.8	102	6	110	< 0.01	< 20	< 1	49	< 10	28	< 10	3	2

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
H427568	422879	6245687	1423	Orion	grab	random	16-Aug-18	JAuston	very hard dark grey to black phyllite; suspect hornfelsing; foliation 200/-70; pyrrhotite 1.5% and pyrite 0.5% disseminated;	< 5		< 0.2		< 0.5	108
H427569	422923	6245661	1418	Orion	grab	random	16-Aug-18	JAuston	corner of very hard outcrop of hornfelsed andesite; disseminated pyrrhotite 5% and minor chalcopyrite 0.5%	6		0.3		< 0.5	165
H427570	422919	6245610	1415	Orion	chip	0.2	16-Aug-18	JAuston	20cm chip over a 3cm wide quartz vein; vein 114/-20 low confidence on this measurement; chalcopyrite in vein 1-2%; arsenopyrite in selvage 2%; and pyrrhotite 2% clots throughout	19		0.9		< 0.5	674
H427571	422914	6245475	1396	Orion	grab	random	16-Aug-18	JAuston	grab from a glacial polished gossanous outcrop; dark green hornfelsed andesite with disseminated pyrrhotite 4% and trace cpy as blebs that are rimmed by pyrrhotite	13		0.2		< 0.5	196
H427665	422207	6245815	1415	Orion	boulder chip	2.1	15-Aug-18	KJKonkin	boulders upto to 5-8m in size, P1sil vfg graphitic seds, WS2lim/hem, FS bk-white with 20-25% barren qtz random orientated qtz stringer stwk, tr vfg diss PY in host P1sil sed, P2ser	13		0.8		0.9	6
H427666	422191	6245830	1416	Orion	chip	1.5	15-Aug-18	KJKonkin	15x15m o/c or huge erratic, as above description	< 5		0.8		< 0.5	2
H427690	422161	6245654	1407	Orion	chip	1.2	15-Aug-18	KJKonkin	S5tbd schistose 184/54 foliation, strong lim ox on WS, F2lim, moderaltely graphitic bk argillite with 7-10% white qtz-vlt stringers convoluted with P2lim ox, tr diss PY	23		1.9		< 0.5	122
H427691	422335	6245515	1468	Orion	chip	2	15-Aug-18	KJKonkin	along a 10-15cm wide grey/white qtz vein 70/90, F2lim, tr<1% vfg diss PY in P2sil ser schist host with intense Fe-ox on WS as well with tr<1% vfg diss PY in ser schist siled host	11		0.4		< 0.5	9
H427692	422528	6245514	1477	Orion	moraine	20x30cm	15-Aug-18	KJKonkin	rounded boulder with semi-massive PY minor ASPY in qtz-cal vein bx stwk, V4fg host WS1hem/lim, FS granular textured sulphides	< 5		< 0.2		< 0.5	69
H427693	422627	6245738	1466	Orion	moraine	grab	15-Aug-18	KJKonkin	sub-angular, med-dk grey-green andesite with 3-5% diss euهدral fg-vcg PY, 2-3% 1-5mm fg anahedral PY vlts, WS1lim/hem, P2sil, minor cal+qtz vlts with 2-3% fg diss PY	7		< 0.2		< 0.5	97
H427694	422613	6245803	1468	Orion	moraine	grab	15-Aug-18	KJKonkin	fist-sized cobble, qtz stwk with 3-5% fg-cg euهدral-anahedral diss PY, waxy pale-green sericite, P2lim	< 5		0.4		3.5	9
H427695	422613	6245803	1469	Orion	moraine	10x15cm	15-Aug-18	KJKonkin	very heavy rock with reddish hem WS, 2-3% qtz vlts, very hard rock, exhalitiive with massive vfg dusty PY in silica matrix	5		1.3		0.9	15
H427696	422608	6245851	1478	Orion	chip	0.5	15-Aug-18	KJKonkin	from fault face S5tbd pyjamas siltstone with 5-7% interbedded vfg 1-10mm PY layers well stratified, P2sil, WS reddish-purple hem/lim, bk-charcol grey siltstone with 2-3% fg diss PY	7		< 0.2		< 0.5	55

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
H427568		638	< 1	111	2		47		2.45	< 2	< 10	20	< 0.5	< 2	2.68	41	360	5.66	< 10	< 1	1.45	< 10	2.87
H427569		411	< 1	78	3		17		2.65	< 2	< 10	27	0.7	< 2	3.85	41	140	4.11	< 10	< 1	0.21	< 10	1.11
H427570		646	3	11	2		53		2.77	< 2	< 10	< 10	0.5	4	0.35	49	19	9.65	< 10	2	1.25	< 10	2.15
H427571		500	< 1	18	< 2		42		2.23	< 2	< 10	21	< 0.5	< 2	1.24	33	58	5.09	< 10	< 1	1.38	< 10	1.85
H427665		51	7	1	19		72		0.13	53	< 10	83	< 0.5	< 2	0.02	< 1	48	0.72	< 10	498	0.05	< 10	0.02
H427666		79	7	1	23		3		0.11	32	< 10	51	< 0.5	< 2	< 0.01	< 1	27	1.13	< 10	4	0.03	< 10	0.01
H427690		1190	4	32	15		115		0.53	31	< 10	106	< 0.5	3	0.34	13	24	2.49	< 10	< 1	0.19	12	0.11
H427691		50	4	< 1	131		35		0.91	9	< 10	385	< 0.5	< 2	0.01	< 1	18	0.73	< 10	2	0.31	38	< 0.01
H427692		274	< 1	75	< 2		49		1.87	15	< 10	< 10	< 0.5	< 2	1.47	35	115	12.9	< 10	< 1	0.08	< 10	1.85
H427693		419	< 1	81	9		58		2.92	< 2	< 10	< 10	< 0.5	< 2	2.78	48	55	10	< 10	2	0.31	< 10	3.21
H427694		3350	4	21	317		1430		1.1	346	< 10	11	0.9	< 2	6.31	23	53	7.98	< 10	6	0.39	< 10	1.64
H427695		252	3	7	33		31		0.74	160	< 10	< 10	< 0.5	< 2	0.24	18	6	12.6	< 10	2	0.38	< 10	0.21
H427696		577	3	69	< 2		70		1.62	13	< 10	17	< 0.5	< 2	3.03	41	81	8.39	< 10	3	0.06	< 10	1.58

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
H427568	0.077	0.201	1.58	5	6	31	0.22	< 20	4	< 2	< 10	94	< 10	4	2
H427569	0.452	0.229	1.62	4	7	159	0.13	< 20	< 1	< 2	< 10	49	< 10	3	1
H427570	0.028	0.069	4.72	4	14	5	0.15	< 20	2	< 2	< 10	169	< 10	4	2
H427571	0.127	0.159	0.84	2	11	31	0.22	< 20	< 1	< 2	< 10	131	< 10	4	1
H427665	0.02	0.003	0.23	11	< 1	3	< 0.01	< 20	< 1	< 2	< 10	1	< 10	< 1	2
H427666	0.021	0.001	0.31	16	< 1	2	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	< 1	5
H427690	0.034	0.053	0.19	28	3	15	< 0.01	< 20	2	< 2	< 10	28	< 10	4	1
H427691	0.074	0.012	0.06	< 2	< 1	17	< 0.01	< 20	3	< 2	< 10	< 1	< 10	4	9
H427692	0.047	0.021	13.8	9	9	12	0.01	< 20	< 1	< 2	< 10	102	< 10	5	3
H427693	0.022	0.032	9.39	10	13	15	0.39	< 20	2	< 2	< 10	83	< 10	10	13
H427694	0.019	0.019	6.82	48	11	158	< 0.01	< 20	< 1	6	< 10	32	< 10	9	2
H427695	0.016	0.074	14.8	37	3	7	0.03	< 20	2	11	< 10	37	< 10	5	4
H427696	0.063	0.045	6.55	7	18	16	0.33	< 20	4	< 2	< 10	145	< 10	12	14

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
H427697	422902	6245102	1344	Orion	moraine	30x50cm	15-Aug-18	KJKonkin	sub-rounded boulder, intense Fe-ox WS, intensely siled, very hard dk grey silica, PY breccia of exhalitive? 15-20% semi-massive fg PY matrix with dk grey exhalative angular fragments	8		6.2		2.1	5
H427698	422779	6246197	1460	Orion	select	grab	15-Aug-18	KJKonkin	V4m, fp., pyritic stwk, collection of spotty PY clusters within stwk, 5m NE of Jeff's sample 427748, P2sil, 20-25% white qtz stwk with 3-5% pods of semi-massive PY clusters	< 5		< 0.2		1	142
H427699	422741	6246083	1462	Orion	random	grab	15-Aug-18	KJKonkin	black platy S5tbd with 3-5% whisps of layered + diss fg PY, intense hem/lim oxide, P2sil, along shear zone 243/73	13		< 0.2		3	66
H427700	423056	6244576	1288	Orion	moraine	15x20cm	17-Aug-18	KJKonkin	round massive white-dark grey cryptocrystalline qtz boulder with 2-3% fg diss+vlt PY, tr jasperoidal qtz, WS1hem/lim	8		778	778	32.3	95
H427743	422193	6245774	1401	Orion	grab	random	15-Aug-18	JAuston	random grab from subcrop; strong QSP altered phyllite? Cut by quartz veins with fine grained sulphides seen in selvages; 10% sulphides pyrite and arsenopyrite disseminated and forming aggregates	< 5		0.3		< 0.5	41
H427744	422187	6245792	1403	Orion	grab	random	15-Aug-18	JAuston	Strong QSP altered sericite schist; grey with smoky subhedral pyrite ~2% disseminated; schist foliation = 118/-80	< 5		0.3		< 0.5	83
H427745	422133	6245507	1391	Orion	chip	1	15-Aug-18	JAuston	very strongly silicified outcrop; close to totally replaced by silica and cut by small quartz veins; contains randomly distributed pyrite disseminated	10		< 0.2		< 0.5	14
H427746	422195	6245270	1403	Orion	chip	0.15	15-Aug-18	JAuston	sulphide quartz vein from strongly gossanous outcrop; vein is shear related with stong gossan and sulphides shear surface is oriented 198/-66; Arsenopyrite, pyrite and trace chalcopyrite form an aggregate with quartz and red/black oxides	12		1.1		< 0.5	101
H427747	422195	6245270	1403	Orion	grab	select	15-Aug-18	JAuston	grab of wallrock next to last sample H427746; amygdaloidal very fine grained grey volcanic, felsic to intermediate, dacite; drusy quartz and calcite amygdules; sulphides rim amygdules 2-5% arsenopyrite and anhedral pyrite	7		< 0.2		< 0.5	8
H427748	422773	6246196	1461	Orion	chip	0.1	16-Aug-18	JAuston	black to grey brown bedded siltstone suspect quock formation; bands of sulphides aggregates 6% of rock, pyrite and arsenopyrite;	32		0.5		1.2	52
H427749	422764	6246132	1450	Orion	chip	0.1	16-Aug-18	JAuston	chip over qtz-cal-py-asy vein, euhedral pyrite and arsenopyrite; blows out into thinner veins on outcrop; 200/-65 vein orientation	5		< 0.2		< 0.5	54
H427750	422793	6245733	1419	Orion	float	select	16-Aug-18	JAuston	in moraine field; rhyolite schist with quartz eyes; realgar/orpime	< 5		0.2		0.6	28

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
H427697		2720	1	5	73		105		0.09	43	< 10	< 10	< 0.5	4	2.53	4	5	15.3	< 10	< 1	0.05	< 10	1.18
H427698		939	2	140	< 2		87		4.89	34	< 10	45	< 0.5	< 2	6.56	43	286	7.42	< 10	1	0.04	< 10	3.73
H427699		251	17	71	8		273		3.56	5	< 10	19	0.5	< 2	0.7	28	84	5.94	< 10	< 1	0.24	< 10	4.18
H427700		411	26	17	1200		2340		0.21	645	< 10	< 10	< 0.5	< 2	0.66	23	17	5.28	< 10	11	0.11	< 10	0.36
H427743		40	13	1	18		30		0.26	18	< 10	17	< 0.5	< 2	0.01	2	31	1.67	< 10	5	0.09	< 10	< 0.01
H427744		27	12	< 1	2		12		0.51	5	< 10	32	< 0.5	< 2	< 0.01	< 1	3	0.87	< 10	25	0.19	< 10	< 0.01
H427745		57	8	2	14		6		0.28	20	< 10	32	< 0.5	< 2	0.04	< 1	34	1.59	< 10	< 1	0.16	16	< 0.01
H427746		585	10	41	10		66		1.89	54	< 10	< 10	< 0.5	< 2	0.18	43	130	14.4	< 10	< 1	0.26	< 10	1.52
H427747		1480	1	36	< 2		94		2.62	45	< 10	22	< 0.5	< 2	3.49	37	253	4.51	< 10	< 1	0.04	< 10	2.6
H427748		284	22	36	18		148		1.4	48	< 10	18	< 0.5	< 2	1.01	10	5	5.63	< 10	< 1	0.27	< 10	1.01
H427749		634	< 1	48	< 2		52		1.91	6	< 10	11	< 0.5	< 2	5.28	30	53	10	< 10	< 1	0.07	< 10	1.4
H427750		25	1	< 1	9		108		0.37	11	< 10	91	< 0.5	< 2	0.01	< 1	3	0.95	< 10	< 1	0.26	14	0.03

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
H427697	0.012	0.007	17.9	17	1	46	< 0.01	< 20	1	< 2	< 10	7	< 10	3	4
H427698	0.088	0.033	1.4	12	14	44	0.3	< 20	< 1	< 2	< 10	134	< 10	7	10
H427699	0.028	0.022	3.62	17	14	8	0.52	< 20	5	< 2	< 10	85	< 10	13	13
H427700	0.016	0.002	4.91	632	1	28	< 0.01	< 20	< 1	5	< 10	19	< 10	2	5
H427743	0.022	0.004	1.36	4	< 1	2	< 0.01	< 20	2	< 2	< 10	2	< 10	1	6
H427744	0.054	0.001	0.67	< 2	< 1	12	< 0.01	< 20	< 1	< 2	< 10	2	< 10	< 1	2
H427745	0.02	0.002	1.27	2	< 1	6	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	4	7
H427746	0.014	0.037	3.97	14	6	2	0.13	< 20	< 1	< 2	< 10	62	< 10	5	7
H427747	0.063	0.097	0.42	12	19	26	0.26	< 20	4	< 2	< 10	137	< 10	12	3
H427748	0.025	0.036	3.68	13	5	11	0.2	< 20	< 1	< 2	< 10	23	< 10	13	5
H427749	0.042	0.024	9.53	9	12	28	0.27	< 20	3	< 2	< 10	92	< 10	6	9
H427750	0.018	0.001	0.5	< 2	< 1	1	< 0.01	< 20	< 1	< 2	< 10	< 1	< 10	6	2

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
P470407	422991	6244824	1316	Orion	float	float	19-Aug-18	JAuston	light green rhyolite with quartz eyes and grey quartz clasts cut by cm wide seams of pyrite 10-15% of sample; within grey quartz very fine grained needle like sulphide observed in trace amounts	5		1.9		1.7	29
P470408	423175	6244621	1298	Orion	chip	0.15	19-Aug-18	JAuston	chip over qtz-cal vein in a dark green to black honfelses phyllite, sedimentary protolith; 2% pyrite disseminated in wallrock, 1% pyrrhotite in vein and trace sphalerite seen in vein selvage	< 5		< 0.2		< 0.5	214
P470409	423173	6244672	1305	Orion	chip	0.15	19-Aug-18	JAuston	chip over a 2cm wide quartz vein in a dark grey phyllitic siltstone; 4% pyrrhotite disseminated in wallrock and as clots in the vein	106		13.6		1.8	49
P470424	428751	6247671	1567	Delta	chip	0.4	4-Sep-18	JAuston	chip across 7cm vein and hanging wall; vein - 240/-77; wallrock is a strongly silicified siltstone; 10% sulphides 4% anhedral very fine grained pyrite, 4% euhedral pyrite and 2% arsenopyrite;	109		1.4		0.7	90
P470425	428761	6247695	1581	Delta	select	grab	4-Sep-18	JAuston	select grab of silicified siltstone in a small resistive ridge between small streams; greenish grey siltstone with 4% euhedral pyrite cubes and 0.5-1% clots of galena	106		1.4		< 0.5	13
P470426	428442	6247833	1837	Delta	float	0.3x0.3x0.3	4-Sep-18	JAuston	15cm wide quartz iron carbonate vein with 8% galena and 7% sphalerite, in a greywacke host rock	147		23.9		650	42
P470427	428458	6247753	1816	Delta	float	float	4-Sep-18	JAuston	boulder with a 5cm wide calcite vein that contains clots of chalcopyrite ~2%; host rock is a grey crystal lithic tuff with 2% disseminated pyrite	< 5		1.8		< 0.5	1040
P470428	429094	6248121	1710	Delta	select	grab	4-Sep-18	JAuston	folded argillite with quartz-calcite veins and associated limonite and jarosite with graphitic fracture surfaces; galena clots take up 1-2% of the sample	233		37.5		576	328
P470429	429114	6248136	1722	Delta	select	grab	4-Sep-18	JAuston	quartz vein stockwork within a black argillite; pyrite 2% disseminated and trace tetrahedrite	148		0.5		0.7	41
S022401	423109	6244543	1283	Orion	moraine	10x15cm	17-Aug-18	KJKonkin	rounded massive vfg PY with 10-15% pale grey siliceous exhalitive laminated fragments, bxd very angular 2-5cm within PY matrix amorphous groundmass, WS1lim/hem, FS brassy PY with pale grey silica exhalitive fragments	27		25.7		0.9	7
S022402	422922	6244455	1285	Orion	moraine	15x20x35cm	18-Aug-18	KJKonkin	very angular tabular boulder, pale olive green grey with very sucrosic texture, gritty WS but is a weathering effect of a crystalline dolomite or limestone with possible crystalline SL?? Black to yellow brown, very heavy but soft rock, probably just a crystalline carbonate	8		< 0.2		< 0.5	64

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
P470407		1950	6	9	128		1010		0.62	1110	< 10	11	< 0.5	< 2	4.22	9	37	15.4	< 10	6	0.22	< 10	2.12
P470408		1890	< 1	15	4		118		3.52	15	< 10	123	0.5	< 2	4.61	14	62	7.11	10	< 1	1.51	< 10	2.37
P470409		2030	1	9	82		138		2.54	28	< 10	42	< 0.5	110	6.19	26	24	7.39	10	< 1	0.69	< 10	1.88
P470424		1390	2	9	33		143		0.61	58	< 10	11	< 0.5	3	3.75	9	13	4.18	< 10	< 1	0.32	< 10	1.06
P470425		1760	2	4	540		31		0.35	56	< 10	15	< 0.5	3	5.84	6	9	4.7	< 10	< 1	0.17	< 10	1.75
P470426		3240	< 1	4	9730	0.973	57600	5.76	0.57	68	< 10	39	< 0.5	< 2	6.03	7	5	6.55	< 10	5	0.34	< 10	1.54
P470427		1420	< 1	3	< 2		43		1.12	< 2	< 10	94	< 0.5	< 2	> 10.0	6	5	2.13	< 10	1	0.1	10	0.92
P470428		2640	1	16	19900	1.99	51700	5.17	1.34	18	< 10	24	< 0.5	< 2	3.72	8	13	5.04	< 10	4	0.26	< 10	1.31
P470429		603	< 1	6	145		106		0.82	67	< 10	66	< 0.5	< 2	4.75	4	18	2.01	< 10	< 1	0.2	< 10	0.43
S022401		141	11	7	83		144		0.26	637	< 10	< 10	< 0.5	< 2	0.23	1	4	16.5	< 10	16	0.15	< 10	0.05
S022402		773	< 1	39	< 2		67		3.51	< 2	< 10	630	< 0.5	< 2	3.9	29	141	5.92	< 10	< 1	2.92	< 10	3.46

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
P470407	0.021	0.012	12.3	163	3	100	< 0.01	< 20	3	54	< 10	17	< 10	1	3
P470408	0.062	0.167	0.33	12	25	139	0.26	< 20	4	< 2	< 10	154	< 10	6	2
P470409	0.052	0.072	0.94	8	25	402	0.21	< 20	2	< 2	< 10	150	< 10	11	2
P470424	0.018	0.072	3.87	7	3	260	< 0.01	< 20	3	< 2	< 10	20	< 10	4	2
P470425	0.038	0.052	1.38	5	5	423	< 0.01	< 20	< 1	< 2	< 10	15	< 10	15	3
P470426	0.019	0.096	3.43	13	6	313	< 0.01	< 20	6	< 2	< 10	30	< 10	12	3
P470427	0.034	0.072	0.36	4	4	279	< 0.01	< 20	2	< 2	< 10	67	< 10	6	1
P470428	0.019	0.082	2.21	12	5	220	< 0.01	< 20	< 1	< 2	< 10	29	< 10	8	2
P470429	0.025	0.048	0.67	3	2	64	0.03	< 20	< 1	< 2	< 10	29	< 10	5	2
S022401	0.014	0.002	> 20.0	145	< 1	17	< 0.01	< 20	3	147	< 10	5	< 10	1	5
S022402	0.106	0.199	0.14	12	15	83	0.31	< 20	12	< 2	< 10	175	< 10	6	2

Sample No.	East	North	Elev (m)	Area	Type	Width (m)	Date	Sampler	Description	Au (ppb)	Au (g/t)	Ag (ppm)	Ag (ppm)	Cd (ppm)	Cu (ppm)
S022403	422933	6244364	1309	Orion	moraine	40x30x15cm	18-Aug-18	KJKonkin	sub-angular semi-massive PY vlts and stringers in well foliated alt felsic vol? with 2-3% fuchasite blebs, intense Fe-oxidized WS, pale-med grey siliceous FS with 3-5% vfg diss-vlt dusty PY with 2-3% fg-mg euohedral diss PY	6		< 0.2		< 0.5	62
S022404	422981	6244225	1288	Orion	moraine	10cm	18-Aug-18	KJKonkin	granular text, heavy soft, round float olive green WS, bk-brown with minor white FS, probably an iron carbonate, fg granular sx??? Possibly SL	12		0.3		< 0.5	74
S022405	422970	6243600	1263	Orion	chip	1	18-Aug-18	KJKonkin	cherty QSP, pale-med grey with 2-3% dusty anhedral PY vlts, intersection of two stringers of PY 90/70 and 327/74, intense hem WS, F1hem/lim	11		2		< 0.5	7
S022406	422938	6243638	1273	Orion	select	grab	18-Aug-18	KJKonkin	massive vfg dusty diss PY with granular PY in 2-3cm vlts in cherty siliceous vol host 50%, intense lim/hem WS	35		7.5		0.5	18
S022407	422801	6243487	1309	Orion	chip	0.75	18-Aug-18	KJKonkin	V4dkfg, P1sil, 5-7% white tension qtz vlts normal to 320/72 contact with S4mg? Grit, qtz vlts with tr<1% cg blebs PO, tr-1% fg diss PY, F1hem/lim	5		< 0.2		< 0.5	66
S022408	422849	6243517	1312	Orion	chip	1.2	18-Aug-18	KJKonkin	qtz-PY vlts 120/90, intense Fe-ox o/c, probably vol host, P1sil, 7-10% diss-interstitial PY+PO with pure hem+lim WS and pale grey siliceous FS	5		< 0.2		< 0.5	43
S022417	423003	6244604	1296	Orion	moraine	30x20x15cm	21-Aug-18	KJKonkin	sericite schist with 10-15% qtz vlts with 3-5% fg diss+vlt PY, WS1Fe-ox, F2lim	36		2		< 0.5	10
S022418	423131	6244721	1301	Orion	select	grab	21-Aug-18	KJKonkin	hornfels fg sed/vol? with 7-10% qtz bx with semi-massive 15cm pods of PY+ oxed sxs, strong Fe-ox	31100	31.1	25.9		3.2	625
S022419	423054	6244763	1305	Orion	moraine	40x35x20cm	21-Aug-18	KJKonkin	V4fg P2sil 10-15% qtz bx with semi massive vlt anhedral PY, F3lim, P1chl, green andesite host	9		< 0.2		< 0.5	46
S022430	422231	6247735	1789	Orion	chip	1.2	30-Aug-18	KJKonkin	select chip across spotty Fe-oxide patches, P1sil, V3tbx, dacite tuff breccia, epiclastic, 10-15%cherty stringers, intense Fe-ox, tr diss vfg PY/PO	5		0.2		< 0.5	10
S022431	422132	6247552	1744	Orion	select	grab	30-Aug-18	KJKonkin	siled pod within purple black meta sed? cherty with 5-7% fg-cg euohedral PY, tr vfg dusty anhedral diss PY as well, QSP alt metased well foliated 192/64	5		0.4		< 0.5	16
S022452	422408	6245550	1390	Orion	moraine	15cm	12-Sep-18	KJKonkin	semi massive 70% vfg Py in calcite matrix, very heavy sample with odd oolite-like PY replaced features	< 5		0.3		< 0.5	15
S022453	624450	6245600	1390	Orion	moraine	1.0x0.7x0.5m	12-Sep-18	KJKonkin	v angular well-foliated, vfg laminated meta-sed with 15-20% calcite clots with 7-10% diss-interstitial fg euohedral-anhedral PY, pale-dk grey schistose calcaerous meta sed	< 5		< 0.2		< 0.5	79
S022454	422425	6245575	1390	Orion	moraine	30x50cm	12-Sep-18	KJKonkin	subangular qtz boulder with 5-7% vfg diss+vlt PY, 10-15% calcite with qtz vein, tr diss bk SL	< 5		239	239	1.5	24

Sample No.	Cu (%)	Mn (ppm)	Mo (ppm)	Ni (ppm)	Pb (ppm)	Pb (%)	Zn (ppm)	Zn (%)	Al (%)	As (ppm)	B (ppm)	Ba (ppm)	Be (ppm)	Bi (ppm)	Ca (%)	Co (ppm)	Cr (ppm)	Fe (%)	Ga (ppm)	Hg (ppm)	K (ppm)	La (ppm)	Mg (%)
S022403		233	< 1	62	< 2		118		1.16	12	< 10	< 10	< 0.5	< 2	1	32	79	15.5	< 10	5	0.17	< 10	0.39
S022404		1330	< 1	120	15		156		4.92	14	< 10	61	< 0.5	< 2	8.2	30	497	8.43	10	< 1	2.13	< 10	3.19
S022405		84	23	1	22		29		0.21	196	< 10	11	< 0.5	< 2	0.02	3	10	4.39	< 10	< 1	0.16	14	0.01
S022406		96	32	4	84		20		0.11	383	< 10	< 10	< 0.5	< 2	0.02	< 1	5	15.7	< 10	3	0.07	< 10	0.01
S022407		522	< 1	97	< 2		51		3.09	< 2	< 10	17	< 0.5	< 2	4.76	35	164	5.61	< 10	< 1	0.05	< 10	1.56
S022408		680	1	108	< 2		44		3.63	< 2	< 10	12	< 0.5	< 2	6.53	32	194	8.67	< 10	< 1	< 0.01	< 10	2.51
S022417		216	1	< 1	60		148		0.3	201	< 10	< 10	< 0.5	< 2	0.28	16	6	8.26	< 10	< 1	0.21	< 10	0.12
S022418		1080	< 1	28	187		116		0.73	> 10000	< 10	< 10	< 0.5	233	0.49	168	8	18.2	< 10	< 1	0.09	< 10	0.61
S022419		551	< 1	44	< 2		38		1.46	40	< 10	< 10	< 0.5	3	5.28	20	70	11.8	< 10	< 1	0.05	< 10	1.4
S022430		500	3	2	26		97		0.6	3	< 10	158	< 0.5	< 2	0.34	3	19	2.18	< 10	< 1	0.27	27	0.12
S022431		128	5	2	19		20		0.47	4	< 10	17	< 0.5	5	0.11	5	19	2.81	< 10	< 1	0.26	< 10	0.07
S022452		155	1	7	5		85		0.04	3	< 10	< 10	< 0.5	3	3.55	< 1	2	16.6	< 10	< 1	< 0.01	< 10	0.06
S022453		917	< 1	58	6		36		1.25	6	< 10	< 10	< 0.5	17	3.96	22	32	13.1	< 10	3	0.21	< 10	1.19
S022454		4490	3	3	447		165		0.2	37	< 10	14	< 0.5	5	4.32	10	9	7.16	< 10	2	0.03	< 10	1.71

Sample No.	Na (%)	P (%)	S (%)	Sb (ppm)	Sc (ppm)	Sr (ppm)	Ti (%)	Th (ppm)	Te (ppm)	Tl (ppm)	U (ppm)	V (ppm)	W (ppm)	Y (ppm)	Zr (ppm)
S022403	0.072	0.017	18.9	16	7	15	0.18	< 20	3	2	< 10	37	< 10	3	5
S022404	0.18	0.243	0.59	5	21	153	0.23	< 20	< 1	< 2	< 10	195	< 10	6	2
S022405	0.039	0.003	4.46	14	< 1	2	< 0.01	< 20	2	< 2	< 10	2	< 10	3	3
S022406	0.019	0.002	18.9	60	< 1	1	< 0.01	< 20	< 1	< 2	< 10	4	< 10	< 1	4
S022407	0.047	0.046	3.03	8	9	32	0.32	< 20	< 1	< 2	< 10	105	< 10	8	13
S022408	0.032	0.034	5.02	5	10	35	0.3	< 20	2	< 2	< 10	120	< 10	8	14
S022417	0.017	0.092	8.93	19	8	5	0.03	< 20	< 1	< 2	< 10	39	< 10	6	3
S022418	0.017	0.02	12.6	120	4	14	< 0.01	< 20	23	< 2	< 10	30	< 10	4	4
S022419	0.042	0.006	11.5	9	10	37	< 0.01	< 20	< 1	< 2	< 10	75	< 10	2	3
S022430	0.06	0.016	0.07	4	1	7	0.01	< 20	< 1	< 2	< 10	6	< 10	8	5
S022431	0.033	0.043	1.48	3	< 1	3	< 0.01	< 20	2	< 2	< 10	2	< 10	4	3
S022452	0.011	0.002	> 20.0	6	< 1	23	< 0.01	< 20	2	< 2	< 10	4	< 10	< 1	4
S022453	0.016	0.002	13.4	6	4	66	0.02	< 20	1	3	< 10	37	< 10	2	3
S022454	0.019	0.001	6.17	52	2	151	< 0.01	< 20	< 1	< 2	< 10	7	< 10	5	2