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GEOCHEMICAL, MAJOR-OXIDE, MINOR-OXIDE, TRACE-ELEMENT, CARBON, AND RARE-EARTH-ELEMENT DATA FROM ROCKS COLLECTED IN 2011 IN THE MORAN AREA, TANANA AND MELOZITNA QUADRANGLES, ALASKA

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Note: This report (including all analytical data and tables) is available in digital format from the DGGS website (www.dggs.alaska.gov) at no charge. The digital data are available as PDF files and .csv files.

GEOCHEMICAL, MAJOR-OXIDE, MINOR-OXIDE, TRACE-ELEMENT, CARBON, AND RARE-EARTH-ELEMENT DATA FROM ROCKS COLLECTED IN 2011 IN THE MORAN AREA, TANANA AND MELOZITNA QUADRANGLES, ALASKA

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Trevelyn A. Lough[1], Larry K. Freeman[1], Rainer J. Newberry[2], Brent A. Elliot[1], Gerry A. Griesel[1], and David J. Szumigala[1]

INTRODUCTION

Mineral-resources personnel from the Alaska Division of Geological & Geophysical Surveys carried out a geologic field survey, including mapping and sampling in the Moran area in the Tanana A-6 and B-6 quadrangles, and the Melozitna A-1, A-2, B-1, and B-2 quadrangles, Alaska, from June 17 to August 15, 2011. The fieldwork provides basic information critical to building an understanding of Alaska's geology and is part of an integrated program of airborne geophysical surveys followed by geologic mapping. During 2011, 212 rock samples were collected for geochemical trace-element analysis (tables 1–3), 58 rock samples were collected for whole-rock (major- and minor-oxide and petrogenetically important trace elements) analyses (tables 4–6), two samples were collected for analysis of non-carbonate carbon content (table 7), 439 polished rock slabs were analyzed for whole rock and petrogenetically important trace elements (tables 8 and 9), and 26 samples were analyzed for rare earth elements (tables 10–12). Location were collected as Universal Transverse Mercator (UTM) coordinates based on the Clark 1866 spheroid, NAD 27, zone 5N projection using hand-held, Garmin eTrex Legend HCx, GPS units (no differential correction was applied). Estimated position error calculated by the GPS units had a minimum of 1 meter, a maximum of 9 meters, and an average of approximately 3 meters. Coordinates were converted to latitude and longitude based on the North American Datum of 1927 (NAD 27) for Alaska using the "Calculate Geometry" tool in ArcMap 10.0. Some accuracy may be lost in this conversion. Additional details about the sampling program can be found in the metadata file associated with the digital version of this report. Sample numbers, location data, descriptions, and analytical results for each sample are tabulated in tables 1–12.

SAMPLE COLLECTION TECHNIQUES

Samples of visibly mineralized rock, or rocks exhibiting features associated with mineralization, were preferentially collected and analyzed for geochemical trace elements. Most samples are "grab" samples, which were randomly collected at a location; however, a few samples are "select" samples, which were deliberately collected from a specific feature. These instances are noted in the sample's description. Samples of visibly carbonaceous or graphite-bearing metamorphic rock were preferentially collected and analyzed for their non-carbonate carbon content. We collected rock samples for major-oxide, minor-oxide, and trace-element analyses to determine bulk rock composition of igneous and meta-igneous lithologies, or to identify the tectonic setting of a sample's protolith from petrogenetically important trace elements. These rocks were collected in a random distribution across the study area. Of the 58 samples sent to

[1]Alaska Division of Geological & Geophysical Surveys, 3354 College Rd., Fairbanks, AK 99709-3707;
[2]Department of Geology & Geophysics, University of Alaska, P.O. Box 755780, Fairbanks, AK 99775-5780

ALS Chemex for whole-rock analyses, 26 plutonic and metamorphic rocks were also analyzed for rare earth elements. These samples were selected based on sample quality (unweathered) and location (random distribution across study area).

ANALYTICAL METHODS

Sample Preparation

Tables 1–7 and 10–12: Trace-element geochemical analyses (table 2), whole-rock analyses (table 4), non-carbonate carbon analysis (table 7), and rare-earth-element analyses (tables 11) were performed by ALS Chemex. Rock samples were crushed with a Terminator oscillating-jaw crusher with chrome steel alloy plates so that at least 70 percent of the material passed through a -10 mesh (2 mm) screen. Representative aliquots of 250 grams (g) each were taken using a stainless steel riffle splitter. These samples were then pulverized with an Essa ring mill bowl and pucks made of Essa's Standard Steel alloy so that 85 percent of the sample passed through a -200 mesh (75 micron) screen. Trace-element analyses, whole-rock analyses, gold analyses, and rare-earth-element analyses were performed using representative splits of each 250 g pulp.

Tables 8–9: Major- and minor-oxide and trace-element compositions were performed by X-ray fluorescence (XRF) spectroscopy at the University of Alaska Fairbanks (UAF) on polished rock slabs and are necessarily approximations to the true compositions. Rocks with a grain size of 3 mm or less were cut to fit in 37-mm-diameter sample holders. Slabs of potentially lower-than-normal quality are noted in the table 8 "Comments" column with any combination of the following descriptors:

- Altered = altered sample
- Inhomogeneous = sample contains crystals or clasts > 3 mm and/or a texture such as banding or boxwork
- Poor polish = poorly polished sample
- Porous = porous sample
- Small = sample is smaller than the 37-mm-diameter sample holder and a 27-mm sample holder was used instead

Analytical Methods for DGGS Samples Analyzed by ALS Chemex

Tables 1–3: All potentially mineralized samples were assayed for gold by inductively coupled plasma–atomic emission spectroscopy following a 30 g fire assay fusion (FA-ICP-AES). Selected samples were assayed for platinum and palladium by FA-ICP-AES. Trace-element geochemical analyses were performed by inductively coupled plasma–atomic emission spectroscopy (ICP-AES) methods after four-acid, near-total digestion. This method of digestion is possibly incomplete for some elements and may result in lower analytical results. Sample locations and descriptions are tabulated in table 1, analytical results are tabulated in table 2 and, analytical methods as well as lower and upper reporting limits are tabulated in table 3. The "Lithology_Description" column in table 1 begins with the rock name derived from field observations, followed by a semi-colon and a sample description. Rock samples with trace-element values above the detection limit in the initial trace-element geochemical analysis were reanalyzed for those elements by the following methods:

- gold—fire assay with a gravimetric finish using a 30 g sub-sample (FA-GRAV)
- phosphorus—high-grade ICP-AES methods after four-acid, near-total digestion; and
- arsenic and/or zinc—high-grade ICP-AES methods after four-acid, near-total digestion.

Results and detection limits for the reanalysis of gold, arsenic, phosphorus, and zinc are listed in tables 2 and 3, respectively.

Tables 4–6: Major- and minor-element oxides were determined at ALS Chemex by XRF spectrometry following a lithium borate fusion (LBM-XRF). Trace element values for Cr, Nb, Ni, Rb, Sr, Y, and Zr were determined for mafic rocks by XRF on a pressed pellet. Trace element values for Ba, Nb, Rb, Sr, Th, U, Y, and Zr were determined for felsic rocks by XRF on a pressed pellet. Sample locations and descriptions are tabulated in table 4, analytical results are tabulated in table 5, and analytical methods and detection limits are tabulated in table 6. The "Lithology_Description" column in table 4 consists of three components: 1) the rock name derived from field observations; 2) the rock name—enclosed in parentheses—derived from geochemical data and hand-sample textures; and 3) a sample description.

Table 7: Non-carbonate carbon analyses were performed by ALS Chemex. Non-carbonate carbon content was determined using a LECO furnace after a dilute acid digestion. Sample location, description, and analytical results are listed in table 7. The lower detection limit is 0.01%, and the upper detection limit is 50% carbon. The "Lithology_Description" column in table 7 begins with the rock name derived from field observations, followed by a sample description.

Tables 10–12: Rare earth and trace elements were determined at ALS Chemex by inductively coupled plasma-mass spectroscopy (ICP-MS) after a lithium metaborate fusion. This method of digestion is possibly incomplete for some elements and may result in lower analytical results. Sample location and description are tabulated in table 10, analytical results are tabulated in table 11, and analytical methods as well as lower and upper reporting limits are tabulated in table 12. The "Lithology_Description" column in table 10 consists of three components: 1) the rock name derived from field observations; 2) the rock name—enclosed in parentheses—derived from geochemical data and hand-sample textures; and 3) a sample description.

Quality control: In addition to ALS Chemex's own internal quality control program, DGGS monitored analysis quality by inserting one sample of known composition into the sample roster for every 20-sample batch. For the trace-element geochemical analyses, the results of one DGGS-standard sample differs from its known composition by more than one standard deviation; all samples in this 20-sample batch are noted in table 2 by a carat next to the Sample_ID, and mineralized samples were re-run for gold by FA-ICP-AES (results in table 2); repeat values of the standard are within acceptable range.

Analytical Methods for DGGS Samples Analyzed at UAF

Tables 8–9: XRF spectroscopic analyses performed at UAF were run on a PANalytical Axios spectrometer using SuperQ software. Nb, Rb, Sr, Y, and Zr were measured using SuperQ's 37mmRbSrYZr routine software program; other elements were measured with the IQ+37mmVac software program.

- 37mmRBSRYZr routine—uses specific pre-determined peak and background positions for which x-ray intensities are measured for 2-800 seconds (depending on the element). The intensity of the Rh Compton peak is used to estimate mass-absorption coefficients (MACs) for both unknowns and well-characterized natural standards. Peak intensities are computed and converted to concentrations using calibration curves employing at least 10 natural rock standards.
- IQ37mm Vac—scans over a series of energies corresponding to a range from Ce-Kα to O-Kα. Peak heights and backgrounds, and X-Ray elemental interferences are picked

with the software and checked manually to ensure quality control. Elemental abundances for all elements with atomic numbers between 8 and 92 are estimated from artificial standards and these estimations are used to calculate MACs for each element present above the detection limit. Revised concentrations are employed to calculate revised MACs until a stable solution is determined. Elemental abundances are then normalized to 100%.

Quality Control:

- 37mmRBSRYZr routine—These procedures are routinely checked by analysis of secondary natural standards that were not employed in making the calibration curves. Elemental abundances are typically within 2-5% of the amount present for concentrations > 10 times the detection limit, within 5-10% of the amount present for concentrations 4-10 times the detection limit and within 30% of the amount present for concentrations near the detection limit.
- IQ37mm Vac—The software is routinely checked using pressed pellets of well-characterized natural rock standards. Elemental abundances are within 1-2% of the amount present for major elements, 2-5% of the amount present for minor elements, and 5-10% of the amount present for trace elements.

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Table 1. Location and description of rocks collected for trace-element analyses in the Moran area, Tanana and Melozitna Quadrangles, Alaska.

NOTE: Coordinates are based on the North American Datum of 1927 (NAD 27)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE021A	65.282036	-152.847237	507128	7239704	5N	Quartzite; fine grained, white to light gray with areas of oxidation and fractures. Comprises 20% of exposure. Geochemistry sample for possible sulfide assay.
2011BAE055A	65.337448	-152.716683	513192	7245901	5N	Quartz vein; very-fine-grained, massive float with dark-gray to brown oxidation and veinlets. 100% of exposure.
2011BAE104A	65.487497	-152.847442	507063	7262604	5N	Paragneiss; medium grained, light pink to pale pinkish gray, equigranular, and massive. Occasional pink, euhedral potassium feldspar megacrysts (~1.5 cm). Quartz crystals are subhedral. 100% of exposure.
2011BAE123B	65.409953	-152.831526	507823	7253963	5N	Quartz vein; very fine grained. 1% of exposure.
2011BAE128C	65.411646	-152.854732	506745	7254149	5N	Quartz vein; trace.
2011BAE133B	65.414397	-152.882330	505463	7254453	5N	Quartz vein; very fine grained with some iron oxidation. 1% of exposure.
2011BAE135B	65.416252	-152.890508	505083	7254659	5N	Quartz vein; very fine grained with dark vein-fill. 1% of exposure.
2011BAE138B	65.442911	-152.883345	505410	7257631	5N	Quartz vein; sulfides and/or micas may be present inside veins. Rock has visible shear planes. 1% of exposure.
2011BAE153B	65.250603	-152.663285	515730	7236234	5N	Quartz vein; cuts quartz schist. Vein is 2-cm-thick. Trace.
2011BAE156C	65.257774	-152.731348	512547	7237018	5N	Quartz vein; very-fine-grained float with some vugs. 1% of exposure.
2011BAE187A	65.452629	-152.567396	520055	7258778	5N	Quartz vein; very-fine-grained float. 1% of exposure.
2011BAE205B	65.450331	-152.576429	519638	7258519	5N	Quartz vein; 1% of exposure.
2011BAE226C	65.410063	-152.557459	520549	7254037	5N	Volcanic breccia(?); possibly brecciated altered volcaniclastics or greenstone. Rock is fine grained. 25% of exposure.
2011BAE226D	65.410063	-152.557459	520549	7254037	5N	Quartz vein; 1% of exposure.
2011BAE234B	65.332655	-152.874300	505854	7245343	5N	stain. 1% of exposure.
2011BAE247B	65.325527	-152.905396	504407	7244546	5N	Quartz vein; orangish stain. Trace.
2011BAE250B	65.325292	-152.831230	507862	7244527	5N	Quartz vein; fine-grained, white, massive bull quartz with minor iron-oxide staining. Epidote and schistose mica fill fractures and veins. 1% of exposure.
2011BAE262B	65.337936	-152.975280	501151	7245926	5N	Quartz schist; quartz occurs in bands and pinch/swirls and contains both sulfides and iron oxide. Selected sample of quartz-rich material. 15% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE298C	65.184843	-153.826282	461304	7229116	5N	Tonalite(?) dike; possibly quartz diorite. Rock is fine to medium grained, dark gray, silicified, and foliated or sheared. It contains quartz and possibly sulfides. 5% of exposure.
2011BAE321B	65.338140	-153.440128	479507	7246020	5N	Quartz vein; very-fine-grained, white, and massive bull quartz. 10% of exposure.
2011BAE332B	65.328973	-153.092619	495686	7244930	5N	Metagabbro; very fine to coarse grained. Sulfides and white plagioclase are scattered throughout the rock. Visible sulfides include euhedral pyrite, some chalcopyrite, and possible pyrrhotite or arsenopyrite. The rock has a green, micaceous matrix, which
2011BAE342B	65.314608	-153.107953	494969	7243330	5N	Quartz vein; orangish stain. 1% of exposure.
2011BAE351B	65.462650	-152.805055	509034	7259840	5N	Quartz vein; very fine grained with some iron oxide in cracks. 1% of exposure.
2011BAE394A	65.383185	-152.531600	521772	7251050	5N	Serpentinite(?); possibly pyroxenite. This dark green rock is medium to coarse grained, massive, undeformed, and homogenous with minimal weathering. 100% of exposure.
2011BAE410B	65.369379	-152.865394	506260	7249437	5N	Quartz vein; very fine grained. 1% of exposure.
2011BAE429B	65.426604	-152.822390	508242	7255820	5N	Quartz vein; bull quartz. 1% of exposure.
2011BAE432B	65.255887	-152.871625	505996	7236787	5N	Quartz vein; very fine grained with orangish staining and black and goldish colors (micas?) on fractures. 1% of exposure.
2011BAE468B	65.199067	-152.828851	508011	7230459	5N	Quartz vein; quartz and sericite with turquoise staining (copper?). Selected sample from a foliation-parallel quartz vein. Trace.
2011BAE470B	65.199775	-152.812652	508769	7230540	5N	Micaceous quartzite/quartz schist; fine to medium grained, tan to gray with small brown specks in fold hinges. Occasional, very small sulfide specks are visible. Epidote, quartz, and sericite veining parallels foliation. 20% of exposure.
2011BAE491B	65.234865	-152.994395	500262	7234438	5N	Quartz vein; white and massive. Locally strongly fractured with open space and moderate iron-oxide staining. 1% of exposure.
2011BAE537B	65.471914	-152.520946	522192	7260943	5N	Quartz vein; large, white vein. 1% of exposure.
2011GG010C	65.299309	-152.868175	506147	7241627	5N	Quartz vein; milky-white to clear. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG016B	65.299024	-152.881666	505518	7241594	5N	Gabbroic dike; mostly plagioclase with chloritized amphiboles. Moderately altered with mineralized vugs. 5% of exposure.
2011GG033A	65.328167	-152.805106	509078	7244851	5N	Schist; black and white with abundant orange, oxidized pits (possibly former calcite or ankerite). These oxidized pits encompass very-fine-grained minerals with square cleavage planes. The pinched ends of quartz boudins contain fine-grained, prismatic quartz crystals that are typically stained with orange iron oxide. 100% of exposure.
2011GG034A	65.330640	-152.802296	509208	7245127	5N	Schist; orange iron-oxidized phyllitic schist with foliation-parallel quartz-vein boudins. Very-fine-grained oxides fill vugs. 100% of exposure.
2011GG035B	65.331724	-152.801107	509263	7245248	5N	Quartz boudin; vuggy. Strong oxidation and abundant prismatic quartz crystals within vugs. Square, 1–2 mm black flecks disseminated throughout milky white quartz. Pervasive malachite staining throughout the outcrop. 1% of exposure.
2011GG037B	65.335465	-152.794508	509569	7245666	5N	Dike; medium grained with quartz, biotite, and feldspar. Contains both coarse, prismatic quartz and euhedral quartz. Fine-grained, yellowish gold and red oxides occur within cavities and fractures. 1% of exposure.
2011GG037C	65.335465	-152.794508	509569	7245666	5N	Quartz vein; 2.5-cm-thick vein cuts foliation at a right angle. Vein contains possible sulfides as well as a red, rhombic mineral with perfect cleavage. 1% of exposure.
2011GG041C	65.402597	-152.776974	510359	7253151	5N	Quartz vein; oxidized with black specks. Trace.
2011GG044B	65.408391	-152.758254	511226	7253800	5N	Fault breccia; selected sample of highly oxidized, orangish brown, welded, and resilicified fault material with boxwork structure and gossan. Contains sericite and quartz crystals within cavities. Represents less than 1% of the rock at the station, which is dominantly quartz–mica schist. 1% of exposure.
2011GG059B	65.323668	-152.816237	508561	7244348	5N	Quartz–plagioclase dike(?); possibly vein. Visible minerals include euhedral plagioclase crystals with perfect cleavage and striations, prismatic quartz crystals, milky white quartz grains, clusters of very-fine-grained books of aligned sericite, and localized clusters of a translucent yellow, anhedral, drusy mineral. Rock is highly iron-oxidized with orange- and-brown-oxidation-coated cavities. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG062A	65.408754	-152.755387	511359	7253841	5N	Mica quartz schist; selected sample of moderately altered schist with about 30% of the same fault gouge material as 2011GG044B, with boxwork, gossan, and hematite. 100% of exposure.
2011GG063A	65.408620	-152.755582	511350	7253826	5N	Quartz vein; massive, milky white, quartz boulders that are heavily oxidized when broken. 10% of exposure.
2011GG064A	65.408621	-152.756099	511326	7253826	5N	Quartz–mica schist; boxwork with sericite alteration in 1–6 cm spaces (weathered-out boudins?). Contains hematite. Selected sample. 100% of exposure.
2011GG065A	65.408310	-152.758018	511237	7253791	5N	Schist; with zones of fault gouge and gossan, abundant hematite and boxwork. Selected sample. 100% of exposure.
2011GG069A	65.409127	-152.747308	511734	7253884	5N	Quartz vein; highly oxidized, fractured, and resilicified vein with hematite and other fine-grained oxides. 5% of exposure.
2011GG094B	65.454078	-152.840324	507402	7258880	5N	Quartz vein; massive milky white. Trace.
2011GG097A	65.455349	-152.855223	506711	7259020	5N	Skarn; black weathering. Fresh rock is black and green with areas of pink. 20% of exposure.
2011GG097C	65.455349	-152.855223	506711	7259020	5N	Skarn; fine-grained, dark green rock with a 2-mm-wide vein. 60% of exposure.
2011GG098B	65.455682	-152.856538	506650	7259057	5N	Hornfels; dark brown to black weathering, no fresh faces. 33% of exposure.
2011GG102B	65.452317	-152.837768	507521	7258684	5N	Hornfelsed quartzite(?); white to gray, recrystallized quartz with a sparkly, brown, powdery, and soft mineral on fractures. Rock also has biotite and very-fine-grained sericite. 1% of exposure.
2011GG105A	65.449944	-152.842398	507307	7258419	5N	Skarn (?); possibly hornfels. Maroon weathering with abundant iron oxide, hematite, and limonite. Rock contains very-fine-grained and possibly cubic minerals, micas, and several hematite-lined cavities. 5% of exposure.
2011GG106A	65.449628	-152.849237	506990	7258383	5N	Hornfelsed quartz schist; dark gray to black rock with a sugary texture and whitish highlights. Weathered surfaces show a relict schistose layer, and foliation-parallel quartz veins. Most rocks have minor to moderate iron-oxide staining, but some have intense staining with hematite. Selected sample of veined pieces. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG110A	65.447450	-152.861219	506435	7258139	5N	Marble; white with 5–10 cm calcite crystals. Trace.
2011GG111A	65.446639	-152.866745	506179	7258048	5N	Marble; small (1 cm), white to gray chips. Rock has rillenstein weathering and a strong reaction to HCl. 60% of exposure.
2011GG111D	65.446639	-152.866745	506179	7258048	5N	Dike; very fine grained, quartz rich with some feldspar. Rock is oxidized with a very-fine-grained, disseminated black mineral, and zones of sericite. 10% of exposure.
2011GG138B	65.252358	-152.623788	517574	7236440	5N	Quartz vein; milky white with orange iron-oxide and black to dark blue staining. Rock is locally vuggy with very-fine-grained orange, prismatic minerals as well as a small amount of sericite. 20% of exposure.
2011GG167A	65.296763	-152.728678	512653	7241364	5N	Quartz vein; milky white with chloritic schist inclusions. Cavities are coated with a dull brown powder, iron-oxide staining, and minor hematite. 50% of exposure.
2011GG168A	65.295792	-152.727509	512708	7241256	5N	Quartz vein; brecciated and oxidized. Rock has zones of fine-grained, black sericite and disseminated pyrite. 100% of exposure.
2011GG170A	65.292632	-152.716971	513201	7240906	5N	Quartz vein; quartz, calcite, and sericite. 2% of exposure.
2011GG179A	65.462444	-152.599689	518551	7259862	5N	Quartz vein; peach-orange oxide. Vein contains epidote as well as a light, key-lime-green mineral. 1% of exposure.
2011GG179C	65.462444	-152.599689	518551	7259862	5N	Quartz–epidote vein; green, black, and white crystalline vein scattered throughout outcrop area. Trace.
2011GG185A	65.461117	-152.590172	518993	7259717	5N	Quartz–epidote vein breccia; cuts aphanitic greenstone. Brecciated texture with clasts of greenstone. Quartz vein fill is mixed with an aphanitic, white (felsic?) rock. Trace.
2011GG186B	65.461044	-152.589440	519027	7259709	5N	Quartz vein; vuggy, milky white to crystalline quartz vein that cuts an aphanitic greenstone. Vein is possibly slightly brecciated. Vugs are filled with subhedral prismatic quartz crystals, iron oxides, and a very-fine-grained, sparkly, black mineral that is associated with very-fine-grained, disseminated pyrite. Trace.
2011GG194A	65.442144	-152.594566	518803	7257601	5N	Metasandstone; well sorted, weakly metamorphosed sandstone or metawacke cut by veins of iron oxide. 50% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG209A	65.301805	-152.881053	505546	7241904	5N	Quartz schist; highly oxidized with abundant muscovite on foliation planes. Dark, mm-thick stacks of sericite are perpendicular to foliation. Rock is generally 60% quartz and 40% mica, but grades into graphite-rich layers with only 30–40% quartz. Rectangular porphyroclasts occur on the foliation plane. Oxidation colors range locally from red/orange to a full-spectrum, metallic sheen.
2011GG210C	65.302085	-152.883496	505432	7241935	5N	Quartz vein; milky white with brown to orange oxidation throughout. One pyrite crystal is visible within a black, oxidized streak. Rock contains localized epidote and hematite. Trace.
2011GG217B	65.313360	-152.891471	505058	7243191	5N	Quartz vein; milky-white, massive, weakly brecciated quartz with lots of red and orange oxides. Visible minerals include patches of sericite, mm-size quartz crystals, minor epidote, and some very-fine-grained sulfides(?).
2011GG300B	65.316064	-153.009935	499537	7243488	5N	Quartz vein; 90% massive, milky white quartz in vein center. Vein margins contain subhedral, elongate quartz crystals, a white, carbonate powder, and calcite crystals. Sericite, occasional hematite, and minor copper-green staining fill cavities. 1% of exposure.
2011GG304B	65.311192	-153.012808	499403	7242945	5N	Quartz vein; highly oxidized, foliation-parallel quartz vein that contains sericite and traces of hematite. Trace.
2011GG323A	65.439310	-152.776338	510374	7257243	5N	Plagioclase–porphyroclastic greenschist; fine-grained, massive, turquoise-green rock with moderate foliation. Rock has a sugary texture and subtle layers of darker and lighter material. Visible minerals include plagioclase and <1% disseminated chalcopyrite. Rock is hard to break and forms sharp conchoidal edges. 100% of exposure.
2011GG335A	65.429489	-152.819612	508370	7256142	5N	Quartz vein; highly oxidized and fractures easily. Contains occasional vugs, which are filled with oxidized material. 1% of exposure.
2011GG344A	65.489523	-152.813646	508627	7262834	5N	Paragneiss(?) and/or quartzite (?); rock is dark black and hornfelsed. It appears to be quartz-rich with mica-rich layers. Rock contains <5% very-fine-grained, oxidized, disseminated pyrite. 50% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG349A	65.495693	-152.798024	509348	7263524	5N	Paragneiss; strongly foliated with lots of oxidation. Rock contains pits and vugs filled with red, yellow, and orange oxides. Very-fine-grained sulfides are disseminated in black, mica-rich layers and one quartz-rich layer. A mm-scale quartz veinlet and remnants of a cm-scale dike are visible. Rock is strongly oxidized. 100% of exposure.
2011GG353A	65.507439	-152.785677	509915	7264835	5N	Quartzite; gray to white and strongly foliated. Rock has very distinct parting on both the outcrop scale as well as cm scale (1–4 cm). Rock has green impurities, vugs filled with prismatic quartz and sericite, and local oxidation. Selected sample of highly oxidized and vuggy material. 100% of exposure.
2011GG356A	65.405536	-152.821650	508283	7253472	5N	Quartz vein; massive, milky white quartz vein boulders (0.25–0.5 m in diameter). Rock has abundant orange iron-oxide staining as well as occasional vugs, which are lined with brown, yellow and red oxides. Micas from schist wall rock line some quartz-vein boulders. Selected sample of the most oxidized pieces. 5% of exposure.
2011GG359A	65.404071	-152.819011	508406	7253309	5N	Quartz schist; fine-grained and white with disseminated purplish brown spots. Visible minerals include 30–60% quartz, 30–40% mica, 5–30% purplish brown unknown mineral, trace tourmaline(?), and trace magnetite(?). Layer is approximately 50 cm thick and 10% of exposure.
2011GG365A	65.396665	-152.816027	508547	7252484	5N	Quartzite and quartz schist; 60–70% of this rock is highly oxidized (90% altered) and slightly gossanous. Oxidation colors vary from red to orange to brown. Selected sample of highly oxidized/gossanous rocks. 100% of exposure.
2011GG366A	65.394048	-152.818133	508450	7252192	5N	Muscovite–schist breccia; dark brown to maroon and highly (90%) altered and oxidized with abundant gossan. The unaltered 10% of the rock contains muscovite and white mica. Rock is intact and fairly hard to break. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG376A	65.377683	-152.906951	504326	7250359	5N	Quartz vein; mostly quartz with occasional weathered feldspars. Vein cuts a greenish schistose rock. Vein margin is heavily oxidized with red, yellow, and orange colors as well as patches of sericite. Subhedral to euhedral, prismatic quartz crystals fill vugs. Localized boxwork around feldspars. <1% of exposure.
2011GG376C	65.377683	-152.906951	504326	7250359	5N	Schist; 1.5 x 3 m zone of highly oxidized, easily broken rock with remnant mica and cleavage planes barely recognizable because of alteration. Broken rock faces are oxidized red, yellow, and orange with hematite and dark red veinlets. 2% of exposure.
2011GG382C	65.379733	-152.887110	505248	7250589	5N	Quartz vein; milky white, highly oxidized, and slightly brecciated. Vein is weathered out from within foliation at a large fracture with lots of iron-oxide staining. Contains occasional single grains of pyrite. 2% of exposure.
2011GG393A	65.284543	-152.922861	503599	7239977	5N	Schist, quartz schist, and quartzite; highly weathered and oxidized. High-angle, 0.5-cm-wide veins cut foliation, one of which contains rusted pyrite. Veins have been fractured and possibly resilicified. 100% of exposure.
2011GG395A	65.280794	-152.924865	503506	7239559	5N	Felsic dike(?); white and black with oxidized pits and gossan throughout. 50% of exposure.
2011GG403A	65.264316	-152.839373	507500	7237730	5N	Quartzite; gray to dark gray, foliated, and locally altered. Rock has <15% oxidized pits and moderate iron-oxide staining. Occasional very-fine-grained pyrite, partially to fully filled pits. Unaltered rock pieces have <1% disseminated sulfides (chalcopyrite?) perpendicular to foliation. Some fresh faces have bright, metallic, colorful oxidation. Minerals include 85% quartz and 15% foliation-perpendicular mica. 100% of exposure.
2011GG422B	65.198982	-152.832612	507835	7230449	5N	Aplite dike(?); possibly sill. Rock is rusty and crumbled with occasional small, rusty, oxidized, prismatic, elongate, and subhedral quartz crystals with sericite. 2% of exposure.
2011GG456C	65.226260	-152.944845	502579	7233480	5N	Quartz vein; milky white and oxidized. 30% of exposure.
2011GG464A	65.441757	-152.636294	516868	7257546	5N	Schist; very fine grained with various alteration and oxidation colors. Rock contains weathered pyrite pits. 60% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG470B	65.439449	-152.620954	517581	7257293	5N	Quartz vein; milky white with very-fine-grained, subhedral, prismatic, elongate quartz and minor calcite and sericite. 1% of exposure.
2011GG480A	65.200676	-152.794848	509602	7230643	5N	Metagrit; dark gray with white, sugary zones. 10–20% mica defines foliation in the rock. Contains 5–10% black to bluish grit and is slightly vuggy. 1–3-mm-wide veinlets cut foliation. 70% of exposure.
2011GG481B	65.200665	-152.786879	509975	7230643	5N	Quartz vein; milky white, massive, and slightly oxidized. 2 cm thick. Selected sample from three different veins.
2011GG484A	65.202328	-152.759751	511244	7230833	5N	Quartzite; white and mostly unaltered. Rock has moderately spaced foliation and is locally vuggy and oxidized. Selected sample of oxidized and vuggy pieces. 100% of exposure.
2011GG491A	65.384066	-152.932358	503144	7251069	5N	Quartz schist; black and white with phyllitic foliation planes. Rock is heavily iron-oxide stained with local, <1-mm-thick, oxidized veinlets that cut foliation at high angles. Rock contains zones of secondary epidote mineralization as well as graphite-rich layers. 100% of exposure.
2011GG523B	65.474621	-152.604058	518340	7261218	5N	Greenstone(?); black, blue, green, conchoidal, and aphanitic with foliation. A localized, folded, vuggy, oxidized quartz vein that contains epidote. Selected sample of vein-bearing material. 10% of exposure.
2011GG529A	65.384380	-153.822997	461748	7251352	5N	Granite; cut by multiple 2- to 5-mm-thick veins. 100% of exposure.
2011GG551A	65.368019	-152.971446	501328	7249279	5N	Quartz vein; highly oxidized vein material of variable thickness. Parallel and perpendicular to foliation. 1% of exposure.
2011GG554B	65.371887	-152.977334	501054	7249710	5N	Quartz vein; perpendicular to foliation. Highly oxidized with red, yellow, and orange oxides that fill vugs. Trace.
2011GG564A	65.388016	-152.962559	501740	7251508	5N	Schist; dark black with biotite, porphyroblasts or porphyroclasts of plagioclase, and possible magnetite. 10% of exposure.
2011LF025B	65.297826	-153.124954	494173	7241461	5N	Clay gouge(?); gray, possibly weathered bedrock, which contains pyrite clasts and crushed quartz. Representative grab sample of 2-m-wide zone from bedrock in Nugget Creek placer cut. 95% of exposure.
2011LF027B	65.299307	-153.124275	494205	7241626	5N	Quartz vein; white, sheared, and broken quartz vein with 5% micaceous fragments. Most micas are foliated, but some are in boxwork and look recrystallized. Chip sample is 3 m wide and oblique to vein. Vein width is concealed. 30% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF039B	65.321290	-152.717458	513164	7244100	5N	Gossan; 15% elongate slabs of gray, very-fine-grained quartz in an orange to brown, fine-grained boxwork of iron oxide and altered carbonate(?). Grab sample of single, 0.5-m^3 block. 5% of exposure.
2011LF040B	65.319644	-152.714921	513283	7243917	5N	Graphite quartzite; 10% of exposure.
2011LF040C	65.319644	-152.714921	513283	7243917	5N	Graphite–mica quartzite; 1–5% cavities with pale iron oxide, either after pyrite or carbonate. 10% of exposure.
2011LF070C	65.451621	-152.727938	512613	7258624	5N	Fault breccia; 60–70% quartzite and quartz phyllite clasts and strongly fractured wall rock with 30–40 % punky, yellow matrix. Clasts are displaced, angular, and rotated in matrix. 5% of exposure.
2011LF081A	65.441548	-152.691883	514290	7257509	5N	Breccia; gossan-filled breccia with 60% angular, siliceous clasts (quartzite, quartz schist, or silicified greenstone?) in a yellow to orange, limonitic gossan matrix. 100% of exposure.
2011LF100A	65.500642	-152.868155	506101	7264067	5N	Calc–silicate hornfels; pale to dark green with mineral alignment and fractures that may be relict foliation. Minerals include 50% 0.2-mm-long amphibole, 20% 0.1-mm-wide diopside, and 30% 0.1-mm plagioclase. Grab sample selected from three boulders with strong iron oxide on fractures, local drusy quartz veins, and 1% gossanous patches. 5% of exposure.
2011LF101A	65.502403	-152.870783	505979	7264263	5N	Epidote–quartz–actinolite granofels; possibly skarn. Minerals include 10% epidote, 30% 0.5-mm, sugary quartz, 60% 0.5-mm-long, acicular actinolite, and trace scheelite on fractures. Rock also has strong, irregular veins of drusy quartz and iron oxide. 100% of exposure.
2011LF119A	65.431399	-152.851411	506894	7256351	5N	Mica quartz schist; strong silicified tourmaline replacement along open, moderately gossanous, drusy-quartz-filled gash fractures. Gash fractures are oblique to foliation. 5% of exposure.
2011LF123A	65.428775	-152.866103	506213	7256057	5N	Hornfels(?); pale green to dark brown, banded rock. Bands are 2–8 mm thick. 100% of exposure.
2011LF128A	65.427137	-152.881454	505501	7255873	5N	Quartzite; sugary. Rock has micaceous partings, 0.1% tourmaline prisms, and trace, 5-cm-wide, foliation-parallel, open lenses filled with biotite and iron-oxide. Selected sample of rocks with iron-oxide lenses. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF129A	65.427301	-152.884212	505373	7255891	5N	Mica quartz schist; light iron-oxide coating and local 1 cm x 2 mm lenses of goethite. Semi-random grab of pieces that are more stained with iron-oxide. 100% of exposure.
2011LF180B	65.345109	-152.702100	513867	7246758	5N	Quartz schist(?); strongly fractured and stained orange; iron oxide fills fractures. Rock chips in overturned tree roots. 20% of exposure.
2011LF223A	65.424623	-152.524266	522078	7255671	5N	Greenstone; very fine grained, light green, bleached, and aphanitic. Rock has 1% ragged pyrite or non-magnetic pyrrhotite and is possibly silicified. Random grab sample of rubble. 50% of exposure.
2011LF261C	65.330765	-152.917852	503826	7245129	5N	Quartz vein; white and massive. Locally strongly fractured with open space and moderate iron-oxide staining. 30% of exposure.
2011LF268A	65.235238	-152.765122	510979	7234500	5N	Quartzite; 100% gray, vitreous, 0.5 mm quartz. A 1-cm-thick quartz vein cuts the rock. Grab sample of vein and wall rock. 50% of exposure.
2011LF271A	65.222230	-152.718964	513143	7233059	5N	Schist; fine-grained with a color that varies from tan to a rusty, pale green. Rock has 10% 1 mm to 2 cm cavities after carbonate. 100% of exposure.
2011LF276B	65.341591	-153.136439	493648	7246340	5N	Quartzite; white; strongly fracutred with 1% druzy vugs, 1% 3-cm-wide oxidized carbonate, and 1% colored sericite. Moderately stained with iron oxide on fractures. Random grab sample. 50% of exposure.
2011LF297A	65.455291	-152.743670	511882	7259030	5N	Quartzite; <15% phyllitic mica in very-fine-grained partings. Rock is strongly fractured with brown iron-oxide fracture coatings. Fractures contain localized vugs filled with drusy, fine-grained quartz and localized pyrite pseudomorphs, now brown oxide. Random sample of 2 x 2 m area. 100% of exposure.
2011LF300A	65.456970	-152.749824	511596	7259216	5N	Quartz schist; strongly hornfelsed. Strong, 0.5- to 2-cm-wide tourmaline veinlets cut the rock, and strong tourmaline flooding occurs parallel to foliation. Tourmaline color includes black, yellow, green, and red–brown. Rock contains acicular, 1–2-mm-long, moderately iron-oxide-filled cavities. Random sample of 1 x 1 m area. 5% of exposure.
2011LF314A	65.466000	-152.663820	515577	7260241	5N	Quartz phyllite; very-fine-grained, gray to black chert-like quartz with white phyllitic partings. Rock has minor localized green-blue stain. Selected sample of stained rocks. 100% of exposure.

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF317A	65.469164	-152.666391	515456	7260593	5N	Phyllitic quartzite; gray. Green copper mineral occurs extensively on fractures and foliation within a 20+ m area. Rock has rusty blotches on some fractures. 100% of exposure.
2011LF332A	65.493425	-152.720114	512955	7263285	5N	Biotite–quartz monzonite; coarse grained. Visible minerals include 15% 1.5 mm quartz, 20% 1.5 cm potassium feldspar, 20% 2 mm biotite, and 45% feldspars in groundmass. Rock contains minor quartz and aplite veinlets. Selected sample of vein material. 100% of exposure.
2011LF345A	65.452993	-152.595282	518762	7258810	5N	Phyllitic greenstone; texture varies. Rock has abundant pale- and dark-green chloritic and serpentine sheers. Contains moderate albite, quartz, and chlorite veins, which are locally vuggy. Selected sample of vein material. 10% of exposure.
2011LF365A	65.299591	-153.116513	494567	7241657	5N	Micaceous quartzite; light green. Rock has 15% mica, which is well foliated. A 5-cm-thick, wedge-shaped, irregular quartz vein with graphite/carbon and iron-oxide selvage cuts rock. Selected sample of vein selvage and adjacent wall rock. 100% of exposure.
2011LF369B	65.378777	-152.870315	506029	7250484	5N	Quartz vein; white and elongate. Vein is up to 3 m thick and 10 m long. 5% of exposure.
2011LF394A	65.254317	-153.015435	499279	7236606	5N	Carbonate–mica quartz schist; light gray to white. Rock contains quartz veins parallel to S1, which are isoclinally folded on S2. The veins have random sericite and 10% cavities (probably after carbonate). Fractures are slightly stained with iron oxide. 10% of exposure.
2011LF401A	65.246978	-153.009246	499568	7235788	5N	Carbonate–mica quartz schist; gray. Visible minerals include 5–30% 1 mm, rusty, orange- to brown-filled pits in irregular, wispy bands, 20–50% gray mica, 50% quartz in some segregations and lensoidal veins. Selected sample of more pitted rocks. 100% of exposure
2011LF408A	65.253262	-152.934705	503050	7236490	5N	Quartzite; strongly fractured. A 1-mm-thick iron-oxide/gossan coating covers irregular fractures. Quartzite is moderately to locally-strongly bleached with a black, 30-cm-wide, sooty zone near the alteration. Representative gram sample of 30-cm-wide fractured, bleached material. 100% of exposure.
2011LF411B	65.245959	-152.917152	503871	7235677	5N	Calc schist(?); punky, buff weathering rock. 90% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF412B	65.263746	-152.834579	507724	7237667	5N	Quartz vein; strongly fractured with strong yellow, red, and orange gossan. Vein is 5-15 cm wide and foliation-parallel with gossan on one vein margin. Wall rock is bleached white. Selected sample of vein and gossan. 5% of exposure.
2011LF485A	65.398017	-152.635953	516912	7252671	5N	Micaceous quartzite; strongly oxidized with 5% gossanous (iron oxide), irregular, 1–2 mm, foliation-parallel cavities, 15% mica in 1–3 mm foliation planes, and 1% 1 mm^3, iron-oxide-filled cavities after pyrite. 10% of exposure.
2011LF498A	65.414902	-152.953625	502153	7254505	5N	Biotite–mica quartzite; visible minerals include 10% 1 mm muscovite in foliation planes, 5% 0.1 mm disseminated biotite, 1% tourmaline on micaceous foliation planes, and 85% 0.2 mm sugary quartz. A 5 mm feldspar–tourmaline vein cuts the rock. 100% of exposure
2011LF502A	65.208837	-152.740436	512145	7231562	5N	Breccia; very strong iron oxide and weathering. Rock is a breccia of subangular to subrounded quartzite and quartz schist clasts that are cemented with iron oxide. Some clasts are completely leached of all quartz. 100% of exposure.
2011LF507A	65.352262	-152.681261	514833	7247560	5N	Quartzite; gray with 5% micaceous partings. Rock is strongly brecciated and fractured. Yellow, orange, and red oxides from ground-up rock fill open spaces. 100% of exposure.
2011LF528A	65.390001	-152.661608	515725	7251771	5N	Quartzite; fine grained, gray and strongly fractured. Rock is moderately brecciated and clast supported. Iron oxide fills fractures and makes up boxwork matrix. 100% of exposure.
2011LF557B	65.336904	-152.484123	524021	7245909	5N	Fault gouge; graphitic. 20% of exposure.
2011LF587B	65.107451	-154.735482	418494	7221357	5N	Granodiorite; visible minerals include 30% biotite, 20% quartz, 50% feldspar. Pale-green, irregular, and anastomosing epidote veins up to 3 cm wide cut rock. Strong dark-green chlorite, epidote, and quartz alteration. 5% of exposure.
2011RN153A	65.246770	-152.923806	503560	7235767	5N	Graphite–pyrite–muscovite quartzite; very fine to fine grained. Rock is >95% quartz with spots weathered out to calcite (former pyrite?) along foliation surfaces. Contains <1% graphite and ~1% former pyrite. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011RN177B	65.404843	-152.990224	500454	7253383	5N	Quartz vein; 2–5 mm biotite. Vein is 1–2 cm thick. <1% of exposure.
2011RN180B	65.409032	-152.981436	500862	7253850	5N	Skarn(?); possibly hornfels. Rock is dark green with some residual layering. Rock is pyroxene rich. A high magnetic susceptibility suggests magnetite or pyrrhotite. 2% of exposure.
2011RN180C	65.409032	-152.981436	500862	7253850	5N	Quartz vein; ± tourmaline. Vein has tourmaline sprays in massive quartz and is 5–10 cm thick. <1% of exposure.
2011Z005B	65.390349	-153.081709	496203	7251770	5N	Quartz–tourmaline–veined, biotite granite; medium-grained (2-5 mm) and weathered white to light gray. Broken rock is mottled white, gray, and pale yellow with black biotite. Minerals include 12-15% black biotite, 20% gray, irregular splotches and grains of quartz, and ~ 0.5 x 2 cm white to slightly yellow-stained feldspar phenocrysts. Tourmaline-bearing quartz veins and tourmaline(?)–quartz–feldspar–pegmatitic veins cut rock and are up to 4 cm wide. One pegmatite vein has elongate to equant, pale-rose crystals with black tourmaline crystals. One pegmatite vein has black tourmaline crystals elongate perpendicular to the granite/vein contact. Veins have rare vugs. Tourmaline crystals are up to 1 mm x 1 cm. Selected sample of veined material includes wall rock.
2011Z012E	65.273176	-152.987145	500600	7238708	5N	Quartz vein; 1% clear to white quartz vein fragments, some with orange stains of iron oxide. 1% of exposure.
2011Z024A	65.299073	-153.124252	494206	7241600	5N	Quartz–white–mica schist; black, almost sooty, and sheared. Weak orange stain of iron oxide on some fractures, and occasional open vugs in quartz-rich areas. Rock is intermixed with some rounded cobbles. 100% of exposure.
2011Z026B	65.354411	-152.993488	500303	7247762	5N	Quartz vein; massive, milky-white quartz vein about 60 cm thick. Gray-white mica and sometimes very weak iron-oxide stains fill occasional vugs. Minor chlorite fracture fillings and chlorite occurs along the vein margin. Manganese dendrites occur on some surfaces. 5% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z028A	65.350122	-152.992716	500339	7247284	5N	White–mica–bearing quartzite; fine grained, slightly punky, possibly calcareous, and weathers tan, yellow, and gray. Broken rock is light gray in places, but mostly strongly stained with yellow, orange, and brown iron oxides. White mica is gray and fine grained. Composition is between micaceous quartzite and paragneiss. 100% of exposure.
2011Z029A	65.348893	-152.989815	500474	7247147	5N	Biotite–feldspar–white–mica quartz schist; fine grained and dark gray weathering. Broken rock is light orange and does not react with HCl. Contains indistinct and/or contorted foliation. Minerals include fine-grained white feldspar grains(?), up to 5% black biotite flakes in micaceous layers, and occasional, well-formed, 0.5-mm pyrite cubes that weather to vugs with orange iron-oxide staining. 100% of exposure.
2011Z044A	65.320560	-152.751248	511590	7244012	5N	Quartz–veined, quartz–white–mica paragneiss; very fine grained and black with minor iron-oxide staining. Rock is 30% white mica and has orangestains of iron oxide on many foliation surfaces. Contains several white, sugary, very-fine-grained, foliation-parallel quartz veins. A somewhat vuggy quartz vein with anhedral to subhedral, white to clear quartz crystals and localized brown iron-oxide earths cuts foliation. Random sample of vein material. 90% of exposure.
2011Z050A	65.340941	-152.840882	507408	7246270	5N	Quartz vein; very-fine- to fine-grained, angular, milky white boulders up to 1 m in diameter. No obvious mineralization. Contains trace amounts of iron oxide (orange limonite) as spots and streaks that generally (always?) have white mica clots/inclusions. 95% of exposure.
2011Z059A	65.353086	-152.822542	508258	7247626	5N	Quartz vein; milky-white, massive bull quartz cobbles and boulders up to 70 cm in diameter. Contains very minor iron-oxide staining on some fractures and very minor schist wall rock. Random sample over ~10 m area. 20% of exposure.
2011Z061A	65.357539	-152.817182	508506	7248123	5N	Quartz vein; milky-white, massive bull quartz vein approximately 5 m wide. No iron-oxide staining and no obvious mineralization. Random sample over vein area. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z072B	65.446691	-152.751324	511531	7258070	5N	Fault breccia; quartzite. Brown and orange iron-oxide-stained, matrix-supported breccia with angular, gray quartzite clasts. Some cobbles have slickensides. Clasts are subrounded to angular and vary from < 1 mm to 2 cm in diameter. Some pieces contain white quartz (shattered vein?) and vuggy spaces with anhedral quartz. Abundant iron oxides in matrix. Rock does not react with HCl. Trace.
2011Z073A	65.447313	-152.747867	511691	7258140	5N	Graphite–white–mica quartzite; very fine grained, dark gray, and platy to flaggy. Contains 1% graphite and 12–15% white mica. Outcrop extends over a 10 m^2 area. Occasional blue to sky-blue chrysocolla or turquoise crusts coat fracture surfaces perpendicular to foliation planes, but never on foliation surfaces. These crusts are sometimes found on fractures within rocks and occasionally have cauliform and botryoidal shapes. Coatings aren't soluble in HCl, with no copper plating on steel. Selected sample of mineralized fractures and host quartzite. 100% of exposure.
2011Z075A	65.450035	-152.744907	511827	7258444	5N	White–mica quartzite; fine grained, gray, and flaggy. Many joint surfaces are strongly iron-oxide stained dark brown, orange, and black (manganese oxide?). Orange iron oxide is also on foliation surfaces. Contains 15% dark gray white mica, possible graphite, and 1–2% foliation-parallel white quartz veins. Selected sample of most iron-oxide stained rock. 100% of exposure.
2011Z078B	65.453010	-152.732238	512413	7258778	5N	Quartzite breccia; very-fine-grained, matrix-supported breccia consisting of subrounded to angular quartzite clasts in an iron-oxide matrix with possible crushed quartzite. Clasts are mostly 0.5 cm in diameter. 1% of exposure.
2011Z082B	65.459858	-152.723472	512816	7259543	5N	Quartzite; fine-grained, light gray, mottled rock with gray weathering. Contains abundant open vugs partially filled with euhedral quartz crystals. Vugs and fractures are stained tan and orange with iron oxide. One vug is filled with soft, purple fluorite. No HCL reaction. 1% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z088B	65.462192	-152.805253	509025	7259789	5N	Quartz vein; milky white, massive quartz-vein cobbles and boulders <40 cm x 20 cm x 30 cm. Occasional black manganese coatings on fracture surfaces. Common vugs with anhedral quartz coatings ± black manganese masses and black goethite. Weak iron-oxide staining on fractures. Trace.
2011Z093A	65.466367	-152.814653	508588	7260253	5N	Biotite granite; medium grained (1–2 mm) and equigranular. Broken surface is cream to light orange with a common weathering rind stained with iron oxide. Minerals include 15% black biotite, 25% gray quartz, and white feldspar. Rock contains 2-mm-wide quartz veinlets, one of which has a black, metallic, non-magnetic mineral. 100% of exposure.
2011Z095A	65.469621	-152.819141	508379	7260615	5N	Biotite granite; coarse grained, pink, and porphyritic. Large feldspar and biotite porphyritic phenocrysts set in a 1–2 mm matrix. Rock contains common black, razor-thin (< 1 mm) joints (probably) or fractures. Black, very-fine-grained mineral (tourmaline ± ?) fills fractures. Selected sample of granite with black fracture fills collected over 15 m x 5 m area. 100% of exposure.
2011Z097A	65.472232	-152.826894	508019	7260905	5N	Quartz–tourmaline–fluorite–veined, biotite granite; medium grained (1 mm); tan, orange, and gray altered boulders with rough weathering. Broken rock is light gray color with equigranular texture. Minerals include 15% biotite, 20–25% quartz, rare purple fluorite masses with goethite and ± quartz, and fine-grained mica with greisen alteration. Rock is commonly iron-oxide-stained orange, brown, and black (limonite, goethite ± manganese oxide). Rock contains black, tourmaline-filled (possibly), hairline fractures and some vuggy quartz veinlets (< 1 mm wide) with euhedral quartz crystal linings. No visible scheelite. Selected sample of veined and strongly iron-oxide-stained granite.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z098A	65.472829	-152.823933	508156	7260972	5N	Altered and veined biotite granite; orange and black stained with abundant iron oxide and manganese oxide in places. Some specimens have very-fine-grained, almost web-like tourmaline veinlets. Occasional purple fluorite fillings with tourmaline and and unknown mineral. No visible scheelite. Tourmaline almost completely replaces the matrix in some cobbles, which have almost brecciated appearances. 100% of exposure.
2011Z104A	65.390872	-152.942756	502660	7251827	5N	Quartz–veined, white–mica quartz schist; fine-grained, gray to dark gray rock that weathers brownish to gray. Minerals include 20% dark-gray white mica, 75–80% quartz, and trace amounts of very-fine-grained, disseminated pyrite. Rock does not react with HCl. Contains 2–3% 1-mm- to 1-cm-thick, foliation-parallel, white quartz veins. Some pieces have vuggy, open quartz veins with orange iron-oxide (limonite) staining as well as euhedral to subhedral quartz crystals. Selected sample of veined and iron-oxide-stained schist. 90% of exposure.
2011Z107B	65.398229	-152.942762	502659	7252647	5N	Quartz vein; milky white quartz containing biotite inclusions with weak iron-oxide staining and occasional vugs with subhedral to euhedral quartz crystals as well as black and orange iron oxide and manganese oxide. One vug with boxworks. Random sample over 5-m-diameter area. Largest quartz cobble is 10 cm x 6 cm x 8 cm. Trace.
2011Z111A	65.405480	-152.926231	503426	7253456	5N	Quartz–tourmaline vein; medium to coarse grained. White and black boulders up to 10 cm x 25 cm. Black tourmaline crystals up to 15 mm x 2 mm comprise 50–60% of rock, and are commonly in sprays and rosettes. Later, thin (1–2 mm) quartz veinlets cut quartz–tourmaline veins at 90 degrees in one boulder. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z116A	65.413436	-152.921772	503632	7254343	5N	Biotite–quartz–feldspar gneiss; possibly orthogneiss. Rock is medium grained with a rough, light brownish-gray weathering surface that shows foliation. Broken rock is dark gray and white with localized gneissic habit and is possibly recrystallized. Rock contains 25% biotite, gray to brownish-gray feldspar and quartz, and rare, milky white, foliation-parallel quartz veinlets. Selected sample of most iron-oxide-stained rock. No vein material, but several pieces with open vugs (1–3 mm across) with iron-oxide earths. 100% of exposure.
2011Z120A	65.258635	-152.752088	511578	7237110	5N	White–mica quartzite; fine grained and light orange to tan, slightly stained with iron oxide (limonite). 5% white mica defines foliation. Selected sample of material with foliation-parallel vuggy quartz vein (0.5 cm thick) with iron-oxide staining and some orange iron-oxide earths in vugs. 50% of exposure.
2011Z121B	65.261300	-152.752277	511568	7237407	5N	Calc schist; fine grained and weathered brown. Broken rock is punky with 60% dark-gray white mica and minor quartz. Grab sample. 40% of exposure.
2011Z130A	65.250679	-152.653288	516197	7236245	5N	White–mica–bearing quartzite; very fine grained and a light gray color to a slightly iron-oxide-stained bright orange. 5–7% light gray white mica defines faint foliation. Contains localized open spaces lined with drusy quartz crystals and weak staining from iron oxide. Select sample. 100% of exposure.
2011Z135C	65.250036	-152.610378	518202	7236185	5N	Quartz vein; several cobbles up to 3 mm in diameter of light gray to white, massive quartz vein with brown vugs filled with iron oxide. Several vugs have square outlines. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z149A	65.298478	-152.586974	519260	7241591	5N	Quartz–veined, white–mica–bearing quartzite; very-fine- to fine-grained, orange-brown to brown slabs and thin plates of rocks stained with iron oxide. No HCl reaction. Broken rock and foliation surfaces contain 20% irregularly shaped, orange pits and vugs stained with iron oxide. Broken rock is dark gray with white, very-fine-grained, elongate mineral that flashes in the sun. Contains <10% very-fine-grained, silvery gray white mica. Rock has vuggy open spaces (veinlets?) with anhedral to subhedral fine-grained quartz-crystal linings. One cobble has a slightly vuggy, 1-cm-wide, foliation-parallel, white quartz vein. 100% of exposure.
2011Z161B	65.244856	-153.598211	472048	7235684	5N	Skarn; skarnoid. Very-fine- and coarse-grained rock with greenish weathering. Broken rock is dark green with locally folded light green, dark green, and gray bands (strong). Rock has localized moderate reactions to HCl. Minerals include epidote, carbonate, amphibole, clinopyroxene(?), and iron oxide ± garnet. Large, 2-cm-long, folded, fibrous amphibole appears to be in secondary veins. Selected sample of skarn with quartz–amphibole–sulfide veins and orange iron oxide. Veins have open spaces. Sulfide is black, resinous sphalerite with very-fine-grained pyrite. Rock contains 1% brownish garnet and 0.5 % manganese. 40% of exposure.
2011Z162B	65.246636	-153.597459	472085	7235882	5N	Quartz vein; 0.5 m wide, orange, brown, and white. Vein is locally shattered with moderately steep shearing. Broken rock is milky white with some included white mica near host contact. Some fracture surfaces contain brown and orange iron-oxide earths. Grab sample. Trace.
2011Z162C	65.246636	-153.597459	472085	7235882	5N	Quartz vein; white, orange, and brown. Vein has a maximum width of 8 cm. Contains subangular quartz crystals up to 3 cm long. Brown iron-oxide earths completely fill some very abundant open spaces. Occasional boxworks. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z163B	65.217375	-153.496507	476776	7232580	5N	Quartz vein; white and orange, vuggy quartz veins, 1 to 5 cm thick, that cut foliation at a high angle. Iron-oxide earths commonly fill vugs. Rock contains up to 1% black oxide earths with small, brassy sulfide specks (chalcopyrite?). No plating of copper on steel knife blade when soaked with HCl. One quartz vein has vein-parallel growth banding. Selected sample of quartz vein stained with iron oxide. Trace.
2011Z166B	65.452720	-152.571084	519884	7258787	5N	Quartz vein; milky white, occasionally vuggy quartz veins up to 4 cm wide. Veins incorporate pieces of greenstone wall rock. Occasionally iron oxides weakly stain vein margins and partially to completely fill vugs with orange material. Random sample over 5 m x 30 m area. <1% of exposure.
2011Z174C	65.441179	-152.566744	520094	7257502	5N	Quartz vein; vuggy, milky white quartz veins up to 5 cm thick. Anhedral quartz crystals line some vugs. Random sample collected over 15-m-diameter area. 50% of exposure.
2011Z205B	65.341598	-152.981871	500844	7246334	5N	Quartz vein; milky white, and up to 20 cm wide. Mostly massive, anhedral quartz with occasional vugs stained by orange and brown iron oxides. Subhedral to anhedral, mm-size quartz crystals sometime line vugs. Random sample. Trace.
2011Z245A	65.495795	-152.899336	504659	7263524	5N	Quartzite; gray–brown, banded, and possibly hornfels. Broken rock has mottled appearance with a green cast in places, but mostly dark gray and gray with some orange bands. Rock is moderately stained orange, black, and brown from iron oxide. It contains occasional 2–4 mm patches of fine-grained black biotite, 1% milky white quartz veins, and probably localized magnetite (inferred from high magnetic susceptibility in some spots). Selected sample of quartz-veined quartzite, and at least one piece of quartz vein that cuts foliation. 90% of exposure.
2011Z246A	65.495106	-152.902471	504514	7263447	5N	Mica quartzite; fine grained, and stained orange with iron oxides. Broken rock is somewhat banded dark gray to black. Possible biotite development and changes in quartz colors suggest possible contact metamorphism. Rock contains some open vugs with iron-oxide earths (limonite and goethite). <1% milky white quartz vein is visible. Random sample over 7-m-diameter area excludes quartz vein. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z260C	65.186690	-153.892286	458216	7229364	5N	Quartz vein; gray and somewhat glassy, 1-cm-wide quartz vein. Quartz is aphanitic with no vugs. Sample is a mix of quartz vein and quartz monzonite wall rock. Trace.
2011Z271B	65.319730	-153.516055	475955	7243995	5N	Quartz vein; white and clear with strong orange, brown, and black stains of iron oxide on fractures. Contains abundant vugs and open spaces with iron-oxide earths and subhedral to euhedral, fine-grained, quartz-crystal linings. Rock has minor boxworks and occasional manganese dendrites. Rock is highly fractured and does not react with HCl. No visible scheelite when lamped. Grab sample. Trace.
2011Z302A	65.470603	-152.693527	514198	7260747	5N	Micaceous quartzite; very-fine-grained, blocky, black and white rock. Broken rock is also black and white with abundant orange and black stains from iron oxide on fractures. Minerals include 10% mica and 90% very-fine-grained, sugary quartz. Contains occasional, very-fine-grained, sometimes square vugs (pyrite casts?). Rock does not react with HCl. Random sample of limited rock at surface. 100% of exposure.
2011Z309A	65.480956	-152.671726	515202	7261906	5N	Quartzite; fine grained and sugary with light orange, brown, and gray weathering. Broken rock is generally vuggy (≤2 mm) with moderate to strong orange and brown stains from iron oxide. Some very-fine-grained vugs have square outlines (after pyrite?). Locally, rock is banded with minor white mica on band surfaces. Bands are locally folded. One boulder contains a 1-cm-wide, translucent, white quartz vein. Selected sample of most iron-oxide-stained quartzite. 100% of exposure.
2011Z312A	65.485950	-152.666220	515454	7262464	5N	Quartzite; very-fine-grained, blocky rock that weathers tan, brown, and gray with iron-oxide staining as well as localized light gray to bluish-green copper staining. Broken rock is massive with faint gray and light gray bands. Light, pale-green turquoise with staining coats of iron oxide on some surfaces. Some weathered surfaces have caliche-like coatings. Rock does not react with HCl. Contains occasional fine-grained vugs and one 0.5-cm-wide quartz vein. There is a 3-m-diameter area of copper-stained rocks. Selected sample of quartzite with copper staining. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z314A	65.487987	-152.662414	515629	7262692	5N	Quartzite; very-fine-grained, pale green to gray, massive, highly fractured, angular boulders that are pale gray to gray. A soft, brown and orange iron-oxide-stained, occasionally pale green mineral (wavellite) coats fractures. A soft, white to cream-tan, fibrous mineral (not calcite) fills some fractures. This fibrous mineral has crystal fibers perpendicular to the vein wall, and may be scapolite or wollastonite. Random grab sample over 2-m area. 100% of exposure.
2011Z316A	65.491543	-152.659581	515758	7263089	5N	Quartzite; very-fine-grained, sugary, platy rock that weathers light tan to cream. Light orange and orange iron oxides (limonite) commonly stain rock. Contains 5% dark gray to black phyllitic partings and one thin quartz veinlet. Sky blue to bluish-green turquoise thinly coats some fracture surfaces. Random sample. 100% of exposure.
2011Z345B	65.358387	-152.853866	506799	7248213	5N	Cataclasite; medium-grained, subrounded cobbles that are strongly stained orange and brown from iron oxides (limonite ± unkown mineral). Contains 40% orange and brown iron oxides and 60% pale green to greenish gray, ~1 mm chlorite grains. Rock does not react with HCl. One cobble has a foliation-parallel quartz vein. Cut rock has cataclastic texture with white, ≤1 cm x 6 mm, subrounded quartz clasts in a schistose matrix extremely stained with iron oxide. 20% of exposure.
2011Z349A	65.360504	-152.844933	507214	7248450	5N	Gabbro dike(?); fine-grained, non-foliated, granular, blocky, green rock with a brown weathering rind. Broken rock is green to dark green with pale brown splotches. Rock has a weak reaction to HCl. Contains 1% pyrrhotite as ≤1 mm in diameter, disseminated grains and discontinuous veinlets. Minerals include 40–50% white to light tan, irregularly shaped feldspar(?) and 50–60% green chlorite + an unkown mineral. Possible hairline white quartz veinlets. 100% of exposure.
2011Z362A	65.300994	-153.112380	494760	7241813	5N	Quartz vein; white, foliation-parallel quartz veins in micaceous quartzite with some euhedral, clear quartz crystals. Select sample. 100% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z366B	65.373707	-152.891480	505046	7249917	5N	Quartz vein; white vein with common yellow, light brown, and brown iron-oxide staining. Commonly vuggy with clear, euhedral quartz crystals partially filling vugs. Occasional boxworks and ≤1-mm-thick patches of brown iron oxide. Contains rare, pale green chlorite included in quartz, and more commonly along vein margin. Trace.
2011Z380A	65.258591	-152.957411	501989	7237083	5N	Chlorite–feldspar schist; platy cobbles. Broken rock is strongly weathered ± altered. Iron oxide moderately to strongly stains rock. Grab sample. 100% of exposure.
2011Z382A	65.255934	-152.953689	502163	7236787	5N	Carbonate–white–mica quartz schist; strongly stained with iron oxide(weathering?) with 15–20% porphyroblastic, orange spots of iron oxide. Contains one foliation-parallel, white quartz vein. Grab sample of all pebbles and cobbles found. 100% of exposure.
2011Z383B	65.254238	-152.952279	502229	7236598	5N	Quartz–veined, chlorite schist; iron oxide weakly to moderately stains weathered surfaces. Broken rock is dull greenish-gray with pale gray and green mica. Possibly contains subequal amounts of quartz and chlorite or white mica. Rock has both foliation-parallel and crosscutting milky white to slightly translucent quartz veins ≤2 cm wide. Minor iron oxide along vein margins. Select sample of quartz-veined material. 30% of exposure.
2011Z384A	65.253806	-152.947570	502449	7236550	5N	Quartz–veined quartzite; fine-grained, isoclinally folded, dark gray to gray, pitted, micaceous quartzite with iron oxide weakly staining foliation surfaces and moderately staining fracture surfaces orange and brown (limonite). Contains foliation-parallel white quartz veins ≤3 mm thick. Quartz is massive to anhedral and generally slightly stained with iron oxide, but occasionally translucent to clear. Selected sample of quartz veins and quartz-veined quartzite. 100% of exposure.

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z385A	65.254046	-152.942860	502669	7236577	5N	Greenstone; possibly chloritized gabbro (?). Very angular, fine-grained, and dark-brown weathering rock. Broken rock has a mottled texture ranging in color from green to dark green with orange spots of iron oxide. Brown and reddish-orange iron oxides moderately to strongly stain abundant fracture surfaces. Locally, rock has a green, waxy to fibrous habit (talc or serpentine?). Spots of iron oxide are sometimes vuggy with occasional fine-grained, disseminated pyrrhotite in the center. Rock has no HCl reaction. 100% of exposure.
2011Z389A	65.254056	-152.871505	506002	7236583	5N	Quartz–calcite–veined, graphite–carbonate–mica quartzite; very fine grained. Rock contains 5% orange spots of iron oxide (limonite) after carbonate, 1% brown to orange, cubic casts of iron oxide (after pyrite?), and occasional (1%) layers of graphite. Contains two types of veins, both ≤1 cm thick : (1) milky white, foliation-parallel quartz veins with ≤2-mm-in-diameter spots of iron oxide that make up 1% of rock; and (2) vuggy, orange and white quartz–carbonate (?) veins that cross-cut foliation. Subhedral, white to translucent quartz crystals occur in vugs. Rock does not react with HCl. Selected sample of veined quartzite. 100% of exposure.
2011Z393A	65.247940	-152.864536	506329	7235902	5N	Quartz–veined, chlorite–carbonate–white–mica quartz schist; medium-grained and tan to light brown, platy to angular rock. Iron oxides moderatly stain fracture, weathering, and foliation surfaces orange, brown, and black. White to silvery gray white mica comprises 35–40% of rock and is relatively coarse grained. Minerals include almost pure white quartz, 2–4% orange spots of iron oxide (limonite?), and irregular patches of dark green, locally aligned chlorite on foliation surfaces. Rock does not react with HCl. Iron oxide stains irregularly shaped vugs with drusy quartz crystals. Rock looks recrystallized. Several areas of drill pad contain milky white to slightly iron-oxide-stained quartz veins that are broken into pieces ≤4 cm in shortest dimension. Several cobbles have ≤1-cm-wide foliation-crosscutting quartz veins. Random sample of rocks stained with iron oxide over a 3 m by 6 m area. 100% of exposure.

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z395C	65.244636	-152.862584	506421	7235534	5N	Quartz–veined quartzite; selected sample of iron-oxide-stained quartzite and schist. One piece with 2-cm-thick glassy quartz vein containing a black, oxidized pyrite(?) grain. Trace.
2011Z399A	65.243818	-152.860855	506502	7235443	5N	Carbonate(?)–white–mica-quartz paragneiss; blocky to semischistose with light tan weathering and crenulated foliation. Contains subequal amounts of white quartz and gray white mica as well as 20% orange spots of iron oxide (after carbonate or pyrite?). Rock is moderately to strongly stained by iron oxide. Ragged vugs occur on foliation surfaces (after carbonate or sulfides?). One quartz vein present. 100% of exposure.
2011Z403A	65.246659	-152.866383	506243	7235759	5N	Quartz-veined quartzite; fine to medium grained with tan to light-brown weathering. Broken rock is light gray and tan. Flaky white mica varies from light gray to silvery gray in color and 3–15% in abundance. Rock varies from very blocky to semischistose. Rock commonly has squarish to rhombic(?), 1 mm vugs that comprise up to 15% of foliation surfaces. Some vugs contain remnant orange and brown iron oxide (limonite ± goethite). Some vugs may be a result of altered or replaced carbonate. White quartz veins up to 1 cm wide comprise 1–2% of rock. Quartz veins cross-cut rock and vary from massive to slightly vuggy. Subhedral white to translucent quartz crystals and weak iron-oxide staining line vugs. Random sample that includes quartz-veined and non-quartz-veined rocks. 100% of exposure.
2011Z407A	65.242873	-152.867215	506205	7235337	5N	Carbonate(?)–white–mica quartz schist and micaceous quartzite; fine grained, moderately stained with iron oxide, and platy with light tan to light brown weathering. Broken rock is white to light gray in color with 30% orange, vuggy spots of iron oxide (limonite) and lenses (carbonate or oxidized sulfides?). Rock does not react with HCl. Rock is schistose and possibly sericitized and/or bleached. Contains more quartz than white mica. Random sample of quartz schist and quartzite. Quartzite is fine grained with tan to light brown weathering. Broken quartzite is white to light gray with 5–10% white to silver-gray white mica. Iron oxide stains the overall rock. One 0.5-cm-thick, white, foliation-parallel quartz vein is visible. 90% of exposure.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z408A	65.242817	-152.864840	506316	7235331	5N	Quartz–veined quartzite; fine grained with tan and light yellowish-brown weathering. Weak iron oxide stains on foliation surfaces. Broken rock is white to light gray with <10% silvery-gray to gray-white mica. Some rock is strongly stained orange and dark brown from iron oxide (limonite and goethite?). Contains square pyrite (?) molds ≤15 mm across. Several pieces contain white, slightly vuggy quartz veins. Vugs contain sericite. Selected sample of most iron-oxide-stained quartzite. 100% of exposure.
2011Z408B	65.242817	-152.864840	506316	7235331	5N	Fault(?) breccia; dark cobble with angular quartz ± quartzite in clasts ≤3 cm long and as small as sand grains. A somewhat vuggy iron-oxide matrix that contains some orange sericite. Euhedral quartz crystals partially fill some vugs in matrix. Trace.
2011Z425C	65.458074	-152.635054	516915	7259365	5N	Quartz vein; vuggy white quartz-vein pebbles with vugs weakly stained by iron oxide and filled with subhedral quartz crystals. Trace.
2011Z426A	65.456474	-152.637535	516801	7259186	5N	Quartzite; dark gray and white phyllitic quartzite that sometimes has disseminated, iron-oxidized to slightly oxidized pyrite cubes ≤9 mm^3. Selected sample of pyritic quartzite.
2011Z437B	65.376905	-152.928828	503309	7250271	5N	Quartz vein; occasionally vuggy quartz vein weakly stained with iron oxide. Trace.
2011Z441B	65.372953	-152.939892	502795	7249830	5N	Quartz vein; isoclinally folded, 0.5-cm-thick vein with small vugs and abundant staining from iron oxide. Vugs have 1–2 mm anhedral to subhedral white quartz crystals. Orange and brown iron oxide also moderately to strongly stains fractures through and around the vein. Selected sample of iron-oxide-stained quartz vein and wall rock. Trace.
2011Z448B	65.347432	-152.675647	515097	7247023	5N	Fault breccia; black and orange, angular cobble. Strongly stained brown, orange, and black with iron oxide. Contains angular quartzite clasts from 0.05-mm to 2-cm in diameter. The vuggy matrix contains iron oxide ± manganese oxide and fine-grained silica. Vugs are abundant and small. 10% of exposure.
2011Z455C	65.340905	-152.653733	516121	7246301	5N	Quartz vein; white and varying from massive to almost chalcedonic. Contains ~1 cm boxwork vugs. Overall, iron oxide weakly stains rock. Trace.

Table 1. (continued)

Sample _ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z480A	65.376349	-152.806426	509000	7250221	5N	Quartz–carbonate–white–mica–pyrite–cassiterite(?) vein; heavy, dark brown and gray pebbles of quartz, sparry carbonate, silvery white mica, brassy pyrite cubes ≤2 mm, and a silvery, greasy, irregular mineral (cassiterite?). Yellow-green scorodite coats one pebble. Possible tourmaline (black, elongate mineral sprays) is sometimes in vugs and sometimes in host rock. Selected sample of pyrite-bearing rock over a 4 m x 10 m area. Trace.
2011Z482A	65.375371	-152.799444	509325	7250113	5N	Graphite–quartz–white–mica schist; dark gray, slightly punky, strongly folded, and dominated by phyllitic white mica with some graphitic soot. White quartz occurs in ribbons and layers. Orange iron oxide commonly stains foliation surfaces. Contains 5% orange spots of iron oxide. 100% of exposure.
2011Z488B	65.358993	-152.971971	501304	7248273	5N	Quartz vein; grab sample of vuggy veins. 1% of exposure.

Table 2. Trace-element results for rocks collected in the Moran area, Tanana and Melozitna quadrangles, Alaska.

NOTE: ^ = sample from batch with inconsistend standard (see report text for details); "---" = element not analyzed

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011BAE021A	<0.001	---	---	---	<0.5	1.12	<5	---	20	<0.5	<2
2011BAE055A	0.002	---	---	---	<0.5	7.88	5	---	130	<0.5	<2
2011BAE104A	<0.001	---	---	---	<0.5	0.03	<5	---	<10	<0.5	4
2011BAE123B	<0.001	---	---	---	<0.5	1.05	<5	---	50	<0.5	<2
2011BAE128C	<0.001	---	---	---	<0.5	0.44	6	---	10	<0.5	<2
2011BAE133B	0.001	---	---	---	<0.5	0.12	<5	---	10	<0.5	<2
2011BAE135B	<0.001	---	---	---	<0.5	2.66	<5	---	10	0.6	<2
2011BAE138B	<0.001	---	---	---	<0.5	2.28	<5	---	120	<0.5	<2
2011BAE153B	<0.001	---	---	---	<0.5	2	<5	---	180	<0.5	<2
2011BAE156C	<0.001	---	---	---	<0.5	1.94	24	---	60	<0.5	<2
2011BAE187A	<0.001	---	---	---	<0.5	1.4	6	---	150	<0.5	<2
2011BAE205B	0.006	---	---	---	<0.5	1.17	8	---	20	<0.5	<2
2011BAE226C	---	0.003	---	---	1.1	7.3	6	---	720	0.7	3
2011BAE226D	<0.001	---	---	---	<0.5	8.18	<5	---	460	<0.5	<2
2011BAE234B	<0.001	---	---	---	<0.5	0.06	<5	---	<10	<0.5	<2
2011BAE247B	<0.001	---	---	---	<0.5	0.05	<5	---	10	<0.5	<2
2011BAE250B	<0.001	---	---	---	<0.5	0.23	<5	---	30	<0.5	<2
2011BAE262B	0.002	---	---	---	<0.5	2.77	7	---	220	0.8	<2
2011BAE298C	<0.001	---	---	---	0.8	8.55	10	---	1050	1.3	<2
2011BAE321B	<0.001	---	---	---	<0.5	0.38	<5	---	40	<0.5	<2
2011BAE332B	<0.001	---	---	---	0.9	7.32	<5	---	40	0.7	<2
2011BAE342B	<0.001	---	---	---	<0.5	0.34	<5	---	20	<0.5	<2
2011BAE351B	<0.001	---	---	---	<0.5	0.06	<5	---	10	<0.5	2
2011BAE394A	---	0.004	---	---	<0.5	2.88	<5	---	90	<0.5	2
2011BAE410B	0.004	---	---	---	<0.5	0.06	17	---	10	<0.5	2
2011BAE429B	<0.001	---	---	---	<0.5	0.06	<5	---	<10	<0.5	<2
2011BAE432B	0.004	---	---	---	<0.5	0.83	27	---	60	<0.5	<2
2011BAE468B	0.001	---	---	---	<0.5	0.55	6	---	50	<0.5	<2
2011BAE470B	<0.001	---	---	---	<0.5	3.53	<5	---	300	1	2
2011BAE491B	<0.001	---	---	---	<0.5	0.07	<5	---	10	<0.5	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011BAE021A	0.03	<0.5	4	32	3	1.62	<10	0.02	10	0.96	397
2011BAE055A	3.32	<0.5	9	18	3	2.71	10	0.18	<10	0.8	509
2011BAE104A	0.01	<0.5	<1	28	2	0.55	<10	0.01	<10	<0.01	58
2011BAE123B	0.05	<0.5	2	32	9	1.41	<10	0.27	10	0.16	174
2011BAE128C	0.01	<0.5	1	28	10	1.8	<10	0.09	<10	0.06	151
2011BAE133B	<0.01	<0.5	9	32	23	1.75	<10	0.04	<10	0.01	79
2011BAE135B	0.13	<0.5	1	34	2	1.5	10	0.01	<10	0.79	125
2011BAE138B	0.01	<0.5	6	25	6	2.33	10	0.33	10	0.21	225
2011BAE153B	0.08	<0.5	3	25	4	1.71	10	0.58	10	0.18	407
2011BAE156C	0.03	<0.5	4	30	7	1.17	<10	0.13	<10	0.17	187
2011BAE187A	0.11	<0.5	4	25	9	1.36	<10	0.03	<10	0.44	737
2011BAE205B	0.17	<0.5	1	36	15	0.91	<10	0.01	<10	0.11	109
2011BAE226C	9.47	<0.5	34	96	563	7.27	40	0.12	<10	2.07	28300
2011BAE226D	1.48	<0.5	12	34	77	2.74	10	0.1	<10	0.66	5100
2011BAE234B	0.01	<0.5	1	24	12	0.92	<10	<0.01	<10	0.02	84
2011BAE247B	0.01	<0.5	<1	26	3	0.72	<10	0.01	<10	0.01	57
2011BAE250B	0.01	<0.5	<1	37	7	1.12	<10	0.03	<10	0.03	84
2011BAE262B	0.11	<0.5	8	45	19	2.81	10	0.79	10	0.42	232
2011BAE298C	7.32	0.8	36	278	86	6.79	20	0.7	10	4.18	1875
2011BAE321B	0.03	<0.5	2	17	11	1.24	<10	0.08	<10	0.09	117
2011BAE332B	4.75	0.7	38	4	23	10.05	20	0.01	10	3.09	1230
2011BAE342B	0.04	<0.5	1	21	8	1.37	<10	0.04	<10	0.16	160
2011BAE351B	0.01	<0.5	1	29	9	1.13	<10	0.01	<10	0.01	788
2011BAE394A	4.75	<0.5	101	1320	107	8.39	<10	0.03	<10	15.3	1380
2011BAE410B	<0.01	<0.5	1	24	12	0.95	<10	0.02	<10	0.01	82
2011BAE429B	0.04	<0.5	6	25	5	0.96	<10	<0.01	<10	0.01	121
2011BAE432B	<0.01	<0.5	1	46	100	2.24	<10	0.26	<10	0.04	98
2011BAE468B	5.6	0.8	7	18	5	3.11	<10	0.15	<10	1.79	1935
2011BAE470B	0.26	<0.5	11	30	35	3.28	10	1.32	20	0.3	2210
2011BAE491B	<0.01	<0.5	<1	22	6	0.8	<10	0.01	<10	0.01	60

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011BAE021A	<1	0.07	13	170	---	<2	---	---	<0.01	<5	2
2011BAE055A	<1	4.07	20	240	---	3	---	---	<0.01	<5	7
2011BAE104A	<1	<0.01	<1	10	---	<2	---	---	<0.01	<5	<1
2011BAE123B	<1	0.06	4	200	---	2	---	---	<0.01	<5	2
2011BAE128C	<1	0.03	4	50	---	3	---	---	<0.01	<5	1
2011BAE133B	<1	<0.01	38	20	---	<2	---	---	<0.01	5	<1
2011BAE135B	<1	0.24	8	20	---	<2	---	---	<0.01	<5	6
2011BAE138B	<1	0.28	14	100	---	13	---	---	<0.01	<5	4
2011BAE153B	<1	0.36	8	370	---	15	---	---	<0.01	<5	2
2011BAE156C	<1	1.13	9	30	---	4	---	---	<0.01	<5	1
2011BAE187A	<1	0.83	10	140	---	11	---	---	<0.01	<5	3
2011BAE205B	<1	0.88	3	20	---	<2	---	---	<0.01	<5	1
2011BAE226C	1	1.02	89	740	---	3	0.005	0.01	0.02	5	28
2011BAE226D	2	6.4	26	240	---	5	---	---	<0.01	<5	8
2011BAE234B	<1	0.01	3	20	---	4	---	---	<0.01	<5	<1
2011BAE247B	<1	<0.01	2	20	---	2	---	---	<0.01	<5	<1
2011BAE250B	1	0.04	5	30	---	<2	---	---	<0.01	<5	<1
2011BAE262B	1	0.09	19	310	---	5	---	---	<0.01	<5	7
2011BAE298C	3	1.43	128	920	---	17	---	---	0.29	6	27
2011BAE321B	<1	0.03	5	30	---	<2	---	---	<0.01	<5	1
2011BAE332B	4	1.53	17	960	---	14	---	---	0.09	5	28
2011BAE342B	1	0.03	4	240	---	<2	---	---	<0.01	<5	1
2011BAE351B	1	0.01	3	30	---	2	---	---	<0.01	<5	<1
2011BAE394A	<1	0.09	714	120	---	<2	0.025	0.037	0.02	5	23
2011BAE410B	<1	<0.01	2	20	---	<2	---	---	<0.01	<5	<1
2011BAE429B	<1	<0.01	10	160	---	<2	---	---	<0.01	<5	<1
2011BAE432B	2	0.02	4	130	---	10	---	---	<0.01	<5	1
2011BAE468B	<1	0.09	17	160	---	2	---	---	<0.01	<5	3
2011BAE470B	3	0.23	13	1060	---	3	---	---	0.02	<5	4
2011BAE491B	1	0.01	1	50	---	<2	---	---	<0.01	<5	<1

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011BAE021A	---	13	<20	0.05	<10	<10	25	<10	---	15	---
2011BAE055A	---	418	<20	0.1	<10	20	184	<10	---	14	---
2011BAE104A	---	1	<20	<0.01	<10	<10	<1	<10	---	<2	---
2011BAE123B	---	8	<20	0.16	<10	<10	13	<10	---	12	---
2011BAE128C	---	3	<20	0.01	<10	<10	4	<10	---	11	---
2011BAE133B	---	1	<20	0.01	<10	<10	2	<10	---	<2	---
2011BAE135B	---	45	<20	0.08	<10	<10	40	<10	---	8	---
2011BAE138B	---	21	<20	0.07	<10	<10	23	<10	---	38	---
2011BAE153B	---	26	<20	0.06	<10	<10	17	<10	---	13	---
2011BAE156C	---	16	<20	0.04	<10	<10	9	<10	---	12	---
2011BAE187A	---	16	<20	0.04	<10	10	11	<10	---	22	---
2011BAE205B	---	18	<20	0.02	<10	10	8	<10	---	3	---
2011BAE226C	---	145	<20	0.75	<10	<10	300	<10	---	104	---
2011BAE226D	---	204	<20	0.24	<10	30	80	<10	---	32	---
2011BAE234B	---	1	<20	<0.01	<10	<10	2	<10	---	7	---
2011BAE247B	---	<1	<20	<0.01	<10	<10	1	<10	---	5	---
2011BAE250B	---	4	<20	0.01	<10	<10	4	<10	---	6	---
2011BAE262B	---	10	<20	0.08	<10	<10	54	<10	---	39	---
2011BAE298C	---	423	<20	0.95	<10	<10	239	<10	---	149	---
2011BAE321B	---	6	<20	0.02	<10	<10	8	<10	---	11	---
2011BAE332B	---	308	<20	1.25	<10	<10	362	<10	---	160	---
2011BAE342B	---	2	<20	0.01	<10	<10	7	<10	---	8	---
2011BAE351B	---	3	<20	0.01	<10	<10	4	<10	---	10	---
2011BAE394A	---	43	<20	0.19	<10	<10	104	<10	---	92	---
2011BAE410B	<5	<1	<20	<0.01	<10	<10	3	<10	<10	4	---
2011BAE429B	---	1	<20	0.01	<10	<10	2	<10	---	9	---
2011BAE432B	---	7	<20	0.04	<10	<10	36	<10	---	7	---
2011BAE468B	---	109	<20	0.02	<10	<10	18	<10	---	47	---
2011BAE470B	---	45	<20	0.12	<10	<10	27	<10	---	45	---
2011BAE491B	---	2	<20	<0.01	<10	<10	2	<10	---	5	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011BAE537B	<0.001	---	---	---	<0.5	1.23	<5	---	110	<0.5	<2
2011GG010C	0.001	---	---	---	<0.5	0.87	5	---	<10	<0.5	<2
2011GG016B	0.001	---	---	---	<0.5	8.99	28	---	190	0.7	<2
2011GG033A	<0.001	---	---	---	<0.5	7.18	10	---	500	2	<2
2011GG034A	0.002	---	---	---	<0.5	4.37	8	---	430	1.2	<2
2011GG035B	<0.001	---	---	---	<0.5	6.85	9	---	160	0.5	<2
2011GG037B	<0.001	---	---	---	0.5	8.11	6	---	60	0.8	<2
2011GG037C	0.008	---	---	---	<0.5	6	5	---	20	0.5	<2
2011GG041C	0.002	---	---	---	<0.5	0.09	32	---	<10	<0.5	<2
2011GG044B	>10.0	---	---	22.3	9.6	3.2	>10000	1.805	210	0.8	63
2011GG059B	0.008	---	---	---	<0.5	4.96	20	---	110	<0.5	<2
2011GG062A^	0.045	---	0.044	---	<0.5	6.12	1285	---	760	1.6	<2
2011GG063A^	0.001	---	0.007	---	<0.5	0.22	91	---	10	<0.5	<2
2011GG064A^	0.006	---	0.006	---	<0.5	5.69	1360	---	230	1.4	<2
2011GG065A^	9.29	---	9.29	---	22.3	4.95	>10000	0.985	590	1.4	54
2011GG069A^	0.009	---	0.009	---	3.3	2.1	287	---	200	<0.5	<2
2011GG094B^	0.021	---	0.023	---	<0.5	0.02	39	---	<10	<0.5	<2
2011GG097A^	0.001	---	0.002	---	<0.5	3.19	<5	---	30	25.6	<2
2011GG097C^	0.002	---	0.003	---	<0.5	7.39	8	---	380	142.5	<2
2011GG098B	0.002	---		---	<0.5	4.16	8	---	<10	13.5	5
2011GG102B	<0.001	---	---	---	0.5	5.6	29	---	300	2.8	<2
2011GG105A	0.004	---	---	---	2.3	6.82	30	---	60	2.7	996
2011GG106A	0.003	---	---	---	<0.5	6.05	7	---	1470	1.8	3
2011GG110A	<0.001	---	---	---	0.6	0.67	111	---	50	<0.5	14
2011GG111A	<0.001	---	---	---	<0.5	2.04	<5	---	200	0.7	<2
2011GG111D	<0.001	---	---	---	<0.5	7.08	<5	---	440	28.1	<2
2011GG138B	<0.001	---	---	---	<0.5	0.51	<5	---	50	<0.5	<2
2011GG167A	<0.001	---	---	---	<0.5	0.49	<5	---	20	<0.5	<2
2011GG168A	<0.001	---	---	---	<0.5	3.96	<5	---	30	<0.5	3
2011GG170A	<0.001	---	---	---	<0.5	5.17	24	---	70	<0.5	5

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011BAE537B	0.55	<0.5	2	18	6	1.27	<10	0.06	<10	0.17	166
2011GG010C	1.23	<0.5	4	33	21	1.67	<10	0.02	<10	0.3	256
2011GG016B	0.39	0.5	24	12	51	7.7	20	0.15	10	2.53	1380
2011GG033A	0.23	<0.5	20	79	39	5.43	20	1.97	30	1.04	404
2011GG034A	0.13	<0.5	6	59	26	3.65	10	1.42	10	0.63	187
2011GG035B	2.89	<0.5	21	56	21	3.31	10	0.25	30	1.41	372
2011GG037B	0.3	<0.5	11	52	23	2.71	10	0.07	10	1.2	313
2011GG037C	0.35	<0.5	7	21	24	1.48	10	0.03	10	0.41	167
2011GG041C	<0.01	<0.5	3	19	8	1.24	<10	0.01	<10	<0.01	65
2011GG044B	0.01	1.9	<1	29	407	25.2	10	1.04	20	0.18	108
2011GG059B	0.15	<0.5	2	27	44	1.83	10	0.08	10	0.2	231
2011GG062A^	0.02	0.6	1	82	113	6.25	20	1.55	30	0.22	60
2011GG063A^	0.01	<0.5	<1	22	11	1.1	<10	0.06	<10	0.01	55
2011GG064A^	0.02	1.5	9	91	43	9.27	10	1.3	30	1.2	321
2011GG065A^	0.03	3.3	<1	53	234	20	10	1.41	80	0.48	56
2011GG069A^	0.01	1.7	1	38	163	6.76	<10	0.55	20	0.05	68
2011GG094B^	0.01	<0.5	<1	20	4	0.64	<10	0.01	<10	<0.01	46
2011GG097A^	18.2	<0.5	13	20	3	15.85	20	0.06	<10	0.67	13600
2011GG097C^	8.47	<0.5	6	56	4	5.78	30	2.35	20	0.75	5190
2011GG098B	21.4	<0.5	<1	23	2	15.4	30	0.05	<10	0.22	8750
2011GG102B	0.73	<0.5	24	75	26	3.25	20	0.55	60	1.1	605
2011GG105A	0.6	0.6	30	156	119	11.25	30	0.12	10	1.84	2160
2011GG106A	1.74	<0.5	8	74	37	1.98	10	3.04	30	1.46	227
2011GG110A	11.95	<0.5	3	12	16	0.95	<10	0.19	<10	0.21	2200
2011GG111A	27.3	<0.5	2	19	6	1.01	<10	0.71	10	0.43	231
2011GG111D	0.43	<0.5	2	8	10	0.71	30	5.57	10	0.15	228
2011GG138B	0.01	<0.5	3	30	4	1.13	<10	0.16	<10	0.07	136
2011GG167A	0.12	<0.5	4	35	7	1.5	<10	0.02	<10	0.31	215
2011GG168A	0.23	<0.5	10	89	6	2.83	10	0.02	10	0.68	343
2011GG170A	1.13	<0.5	30	150	6	7.3	20	0.08	<10	2.88	1095

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011BAE537B	<1	0.43	2	130	---	<2	---	---	<0.01	<5	1
2011GG010C	<1	0.05	9	150	---	2	---	---	<0.01	<5	4
2011GG016B	<1	4.78	26	1750	---	5	---	---	<0.01	<5	18
2011GG033A	<1	0.29	45	710	---	13	---	---	0.01	<5	18
2011GG034A	<1	0.19	24	680	---	16	---	---	0.01	<5	11
2011GG035B	<1	4.04	44	140	---	13	---	---	<0.01	<5	12
2011GG037B	<1	5.9	24	40	---	8	---	---	<0.01	<5	10
2011GG037C	<1	4.6	13	100	---	6	---	---	<0.01	<5	4
2011GG041C	<1	0.01	7	40	---	2	---	---	<0.01	5	<1
2011GG044B	<1	0.07	2	730	---	98	---	---	0.08	94	7
2011GG059B	2	3.78	10	800	---	40	---	---	0.02	<5	2
2011GG062A^	<1	0.38	13	1080	---	95	---	---	0.01	5	12
2011GG063A^	<1	0.01	5	70	---	23	---	---	<0.01	<5	<1
2011GG064A^	2	0.47	46	580	---	39	---	---	0.02	5	15
2011GG065A^	1	0.21	<1	1710	---	483	---	---	0.07	55	13
2011GG069A^	<1	0.04	8	940	---	2300	---	---	0.09	41	6
2011GG094B^	<1	0.01	<1	10	---	7	---	---	<0.01	<5	<1
2011GG097A^	853	0.15	36	520	---	17	---	---	0.03	<5	5
2011GG097C^	9	1.82	14	310	---	12	---	---	0.01	<5	12
2011GG098B	<1	0.04	<1	400	---	15	---	---	<0.01	<5	6
2011GG102B	<1	0.48	39	840	---	62	---	---	0.02	<5	12
2011GG105A	<1	0.61	78	380	---	71	---	---	0.05	<5	22
2011GG106A	2	0.8	47	700	---	4	---	---	0.1	<5	10
2011GG110A	<1	0.02	7	110	---	46	---	---	0.01	<5	2
2011GG111A	<1	0.23	5	220	---	4	---	---	0.06	5	3
2011GG111D	<1	1.56	2	20	---	23	---	---	0.01	<5	5
2011GG138B	<1	0.02	6	20	---	<2	---	---	<0.01	<5	1
2011GG167A	<1	0.05	11	410	---	<2	---	---	<0.01	<5	2
2011GG168A	<1	2.59	25	870	---	<2	---	---	<0.01	<5	6
2011GG170A	<1	1.43	65	510	---	6	---	---	<0.01	7	14

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011BAE537B	---	122	<20	0.03	<10	<10	46	<10	---	8	---
2011GG010C	---	106	<20	0.1	<10	<10	48	<10	---	13	---
2011GG016B	---	62	<20	1.07	<10	<10	236	20	---	154	---
2011GG033A	---	40	<20	0.18	<10	<10	137	<10	---	102	---
2011GG034A	---	21	<20	0.17	<10	<10	104	<10	---	62	---
2011GG035B	---	66	<20	0.21	<10	<10	82	<10	---	42	---
2011GG037B	---	28	<20	0.3	<10	<10	78	<10	---	34	---
2011GG037C	---	28	<20	0.11	<10	<10	42	<10	---	16	---
2011GG041C	---	2	<20	0.02	<10	<10	3	<10	---	13	---
2011GG044B	---	9	<20	0.05	<10	<10	62	<10	---	95	---
2011GG059B	---	30	<20	0.07	<10	<10	26	<10	---	34	---
2011GG062A^	---	66	<20	0.19	<10	<10	135	<10	---	103	---
2011GG063A^	---	1	<20	0.01	<10	<10	4	<10	---	17	---
2011GG064A^	---	53	<20	0.22	<10	<10	141	<10	---	290	---
2011GG065A^	---	33	<20	0.09	<10	<10	111	<10	---	39	---
2011GG069A^	---	37	<20	0.06	<10	<10	68	<10	---	191	---
2011GG094B^	---	<1	<20	<0.01	<10	<10	1	<10	---	4	---
2011GG097A^	178	24	<20	0.15	<10	<10	31	10	70	233	---
2011GG097C^	139	406	20	0.37	<10	<10	67	280	290	101	---
2011GG098B	743	3	<20	0.15	<10	<10	33	<10	50	56	---
2011GG102B	---	70	<20	0.44	<10	<10	112	10	---	63	---
2011GG105A	32	57	<20	0.28	<10	<10	178	2690	2690	363	---
2011GG106A	<5	215	<20	0.23	<10	<10	97	4590	8960	21	---
2011GG110A	---	71	<20	0.03	<10	<10	14	40	---	36	---
2011GG111A	---	1745	20	0.13	<10	<10	20	10	---	25	---
2011GG111D	---	404	<20	<0.01	<10	20	<1	30	---	2	---
2011GG138B	---	3	<20	0.03	<10	<10	6	<10	---	8	---
2011GG167A	---	6	<20	0.03	<10	<10	20	<10	---	13	---
2011GG168A	---	65	<20	0.5	<10	10	61	<10	---	33	---
2011GG170A	---	76	<20	0.61	<10	10	210	<10	---	89	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011GG179A	<0.001	---	---	---	<0.5	2.45	<5	---	20	<0.5	<2
2011GG179C	0.001	---	---	---	<0.5	7.71	6	---	160	<0.5	6
2011GG185A	---	<0.001	---	---	3.2	8.11	<5	---	120	<0.5	2
2011GG186B	---	<0.001	---	---	0.7	6.63	<5	---	140	0.6	<2
2011GG194A	<0.001	---	---	---	1	5.94	17	---	350	0.8	<2
2011GG209A	0.026	---	---	---	0.6	5.74	759	---	720	1.4	<2
2011GG210C	<0.001	---	---	---	<0.5	2.9	17	---	30	<0.5	<2
2011GG217B	0.001	---	---	---	<0.5	7.79	5	---	70	0.6	<2
2011GG300B	<0.001	---	---	---	<0.5	2.11	<5	---	30	<0.5	<2
2011GG304B	<0.001	---	---	---	<0.5	1.76	<5	---	120	0.5	2
2011GG323A	<0.001	---	---	---	0.7	7.6	<5	---	110	<0.5	<2
2011GG335A	<0.001	---	---	---	<0.5	1	24	---	100	<0.5	<2
2011GG344A	0.001	---	---	---	<0.5	5.17	6	---	170	2.3	3
2011GG349A	<0.001	---	---	---	0.5	7.68	34	---	1800	1.9	2
2011GG353A	0.004	---	---	---	9.9	0.56	18	---	30	0.7	6
2011GG356A	<0.001	---	---	---	<0.5	0.38	17	---	50	<0.5	2
2011GG359A	<0.001	---	---	---	<0.5	8.12	6	---	600	2.4	<2
2011GG365A	<0.001	---	---	---	0.8	3.47	37	---	240	1.6	<2
2011GG366A	<0.001	---	---	---	0.8	1.32	202	---	90	0.6	<2
2011GG376A	0.001	---	---	---	0.5	3.28	68	---	340	0.8	<2
2011GG376C	0.008	---	---	---	0.7	6.22	53	---	190	0.7	<2
2011GG382C	<0.001	---	---	---	<0.5	2.48	19	---	140	0.8	<2
2011GG393A	0.001	---	---	---	<0.5	8	15	---	240	0.8	<2
2011GG395A	0.001	---	---	---	<0.5	9.6	31	---	240	1.7	<2
2011GG403A	0.002	---	---	---	<0.5	3.37	30	---	160	0.8	<2
2011GG422B	0.002	---	---	---	<0.5	7.59	7	---	20	<0.5	<2
2011GG456C	<0.001	---	---	---	<0.5	0.39	7	---	60	<0.5	2
2011GG464A	0.009	---	---	---	<0.5	4.3	15	---	340	0.5	<2
2011GG470B	0.008	---	---	---	<0.5	0.82	180	---	260	<0.5	2
2011GG480A	<0.001	---	---	---	<0.5	1.67	<5	---	150	<0.5	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011GG179A	3.25	<0.5	<1	18	1	2.42	10	0.01	<10	0.02	249
2011GG179C	9.8	<0.5	34	146	92	8.33	20	0.06	<10	2.58	2170
2011GG185A	5.34	<0.5	14	42	24	4.47	20	0.03	10	0.67	1075
2011GG186B	2.86	<0.5	25	57	124	5.63	10	0.1	<10	2.29	1235
2011GG194A	2.06	1.3	36	23	45	8.77	20	0.3	20	3.15	987
2011GG209A	0.07	0.6	3	83	59	7.09	20	1.29	40	0.59	318
2011GG210C	1.82	<0.5	6	31	13	3.87	10	0.04	10	0.67	438
2011GG217B	1.25	<0.5	6	20	46	4.16	10	0.12	10	1.1	475
2011GG300B	2.99	<0.5	13	66	6	2.69	<10	0.01	<10	1.55	576
2011GG304B	0.03	<0.5	2	40	16	2.65	10	0.4	<10	0.47	164
2011GG323A	5.66	<0.5	43	127	79	8.96	20	0.05	<10	4.62	1300
2011GG335A	0.01	<0.5	3	28	18	1.54	<10	0.23	<10	0.05	83
2011GG344A	1.98	<0.5	18	78	25	5.21	20	1.36	30	1.14	747
2011GG349A	0.28	<0.5	15	100	33	5.07	20	2.18	30	0.96	484
2011GG353A	0.12	19.1	16	22	35	2.36	10	0.05	<10	0.21	1800
2011GG356A	0.01	<0.5	1	22	11	1.24	<10	0.07	<10	0.09	95
2011GG359A	0.19	<0.5	27	71	4	5.13	20	2.69	30	0.75	2190
2011GG365A	0.04	1.3	166	36	192	25.5	<10	0.74	50	0.13	4580
2011GG366A	0.01	0.5	30	15	20	48.4	<10	0.45	10	0.06	1030
2011GG376A	0.65	<0.5	4	59	43	3.27	10	0.74	20	0.42	160
2011GG376C	0.01	0.9	22	92	124	8.01	10	0.73	10	1.04	527
2011GG382C	0.08	<0.5	9	41	33	3.16	<10	0.3	10	0.42	259
2011GG393A	0.13	<0.5	24	56	72	5.86	10	0.51	10	0.5	1125
2011GG395A	0.1	<0.5	56	71	91	5.75	20	0.71	20	0.5	6440
2011GG403A	0.07	<0.5	1	95	18	2.38	10	0.79	10	0.65	159
2011GG422B	0.05	<0.5	5	14	12	1.07	10	0.04	10	0.05	746
2011GG456C	0.02	<0.5	1	16	6	0.93	<10	0.05	<10	0.02	205
2011GG464A	0.02	<0.5	19	118	30	4.69	10	0.4	10	0.7	298
2011GG470B	0.01	<0.5	2	36	62	1.95	<10	0.15	<10	0.03	59
2011GG480A	0.07	<0.5	4	24	4	1.69	<10	0.59	10	0.31	409

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011GG179A	<1	0.01	1	20	---	4	---	---	<0.01	<5	<1
2011GG179C	<1	1.84	101	590	---	14	---	---	<0.01	5	39
2011GG185A	<1	3.34	25	230	---	9	0.002	<0.005	<0.01	<5	11
2011GG186B	<1	4.21	33	1120	---	<2	0.004	<0.005	<0.01	<5	15
2011GG194A	4	0.9	50	1860	---	5	---	---	0.01	<5	27
2011GG209A	3	0.36	22	790	---	14	---	---	0.13	7	13
2011GG210C	1	0.21	17	280	---	11	---	---	<0.01	<5	11
2011GG217B	3	4.58	6	1010	---	7	---	---	0.01	<5	12
2011GG300B	1	0.37	39	50	---	3	---	---	<0.01	5	8
2011GG304B	1	0.09	12	130	---	10	---	---	0.01	<5	4
2011GG323A	3	2.43	59	470	---	8	---	---	0.07	6	42
2011GG335A	1	0.03	9	220	---	14	---	---	0.02	<5	2
2011GG344A	6	0.35	37	690	---	10	---	---	0.19	5	14
2011GG349A	3	0.42	79	950	---	13	---	---	0.01	<5	17
2011GG353A	1	<0.01	4	230	---	8760	---	---	0.02	12	1
2011GG356A	<1	0.01	3	60	---	13	---	---	<0.01	<5	1
2011GG359A	<1	1.03	39	340	---	27	---	---	<0.01	<5	15
2011GG365A	<1	0.1	206	800	---	23	---	---	0.03	8	7
2011GG366A	<1	0.03	96	3350	---	15	---	---	0.07	73	2
2011GG376A	<1	0.2	15	3220	---	36	---	---	0.01	<5	9
2011GG376C	<1	0.15	35	700	---	245	---	---	0.02	8	26
2011GG382C	<1	0.36	22	210	---	29	---	---	0.01	<5	5
2011GG393A	<1	1.05	24	550	---	9	---	---	<0.01	<5	19
2011GG395A	<1	1.48	77	520	---	40	---	---	0.01	<5	17
2011GG403A	2	0.23	37	660	---	6	---	---	0.02	<5	6
2011GG422B	<1	7.4	15	180	---	4	---	---	0.03	<5	2
2011GG456C	1	0.14	3	40	---	<2	---	---	<0.01	<5	<1
2011GG464A	2	0.04	65	250	---	10	---	---	0.01	<5	14
2011GG470B	2	0.05	28	400	---	4	---	---	0.01	43	2
2011GG480A	<1	0.05	11	320	---	<2	---	---	<0.01	<5	2

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011GG179A	---	558	<20	0.01	<10	<10	139	<10	---	11	---
2011GG179C	---	1350	<20	0.98	<10	10	440	<10	---	141	---
2011GG185A	---	3160	20	0.28	<10	<10	258	<10	---	25	---
2011GG186B	---	90	<20	0.36	<10	<10	169	<10	---	62	---
2011GG194A	---	55	<20	1.93	<10	<10	348	<10	---	222	---
2011GG209A	---	80	<20	0.29	<10	<10	158	<10	---	152	---
2011GG210C	---	163	<20	0.17	<10	<10	156	<10	---	57	---
2011GG217B	---	99	<20	0.5	<10	20	127	<10	---	49	---
2011GG300B	---	20	<20	0.07	<10	<10	47	<10	---	23	---
2011GG304B	---	7	<20	0.06	<10	<10	38	<10	---	36	---
2011GG323A	---	140	<20	0.76	<10	10	330	<10	---	112	---
2011GG335A	---	8	<20	0.03	<10	<10	19	<10	---	25	---
2011GG344A	<5	87	<20	0.77	<10	<10	144	<10	20	109	---
2011GG349A	<5	70	<20	0.49	<10	<10	176	<10	20	113	---
2011GG353A	---	6	<20	0.01	<10	<10	32	10	---	>10000	4.97
2011GG356A	<5	4	<20	0.02	<10	<10	10	<10	<10	19	---
2011GG359A	<5	114	<20	0.42	<10	<10	76	<10	10	76	---
2011GG365A	<5	80	<20	0.08	10	<10	45	<10	100	761	---
2011GG366A	---	44	<20	0.07	<10	<10	18	<10	---	277	---
2011GG376A	---	38	<20	0.14	<10	<10	95	<10	---	81	---
2011GG376C	---	14	<20	0.4	<10	<10	238	<10	---	145	---
2011GG382C	---	34	<20	0.11	<10	<10	42	<10	---	104	---
2011GG393A	---	104	<20	0.17	<10	<10	198	<10	---	76	---
2011GG395A	---	352	<20	0.14	<10	<10	112	<10	---	80	---
2011GG403A	---	35	<20	0.12	<10	<10	95	<10	---	70	---
2011GG422B	---	133	<20	0.06	<10	<10	4	<10	---	21	---
2011GG456C	---	5	<20	0.01	<10	<10	5	<10	---	4	---
2011GG464A	---	27	<20	0.2	<10	<10	155	<10	---	79	---
2011GG470B	---	20	<20	0.03	<10	<10	51	<10	---	108	---
2011GG480A	---	12	<20	0.09	<10	<10	15	<10	---	22	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011GG481B	<0.001	---	---	---	<0.5	1.47	6	---	110	<0.5	<2
2011GG484A	<0.001	---	---	---	<0.5	0.73	<5	---	210	<0.5	<2
2011GG491A	0.005	---	---	---	<0.5	8.37	21	---	1100	2.3	<2
2011GG523B	<0.001	---	---	---	<0.5	0.94	6	---	290	<0.5	<2
2011GG529A	<0.001	---	---	---	<0.5	7.56	<5	---	750	4.2	<2
2011GG551A	<0.001	---	---	---	<0.5	0.19	<5	---	120	<0.5	2
2011GG554B	0.001	---	---	---	<0.5	0.8	20	---	70	<0.5	<2
2011GG564A	<0.001	---	---	---	<0.5	8.01	<5	---	480	2	2
2011LF025B	0.004	---	---	---	<0.5	5.95	9	---	700	1.1	2
2011LF027B	<0.001	---	---	---	<0.5	0.23	<5	---	20	<0.5	<2
2011LF039B	0.002	---	---	---	<0.5	2.56	27	---	190	0.8	<2
2011LF040B	0.02	---	---	---	<0.5	1.55	<5	---	230	0.6	<2
2011LF040C	0.01	---	---	---	<0.5	1.61	<5	---	190	0.5	<2
2011LF070C^	0.025	---	---	---	0.6	2.03	36	---	1090	1	<2
2011LF081A^	0.002	---	---	---	<0.5	1.55	22	---	90	0.8	<2
2011LF100A^	0.003	---	---	---	<0.5	5.18	28	---	100	1.9	<2
2011LF101A^	0.001	---	---	---	0.6	4.78	14	---	150	32.5	<2
2011LF119A	<0.001	---	---	---	<0.5	7.87	32	---	460	3	3
2011LF123A	<0.001	---	---	---	<0.5	7.5	116	---	980	2.5	<2
2011LF128A	<0.001	---	---	---	<0.5	1.37	<5	---	100	0.5	<2
2011LF129A	0.001	---	---	---	<0.5	2.79	10	---	160	1.2	<2
2011LF180B	<0.001	---	---	---	<0.5	7.58	37	---	100	1	7
2011LF223A	<0.001	---	---	---	0.8	7.26	<5	---	390	0.5	2
2011LF261C	1.11	---	---	---	2.1	0.33	10	---	40	<0.5	18
2011LF268A	<0.001	---	---	---	<0.5	1.89	5	---	90	<0.5	2
2011LF271A	0.003	---	---	---	<0.5	2.5	13	---	240	0.7	<2
2011LF276B	<0.001	---	---	---	<0.5	0.16	<5	---	10	<0.5	<2
2011LF297A	<0.001	---	---	---	<0.5	1.67	21	---	60	0.5	<2
2011LF300A	<0.001	---	---	---	<0.5	6.18	13	---	530	32.8	7
2011LF314A	0.001	---	---	---	<0.5	1.24	6	---	150	0.5	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011GG481B	0.17	<0.5	2	20	7	1.41	<10	0.33	10	0.06	820
2011GG484A	0.01	<0.5	2	19	21	1.4	<10	0.34	<10	0.08	99
2011GG491A	0.11	<0.5	18	91	47	5.21	20	2.69	40	0.92	313
2011GG523B	0.19	<0.5	8	12	15	1.72	<10	0.2	<10	0.47	249
2011GG529A	1.93	<0.5	7	22	7	3.07	20	3.57	50	0.79	529
2011GG551A	0.01	<0.5	2	16	29	0.91	<10	0.06	<10	0.01	80
2011GG554B	0.01	<0.5	10	36	12	1.66	<10	0.17	10	0.2	181
2011GG564A	0.28	<0.5	19	72	43	4.7	20	2.76	40	0.99	443
2011LF025B	4.56	<0.5	23	193	108	5.72	10	1.13	10	3.04	915
2011LF027B	0.05	<0.5	1	18	13	0.74	<10	0.07	<10	0.02	62
2011LF039B	0.04	1.6	10	86	91	12.5	<10	0.31	10	0.11	169
2011LF040B	0.03	<0.5	<1	41	4	0.68	10	0.65	<10	0.21	57
2011LF040C	0.01	<0.5	<1	37	11	0.98	10	0.62	<10	0.18	48
2011LF070C^	1.24	0.8	2	49	138	3.66	<10	0.83	10	0.3	77
2011LF081A^	0.01	<0.5	6	31	135	5.52	<10	0.21	<10	0.06	195
2011LF100A^	1.06	<0.5	16	94	113	11.9	20	0.28	10	0.96	2710
2011LF101A^	0.08	1.5	16	44	14	11.8	30	0.31	30	1.61	3160
2011LF119A	0.15	<0.5	3	76	34	3.64	20	1.97	30	0.92	183
2011LF123A	9.5	<0.5	12	71	17	4.33	20	2.24	30	2.85	1285
2011LF128A	0.02	<0.5	1	27	8	1.45	<10	0.5	10	0.1	123
2011LF129A	0.01	<0.5	12	31	18	3.61	10	0.74	10	0.11	507
2011LF180B	0.02	0.5	7	111	138	13.95	30	0.02	<10	0.02	205
2011LF223A	7.95	1	38	150	109	7.85	20	0.17	10	3.48	6060
2011LF261C	0.01	<0.5	3	28	19	1.43	<10	0.11	<10	0.04	131
2011LF268A	0.06	<0.5	6	41	12	2.93	<10	0.27	10	0.22	1615
2011LF271A	0.01	<0.5	6	30	8	1.85	10	0.83	20	0.1	120
2011LF276B	0.02	<0.5	<1	27	8	1.39	<10	0.02	<10	0.04	84
2011LF297A	0.07	<0.5	7	41	85	5.9	10	0.06	10	0.6	895
2011LF300A	0.11	<0.5	7	134	62	6.22	20	1.28	30	0.53	305
2011LF314A	4.68	<0.5	1	30	265	1.06	<10	0.28	<10	0.25	116

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011GG481B	1	0.19	7	620	---	28	---	---	0.01	<5	2
2011GG484A	<1	0.02	11	80	---	7	---	---	<0.01	5	2
2011GG491A	<1	0.33	48	840	---	23	---	---	0.01	<5	17
2011GG523B	<1	0.01	21	150	---	<2	---	---	<0.01	<5	2
2011GG529A	<1	1.67	5	760	---	26	---	---	0.01	<5	10
2011GG551A	<1	0.01	4	30	---	<2	---	---	<0.01	<5	1
2011GG554B	<1	0.03	23	30	---	<2	---	---	0.01	<5	2
2011GG564A	<1	0.77	36	330	---	14	---	---	<0.01	<5	15
2011LF025B	<1	0.08	106	1120	---	5	---	---	0.64	<5	20
2011LF027B	<1	0.01	4	170	---	<2	---	---	<0.01	<5	<1
2011LF039B	1	0.21	135	2730	---	43	---	---	0.01	11	9
2011LF040B	<1	0.02	14	200	---	2	---	---	0.01	<5	4
2011LF040C	2	0.02	9	150	---	2	---	---	0.01	<5	4
2011LF070C^	4	0.01	38	>10000	9990	14	---	---	0.01	<5	6
2011LF081A^	4	0.01	16	1760	---	6	---	---	0.01	<5	3
2011LF100A^	16	0.72	58	710	---	21	---	---	0.45	<5	12
2011LF101A^	2	0.02	72	490	---	504	---	---	<0.01	<5	10
2011LF119A	<1	0.35	5	230	---	11	---	---	<0.01	<5	13
2011LF123A	<1	0.45	41	640	---	16	---	---	0.02	<5	13
2011LF128A	<1	0.02	4	100	---	4	---	---	<0.01	<5	2
2011LF129A	<1	0.02	17	260	---	5	---	---	<0.01	<5	5
2011LF180B	1	0.02	37	3560	---	4	---	---	0.01	10	40
2011LF223A	3	1.32	72	800	---	7	---	---	0.09	6	34
2011LF261C	3	0.02	5	30	---	42	---	---	<0.01	<5	1
2011LF268A	1	0.27	9	290	---	55	---	---	<0.01	<5	3
2011LF271A	1	0.17	10	110	---	6	---	---	<0.01	<5	3
2011LF276B	<1	0.01	4	70	---	<2	---	---	<0.01	<5	<1
2011LF297A	2	<0.01	17	420	---	7	---	---	0.02	<5	4
2011LF300A	4	0.3	48	1060	---	6	---	---	0.01	6	12
2011LF314A	1	0.01	7	>10000	22800	9	---	---	0.01	<5	3

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011GG481B	---	35	<20	0.05	<10	<10	13	<10	---	8	---
2011GG484A	---	24	<20	0.04	<10	<10	14	<10	---	37	---
2011GG491A	---	78	<20	0.29	<10	<10	173	<10	---	162	---
2011GG523B	---	16	<20	0.05	<10	<10	20	<10	---	5	---
2011GG529A	5	338	20	0.4	<10	<10	51	<10	10	62	---
2011GG551A	---	3	<20	0.01	<10	<10	4	<10	---	9	---
2011GG554B	---	4	<20	0.04	<10	<10	20	<10	---	40	---
2011GG564A	---	110	20	0.36	<10	<10	80	<10	---	87	---
2011LF025B	---	94	<20	0.79	10	<10	178	<10	---	89	---
2011LF027B	---	4	<20	0.01	<10	<10	10	<10	---	<2	---
2011LF039B	---	41	<20	0.11	10	<10	176	<10	---	508	---
2011LF040B	---	10	<20	0.09	<10	<10	234	<10	---	44	---
2011LF040C	---	6	<20	0.09	<10	<10	245	<10	---	37	---
2011LF070C^	---	94	<20	0.1	<10	<10	328	<10	---	80	---
2011LF081A^	---	7	<20	0.06	<10	10	129	<10	---	24	---
2011LF100A^	7	57	<20	0.37	<10	<10	170	20	50	199	---
2011LF101A^	15	5	<20	0.18	<10	<10	117	20	60	932	---
2011LF119A	67	76	<20	0.32	<10	<10	77	10	10	15	---
2011LF123A	7	294	<20	0.41	<10	<10	108	<10	20	159	---
2011LF128A	---	6	<20	0.11	<10	<10	16	<10	---	10	---
2011LF129A	---	12	<20	0.19	<10	<10	33	<10	---	40	---
2011LF180B	---	11	<20	1.79	<10	20	448	<10	---	142	---
2011LF223A	---	75	<20	0.94	<10	<10	306	<10	---	106	---
2011LF261C	---	4	<20	0.02	<10	<10	8	<10	---	22	---
2011LF268A	---	36	<20	0.1	<10	<10	28	<10	---	26	---
2011LF271A	---	29	<20	0.08	<10	<10	21	<10	---	25	---
2011LF276B	---	2	<20	0.01	<10	<10	6	<10	---	9	---
2011LF297A	17	13	<20	0.1	<10	<10	56	20	30	95	---
2011LF300A	16	32	<20	0.29	<10	<10	148	110	150	53	---
2011LF314A	---	166	<20	0.04	<10	10	123	<10	---	52	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011LF317A	0.01	---	---	---	<0.5	1.4	13	---	400	0.6	<2
2011LF332A	<0.001	---	---	---	<0.5	6.12	<5	---	140	15.3	17
2011LF345A	<0.001	---	---	---	<0.5	7.1	<5	---	40	<0.5	<2
2011LF365A	0.001	---	---	---	<0.5	0.86	11	---	60	<0.5	<2
2011LF369B	<0.001	---	---	---	<0.5	0.41	<5	---	40	<0.5	<2
2011LF394A	0.001	---	---	---	<0.5	1.23	6	---	80	0.6	<2
2011LF401A	0.002	---	---	---	<0.5	4.94	9	---	190	1.2	<2
2011LF408A	0.007	---	---	---	0.6	1.56	27	---	80	<0.5	<2
2011LF411B	0.003	---	---	---	<0.5	7.74	41	---	530	1.2	<2
2011LF412B	0.005	---	---	---	<0.5	4.04	121	---	450	1	<2
2011LF485A	0.001	---	---	---	<0.5	0.74	35	---	70	0.5	<2
2011LF498A	<0.001	---	---	---	<0.5	1.85	12	---	130	0.5	<2
2011LF502A	0.019	---	---	---	<0.5	4.08	<5	---	390	1.1	<2
2011LF507A	0.006	---	---	---	<0.5	0.95	16	---	100	<0.5	<2
2011LF528A	0.002	---	---	---	<0.5	1.59	11	---	80	<0.5	<2
2011LF557B	0.035	---	---	---	1.3	5.49	88	---	230	1.1	<2
2011LF587B	0.003	---	---	---	0.8	9.69	5	---	90	<0.5	<2
2011RN153A	0.002	---	---	---	0.5	1.51	10	---	340	0.5	<2
2011RN177B	0.001	---	---	---	<0.5	5.74	<5	---	790	4.9	3
2011RN180B	<0.001	---	---	---	<0.5	9.43	<5	---	670	2.7	<2
2011RN180C	<0.001	---	---	---	<0.5	1.78	<5	---	110	0.6	<2
2011Z005B	0.004	---	---	---	<0.5	6.35	5	---	250	3.8	5
2011Z012E	0.001	---	---	---	<0.5	3.35	11	---	280	0.9	<2
2011Z024A	0.031	---	---	---	1.5	4.04	56	---	400	1.7	<2
2011Z026B	<0.001	---	---	---	<0.5	0.88	<5	---	50	<0.5	<2
2011Z028A	0.03	---	---	---	<0.5	2.59	10	---	1510	0.6	<2
2011Z029A	<0.001	---	---	---	<0.5	4.91	<5	---	6710	1.3	<2
2011Z044A	0.001	---	---	---	<0.5	5.9	16	---	510	1.2	<2
2011Z050A	<0.001	---	---	---	<0.5	0.05	<5	---	10	<0.5	<2
2011Z059A	<0.001	---	---	---	<0.5	0.17	12	---	10	<0.5	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011LF317A	0.09	<0.5	<1	47	1090	1.43	<10	0.35	<10	0.13	88
2011LF332A	0.34	<0.5	1	8	6	2.09	20	4.09	40	0.08	407
2011LF345A	0.08	<0.5	3	11	7	0.74	10	0.03	<10	0.14	86
2011LF365A	0.03	<0.5	2	20	31	0.95	<10	0.37	<10	0.12	64
2011LF369B	0.06	<0.5	1	23	8	1	<10	0.09	<10	0.07	139
2011LF394A	0.12	<0.5	1	28	12	0.86	<10	0.54	10	0.13	114
2011LF401A	0.05	<0.5	6	58	33	2.95	10	0.79	10	0.54	721
2011LF408A	0.01	<0.5	1	31	19	2.63	<10	0.41	10	0.09	95
2011LF411B	0.37	0.8	51	566	118	10.35	20	0.82	10	2.66	746
2011LF412B	0.23	3.7	34	194	825	15.4	10	0.6	10	0.72	588
2011LF485A	<0.01	<0.5	4	21	83	3.43	<10	0.16	<10	0.04	134
2011LF498A	0.04	<0.5	1	20	13	1.39	<10	0.95	10	0.15	106
2011LF502A	0.03	<0.5	7	37	20	3.89	10	0.99	20	0.14	141
2011LF507A	0.02	<0.5	3	28	27	4.53	<10	0.19	<10	0.07	126
2011LF528A	16.1	<0.5	11	127	27	4.22	<10	0.15	<10	6.71	1025
2011LF557B	1.32	1	<1	93	218	4.16	10	0.93	40	0.18	82
2011LF587B	9.32	<0.5	17	103	38	3.06	20	0.13	<10	1.97	563
2011RN153A	0.09	<0.5	1	86	39	1.3	10	0.59	<10	0.17	49
2011RN177B	1.58	<0.5	2	15	14	2.73	10	3.71	50	0.31	445
2011RN180B	0.14	<0.5	27	94	2	6.41	30	2.51	20	1.33	1475
2011RN180C	0.04	<0.5	1	17	7	1.05	<10	0.78	<10	0.14	124
2011Z005B	0.38	<0.5	2	11	3	1.41	20	4.36	50	0.1	230
2011Z012E	0.04	<0.5	7	57	13	2.54	10	0.55	10	0.25	513
2011Z024A	0.76	<0.5	2	73	31	2.93	10	2.07	30	0.51	145
2011Z026B	0.01	<0.5	3	33	8	1.37	<10	0.18	10	0.21	102
2011Z028A	0.02	<0.5	2	40	76	3.54	10	0.56	10	0.2	96
2011Z029A	0.08	<0.5	12	52	68	3.25	10	1.34	20	0.68	2180
2011Z044A	0.16	<0.5	7	92	44	4.72	10	1.05	10	1.02	355
2011Z050A	<0.01	<0.5	1	24	5	0.77	<10	0.01	<10	<0.01	70
2011Z059A	0.01	<0.5	1	22	2	0.86	<10	0.02	<10	0.05	74

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011LF317A	2	0.01	6	4480	---	25	---	---	<0.01	6	3
2011LF332A	<1	1.74	1	290	---	20	---	---	<0.01	<5	3
2011LF345A	<1	7.1	4	70	---	<2	---	---	<0.01	<5	1
2011LF365A	1	0.03	11	180	---	4	---	---	<0.01	<5	3
2011LF369B	1	0.03	6	60	---	<2	---	---	<0.01	<5	1
2011LF394A	1	0.06	4	590	---	4	---	---	<0.01	<5	2
2011LF401A	<1	0.71	26	300	---	8	---	---	0.01	<5	6
2011LF408A	10	0.03	16	1300	---	12	---	---	0.01	<5	5
2011LF411B	2	0.1	288	1910	---	5	---	---	0.01	11	36
2011LF412B	11	0.01	304	8900	---	9	---	---	0.02	33	12
2011LF485A	5	0.05	10	830	---	<2	---	---	<0.01	<5	3
2011LF498A	<1	0.3	5	180	---	6	---	---	<0.01	<5	2
2011LF502A	<1	0.12	24	290	---	15	---	---	<0.01	<5	6
2011LF507A	3	0.02	26	1440	---	2	---	---	0.01	5	3
2011LF528A	<1	0.02	74	300	---	<2	---	---	<0.01	16	6
2011LF557B	14	0.01	9	4530	---	30	---	---	1.36	8	12
2011LF587B	<1	1.28	31	60	---	9	---	---	0.01	<5	12
2011RN153A	<1	0.03	31	340	---	<2	---	---	0.01	<5	6
2011RN177B	2	1.3	<1	550	---	14	---	---	0.01	<5	14
2011RN180B	<1	0.81	58	310	---	15	---	---	<0.01	<5	15
2011RN180C	<1	0.24	3	110	---	5	---	---	<0.01	<5	1
2011Z005B	<1	1.7	3	150	---	39	---	---	<0.01	<5	5
2011Z012E	<1	0.3	20	320	---	2	---	---	<0.01	<5	6
2011Z024A	9	0.04	25	6260	---	35	---	---	0.01	11	9
2011Z026B	<1	0.05	8	60	---	<2	---	---	<0.01	<5	2
2011Z028A	<1	0.31	9	320	---	6	---	---	0.03	<5	7
2011Z029A	<1	0.43	45	470	---	11	---	---	0.05	<5	12
2011Z044A	<1	0.55	41	580	---	6	---	---	0.01	<5	13
2011Z050A	<1	0.01	4	10	---	<2	---	---	<0.01	<5	<1
2011Z059A	<1	0.01	2	20	---	<2	---	---	<0.01	<5	<1

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011LF317A	---	20	<20	0.05	<10	10	99	<10	---	180	---
2011LF332A	5	37	40	0.08	<10	10	7	30	30	14	---
2011LF345A	---	30	<20	0.04	<10	30	18	<10	---	6	---
2011LF365A	---	6	<20	0.03	<10	<10	34	<10	---	20	---
2011LF369B	<5	6	<20	0.01	<10	<10	8	<10	<10	9	---
2011LF394A	---	19	<20	0.08	<10	<10	33	<10	---	10	---
2011LF401A	---	44	<20	0.17	<10	<10	79	<10	---	43	---
2011LF408A	---	30	<20	0.07	<10	<10	123	<10	---	120	---
2011LF411B	---	23	<20	1.04	<10	<10	281	<10	---	207	---
2011LF412B	---	150	<20	0.35	<10	10	135	10	---	1550	---
2011LF485A	---	8	<20	0.03	<10	10	88	<10	---	15	---
2011LF498A	---	21	<20	0.11	<10	<10	17	10	---	12	---
2011LF502A	---	109	<20	0.15	<10	<10	47	10	---	65	---
2011LF507A	---	10	<20	0.04	<10	<10	89	<10	---	106	---
2011LF528A	---	57	<20	0.1	<10	<10	64	<10	---	37	---
2011LF557B	---	170	<20	0.28	<10	<10	538	<10	---	116	---
2011LF587B	---	569	<20	0.12	<10	10	88	<10	---	59	---
2011RN153A	---	23	<20	0.13	<10	<10	55	<10	---	89	---
2011RN177B	8	176	20	0.22	<10	<10	38	220	220	39	---
2011RN180B	<5	92	<20	0.38	<10	<10	123	<10	20	130	---
2011RN180C	<5	20	<20	0.03	<10	<10	5	<10	<10	8	---
2011Z005B	5	68	40	0.1	<10	<10	9	20	10	19	---
2011Z012E	---	15	<20	0.21	<10	<10	54	<10	---	36	---
2011Z024A	---	111	<20	0.17	<10	<10	552	<10	---	158	---
2011Z026B	---	3	<20	0.06	<10	<10	19	<10	---	13	---
2011Z028A	---	123	<20	0.16	<10	<10	64	<10	---	42	---
2011Z029A	---	70	<20	0.17	<10	<10	106	<10	---	100	---
2011Z044A	---	78	<20	0.42	<10	<10	127	<10	---	130	---
2011Z050A	---	1	<20	<0.01	<10	<10	1	<10	---	<2	---
2011Z059A	---	<1	<20	<0.01	<10	<10	4	<10	---	5	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011Z061A	<0.001	---	---	---	<0.5	0.01	6	---	<10	<0.5	<2
2011Z072B^	0.006	---	---	---	<0.5	0.87	31	---	90	<0.5	<2
2011Z073A^	0.008	---	---	---	<0.5	1.32	14	---	120	0.8	<2
2011Z075A^	0.012	---	---	---	<0.5	1.28	14	---	90	0.8	<2
2011Z078B^	0.009	---	---	---	0.7	1.15	67	---	280	0.8	<2
2011Z082B^	0.001	---	---	---	0.5	2.37	6	---	90	4.7	145
2011Z088B^	<0.001	---	---	---	<0.5	0.05	11	---	10	<0.5	<2
2011Z093A	<0.001	---	---	---	0.6	6.12	8	---	30	7.8	<2
2011Z095A^	<0.001	---	---	---	<0.5	6.03	6	---	20	18	<2
2011Z097A	<0.001	---	---	---	1.3	6.05	<5	---	130	44.4	<2
2011Z098A	<0.001	---	---	---	6.8	6.73	50	---	90	90.1	15
2011Z104A	0.001	---	---	---	0.6	4.75	20	---	530	1.6	<2
2011Z107B	<0.001	---	---	---	<0.5	0.72	<5	---	40	<0.5	<2
2011Z111A	<0.001	---	---	---	<0.5	6	14	---	240	1.3	<2
2011Z116A	<0.001	---	---	---	<0.5	8.01	62	---	790	2.9	<2
2011Z120A	<0.001	---	---	---	<0.5	2.15	6	---	320	0.6	<2
2011Z121B	<0.001	---	---	---	<0.5	7.3	14	---	540	2	<2
2011Z130A	<0.001	---	---	---	<0.5	1.04	5	---	180	0.5	<2
2011Z135C	<0.001	---	---	---	<0.5	0.39	<5	---	40	<0.5	<2
2011Z149A	---	0.001	---	---	<0.5	6.26	13	---	200	0.5	2
2011Z161B	<0.001	---	---	---	11.9	6.72	17	---	410	4.7	35
2011Z162B	<0.001	---	---	---	<0.5	0.27	163	---	10	<0.5	2
2011Z162C	0.01	---	---	---	<0.5	0.32	1710	---	10	<0.5	5
2011Z163B	0.009	---	---	---	<0.5	1.3	18	---	20	<0.5	<2
2011Z166B	<0.001	---	---	---	<0.5	2.32	9	---	70	<0.5	<2
2011Z174C	0.004	---	---	---	<0.5	1.94	<5	---	300	<0.5	<2
2011Z205B	<0.001	---	---	---	<0.5	0.3	<5	---	30	<0.5	<2
2011Z245A	<0.001	---	---	---	<0.5	8.58	<5	---	440	2.8	<2
2011Z246A	0.001	---	---	---	<0.5	8.77	10	---	720	2.3	<2
2011Z260C	<0.001	---	---	---	<0.5	5.56	<5	---	580	2.6	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011Z061A	<0.01	<0.5	<1	23	2	0.73	<10	<0.01	<10	<0.01	73
2011Z072B^	0.01	<0.5	<1	23	96	6.98	10	0.24	<10	0.06	58
2011Z073A^	0.01	<0.5	1	32	614	0.84	<10	0.38	<10	0.15	57
2011Z075A^	0.02	<0.5	1	35	109	1.79	<10	0.42	10	0.2	88
2011Z078B^	0.27	0.5	5	46	54	7.15	<10	0.3	10	0.16	261
2011Z082B^	0.13	<0.5	2	14	10	2.74	10	0.98	50	0.05	545
2011Z088B^	<0.01	<0.5	1	22	3	0.85	<10	0.01	<10	0.01	1195
2011Z093A	0.19	<0.5	<1	6	3	1.73	20	3.84	10	0.04	376
2011Z095A^	0.3	<0.5	1	7	4	1.63	20	3.61	20	0.03	569
2011Z097A	0.23	0.5	2	4	6	5.44	20	2.23	30	0.06	3730
2011Z098A	0.88	<0.5	5	3	15	8.22	30	2.24	20	0.04	4640
2011Z104A	0.02	<0.5	6	62	43	4.1	10	1.2	30	0.57	236
2011Z107B	0.05	<0.5	3	28	7	1.35	<10	0.17	<10	0.07	154
2011Z111A	0.39	<0.5	6	53	3	2.75	20	0.42	30	1.09	279
2011Z116A	2.75	<0.5	11	23	45	3.26	20	2.08	50	0.74	420
2011Z120A	0.05	<0.5	3	25	12	2.36	<10	0.81	10	0.18	204
2011Z121B	0.23	<0.5	19	180	66	5.16	10	1.73	30	1.47	1445
2011Z130A	0.01	<0.5	5	26	20	1.46	<10	0.55	<10	0.13	1330
2011Z135C	0.02	<0.5	<1	16	2	1.04	<10	0.16	<10	0.03	107
2011Z149A	0.17	<0.5	12	291	36	4.08	10	0.31	20	2.55	329
2011Z161B	8.06	12.9	11	39	60	6.92	20	0.83	30	3.83	2890
2011Z162B	0.03	<0.5	13	19	9	1.62	<10	0.1	<10	0.02	355
2011Z162C	0.03	<0.5	28	19	69	3.52	<10	0.1	10	0.02	499
2011Z163B	2.43	<0.5	14	53	52	2.77	<10	0.1	<10	0.52	416
2011Z166B	2.41	<0.5	13	96	28	2.96	<10	0.02	<10	1.17	498
2011Z174C	0.66	<0.5	3	27	13	1.22	<10	0.11	<10	0.26	232
2011Z205B	0.01	<0.5	<1	30	5	1.07	<10	0.05	<10	0.06	104
2011Z245A	0.15	<0.5	19	89	23	5.72	20	2.37	30	1.11	2400
2011Z246A	1.8	<0.5	9	93	49	4.07	30	3.91	20	1.43	681
2011Z260C	0.55	<0.5	2	17	6	1.03	10	4.63	20	0.08	110

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011Z061A	<1	<0.01	2	10	---	<2	---	---	<0.01	<5	<1
2011Z072B^	5	0.01	2	2110	---	8	---	---	0.02	<5	2
2011Z073A^	3	0.04	4	2180	---	5	---	---	0.01	<5	3
2011Z075A^	4	0.01	13	1000	---	10	---	---	0.01	<5	3
2011Z078B^	13	0.01	48	4900	---	12	---	---	0.05	18	4
2011Z082B^	12	0.03	5	120	---	56	---	---	0.01	<5	2
2011Z088B^	<1	<0.01	5	40	---	3	---	---	<0.01	<5	<1
2011Z093A	<1	2.14	1	70	---	39	---	---	<0.01	5	3
2011Z095A^	<1	2.07	<1	280	---	23	---	---	<0.01	<5	4
2011Z097A	2	1.51	<1	60	---	136	---	---	<0.01	<5	4
2011Z098A	5	1.98	<1	40	---	380	---	---	<0.01	<5	4
2011Z104A	<1	0.31	25	420	---	98	---	---	0.01	<5	10
2011Z107B	3	0.04	4	190	---	3	---	---	<0.01	<5	1
2011Z111A	<1	0.48	17	570	---	10	---	---	<0.01	<5	16
2011Z116A	<1	2.31	13	790	---	17	---	---	0.06	<5	10
2011Z120A	<1	0.09	9	270	---	2	---	---	<0.01	5	3
2011Z121B	<1	0.86	75	1170	---	29	---	---	<0.01	6	13
2011Z130A	9	0.02	11	180	---	15	---	---	<0.01	<5	3
2011Z135C	<1	0.02	1	150	---	6	---	---	<0.01	<5	1
2011Z149A	<1	2.72	137	760	---	13	0.002	<0.005	0.01	<5	10
2011Z161B	<1	1.34	20	570	---	1900	---	---	0.06	5	12
2011Z162B	<1	0.01	11	40	---	7	---	---	<0.01	<5	1
2011Z162C	<1	0.01	49	60	---	4	---	---	0.02	11	1
2011Z163B	<1	0.11	36	160	---	3	---	---	<0.01	<5	7
2011Z166B	<1	0.33	35	200	---	4	---	---	<0.01	<5	9
2011Z174C	<1	1.25	14	230	---	4	---	---	<0.01	<5	2
2011Z205B	<1	0.02	4	40	---	<2	---	---	<0.01	<5	1
2011Z245A	3	0.63	40	400	---	64	---	---	<0.01	5	15
2011Z246A	5	0.98	22	260	---	22	---	---	0.24	<5	16
2011Z260C	1	1.29	1	400	---	22	---	---	<0.01	<5	1

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011Z061A	---	<1	<20	<0.01	<10	<10	1	<10	---	2	---
2011Z072B^	---	5	<20	0.04	<10	<10	135	<10	---	12	---
2011Z073A^	---	9	<20	0.07	<10	<10	52	<10	---	26	---
2011Z075A^	---	9	<20	0.06	<10	10	159	<10	---	47	---
2011Z078B^	---	31	<20	0.05	<10	<10	307	<10	---	384	---
2011Z082B^	62	5	70	0.05	<10	20	6	10	10	104	---
2011Z088B^	---	2	<20	<0.01	<10	<10	4	<10	---	10	---
2011Z093A	<5	20	40	0.03	<10	30	3	<10	10	199	---
2011Z095A^	29	11	50	0.04	<10	20	2	760	620	16	---
2011Z097A	80	45	60	0.04	<10	20	2	<10	20	534	---
2011Z098A	473	59	50	0.03	<10	20	1	<10	30	523	---
2011Z104A	---	45	<20	0.22	<10	<10	104	<10	---	129	---
2011Z107B	---	13	<20	0.02	<10	<10	5	<10	---	12	---
2011Z111A	---	70	20	0.35	<10	<10	129	<10	---	39	---
2011Z116A	---	586	20	0.27	<10	<10	70	<10	---	35	---
2011Z120A	---	17	<20	0.07	<10	<10	21	<10	---	16	---
2011Z121B	---	91	<20	0.26	<10	<10	131	<10	---	111	---
2011Z130A	---	14	<20	0.05	<10	<10	143	<10	---	34	---
2011Z135C	---	6	<20	0.01	<10	<10	5	<10	---	11	---
2011Z149A	---	21	<20	0.19	<10	<10	119	<10	---	96	---
2011Z161B	187	139	<20	0.35	<10	<10	64	<10	40	2630	---
2011Z162B	<5	5	<20	0.01	<10	<10	4	<10	<10	12	---
2011Z162C	<5	15	<20	0.01	<10	<10	3	<10	10	7	---
2011Z163B	---	40	<20	0.13	<10	10	44	<10	---	39	---
2011Z166B	---	105	<20	0.22	<10	<10	91	<10	---	27	---
2011Z174C	---	125	<20	0.06	<10	10	22	<10	---	20	---
2011Z205B	---	3	<20	0.01	<10	<10	7	<10	---	13	---
2011Z245A	19	69	<20	0.4	<10	<10	100	10	30	160	---
2011Z246A	<5	283	<20	0.32	<10	<10	128	<10	10	58	---
2011Z260C	<5	175	20	0.06	<10	10	6	<10	<10	15	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011Z271B	<0.001	---	---	---	<0.5	6.06	<5	---	20	0.6	<2
2011Z302A	0.007	---	---	---	<0.5	1.21	18	---	120	<0.5	<2
2011Z309A	0.003	---	---	---	<0.5	1.47	13	---	100	0.5	<2
2011Z312A	0.001	---	---	---	<0.5	0.87	<5	---	320	<0.5	<2
2011Z314A	0.01	---	---	---	<0.5	2.1	6	---	170	0.9	<2
2011Z316A	0.005	---	---	---	<0.5	1.03	7	---	270	<0.5	<2
2011Z345B	0.002	---	---	---	0.6	6.06	3340	---	550	1.7	<2
2011Z349A	<0.001	---	---	---	<0.5	8.25	23	---	110	<0.5	2
2011Z362A	<0.001	---	---	---	<0.5	0.55	12	---	80	<0.5	<2
2011Z366B	0.004	---	---	---	<0.5	1.1	7	---	90	<0.5	2
2011Z380A	0.091	---	---	---	<0.5	8.57	148	---	560	1	<2
2011Z382A	0.002	---	---	---	<0.5	6.2	50	---	630	1.2	<2
2011Z383B	0.008	---	---	---	<0.5	6.88	23	---	960	0.9	<2
2011Z384A	0.001	---	---	---	<0.5	1.62	6	---	110	0.5	<2
2011Z385A	<0.001	---	---	---	<0.5	1.08	16	---	10	<0.5	<2
2011Z389A	0.008	---	---	---	<0.5	1.72	6	---	140	0.5	<2
2011Z393A	0.003	---	---	---	<0.5	4	53	---	490	1	<2
2011Z395C	0.005	---	---	---	<0.5	2.61	285	---	160	0.8	2
2011Z399A	0.004	---	---	---	<0.5	7.52	143	---	980	1.6	<2
2011Z403A	0.002	---	---	---	<0.5	2.34	83	---	210	0.7	2
2011Z407A	0.005	---	---	---	<0.5	3.13	96	---	300	0.9	<2
2011Z408A	0.006	---	---	---	0.8	2.68	542	---	810	0.8	<2
2011Z408B	0.002	---	---	---	<0.5	0.43	428	---	50	0.6	<2
2011Z425C	0.002	---	---	---	<0.5	0.63	5	---	190	<0.5	<2
2011Z426A	0.151	---	---	---	<0.5	0.86	5	---	4010	<0.5	<2
2011Z437B	<0.001	---	---	---	<0.5	1.17	6	---	160	<0.5	<2
2011Z441B	0.002	---	---	---	<0.5	5.74	11	---	610	1.5	<2
2011Z448B	0.01	---	---	---	<0.5	1.51	28	---	80	<0.5	3
2011Z455C	<0.001	---	---	---	<0.5	0.06	<5	---	20	<0.5	<2
2011Z480A	0.067	---	---	---	9	2.55	448	---	520	0.9	2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011Z271B	0.09	<0.5	10	67	49	3.28	10	0.05	20	0.96	197
2011Z302A	0.04	<0.5	2	37	48	1.65	<10	0.48	10	0.11	118
2011Z309A	0.01	<0.5	1	27	50	3.02	<10	0.54	10	0.12	86
2011Z312A	0.01	<0.5	1	29	329	0.76	<10	0.27	<10	0.13	67
2011Z314A	0.01	<0.5	<1	32	37	1.47	<10	0.2	<10	0.06	56
2011Z316A	0.02	<0.5	1	31	61	1.58	<10	0.38	<10	0.11	109
2011Z345B	0.28	1.4	14	83	317	24.2	10	1.27	30	0.82	511
2011Z349A	5.61	0.5	49	75	167	9.14	20	0.05	<10	4.26	1650
2011Z362A	0.03	<0.5	2	25	10	1.18	<10	0.13	<10	0.06	152
2011Z366B	0.03	<0.5	2	45	9	1.92	<10	0.16	<10	0.33	132
2011Z380A	0.07	<0.5	19	44	65	6.32	20	1.37	10	1.9	675
2011Z382A	0.03	0.5	23	146	129	12.4	10	1.21	20	0.92	1115
2011Z383B	0.03	0.5	9	17	9	4.13	20	1.12	20	1.04	252
2011Z384A	0.01	<0.5	1	29	20	1.3	<10	0.34	<10	0.23	72
2011Z385A	0.01	0.5	91	1680	10	6.01	<10	0.01	10	22.4	658
2011Z389A	0.04	<0.5	1	41	17	1.19	<10	0.68	10	0.22	54
2011Z393A	0.04	<0.5	7	50	17	2.78	10	1.14	20	0.41	358
2011Z395C	0.01	1	4	31	38	3.13	10	0.53	10	0.15	143
2011Z399A	0.02	<0.5	14	67	31	5.29	20	2.54	30	0.59	803
2011Z403A	0.01	<0.5	3	29	20	1.61	10	0.72	10	0.13	123
2011Z407A	0.02	<0.5	3	37	13	1.7	10	0.85	10	0.14	75
2011Z408A	0.02	1	24	30	62	5.11	<10	0.93	20	0.13	11200
2011Z408B	0.02	<0.5	19	30	102	11.45	<10	0.04	<10	0.03	434
2011Z425C	0.06	<0.5	1	19	10	1.13	<10	0.17	<10	0.11	97
2011Z426A	<0.01	<0.5	<1	21	8	0.71	<10	0.37	<10	0.11	27
2011Z437B	0.05	<0.5	3	25	22	2.17	<10	0.31	10	0.04	106
2011Z441B	0.13	<0.5	7	67	36	3.55	10	1.4	40	0.55	198
2011Z448B	0.01	<0.5	6	28	68	10.05	<10	0.24	10	0.05	205
2011Z455C	0.44	<0.5	1	10	2	0.85	<10	0.01	<10	0.21	101
2011Z480A	8.84	0.7	12	17	39	7.39	10	0.55	10	3.41	11750

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011Z271B	2	4.13	39	410	---	28	---	---	0.01	5	4
2011Z302A	4	0.01	8	700	---	20	---	---	0.03	<5	3
2011Z309A	5	0.02	9	760	---	6	---	---	0.02	<5	5
2011Z312A	2	0.01	4	1290	---	4	---	---	<0.01	<5	2
2011Z314A	4	0.01	4	>10000	10450	4	---	---	<0.01	<5	2
2011Z316A	1	0.01	7	250	---	4	---	---	<0.01	<5	3
2011Z345B	3	0.2	68	3280	---	17	---	---	0.04	6	15
2011Z349A	<1	2.57	60	390	---	2	---	---	0.15	6	50
2011Z362A	<1	0.03	3	100	---	3	---	---	<0.01	<5	1
2011Z366B	<1	0.06	11	150	---	12	---	---	0.01	<5	3
2011Z380A	<1	1.04	24	340	---	15	---	---	0.01	5	24
2011Z382A	4	0.63	104	860	---	13	---	---	0.01	<5	22
2011Z383B	<1	0.79	11	270	---	<2	---	---	<0.01	<5	13
2011Z384A	<1	0.11	7	160	---	2	---	---	<0.01	<5	4
2011Z385A	<1	0.01	1810	50	---	2	---	---	<0.01	11	10
2011Z389A	1	0.01	12	400	---	6	---	---	<0.01	<5	4
2011Z393A	<1	0.3	22	200	---	6	---	---	<0.01	<5	6
2011Z395C	<1	0.32	14	420	---	17	---	---	<0.01	<5	3
2011Z399A	<1	0.31	34	490	---	29	---	---	<0.01	<5	14
2011Z403A	<1	0.17	9	250	---	7	---	---	<0.01	<5	3
2011Z407A	<1	0.29	9	120	---	5	---	---	<0.01	<5	5
2011Z408A	3	0.11	24	690	---	16	---	---	<0.01	<5	4
2011Z408B	4	0.02	40	1570	---	2	---	---	<0.01	6	2
2011Z425C	1	0.03	10	270	---	<2	---	---	<0.01	<5	1
2011Z426A	1	0.01	2	40	---	5	---	---	0.05	<5	2
2011Z437B	1	0.08	13	250	---	7	---	---	0.01	<5	3
2011Z441B	<1	0.44	23	920	---	12	---	---	0.01	<5	11
2011Z448B	4	0.01	27	1840	---	14	---	---	0.01	7	3
2011Z455C	<1	0.01	2	100	---	<2	---	---	<0.01	<5	<1
2011Z480A	2	0.12	19	280	---	833	---	---	3.75	15	5

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011Z271B	---	26	<20	0.14	<10	10	44	<10	---	103	---
2011Z302A	---	81	<20	0.06	<10	<10	102	<10	---	29	---
2011Z309A	---	10	<20	0.06	<10	<10	85	<10	---	34	---
2011Z312A	---	6	<20	0.04	<10	<10	168	<10	---	24	---
2011Z314A	---	9	<20	0.03	<10	<10	205	<10	---	10	---
2011Z316A	---	4	<20	0.05	<10	<10	65	<10	---	19	---
2011Z345B	<5	59	20	0.1	<10	<10	147	<10	70	488	---
2011Z349A	---	152	<20	0.77	<10	10	361	<10	---	108	---
2011Z362A	---	4	<20	0.02	<10	<10	7	<10	---	12	---
2011Z366B	---	7	<20	0.06	<10	<10	24	<10	---	38	---
2011Z380A	---	48	<20	0.19	<10	<10	171	<10	---	217	---
2011Z382A	---	50	<20	0.14	<10	<10	193	<10	---	220	---
2011Z383B	---	59	<20	0.22	<10	<10	57	<10	---	87	---
2011Z384A	---	16	<20	0.08	<10	<10	46	<10	---	26	---
2011Z385A	---	1	<20	0.01	<10	<10	52	<10	---	52	---
2011Z389A	---	10	<20	0.08	<10	<10	193	<10	---	39	---
2011Z393A	---	38	<20	0.12	<10	<10	38	<10	---	38	---
2011Z395C	---	45	<20	0.06	<10	<10	22	<10	---	50	---
2011Z399A	---	47	<20	0.16	<10	<10	76	<10	---	87	---
2011Z403A	---	28	<20	0.07	<10	<10	18	<10	---	26	---
2011Z407A	---	34	<20	0.11	<10	<10	31	<10	---	22	---
2011Z408A	---	67	<20	0.06	<10	<10	57	<10	---	71	---
2011Z408B	---	5	<20	0.01	<10	<10	22	<10	---	116	---
2011Z425C	---	7	<20	0.03	<10	<10	22	<10	---	15	---
2011Z426A	---	6	<20	0.04	<10	<10	72	<10	---	13	---
2011Z437B	---	11	<20	0.07	<10	<10	34	<10	---	27	---
2011Z441B	---	64	<20	0.17	<10	<10	112	<10	---	83	---
2011Z448B	---	26	<20	0.06	<10	<10	92	<10	---	235	---
2011Z455C	---	4	<20	<0.01	<10	<10	2	<10	---	13	---
2011Z480A	27	150	<20	0.08	<10	<10	55	<10	20	247	---

Table 2. (continued)

Sample_ID	Au_ppm	Au_ppm_2	Au_ppm_3	Au_ppm_4	Ag_ppm	Al_pct	As_ppm	As_pct	Ba_ppm	Be_ppm	Bi_ppm
2011Z482A	0.004	---	---	---	<0.5	8.28	30	---	1350	2.5	<2
2011Z488B	<0.001	---	---	---	<0.5	1.36	<5	---	180	<0.5	<2

Table 2. (continued)

Sample_ID	Ca_pct	Cd_ppm	Co_ppm	Cr_ppm	Cu_ppm	Fe_pct	Ga_ppm	K_pct	La_ppm	Mg_pct	Mn_ppm
2011Z482A	0.08	0.5	15	95	49	5.09	20	2.47	10	1.22	259
2011Z488B	0.1	<0.5	5	28	34	1.91	<10	0.3	10	0.18	135

Table 2. (continued)

Sample_ID	Mo_ppm	Na_pct	Ni_ppm	P_ppm	P_ppm_2	Pb_ppm	Pd_ppm	Pt_ppm	S_pct	Sb_ppm	Sc_ppm
2011Z482A	3	0.56	47	510	---	14	---	---	0.01	<5	21
2011Z488B	1	0.11	18	450	---	6	---	---	0.01	<5	3

Table 2. (continued)

Sample_ID	Sn_ppm	Sr_ppm	Th_ppm	Ti_pct	Tl_ppm	U_ppm	V_ppm	W_ppm	W_ppm_2	Zn_ppm	Zn_pct
2011Z482A	---	74	<20	0.11	<10	<10	257	<10	---	153	---
2011Z488B	---	15	<20	0.03	<10	<10	34	<10	---	53	---

Table 3. Detection limits and geochemical methods for trace-element analyses of rock samples.

Chemex codes include:

Au-ICP21 = fire assay–inductively coupled plasma–atomic emission spectroscopy

PGM-ICP23 = fire assay–inductively coupled plasma–atomic emission spectroscopy

AU-GRA21 = fire assay with gravimetric determination

ME-ICP61= inductively coupled plasma–atomic emission spectroscopy after four-acid digestion

As-OG62 = high-grade inductively coupled plasma–atomic emission spectroscopy after four-acid digestion

P-ICP61a = high-grade inductively coupled plasma–atomic emission spectroscopy after four-acid digestion

ME-XRF05 = pressed pellet wavelength dispersive X-ray fluorescence;

Zn-OG62 = high-grade inductively coupled plasma–atomic emission spectroscopy after four-acid digestion

Analytical methods include:

FA-ICP-AES = fire assay–inductively coupled plasma–atomic emission spectroscopy

FA-GRAV = fire assay with gravimetric determination

ICP-AES = inductively coupled plasma–atomic emission spectroscopy

pressed pellet-XRF = pressed pellet X-ray fluorescence

Digestions include:

4 acid = HNO_3–$HClO_4$–HF + HCl

FA = Fire assay fusion

--- = digestion not applicable

NOTE: * = possible incomplete digestion of this element dependent on sample matrix; ppm = parts per million; pct = percent

		ALS Chemex				
Header	Element	Lower Detection Limit	Upper Detection Limit	Chemex Code	Analytical Method	Digestion
Au_ppm	Gold	0.001	10	Au-ICP21	FA-ICP-AES	FA
Au_ppm_2	Gold	0.001	10	PGM-ICP23	ICP-AES	FA
Au_ppm_3	Gold	0.001	10	Au-ICP21	FA-ICP-AES	FA
Au_ppm_4	Gold	0.05	1,000	Au-GRA21	FA-GRAV	FA
Ag_ppm	Silver	0.5	100	ME-ICP61	ICP-AES	4 Acid
Al_pct	Aluminum	0.01	50	ME-ICP61	ICP-AES	4 Acid
As_ppm	Arsenic	5	10,000	ME-ICP61	ICP-AES	4 Acid
As_pct	Arsenic	0.01	30	As-OG62	ICP-AES	4 Acid
Ba_ppm	Barium*	10	10,000	ME-ICP61	ICP-AES	4 Acid
Be_ppm	Beryllium*	0.5	1,000	ME-ICP61	ICP-AES	4 Acid
Bi_ppm	Bismuth	2	10,000	ME-ICP61	ICP-AES	4 Acid
Ca_pct	Calcium	0.01	50	ME-ICP61	ICP-AES	4 Acid
Cd_ppm	Cadmium	0.5	1,000	ME-ICP61	ICP-AES	4 Acid
Co_ppm	Cobalt	1	10,000	ME-ICP61	ICP-AES	4 Acid
Cr_ppm	Chromium*	1	10,000	ME-ICP61	ICP-AES	4 Acid
Cu_ppm	Copper	1	10,000	ME-ICP61	ICP-AES	4 Acid
Fe_pct	Iron	0.01	50	ME-ICP61	ICP-AES	4 Acid
Ga_ppm	Gallium	10	10,000	ME-ICP61	ICP-AES	4 Acid
K_pct	Potassium	0.01	10	ME-ICP61	ICP-AES	4 Acid
La_ppm	Lanthanum	10	10,000	ME-ICP61	ICP-AES	4 Acid
Mg_pct	Magnesium	0.01	50	ME-ICP61	ICP-AES	4 Acid
Mn_ppm	Manganese	5	100,000	ME-ICP61	ICP-AES	4 Acid

Table 3. (continued)

Header	Element	ALS Chemex				
		Lower Detection Limit	Upper Detection Limit	Chemex Code	Analytical Method	Digestion
Mo_ppm	Molybdenum	1	10,000	ME-ICP61	ICP-AES	4 Acid
Na_pct	Sodium	0.01	10	ME-ICP61	ICP-AES	4 Acid
Ni_ppm	Nickle	1	10,000	ME-ICP61	ICP-AES	4 Acid
P_ppm	Phosphorous	10	10,000	ME-ICP61	ICP-AES	4 Acid
P_ppm_2	Phosphorous	50	100,000	P-ICP61a	ICP-AES	4 Acid
Pb_ppm	Lead	2	10,000	ME-ICP61	ICP-AES	4 Acid
Pd_ppm	Palladium	0.001	10	PGM-ICP23	FA-ICP-AES	FA
Pt_ppm	Platinum	0.005	10	PGM-ICP23	FA-ICP-AES	FA
S_pct	Sulfur	0.01	10	ME-ICP61	ICP-AES	4 Acid
Sb_ppm	Antimony	5	10,000	ME-ICP61	ICP-AES	4 Acid
Sc_ppm	Scandium	1	10,000	ME-ICP61	ICP-AES	4 Acid
Sn_ppm	Tin	5	10,000	ME-XRF05	Pressed pellet–XRF	---
Sr_ppm	Strontium	1	10,000	ME-ICP61	ICP-AES	4 Acid
Th_ppm	Thorium	20	10,000	ME-ICP61	ICP-AES	4 Acid
Ti_pct	Titanium*	0.01	10	ME-ICP61	ICP-AES	4 Acid
Tl_ppm	Thallium	10	10,000	ME-ICP61	ICP-AES	4 Acid
U_ppm	Uranium	10	10,000	ME-ICP61	ICP-AES	4 Acid
V_ppm	Vanadium	1	10,000	ME-ICP61	ICP-AES	4 Acid
W_ppm	Tungston*	10	10,000	ME-ICP61	ICP-AES	4 Acid
W_ppm_2	Tungston	10	10,000	ME-XRF05	Pressed pellet–XRF	---
Zn_ppm	Zinc	2	10,000	ME-ICP61	ICP-AES	4 Acid
Zn_pct	Zinc	0.001	30	Zn-OG62	ICP-AES	4 Acid

Table 4. Location and description of rocks collected for major-oxide, minor-oxide, and trace-element analyses in the Moran area, Tanana and Melozitna quadrangles, Alaska.

NOTE: Coordinates are based on NAD 27

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE096A	65.484811	-152.812298	508691	7262309	5N	Biotite-muscovite granite (Alkali-feldspar granite); medium grained, light pink to pale pinkish gray, equigranular, and massive. Rock is 12% biotite and contains subhedral quartz, euhedral potassium feldspar, and occasional pink megacrysts up to 1.5 cm long. 100% of exposure.
2011BAE100A	65.487364	-152.831978	507779	7262591	5N	Biotite-muscovite monzogranite (Syenogranite); medium grained, equigranular, and massive. Minerals include minor muscovite, 10-12% 1-3 cm clean biotite books, occasional euhedral potassium feldspar megacrysts that are up to 1.5 cm long and have clean, straight matrix contacts, and smoky, subhedral quartz phenocrysts that can be rounded. 100% of exposure.
2011BAE107C	65.484924	-152.858386	506557	7262316	5N	Aplite dike (Syenogranitic aplite dike); fine grained, pink and aphanitic. Occasional visible quartz or quartz and feldspar crystals near granite margins. 5% of exposure.
2011BAE108A	65.483016	-152.861506	506413	7262103	5N	Biotite granite (Syenogranite); equigranular, homogenous, and massive. Minerals include 10-12% biotite, occasional 0.5-1.5-cm potassium feldspar megacrysts, and subhedral smoky quartz. Selected sample of unweathered material. 100% of exposure.
2011BAE112A	65.478624	-152.877227	505686	7261612	5N	Biotite granite (Syenogranite); coarse-grained, equigranular, homogenous, and light pink to white. Minerals include 3-5 mm (slightly larger than matrix) potassium feldspar, dark gray to smoky quartz, and light gray, interstitial late quartz. Rock contains 10-12 % 1-3 mm biotite crystals and possibly minor muscovite. Quartz and mica crystals define very subtle alignment planes. 100% of exposure.
2011BAE202A	65.456879	-152.502041	523081	7259274	5N	Metagabbro (Metagabbro); rock is medium grained (1-2 mm), pale green (epidotized feldspar?) to dark, olive green, massive, homogenous, and mafic. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE246B	65.326011	-152.904815	504434	7244600	5N	Gabbro (Gabbro); medium grained, massive, and homogenous. Rock color is a mottled gray, possibly with some lighter colors and/or spots of iron oxide. Rock cleaves into tabular chunks. 25% of exposure.
2011BAE247A	65.325527	-152.905396	504407	7244546	5N	Metagabbro (Metagabbro); medium grained and crumbly. Fresh rock color is a mottled gray with green, unoriented actinolite crystals and possibly some lighter colors and/or spots of iron oxide. Rock weathers brown. 100% of exposure.
2011BAE272A	65.446956	-152.980072	500924	7258077	5N	Monzogranite (Monzogranite); coarse grained, massive, and homogenous. Minerals include 5% grayish biotite, gray quartz, slightly porphyritic potassium feldspar, and white plagioclase. Grus weathering covers outcrop. Selected sample of fresh material. 100% of exposure.
2011BAE290A	65.461131	-152.941999	502688	7259658	5N	Monzogranite (Syenogranite); coarse grained, pink to grayish pink, equigranular, massive, and homogenous. Minerals are equally distributed, and include slightly porphyritic (?) potassium feldspar and 10% biotite. 90% of exposure.
2011BAE290B	65.461131	-152.941999	502688	7259658	5N	Granite aplite (Syenogranitic aplite); fine to medium grained with occasional larger 1-5 mm biotite, 2-5 mm quartz, and 2 mm-1 cm potassium feldspar. Fresh rock is pink, but has a white weathering rind. 10% of exposure.
2011BAE337A	65.325190	-153.102222	495238	7244509	5N	Mica-feldspar-quartz porphyroclastic schist (Metagabbro); gray, fine to coarse grained, and granular with platy schistosity. Minerals include quartz or feldspar in foliation planes and a gray mica (biotite/chlorite?). 100% of exposure.
2011BAE351C	65.462650	-152.805055	509034	7259840	5N	Basalt (Basalt); fine grained, black, massive, homogenous, and undeformed. Rock has blocky, angular parting and sooty surfaces. Visible minerals include amphibole and plagioclase. 49% of exposure. Trace.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE357A	65.463469	-152.787267	509858	7259934	5N	Biotite-muscovite granite (Alkali-feldspar granite); fine to medium grained (1-2 mm), massive, homogenous, equigranular, and pink. Minerals include 5% muscovite, 5-10% biotite, and occasional 3-5 mm potassium feldspar megacrysts. 50% of exposure.
2011BAE357B	65.463469	-152.787267	509858	7259934	5N	Biotite granite (Syenogranite); medium grained (3-4 mm), pink, granular, homogenous, and massive. Minerals include 1 % muscovite, 5-10% biotite, slightly porphyritic (5-8 mm) potassium feldspar crystals, 3-6 mm drusy quartz, and occasional iridescent, smoky quartz. 50% of exposure.
2011BAE359B	65.462807	-152.782460	510081	7259861	5N	Dacite dike (Rhyolite dike); very fine to fine grained, light gray, massive, homogenous, and porphyritic. Minerals include euhedral feldspars and quartz phenocrysts as well spots of iron oxide. 10% of exposure.
2011BAE359C	65.462807	-152.782460	510081	7259861	5N	Dacite dike (Rhyolite dike); very fine grained, light gray, massive, homogenous, and aphanitic. Rock contains small, 1-2 mm brown spots (biotite clots after clinopyroxene?) and occasional small, euhedral quartz or light feldspar. 10% of exposure.
2011BAE363A	65.467260	-152.771848	510571	7260359	5N	Biotite granite (Syenogranite); coarse-grained, pink, massive, homogenous, and aphanitic. Rock contains large, 2-3 cm potassium feldspar megacrysts and 15% 2-4 mm biotites in a coarse interstitial granitic material. The rock's weathered surface shows aligned, brittle shear. 75% of exposure.
2011GG007A	65.297564	-152.862566	506409	7241433	5N	Chlorite-amphibole schist (Metagabbro); gray-green weathering, medium-grained, light green, and granular rock with moderately well-developed schistose foliation defined by aligned chlorite (20-30%) and amphiboles (20-30%). Plagioclase (50%) comprises remainder of rock. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011GG084A	65.462452	-152.819471	508366	7259816	5N	Granite (Syenogranite); white to tan with black specks. Rock weathers orange to brown. Minerals include 55% 1 mm subhedral quartz, 35% 1 mm subhedral feldspar, 10% 1-4 mm euhedral biotite, and 5% localized muscovite. 50% of exposure.
2011GG426A	65.392661	-153.402776	481285	7252085	5N	Microgabbro (Microgabbro); fine-grained, black, slightly foliated. Minerals include approximately equal amounts of plagioclase, amphibole, and pyroxene. Plagioclase and amphibole crystals are locally aligned. 100% of exposure.
2011GG434A	65.387237	-153.376764	482490	7251473	5N	Granite (Syenogranite); contact between a fine-grained and medium-grained granite. Both rocks appear to have the same composition: 20% anhedral, smoky quartz; 70-75% sub to anhedral feldspar; and 5-10% subhedral biotite. The fine-grained rock has mostly equant grains (3-5 mm) with some feldspars up to 25 mm long. Selected sample of fine-grained material. 100% of exposure.
2011GG527A	65.384860	-153.830285	461410	7251410	5N	Granite (Monzogranite); black and white rock. 20% 1-3 mm anhedral clear and smokey quartz, 10-15% subhedral 2-3 mm biotite, and 65-70% feldspars, mostly 2-5 mm anhedral to subhedral crystals with minor 5-7 mm subhedral crystals. 100% of exposure.
2011GG534A	65.385003	-153.800596	462790	7251408	5N	Granite (Monzogranite); Monzogranite; mostly white rock, with minor black specs. 25% 1-2 mm anhedral quartz, 5% subhedral 2 mm biotite, and 70% feldspars, mostly 2-3 mm anhedral crystals a few 5 mm anhedral crystals. 100% of exposure.
2011LF078A	65.441124	-152.704480	513706	7257459	5N	Greenstone (Metabasalt); greenish gray. Rock contains 2% 0.5 mm relict amphiboles and 3% white to gray mica in a fine-grained, sugary groundmass. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF194A	65.454031	-152.498255	523259	7258958	5N	Gabbro (Gabbro); relict diabasic texture with 30% 1 mm plagioclase, 25% 1 mm epidote, 35% 1 mm, elongate amphibole, and 10% 2-3 mm relict pyroxene altered to amphibole. Rock contains minor albite ± quartz veins. 100% of exposure.
2011LF282A	65.336063	-153.146976	493156	7245725	5N	Biotite amphibolite (Metagabbro); dark green color. Rock contains 25% 5 mm brown biotite, 75% 1 mm prismatic amphibole. 100% of exposure.
2011LF302A	65.458714	-152.751835	511502	7259410	5N	Porphyritic biotite granite (Syenogranite); rock contains 25% 5 mm biotite, 10% 2 cm potassium feldspar, 20% 3 mm gray, smoky quartz in 35% 1-2 mm quartz and feldspar groundmass. 100% of exposure.
2011LF304A	65.461891	-152.752344	511477	7259764	5N	Leucogranite (Syenogranite); coarse-grained seriate texture. Rock contains 25% 1 cm smoky quartz, 1% 10 cm potassium feldspar megacrysts, 40% 1.5 cm, tabular potassium feldspar phenocrysts and 5% biotite in 30% feldspar matrix. 100% of exposure.
2011LF326A	65.495858	-152.741003	511987	7263552	5N	Syenogranite (Syenogranite); coarse-grained seriate texture. Rock contains 5% 3 cm potassium feldspar megacrystals, 30% 1 cm quartz, 20% 1 cm potassium feldspar, and 15% 2 mm biotite in a 2 mm feldspar groundmass. 100% of exposure.
2011LF329A	65.494491	-152.728659	512559	7263402	5N	Muscovite-biotite-quartz granite (Alkali-feldspar granite); medium grained. Rock contains 2% 2 cm potassium feldspar phenocrysts, 15% 1-2 mm quartz grains, 15% 1 mm biotite, 10% muscovite, and 48% mixed 1 mm feldspars. 100% of exposure.
2011LF336A	65.495562	-152.697556	513998	7263528	5N	Biotite-quartz monzonite (Alkali-feldspar granite); porphyritic. Rock contains 15% 5 mm smoky, subhedral quartz phenocrysts, 10% 1 cm potassium feldspar phenocrysts, and 10% 3 mm biotite in a 0.5 mm quartz and feldspar groundmass. 100% of exposure.
2011LF486C	65.425908	-152.983752	500754	7255731	5N	Monzogranite (Syenogranite); fine grained. Rock contains 10% 0.5 mm biotite, 3% 5 mm clots of biotite, and 5% 1 mm quartz in a 0.1 mm, mixed-feldspar groundmass (82% of rock). 25% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011LF497A	65.415845	-152.953795	502145	7254610	5N	Leucocratic monzonite (Syenogranite); contains 5% 1 mm quartz, 5% 0.5 mm biotite, 10% 1 cm xenoliths with quartz, biotite, and pyrite, and 80% 1-2 mm interlocking feldspars. 10% of exposure.
2011LF536A	65.470654	-152.610335	518052	7260774	5N	Hornblende metagabbro (Metagabbro); 20% 4 mm relict hornblende phenocrysts, 45% clinozoisite after 1 mm plagioclase laths, and 2% 0.5 mm sphene in 35% green matrix. 100% of exposure.
2011LF573A	65.291505	-152.973351	501243	7240751	5N	Metadiorite (Metagabbro); 60% 1 mm feldspars, 35% chlorite, and 0.5 mm hornblende pseudomorphs in an interlocking, subhedral texture. 100% of exposure.
2011RN221A	65.495344	-152.599618	518531	7263529	5N	Greenstone (Metabasalt); fine-grained, green, massive and blocky. 100% of exposure.
2011RN260A	65.359713	-152.894805	504894	7248357	5N	Greenstone (Metabasalt); fine-grained (1-2 mm), massive, blocky, and foliated metamafic rock. Contains 40-60% albite ± clinozoisite (?) and 40-60% chlorite. 100% of exposure.
2011RN319A	65.200204	-153.687453	467824	7230750	5N	Biotite-granite (Monzogranite); medium-grained (2-5 mm), equigranular and contains 20% light gray quartz and possible garnet. Here is a fault contact with metamorphic rocks. 100% of exposure.
2011RN325A	65.370436	-152.525978	522044	7249631	5N	Greenstone (Metabasalt); massive, unfoliated, blocky (<3 m^3), and locally derived Tozitna greenstone. 100% of exposure.
2011TL001A	65.237525	-153.582362	472781	7234860	5N	Orthogneiss (Monzogranite); pinkish-tan weathering rind. Contains 15% fine-grained biotite, 35% clear, 2-4 mm quartz, and 50% white feldspars. Micas are weakly foliated and form 0.5-mm-thick bands. 100% of exposure.
2011Z004A	65.400751	-153.010419	499516	7252927	5N	Biotite granite (Metamonzogranite); coarse to very coarse grained. Contains 35% porphyritic, pinkish potassium feldspar (=3 cm in diameter), 20% gray, interstitial quartz, 10% fine-grained (1-2 mm in diameter), brownish to brownish-black biotite, and 35% white plagioclase. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z045A	65.322647	-152.748674	511709	7244245	5N	Epidote-feldspar-chlorite sheared metagabbro (Metagabbro); medium-grained, blocky, and greenish cobbles make up the subcrop. Fresh rock is spotted green and light gray to white with poorly defined foliation. Minerals include 50% green to dark green chlorite, 40-45% white to slightly tan feldspar, and trace epidote. Rock does not react to HCl. 95% of exposure.
2011Z082A	65.459858	-152.723472	512816	7259543	5N	Biotite granite (Syenogranite); coarse- to very coarse-grained, porphyritic granite dike that has orange to tan weathering on both external and broken surfaces. Phenocrysts include 10% =2 cm long, white feldspar, 10% 2-3 mm, dark gray, rounded quartz, and 10% black, irregular biotite. 99% of exposure.
2011Z083A	65.462248	-152.725044	512742	7259809	5N	Biotite granite (Syenogranite); medium to very coarse grained. Rock contains porphyritic pink feldspar phenocrysts =3 cm long (average maximum dimensions are 5 cm x 2 cm), 30% biotite crystals =2 mm in diameter, and 20% 2 mm, rounded, gray quartz phenocrysts in amedium-grained granitic matrix. 100% of exposure.
2011Z093A	65.466367	-152.814653	508588	7260253	5N	Biotite granite (Alkali-feldspar granite); medium-grained (1–2 mm) and equigranular. Broken surface is cream to light orange with a common weathering rind stained with iron oxide. Minerals include 15% black biotite, 25% gray quartz, and white feldspar. Rock contains 2-mm-wide quartz veinlets, one of which has a black, metallic, non-magnetic mineral. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z116A	65.413436	-152.921772	503632	7254343	5N	Biotite–quartz–feldspar gneiss (Quartz-rich granitoid); possibly orthogneiss. Rock is medium grained with a rough, light brownish-gray weathering surface that shows foliation. Broken rock is dark gray and white with localized gneissic habit and is possibly recrystallized. Rock contains 25% biotite, gray to brownish-gray feldspar and quartz, and rare, milky white, foliation-parallel quartz veinlets. Selected sample of most iron-oxide-stained rock. No vein material, but several pieces with open vugs (1–3 mm across) with iron-oxide earths. 100% of exposure.
2011Z135A	65.250036	-152.610378	518202	7236185	5N	Quartz-amphibole-chlorite-feldspar(?) aragneiss (Metagranite); fine grained, blocky to platy with light brown weathering. Broken rock is light gray with black and orange specks. White mica and chlorite define foliation. Contains 10% dark green and black amphibole (altered to chlorite?) and 2 mm, glassy, rounded, slightly porphyroblastic, bluish-gray quartz grains in a feldspar or quartz matrix with 10% chlorite. 70% of exposure.
2011Z250A	65.490276	-152.912599	504046	7262908	5N	Biotite granite (Alkali-felsdpar granite); porphyritic, coarse to very coarse grained. Rock contains quartz phenocrysts ranging in color from gray to light, smoky gray to dark, smoky, grayish-black, 5% = 1.5-cm-long, white feldspar (potassium?) phenocrysts, and about 10% black biotite clots in a cream and gray colored matrix. 100% of exposure.
2011Z256A	65.180341	-153.888678	458375	7228654	5N	Biotite-quartz monzonite (Monzogranite); extremely coarse-grained and porphyritic. Contains 40-45% =5 x 2 cm porphyritic white feldspar (potassium?) , 15% = 1 cm gray, irregular quartz, 15-25% black, irregular masses of biotite in an orange and black matrix with cream feldspars. Many feldspar phenocrysts are aligned parallel to long axis. 100% of exposure.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z260B	65.186690	-153.892286	458216	7229364	5N	Granitic aplite dike (Alkali-feldspar-granitic aplite dike); fine grained (2 mm), 10-cm-wide dike. Contains 10% 1 mm biotite that are aligned with dike margin. 1% of exposure.
2011Z265A	65.185046	-153.865046	459489	7229163	5N	Quartz monzonite (Monzogranite); porphyritic and very coarse grained. Contains white to slightly pink, occasionally locally aligned potassium feldspar phenocrysts up to 4 cm long. Wormy, irregularly shaped, gray quartz is interstitial to 50% volume of potassium feldspar megacrysts. Black biotite. 99% of exposure.
2011Z265B	65.185046	-153.865046	459489	7229163	5N	Aplite dike (Alkali-feldspar-granitic aplite dike); fine grained and creamy white to light gray. Contains biotite grains that are aligned parallel to dike strike. The immediate area contains several dikes and dikelets; the widest piece is 25 cm in float and 20 cm in outcrop.
2011Z323A	65.504351	-152.646101	516374	7264520	5N	Biotite granite (Syenogranite); porphyritic, with medium-grained matrix with light-orange to buff weathering and equigranular plagioclase and potassium feldspar. Broken rock is pink and white. Contains =2 cm long, pink potassium feldspar phenocrysts , 20% 2-3 mm gray quartz phenocrysts, and 15-20% black biotite in a medium-grained (1-2 mm) matrix. 100% of exposure.
2011Z336A	65.389356	-152.513801	522594	7251744	5N	Metagabbro (Serpentinite); fine-grained with light brown to dull green weathering. Broken rock looks very fresh and is black and green with possible relict olivine. 100% of exposure.
2011Z371A	65.264114	-152.984494	500724	7237698	5N	Altered metagabbro (Metagabbro); fine-grained with a mottled texture ranging in color from pale green to greenish gray with fine-grained, tan to white grains of feldspar. Pale-green- and green-colored epidote and chlorite. Rock forms subrounded cobbles and has weak or no foliation. Some pieces look semischistose.

Table 4. (continued)

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011Z385A	65.254046	-152.942860	502669	7236577	5N	Greenstone (Metabasalt); possibly chloritized gabbro (?). Very angular, fine-grained, and dark-brown weathering rock. Broken rock has a mottled texture ranging in color from green to dark green with orange spots of iron oxide. Brown and reddish-orange iron oxides moderately to strongly stain abundant fracture surfaces. Locally, rock has a green, waxy to fibrous habit (talc or serpentine?). Spots of iron oxide are sometimes vuggy with occasional fine-grained, disseminated pyrrhotite in the center. Rock has no HCl reaction. 100% of exposure.
2011Z490A	65.361513	-152.967412	501516	7248554	5N	Amphibole-chlorite-feldspar metagabbro (Metagabbro); fine- to medium-grained, brown and dark brown, blocky foliated outcrop. Rock breaks easily along planes and has moderate to strong orange and brown stains of iron oxide. Fine-grained clumps of black amphibole occur on foliation surfaces and are =1 mm across with halos of iron oxide. Rock contains dark green chlorite, black mica (biotite or chlorite?) and 15% amphibole (?). Rock has no HCl reaction. Rock has no HCl reaction. 100% of exposure.

Table 5. Major-oxide, minor-oxide, and trace-element results for rocks collected in the Moran area, Tanana and Melozitna quadrangles, Alaska.

NOTE: ppm = parts per million; pct = percent; "---" = element not analyzed

SAMPLE_ID	SiO_2__pct	Al_2O_3__pct	Fe_2O_3__pct	CaO__pct	MgO__pct	Na_2O__pct	K_2O__pct	Cr_2O_3__pct	TiO_2__pct	MnO__pct	P_2O_5__pct
2011BAE096A	72.37	14.8	1.78	0.76	0.29	3.39	4.96	<0.01	0.1	0.05	0.171
2011BAE100A	75.77	12.9	2.13	0.53	0.18	3.21	4.67	<0.01	0.04	0.06	0.036
2011BAE107C	73.45	13.76	0.82	1.35	0.06	3.24	6.23	<0.01	<0.01	<0.01	0.01
2011BAE108A	75.63	13.07	1.88	0.51	0.1	3.52	4.52	0.01	0.01	0.06	0.018
2011BAE112A	75.3	13.22	2.03	0.63	0.08	3.48	4.64	<0.01	<0.01	0.06	0.014
2011BAE202A	48.52	7.45	10.34	15.11	13.23	1.42	0.12	0.22	0.92	0.17	0.068
2011BAE246B	48.22	14.72	9.62	12.05	8.87	1.93	0.32	0.05	0.98	0.15	0.082
2011BAE247A	44.68	7.65	12.2	11.51	16.62	0.61	0.08	0.16	0.63	0.19	0.055
2011BAE272A	77.89	11.47	1.76	0.97	0.2	2.53	4.09	0.01	0.08	0.03	0.03
2011BAE290A	75.87	12.87	1.79	0.56	0.13	3.17	4.87	0.01	0.05	0.04	0.024
2011BAE290B	76.07	13.37	1.19	0.75	0.11	3.62	4.57	<0.01	0.04	0.02	0.031
2011BAE337A	47.1	15.74	9.56	10.73	7.91	2.44	0.25	0.02	1.01	0.15	0.094
2011BAE351C	50.09	13.92	12.96	9.35	6.03	2.21	0.43	0.01	1.96	0.19	0.178
2011BAE357A	73.49	14.68	1.68	0.47	0.27	3.38	4.73	<0.01	0.09	0.05	0.101
2011BAE357B	74.79	13.79	1.38	0.69	0.24	3.46	4.6	0.01	0.08	0.03	0.085
2011BAE359B	75.8	13.61	1.25	0.33	0.08	3.48	4.38	<0.01	<0.01	0.07	0.017
2011BAE359C	76.64	14.86	0.91	<0.01	0.19	0.13	3.82	<0.01	<0.01	0.13	0.014
2011BAE363A	75.34	12.7	2.36	0.72	0.27	2.88	4.74	<0.01	0.14	0.05	0.052
2011GG007A	49.23	14.5	11.2	10.39	6.7	2.69	0.53	0.02	1.51	0.17	0.15
2011GG084A	76.58	13.29	0.71	0.54	0.11	3.27	4.77	<0.01	<0.01	0.02	0.012
2011GG426A	46.33	13.44	15.69	11.7	6.81	2.14	0.31	0.02	2.28	0.28	0.166
2011GG434A	76.17	12.7	1.66	0.67	0.18	2.68	5.48	<0.01	0.07	0.02	0.023
2011GG527A	67.35	15.05	4.2	2.64	1.29	2.32	4.65	0.01	0.67	0.05	0.159
2011GG534A	75.81	13.19	1.37	0.99	0.14	2.9	4.91	<0.01	0.05	0.01	0.015
2011LF078A	48.46	14.95	10.02	9.44	7.35	3.62	0.1	0.01	1.38	0.16	0.411
2011LF194A	47.04	8.2	10.96	12.42	14.95	1.14	0.34	0.18	0.92	0.19	0.079
2011LF282A	43.99	11.98	18.89	9.18	5.51	2.32	0.19	<0.01	3.65	0.22	0.135
2011LF302A	75.08	12.87	2.22	0.59	0.2	3.12	4.63	<0.01	0.07	0.04	0.027
2011LF304A	73.98	13.51	2.23	0.99	0.29	2.96	5.35	0.01	0.13	0.04	0.045
2011LF326A	73.3	13.1	2.33	0.82	0.3	2.74	5.16	<0.01	0.2	0.04	0.053

Table 5. (continued)

SAMPLE_ID	SrO__pct	BaO__pct	LOI__pct	Total__pct	Ba_ppm	Cr_ppm	Nb_ppm	Ni_ppm	Rb_ppm	Sr_ppm	Th_ppm
2011BAE096A	0.01	0.03	0.73	99.45	250	---	16	---	559	71	16
2011BAE100A	0.01	0.01	0.38	99.92	60	---	62	---	492	22	65
2011BAE107C	<0.01	<0.01	0.73	99.66	10	---	48	---	588	5	31
2011BAE108A	0.01	<0.01	0.51	99.84	30	---	73	---	715	11	62
2011BAE112A	0.01	<0.01	0.59	100.05	20	---	79	---	797	6	52
2011BAE202A	0.02	0.02	2.45	100.05	---	1455	4	180	4	97	---
2011BAE246B	0.04	0.04	2.69	99.76	---	396	5	90	9	300	---
2011BAE247A	0.01	0.01	3.93	98.32	---	1090	3	300	<2	65	---
2011BAE272A	0.01	0.01	0.33	99.41	120	---	16	---	232	85	74
2011BAE290A	0.01	0.01	0.33	99.72	60	---	62	---	544	27	63
2011BAE290B	0.01	<0.01	0.31	100.05	40	---	52	---	361	20	33
2011BAE337A	0.04	0.03	4.6	99.66	---	103	5	60	6	294	---
2011BAE351C	0.03	0.03	1.15	98.53	---	56	10	50	42	235	---
2011BAE357A	0.01	0.02	0.88	99.85	210	---	37	---	514	65	25
2011BAE357B	0.01	0.01	0.6	99.78	120	---	49	---	440	42	36
2011BAE359B	0.01	0.01	0.94	99.99	110	---	64	---	979	55	42
2011BAE359C	0.01	0.02	3.39	100.1	140	---	49	---	800	19	31
2011BAE363A	0.01	<0.01	0.43	99.7	180	---	44	---	409	64	75
2011GG007A	0.04	0.03	2.36	99.53	---	165	8	50	15	324	---
2011GG084A	0.01	0.01	0.58	99.9	110	---	76	---	448	40	48
2011GG426A	0.03	0.01	0.5	99.7	---	142	6	50	7	192	---
2011GG434A	0.01	0.01	0.34	100	60	---	13	---	383	46	69
2011GG527A	0.04	0.08	0.55	99.06	780	---	14	---	245	326	42
2011GG534A	0.01	0.01	0.35	99.76	40	---	11	---	345	45	72
2011LF078A	0.01	0.01	2.92	98.85	---	105	2	40	<2	114	---
2011LF194A	0.01	0.05	3.27	99.74	---	1210	4	260	8	58	---
2011LF282A	0.04	0.02	3.3	99.42	---	7	8	<10	9	341	---
2011LF302A	0.01	0.01	0.6	99.46	70	---	80	---	457	30	84
2011LF304A	0.01	0.02	0.39	99.95	210	---	44	---	359	80	71
2011LF326A	0.01	0.03	0.46	98.54	220	---	36	---	402	81	82

SAMPLE_ID	U_ppm	Y_ppm	Zr_ppm
2011BAE096A	5	129	57
2011BAE100A	36	170	96
2011BAE107C	17	276	40
2011BAE108A	42	249	90
2011BAE112A	37	257	78
2011BAE202A	---	16	45
2011BAE246B	---	15	63
2011BAE247A	---	11	25
2011BAE272A	16	68	90
2011BAE290A	34	161	90
2011BAE290B	34	125	46
2011BAE337A	---	16	73
2011BAE351C	---	34	125
2011BAE357A	7	137	58
2011BAE357B	12	149	73
2011BAE359B	34	298	60
2011BAE359C	5	253	47
2011BAE363A	22	127	136
2011GG007A	---	23	113
2011GG084A	28	176	69
2011GG426A	---	41	128
2011GG434A	7	102	18
2011GG527A	4	65	211
2011GG534A	13	97	80
2011LF078A	---	61	216
2011LF194A	---	17	49
2011LF282A	---	23	106
2011LF302A	49	119	88
2011LF304A	18	108	113
2011LF326A	18	106	139

Table 5. (continued)

SAMPLE_ID	SiO_2__pct	Al_2O_3__pct	Fe_2O_3__pct	CaO__pct	MgO__pct	Na_2O__pct	K_2O__pct	Cr_2O_3__pct	TiO_2__pct	MnO__pct	P_2O_5__pct
2011LF329A	75.62	13.42	1.67	0.38	0.11	3.13	4.7	<0.01	0.02	0.04	0.041
2011LF336A	74.03	14.79	1.85	0.25	0.07	3.91	4.32	<0.01	<0.01	0.05	0.031
2011LF486C	73.3	13.84	2.37	1.05	0.43	2.66	5.39	<0.01	0.21	0.03	0.096
2011LF497A	72.15	15.29	1.26	1	0.29	2.85	5.81	<0.01	0.08	0.02	0.119
2011LF536A	48.78	8.88	10.45	13.82	11.85	1.72	0.2	0.15	1.14	0.2	0.078
2011LF573A	49.26	15.09	11.34	9.74	6.7	3.08	0.49	0.02	1.54	0.16	0.144
2011RN221A	47.51	13.14	12.32	10.53	6.93	2.62	0.11	0.02	1.67	0.19	0.132
2011RN260A	46.33	14.15	11.05	11.26	8.29	1.92	0.06	0.02	0.95	0.18	0.059
2011RN319A	70.77	14.93	3.15	1.8	0.58	3.12	4.37	<0.01	0.2	0.05	0.074
2011RN325A	45.25	13.77	14.06	10.67	6.89	2.23	0.45	0.02	2.04	0.22	0.157
2011TL001A	74.04	13.25	2.57	1.15	0.26	2.89	4.61	<0.01	0.12	0.04	0.052
2011Z004A	70.92	14.13	3.25	1.82	0.58	2.43	5.42	<0.01	0.36	0.04	0.096
2011Z045A	47.28	14.67	11	10.58	8.07	2.76	0.03	0.03	1.1	0.17	0.062
2011Z082A	75.28	13.05	1.85	0.55	0.14	3.04	5.01	0.01	0.07	0.02	0.019
2011Z083A	72.34	13.96	2.77	1.16	0.49	2.9	5.3	<0.01	0.26	0.04	0.09
2011Z093A	75.23	13.42	1.77	0.31	0.1	3.74	4.66	<0.01	<0.01	0.06	0.013
2011Z116A	85.76	5.16	3.05	0.41	1.01	0.73	1.3	0.01	0.29	0.03	0.05
2011Z135A	72.49	12.74	6.41	0.03	1.37	0.56	2.65	<0.01	0.64	0.04	0.08
2011Z250A	75.53	13.29	1.7	0.44	0.12	3.26	4.8	<0.01	0.03	0.03	0.022
2011Z256A	67.67	15.55	3.84	2.41	0.84	2.63	5.81	<0.01	0.58	0.05	0.153
2011Z260B	72.85	14.47	1.17	0.72	0.25	2.9	6.5	<0.01	0.07	0.01	0.168
2011Z265A	68.2	14.9	3.74	1.84	0.75	2.69	5.43	<0.01	0.54	0.05	0.142
2011Z265B	73.19	14.38	1.12	0.58	0.13	4.5	4.58	<0.01	0.01	0.01	0.186
2011Z323A	73.21	13.21	2.5	0.87	0.22	2.99	5.02	<0.01	0.09	0.04	0.077
2011Z336A	41.86	3.91	11.49	7.62	25.74	0.24	0.08	0.32	0.42	0.17	0.038
2011Z371A	48.28	14.56	9.6	12.72	8.54	2.02	0.3	0.03	1.01	0.15	0.089
2011Z385A	40.73	1.83	8.23	0.02	35.8	0.02	0.01	0.36	<0.01	0.08	0.006
2011Z490A	49.7	13.04	15.83	5.58	5.11	3.01	0.04	<0.01	2.44	0.21	0.216

Table 5. (continued)

SAMPLE_ID	SrO__pct	BaO__pct	LOI__pct	Total__pct	Ba_ppm	Cr_ppm	Nb_ppm	Ni_ppm	Rb_ppm	Sr_ppm	Th_ppm
2011LF329A	0.01	0.01	0.72	99.87	60	---	57	---	826	14	45
2011LF336A	<0.01	0.01	0.67	99.98	40	---	67	---	961	7	51
2011LF486C	0.02	0.04	0.41	99.85	380	---	13	---	291	128	35
2011LF497A	0.01	0.04	0.73	99.66	390	---	9	---	244	97	8
2011LF536A	0.02	0.01	2.65	99.95	---	1000	4	150	5	106	---
2011LF573A	0.04	0.05	2.27	99.92	---	118	8	60	14	305	---
2011RN221A	0.02	0.04	3.34	98.57	---	167	6	60	2	111	---
2011RN260A	0.02	0.01	4.51	98.81	---	159	<2	100	<2	164	---
2011RN319A	0.02	0.05	0.76	99.88	470	---	12	---	197	144	21
2011RN325A	0.03	0.01	2.86	98.65	---	122	6	50	9	217	---
2011TL001A	0.02	0.09	0.88	99.97	820	---	14	---	205	101	28
2011Z004A	0.03	0.06	0.55	99.69	620	---	10	---	218	197	26
2011Z045A	0.02	0.02	2.8	98.6	---	256	2	80	<2	169	---
2011Z082A	0.01	0.01	0.79	99.85	110	---	54	---	380	41	101
2011Z083A	0.02	0.03	0.56	99.92	340	---	40	---	365	134	83
2011Z093A	0.01	0.01	0.55	99.87	30	---	85	---	729	15	69
2011Z116A	0.01	0.02	0.64	98.47	---	37	6	30	47	46	---
2011Z135A	0.01	0.07	2.92	100	630	---	11	---	100	36	18
2011Z250A	<0.01	0.01	0.88	100.1	50	---	69	---	615	20	68
2011Z256A	0.03	0.14	0.51	100.2	1180	---	14	---	210	296	24
2011Z260B	0.02	0.05	0.55	99.73	480	---	7	---	215	150	8
2011Z265A	0.03	0.12	0.8	99.24	1080	---	15	---	218	255	33
2011Z265B	0.01	0.01	0.38	99.08	70	---	11	---	237	39	5
2011Z323A	0.01	0.01	0.55	98.8	110	---	34	---	346	34	58
2011Z336A	0.01	0.01	6.27	98.17	---	2120	2	660	2	65	---
2011Z371A	0.04	0.03	2.38	99.75	270	---	4	---	7	256	<4
2011Z385A	<0.01	<0.01	11.55	98.64	---	2440	<2	2050	<2	2	---
2011Z490A	0.02	0.05	3.38	98.63	---	19	14	50	3	135	---

SAMPLE_ID	U_ppm	Y_ppm	Zr_ppm
2011LF329A	19	217	60
2011LF336A	30	244	66
2011LF486C	7	81	145
2011LF497A	5	62	44
2011LF536A	---	19	53
2011LF573A	---	21	106
2011RN221A	---	27	89
2011RN260A	---	29	48
2011RN319A	4	58	115
2011RN325A	---	31	117
2011TL001A	5	68	135
2011Z004A	<4	57	222
2011Z045A	---	30	53
2011Z082A	13	101	119
2011Z083A	13	89	185
2011Z093A	39	175	82
2011Z116A	---	22	93
2011Z135A	<4	25	210
2011Z250A	29	183	94
2011Z256A	4	56	382
2011Z260B	4	65	43
2011Z265A	4	61	345
2011Z265B	5	58	20
2011Z323A	13	117	98
2011Z336A	---	8	16
2011Z371A	<4	16	63
2011Z385A	---	2	<2
2011Z490A	---	38	152

Table 6. Detection limits and analytical methods for major- and minor-oxide and trace-element analyses of whole-rock samples.

Chemex codes include:

ME-XRF06 = Lithium borate fusion and X-ray fluorescence spectroscopy;

ME-XRF05 = X-ray fluorescence spectroscopy on a pressed pellet;

Analytical methods include :

LBF-XRF = Lithium borate fusion and X-ray fluorescence spectroscopy.

Note: Fe_2O_3 = total iron as Fe_2O_3; LOI* = loss on ignition; "---" = not applicable.

		ALS Chemex			
Header	Element	Lower Detection Limit	Upper Detection Limit	Chemex Code	Analytical Method
SiO_2__pct	SiO_2	0.01	100	ME-XRF06	LBA-XRF
Al_2O_3__pct	Al_2O_3	0.01	100	ME-XRF06	LBA-XRF
Fe_2O_3__pct	Fe_2O_3	0.01	100	ME-XRF06	LBA-XRF
CaO__pct	CaO	0.01	100	ME-XRF06	LBA-XRF
MgO__pct	MgO	0.01	100	ME-XRF06	LBA-XRF
Na_2O__pct	Na_2O	0.01	100	ME-XRF06	LBA-XRF
K_2O__pct	K_2O	0.01	100	ME-XRF06	LBA-XRF
Cr_2O_3__pct	Cr_2O_3	0.01	100	ME-XRF06	LBA-XRF
TiO_2__pct	TiO_2	0.01	100	ME-XRF06	LBA-XRF
MnO__pct	MnO	0.01	100	ME-XRF06	LBA-XRF
P_2O_5__pct	P_2O_5	0.01	100	ME-XRF06	LBA-XRF
SrO__pct	SrO	0.01	100	ME-XRF06	LBA-XRF
BaO__pct	BaO	0.01	100	ME-XRF06	LBA-XRF
LOI__pct	LOI*	0.01	100	---	Gravimetric
Total__pct	Total	---	---	---	Calculation
Ba_ppm	Barium	10	10,000	ME-XRF05	Pressed pellet-
Cr_ppm	Chromium	5	10,000	ME-XRF05	Pressed pellet-
Nb_ppm	Niobium	2	10,000	ME-XRF05	Pressed pellet-
Ni_ppm	Nickle	10	15,000	ME-XRF05	Pressed pellet-
Rb_ppm	Rubidium	2	10,000	ME-XRF05	Pressed pellet-
Sr_ppm	Strontium	2	10,000	ME-XRF05	Pressed pellet-
Th_ppm	Thorium	4	10,000	ME-XRF05	Pressed pellet-
U_ppm	Uranium	4	10,000	ME-XRF05	Pressed pellet-
Y_ppm	Yttrium	2	10,000	ME-XRF05	Pressed pellet-
Zr_ppm	Zirconium	2	10,000	ME-XRF05	Pressed pellet-

Table 7. Location, description, and results for rocks collected for non-carbonate-carbon analyses in the Moran area, Tanana and Melozitna Quadrangles, Alaska.

NOTE: Coordinates are based on the North Amercian Datum of 1927; carbon (non-carbonate) was analyzed by induction furnace pyrolysis following dilute acid digestion with a lower detection limit of 0.01% and an upper detection limit of 50% carbon.

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description	C_pct
2011LF557B	65.336904	-152.484123	524021	7245909	5N	Fault gouge; graphitic. 20% of exposure.	0.62
2011Z482A	65.375371	-152.799444	509325	7250113	5N	Graphite–quartz–white–mica schist; dark gray, slightly punky, strongly folded, and dominated by phyllitic white mica with some graphitic soot. White quartz occurs in ribbons and layers. Orange iron oxide commonly stains foliation surfaces. Contains 5% orange spots of iron oxide. 100% of exposure.	0.03

Table 8. Location, description, and results for rocks collected for major-oxide, minor-oxide, and trace-element analyses on rock slabs in the Moran area, Tanana and Melozitna quadrangles, Alaska.

NOTE: Coordinates are based on NAD 27

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011BAE010A	65.297071	-152.863083	506385	7241378	5N	Metabasite	---
2011BAE013A	65.293646	-152.856047	506714	7240997	5N	Metagabbro	---
2011BAE013B	65.293646	-152.856047	506714	7240997	5N	Mafic schist	---
2011BAE014A	65.291725	-152.855543	506738	7240783	5N	Metagabbro	---
2011BAE027A	65.278115	-152.830203	507924	7239269	5N	Mafic gneiss	---
2011BAE028A	65.276875	-152.828519	508003	7239131	5N	Metagabbro(?)	---
2011BAE036A	65.351827	-152.895847	504847	7247478	5N	Metagabbro	---
2011BAE037A	65.351431	-152.894710	504900	7247434	5N	Mafic schist	---
2011BAE039A	65.349813	-152.890161	505112	7247254	5N	Metagabbro(?)	---
2011BAE041A	65.347989	-152.886108	505301	7247051	5N	Metagabbro(?)	---
2011BAE045A	65.346594	-152.870194	506042	7246897	5N	Metagabbro	---
2011BAE048A	65.326453	-152.714461	513301	7244676	5N	Diorite(?)	---
2011BAE050A	65.330766	-152.713212	513357	7245157	5N	Diorite(?) or Gabbro(?)	Altered
2011BAE051B	65.332777	-152.713899	513324	7245381	5N	Gabbro	---
2011BAE053A	65.335250	-152.717115	513173	7245656	5N	Metagabbro	---
2011BAE054A	65.336322	-152.718972	513086	7245775	5N	Gabbro	---
2011BAE056A	65.337695	-152.714425	513297	7245929	5N	Metagabbro	---
2011BAE065A	65.398282	-152.759768	511160	7252673	5N	Gabbro(?)	Altered
2011BAE085A	65.394102	-152.733613	512377	7252212	5N	Mafic schist(?)	---
2011BAE085B	65.394102	-152.733613	512377	7252212	5N	Amphibolite(?)	Altered
2011BAE105A	65.486748	-152.852393	506834	7262520	5N	Andalusite(?) schist	---
2011BAE127A	65.411200	-152.848812	507020	7254100	5N	Marble	---
2011BAE235A	65.331554	-152.877526	505704	7245220	5N	Mafic schist	---
2011BAE264A	65.444624	-153.013024	499396	7257817	5N	Granite	Inhomogenous
2011BAE264B	65.444624	-153.013024	499396	7257817	5N	Granite	Altered
2011BAE287B	65.459349	-152.950072	502314	7259459	5N	Fine-grained granite	---
2011BAE292A	65.185604	-153.845866	460388	7229213	5N	Diorite orthogneiss	---
2011BAE292A	65.185604	-153.845866	460388	7229213	5N	Fine-grained intermediate rock	---
2011BAE297C	65.184588	-153.831719	461049	7229091	5N	Metamafic	---
2011BAE297C	65.184588	-153.831719	461049	7229091	5N	Biotite amphibolite	---
2011BAE298C	65.184843	-153.826282	461304	7229116	5N	Metamafic with dikelet	Inhomogenous
2011BAE305A	65.184578	-153.800606	462506	7229071	5N	Mafic schist	Porous

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011BAE010A	52.7	14.9	0.0621	8	12	0.408	4.49	0.164	5.24
2011BAE013A	53.3	15.4	<0.03	6.85	10.9	0.0608	4.92	0.183	6.6
2011BAE013B	51.7	15.8	0.0671	10.5	9.54	0.419	6.35	0.171	4.12
2011BAE014A	52.8	15.4	0.0486	8.72	10.4	0.348	5.67	0.181	4.72
2011BAE027A	66	14.1	0.0315	1.77	6.35	0.217	1.75	0.0551	7.42
2011BAE028A	51.2	15.5	0.065	10.8	10.4	0.464	6.26	0.183	3.44
2011BAE036A	53.5	14.3	<0.03	8.91	12.3	0.0376	4.98	0.194	3.5
2011BAE037A	55.1	13.2	<0.03	5.87	15.1	0.0416	5.04	0.247	3.61
2011BAE039A	55.3	14	<0.03	3.99	15.1	<.02	5.03	0.257	4.27
2011BAE041A	52.2	16.3	<0.03	11.2	9.5	<.02	8.07	0.194	1.73
2011BAE045A	49.2	14.3	<0.03	19.1	8.66	0.0273	6.31	0.223	1.64
2011BAE048A	55.7	17	<0.03	5.14	10.7	0.232	4.08	0.182	5.35
2011BAE050A	59.8	15.5	<0.03	0.772	11.9	0.121	4.12	0.131	6.48
2011BAE051B	52.8	15.7	<0.03	6.13	11.6	0.123	4.61	0.158	7.15
2011BAE053A	53	12.2	<0.03	11.3	13.6	0.0334	6.12	0.222	1.17
2011BAE054A	51.2	13.9	<0.03	8.49	11.6	0.0553	7.1	0.187	5.09
2011BAE056A	52.6	14.2	0.0899	8.36	12.1	0.349	4.21	0.218	5.08
2011BAE065A	51.2	18	<0.03	9.13	8.68	0.104	7.3	0.256	4.68
2011BAE085A	56.1	17.2	0.056	5	5.61	0.438	1.69	0.102	8.28
2011BAE085B	55	14.3	0.032	6.67	12	0.138	4.17	0.144	5.74
2011BAE105A	45.2	27.9	0.233	2.46	11.1	4.72	3.38	0.241	2.16
2011BAE127A	13.6	1.19	<0.03	46.6	0.898	0.138	0.314	<0.03	0.16
2011BAE235A	53.2	14.3	0.0738	8.75	12	0.342	4.89	0.197	4.15
2011BAE264A	77.4	11.4	<0.03	1.55	1.05	4	0.171	0.206	3.88
2011BAE264B	76.5	10.8	<0.03	0.219	5.04	3.65	0.266	0.203	2.99
2011BAE287B	75.1	14	<0.03	0.489	0.418	6.05	0.0599	<0.03	3.61
2011BAE292A	61	15.8	0.132	5.92	6.63	2.73	2.55	0.099	3.06
2011BAE292A	60.2	16.3	0.137	6.21	6.22	2.66	2.22	0.097	3.31
2011BAE297C	48.8	15.3	0.0799	12.8	8.79	1.82	10	0.227	0.958
2011BAE297C	48.7	16.2	0.05	13.5	7.85	1.56	9.72	0.18	1.07
2011BAE298C	57.2	13.2	0.106	10.1	8.75	0.695	6.11	0.287	1.75
2011BAE305A	57.3	15.3	<0.03	2.61	12.5	0.122	6.77	0.178	3.33

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011BAE010A	0.286	1.54	<0.05	99.7901	<4	<2	<5	<60	185
2011BAE013A	0.25	1.37	<0.05	99.8495	10	<2	<5	<60	131
2011BAE013B	0.175	0.902	<0.05	99.7441	<4	<2	<5	<60	347
2011BAE014A	0.29	1.3	<0.05	99.8776	21	<2	<5	<60	71
2011BAE027A	0.401	1.71	<0.05	99.8046	36	<2	<5	<60	78
2011BAE028A	0.345	1.17	<0.05	99.827	5	<2	<5	<60	82
2011BAE036A	0.323	1.75	<0.05	99.7946	9	<2	<5	<60	87
2011BAE037A	0.283	1.37	<0.05	99.8723	<4	<2	<5	<60	181
2011BAE039A	0.328	1.41	<0.05	99.7178	<4	<2	<5	<60	85
2011BAE041A	<0.03	0.582	<0.05	99.8342	65	<2	<5	<60	113
2011BAE045A	<0.03	0.372	<0.05	99.865	4	<2	<5	<60	220
2011BAE048A	0.226	1.16	<0.05	99.77	<4	<2	<5	<60	57
2011BAE050A	0.168	0.883	<0.05	99.9028	<4	<2	<5	<60	173
2011BAE051B	0.124	1.47	<0.05	99.8812	<4	<2	<5	<60	<50
2011BAE053A	0.285	1.81	<0.05	99.757	4	<2	<5	<60	89
2011BAE054A	0.196	1.98	<0.05	99.821	<4	<2	<5	<60	147
2011BAE056A	0.352	2.21	<0.05	99.7689	<4	<2	<5	<60	147
2011BAE065A	0.0753	0.454	<0.05	99.9068	<4	<2	<5	<60	100
2011BAE085A	0.326	1.04	4	99.842	16	<2	<5	<60	230
2011BAE085B	0.244	1.37	<0.05	99.808	<4	<2	<5	<60	163
2011BAE105A	0.429	1.5	<0.05	99.323	<4	<2	<5	<60	1240
2011BAE127A	<0.03	0.072	37	99.7307	<4	<2	<5	<60	184
2011BAE235A	0.268	1.57	<0.05	99.7408	<4	<2	<5	<60	250
2011BAE264A	<0.03	0.0581	<0.05	99.7923	8	<2	<5	<60	314
2011BAE264B	<0.03	0.0549	<0.05	99.7676	<4	<2	<5	<60	183
2011BAE287B	0.0489	0.0441	<0.05	99.8491	<4	<2	<5	<60	240
2011BAE292A	0.402	1.35	<0.05	99.673	7	<2	<5	<60	1580
2011BAE292A	0.386	1.41	<0.05	99.15	<4	<2	<5	300	1420
2011BAE297C	0.061	0.683	<0.05	99.5189	<4	<2	<5	<60	804
2011BAE297C	0.08	0.73	<0.05	99.6326	<4	<2	<5	<60	882
2011BAE298C	0.215	1.12	<0.05	99.533	<4	<2	<5	<60	1020
2011BAE305A	0.261	1.17	<0.05	99.5674	49	<2	<5	<60	<50

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011BAE010A	55	86	37	<110	<50	<1	<1	9	102
2011BAE013A	51	75	10	<110	<50	<1	<1	9	20
2011BAE013B	67	165	47	<110	<50	<1	<1	6	69
2011BAE014A	48	194	25	<110	<50	<1	<1	8	17
2011BAE027A	<10	170	60	<110	<50	<1	29	---	48
2011BAE028A	44	145	63	<110	<50	<1	<1	6	54
2011BAE036A	69	68	53	<110	<50	<1	<1	12	36
2011BAE037A	101	50	59	<110	<50	<1	<1	8	63
2011BAE039A	130	98	197	<110	<50	<1	<1	11	30
2011BAE041A	<10	394	89	<110	<50	<1	<1	1	159
2011BAE045A	37	428	28	<110	<50	<1	<1	2	97
2011BAE048A	19	48	53	<110	<50	<1	<1	2	16
2011BAE050A	59	67	22	<110	<50	<1	<1	2	<7
2011BAE051B	<10	84	47	<110	<50	<1	<1	2	<7
2011BAE053A	24	210	98	<110	<50	<1	<1	11	94
2011BAE054A	50	356	103	<110	<50	<1	<1	18	93
2011BAE056A	42	133	74	<110	<50	<1	<1	12	63
2011BAE065A	38	169	45	<110	<50	<1	<1	1	130
2011BAE085A	36	172	22	<110	<50	<1	<1	70	49
2011BAE085B	<10	62	14	<110	<50	<1	<1	10	30
2011BAE105A	35	190	102	2120	<50	<1	<1	20	88
2011BAE127A	<10	<30	36	<110	<50	<1	<1	<1	<7
2011BAE235A	69	299	51	<110	<50	<1	<1	10	54
2011BAE264A	<10	40	32	<110	<50	<1	<1	35	17
2011BAE264B	33	<30	34	365	<50	<1	<1	34	<7
2011BAE287B	<10	<30	30	<110	<50	<1	<1	34	<7
2011BAE292A	102	<30	40	<110	<50	<1	<1	14	13
2011BAE292A	29	41	<7	320	<50	<1	<1	14	31
2011BAE297C	72	790	45	1700	<50	<1	<1	3	225
2011BAE297C	88	850	46	<110	<50	<1	<1	3	208
2011BAE298C	69	491	37	<110	<50	<1	<1	8	97
2011BAE305A	38	389	57	1970	<50	<1	<1	10	145

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011BAE010A	<4	<1	15	130	<2	<4	<1	291	<2
2011BAE013A	<4	<1	1	30	<2	<4	<1	249	<2
2011BAE013B	<4	<1	14	99	<2	<4	<1	348	<2
2011BAE014A	9	<1	14	59	<2	<4	<1	295	<2
2011BAE027A	17	6	---	467	<2	<4	55	---	<2
2011BAE028A	10	<1	15	33	<2	<4	<1	286	<2
2011BAE036A	20	<1	1	74	<2	<4	<1	195	<2
2011BAE037A	18	<1	<1	289	<2	<4	<1	159	<2
2011BAE039A	25	<1	1	98	<2	<4	<1	98	<2
2011BAE041A	29	<1	1	118	<2	<4	<1	193	<2
2011BAE045A	29	<1	1	91	<2	<4	<1	150	<2
2011BAE048A	<4	<1	5	171	<2	<4	<1	241	<2
2011BAE050A	<4	<1	4	108	<2	<4	<1	9	<2
2011BAE051B	<4	<1	3	<30	<2	<4	<1	158	<2
2011BAE053A	28	<1	<1	51	<2	<4	<1	299	<2
2011BAE054A	<4	<1	<1	71	<2	<4	<1	221	<2
2011BAE056A	<4	<1	3	87	<2	<4	<1	293	<2
2011BAE065A	<4	<1	2	64	<2	<4	<1	88	<2
2011BAE085A	<4	<1	8	218	<2	<4	<1	151	<2
2011BAE085B	<4	<1	6	98	<2	<4	<1	263	<2
2011BAE105A	<4	<1	470	150	<2	<4	<1	260	<2
2011BAE127A	29	17	1554	162	<2	<4	1690	6	<2
2011BAE235A	31	<1	11	121	<2	35	<1	216	<2
2011BAE264A	63	<1	284	140	<2	6	<1	66	33
2011BAE264B	57	<1	274	77	<2	<4	<1	37	<2
2011BAE287B	48	<1	509	275	<2	15.7	<1	20	8.2
2011BAE292A	19	<1	106	125	<2	<4	<1	470	<2
2011BAE292A	36	<1	106	123	<2	<4	<1	497	<2
2011BAE297C	52	<1	125	100	<2	<4	<1	253	<2
2011BAE297C	32	<1	106	187	<2	<4	<1	263	<2
2011BAE298C	<4	<1	40	1930	<2	<4	<1	279	<2
2011BAE305A	44	<1	9	175	<2	<4	<1	103	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011BAE010A	<1	465	<8	<1	27	80	<9	129
2011BAE013A	<1	353	<8	<1	26	76	<9	150
2011BAE013B	<1	294	<8	<1	21	59	<9	103
2011BAE014A	<1	367	<8	<1	23	71	<9	116
2011BAE027A	<1	309	<8	20	---	50	200	---
2011BAE028A	<1	321	<8	<1	22	79	<9	96
2011BAE036A	<1	478	<8	<1	38	110	<9	152
2011BAE037A	<1	327	<8	<1	41	258	<9	96
2011BAE039A	<1	561	<8	<1	35	293	<9	151
2011BAE041A	<1	257	<8	<1	23	114	<9	34
2011BAE045A	<1	229	<8	<1	14	54	<9	26
2011BAE048A	<1	297	<8	<1	32	113	<9	55
2011BAE050A	<1	474	<8	<1	27	71	<9	102
2011BAE051B	<1	394	<8	<1	25	88	<9	83
2011BAE053A	<1	496	<8	<1	28	139	<9	131
2011BAE054A	<1	339	<8	<1	28	105	<9	140
2011BAE056A	<1	517	<8	<1	36	123	<9	219
2011BAE065A	<1	154	<8	<1	11	76	<9	29
2011BAE085A	<1	222	<8	<1	36	64	<9	650
2011BAE085B	<1	496	<8	<1	27	89	<9	140
2011BAE105A	<1	405	<8	<1	95	188	<9	270
2011BAE127A	<1	<25	<8	29	3	24	45	<9
2011BAE235A	<1	450	<8	<1	26	105	<9	143
2011BAE264A	6	<25	<8	<1	59	97	<9	81
2011BAE264B	<1	<25	<8	<1	95	141	<9	72
2011BAE287B	25.8	<8	32	<1	24	14	<9	26
2011BAE292A	<1	245	<8	<1	31	76	<9	194
2011BAE292A	<1	240	<8	<1	36	78	<9	202
2011BAE297C	<1	222	<8	<1	15	122	<9	34
2011BAE297C	<1	254	<8	<1	12	95	<9	35
2011BAE298C	<1	366	<8	<1	27	150	<9	81
2011BAE305A	<1	440	<8	<1	27	196	<9	141

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011BAE306A	65.183106	-153.797316	462658	7228905	5N	Albite-calcite-chlorite schist	Porous
2011BAE307A	65.180993	-153.794733	462776	7228668	5N	Garnet-plagioclase-chlorite schist	Inhomogenous
2011BAE308A	65.178605	-153.793317	462839	7228401	5N	Calcite-chlorite-muscovite schist	Inhomogenous
2011BAE309A	65.176060	-153.790892	462949	7228116	5N	Chlorite-muscovite quartz schist	Inhomogenous
2011BAE329B	65.331525	-153.086573	495968	7245214	5N	Metamafic	Porous
2011BAE330A	65.331175	-153.087151	495941	7245175	5N	Metagabbro	---
2011BAE331C	65.330474	-153.088931	495858	7245097	5N	Metagabbro	---
2011BAE331D	65.330474	-153.088931	495858	7245097	5N	Metagabbro	---
2011BAE332B	65.328973	-153.092619	495686	7244930	5N	Metadiorite(?)	---
2011BAE333A	65.327913	-153.094783	495585	7244812	5N	Metagabbro	---
2011BAE334A	65.327320	-153.096606	495500	7244746	5N	Metagabbro	Porous
2011BAE336A	65.325370	-153.100720	495308	7244529	5N	Metagabbro	---
2011BAE337A	65.325190	-153.102222	495238	7244509	5N	Metagabbro	---
2011BAE351C	65.462650	-152.805055	509034	7259840	5N	Metagabbro	Poor polish
2011BAE355B	65.462752	-152.794351	509530	7259853	5N	Metamafic	Poor polish
2011BAE359B	65.462807	-152.782460	510081	7259861	5N	Granite porphyry	---
2011BAE359C	65.462807	-152.782460	510081	7259861	5N	Granite porphyry	Altered
2011BAE366B	65.468469	-152.764693	510902	7260495	5N	Porphyritic granite	---
2011BAE371B	65.472522	-152.751639	511505	7260949	5N	Porphyritic granodiorite	---
2011BAE375B	65.477623	-152.738528	512110	7261520	5N	Porphyritic granite	Inhomogenous
2011BAE376A	65.408933	-152.554657	520680	7253912	5N	Gabbro	Altered
2011BAE379A	65.405898	-152.547775	521002	7253576	5N	Gabbro	Altered, poor polish
2011BAE381A	65.402899	-152.547052	521038	7253242	5N	Wherlite	Altered
2011BAE381B	65.402899	-152.547052	521038	7253242	5N	Gabbro	Altered
2011BAE384A	65.397391	-152.541184	521315	7252630	5N	Olivine clinopyroxenite	Inhomogenous
2011BAE385A	65.396895	-152.540396	521352	7252575	5N	Gabbro	Altered
2011BAE387A	65.393392	-152.539166	521412	7252185	5N	Gabbro	Altered, poor polish
2011BAE416B	65.371679	-152.840696	507408	7249696	5N	Gabbro	Altered
2011BAE418A	65.373642	-152.830511	507881	7249916	5N	Mafic schist	Inhomogenous, porous
2011BAE420A	65.374886	-152.820180	508361	7250056	5N	Quartzite	Inhomogenous, porous
2011BAE422A	65.414876	-152.821888	508269	7254513	5N	Metagabbro(?)	Inhomogenous
2011BAE422B	65.414876	-152.821888	508269	7254513	5N	Mafic schist	Inhomogenous, porous

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011BAE306A	64.5	11.9	<0.03	2.6	11.5	0.0656	5.79	0.21	1.86
2011BAE307A	61.3	14.8	0.0461	5.84	10.2	0.315	4.24	0.287	1.72
2011BAE308A	58.4	21.1	0.325	3.34	6.47	4.92	2.66	0.0939	1.23
2011BAE309A	78.4	11.7	0.098	0.74	3.86	2.13	1.41	0.0484	0.875
2011BAE329B	54.8	15	0.03	6.29	11.4	0.18	4.65	0.17	5.48
2011BAE330A	53.3	15.9	0.0386	9.05	10.1	0.424	4.62	0.166	4.74
2011BAE331C	51.6	16.5	0.14	5.73	13.6	1.11	4.65	0.23	4.27
2011BAE331D	54.7	15.6	0.0626	9.03	9.63	0.477	4.95	0.158	4.2
2011BAE332B	59.6	11.2	<0.03	6.63	13.5	0.02	4.13	0.16	2.67
2011BAE333A	50.6	16.4	0.03	11.4	9.37	0.03	8.58	0.2	2.5
2011BAE334A	58.8	13.8	<0.03	3.72	14.1	0.09	3.73	0.25	2.98
2011BAE336A	51.5	15.4	0.06	10.1	11.5	0.26	4.35	0.2	4.18
2011BAE337A	52.7	17.2	0.06	10.3	8.18	0.35	6.36	0.15	3.68
2011BAE351C	53.3	16.8	0.05	9.29	9.94	0.53	4.38	0.19	3.3
2011BAE355B	54.6	16.7	0.04	9.53	10.6	0.09	5.15	0.21	0.818
2011BAE359B	76.6	13.2	<0.03	0.673	0.634	4.38	0.184	0.072	4.01
2011BAE359C	80	14.4	<0.03	0.0673	0.699	4.21	0.145	0.151	0.0893
2011BAE366B	76.6	13.2	<0.03	0.424	0.96	4.32	0.173	0.0386	4.05
2011BAE371B	63.3	14	<0.03	2.66	7.85	3.14	2.65	0.2	3.73
2011BAE375B	77.8	12.5	<0.03	0.159	0.835	4.2	0.155	<0.03	4.18
2011BAE376A	49.8	15.3	0.05	12.4	10.4	0.17	6.56	0.19	3.24
2011BAE379A	50.3	15.6	0.12	7.39	11.8	0.88	6.85	0.49	4.58
2011BAE381A	46.6	5.1	<0.03	8.5	13	0.0288	25.7	0.18	0.144
2011BAE381B	49.2	9.6	0.1	14.1	10.5	0.73	12.5	0.23	1.58
2011BAE384A	49.3	5.7	0.03	10	11.1	0.11	21.9	0.2	0.425
2011BAE385A	50.5	16.7	0.0362	12.4	7.25	0.692	7.3	0.152	3.81
2011BAE387A	52.2	16.4	0.03	7.31	11.1	0.11	5.15	0.18	5.87
2011BAE416B	53.9	15.4	<0.03	3.8	16	0.0354	6.32	0.251	1.78
2011BAE418A	48.6	17	<0.03	11.2	10.8	0.0541	10.4	0.219	1.11
2011BAE420A	81.9	8.3	0.0478	0.148	5.1	1.55	1.4	<0.03	0.356
2011BAE422A	52.3	14	<0.03	11.9	11.2	0.04	7.6	0.31	1.48
2011BAE422B	55.9	14.4	<0.03	5.73	11.4	0.23	7.1	0.23	3.46

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011BAE306A	0.375	1.09	<0.05	99.8906	68	<2	<5	<60	136
2011BAE307A	0.161	0.533	<0.05	99.4421	12	<2	<5	<60	137
2011BAE308A	0.0301	1.15	<0.05	99.719	59	<2	<5	<60	199
2011BAE309A	0.18	0.454	<0.05	99.8954	<4	<2	<5	<60	129
2011BAE329B	0.3	1.36	<0.05	99.6588	<4	<2	<5	<60	259
2011BAE330A	0.25	1.31	<0.05	99.8986	10	<2	<5	<60	104
2011BAE331C	0.3	1.64	<0.05	99.77	<4	<2	<5	<60	130
2011BAE331D	0.303	0.847	<0.05	99.9576	<4	<2	<5	<60	212
2011BAE332B	0.23	1.68	<0.05	99.8476	<4	<2	<5	<60	<50
2011BAE333A	0.06	0.69	<0.05	99.8685	11	<2	<5	<60	106
2011BAE334A	0.44	1.77	<0.05	99.7041	5	<2	<5	<60	575
2011BAE336A	0.33	1.91	<0.05	99.7927	<4	<2	<5	<60	92
2011BAE337A	0.12	0.717	<0.05	99.817	8	<2	<5	<60	146
2011BAE351C	0.31	1.7	<0.05	99.7946	13	<2	<5	<60	440
2011BAE355B	0.26	1.61	<0.05	99.6034	29	<2	<5	<60	296
2011BAE359B	<0.03	0.0234	<0.05	99.8225	4	<2	<5	<60	207
2011BAE359C	<0.03	<0.02	<0.05	99.8312	<4	<2	<5	<60	63
2011BAE366B	<0.03	<0.02	<0.05	99.8173	4	<2	<5	<60	80
2011BAE371B	0.321	0.881	<0.05	98.7613	<4	<2	<5	<60	550
2011BAE375B	<0.03	<0.02	<0.05	99.8847	<4	<2	<5	<60	177
2011BAE376A	0.19	1.43	<0.05	99.7222	<4	<2	<5	<60	131
2011BAE379A	0.24	1.56	<0.05	99.806	6	<2	<5	<60	155
2011BAE381A	0.0305	0.3	<0.05	99.598	<4	<2	<5	<60	197
2011BAE381B	0.13	1.05	<0.05	99.7126	<4	<2	<5	<60	242
2011BAE384A	0.08	0.641	<0.05	99.4513	<4	<2	<5	<60	293
2011BAE385A	0.145	0.827	<0.05	99.8122	43	<2	<5	<60	214
2011BAE387A	0.27	1.2	<0.05	99.8219	10	<2	<5	<60	164
2011BAE416B	0.265	2.1	<0.05	99.8387	<4	<2	<5	<60	237
2011BAE418A	0.0773	0.344	<0.05	99.8249	<4	<2	<5	<60	266
2011BAE420A	0.108	0.99	<0.05	99.8874	4	<2	<5	<60	299
2011BAE422A	0.18	0.65	<0.05	99.6819	12	<2	<5	<60	616
2011BAE422B	0.26	0.98	<0.05	99.7037	27	<2	<5	<60	149

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011BAE306A	37	157	32	<110	<50	<1	<1	11	65
2011BAE307A	<10	96	32	3890	<50	<1	<1	7	100
2011BAE308A	43	284	86	<110	<50	<1	<1	17	93
2011BAE309A	18	108	32	<110	<50	<1	<1	8	28
2011BAE329B	63	77	23	<110	<50	<1	<1	10	60
2011BAE330A	49	63	103	<110	<50	<1	<1	10	49
2011BAE331C	46	40	7	<110	<50	<1	<1	13	<7
2011BAE331D	12	116	18	<110	<50	<1	<1	6	37
2011BAE332B	13	77	105	<110	<50	<1	<1	16	105
2011BAE333A	99	347	72	<110	<50	<1	<1	1	140
2011BAE334A	123	125	123	<110	<50	<1	<1	13	15
2011BAE336A	45	250	66	<110	<50	<1	<1	12	100
2011BAE337A	71	126	61	<110	<50	<1	<1	5	82
2011BAE351C	61	76	38	<110	<50	<1	<1	8	54
2011BAE355B	75	156	11	2180	<50	<1	<1	9	69
2011BAE359B	<10	<30	26	<110	<50	<1	<1	53	27
2011BAE359C	<10	<30	<7	116	<50	<1	<1	48	<7
2011BAE366B	<10	<30	15	<110	<50	<1	<1	43	12
2011BAE371B	36	65	12	9900	<50	<1	<1	55	<7
2011BAE375B	<10	<30	14	<110	<50	<1	<1	35	27
2011BAE376A	104	372	71	<110	<50	<1	<1	5	168
2011BAE379A	131	319	107	<110	<50	<1	<1	9	98
2011BAE381A	197	1770	445	<110	<50	<1	<1	1	909
2011BAE381B	110	2360	129	<110	<50	<1	<1	4	327
2011BAE384A	121	1980	160	<110	<50	<1	<1	3	831
2011BAE385A	35	273	97	<110	<50	<1	<1	4	124
2011BAE387A	54	52	<7	131	<50	<1	<1	8	46
2011BAE416B	24	<30	23	<110	<50	<1	<1	14	113
2011BAE418A	72	434	42	<110	<50	<1	<1	2	273
2011BAE420A	<10	118	27	<110	<50	<1	<1	11	17
2011BAE422A	64	241	187	<110	<50	<1	<1	1	181
2011BAE422B	90	167	89	1080	<50	<1	<1	2	135

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011BAE306A	43	<1	3	194	<2	<4	<1	111	<2
2011BAE307A	42	<1	15	153	<2	<4	<1	266	<2
2011BAE308A	64	<1	165	272	<2	<4	<1	234	<2
2011BAE309A	21	<1	89	138	<2	<4	<1	44	<2
2011BAE329B	<4	<1	10	1300	<2	21	<1	285	<2
2011BAE330A	<4	<1	15	217	<2	<4	<1	274	<2
2011BAE331C	21	<1	36	117	<2	<4	<1	312	<2
2011BAE331D	25	<1	16	123	<2	<4	<1	273	<2
2011BAE332B	29	<1	<1	225	<2	<4	<1	233	<2
2011BAE333A	<4	<1	1	94	<2	<4	<1	132	<2
2011BAE334A	53	<1	4	321	<2	23	<1	266	<2
2011BAE336A	<4	<1	8	84	<2	21	<1	302	<2
2011BAE337A	21	<1	11	46	<2	<4	<1	295	<2
2011BAE351C	18	<1	84	<30	<2	<4	<1	298	<2
2011BAE355B	<4	<1	9	136	<2	<4	<1	210	<2
2011BAE359B	23	<1	559	90	<2	42	<1	62	20
2011BAE359C	38	<1	833.6	56	<2	101.5	<1	22	18.8
2011BAE366B	13	<1	582	47	<2	108	<1	22	21
2011BAE371B	10.5	<1	484	78	<2	22.6	<1	43	24.4
2011BAE375B	23	<1	495	97	<2	26	<1	16	16
2011BAE376A	<4	<1	8	63	<2	25	<1	69	<2
2011BAE379A	21	<1	17	72	<2	<4	<1	105	<2
2011BAE381A	<4	<1	3	257	<2	21	<1	41	<2
2011BAE381B	25	<1	25	102	<2	25	<1	56	<2
2011BAE384A	<4	<1	5	800	<2	<4	<1	76	2
2011BAE385A	20	<1	19	75	<2	<4	<1	72	<2
2011BAE387A	<4	<1	3	58	<2	<4	<1	169	<2
2011BAE416B	<4	<1	1	166	<2	23	<1	182	<2
2011BAE418A	53	<1	2	87	<2	<4	<1	115	<2
2011BAE420A	24	<1	65	171	<2	18	<1	17	<2
2011BAE422A	21	<1	1	427	<2	<4	<1	138	<2
2011BAE422B	39	<1	14	120	<2	<4	<1	58	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011BAE306A	<1	461	<8	<1	27	132	<9	124
2011BAE307A	<1	406	<8	<1	27	122	<9	163
2011BAE308A	<1	365	<8	<1	38	162	<9	235
2011BAE309A	<1	189	<8	<1	23	111	<9	133
2011BAE329B	<1	466	<8	<1	29	122	<9	130
2011BAE330A	<1	338	<8	<1	25	80	<9	119
2011BAE331C	<1	558	<8	<1	33	141	<9	179
2011BAE331D	<1	307	<8	<1	21	77	<9	109
2011BAE332B	<1	444	<8	<1	31	148	<9	177
2011BAE333A	<1	308	<8	<1	26	54	<9	45
2011BAE334A	<1	528	<8	<1	35	167	<9	184
2011BAE336A	<1	487	<8	<1	30	86	<9	154
2011BAE337A	<1	270	<8	<1	14	80	<9	54
2011BAE351C	<1	452	<8	<1	30	118	<9	117
2011BAE355B	<1	458	<8	<1	27	127	<9	116
2011BAE359B	31	28	<8	<1	156	14	<9	66
2011BAE359C	6	<8	56	<1	146	38	<9	69
2011BAE366B	27	<25	<8	<1	146	17	<9	67
2011BAE371B	5.3	186	<8	<1	107	84	<9	176
2011BAE375B	12	<25	<8	<1	85	19	<9	59
2011BAE376A	<1	340	<8	<1	23	88	<9	85
2011BAE379A	<1	449	<8	<1	30	53	<9	116
2011BAE381A	<1	115	<8	<1	5	78	<9	18
2011BAE381B	<1	454	<8	<1	16	108	<9	62
2011BAE384A	2	245	<8	<1	9	79	<9	36
2011BAE385A	<1	268	<8	<1	15	64	<9	68
2011BAE387A	<1	468	<8	<1	30	73	<9	143
2011BAE416B	<1	523	<8	<1	26	199	<9	165
2011BAE418A	<1	244	<8	<1	11	62	<9	22
2011BAE420A	<1	171	<8	<1	17	52	<9	140
2011BAE422A	<1	338	<8	<1	24	132	<9	52
2011BAE422B	<1	391	<8	<1	36	135	<9	59

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011BAE465A	65.197497	-152.873745	505910	7230279	5N	MetaQuartz grit	Porous
2011BAE465B	65.197497	-152.873745	505910	7230279	5N	MetaQuartz wacke	---
2011BAE466A	65.198134	-152.863936	506369	7230351	5N	Metaquartz grit	---
2011BAE466B	65.198134	-152.863936	506369	7230351	5N	Chloritoid(?) quartzite	---
2011BAE472A	65.392679	-153.402733	481287	7252087	5N	Metamafic	Poor polish
2011BAE473A	65.394414	-153.408183	481035	7252282	5N	Diabase(?)	Altered
2011BAE476A	65.396951	-153.422064	480392	7252569	5N	Fine-grained gabbro	---
2011BAE522A	65.355243	-152.749007	511679	7247878	5N	Gabbro(?)	Altered
2011BAE565A	65.314624	-152.518849	522423	7243413	5N	Metagabbro	---
2011BAE566A	65.316238	-152.518755	522426	7243593	5N	Fine-grained Metagabbro	---
2011BAE604A	65.244152	-153.484683	477352	7235560	5N	Muscovite quartz schist	Inhomogenous
2011GG005A	65.389712	-153.081083	496232	7251699	5N	Plagioclase-sillimanite(?)-muscovite-biotite quartz schist	---
2011GG006A	65.299475	-152.862470	506413	7241646	5N	Mafic schist	---
2011GG007A	65.297564	-152.862566	506409	7241433	5N	Mafic schist	---
2011GG028A	65.303019	-152.853186	506845	7242042	5N	Metagabbro	---
2011GG035B	65.331724	-152.801107	509263	7245248	5N	Mafic schist	---
2011GG037A	65.335465	-152.794508	509569	7245666	5N	Mafic schist	---
2011GG037D	65.335465	-152.794508	509569	7245666	5N	Granite	Altered
2011GG055A	65.319703	-152.824484	508178	7243905	5N	Mafic schist	---
2011GG061A	65.409254	-152.753681	511438	7253897	5N	Mafic schist	---
2011GG080A	65.419883	-152.702307	513818	7255092	5N	Mafic schist	---
2011GG086B	65.459559	-152.823224	508193	7259493	5N	Metamafic	---
2011GG087A	65.458152	-152.825067	508108	7259336	5N	Metagabbro	---
2011GG112A	65.446281	-152.867889	506126	7258008	5N	Scapolite-quartz rock	---
2011GG168A	65.295792	-152.727509	512708	7241256	5N	Gabbro	---
2011GG175A	65.461738	-152.607878	518172	7259781	5N	Gabbro	Altered, inhomogenous
2011GG176A	65.462220	-152.606965	518214	7259835	5N	Gabbro	---
2011GG179B	65.462444	-152.599689	518551	7259862	5N	Mafic schist	---
2011GG181A	65.462415	-152.595698	518736	7259860	5N	Green quartzite	---
2011GG181C	65.462415	-152.595698	518736	7259860	5N	Fine-grained gabbro	Altered
2011GG183A	65.461072	-152.593431	518842	7259711	5N	Gabbro	Altered

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011BAE465A	92.8	3.9	0.0405	0.149	0.89	0.796	0.533	<0.03	0.427
2011BAE465B	88	6.2	0.0599	0.172	2.46	1.54	0.749	<0.03	0.31
2011BAE466A	96.5	1.8	<0.03	0.16	0.485	0.334	0.269	<0.03	0.156
2011BAE466B	86.5	7.6	0.0663	0.143	2.28	1.79	0.651	<0.03	0.284
2011BAE472A	45.9	16.9	0.03	11	13.8	0.4	6.3	0.28	2.63
2011BAE473A	47.4	15.4	<0.03	10.7	14.7	0.236	5.85	0.247	2.69
2011BAE476A	48.3	18.4	<0.03	12.6	9.79	0.425	5.39	0.158	2.89
2011BAE522A	47.4	16.7	<0.03	10.9	9.98	0.0305	13.6	0.198	0.521
2011BAE565A	44.1	12.5	0.0451	18.3	10	0.163	6.03	0.147	5.67
2011BAE566A	54	14.1	0.0339	4.59	11.8	0.295	4.49	0.136	6.05
2011BAE604A	83.3	8.01	0.0719	0.464	3.85	1.71	1.17	0.0451	0.511
2011GG005A	67.5	18.7	0.0805	0.455	6.9	2.67	1.49	0.099	0.96
2011GG006A	48.6	14	<0.03	10.2	14.4	0.0793	6.24	0.222	3.17
2011GG007A	52.4	15.4	0.0372	9.57	10.4	0.336	5.67	0.182	4.23
2011GG028A	48.3	16.9	<0.03	13.9	9.32	0.0342	7.39	0.167	2.95
2011GG035B	46.1	15.2	<0.03	14.9	11	0.155	9.61	0.226	2.25
2011GG037A	53.3	17.4	0.0341	6.24	9.08	0.368	3.52	0.142	7.27
2011GG037D	76.1	9.13	<0.03	2.93	3.84	2.129	2.02	0.052	2.89
2011GG055A	53.1	13.2	<0.03	8.97	11.2	0.051	6.58	0.227	5.25
2011GG061A	58.5	14.2	<0.03	4.9	12.6	0.0247	5.55	0.144	2.13
2011GG080A	50.1	14.8	0.355	9.62	12.9	0.334	5.9	0.213	3.51
2011GG086B	48.1	18	<0.03	13.2	10.3	0.56	7.77	0.223	0.53
2011GG087A	53	16.6	0.0396	9.47	9.97	0.713	5.07	0.184	2.95
2011GG112A	79.9	8.26	<0.03	7.17	0.778	0.364	1	0.0488	1.65
2011GG168A	52.1	14	0.388	10.8	10.5	0.866	6.91	0.192	2.66
2011GG175A	51.1	15.8	0.03	11.6	10.6	0.13	5.32	0.32	3.25
2011GG176A	50	10.1	0.0671	12.3	10.2	0.532	14.1	0.183	1.39
2011GG179B	51.4	16.6	0.059	11.9	7.42	0.657	6.46	0.15	3.96
2011GG181A	94.1	1.71	<0.03	1.17	1.42	0.0392	0.97	<0.03	0.462
2011GG181C	50.2	15.6	0.04	12.3	10.8	0.19	5.95	0.21	3.2
2011GG183A	50.6	8.1	0.04	14	11.3	0.17	13.3	0.23	0.734

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011BAE465A	0.0657	0.247	<0.05	99.8796	<4	<2	<5	<60	112
2011BAE465B	0.0747	0.327	<0.05	99.9583	<4	<2	<5	<60	119
2011BAE466A	0.0836	0.127	<0.05	99.9001	<4	<2	<5	<60	340
2011BAE466B	0.113	0.452	<0.05	99.8816	<4	<2	<5	<60	200
2011BAE472A	0.2	2.2	<0.05	99.6353	<4	<2	<5	<60	1600
2011BAE473A	0.287	2.22	<0.05	99.746	80	<2	<5	<60	1150
2011BAE476A	0.146	1.54	<0.05	99.6605	<4	<2	<5	<60	1430
2011BAE522A	0.0441	0.283	<0.05	99.6748	<4	<2	<5	<60	681
2011BAE565A	0.422	2.21	<0.05	99.5871	<4	<2	<5	<60	158
2011BAE566A	0.621	3.54	<0.05	99.6559	4	<2	<5	<60	144
2011BAE604A	0.214	0.559	<0.05	99.905	7	<2	<5	<60	434
2011GG005A	0.146	0.828	<0.05	99.8285	49	<2	<5	<60	369
2011GG006A	0.372	2.45	<0.05	99.7462	<4	<2	<5	<60	<50
2011GG007A	0.253	1.32	<0.05	99.7982	<4	<2	<5	<60	179
2011GG028A	0.353	0.485	<0.05	99.817	49	<2	<5	<60	225
2011GG035B	<0.03	0.342	<0.05	99.827	63	<2	<5	<60	274
2011GG037A	0.488	1.99	<0.05	99.8321	48	<2	<5	<60	227
2011GG037D	<0.03	0.44	<0.05	99.5825	<4	<2	<5	<60	350
2011GG055A	0.179	1.08	<0.05	99.8499	<4	<2	<5	<60	129
2011GG061A	0.298	1.42	<0.05	99.782	54	<2	<5	<60	86
2011GG080A	0.306	1.81	<0.05	99.848	<4	<2	<5	<60	123
2011GG086B	0.124	0.96	<0.05	99.7909	53	<2	<5	<60	610
2011GG087A	0.238	1.54	<0.05	99.7746	100	<2	<5	<60	385
2011GG112A	0.101	0.188	<0.05	99.4598	<4	<2	14	<60	4900
2011GG168A	0.192	1.18	<0.05	99.788	<4	<2	<5	<60	311
2011GG175A	0.17	1.45	<0.05	99.7615	<4	<2	<5	<60	265
2011GG176A	0.112	0.761	<0.05	99.7451	<4	<2	<5	<60	249
2011GG179B	0.188	1.13	<0.05	99.924	<4	<2	<5	<60	54
2011GG181A	0.0838	0.0543	<0.05	100.0249	<4	<2	<5	<60	76
2011GG181C	0.14	1.27	<0.05	99.8913	<4	<2	<5	<60	124
2011GG183A	0.17	0.954	<0.05	99.5653	<4	<2	<5	<60	515

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011BAE465A	27	<30	14	<110	<50	<1	<1	5	25
2011BAE465B	<10	41	22	<110	<50	<1	<1	6	33
2011BAE466A	24	65	14	111	<50	<1	<1	3	37
2011BAE466B	<10	67	27	<110	<50	<1	<1	9	17
2011BAE472A	96	178	162	233	<50	<1	<1	6	67
2011BAE473A	57	234	175	<110	<50	<1	<1	7	147
2011BAE476A	70	274	10	<110	<50	<1	<1	4	97
2011BAE522A	133	569	48	<110	<50	<1	<1	1	410
2011BAE565A	59	127	48	752	<50	<1	<1	22	89
2011BAE566A	42	268	17	364	<50	<1	<1	47	73
2011BAE604A	<10	78	30	<110	<50	<1	<1	8	47
2011GG005A	13	122	13	<110	<50	<1	19	18	46
2011GG006A	96	133	165	<110	<50	<1	<1	15	50
2011GG007A	65	196	39	<110	<50	<1	<1	8	37
2011GG028A	71	613	87	<110	<50	<1	<1	1	161
2011GG035B	68	513	9	<110	<50	<1	<1	2	188
2011GG037A	52	125	71	<110	<50	<1	<1	12	85
2011GG037D	<10	69	61	<110	<50	<1	7	---	62
2011GG055A	72	351	42	<110	<50	<1	<1	4	66
2011GG061A	41	89	46	<110	<50	<1	<1	10	102
2011GG080A	<10	145	91	<110	<50	<1	<1	14	43
2011GG086B	50	198	<7	<110	<50	<1	<1	1	169
2011GG087A	38	<30	151	<110	<50	<1	<1	7	59
2011GG112A	<10	51	<7	<110	<50	<1	<1	---	38
2011GG168A	68	307	87	<110	<50	<1	<1	7	121
2011GG175A	43	388	57	<110	<50	<1	<1	5	112
2011GG176A	102	1250	169	<110	<50	<1	<1	4	475
2011GG179B	37	339	55	<110	<50	<1	<1	6	91
2011GG181A	<10	<30	20	<110	<50	<1	<1	1	<7
2011GG181C	77	232	159	<110	<50	<1	<1	5	51
2011GG183A	50	1270	136	<110	<50	<1	<1	5	386

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011BAE465A	15	<1	30	63	<2	<4	<1	25	<2
2011BAE465B	35	<1	56	<30	<2	<4	<1	21	<2
2011BAE466A	20	<1	18	64	<2	<4	<1	15	<2
2011BAE466B	25	<1	69	88	<2	<4	<1	25	<2
2011BAE472A	<4	<1	22	650	<2	<4	<1	252	<2
2011BAE473A	21	<1	13	<30	<2	242	<1	226	<2
2011BAE476A	<4	<1	8	137	<2	<4	<1	444	<2
2011BAE522A	25	<1	<1	339	<2	<4	<1	92	<2
2011BAE565A	<4	<1	3	182	<2	<4	<1	281	<2
2011BAE566A	<4	<1	8	85	<2	<4	<1	285	<2
2011BAE604A	30	<1	98	151	<2	<4	<1	50	<2
2011GG005A	63	125	155	158	<2	<4	155	155	<2
2011GG006A	<4	<1	2	47	<2	<4	<1	256	<2
2011GG007A	30	<1	14	66	<2	<4	<1	347	<2
2011GG028A	<4	<1	1	62	<2	<4	<1	280	<2
2011GG035B	<4	<1	11	94	<2	<4	<1	182	<2
2011GG037A	35	<1	7	266	<2	<4	<1	201	<2
2011GG037D	31	14	---	78	<2	<4	173	---	<2
2011GG055A	22	<1	<1	256	<2	<4	<1	221	<2
2011GG061A	52	<1	1	90	<2	<4	<1	205	<2
2011GG080A	<4	<1	7	254	<2	<4	<1	241	<2
2011GG086B	<4	<1	83	229	<2	<4	<1	248	<2
2011GG087A	30	<1	80	115	<2	<4	<1	282	<2
2011GG112A	<4	28	---	218	<2	<4	221	---	<2
2011GG168A	<4	<1	25	379	<2	<4	<1	85	<2
2011GG175A	<4	<1	3	161	<2	<4	<1	142	<2
2011GG176A	<4	<1	17	64	<2	<4	<1	50	<2
2011GG179B	<4	<1	22	<30	<2	<4	<1	117	<2
2011GG181A	<4	<1	2	86	<2	<4	29	29	<2
2011GG181C	<4	<1	5	126	<2	25	<1	138	<2
2011GG183A	<4	<1	3	585	<2	22	<1	60	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011BAE465A	<1	52	<8	<1	14	18	<9	172
2011BAE465B	<1	93	<8	<1	7	41	<9	187
2011BAE466A	<1	32	<8	<1	4	18	<9	116
2011BAE466B	<1	73	<8	<1	14	35	<9	215
2011BAE472A	<1	679	<8	<1	38	157	<9	141
2011BAE473A	<1	543	<8	<1	35	121	<9	149
2011BAE476A	<1	428	<8	<1	26	146	<9	83
2011BAE522A	<1	191	<8	<1	8	57	<9	16
2011BAE565A	<1	388	<8	<1	26	95	<9	152
2011BAE566A	<1	516	<8	<1	27	127	<9	268
2011BAE604A	<1	154	<8	<1	18	55	<9	125
2011GG005A	<1	150	<8	3	21	132	148	178
2011GG006A	<1	577	<8	<1	42	117	<9	210
2011GG007A	<1	316	<8	<1	20	59	<9	99
2011GG028A	<1	292	<8	<1	19	51	<9	32
2011GG035B	<1	336	<8	<1	8	78	<9	18
2011GG037A	<1	385	<8	<1	36	78	<9	165
2011GG037D	<1	191	<8	26	---	34	134	---
2011GG055A	<1	323	<8	<1	20	97	<9	83
2011GG061A	<1	424	<8	<1	34	189	<9	98
2011GG080A	<1	473	<8	<1	31	114	<9	141
2011GG086B	<1	276	<8	<1	27	89	<9	55
2011GG087A	<1	447	<8	<1	29	130	<9	114
2011GG112A	<1	52	<8	21	---	29	71	<9
2011GG168A	<1	342	<8	<1	23	104	<9	108
2011GG175A	<1	362	<8	<1	25	108	<9	93
2011GG176A	<1	244	<8	<1	13	84	<9	55
2011GG179B	<1	295	<8	<1	19	44	<9	99
2011GG181A	<1	<25	<8	<1	2	11	9	11
2011GG181C	<1	413	<8	<1	24	76	<9	82
2011GG183A	<1	316	<8	<1	16	88	<9	67

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011GG186A	65.461044	-152.589440	519027	7259709	5N	Plagioclase ultramafic	---
2011GG190A	65.455068	-152.573267	519781	7259048	5N	Gabbro	Altered
2011GG191A	65.443588	-152.591093	518963	7257763	5N	Fine-grained gabbro	Altered
2011GG193A	65.442618	-152.593847	518836	7257654	5N	Gabbro with chlorite vein	Altered, inhomogenous, small
2011GG193B	65.442618	-152.593847	518836	7257654	5N	Fine-grained gabbro	Altered
2011GG205A	65.458975	-152.604273	518341	7259474	5N	Mafic rock	---
2011GG224A	65.305539	-152.852678	506868	7242323	5N	Metagabbro	---
2011GG225A	65.305469	-152.854352	506790	7242315	5N	Metagabbro	Small
2011GG226A	65.306024	-152.853233	506842	7242377	5N	Metagabbro	---
2011GG229A	65.308341	-152.854615	506777	7242635	5N	Metamafic	---
2011GG271A	65.180909	-153.836685	460811	7228684	5N	Paragneiss	Inhomogenous, poor polish
2011GG275A	65.177322	-153.836231	460827	7228284	5N	Qlbite-biotite quartz schist	---
2011GG319A	65.440663	-152.769643	510684	7257395	5N	Metamafic	Small
2011GG322A	65.438689	-152.775115	510431	7257174	5N	Metagabbro	Inhomogenous
2011GG339A	65.471433	-152.819021	508384	7260817	5N	Tourmaline-veined granite	Inhomogenous
2011GG342A	65.484676	-152.812018	508704	7262294	5N	Metagabbro	---
2011GG343B	65.487836	-152.813334	508642	7262646	5N	Tourmaline-veined granitic aplite	Inhomogenous
2011GG346A	65.491707	-152.809958	508797	7263078	5N	Biotite-muscovite quartz schist	---
2011GG347A	65.492887	-152.806644	508950	7263210	5N	Mafic schist	---
2011GG350A	65.497877	-152.793513	509556	7263768	5N	Muscovite quartz schist	---
2011GG382A	65.379733	-152.887110	505248	7250589	5N	Metagabbro	---
2011GG383B	65.381078	-152.886373	505282	7250739	5N	Metagabbro	Poor polish
2011GG385A	65.298471	-152.912827	504065	7241530	5N	Metadiorite(?)	---
2011GG392A	65.286661	-152.923712	503559	7240213	5N	Metagabbro	Porous
2011GG395A	65.280794	-152.924865	503506	7239559	5N	Paragneiss schist(?)	Altered, porous, small
2011GG448A	65.231115	-152.988214	500551	7234020	5N	Quartz schist	Porous
2011GG450A	65.229283	-152.979745	500947	7233816	5N	Chloritoid(?) quartzite	Inhomogenous
2011GG458A	65.225386	-152.936506	502969	7233383	5N	Leached quartzite	Porous
2011GG472A	65.439655	-152.613685	517918	7257318	5N	Mafic tuff	---
2011GG485A	65.377892	-152.929234	503290	7250381	5N	Metagabbro	---
2011GG494A	65.385712	-152.940272	502776	7251252	5N	Metagabbro	---
2011GG495A	65.386296	-152.944186	502594	7251317	5N	Metagabbro	Porous

Table 8. (continued)

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011GG186A	47.9	6.09	0.069	6.7	14.1	0.0791	23.2	0.253	0.506
2011GG190A	51.5	14.8	0.04	11.2	10.6	0.03	6.55	0.2	3.63
2011GG191A	50.9	14.6	0.07	10.5	11.8	0.25	5.64	0.2	4.01
2011GG193A	45.5	15.5	0.04	16.7	13.4	0.02	6.88	0.24	0.295
2011GG193B	47.2	11.7	0.06	10.4	16.6	0.26	6.32	0.22	4.67
2011GG205A	49.8	7.04	<0.03	14.4	11	0.1	14.8	0.229	1.01
2011GG224A	53.1	15.4	0.04	8.02	10.6	0.46	5.05	0.2	5.67
2011GG225A	56.6	13.5	<0.03	8.01	10.1	0.1	5.08	0.19	4.49
2011GG226A	52.7	16.4	<0.03	8.75	10.5	0.1	4.44	0.2	5.1
2011GG229A	49.5	9.6	<0.03	11.8	16.1	<.02	11.2	0.25	0.0931
2011GG271A	80.2	9.12	0.0614	1.19	2.95	2.76	1.14	0.0656	1.86
2011GG275A	66.8	14.7	0.114	1.35	7.29	3.36	2.96	0.156	1.72
2011GG319A	52.8	16.2	<0.03	4.71	11.7	0.2	5.24	0.22	7.45
2011GG322A	49.7	14.2	<0.03	14.5	11.5	0.34	5.65	0.23	2.29
2011GG339A	77.1	12.7	<0.03	0.202	0.939	4.86	0.0696	0.0328	3.87
2011GG342A	53.2	16.2	0.03	13.3	5.85	0.26	7.21	0.14	3.21
2011GG343B	77.3	12.9	<0.03	0.286	1.07	3.55	0.0531	0.0423	4.57
2011GG346A	80.4	10.5	0.119	0.304	3.92	1.99	1.12	0.0471	0.721
2011GG347A	49.4	19.5	<0.03	11.2	8.47	0.0286	8.67	0.169	1.88
2011GG350A	69.6	17.5	0.242	0.614	4.63	3.37	1.34	0.0577	0.867
2011GG382A	58.6	12	<0.03	0.0868	21.9	0.12	5.18	0.4	0.0373
2011GG383B	50.8	15.9	<0.03	9.8	10.8	0.07	6.14	0.2	4.8
2011GG385A	61.5	13.9	<0.03	5.99	8.64	0.0363	2.83	0.147	5.26
2011GG392A	56.5	14.1	0.03	6.07	10.8	0.11	6.09	0.16	4.4
2011GG395A	55.8	28	0.06	0.226	7.38	1.29	0.778	0.98	4.3
2011GG448A	75.5	14.1	0.0871	0.107	4.62	2.17	0.943	0.0438	1.38
2011GG450A	90.3	5	0.0837	0.102	2.12	1.17	0.516	<0.03	0.336
2011GG458A	94.2	2.1	<0.03	0.181	1.9	0.472	0.314	<0.03	0.179
2011GG472A	51.1	14.4	<0.03	11	12.8	0.03	5.1	0.26	3.31
2011GG485A	51.4	15.9	0.03	11.6	9.57	0.32	6.63	0.18	2.85
2011GG494A	51.3	15.8	<0.03	10.7	11.1	0.03	7.24	0.19	2.67
2011GG495A	51	13.9	<0.03	9.14	14.4	0.04	5.07	0.23	4.22

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011GG186A	0.0854	0.662	<0.05	99.6445	<4	<2	<5	<60	260
2011GG190A	0.16	1.14	<0.05	99.8538	<4	<2	<5	<60	149
2011GG191A	0.25	1.74	<0.05	99.9607	<4	<2	<5	<60	164
2011GG193A	0.13	1.24	<0.05	99.9384	<4	<2	<5	<60	156
2011GG193B	0.35	2.15	<0.05	99.9297	<4	<2	<5	<60	<50
2011GG205A	0.162	1.06	<0.05	99.6246	<4	<2	<5	<60	233
2011GG224A	0.23	1.09	<0.05	99.8524	<4	<2	<5	<60	551
2011GG225A	0.29	1.26	<0.05	99.6452	8	<2	<5	<60	127
2011GG226A	0.33	1.34	<0.05	99.8785	13	<2	<5	<60	114
2011GG229A	0.13	0.908	<0.05	99.54851	123	<2	<5	<60	841
2011GG271A	0.0571	0.5	<0.05	99.9041	<4	<2	<5	<60	371
2011GG275A	0.121	1.15	<0.05	99.721	37	<2	<5	<60	473
2011GG319A	0.2	1.04	<0.05	99.7786	<4	<2	<5	<60	447
2011GG322A	0.18	1.19	<0.05	99.7961	<4	<2	<5	<60	206
2011GG339A	<0.03	0.0546	<0.05	99.8661	<4	<2	<5	<60	254
2011GG342A	0.04	0.368	<0.05	99.8082	<4	<2	<5	<60	183
2011GG343B	<0.03	0.0209	<0.05	99.8414	<4	<2	<5	<60	200
2011GG346A	0.121	0.625	<0.05	99.8671	38	<2	<5	<60	222
2011GG347A	<0.03	0.466	<0.05	99.8112	15	<2	<5	<60	276
2011GG350A	0.34	1.02	<0.05	99.5807	<4	<2	<5	<60	653
2011GG382A	0.11	1.31	<0.05	99.7693	42	<2	<5	<60	153
2011GG383B	0.2	1.04	<0.05	99.7722	<4	<2	<5	<60	364
2011GG385A	0.384	1.18	<0.05	99.8794	<4	<2	<5	<60	113
2011GG392A	0.48	1.09	<0.05	99.8193	<4	<2	<5	<60	279
2011GG395A	0.15	0.79	<0.05	99.5398	4	<2	<5	<60	109
2011GG448A	0.126	0.782	<0.05	99.8589	<4	<2	<5	<60	140
2011GG450A	0.0428	0.234	<0.05	99.9018	<4	<2	<5	<60	395
2011GG458A	0.203	0.0655	<0.05	99.6809	<4	<2	<5	<60	696
2011GG472A	0.21	1.67	<0.05	99.905	9	<2	<5	<60	138
2011GG485A	0.17	1.02	<0.05	99.6781	<4	<2	<5	<60	586
2011GG494A	0.13	0.745	<0.05	99.9199	<4	<2	<5	<60	<50
2011GG495A	0.21	1.37	<0.05	99.5998	<4	<2	<5	<60	1140

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011GG186A	204	1730	201	<110	<50	<1	<1	---	1040
2011GG190A	27	241	108	<110	<50	<1	<1	6	110
2011GG191A	74	120	34	<110	<50	<1	<1	19	38
2011GG193A	70	228	84	<110	<50	<1	<1	10	79
2011GG193B	206	164	<7	<110	<50	<1	<1	21	72
2011GG205A	99	1490	164	<110	<50	<1	<1	6	561
2011GG224A	36	52	114	<110	<50	<1	<1	8	19
2011GG225A	78	47	23	1470	<50	<1	<1	9	36
2011GG226A	49	107	30	<110	<50	<1	<1	9	41
2011GG229A	120	1260	76	842	<50	<1	<1	2	483
2011GG271A	<10	82	<7	<110	<50	<1	<1	9	32
2011GG275A	34	115	<7	1300	<50	<1	<1	13	43
2011GG319A	25	98	222	<110	<50	<1	<1	1	7
2011GG322A	33	225	826	<110	<50	<1	<1	2	61
2011GG339A	20	<30	38	<110	<50	<1	<1	68	<7
2011GG342A	37	604	37	<110	<50	<1	<1	1	105
2011GG343B	<10	<30	40	<110	<50	<1	<1	34	<7
2011GG346A	32	108	29	<110	<50	<1	<1	9	54
2011GG347A	68	429	54	834	<50	<1	<1	1	290
2011GG350A	<10	159	92.2	<110	<50	<1	<1	16	53.7
2011GG382A	62	79	102	<110	<50	<1	<1	8	102
2011GG383B	57	446	70	151	<50	<1	<1	3	116
2011GG385A	23	<30	153	488	<50	<1	<1	7	9
2011GG392A	24	226	32	<110	<50	<1	<1	9	60
2011GG395A	59	125	136	1900	<50	<1	<1	14	123
2011GG448A	29	82	17	<110	<50	<1	<1	13	46
2011GG450A	<10	39	62	<110	<50	<1	<1	4	31
2011GG458A	27	42	46	1030	<50	<1	<1	2	32
2011GG472A	13	184	30	<110	<50	<1	<1	6	75
2011GG485A	11	426	102	<110	<50	<1	<1	6	108
2011GG494A	82	362	55	<110	<50	<1	<1	2	136
2011GG495A	76	121	124	<110	<50	<1	<1	3	20

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011GG186A	<4	<1	---	67	<2	<4	<1	---	<2
2011GG190A	29	<1	1	86	<2	19	<1	155	<2
2011GG191A	23	<1	5	85	<2	<4	<1	227	<2
2011GG193A	<4	<1	1	140	<2	<4	<1	53	<2
2011GG193B	<4	<1	5	67	<2	13	<1	288	<2
2011GG205A	33	<1	1	80	<2	<4	<1	45	<2
2011GG224A	25	<1	18	218	<2	21	<1	200	<2
2011GG225A	19	<1	4	145	<2	<4	<1	166	<2
2011GG226A	<4	<1	5	44	<2	<4	<1	259	<2
2011GG229A	<4	<1	1	266	<2	<4	<1	66	<2
2011GG271A	38	<1	99	49	<2	<4	<1	152	<2
2011GG275A	46	<1	128	336	<2	<4	<1	198	<2
2011GG319A	25	<1	3	284	<2	<4	<1	179	<2
2011GG322A	<4	<1	6	135	<2	<4	<1	301	<2
2011GG339A	23.7	<1	618	239	<2	25.9	<1	17	32.7
2011GG342A	<4	<1	4	207	<2	<4	<1	308	<2
2011GG343B	35.6	<1	677.7	151	<2	29	<1	5	22.5
2011GG346A	25	<1	85	51	<2	<4	<1	74	<2
2011GG347A	20	<1	2	67	<2	<4	<1	144	<2
2011GG350A	46.5	<1	133.8	1410	<2	<4	<1	108.5	<2
2011GG382A	660	<1	8	696	<2	<4	<1	5	<2
2011GG383B	25	<1	1	389	<2	<4	<1	147	<2
2011GG385A	<4	<1	1	211	<2	<4	<1	197	<2
2011GG392A	47	<1	4	131	<2	<4	<1	182	<2
2011GG395A	112	<1	40	98	<2	<4	<1	583	<2
2011GG448A	31	<1	78	103	<2	<4	<1	92	<2
2011GG450A	31	<1	40	156	<2	<4	<1	15	<2
2011GG458A	<4	<1	11	605	<2	19	<1	17	<2
2011GG472A	<4	<1	<1	37	<2	<4	<1	259	<2
2011GG485A	21	<1	10	148	<2	<4	<1	247	<2
2011GG494A	29	<1	1	108	<2	<4	<1	125	<2
2011GG495A	<4	<1	1	858	<2	<4	<1	81	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011GG186A	<1	210	<8	<1	---	93	<9	<9
2011GG190A	<1	441	<8	<1	22	74	<9	85
2011GG191A	<1	414	<8	<1	25	65	<9	133
2011GG193A	<1	367	<8	<1	22	126	<9	92
2011GG193B	<1	485	<8	<1	31	75	<9	169
2011GG205A	<1	378	<8	<1	17	76	<9	74
2011GG224A	<1	303	<8	<1	28	102	<9	127
2011GG225A	<1	221	<8	<1	24	113	<9	119
2011GG226A	<1	395	<8	<1	26	85	<9	130
2011GG229A	<1	469	<8	<1	24	189	<9	49
2011GG271A	<1	114	<8	<1	22	45	<9	134
2011GG275A	<1	190	<8	<1	30	111	<9	222
2011GG319A	<1	405	<8	<1	31	104	<9	60
2011GG322A	<1	460	<8	<1	32	74	<9	66
2011GG339A	30.7	<25	<8	<1	28	22	<9	81
2011GG342A	<1	157	<8	<1	11	43	<9	14
2011GG343B	22.3	<8	31.3	<1	144	28	<9	92
2011GG346A	<1	187	<8	<1	15	52	<9	134
2011GG347A	<1	229	<8	<1	17	64	<9	26
2011GG350A	<1	288	<8	<1	26.6	125	<9	202.7
2011GG382A	<1	485	<8	<1	11	545	<9	97
2011GG383B	<1	464	<8	<1	37	112	<9	96
2011GG385A	<1	288	<8	<1	34	81	<9	153
2011GG392A	<1	351	<8	<1	22	79	<9	106
2011GG395A	<1	226	<8	<1	22	79	<9	110
2011GG448A	<1	77	<8	<1	13	79	<9	239
2011GG450A	<1	39	<8	<1	9	24	<9	127
2011GG458A	<1	118	<8	<1	3	17	<9	15
2011GG472A	<1	515	<8	<1	35	95	<9	111
2011GG485A	<1	310	<8	<1	19	72	<9	79
2011GG494A	<1	305	<8	<1	28	77	<9	63
2011GG495A	<1	551	<8	<1	47	142	<9	114

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011GG497A	65.386666	-152.950124	502318	7251358	5N	Quartz muscovite schist	Porous, small
2011GG518A	65.376954	-152.578923	519577	7250340	5N	Fine-grained gabbro	---
2011GG519A	65.377805	-152.578329	519604	7250435	5N	Gabbro	Altered
2011GG520A	65.469542	-152.603466	518371	7260652	5N	Fine-grained gabbro	Altered
2011GG522A	65.471235	-152.602426	518418	7260841	5N	Greenstone	Inhomogenous
2011GG523A	65.474621	-152.604058	518340	7261218	5N	Gabbro	Altered
2011GG523B	65.474621	-152.604058	518340	7261218	5N	Albite quartz schist	Small
2011GG524A	65.477345	-152.602419	518414	7261522	5N	Mafic rock	---
2011GG547B	65.315870	-152.518719	522428	7243552	5N	Metamafic	Porous
2011GG564A	65.388016	-152.962559	501740	7251508	5N	Schist	Inhomogenous
2011GG564B	65.388016	-152.962559	501740	7251508	5N	Muscovite quartz schist	---
2011LF006A	65.246146	-152.864845	506315	7235702	5N	Mafic schist	---
2011LF007B	65.421377	-152.585924	519219	7255289	5N	Mafic schist	---
2011LF012A	65.291305	-152.857496	506647	7240736	5N	Mafic schist	---
2011LF032A	65.324191	-152.978427	501005	7244394	5N	Mafic schist	Small
2011LF051B	65.358815	-152.811563	508767	7248266	5N	Quartz-chlorite-muscovite schist	---
2011LF052A	65.359721	-152.804184	509110	7248368	5N	Chlorite-muscovite quartz schist	---
2011LF055A	65.361074	-152.796178	509482	7248520	5N	Chlorite-plagioclase quartz schist	---
2011LF057A	65.361833	-152.793442	509609	7248605	5N	Mafic schist	---
2011LF063B	65.366198	-152.777734	510338	7249094	5N	Mafic schist	Small
2011LF069C	65.452126	-152.729205	512554	7258680	5N	Mafic schist	---
2011LF069C	65.452126	-152.729205	512554	7258680	5N	Albite-muscovite quartz schist	---
2011LF073A	65.447917	-152.713915	513265	7258214	5N	Gabbro (?)	---
2011LF073B	65.447917	-152.713915	513265	7258214	5N	Gabbro(?)	---
2011LF076A	65.443728	-152.710079	513445	7257748	5N	Mafic schist	---
2011LF079A	65.441167	-152.698982	513961	7257465	5N	Mafic schist	---
2011LF099B	65.500417	-152.866859	506161	7264042	5N	Orthogneiss(?)	Small
2011LF099C	65.500417	-152.866859	506161	7264042	5N	Amphibolite	---
2011LF100B	65.500642	-152.868155	506101	7264067	5N	Mafic schist	---
2011LF105A	65.507034	-152.883146	505406	7264778	5N	Ultramafic	---
2011LF113A	65.430340	-152.825511	508096	7256236	5N	Quartz-chlorite-albite schist	---
2011LF114A	65.430806	-152.833569	507722	7256287	5N	Chlorite-muscovite quartz schist	---

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011GG497A	68.1	18.1	0.163	0.25	5.62	3.52	1.59	0.0385	0.734
2011GG518A	57.8	11.5	<0.03	9	11.9	0.07	5.69	0.21	2.08
2011GG519A	49.3	16.1	0.07	11.1	10.9	0.69	5.79	0.17	3.98
2011GG520A	51.1	15.1	0.05	10.8	12.4	0.12	4.89	0.23	3.41
2011GG522A	46.6	12.5	0.07	10.3	17.6	0.63	6.32	0.21	2.73
2011GG523A	50.1	15.7	0.06	11.1	11.5	0.13	5.86	0.19	3.61
2011GG523B	81.5	7.18	0.0347	1.11	3.29	0.0944	1.06	0.0639	5.15
2011GG524A	51.3	15.4	0.126	11.1	9.62	0.204	5.7	0.18	4.22
2011GG547B	57.9	16.2	0.03	2.09	10.2	0.18	4.87	0.12	5.52
2011GG564A	71.2	16.3	0.0692	0.367	4.55	3.01	1.5	0.0377	2.09
2011GG564B	68.9	18.2	0.0851	0.26	4.95	4.44	1.49	0.0383	0.641
2011LF006A	51.1	12.4	0.0313	3.21	19.8	0.0337	7.54	0.187	3.23
2011LF007B	46.7	9.49	<0.03	10.4	12.8	<.02	19.5	0.221	0.271
2011LF012A	55	17.6	<0.03	1.87	13.9	0.0262	4.02	0.151	4.58
2011LF032A	49.1	16.5	<0.03	12.7	9.81	0.0269	10.8	0.193	0.286
2011LF051B	46.3	30.3	0.212	0.0547	11.5	5.83	3.09	0.057	0.944
2011LF052A	76.1	12.9	0.0903	0.364	4.49	2.53	1.61	0.0477	0.803
2011LF055A	73.1	10.6	<0.03	4.55	5.67	0.312	2.62	0.102	1.6
2011LF057A	49.8	14.5	0.0582	16.3	10.9	1.04	4.62	0.2	1.15
2011LF063B	56.4	19.9	0.135	8.98	6.46	2.82	2.99	0.0905	1.25
2011LF069C	53.7	16.6	0.191	0.55	15.9	2.39	6.68	0.125	0.0342
2011LF069C	87.9	7.5	0.0786	0.116	0.364	1.65	0.559	<0.03	0.529
2011LF073A	53.7	14.3	<0.03	12.8	6.61	0.0595	7.87	0.132	3.62
2011LF073B	51.2	18	<0.03	9.13	8.68	0.104	7.3	0.256	4.68
2011LF076A	53.9	16.1	<0.03	7.35	9.8	0.0503	4.71	0.168	6.68
2011LF079A	54.9	15.7	<0.03	3.06	10.5	0.255	5.67	0.202	7.91
2011LF099B	70.1	13.6	0.355	6.31	2.91	2.35	2.1	0.0783	1.39
2011LF099C	48.5	19.3	<0.03	13.2	8.33	0.098	7.71	0.183	1.51
2011LF100B	49.6	15.3	0.0761	9.64	11.3	0.426	7.54	0.25	4.18
2011LF105A	45.9	7.35	<0.03	3.76	8.95	<.02	33	0.168	0.0688
2011LF113A	60.1	13.3	<0.03	2.42	13.4	0.0306	4.07	0.261	4.11
2011LF114A	67.4	17.7	0.098	0.311	7.89	3.32	1.62	0.169	0.501

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011GG497A	0.566	0.99	<0.05	99.6715	15	<2	<5	<60	122
2011GG518A	0.19	1.36	<0.05	99.80199	<4	<2	<5	<60	108
2011GG519A	0.14	1.58	<0.05	99.8205	<4	<2	<5	<60	289
2011GG520A	0.22	1.58	<0.05	99.889	<4	<2	<5	<60	90
2011GG522A	0.23	2.57	<0.05	99.7653	<4	<2	<5	<60	108
2011GG523A	0.2	1.3	<0.05	99.7485	<4	<2	<5	<60	91
2011GG523B	0.13	0.262	<0.05	99.875	<4	<2	<5	<60	722
2011GG524A	0.184	1.78	<0.05	99.814	<4	<2	<5	<60	197
2011GG547B	0.46	2.28	<0.05	99.8539	12	<2	<5	<60	143
2011GG564A	0.105	0.599	<0.05	99.8279	<4	<2	<5	<60	201
2011GG564B	0.0904	0.755	<0.05	99.8498	<4	<2	<5	<60	204
2011LF006A	0.212	2.15	<0.05	99.894	<4	<2	<5	<60	53
2011LF007B	<0.03	0.381	<0.05	99.81018	<4	<2	<5	<60	81
2011LF012A	0.332	2.23	<0.05	99.7344	50	<2	<5	<60	<50
2011LF032A	0.0494	0.313	<0.05	99.7924	<4	<2	<5	<60	89
2011LF051B	<0.03	1.52	<0.05	99.8207	<4	<2	<5	<60	156
2011LF052A	0.274	0.557	<0.05	99.766	<4	<2	<5	363	196
2011LF055A	0.441	0.739	<0.05	99.7606	<4	<2	<5	<60	295
2011LF057A	0.161	1.01	<0.05	99.7392	63	<2	<5	<60	201
2011LF063B	<0.03	0.763	<0.05	99.8038	5	<2	<5	<60	460
2011LF069C	0.669	2.42	<0.05	99.2592	<4	<2	<5	<60	259
2011LF069C	0.0458	1.14	<0.05	99.8989	<4	<2	<5	<60	133
2011LF073A	<0.03	0.779	<0.05	99.9285	<4	<2	<5	<60	<50
2011LF073B	0.0753	0.454	<0.05	97.8793	<4	<2	<5	<60	100
2011LF076A	0.19	0.906	<0.05	99.8721	<4	<2	<5	<60	<50
2011LF079A	0.15	0.735	<0.05	99.0996	<4	<2	<5	<60	258
2011LF099B	0.249	0.406	<0.05	99.8483	<4	<2	<5	<60	156
2011LF099C	0.163	0.739	<0.05	99.7498	86	<2	<5	<60	388
2011LF100B	0.244	1.32	<0.05	99.8761	<4	<2	<5	<60	165
2011LF105A	<0.03	0.149	<0.05	99.38599	<4	<2	<5	<60	171
2011LF113A	0.584	1.63	<0.05	99.9185	<4	<2	<5	<60	150
2011LF114A	0.156	0.763	<0.05	99.928	59	<2	<5	<60	119

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011GG497A	52	183	16	1300	<50	<1	<1	16	16
2011GG518A	117	189	31	<110	<50	<1	<1	8	75
2011GG519A	57	184	93	<110	<50	<1	<1	5	114
2011GG520A	77	180	165	199	<50	<1	<1	7	52
2011GG522A	121	306	87	<110	<50	<1	<1	7	135
2011GG523A	64	165	85	<110	<50	<1	<1	6	69
2011GG523B	<10	30	<7	<110	<50	<1	<1	8	58
2011GG524A	83	156	177	<110	<50	<1	<1	8	67
2011GG547B	54	225	49	<110	<50	<1	<1	26	69
2011GG564A	106	124	91	<110	<50	<1	<1	12	55
2011GG564B	30	100	45	<110	<50	<1	<1	13	42
2011LF006A	10	157	16	<110	<50	<1	<1	11	46
2011LF007B	107	1600	170	<110	<50	<1	<1	1	640
2011LF012A	48	68	54	<110	<50	<1	<1	14	20
2011LF032A	119	413	56	<110	<50	<1	<1	4	347
2011LF051B	121	231	90	121	<50	<1	26	22	73
2011LF052A	35	83	18	<110	<50	<1	5	---	31
2011LF055A	<10	103	48	1390	<50	<1	9	---	24
2011LF057A	51	504	49	<110	<50	<1	<1	7	180
2011LF063B	23	165	<7	<110	<50	<1	<1	8	30
2011LF069C	116	227	70	<110	<50	<1	<1	14	259
2011LF069C	<10	89	43	114	<50	<1	24	---	22
2011LF073A	67	457	12	<110	<50	<1	<1	1	93
2011LF073B	38	169	45	<110	<50	<1	<1	1	130
2011LF076A	103	82	139	<110	<50	<1	<1	2	85
2011LF079A	49	57	74	<110	<50	<1	<1	1	49
2011LF099B	26	51	22	592	<50	<1	10	---	30
2011LF099C	78	337	<7	<110	<50	<1	<1	1	158
2011LF100B	63	383	16	<110	<50	<1	<1	9	67
2011LF105A	125	3910	<7	<110	<50	<1	<1	---	2400
2011LF113A	53	45	<7	<110	<50	<1	11	13	68
2011LF114A	101	128	27	<110	<50	<1	15	16	45

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011GG497A	39	<1	165	672	<2	<4	<1	67	<2
2011GG518A	<4	<1	1	100	<2	366	<1	142	<2
2011GG519A	<4	<1	20	126	<2	<4	<1	192	<2
2011GG520A	27	<1	2	181	<2	<4	<1	161	<2
2011GG522A	<4	<1	18	70	<2	<4	<1	215	<2
2011GG523A	<4	<1	2	362	<2	<4	<1	137	<2
2011GG523B	<4	<1	2	189	<2	<4	<1	37	<2
2011GG524A	<4	<1	2	108	<2	<4	<1	204	<2
2011GG547B	<4	<1	3	432	<2	<4	<1	34	<2
2011GG564A	39	<1	123	259	<2	<4	<1	120	<2
2011GG564B	45	<1	150	72	<2	<4	<1	78	<2
2011LF006A	<4	<1	1	133	<2	<4	<1	59	<2
2011LF007B	<4	<1	1	80	<2	<4	<1	27	<2
2011LF012A	22	<1	1	83	<2	<4	<1	77	<2
2011LF032A	<4	<1	5	101	<2	<4	<1	100	<2
2011LF051B	34	317	258	104	<2	<4	93	77	<2
2011LF052A	34	105	---	123	<2	<4	52	---	<2
2011LF055A	45	20	---	114	<2	<4	163	---	<2
2011LF057A	29	<1	56	88	<2	<4	<1	94	<2
2011LF063B	36	<1	173	111	<2	<4	<1	178	<2
2011LF069C	<4	<1	47	4460	<2	<4	<1	10	<2
2011LF069C	17	40	---	196	<2	<4	68	---	<2
2011LF073A	<4	<1	2	37	<2	<4	<1	127	<2
2011LF073B	<4	<1	2	64	<2	<4	<1	88	<2
2011LF076A	<4	<1	1	37	<2	<4	<1	98	<2
2011LF079A	<4	<1	5	8040	<2	<4	<1	50	<2
2011LF099B	44	72	---	36	<2	<4	391	---	<2
2011LF099C	28	<1	3	1310	<2	<4	<1	321	<2
2011LF100B	<4	<1	13	<30	<2	<4	<1	312	<2
2011LF105A	<4	<1	---	158	<2	<4	<1	---	<2
2011LF113A	26	<1	<1	159	<2	<4	143	128	<2
2011LF114A	<4	154	148	31	<2	<4	37	42	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011GG497A	<1	247	<8	<1	23	134	<9	211
2011GG518A	<1	397	<8	<1	28	76	<9	98
2011GG519A	<1	465	<8	<1	27	84	<9	98
2011GG520A	<1	441	<8	<1	32	123	<9	109
2011GG522A	<1	622	<8	<1	29	126	<9	131
2011GG523A	<1	412	<8	<1	25	110	<9	97
2011GG523B	<1	89	<8	<1	17	26	<9	62
2011GG524A	<1	447	<8	<1	28	76	<9	110
2011GG547B	<1	434	<8	<1	19	97	<9	187
2011GG564A	<1	113	<8	<1	13	108	<9	121
2011GG564B	<1	141	<8	<1	19	79	<9	139
2011LF006A	<1	441	<8	<1	31	390	<9	179
2011LF007B	<1	195	<8	<1	6	87	<9	21
2011LF012A	<1	689	<8	<1	37	228	<9	191
2011LF032A	<1	171	<8	<1	23	68	<9	36
2011LF051B	<1	413	<8	61	35	140	319	352
2011LF052A	<1	145	<8	34	---	87	76	<9
2011LF055A	<1	146	<8	39	---	55	100	---
2011LF057A	<1	335	<8	<1	41	83	<9	60
2011LF063B	<1	410	<8	<1	18	66	<9	220
2011LF069C	<1	439	<8	<1	25	440	<9	129
2011LF069C	<1	219	<8	48	---	26	196	---
2011LF073A	<1	299	<8	<1	14	38	<9	22
2011LF073B	<1	154	<8	<1	11	76	<9	29
2011LF076A	<1	343	<8	<1	29	77	<9	89
2011LF079A	<1	417	<8	<1	22	90	<9	52
2011LF099B	<1	70	<8	35	---	89	151	---
2011LF099C	<1	250	<8	<1	28	180	<9	36
2011LF100B	<1	389	<8	<1	25	84	<9	112
2011LF105A	<1	120	<8	<1	---	59	<9	<9
2011LF113A	<1	477	<8	46	48	236	140	182
2011LF114A	<1	147	<8	24	19	77	107	156

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011LF127A	65.427332	-152.879083	505611	7255895	5N	Albite-muscovite quartz schist	---
2011LF130C	65.254708	-152.737909	512242	7236675	5N	Chlorite-quartz-muscovite schist	---
2011LF137A	65.254653	-152.764307	511009	7236664	5N	Albite-chlorite-muscovite- Quartz schist	---
2011LF141A	65.253371	-152.783008	510136	7236518	5N	Albite-muscovite quartzite	---
2011LF147A	65.249292	-152.805002	509110	7236060	5N	Muscovite quartz schist	---
2011LF149A	65.248561	-152.808604	508942	7235978	5N	Albite-muscovite quartz schist	---
2011LF153A	65.312968	-152.679140	514954	7243181	5N	Muscovite-albite-chlorite-quartz schist	---
2011LF164A	65.310504	-152.640766	516744	7242916	5N	Mafic schist	---
2011LF165A	65.310589	-152.638877	516832	7242926	5N	?-high magnesium, chromium, silicon	---
2011LF167A	65.309965	-152.633157	517099	7242858	5N	Mafic schist	---
2011LF177A	65.345649	-152.707830	513600	7246817	5N	Albite-muscovite-quartz schist	---
2011LF181B	65.345225	-152.701712	513885	7246771	5N	Mafic schist	---
2011LF184A	65.347249	-152.691054	514380	7246999	5N	Mafic schist	---
2011LF186A	65.348474	-152.684465	514686	7247137	5N	Mafic schist	---
2011LF196A	65.451681	-152.498387	523255	7258696	5N	Gabbro	Altered
2011LF200A	65.446464	-152.497279	523311	7258115	5N	Mafic schist	---
2011LF206A	65.440355	-152.503174	523043	7257432	5N	Gabbro	---
2011LF207C	65.439035	-152.505593	522932	7257284	5N	Chlorite-quartz-albite schist	---
2011LF209A	65.435021	-152.504461	522988	7256837	5N	Gabbro	---
2011LF218A	65.428223	-152.516572	522432	7256075	5N	Gabbro	---
2011LF219A	65.420283	-152.519455	522305	7255989	5N	Mafic schist	---
2011LF221A	65.426475	-152.522617	522153	7255878	5N	Metagabbro	---
2011LF232A	65.412532	-152.528212	521905	7254322	5N	Mafic schist	---
2011LF235A	65.406861	-152.528184	521911	7253690	5N	Metagabbro	---
2011LF238A	65.401984	-152.523514	522132	7253148	5N	Gabbro	---
2011LF239A	65.324108	-152.963787	501687	7244385	5N	Mafic schist	---
2011LF268B	65.235238	-152.765122	510979	7234500	5N	Igneous(?) with feldspar(?)	Altered
2011LF276A	65.341591	-153.136439	493648	7246340	5N	Gabbro	Altered
2011LF281A	65.336915	-153.147389	493137	7245820	5N	Chlorite-albite schist	---
2011LF285A	65.334052	-153.157573	492662	7245502	5N	Metamafic	---
2011LF288B	65.330755	-153.169555	492103	7245136	5N	Mafic schist	Inhomogenous, altered

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011LF127A	87.2	5.16	0.0523	2.31	1.51	1.42	1.28	0.0498	0.671
2011LF130C	58	22.2	0.192	0.139	11	4.89	1.43	0.0769	0.772
2011LF137A	77.7	11.6	0.0708	0.169	3.64	2.46	1.78	0.0838	1.18
2011LF141A	93.3	4.06	0.0342	0.11	0.79	0.573	0.25	<0.03	0.466
2011LF147A	87.2	7.04	0.121	0.0764	1.61	2.28	0.546	<0.03	0.233
2011LF149A	69.9	16.1	0.118	0.115	5.71	3.99	1.89	0.182	1.19
2011LF153A	85.6	5.68	0.0544	0.216	3.53	0.832	2.47	0.0521	0.921
2011LF164A	57.5	13.1	<0.03	3.49	11.8	0.0584	5.45	0.123	4.4
2011LF165A	63.1	11	<0.03	1.54	12.4	0.0233	7.86	0.153	2.09
2011LF167A	54.4	14.7	0.0409	0.538	16.1	0.116	4.71	0.295	4.31
2011LF177A	72.5	15.1	0.0682	0.145	6.28	1.83	1.15	0.274	1.71
2011LF181B	51.1	13.6	0.0484	9.31	12	0.423	5.59	0.233	5.33
2011LF184A	52.6	15.8	0.0956	9.41	10.1	0.556	5.46	0.159	4.32
2011LF186A	53.3	16.6	0.0549	9.01	10.1	0.357	4.63	0.18	3.56
2011LF196A	49.5	15.2	0.0585	11.6	9.56	0.536	10	0.164	2.32
2011LF200A	50.8	11.2	0.0549	10.3	13	0.366	10.7	0.235	1.61
2011LF206A	48.7	15.7	0.0443	13.4	7.89	0.254	9.77	0.141	3
2011LF207C	68.9	14.8	<0.03	0.791	3.77	0.0466	2.05	0.115	8.86
2011LF209A	47.7	15.1	<0.03	11.9	12.9	0.0235	7	0.197	3.13
2011LF218A	50.1	15.2	<0.03	12.6	9.82	0.0815	8	0.184	2.63
2011LF219A	55.6	15.2	0.0775	6.98	9.44	1.66	5	0.175	4.39
2011LF221A	52.1	14.9	0.13	8.43	10.4	0.884	6.82	0.246	4.36
2011LF232A	47.2	15.5	0.0646	13.5	11.3	0.929	7.44	0.193	1.87
2011LF235A	51.4	14.8	0.396	7.45	11.6	1.89	6.03	0.249	4.04
2011LF238A	45.3	16.2	<0.03	19.5	6.81	<.02	11	0.136	0.281
2011LF239A	46.5	18.9	<0.03	17.1	8.19	0.0233	8.36	0.173	0.189
2011LF268B	89.7	5.45	0.0353	0.28	1.94	0.755	0.76	<0.03	0.576
2011LF276A	55.5	12	<0.03	11.9	10.5	0.0483	6.77	0.233	1.46
2011LF281A	62	14.3	0.149	4.6	8.59	0.543	1.82	0.15	5.86
2011LF285A	52.9	14.5	0.0302	7.47	12.3	0.0918	4.58	0.208	5.92
2011LF288B	51.8	16.6	0.219	8.83	10.9	1.21	4.75	0.174	4.14

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011LF127A	0.0917	0.233	<0.05	99.9778	<4	<2	<5	<60	188
2011LF130C	0.139	0.97	<0.05	99.8089	<4	<2	<5	<60	123
2011LF137A	0.285	0.711	<0.05	99.6796	47	<2	<5	<60	235
2011LF141A	0.07	0.25	<0.05	99.91125	33	<2	<5	<60	109
2011LF147A	0.0328	0.355	<0.05	99.50323	<4	<2	<5	<60	186
2011LF149A	0.0497	0.613	<0.05	99.8577	<4	<2	<5	<60	268
2011LF153A	0.203	0.361	<0.05	99.9195	<4	<2	<5	<60	148
2011LF164A	0.881	2.88	<0.05	99.6995	67	<2	<5	<60	144
2011LF165A	0.27	1.28	<0.05	99.7163	48	<2	<5	<60	91
2011LF167A	0.623	3.93	<0.05	99.7629	9	<2	<5	<60	277
2011LF177A	0.101	0.673	<0.05	99.8312	53	<2	<5	<60	128
2011LF181B	0.163	1.52	<0.05	99.3174	<4	<2	<5	<60	219
2011LF184A	0.292	1.05	<0.05	99.8426	28	<2	<5	<60	50
2011LF186A	0.319	1.67	<0.05	99.7809	5	<2	<5	<60	123
2011LF196A	0.138	0.681	<0.05	99.7575	<4	<2	<5	<60	199
2011LF200A	0.097	1.39	<0.05	99.7529	<4	<2	<5	<60	161
2011LF206A	0.104	0.771	<0.05	99.7743	<4	<2	<5	<60	112
2011LF207C	0.0629	0.493	<0.05	99.9102	<4	<2	<5	<60	70
2011LF209A	0.339	1.57	<0.05	99.8889	<4	<2	<5	<60	149
2011LF218A	0.165	1.04	<0.05	99.8446	5	<2	<5	<60	61
2011LF219A	0.381	0.877	<0.05	99.7805	<4	<2	<5	<60	104
2011LF221A	0.245	1.3	<0.05	99.815	<4	<2	<5	<60	471
2011LF232A	0.252	1.5	<0.05	99.7486	49	<2	<5	<60	123
2011LF235A	0.22	1.68	<0.05	99.755	<4	<2	<5	<60	292
2011LF238A	0.0608	0.511	<0.05	99.82442	<4	<2	<5	<60	91
2011LF239A	0.0389	0.339	<0.05	99.8292	<4	<2	<5	<60	110
2011LF268B	0.0691	0.302	<0.05	99.87465	43	<2	<5	<60	311
2011LF276A	0.195	1.09	<0.05	99.7131	<4	<2	<5	<60	156
2011LF281A	0.473	1.39	<0.05	99.875	4	<2	<5	<60	<50
2011LF285A	0.529	1.36	<0.05	99.889	41	<2	<5	<60	231
2011LF288B	0.214	1.1	<0.05	99.937	56	<2	<5	<60	210

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011LF127A	<10	56	<7	<110	<50	<1	<1	---	26
2011LF130C	<10	122	17	<110	<50	<1	21	18	51
2011LF137A	<10	88	48	1430	<50	<1	<1	8	72
2011LF141A	<10	50	<7	<110	<50	<1	6	---	22
2011LF147A	<10	53	<7	<110	<50	<1	8	7	30
2011LF149A	<10	97	<7	<110	<50	<1	20	---	61
2011LF153A	<10	230	31	<110	<50	<1	6	3	102
2011LF164A	52	219	126	<110	<50	<1	<1	76	56
2011LF165A	94	1150	75	<110	<50	<1	16	---	273
2011LF167A	43	116	59	<110	<50	<1	<1	30	20
2011LF177A	11	91	49	<110	<50	<1	12	---	42
2011LF181B	16	189	229	<110	<50	<1	<1	5	69
2011LF184A	28	146	42	<110	<50	<1	<1	7	49
2011LF186A	37	84	65	<110	<50	<1	<1	8	50
2011LF196A	94	189	111	<110	<50	<1	<1	4	194
2011LF200A	65	572	109	<110	<50	<1	<1	5	353
2011LF206A	85	716	166	<110	<50	<1	<1	4	299
2011LF207C	<10	51	11	<110	<50	<1	14	12	68
2011LF209A	71	291	111	<110	<50	<1	<1	12	85
2011LF218A	48	116	16	<110	<50	<1	<1	5	62
2011LF219A	34	118	50	<110	<50	<1	<1	9	57
2011LF221A	63	312	19	<110	<50	<1	<1	8	59
2011LF232A	123	753	127	<110	<50	<1	<1	8	153
2011LF235A	73	130	190	<110	<50	<1	<1	8	20
2011LF238A	40	582	153	<110	<50	<1	<1	2	218
2011LF239A	54	246	48	<110	<50	<1	<1	2	206
2011LF268B	<10	80	<7	<110	<50	<1	6	5	<7
2011LF276A	89	506	<7	1520	<50	<1	<1	7	109
2011LF281A	54	<30	19	<110	<50	<1	<1	21	<7
2011LF285A	95	82	<7	<110	<50	<1	<1	10	23
2011LF288B	<10	54	31.2	<110	<50	<1	<1	8.1	41

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011LF127A	<4	59	---	47	<2	<4	116	---	<2
2011LF130C	<4	217	205	56	<2	<4	51	54	<2
2011LF137A	58	101	79	109	<2	<4	18	11	<2
2011LF141A	14	27	---	64	<2	<4	30	---	<2
2011LF147A	<4	94	88	4260	<2	<4	12	13	<2
2011LF149A	22	164	---	85	<2	<4	61	---	<2
2011LF153A	24	26	24	77	<2	<4	12	9	<2
2011LF164A	27	<1	2	905	<2	<4	<1	49	<2
2011LF165A	29	6	---	83	<2	<4	16	---	<2
2011LF167A	28	<1	4	131	<2	<4	<1	50	<2
2011LF177A	66	87	---	54	<2	<4	110	---	<2
2011LF181B	<4	<1	14	5170	<2	<4	<1	207	<2
2011LF184A	22	<1	21	34	<2	<4	<1	355	<2
2011LF186A	30	<1	46	30	<2	<4	<1	279	<2
2011LF196A	<4	<1	17	40	<2	<4	<1	181	<2
2011LF200A	<4	<1	11	69	<2	<4	<1	197	<2
2011LF206A	<4	<1	7	82	<2	<4	<1	124	<2
2011LF207C	<4	<1	1	43	<2	<4	48	44	<2
2011LF209A	<4	<1	1	53	<2	<4	<1	101	<2
2011LF218A	21	<1	2	43	<2	<4	<1	314	<2
2011LF219A	<4	<1	42	103	<2	<4	<1	1240	<2
2011LF221A	<4	<1	30	69	<2	<4	<1	144	<2
2011LF232A	15	<1	31	40	<2	<4	<1	78	<2
2011LF235A	<4	<1	59	<30	<2	<4	<1	262	<2
2011LF238A	<4	<1	1	43	<2	<4	<1	271	<2
2011LF239A	38	<1	1	<30	<2	<4	<1	119	<2
2011LF268B	39	28	23	68	<2	<4	43	34	<2
2011LF276A	<4	<1	<1	38	<2	<4	<1	330	<2
2011LF281A	<4	<1	20	54	<2	<4	<1	309	<2
2011LF285A	19	<1	2	86	<2	20	<1	300	<2
2011LF288B	25.7	<1	39.5	213	<2	<4	<1	286.8	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011LF127A	<1	38	<8	18	---	12	75	<9
2011LF130C	<1	169	<8	31	32	105	119	173
2011LF137A	<1	135	<8	25	20	68	214	193
2011LF141A	<1	46	<8	6	---	15	208	---
2011LF147A	<1	62	<8	7	9	25	120	144
2011LF149A	<1	145	<8	31	---	72	163	---
2011LF153A	<1	96	<8	9	5	61	60	63
2011LF164A	<1	490	<8	<1	33	268	<9	386
2011LF165A	<1	379	<8	15	---	143	118	---
2011LF167A	<1	844	<8	<1	42	153	<9	305
2011LF177A	<1	97	<8	20	---	78	93	---
2011LF181B	<1	367	<8	<1	28	120	<9	89
2011LF184A	<1	350	<8	<1	24	96	<9	119
2011LF186A	<1	434	<8	<1	30	110	<9	121
2011LF196A	<1	173	<8	<1	13	67	<9	45
2011LF200A	<1	456	<8	<1	16	134	<9	64
2011LF206A	<1	264	<8	<1	11	56	<9	43
2011LF207C	<1	145	<8	21	23	23	281	319
2011LF209A	<1	411	<8	<1	29	113	<9	128
2011LF218A	<1	191	<8	<1	15	69	<9	45
2011LF219A	<1	366	<8	<1	20	96	<9	60
2011LF221A	<1	442	<8	<1	24	97	<9	107
2011LF232A	<1	397	<8	<1	16	103	<9	96
2011LF235A	<1	529	<8	<1	25	106	<9	105
2011LF238A	<1	194	<8	<1	7	51	<9	23
2011LF239A	<1	190	<8	<1	6	57	<9	18
2011LF268B	<1	75	<8	11	11	16	129	139
2011LF276A	<1	322	<8	<1	22	117	<9	95
2011LF281A	<1	244	<8	<1	50	65	<9	332
2011LF285A	<1	379	<8	<1	34	92	<9	119
2011LF288B	<1	333	<8	<1	22.7	77.1	<9	116.5

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011LF301A	65.457771	-152.751456	511520	7259305	5N	Granite aplite	---
2011LF307A	65.451363	-152.819224	508381	7258580	5N	Metagabbro	---
2011LF309A	65.449574	-152.816389	508513	7258381	5N	Metamafic	---
2011LF310A	65.449250	-152.815766	508542	7258345	5N	Calc-silicate honrfels(?)	Small
2011LF312A	65.447452	-152.812759	508682	7258145	5N	Metagabbro(?)	---
2011LF317A	65.469164	-152.666391	515456	7260593	5N	Quartzite	Inhomogenous
2011LF319A	65.504161	-152.748940	511616	7264476	5N	Granite aplite	---
2011LF343A	65.454553	-152.597955	518637	7258983	5N	Fine-grained gabbro(?)	---
2011LF344A	65.453967	-152.596950	518684	7258918	5N	Fine-grained gabbro(?)	Poor polish
2011LF347A	65.450608	-152.595599	518749	7258544	5N	Fine-grained Metagabbro(?)	---
2011LF350A	65.445784	-152.610683	518053	7258002	5N	Gabbro	Altered, porous
2011LF355B	65.378361	-152.887805	505216	7250436	5N	Quartz-chlorite schist	Inhomogenous
2011LF357B	65.378394	-152.884556	505367	7250440	5N	Coarse-grained Metamafic	Inhomogenous
2011LF359A	65.378419	-152.881567	505506	7250443	5N	Ankerite(?)-chlorite schist	Inhomogenous
2011LF359B	65.378419	-152.881567	505506	7250443	5N	Ankerite(?)-chlorite schist	Inhomogenous
2011LF366B	65.301056	-153.112723	494744	7241820	5N	Chloritoid quartz schist	Inhomogenous
2011LF372B	65.378942	-152.863969	506324	7250503	5N	Garnet amphibolite(?)	---
2011LF384A	65.265173	-152.988413	500541	7237816	5N	Glaucophane Metamafic	---
2011LF384B	65.265173	-152.988413	500541	7237816	5N	Coarse-grained Metamafic	---
2011LF388B	65.262868	-153.001991	499907	7237559	5N	Clinopyroxenite(?)	Altered
2011LF389A	65.260634	-153.004218	499803	7237310	5N	Glaucophane Metamafic	---
2011LF418A	65.261546	-152.832922	507802	7237422	5N	Metagabbro(?)	Porous
2011LF419B	65.261664	-152.834506	507728	7237435	5N	Metagabbro(?)	Porous
2011LF441B	65.306625	-152.835254	507680	7242446	5N	Calcareous greenschist(?)	Porous
2011LF450B	65.298556	-152.816990	508534	7241549	5N	Muscovite-chloritoid quartz schist	---
2011LF450B	65.298556	-152.816990	508534	7241549	5N	Muscovite-chloritoid quartz schist	---
2011LF466A	65.384373	-152.598103	518680	7251161	5N	Quartzite	Porous
2011LF474A	65.390861	-152.622968	517520	7251877	5N	Quartzite	Porous
2011LF477B	65.388742	-152.633219	517045	7251638	5N	Greenstone	Porous
2011LF484B	65.425908	-152.983752	500754	7255731	5N	Quartzite	Inhomogenous
2011LF485B	65.397168	-152.633898	517008	7252577	5N	Quartzite	---
2011LF486A	65.398017	-152.635953	516912	7252671	5N	Plagioclase-biotite-quartz paragneiss	---

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011LF301A	76.6	13.4	<0.03	0.539	0.172	4.3	0.317	<0.03	4.43
2011LF307A	52.1	16.6	0.0333	8.52	10.1	0.345	5.57	0.166	4.63
2011LF309A	51	13.8	0.0378	11.7	11.9	0.301	6.87	0.258	2.46
2011LF310A	66.1	16.1	0.0648	6.98	4.34	1.73	2.18	0.0729	1.38
2011LF312A	51.2	17.9	<0.03	9.43	10.2	0.0821	5.17	0.174	3.74
2011LF317A	94.8	2.9	0.0772	0.0684	0.425	0.727	0.369	<0.03	0.0365
2011LF319A	76.7	13	0.245	1.14	0.179	5.24	0.15	<0.03	3.23
2011LF343A	51.8	14.6	<0.03	9.32	11.6	0.132	5.19	0.148	4.3
2011LF344A	54.9	14	0.0567	7.59	10.3	0.219	4.93	0.163	5.4
2011LF347A	50.8	14.8	0.198	9	12.3	0.343	5.19	0.203	4.76
2011LF350A	52.7	16	0.0602	5.62	12.1	0.0291	5.03	0.458	6.09
2011LF355B	61.6	13.5	<0.03	3.81	12.6	0.0403	3.99	0.187	1.77
2011LF357B	50.4	15.2	<0.03	9.5	11.1	0.0758	8.85	0.209	3.48
2011LF359A	57.8	13	0.0436	8.75	8.59	1.25	8.92	0.119	0.124
2011LF359B	57.6	15.3	0.0391	5.19	10.4	0.217	6.84	0.104	3.13
2011LF366B	88.8	6.1	0.0525	0.096	2.35	1	0.35	<0.03	0.673
2011LF372B	50.4	14	<0.03	9.13	14	0.129	5.1	0.181	4.39
2011LF384A	49.3	14.6	<0.03	11.5	12.4	0.0582	6.1	0.161	3.75
2011LF384B	50.3	15.4	0.047	12.6	9.11	0.226	7.96	0.159	3.03
2011LF388B	51.5	6.6	0.0455	16.4	10	0.209	12	0.179	1.35
2011LF389A	52	16.1	0.137	10.3	8.74	0.91	6.44	0.146	3.96
2011LF418A	55.9	12.3	<0.03	5.32	11.7	0.104	8.84	0.191	3.69
2011LF419B	50.48716	14.5	0.04069	6.13931	13.17882	0.20243	6.74498	0.26417	4.89164
2011LF441B	51.2	18	<0.03	0.36	21.4	0.0707	3.63	0.362	0.552
2011LF450B	77.2	12.6	0.115	0.475	4.46	2.22	1.38	0.0386	0.233
2011LF450B	77.1	12.6	0.102	0.472	4.38	2.18	1.47	0.0474	0.25
2011LF466A	98.2	0.9	0.0666	0.0942	0.133	0.106	0.271	<0.03	0.138
2011LF474A	98.1	0.9	<0.03	0.0747	0.331	0.0809	0.184	<0.03	0.117
2011LF477B	61.1	11.4	<0.03	2.56	15.3	0.151	4.3	0.213	2.37
2011LF484B	78.8	9.58	0.0492	1.37	3.59	2.49	1.51	0.0448	1.59
2011LF485B	94.8	2.4	<0.03	0.111	1.13	0.603	0.613	<0.03	0.0579
2011LF486A	97.4	1.2	0.032	0.0355	0.659	0.237	0.153	<0.03	0.098

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011LF301A	<0.03	0.0235	<0.05	99.7981	11	<2	<5	<60	188
2011LF307A	0.25	1.46	<0.05	99.7743	<4	<2	<5	<60	576
2011LF309A	0.113	1.19	<0.05	99.6298	<4	<2	<5	<60	1250
2011LF310A	0.294	0.564	<0.05	99.8057	<4	<2	<5	<60	744
2011LF312A	0.261	1.61	<0.05	99.7866	6	<2	<5	<60	441
2011LF317A	0.36	0.187	<0.05	99.9052	<4	<2	<5	<60	202
2011LF319A	<0.03	0.0412	<0.05	99.94215	<4	<2	<5	<60	63
2011LF343A	0.316	2.36	<0.05	99.7948	<4	<2	<5	<60	199
2011LF344A	0.305	1.95	<0.05	99.8137	<4	<2	<5	<60	81
2011LF347A	0.288	1.87	<0.05	99.752	<4	<2	<5	<60	119
2011LF350A	0.395	1.33	<0.05	99.8123	<4	<2	<5	<60	180
2011LF355B	0.113	2.14	<0.05	99.7704	73	<2	<5	<60	156
2011LF357B	0.099	0.804	<0.05	99.737	5	<2	<5	<60	430
2011LF359A	0.385	0.722	<0.05	99.7036	<4	<2	<5	<60	548
2011LF359B	0.0367	0.887	<0.05	99.7438	<4	<2	<5	<60	198
2011LF366B	0.0616	0.329	<0.05	99.8703	<4	<2	<5	<60	81
2011LF372B	0.406	2.01	<0.05	99.7678	8	<2	<5	<60	126
2011LF384A	0.0915	1.86	<0.05	99.8441	59	<2	<5	<60	158
2011LF384B	0.354	0.72	<0.05	99.906	<4	<2	<5	<60	146
2011LF388B	0.162	1.06	<0.05	99.5455	<4	<2	<5	<60	613
2011LF389A	0.205	0.955	<0.05	99.893	7	<2	<5	<60	229
2011LF418A	0.313	1.37	<0.05	99.7558	<4	<2	<5	<60	133
2011LF419B	2	1.27611	<0.05	99.78723	<4	<2	<5	<60	148
2011LF441B	0.538	3.36	<0.05	99.4905	13	<2	<5	<60	129
2011LF450B	0.53	0.675	<0.05	99.9266	<4	<2	<5	<60	144
2011LF450B	0.529	0.668	<0.05	99.7984	<4	<2	<5	<60	156
2011LF466A	<0.03	0.0285	<0.05	99.9838	<4	<2	<5	<60	295
2011LF474A	<0.03	0.0344	<0.05	99.83412	<4	<2	<5	<60	391
2011LF477B	0.789	1.63	<0.05	99.841	<4	<2	<5	<60	141
2011LF484B	0.131	0.691	<0.05	99.846	<4	<2	<5	204	525
2011LF485B	0.0869	0.0939	<0.05	99.9377	<4	<2	<5	<60	257
2011LF486A	0.0473	0.0467	<0.05	99.9185	<4	<2	<5	<60	<50

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011LF301A	<10	<30	<7	<110	<50	<1	<1	50	33
2011LF307A	43	40	57	<110	<50	<1	<1	7	37
2011LF309A	10	660	25	<110	<50	<1	<1	6	70
2011LF310A	25	117	7	<110	<50	<1	<1	12	27
2011LF312A	75	39	34	<110	<50	<1	<1	9	46
2011LF317A	<10	63	<7	<110	<50	<1	<1	3	19
2011LF319A	<10	<30	<7	<110	<50	<1	<1	57	<7
2011LF343A	51	201	29	<110	<50	<1	<1	22	74
2011LF344A	88	67	69	<110	<50	<1	<1	22	43
2011LF347A	93	73	56	<110	<50	<1	<1	18	47
2011LF350A	53	117	104	<110	<50	<1	<1	8	54
2011LF355B	40	109	56	<110	<50	<1	<1	15	19
2011LF357B	79	151	11	<110	<50	<1	<1	1	229
2011LF359A	58	743	<7	<110	<50	<1	<1	4	372
2011LF359B	35	960	38	<110	<50	<1	<1	5	240
2011LF366B	<10	57	<7	<110	<50	<1	<1	7	15
2011LF372B	101	98	303	<110	<50	<1	<1	14	35
2011LF384A	70	75	51	<110	<50	<1	<1	5	45
2011LF384B	57	313	42	<110	<50	<1	<1	4	61
2011LF388B	49.6	2450	93.4	<110	<50	<1	<1	4.8	376
2011LF389A	44	120	44	<110	<50	<1	<1	6	80
2011LF418A	87	420	64	310	<50	<1	<1	10	257
2011LF419B	57	525	77	<110	<50	<1	<1	10	348
2011LF441B	102	91	177	3130	<50	<1	<1	19	51
2011LF450B	14	94	9	<110	<50	<1	<1	---	85
2011LF450B	<10	104	<7	726	<50	<1	<1	8	56
2011LF466A	<10	<30	19	<110	<50	<1	<1	1	16
2011LF474A	19	<30	39	<110	<50	<1	<1	1	10
2011LF477B	20	<30	28	<110	<50	<1	<1	31	24
2011LF484B	11	81	43	<110	<50	<1	<1	10	37
2011LF485B	38	46	18	111	<50	<1	<1	3	19
2011LF486A	21	<30	22	<110	<50	<1	<1	2	29

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011LF301A	56	<1	406	93	<2	<4	<1	7	23
2011LF307A	<4	<1	37	432	<2	<4	<1	340	<2
2011LF309A	<4	<1	20	207	<2	<4	<1	313	<2
2011LF310A	18	<1	178	250	<2	<4	<1	222	<2
2011LF312A	27	<1	4	326	<2	<4	<1	339	<2
2011LF317A	19	<1	25	150	<2	<4	<1	6	<2
2011LF319A	22	<1	299	<30	<2	<4	<1	57	22
2011LF343A	<4	<1	2	649	<2	<4	<1	250	<2
2011LF344A	19	<1	4	267	<2	<4	<1	194	<2
2011LF347A	<4	<1	8	176	<2	22	<1	371	<2
2011LF350A	35	<1	<1	131	<2	<4	<1	319	<2
2011LF355B	69	<1	2	177	<2	<4	<1	191	<2
2011LF357B	<4	<1	2	238	<2	<4	<1	189	<2
2011LF359A	<4	<1	77	213	<2	<4	<1	91	<2
2011LF359B	<4	<1	14	110	<2	<4	<1	81	<2
2011LF366B	<4	<1	38	133	<2	<4	<1	28	<2
2011LF372B	24	<1	2	125	<2	<4	<1	223	<2
2011LF384A	<4	<1	1	119	<2	34	<1	294	<2
2011LF384B	25	<1	7	43	<2	22	<1	320	<2
2011LF388B	<4	<1	6	286	<2	<4	<1	118.4	<2
2011LF389A	<4	<1	34	51	<2	<4	<1	240	<2
2011LF418A	19	<1	5	164	<2	<4	<1	50	<2
2011LF419B	32	<1	4	157	<2	<4	<1	125	<2
2011LF441B	<4	<1	3	77	<2	25	<1	87	<2
2011LF450B	27	<1	---	45	<2	18	<1	---	<2
2011LF450B	26	<1	68	30	<2	<4	<1	72	<2
2011LF466A	<4	<1	5	89	<2	<4	<1	6	<2
2011LF474A	35	<1	4	332	<2	13	<1	8	<2
2011LF477B	<4	<1	4	559	<2	<4	<1	163	<2
2011LF484B	<4	<1	207	81	<2	<4	<1	115	37
2011LF485B	25	<1	22	211	<2	<4	<1	8	<2
2011LF486A	29	<1	10	41	<2	<4	<1	7	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011LF301A	16.5	<25	<8	<1	36	<8	<9	119
2011LF307A	<1	421	<8	<1	26	107	<9	118
2011LF309A	<1	334	<8	<1	19	166	<9	45
2011LF310A	<1	119	<8	<1	37	94	<9	272
2011LF312A	<1	415	<8	<1	27	125	<9	124
2011LF317A	<1	132	<8	<1	6	23	<9	41
2011LF319A	22	<25	<8	<1	38	<8	<9	39
2011LF343A	<1	500	<8	<1	33	116	<9	184
2011LF344A	<1	397	<8	<1	31	101	<9	191
2011LF347A	<1	469	<8	<1	32	122	<9	171
2011LF350A	<1	467	<8	<1	27	82	<9	110
2011LF355B	<1	564	<8	<1	41	155	<9	215
2011LF357B	<1	347	<8	<1	25	89	<9	56
2011LF359A	<1	309	<8	<1	28	112	<9	111
2011LF359B	<1	316	<8	<1	28	139	<9	68
2011LF366B	<1	45	<8	<1	7	21	<9	230
2011LF372B	<1	561	<8	<1	34	136	<9	181
2011LF384A	<1	644	<8	<1	14	66	<9	56
2011LF384B	<1	251	<8	<1	16	68	<9	48
2011LF388B	<1	451	<8	<1	21.4	84.7	<9	65.2
2011LF389A	<1	305	<8	<1	21	72	<9	53
2011LF418A	<1	261	<8	<1	25	96	<9	99
2011LF419B	<1	292	<8	<1	24	169	<9	106
2011LF441B	<1	799	<8	<1	45	461	<9	229
2011LF450B	<1	151	<8	<1	---	78	<9	<9
2011LF450B	<1	188	<8	<1	19	90	<9	106
2011LF466A	<1	<25	<8	<1	<8	9	<9	13
2011LF474A	<1	<25	<8	<1	1	9	<9	11
2011LF477B	<1	193	<8	<1	25	94	<9	247
2011LF484B	<1	123	<8	<1	24	26	<9	162
2011LF485B	<1	40	<8	<1	1	27	<9	28
2011LF486A	<1	31	<8	<1	1	<8	<9	17

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011LF490B	65.424418	-152.973970	501208	7255565	5N	Potassium feldspar quartzite	Inhomogenous
2011LF494A	65.419937	-152.957300	501982	7255066	5N	Muscovite quartz schist	Small
2011LF504A	65.348596	-152.683153	514747	7247151	5N	Kaolinite-quartz iron oxide	Poor polish
2011LF509A	65.355507	-152.684295	514690	7247921	5N	Fine-grained greenstone	Inhomogenous, poor polish
2011LF509B	65.355507	-152.684295	514690	7247921	5N	Chert(?)	Porous
2011LF509B	65.355507	-152.684295	514690	7247921	5N	Chert(?)	Porous
2011LF509B	65.355507	-152.684295	514690	7247921	5N	Chert(?)	Porous
2011LF516A	65.366145	-152.691112	514367	7249105	5N	Fine-grained gabbro(?)	---
2011LF516A	65.366145	-152.691112	514367	7249105	5N	Fine-grained gabbro(?)	---
2011LF529A	65.389773	-152.663849	515621	7251745	5N	Quartz-calcite-muscovite schist	Porous, small
2011LF533B	65.470352	-152.604619	518317	7260742	5N	Fine-grained gabbro	Altered
2011LF535A	65.469796	-152.608081	518157	7260679	5N	Gabbro	Altered
2011LF536A	65.470654	-152.610335	518052	7260774	5N	Gabbro	Altered
2011LF537A	65.471340	-152.619089	517646	7260848	5N	Metagabbro(?)	Inhomogenous
2011LF553A	65.363273	-152.471008	524607	7248853	5N	Diabase(?)	Altered
2011LF556A	65.357939	-152.474941	524429	7248257	5N	Gabbro	Altered
2011LF561A	65.294159	-152.918716	503791	7241049	5N	Chlorite-calcite quartz schist	---
2011LF562B	65.293576	-152.919769	503742	7240984	5N	Chlorite-quartz-albite schist	Inhomgenous
2011LF567B	65.289299	-152.944927	502569	7240506	5N	Quartz-chlorite-albite schist	Inhomogenous
2011LF570A	65.290264	-152.962097	501768	7240613	5N	Garnet-amphibolite(?)	---
2011LF572A	65.291092	-152.971743	501318	7240705	5N	Amphibolite(?)	---
2011LF572B	65.291092	-152.971743	501318	7240705	5N	Pyrite gabbro(?)	Altered
2011LF576A	65.293444	-152.983405	500774	7240967	5N	Glaucophane Metamafic	---
2011LF577A	65.293893	-152.985291	500686	7241017	5N	Glaucophane Metamafic	---
2011LF580A	65.214773	-152.849635	507034	7232207	5N	Albite metagrit(?)	Porous
2011LF591A	65.436402	-152.644560	516488	7256947	5N	Chlorite-muscovite quartz schist	Porous
2011LF592B	65.432251	-152.642095	516605	7256485	5N	Muscovite-chlorite quartz schist	Porous, small
2011LF594A	65.424737	-152.644223	516511	7255647	5N	Quartzite	Porous
2011LF594C	65.424737	-152.644223	516511	7255647	5N	Chlorite-quartz-albite schist	Porous, small
2011RN151B	65.245713	-152.926292	503444	7235649	5N	Gabbro	Altered, inhomgenous
2011RN169A	65.403679	-152.500983	523177	7253345	5N	Gabbro	Altered
2011RN171A	65.401736	-152.507737	522865	7253126	5N	Gabbro	Altered

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011LF490B	89.3	5.2	0.0697	0.888	0.713	2.1	0.568	<0.03	0.795
2011LF494A	87.50587	7.2	0.03623	0.15284	2.89093	0.89193	0.47471	<0.03	0.07978
2011LF504A	44.6	22	0.0384	0.0825	28	0.099	0.398	0.6	0.0731
2011LF509A	54.4	16.5	<0.03	6.03	11.5	0.146	3.65	0.221	6.39
2011LF509B	94.3	1.3	<0.03	0.96	0.959	0.097	0.221	<0.03	0.166
2011LF509B	93.8	1.3	<0.03	1.2	0.98	0.0753	0.153	<0.03	0.0853
2011LF509B	94.4	1.33	<0.03	0.931	0.941	0.0956	0.191	<0.03	0.167
2011LF516A	51.5	14.4	<0.03	7.93	12.5	0.0343	6.62	0.253	4.85
2011LF516A	52	14	<0.03	7.73	12.2	0.0345	6.79	0.263	5.03
2011LF529A	46.5	17.5	0.0691	10	14.6	5.29	1.67	0.168	0.287
2011LF533B	49.8	15.1	<0.03	8.57	12.4	0.106	5.91	0.3	5.79
2011LF535A	50.8	12.6	0.0703	12.1	10.2	0.634	9.08	0.203	2.65
2011LF536A	51.7	10	0.0404	13.8	9.72	0.333	10.3	0.226	2.46
2011LF537A	53.4	14.4	0.0326	10.2	11.8	0.151	5.26	0.174	2.87
2011LF553A	56.3	14.6	0.0622	6.17	11.5	0.525	2.83	0.201	5.47
2011LF556A	50.9	16.9	0.0456	12.9	6.82	0.75	7.93	0.125	2.55
2011LF561A	74.01196	5.9	0.04941	15.03889	2.52471	0.94767	0.57607	0.05162	0.31496
2011LF562B	74.89452	12	<0.03	0.27901	4.03489	0.04194	1.30066	0.07694	6.71397
2011LF567B	63	15.6	0.0819	0.373	9.77	0.722	3.69	0.131	5.15
2011LF570A	51.9	13.3	0.0579	8.63	15.2	0.282	5.39	0.269	2.57
2011LF572A	50.43179	14.9	0.04317	11.86834	10.48648	0.39611	7.5933	0.16557	2.86006
2011LF572B	44.2	14.9	<0.03	10.2	18.8	0.0925	6.64	0.189	2.42
2011LF576A	52.88923	16	0.04338	9.12928	9.5277	0.16359	5.74286	0.11404	5.09998
2011LF577A	51.42263	14.1	0.05171	10.01802	11.26653	0.30076	7.0013	0.15735	4.02804
2011LF580A	85.9	9.2	0.0331	0.103	1.22	0.338	0.369	0.159	1.89
2011LF591A	83.6	7.6	0.0599	0.136	5.1	1.14	0.72	0.0917	0.406
2011LF592B	79.2	7.9	0.0745	2.1	5.35	1.47	2.45	0.0704	0.236
2011LF594A	79.04791	11.2	0.05101	0.36158	3.2172	1.3328	1.29711	0.22574	2.11262
2011LF594C	64.10873	16.2	0.04717	0.22252	8.25732	0.79253	3.57922	0.18275	5.26568
2011RN151B	53.3	15.5	<0.03	8.24	10.9	0.109	7.94	0.179	2.54
2011RN169A	48	15.3	0.0391	12.3	11.6	0.573	6.32	0.322	3.17
2011RN171A	48.9	16.2	0.0489	13.5	8.4	0.267	8.56	0.244	2.86

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011LF490B	0.0682	0.155	<0.05	99.90642	<4	<2	<5	<60	347
2011LF494A	0.16963	0.47643	<0.05	99.91544	<4	<2	<5	<60	<50
2011LF504A	0.585	3.18	<0.05	99.656	13	<2	<5	<60	284
2011LF509A	0.0517	0.943	<0.05	99.8517	<4	<2	<5	<60	177
2011LF509B	2	0.0485	<0.05	100.0456	11	<2	<5	<60	426
2011LF509B	2.1	0.0542	<0.05	99.7258	9	<2	<5	<60	85
2011LF509B	1.8	0.0439	<0.05	99.9123	17	<2	<5	<60	392
2011LF516A	0.184	1.61	<0.05	99.9002	<4	<2	<5	<60	130
2011LF516A	0.189	1.61	<0.05	99.8566	<4	<2	<5	<60	182
2011LF529A	0.46	3.2	<0.05	99.7341	61	<2	<5	<60	348
2011LF533B	0.195	1.65	<0.05	99.8437	<4	<2	<5	<60	<50
2011LF535A	0.155	1.1	<0.05	99.5923	<4	<2	<5	<60	288
2011LF536A	0.152	1.07	<0.05	99.7814	<4	<2	<5	<60	346
2011LF537A	0.218	1.29	<0.05	99.7956	<4	<2	<5	<60	112
2011LF553A	0.465	1.72	<0.05	99.8432	<4	<2	<5	<60	147
2011LF556A	0.179	0.764	<0.05	99.8636	<4	<2	<5	<60	256
2011LF561A	0.17433	0.31516	<0.05	99.90497	<4	<2	<5	<60	140
2011LF562B	0.19013	0.37544	<0.05	99.94002	<4	<2	<5	<60	52
2011LF567B	0.415	0.919	<0.05	99.8519	<4	<2	<5	<60	374
2011LF570A	0.266	1.86	<0.05	99.7249	17	<2	<5	<60	72
2011LF572A	0.21703	0.88631	<0.05	99.85729	<4	<2	<5	<60	150
2011LF572B	<0.03	2.11	<0.05	99.6005	<4	<2	<5	<60	212
2011LF576A	0.21273	0.89322	<0.05	99.86094	<4	<2	<5	<60	128
2011LF577A	0.28826	1.20052	<0.05	99.79614	6	<2	<5	<60	219
2011LF580A	0.0456	0.568	<0.05	99.8457	<4	<2	<5	<60	<50
2011LF591A	0.244	0.627	<0.05	99.7246	<4	<2	<5	<60	160
2011LF592B	0.238	0.679	<0.05	99.7579	<4	<2	<5	<60	225
2011LF594A	0.36177	0.59788	<0.05	99.83314	6	<2	<5	<60	505
2011LF594C	0.24506	1	<0.05	99.85639	<4	<2	<5	<60	148
2011RN151B	0.128	0.96	<0.05	99.821	<4	<2	<5	<60	181
2011RN169A	0.151	1.41	<0.05	99.1851	<4	<2	<5	<60	659
2011RN171A	0.119	0.702	<0.05	99.8009	<4	<2	<5	<60	256

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011LF490B	<10	48	25	<110	<50	<1	<1	3	17
2011LF494A	36	100	30	113	<50	<1	<1	7	32
2011LF504A	39	214	17	<110	<50	<1	<1	15	51
2011LF509A	80	96	86	<110	<50	<1	<1	2	106
2011LF509B	<10	35	41	110	<50	<1	<1	---	37
2011LF509B	<10	<30	47	<110	<50	<1	<1	1	26
2011LF509B	<10	<30	<7	<110	<50	<1	<1	1	28
2011LF516A	57	384	12	<110	<50	<1	<1	1	96
2011LF516A	34.9	156	20	<110	<50	<1	<1	1.1	51
2011LF529A	51	136	13	177	<50	<1	<1	10	48
2011LF533B	33	231	110	<110	<50	<1	<1	5	56
2011LF535A	87	805	229	<110	<50	<1	<1	6	196
2011LF536A	33	1030	138	<110	<50	<1	<1	4	199
2011LF537A	33	211	34	<110	<50	<1	<1	6	71
2011LF553A	22	<30	103	<110	<50	<1	<1	14	9
2011LF556A	31	311	47	<110	<50	<1	<1	4	151
2011LF561A	<10	52	43	<110	<50	<1	<1	6	24
2011LF562B	<10	<30	30	<110	<50	<1	<1	8	23
2011LF567B	48	74	46	<110	<50	<1	<1	5	40
2011LF570A	72	141	182	1090	<50	<1	<1	14	56
2011LF572A	87	148	35	<110	<50	<1	<1	5	51
2011LF572B	205	96	<7	<110	<50	<1	<1	4	42
2011LF576A	45	186	50	<110	<50	<1	<1	7	108
2011LF577A	75	466	101	<110	<50	<1	<1	7	95
2011LF580A	28	81	244	<110	<50	<1	<1	10	29
2011LF591A	36	84	34	1130	<50	<1	<1	7	40
2011LF592B	<10	290	39	1080	<50	<1	<1	7	90
2011LF594A	<10	110	48	<110	<50	<1	<1	7	40
2011LF594C	30	150	56	<110	<50	<1	<1	12	<7
2011RN151B	59	394	62	<110	<50	<1	<1	5	166
2011RN169A	110	266	196	<110	<50	<1	<1	4	67
2011RN171A	37	272	64	<110	<50	<1	<1	3	196

Table 8. (continued)

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011LF490B	25	<1	61	110	<2	<4	<1	71	<2
2011LF494A	26	<1	43	47	<2	<4	<1	6	<2
2011LF504A	<4	<1	3	245	<2	27	<1	7	<2
2011LF509A	<4	<1	3	171	<2	<4	<1	162	<2
2011LF509B	35	<1	---	338	<2	<4	<1	---	<2
2011LF509B	17	<1	<1	229	<2	<4	<1	32	<2
2011LF509B	<4	<1	4	313	<2	<4	<1	30	<2
2011LF516A	<4	<1	1	126	<2	30	<1	98	<2
2011LF516A	15	<1	1	62	<2	<4	<1	90.3	<2
2011LF529A	<4	<1	166	194	<2	<4	<1	29	<2
2011LF533B	<4	<1	3	49	<2	<4	<1	139	<2
2011LF535A	<4	<1	20	601	<2	<4	<1	92	<2
2011LF536A	31	<1	9	106	<2	<4	<1	112	<2
2011LF537A	<4	<1	3	324	<2	<4	<1	96	<2
2011LF553A	<4	<1	17	209	<2	<4	<1	149	<2
2011LF556A	<4	<1	21	138	<2	<4	<1	163	<2
2011LF561A	<4	<1	47	61	<2	<4	<1	132	<2
2011LF562B	<4	<1	2	60	<2	<4	<1	22	<2
2011LF567B	63	<1	22	113	<2	<4	<1	29	<2
2011LF570A	<4	<1	10	129	<2	28	<1	258	<2
2011LF572A	20	<1	14	69	<2	<4	<1	314	<2
2011LF572B	<4	<1	1	2010	<2	24	<1	246	<2
2011LF576A	<4	<1	5	111	<2	<4	<1	234	<2
2011LF577A	<4	<1	9	250	<2	<4	<1	239	<2
2011LF580A	43	<1	12	72	<2	<4	<1	106	<2
2011LF591A	22	<1	47	128	<2	<4	<1	35	<2
2011LF592B	<4	<1	74	277	<2	<4	<1	58	<2
2011LF594A	43	<1	68	44	<2	<4	<1	74	<2
2011LF594C	51	<1	38	<30	<2	<4	<1	18	<2
2011RN151B	<4	<1	1	68	<2	<4	<1	192	<2
2011RN169A	<4	<1	18	5430	<2	<4	<1	72	<2
2011RN171A	<4	<1	8	108	<2	<4	<1	166	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011LF490B	<1	33	<8	<1	11	13	<9	56
2011LF494A	<1	80	<8	<1	17	40	<9	129
2011LF504A	<1	543	<8	<1	39	222	<9	215
2011LF509A	<1	501	<8	<1	31	112	<9	71
2011LF509B	<1	72	<8	<1	---	18	<9	<9
2011LF509B	<1	54	<8	<1	10	15	<9	13
2011LF509B	<1	68	<8	<1	8	18	<9	13
2011LF516A	<1	344	<8	<1	45	239	<9	131
2011LF516A	<1	401	<8	<1	45.2	262	<9	129.7
2011LF529A	<1	638	<8	<1	40	98	<9	195
2011LF533B	<1	474	<8	<1	31	147	<9	105
2011LF535A	<1	374	<8	<1	18	123	<9	75
2011LF536A	<1	410	<8	<1	19	76	<9	63
2011LF537A	<1	422	<8	<1	27	99	<9	93
2011LF553A	<1	302	<8	<1	41	136	<9	210
2011LF556A	<1	259	<8	<1	14	37	<9	56
2011LF561A	<1	95	<8	<1	16	50	<9	99
2011LF562B	<1	<25	<8	<1	38	48	<9	221
2011LF567B	<1	261	<8	<1	22	168	<9	110
2011LF570A	<1	447	<8	<1	44	116	<9	179
2011LF572A	<1	307	<8	<1	17	76	<9	81
2011LF572B	<1	980	<8	<1	12	126	<9	44
2011LF576A	<1	321	<8	<1	19	64	<9	115
2011LF577A	<1	381	<8	<1	21	75	<9	83
2011LF580A	<1	103	<8	<1	14	17	<9	210
2011LF591A	<1	223	<8	<1	12	78	<9	89
2011LF592B	<1	107	<8	<1	36	66	<9	150
2011LF594A	<1	167	<8	<1	34	26	<9	107
2011LF594C	<1	283	<8	<1	29	164	<9	182
2011RN151B	<1	238	<8	<1	21	83	<9	97
2011RN169A	<1	453	<8	<1	27	94	<9	83
2011RN171A	<1	244	<8	<1	14	66	<9	47

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011RN176B	65.403829	-152.998514	500069	7253270	5N	Granite aplite	---
2011RN177C	65.404843	-152.990224	500454	7253383	5N	Tourmaline granite aplite	---
2011RN178A	65.406125	-152.987231	500593	7253526	5N	Quartz-muscovite schist	---
2011RN179A	65.407650	-152.984538	500718	7253696	5N	Garnet orthogneiss(?)	Inhomogenous
2011RN179B	65.407650	-152.984538	500718	7253696	5N	Tourmaline granite aplite	Inhomogenous
2011RN182C	65.411103	-152.971248	501335	7254081	5N	Tourmaline granite aplite	---
2011RN187A	65.351343	-152.675169	515117	7247459	5N	Muscovite quartzite	Inhomogenous
2011RN216A	65.488008	-152.587353	519104	7262715	5N	Gabbro	Altered
2011RN217A	65.488851	-152.587253	519108	7262809	5N	Metagabbro	---
2011RN218A	65.490122	-152.592591	518860	7262949	5N	Fine-grained wacke(?)	---
2011RN218B	65.490122	-152.592591	518860	7262949	5N	Fine-grained gabbro	Altered
2011RN220A	65.494465	-152.596347	518683	7263432	5N	Fine-grained gabbro	Altered
2011RN223A	65.338031	-153.860875	459917	7246210	5N	Allanite granite(?)	Inhomogenous
2011RN224B	65.336564	-153.855308	460174	7246043	5N	Fine-grained granite	---
2011RN229B	65.331435	-153.832273	461239	7245457	5N	Medium-grained greenstone	---
2011RN236A	65.322882	-153.795940	462919	7244482	5N	Feldspar-calc-silicate quartzite(?)	Inhomogenous
2011RN238A	65.322213	-153.786775	463345	7244402	5N	Feldspar quartzite	Inhomogenous, poor polish
2011RN245A	65.389542	-152.518876	522358	7251763	5N	Gabbro	Altered
2011RN246A	65.388541	-152.517130	522440	7251652	5N	Fine-grained metawacke	---
2011RN249A	65.384742	-152.518857	522363	7251228	5N	Fine-grained metawacke	---
2011RN250A	65.383062	-152.518048	522402	7251041	5N	Fine-grained metawacke	---
2011RN254A	65.366248	-152.887878	505215	7249086	5N	Muscovite quartz schist	Inhomgenous
2011RN254B	65.366248	-152.887878	505215	7249086	5N	Chlorite schist	Porous
2011RN254B	65.366248	-152.887878	505215	7249086	5N	Chlorite schist	Porous
2011RN256B	65.364778	-152.889453	505142	7248922	5N	Metagabbro	---
2011RN257B	65.363443	-152.891351	505054	7248773	5N	Metagabbro	Porous
2011RN258A	65.362709	-152.893977	504932	7248691	5N	Mica quartz schist	Inhomogenous
2011RN258B	65.362709	-152.893977	504932	7248691	5N	Metamafic	---
2011RN259A	65.361237	-152.892800	504987	7248527	5N	Metagabbro	---
2011RN262A	65.356260	-152.897463	504771	7247972	5N	Fine-grained gabbro	Altered
2011RN263B	65.354888	-152.898005	504746	7247819	5N	Quartz mica schist	Inhomogenous
2011RN264A	65.353094	-152.899065	504697	7247619	5N	Metagabbro	---

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011RN176B	70.7	15	0.099	1.44	2.13	6.88	0.333	<0.03	2.67
2011RN177C	75.7	13.5	0.0322	0.54	0.891	4.29	0.214	<0.03	4.4
2011RN178A	69.1	17.2	0.108	0.602	4.68	4.1	1.75	0.0521	0.836
2011RN179A	70.5	17.2	0.11	0.279	4.59	3.22	1.4	0.0589	1.62
2011RN179B	75.4	14.3	0.0454	0.646	0.743	4.61	0.207	<0.03	3.66
2011RN182C	77.4	12.8	<0.03	0.531	0.702	4.49	0.164	<0.03	3.74
2011RN187A	91.8	3.8	0.0317	0.0592	1.75	0.929	0.436	<0.03	0.055
2011RN216A	51.7	13.3	0.0855	12	10.4	0.0786	7.59	0.196	3.01
2011RN217A	50.6	15.7	0.0563	11.6	10.4	0.219	6.39	0.189	3.31
2011RN218A	78.6	8.2	<0.03	0.819	4.45	0.099	1.28	0.0477	5.81
2011RN218B	48	15.5	0.112	10.9	13.3	0.186	6.11	0.268	3.58
2011RN220A	51.3	15.5	0.0823	11.2	10.5	0.156	5.8	0.213	3.4
2011RN223A	77	10.1	<0.03	5	0.434	4.55	0.159	<0.03	2.56
2011RN224B	74.4	13.5	0.0794	1.34	1.59	4.97	0.353	0.0364	3.32
2011RN229B	79	11.2	<0.03	0.675	1.26	4.74	0.287	<0.03	2.51
2011RN236A	89.3	3.4	<0.03	3.4	1.04	0.379	1.31	<0.03	0.889
2011RN238A	87.8	5.4	0.0923	1.69	0.445	2.72	0.698	<0.03	0.751
2011RN245A	50.6	17.7	0.0305	13.4	5.86	0.235	6.88	0.133	4.15
2011RN246A	63.7	18.5	0.0381	2.84	1.67	0.0943	1.42	0.0442	10.8
2011RN249A	59.1	19.5	0.0642	4.77	4.21	0.115	1.38	0.072	9.72
2011RN250A	58.1	18	0.0585	5.92	5.09	0.709	2.18	0.106	8.59
2011RN254A	81.5	8.9	0.0862	0.213	4.55	1.34	1.2	0.0493	0.675
2011RN254B	55.8	13.7	<0.03	0.178	16.7	0.0203	10.9	0.274	0.309
2011RN254B	53.8	16.3	0.0613	0.0848	16.9	0.757	8.85	0.253	0.486
2011RN256B	54.3	14.1	<0.03	8.69	11.6	0.0278	5.56	0.205	4.06
2011RN257B	60.4	11.9	<0.03	4.55	14.3	0.0212	5.02	0.25	1.38
2011RN258A	80.7	9.2	0.112	0.812	3.71	1.97	1.99	0.0394	0.531
2011RN258B	52.5	15.6	<0.03	10	10.1	0.242	6.06	0.174	3.79
2011RN259A	50.6	15.2	<0.03	10.8	10.3	0.0243	8.31	0.241	3.61
2011RN262A	52.3	17.9	<0.03	7.86	10.2	0.0645	6.91	0.119	3.64
2011RN263B	72.1	14.9	0.127	0.134	6.44	2.92	1.51	0.0583	0.456
2011RN264A	57.7	11.6	<0.03	10.8	11.5	<.02	3.49	0.191	2.77

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011RN176B	0.0947	0.395	<0.05	99.7666	43	<2	<5	<60	510
2011RN177C	0.186	0.086	<0.05	99.8513	<4	<2	<5	<60	735
2011RN178A	0.329	0.936	<0.05	99.6931	<4	<2	<5	<60	520
2011RN179A	0.127	0.722	<0.05	99.8269	4	<2	<5	<60	593
2011RN179B	0.219	0.0797	<0.05	99.9236	<4	<2	<5	<60	118
2011RN182C	0.0581	0.0444	<0.05	99.9555	<4	<2	<5	<60	308
2011RN187A	0.111	0.221	<0.05	99.15776	<4	<2	<5	<60	168
2011RN216A	0.172	1.26	<0.05	99.7921	<4	<2	<5	<60	72
2011RN217A	0.187	1.3	<0.05	99.9513	<4	<2	<5	<60	95
2011RN218A	0.212	0.362	<0.05	99.8672	<4	<2	<5	<60	480
2011RN218B	0.268	1.57	<0.05	99.794	<4	<2	<5	<60	351
2011RN220A	0.201	1.36	<0.05	99.7123	<4	<2	<5	<60	195
2011RN223A	<0.03	0.0421	<0.05	99.827	<4	<2	<5	<60	678
2011RN224B	0.112	0.192	<0.05	99.8928	<4	<2	<5	<60	416
2011RN229B	0.0524	0.146	<0.05	99.9095	<4	<2	<5	<60	181
2011RN236A	0.0737	0.143	<0.05	99.9606	<4	<2	<5	<60	110
2011RN238A	0.197	0.057	<0.05	99.8299	<4	<2	<5	<60	412
2011RN245A	0.114	0.705	<0.05	99.8075	<4	<2	<5	<60	221
2011RN246A	0.266	0.511	<0.05	99.8836	<4	<2	<5	<60	341
2011RN249A	0.349	0.642	<0.05	99.9222	<4	<2	<5	<60	62
2011RN250A	0.435	0.671	<0.05	99.8595	<4	<2	<5	<60	124
2011RN254A	0.204	0.571	<0.05	99.3085	4	<2	<5	567	696
2011RN254B	0.092	1.53	<0.05	99.5213	<4	<2	<5	<60	329
2011RN254B	0.0399	1.46	<0.05	98.992	23	<2	<5	<60	243
2011RN256B	0.255	1.03	<0.05	99.8468	8	<2	<5	<60	386
2011RN257B	0.135	1.7	<0.05	99.6804	75	<2	<5	<60	460
2011RN258A	0.116	0.761	<0.05	99.8914	<4	<2	<5	<60	135
2011RN258B	0.267	1	<0.05	99.73616	13	<2	<5	<60	196
2011RN259A	0.277	0.5	<0.05	99.8808	4	<2	<5	<60	103
2011RN262A	0.135	0.628	<0.05	99.7833	32	<2	<5	<60	261
2011RN263B	0.136	0.97	<0.05	99.7513	29	<2	<5	<60	50
2011RN264A	0.405	1.31	<0.05	99.7762	17	<2	<5	<60	110

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011RN176B	<10	<30	<7	<110	<50	<1	<1	12	<7
2011RN177C	<10	<30	<7	<110	<50	<1	<1	8	<7
2011RN178A	103	102	28	970	<50	<1	<1	14	<7
2011RN179A	31	101	<7	<110	<50	<1	<1	13	44
2011RN179B	<10	<30	14	<110	<50	<1	<1	9	29
2011RN182C	<10	<30	<7	<110	<50	<1	<1	11	<7
2011RN187A	<10	63	40	<110	<50	<1	<1	3	43
2011RN216A	45	513	153	<110	<50	<1	<1	5	162
2011RN217A	47	231	136	<110	<50	<1	<1	5	96
2011RN218A	14	<30	<7	<110	<50	<1	<1	4	42
2011RN218B	51	149	145	<110	<50	<1	<1	7	78
2011RN220A	31	160	149	<110	<50	<1	<1	6	77
2011RN223A	<10	<30	<7	<110	<50	<1	<1	5	<7
2011RN224B	<10	<30	104	<110	<50	<1	<1	12	20
2011RN229B	<10	<30	<7	<110	<50	<1	<1	8	<7
2011RN236A	25	<30	17	<110	<50	<1	<1	3	19
2011RN238A	<10	44	20	<110	<50	<1	<1	2	24
2011RN245A	74	304	86	<110	<50	<1	<1	5	114
2011RN246A	<10	66	57	<110	<50	<1	<1	15	42
2011RN249A	36	63	<7	<110	<50	<1	<1	16	52
2011RN250A	<10	67	<7	<110	<50	<1	<1	15	33
2011RN254A	27	124	44	<110	165	<1	<1	8	107
2011RN254B	40	372	102	1430	<50	<1	<1	4	25
2011RN254B	10	379	176	1620	<50	<1	<1	6	32
2011RN256B	75	96	37	<110	<50	<1	<1	8	58
2011RN257B	29	76	26	<110	<50	<1	<1	15	72
2011RN258A	27	75	36	<110	<50	<1	<1	10	8
2011RN258B	21	237	49	<110	<50	<1	<1	7	108
2011RN259A	62	537	215	<110	<50	<1	<1	1	121
2011RN262A	11	388	78	<110	<50	<1	<1	2	202
2011RN263B	<10	108	33	1170	<50	<1	<1	14	37
2011RN264A	31	90	65	<110	<50	<1	<1	9	40

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011RN176B	42	<1	253	75	<2	<4	<1	185	19
2011RN177C	42	<1	210	192	<2	<4	<1	43	6
2011RN178A	60	<1	137	55	<2	15	<1	73	<2
2011RN179A	21	<1	134	46	<2	<4	<1	189	<2
2011RN179B	72	<1	223	<30	<2	<4	<1	73	7
2011RN182C	71	<1	306	71	<2	<4	<1	21	14
2011RN187A	21	<1	31	8110	<2	<4	<1	6	<2
2011RN216A	<4	<1	2	86	<2	<4	<1	90	<2
2011RN217A	<4	<1	4	48	<2	<4	<1	119	<2
2011RN218A	<4	<1	4	334	<2	<4	<1	43	<2
2011RN218B	<4	<1	4	158	<2	<4	<1	176	<2
2011RN220A	<4	<1	3	109	<2	<4	<1	261	<2
2011RN223A	47	<1	353	124	<2	<4	<1	23	24
2011RN224B	62	<1	287	57	<2	<4	<1	98	28
2011RN229B	50	<1	243	104	<2	<4	<1	47	28
2011RN236A	15	<1	11	37	<2	<4	<1	119	<2
2011RN238A	38	<1	60	133	<2	20	<1	192	<2
2011RN245A	<4	<1	7	75	<2	<4	<1	125	<2
2011RN246A	<4	<1	2	145	<2	<4	<1	105	<2
2011RN249A	32	<1	2	42	<2	<4	<1	116	<2
2011RN250A	26	<1	13	40	<2	<4	<1	196	<2
2011RN254A	37	<1	60	3990	<2	<4	<1	35	<2
2011RN254B	<4	<1	1	303	<2	22	<1	10	<2
2011RN254B	85	<1	43	5730	<2	<4	<1	15	<2
2011RN256B	<4	<1	<1	290	<2	<4	<1	212	<2
2011RN257B	41	<1	1	263	<2	<4	<1	139	<2
2011RN258A	34	<1	73	113	<2	20	<1	44	<2
2011RN258B	<4	<1	11	143	<2	<4	<1	216	<2
2011RN259A	<4	<1	<1	159	<2	<4	<1	166	<2
2011RN262A	40	<1	3	313	<2	<4	<1	200	<2
2011RN263B	52	<1	129	318	<2	<4	<1	35	20
2011RN264A	22	<1	<1	109	<2	<4	<1	192	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011RN176B	1	<25	<8	<1	35	27	<9	348
2011RN177C	3	37	<8	<1	15	20	<9	46
2011RN178A	<1	187	<8	<1	27	62	<9	198
2011RN179A	<1	138	<8	<1	18	39	<9	135
2011RN179B	4	<25	<8	<1	18	38	<9	44
2011RN182C	5	<25	<8	<1	51	24	<9	65
2011RN187A	<1	79	<8	<1	3	32	<9	41
2011RN216A	<1	330	<8	<1	24	99	<9	93
2011RN217A	<1	401	<8	<1	25	88	<9	91
2011RN218A	<1	89	<8	<1	24	33	<9	82
2011RN218B	<1	420	<8	<1	31	140	<9	110
2011RN220A	<1	439	<8	<1	26	97	<9	95
2011RN223A	9	<25	<8	<1	450	12	<9	56
2011RN224B	3	29	<8	<1	29	24	<9	135
2011RN229B	1	<25	<8	<1	11	24	<9	63
2011RN236A	<1	54	<8	<1	7	21	<9	71
2011RN238A	<1	<25	<8	<1	5	<8	<9	70
2011RN245A	<1	191	<8	<1	12	39	<9	60
2011RN246A	<1	106	<8	<1	17	17	<9	139
2011RN249A	<1	154	<8	<1	20	31	<9	138
2011RN250A	<1	215	<8	<1	20	41	<9	124
2011RN254A	12	162	<8	<1	81	159	<9	145
2011RN254B	<1	449	<8	<1	12	705	<9	83
2011RN254B	<1	539	<8	<1	26	734	<9	102
2011RN256B	<1	402	<8	<1	22	134	<9	107
2011RN257B	<1	584	<8	<1	40	152	<9	167
2011RN258A	<1	138	<8	<1	15	101	<9	177
2011RN258B	<1	304	<8	<1	21	110	<9	98
2011RN259A	<1	313	<8	<1	22	90	<9	28
2011RN262A	<1	273	<8	<1	28	132	<9	44
2011RN263B	<1	221	<8	<1	23	113	<9	170
2011RN264A	<1	473	<8	<1	25	139	<9	103

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011RN266A	65.351881	-152.895933	504843	7247484	5N	Metagabbro	---
2011RN267A	65.254064	-152.728602	512677	7236605	5N	Chloritoid(?) quartzite(?)	Porous
2011RN271A	65.248711	-152.716136	513262	7236011	5N	Quartz-mica schist	---
2011RN283B	65.220456	-152.701578	513957	7232865	5N	Chloritoid(?) quartz schist	Inhomogenous
2011RN285A	65.243169	-153.489009	477149	7235452	5N	Quartz-mica schist	Inhomogenous
2011RN300B	65.224440	-153.511503	476081	7233373	5N	Metagabbro	---
2011RN301A	65.201067	-153.730700	465801	7230869	5N	Garnet(?)-chlorite-muscovite quartz schist	---
2011RN303B	65.202924	-153.727183	465968	7231074	5N	Quartz-mica schist	---
2011RN303C	65.202924	-153.727183	465968	7231074	5N	Mica quartz schist	Inhomogenous
2011RN305A	65.204334	-153.721217	466249	7231228	5N	Chlorite-muscovite quartz schist	---
2011RN310A	65.204177	-153.707023	466913	7231203	5N	Garnet-muscovite quartz schist	Porous
2011RN311A	65.203618	-153.705769	466971	7231140	5N	Garnet greenstone	---
2011RN312A	65.203295	-153.701914	467151	7231102	5N	Fine-grained greenstone	Poor polish
2011RN313A	65.202826	-153.700512	467216	7231049	5N	Garnet greenstone	---
2011RN313A	65.202826	-153.700512	467216	7231049	5N	Garnet greenstone	---
2011RN314A	65.202629	-153.698456	467312	7231026	5N	Albite-porphyroblastic greenstone	Poor polish
2011RN315A	65.201754	-153.699416	467266	7230929	5N	Metagabbro	---
2011RN315A	65.201754	-153.699416	467266	7230929	5N	Metagabbro	---
2011RN321A	65.372812	-152.542774	521261	7249890	5N	Gabbro	Altered
2011RN322B	65.371400	-152.538799	521447	7249734	5N	Fine-grained wacke	---
2011RN324A	65.370870	-152.529798	521866	7249678	5N	Gabbro	---
2011RN326A	65.370552	-152.522901	522187	7249645	5N	Fine-grained gabbro	Altered
2011RN328A	65.368751	-152.517945	522419	7249446	5N	Fine-grained gabbro	Altered
2011TL003A	65.239492	-153.597918	472056	7235086	5N	Metagabbro	---
2011TL003B	65.239492	-153.597918	472056	7235086	5N	Gabbro	Altered
2011Z002A	65.419122	-152.588049	519122	7255037	5N	Gabbro	Altered
2011Z003A	65.444462	-152.760208	511120	7257820	5N	Metagabbro	---
2011Z006A	65.264940	-152.985114	500695	7237790	5N	Serpentinite	---
2011Z006A	65.264940	-152.985114	500695	7237790	5N	Metagabbro(?)	---
2011Z010A	65.269749	-152.991045	500418	7238326	5N	Metagabbro	---
2011Z027A	65.352841	-152.991705	500386	7247587	5N	Albite-biotite quartz schist	---
2011Z029A	65.348893	-152.989815	500474	7247147	5N	Chlorite-albite-muscovite quartz schist	---

Table 8. (continued)

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011RN266A	52.4	15.6	<0.03	10.2	10.8	0.0882	5.86	0.174	3.42
2011RN267A	86.3	7.2	0.0442	0.128	3.1	0.99	0.77	<0.03	0.773
2011RN271A	64.9	18.3	0.147	0.109	8.84	3.74	1.89	0.121	0.755
2011RN283B	75.7	13.8	0.0545	0.114	5.46	1.32	0.887	0.0562	1.82
2011RN285A	72.4	14.6	0.0592	0.187	5.94	2.67	1.74	0.0669	1.05
2011RN300B	53.6	14.1	0.0717	10.5	9.62	0.637	6.77	0.149	2.71
2011RN301A	65.7	19.9	0.0667	0.12	6.08	3.44	1.77	0.109	1.29
2011RN303B	67.1	17.9	0.0755	0.168	7.47	3.21	1.32	0.0368	1.41
2011RN303C	74.8	12.2	0.05	0.225	5.55	2.29	1.34	0.0641	0.558
2011RN305A	72.2	15.1	0.258	0.197	4.62	3.13	1.22	0.0876	1.44
2011RN310A	75.2	16.8	0.112	0.0619	0.515	4.82	1.03	<0.03	0.246
2011RN311A	51.2	15.9	<0.03	13.6	8.84	0.0604	8.17	0.188	1.39
2011RN312A	53.6	13.3	0.0483	7.1	14.1	0.845	4.28	0.228	4.25
2011RN313A	54.5	14.2	<0.03	5.26	13.2	0.0354	4.93	0.228	5.66
2011RN313A	54.5	14.2	<0.03	5.28	13.3	0.0329	4.84	0.213	5.62
2011RN314A	51.8	12.9	0.0319	9.68	14.7	0.431	5.38	0.218	2.82
2011RN315A	48.6	16.4	0.163	10.7	10.5	0.97	7.28	0.214	2.93
2011RN315A	48.7	16.6	0.164	10.5	10.5	0.951	7.08	0.221	2.96
2011RN321A	50	16.1	0.0391	11.8	10.2	0.265	6.27	0.198	3.39
2011RN322B	87.1	5.6	<0.03	0.476	1.79	0.0216	0.328	<0.03	4.29
2011RN324A	50.6	15.3	0.0575	10.7	11.8	0.267	5.32	0.211	3.65
2011RN326A	44.9	13.6	<0.03	8.58	17.7	0.096	7.67	0.375	4.19
2011RN328A	50.7	15	0.0308	11.4	10	0.17	6.12	0.201	4.55
2011TL003A	51.9	15.9	<0.03	8.26	9.99	0.324	8.54	0.187	3.87
2011TL003B	50.8	8.2	0.285	15	10.2	0.0559	13.2	0.195	0.631
2011Z002A	49.6	18.7	<0.03	13.1	7.96	0.0622	8.08	0.168	1.5
2011Z003A	50.3	18.1	0.056	13.2	6.95	0.288	7.45	0.138	2.8
2011Z006A	44.7	4.49	<0.03	2.82	12.5	0.0651	34.4	0.191	0.0809
2011Z006A	50.3	14.7	0.0351	9.78	11.3	0.0311	6.26	0.201	5.44
2011Z010A	50.1	15	<0.03	10.1	11.4	0.113	8.24	0.208	3.46
2011Z027A	86	6.87	0.0877	0.29	3.26	0.9	0.865	<0.03	0.695
2011Z029A	83.4	8.08	0.505	0.197	3.08	1.58	1.25	0.269	1.12

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011RN266A	0.108	1.18	<0.05	99.8465	24	<2	<5	<60	<50
2011RN267A	0.0908	0.423	<0.05	99.8889	<4	<2	<5	63	78
2011RN271A	0.0328	1.03	<0.05	99.8648	23	<2	<5	<60	56
2011RN283B	0.058	0.637	<0.05	99.9067	17	<2	<5	<60	<50
2011RN285A	0.125	0.685	<0.05	99.5231	5	<2	<5	<60	468
2011RN300B	0.24	0.852	<0.05	99.2497	15	<2	<5	<60	487
2011RN301A	0.106	0.97	<0.05	99.5517	41	<2	<5	<60	233
2011RN303B	0.107	0.785	<0.05	99.5823	<4	<2	<5	<60	676
2011RN303C	0.229	0.62	<0.05	97.9261	5	<2	<5	<60	247
2011RN305A	0.188	0.744	<0.05	99.1846	61	<2	<5	<60	642
2011RN310A	<0.03	1.02	<0.05	99.8526	<4	<2	<5	<60	121
2011RN311A	0.0585	0.468	<0.05	99.8749	<4	<2	<5	<60	139
2011RN312A	0.27	1.82	<0.05	99.8413	26	<2	<5	<60	117
2011RN313A	0.252	1.56	<0.05	99.8455	7	<2	<5	<60	151
2011RN313A	0.267	1.56	<0.05	99.8297	<4	<2	<5	<60	110
2011RN314A	0.25	1.69	<0.05	99.9009	<4	<2	<5	<60	105
2011RN315A	0.223	1.91	<0.05	99.89	<4	<2	<5	<60	83
2011RN315A	0.225	1.92	<0.05	99.821	<4	<2	<5	<60	206
2011RN321A	0.228	1.37	<0.05	99.8601	<4	<2	<5	<60	96
2011RN322B	0.0513	0.228	<0.05	99.9544	<4	<2	<5	<60	200
2011RN324A	0.262	1.62	<0.05	99.7875	<4	<2	<5	<60	72
2011RN326A	0.306	2.43	<0.05	99.8716	<4	<2	<5	<60	86
2011RN328A	0.167	1.49	<0.05	99.8288	<4	<2	<5	<60	<50
2011TL003A	0.114	0.614	<0.05	99.70281	43	<2	<5	<60	181
2011TL003B	0.123	0.924	<0.05	99.6139	<4	<2	<5	<60	101
2011Z002A	0.0496	0.578	<0.05	99.811	29	<2	<5	<60	373
2011Z003A	0.0348	0.598	<0.05	99.9148	<4	<2	<5	<60	74
2011Z006A	0.0443	0.213	<0.05	99.5208	<4	<2	<5	<60	201
2011Z006A	0.216	1.55	<0.05	99.8132	<4	<2	<5	<60	<50
2011Z010A	0.139	1.06	<0.05	99.8387	<4	<2	<5	<60	72
2011Z027A	0.298	0.593	<0.05	99.888	<4	<2	<5	<60	117
2011Z029A	0.107	0.367	<0.05	99.955	<4	<2	<5	<60	143

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011RN266A	37	233	61	<110	<50	<1	<1	8	95
2011RN267A	<10	76	<7	<110	224	<1	<1	8	44
2011RN271A	24	132	37	<110	<50	<1	<1	19	46
2011RN283B	<10	71	<7	<110	<50	<1	<1	12	23
2011RN285A	15	92	27	<110	<50	<1	<1	---	44
2011RN300B	120	586	72	939	<50	<1	<1	5	184
2011RN301A	<10	114	25	<110	279	<1	<1	20	47
2011RN303B	<10	128	9	1080	<50	<1	<1	16	43
2011RN303C	<10	95	<7	<110	<50	<1	<1	12	48
2011RN305A	17	98	32	<110	<50	<1	<1	13	49
2011RN310A	<10	195	<7	<110	<50	<1	<1	15	37
2011RN311A	57	394	199	<110	<50	<1	<1	1	228
2011RN312A	55	<30	81	<110	<50	<1	<1	12	48
2011RN313A	35	107	204	<110	<50	<1	<1	8	39
2011RN313A	49	142	175	<110	<50	<1	<1	8	34
2011RN314A	23	114	108	<110	<50	<1	<1	10	21
2011RN315A	103	154	114	<110	<50	<1	<1	9	91
2011RN315A	35	146	78	<110	<50	<1	<1	8	53
2011RN321A	81	238	81	<110	<50	<1	<1	8	142
2011RN322B	<10	<30	7	<110	<50	<1	<1	2	17
2011RN324A	37	168	178	<110	<50	<1	<1	8	72
2011RN326A	48	145	88	<110	<50	<1	<1	10	46
2011RN328A	<10	260	166	<110	<50	<1	<1	6	100
2011TL003A	85	816	91	<110	<50	<1	<1	3	190
2011TL003B	128	1890	217	<110	<50	<1	<1	4	429
2011Z002A	77	419	19	<110	<50	<1	<1	1	184
2011Z003A	35	335	47	<110	<50	<1	<1	3	98
2011Z006A	231	2210	31	<110	<50	<1	<1	---	1690
2011Z006A	10	285	21	<110	<50	<1	<1	1	57
2011Z010A	49	521	75	<110	<50	<1	<1	4	131
2011Z027A	<10	97	<7	<110	<50	<1	8	---	<7
2011Z029A	<10	61	61	<110	<50	<1	7	6	61

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011RN266A	34	<1	3	50	<2	<4	<1	228	<2
2011RN267A	26	<1	49	37	<2	<4	<1	64	<2
2011RN271A	21	<1	150	67	<2	<4	<1	62	<2
2011RN283B	19	<1	56	604	<2	<4	<1	143	<2
2011RN285A	54	<1	---	4370	<2	<4	<1	---	<2
2011RN300B	<4	<1	38	5030	<2	<4	<1	151	<2
2011RN301A	17	<1	146	2860	<2	<4	<1	86	<2
2011RN303B	28	<1	139	2020	<2	<4	<1	55	<2
2011RN303C	<4	<1	100	165	<2	<4	<1	34	<2
2011RN305A	29	<1	123	7040	<2	<4	<1	43	<2
2011RN310A	18	<1	117	102	<2	<4	<1	55	<2
2011RN311A	<4	<1	2	80	<2	<4	<1	92	<2
2011RN312A	13	<1	38	<30	<2	<4	<1	140	<2
2011RN313A	<4	<1	1	177	<2	<4	<1	80	<2
2011RN313A	<4	<1	1	167	<2	<4	<1	80	<2
2011RN314A	34	<1	16	118	<2	<4	<1	101	<2
2011RN315A	<4	<1	20	75	<2	<4	<1	86	<2
2011RN315A	<4	<1	20	93	<2	<4	<1	87	<2
2011RN321A	<4	<1	4	76	<2	<4	<1	151	<2
2011RN322B	<4	<1	1	131	<2	<4	<1	11	<2
2011RN324A	37	<1	5	40	<2	<4	<1	291	<2
2011RN326A	<4	<1	3	48	<2	<4	<1	104	<2
2011RN328A	<4	<1	3	55	<2	<4	<1	320	<2
2011TL003A	<4	<1	22	148	<2	<4	<1	171	<2
2011TL003B	28	<1	1	304	<2	<4	<1	187	<2
2011Z002A	19	<1	7	103	<2	<4	<1	215	<2
2011Z003A	<4	<1	10	<30	<2	<4	<1	141	<2
2011Z006A	<4	<1	---	137	<2	<4	<1	---	<2
2011Z006A	<4	<1	1	105	<2	<4	<1	124	<2
2011Z010A	<4	<1	2	51	<2	<4	<1	174	<2
2011Z027A	23	37	---	50	<2	<4	43	---	<2
2011Z029A	<4	71	68	45	<2	<4	47	43	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011RN266A	<1	372	<8	<1	23	159	<9	108
2011RN267A	<1	89	<8	<1	14	44	<9	202
2011RN271A	<1	176	<8	<1	25	103	<9	244
2011RN283B	<1	92	<8	<1	9	56	<9	208
2011RN285A	<1	137	<8	<1	---	85	<9	<9
2011RN300B	<1	302	<8	<1	17	63	<9	75
2011RN301A	<1	163	<8	<1	12	85	<9	195
2011RN303B	<1	156	<8	<1	18	85	<9	147
2011RN303C	<1	130	<8	<1	17	70	<9	122
2011RN305A	<1	138	<8	<1	11	75	<9	140
2011RN310A	<1	477	<8	<1	32	26	<9	181
2011RN311A	<1	217	<8	<1	19	51	<9	34
2011RN312A	<1	411	<8	<1	42	133	<9	192
2011RN313A	<1	503	<8	<1	36	145	<9	158
2011RN313A	<1	551	<8	<1	36	160	<9	161
2011RN314A	<1	543	<8	<1	41	137	<9	167
2011RN315A	<1	514	<8	<1	32	97	<9	129
2011RN315A	<1	576	<8	<1	32	102	<9	130
2011RN321A	<1	408	<8	<1	27	82	<9	103
2011RN322B	<1	55	<8	<1	15	<8	<9	66
2011RN324A	<1	463	<8	<1	32	89	<9	123
2011RN326A	<1	482	<8	<1	39	193	<9	180
2011RN328A	<1	428	<8	<1	26	87	<9	88
2011TL003A	<1	292	<8	<1	19	86	<9	55
2011TL003B	<1	307	<8	<1	17	75	<9	55
2011Z002A	<1	174	<8	<1	21	68	<9	31
2011Z003A	<1	79	<8	<1	10	50	<9	32
2011Z006A	<1	140	<8	<1	---	101	<9	<9
2011Z006A	<1	399	<8	<1	47	89	<9	147
2011Z010A	<1	312	<8	<1	21	81	<9	79
2011Z027A	<1	128	<8	10	---	46	179	---
2011Z029A	<1	127	<8	28	11	60	58	84

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011Z030A	65.324865	-152.804615	509102	7244483	5N	Calcite-muscovite-albite quartz schist	---
2011Z031A	65.324737	-152.803092	509173	7244469	5N	Mafic schist	Small
2011Z034B	65.322654	-152.794908	509555	7244238	5N	Metagabbro	---
2011Z038B	65.319398	-152.776562	510411	7243878	5N	Mafic schist	Altered
2011Z042A	65.318147	-152.756872	511329	7243742	5N	Metagabbro	---
2011Z045A	65.322647	-152.748674	511709	7244245	5N	Metagabbro(?)	---
2011Z057B	65.351089	-152.825478	508122	7247403	5N	Metagabbro(?)	---
2011Z080A	65.456443	-152.725364	512730	7259162	5N	Metagabbro(?)	---
2011Z081A	65.458486	-152.723897	512797	7259390	5N	Gabbro	Altered
2011Z088A	65.462192	-152.805253	509025	7259789	5N	Quartz-muscovite schist	---
2011Z088A	65.462192	-152.805253	509025	7259789	5N	Quartz-muscovite schist	---
2011Z088A	65.462192	-152.805253	509025	7259789	5N	Quartz-muscovite schist	---
2011Z088A	65.462192	-152.805253	509025	7259789	5N	Quartz-muscovite schist	---
2011Z089A	65.462686	-152.805270	509024	7259844	5N	Metamafic	---
2011Z092A	65.465143	-152.811640	508728	7260117	5N	Mafic schist	---
2011Z105A	65.396639	-152.939020	502833	7252470	5N	Garnet-sillimanite-muscovite-biotite quartz schist	---
2011Z110A	65.405328	-152.928385	503326	7253439	5N	Plagioclase-biotite quartz schist	---
2011Z110B	65.405328	-152.928385	503326	7253439	5N	Biotite quartzite	---
2011Z112A	65.405613	-152.924013	503529	7253471	5N	Fine-grained, feldspar-rich orthogneiss(?)	Inhomogenous
2011Z113A	65.406141	-152.920415	503696	7253530	5N	Muscovite-albite-biotite quartz schist	---
2011Z116A	65.413436	-152.921772	503632	7254343	5N	Biotite-plagioclase-Quartz-paragneiss	---
2011Z120B	65.258635	-152.752088	511578	7237110	5N	Muscovite-albite quartz schist	Porous
2011Z123A	65.264890	-152.752586	511552	7237807	5N	Calcite-albite-chlorite-muscovite quartz schist	---
2011Z135A	65.250036	-152.610378	518202	7236185	5N	Albite-chlorite-muscovite	---
2011Z149A	65.298478	-152.586974	519260	7241591	5N	Albite-chlorite-quartz schist	---
2011Z160A	65.243216	-153.588693	472491	7235497	5N	orthogneiss(?)	Inhomogenous
2011Z161A	65.244856	-153.598211	472048	7235684	5N	Chlorite-albite-muscovite Quartz schist	---

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011Z030A	67.6	12.9	0.383	8.58	2.25	2.16	1.49	0.0596	3.76
2011Z031A	51	14.6	<0.03	7.54	14.2	0.0778	5.13	0.189	5.71
2011Z034B	51	13.4	<0.03	11.7	13.2	<.02	6.57	0.246	2.52
2011Z038B	58.3	14.1	<0.03	3	14	0.0414	5.7	0.136	2.63
2011Z042A	51.5	15.1	<0.03	9.74	11.6	0.139	4.98	0.194	4.45
2011Z045A	50.2	15.8	<0.03	10.2	10.8	0.0211	7.72	0.193	3.99
2011Z057B	47.2	18.5	<0.03	13	10.4	0.034	8.06	0.184	2.15
2011Z080A	54.3	18.5	0.0464	6.87	8.52	0.399	4.03	0.171	6
2011Z081A	55.5	18.9	<0.03	8.01	6.34	0.279	3.53	0.133	6.18
2011Z088A	69.8	15.4	0.193	0.194	8.01	3.38	1.16	0.221	0.21
2011Z088A	69.7	15.7	0.186	0.187	7.66	3.43	1.13	0.212	0.22
2011Z088A	70.7	15.4	0.175	0.252	7.24	3.36	1.09	0.219	0.189
2011Z088A	70.2	15.6	0.181	0.23	7.37	3.52	1.06	0.217	0.226
2011Z089A	53.3	15.5	<0.03	7.06	10.9	0.0502	8.92	0.24	3.52
2011Z092A	50.7	15.5	<0.03	10.4	11.4	0.134	6.46	0.223	3.78
2011Z105A	68.2	20.1	0.0908	0.157	4.91	3.11	1.34	0.0823	0.96
2011Z110A	70	16	0.0794	0.944	6.38	2.94	1.29	0.054	0.922
2011Z110B	92.1	3.59	0.0385	1.18	0.95	0.761	0.799	<0.03	0.231
2011Z112A	67.4	17.7	0.0834	0.614	6.17	3.63	1.14	0.102	1.8
2011Z113A	75	11.3	0.0782	1.36	4.27	3.16	1.92	0.0687	1.84
2011Z116A	72.5	12.5	0.0541	2.1	4.24	2.35	2.08	0.0745	3.08
2011Z120B	89.1	4.37	0.0374	0.31	2.94	0.93	0.393	<0.03	1.13
2011Z123A	77.5	9.57	0.097	3.4	3.94	1.55	1.93	0.0329	1.24
2011Z135A	74.6	13.8	0.098	0.143	5.64	3.08	1.15	0.0303	0.609
2011Z149A	74.2	9.24	<0.03	0.292	6.09	0.106	6.14	0.0449	2.71
2011Z160A	72.1	15.1	0.0866	1.19	2.4	3.86	0.856	0.0366	3.83
2011Z161A	71.8	13.7	0.0931	1.31	5.02	3.07	2.29	0.0691	2

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011Z030A	0.208	0.506	<0.05	99.8966	51	<2	<5	<60	335
2011Z031A	0.218	1.2	<0.05	99.8648	<4	<2	<5	<60	<50
2011Z034B	0.161	1.13	<0.05	99.9493	49	<2	<5	<60	140
2011Z038B	0.199	1.68	<0.05	99.8004	82	<2	<5	<60	174
2011Z042A	0.294	1.78	<0.05	99.8046	14	<2	<5	<60	95
2011Z045A	0.0881	0.772	<0.05	99.7963	<4	<2	<5	<60	<50
2011Z057B	<0.03	0.435	<0.05	99.9947	18	<2	<5	<60	400
2011Z080A	0.227	0.826	<0.05	99.8894	24	<2	<5	<60	597
2011Z081A	0.218	0.663	<0.05	99.7812	36	<2	<5	<60	888
2011Z088A	0.266	0.767	<0.05	99.601	37	<2	<5	<60	324
2011Z088A	0.232	0.786	<0.05	99.443	5	<2	<5	<60	338
2011Z088A	0.287	0.765	<0.05	99.677	45	<2	<5	<60	106
2011Z088A	0.284	0.776	<0.05	99.664	37	<2	<5	<60	341
2011Z089A	<0.03	0.322	<0.05	99.8449	62	<2	<5	<60	182
2011Z092A	0.1	1.11	<0.05	99.807	<4	<2	<5	<60	821
2011Z105A	0.0889	0.726	<0.05	99.765	<4	<2	<5	<60	<50
2011Z110A	0.162	0.98	<0.05	99.7514	39	<2	<5	<60	131
2011Z110B	0.0679	0.191	<0.05	99.9288	<4	<2	<5	<60	236
2011Z112A	0.105	0.801	<0.05	99.5454	207	<2	<5	<60	511
2011Z113A	0.172	0.714	<0.05	99.8829	<4	<2	<5	<60	229
2011Z116A	0.168	0.756	<0.05	99.9026	30	<2	<5	<60	322
2011Z120B	0.44	0.277	<0.05	99.9539	<4	<2	<5	<60	76
2011Z123A	0.193	0.504	<0.05	99.9569	48	<2	<5	<60	<50
2011Z135A	0.0798	0.733	<0.05	99.9631	<4	<2	<5	<60	<50
2011Z149A	0.274	0.61	<0.05	99.7304	<4	<2	<5	<60	119
2011Z160A	0.157	0.196	<0.05	99.8122	<4	<2	<5	<60	174
2011Z161A	0.0954	0.453	<0.05	99.9006	47	<2	<5	<60	196

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011Z030A	<10	42	33	<110	<50	<1	7	8	22
2011Z031A	89	77	41	<110	<50	<1	<1	2	14
2011Z034B	117	210	59	<110	<50	<1	<1	<1	54
2011Z038B	52	102	31	<110	<50	<1	<1	14	7
2011Z042A	94	189	97	<110	<50	<1	<1	10	62
2011Z045A	52	519	23	<110	<50	<1	<1	1	62
2011Z057B	63	522	55	<110	<50	<1	<1	2	170
2011Z080A	57	74	44	<110	<50	<1	<1	1	39
2011Z081A	40	145	91	<110	<50	<1	<1	2	49
2011Z088A	<10	116	<7	1840	<50	<1	<1	12	57
2011Z088A	<10	106	16	2780	<50	<1	<1	12	95
2011Z088A	<10	117	<7	1720	<50	<1	<1	12	52
2011Z088A	<10	115	23	1815	<50	<1	<1	12	74
2011Z089A	37	420	17	<110	<50	<1	<1	3	160
2011Z092A	49	103	16	<110	<50	<1	<1	1	36
2011Z105A	<10	112	<7	<110	<50	<1	11	13	38
2011Z110A	33	72	55	1250	<50	<1	18	15	41
2011Z110B	<10	<30	<7	<110	<50	<1	<1	3	60
2011Z112A	<10	117	33	2610	<50	<1	<1	15	39
2011Z113A	<10	77	<7	<110	<50	<1	10	---	<7
2011Z116A	<10	88	27	402	<50	<1	6	11	25
2011Z120B	<10	76	63	<110	<50	<1	<1	---	39
2011Z123A	<10	77	25	<110	<50	<1	<1	8	29
2011Z135A	<10	94	14	<110	<50	<1	15	---	29
2011Z149A	<10	822	27	859	<50	<1	8	4	249
2011Z160A	81	40	<7	<110	<50	<1	<1	9	16
2011Z161A	<10	82	<7	<110	<50	<1	9	10	27

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011Z030A	32	70	63	193	<2	<4	219	195	<2
2011Z031A	<4	<1	1	<30	<2	<4	<1	153	<2
2011Z034B	21	<1	<1	66	<2	<4	<1	148	<2
2011Z038B	24	<1	<1	69	<2	<4	<1	201	<2
2011Z042A	<4	<1	5	51	<2	<4	<1	274	<2
2011Z045A	27	<1	<1	50	<2	<4	<1	184	<2
2011Z057B	<4	<1	<1	80	<2	<4	<1	132	<2
2011Z080A	21	<1	61	37	<2	<4	<1	287	<2
2011Z081A	19	<1	20	68	<2	<4	<1	300	<2
2011Z088A	22	<1	282	324	<2	58.3	<1	11	7.5
2011Z088A	38	<1	284	316	<2	59.2	<1	11	9.8
2011Z088A	<4	<1	289	145	<2	50	<1	12	<2
2011Z088A	26	<1	291	267	<2	59.9	<1	12	9.6
2011Z089A	25	<1	2	157	<2	<4	<1	131	<2
2011Z092A	<4	<1	10	349	<2	<4	<1	177	<2
2011Z105A	40	118	128	1060	<2	<4	112	118	<2
2011Z110A	20	130	135	53	<2	<4	82	86	<2
2011Z110B	<4	60	56	91	<2	<4	32	34	<2
2011Z112A	47	<1	223	55	<2	<4	<1	177	<2
2011Z113A	35	112	---	243	<2	<4	106	---	<2
2011Z116A	44	97	99	39	<2	<4	172	178	<2
2011Z120B	30	39	---	118	<2	<4	21	---	<2
2011Z123A	19	62	60	77	<2	<4	183	160	<2
2011Z135A	<4	126	---	<30	<2	<4	44	---	<2
2011Z149A	22	12	4	54	<2	<4	17	14	<2
2011Z160A	31	<1	154	417	<2	<4	<1	68	<2
2011Z161A	22	138	141	68	<2	<4	33	38	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011Z030A	<1	121	<8	34	20	51	201	209
2011Z031A	<1	473	<8	<1	51	106	<9	114
2011Z034B	<1	299	<8	<1	49	116	<9	56
2011Z038B	<1	550	<8	<1	25	109	<9	97
2011Z042A	<1	400	<8	<1	30	100	<9	159
2011Z045A	<1	307	<8	<1	28	55	<9	57
2011Z057B	<1	240	<8	<1	12	61	<9	22
2011Z080A	<1	242	<8	<1	22	107	<9	59
2011Z081A	<1	307	<8	<1	25	76	<9	75
2011Z088A	3.4	225	<8	<1	30	137	<9	144
2011Z088A	2.6	302	<8	<1	30	133	<9	145
2011Z088A	<1	232	<8	<1	31	124	<9	146
2011Z088A	2.4	228	<8	<1	33	131	<9	146
2011Z089A	<1	257	<8	<1	32	56	<9	23
2011Z092A	<1	452	<8	<1	29	116	<9	45
2011Z105A	<1	126	<8	15	21	79	125	156
2011Z110A	<1	184	<8	27	32	70	149	167
2011Z110B	<1	44	<8	5	8	15	85	102
2011Z112A	<1	147	<8	<1	43	91	<9	171
2011Z113A	<1	102	<8	19	---	68	132	---
2011Z116A	<1	134	<8	12	20	68	127	176
2011Z120B	<1	219	<8	18	---	43	50	<9
2011Z123A	<1	156	<8	14	18	75	133	156
2011Z135A	<1	109	<8	24	---	55	205	---
2011Z149A	<1	227	<8	22	14	76	62	92
2011Z160A	<1	<25	<8	<1	20	40	<9	133
2011Z161A	<1	154	<8	21	30	66	111	148

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011Z165A	65.324838	-152.985124	500693	7244466	5N	Biotite-albite-muscovite quartz schist	---
2011Z165A	65.220532	-153.507728	476254	7232936	5N	chloritoid-quartz-mica schist	Inhomogenous
2011Z166A	65.452720	-152.571084	519884	7258787	5N	Metagabbro(?)	---
2011Z168B	65.448997	-152.558592	520466	7258376	5N	Cherty slate	---
2011Z169A	65.447038	-152.557482	520519	7258158	5N	Metagabbro	---
2011Z173A	65.441840	-152.565785	520138	7257576	5N	Quartzite	---
2011Z175A	65.440109	-152.569263	519978	7257382	5N	Mafic schist	---
2011Z178B	65.435810	-152.578323	519561	7256900	5N	Pyrite slate	Small
2011Z180A	65.432751	-152.581519	519415	7256558	5N	Albite quartzite	---
2011Z183A	65.428024	-152.588750	519083	7256029	5N	Mafic schist	---
2011Z186A	65.418086	-152.589746	519044	7254921	5N	Metagabbro	---
2011Z187A	65.416791	-152.592028	518939	7254776	5N	Metagabbro(?)	---
2011Z188A	65.415834	-152.593227	518884	7254669	5N	Metadacite(?)	---
2011Z189A	65.414851	-152.594686	518817	7254559	5N	Serpentinite	---
2011Z190B	65.413194	-152.595616	518775	7254374	5N	Biotite-chlorite-albite schist(?)	---
2011Z194A	65.406854	-152.597006	518715	7253667	5N	Metagabbro	---
2011Z207A	65.338726	-152.978458	501003	7246014	5N	Mafic schist	---
2011Z209A	65.337819	-152.975602	501136	7245913	5N	Mafic schist(?)	---
2011Z220B	65.324838	-152.985124	500693	7244466	5N	Muscovite-chlorite quartz schist	---
2011Z224A	65.321169	-152.996780	500150	7244057	5N	Albite-muscovite quartz schist	---
2011Z256B	65.180341	-153.888678	458375	7228654	5N	Granitic orthogneiss	---
2011Z269A	65.318163	-153.522849	475637	7243823	5N	Metadiorite(?)	Inhomogenous
2011Z272A	65.320170	-153.516064	475955	7244044	5N	Feldspar-mica schist(?)	---
2011Z275A	65.318974	-153.503378	476545	7243906	5N	Chloritoid-quartz-mica schist	---
2011Z277A	65.318827	-153.493653	476998	7243886	5N	Fine-grained gabbro	---
2011Z279A	65.319484	-153.487463	477287	7243957	5N	Metadiorite(?)	---
2011Z281A	65.319561	-153.477506	477751	7243962	5N	Mica quartz schist	Inhomogenous
2011Z286A	65.315219	-152.980194	500923	7243394	5N	Chlorite-muscovite quartz schist	Inhomogenous
2011Z286A	65.315219	-152.980194	500923	7243394	5N	Chlorite-muscovite quartz schist	Inhomogenous
2011Z288A	65.311782	-152.976613	501090	7243011	5N	Garnet amphibolitite(?)	Inhomogenous
2011Z293A	65.303132	-152.968663	501461	7242047	5N	Metadiorite(?)	Porous
2011Z294B	65.301391	-152.967657	501508	7241853	5N	Metagabbro	Porous

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011Z165A	69.4	16.9	0.0758	0.15	6.55	3.03	1.35	0.0841	1.5
2011Z165A	68.9	16.9	0.0668	0.271	6.78	2.9	1.27	0.109	1.42
2011Z166A	49.4	16.5	0.0589	12.3	10.2	0.459	6.7	0.212	2.68
2011Z168B	81.8	7.13	0.54	2.37	3.6	0.864	0.866	0.828	1.52
2011Z169A	49.3	18.1	0.0956	11.7	8.09	1.21	7.03	0.166	3.09
2011Z173A	95	2.4	0.217	0.108	0.548	0.504	0.675	<0.03	0.359
2011Z175A	49.7	14.9	0.087	11.2	12.5	0.116	6.03	0.211	3.28
2011Z178B	57.1	11	0.166	2.98	15	0.97	5.55	0.102	6
2011Z180A	95	2.01	0.0494	0.781	0.6	0.276	0.56	<0.03	0.54
2011Z183A	49	13.9	0.304	7.53	15.7	0.359	4.59	0.273	4.45
2011Z186A	51.4	14.3	<0.03	10.3	12.9	0.098	6.48	0.179	2.61
2011Z187A	50.8	16.3	<0.03	10.9	9.29	0.442	8.51	0.186	2.62
2011Z188A	68.1	13.9	0.171	3.36	5.79	1.12	2.03	0.148	4.46
2011Z189A	44.7	4.5	<0.03	2.75	12.6	0.0622	34.4	0.209	0.0778
2011Z190B	57.3	16.4	0.118	5.38	7.48	1.67	2.95	0.165	7.2
2011Z194A	49.9	15.7	0.0675	9.58	12	0.918	5.38	0.189	4.24
2011Z207A	53.2	17.4	<0.03	5.57	9.3	0.0284	6.92	0.124	6.76
2011Z209A	53.1	17.6	<0.03	5.48	9.21	0.0256	6.96	0.134	6.8
2011Z220B	76.8	9.91	0.0561	1.55	6.28	1.51	2.23	0.0508	0.564
2011Z224A	86	6.98	0.114	0.272	2.85	1.03	1.14	<0.03	0.859
2011Z256B	75.3	13.5	<0.03	0.715	0.825	5.04	0.14	<0.03	4.06
2011Z269A	66.7	9.8	0.0433	5.85	8.26	0.341	2.82	0.264	3.64
2011Z272A	67.7	11.9	0.0709	8.12	4.56	2	2.49	0.0452	2.27
2011Z275A	68.7	16.9	0.12	0.229	7.93	2.98	1.24	0.135	0.687
2011Z277A	49.9	14.5	0.0669	8.99	13.3	0.218	4.84	0.237	5.17
2011Z279A	60	17.2	0.0318	6.45	9.28	0.804	2.91	0.0955	2.17
2011Z281A	83.4	7.2	0.096	2.43	2.81	0.676	1.24	0.0819	1.49
2011Z286A	75.5	12.3	0.137	0.188	6.35	2.31	1.35	0.0459	0.59
2011Z286A	75.5	12.5	0.119	0.173	6.36	2.28	1.3	0.0323	0.454
2011Z288A	51.6	14	0.0365	8.52	13.2	0.214	4.93	0.263	4.43
2011Z293A	60.9	13.9	<0.03	2.7	12.1	0.0326	5.03	0.182	3.56
2011Z294B	51.4	16.9	0.0401	9.42	9.86	0.364	4.31	0.2	5.55

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011Z165A	0.155	0.737	<0.05	99.9319	<4	<2	<5	<60	135
2011Z165A	0.212	0.809	<0.05	99.6378	4	<2	<5	<60	431
2011Z166A	0.2	1.24	<0.05	99.9499	<4	<2	<5	<60	<50
2011Z168B	<0.03	0.369	<0.05	99.9148	<4	<2	<5	<60	107
2011Z169A	0.109	0.921	<0.05	99.8116	<4	<2	<5	<60	72
2011Z173A	0.0362	0.103	<0.05	99.9724	<4	<2	<5	<60	73
2011Z175A	0.241	1.55	<0.05	99.815	<4	<2	<5	<60	<50
2011Z178B	0.113	0.647	<0.05	99.628	<4	<2	<5	<60	251
2011Z180A	0.0384	0.0842	<0.05	99.9522	<4	<2	<5	247	131
2011Z183A	0.637	3.11	<0.05	99.853	<4	<2	<5	<60	185
2011Z186A	0.214	1.31	<0.05	99.817	<4	<2	<5	<60	68
2011Z187A	0.101	0.601	<0.05	99.75393	101	<2	<5	<60	113
2011Z188A	0.306	0.541	<0.05	99.926	<4	<2	<5	<60	106
2011Z189A	0.0501	0.223	<0.05	99.5847	<4	<2	<5	<60	157
2011Z190B	0.45	0.796	<0.05	99.909	<4	<2	<5	<60	178
2011Z194A	0.246	1.58	<0.05	99.8005	<4	<2	<5	<60	101
2011Z207A	0.171	0.396	<0.05	99.8858	15	<2	<5	<60	90
2011Z209A	0.179	0.387	<0.05	99.8867	19	<2	<5	<60	94
2011Z220B	0.0917	0.704	<0.05	99.7466	43	<2	<5	<60	139
2011Z224A	0.142	0.504	<0.05	99.9107	31	<2	<5	<60	107
2011Z256B	0.21	0.0866	<0.05	99.9038	<4	<2	<5	<60	312
2011Z269A	0.33	1.75	<0.05	99.8383	11	<2	<5	<60	112
2011Z272A	0.142	0.609	<0.05	99.9071	8	<2	<5	<60	299
2011Z275A	0.202	0.808	<0.05	99.931	<4	<2	<5	<60	<50
2011Z277A	0.351	2.21	<0.05	99.7829	<4	<2	<5	<60	101
2011Z279A	0.16	0.743	<0.05	99.8443	10	<2	<5	<60	123
2011Z281A	0.257	0.196	<0.05	99.8869	4	<2	<5	<60	255
2011Z286A	0.135	0.889	<0.05	99.7949	63	<2	<5	<60	465
2011Z286A	0.138	0.97	<0.05	99.8263	68	<2	<5	<60	271
2011Z288A	0.413	2.17	<0.05	99.7765	19	<2	<5	<60	515
2011Z293A	0.427	0.924	<0.05	99.7758	<4	<2	<5	<60	243
2011Z294B	0.319	1.54	<0.05	99.9031	<4	<2	<5	<60	103

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011Z165A	<10	116	<7	<110	<50	<1	12	16	46
2011Z165A	<10	89	<7	1700	<50	<1	<1	16	31
2011Z166A	87	288	65	<110	<50	<1	<1	6	162
2011Z168B	27	<30	63	<110	<50	<1	7	---	80
2011Z169A	74	243	94	<110	<50	<1	<1	4	113
2011Z173A	<10	59	<7	<110	<50	<1	<1	---	46
2011Z175A	91	225	91	<110	<50	<1	<1	6	70
2011Z178B	95	62	65	<110	<50	<1	7	---	23
2011Z180A	<10	39	57	<110	<50	<1	<1	---	48
2011Z183A	103	97	11	<110	<50	<1	<1	37	24
2011Z186A	24	266	157	<110	<50	<1	<1	5	76
2011Z187A	35	727	154	<110	<50	<1	<1	3	303
2011Z188A	28	77	60	<110	<50	<1	13	10	79
2011Z189A	178	2250	32	<110	<50	<1	<1	<1	1790
2011Z190B	<10	57	7	<110	<50	<1	24	16	57
2011Z194A	107	71	9	<110	<50	<1	<1	7	41
2011Z207A	99	399	64	<110	<50	<1	<1	3	165
2011Z209A	45	422	33	<110	<50	<1	<1	3	120
2011Z220B	34	49	29	1060	<50	<1	9	---	42
2011Z224A	<10	68	29	<110	<50	<1	9	7	39
2011Z256B	<10	<30	45	<110	<50	<1	<1	9	<7
2011Z269A	68	319	72	<110	<50	<1	<1	16	122
2011Z272A	<10	90	<7	<110	<50	<1	<1	11	40
2011Z275A	<10	113	<7	<110	<50	<1	<1	15	23
2011Z277A	<10	160	44	<110	<50	<1	<1	12	72
2011Z279A	<10	<30	<7	749	<50	<1	<1	2	<7
2011Z281A	<10	94	44	<110	<50	<1	<1	4	29
2011Z286A	19.2	122	26.2	<110	<50	<1	<1	15.6	45
2011Z286A	53	110	15	<110	<50	<1	<1	14	39
2011Z288A	54	121	83	<110	<50	<1	<1	10.4	<7
2011Z293A	<10	148	<7	<110	<50	<1	<1	8	55
2011Z294B	<10	101	45	<110	<50	<1	<1	11	53

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011Z165A	36	142	144	53	<2	<4	46	44	<2
2011Z165A	30	<1	137	207	<2	<4	<1	46	<2
2011Z166A	<4	<1	9	57	<2	<4	<1	222	<2
2011Z168B	39	23	---	56	<2	<4	25	---	<2
2011Z169A	<4	<1	33	<30	<2	<4	<1	192	<2
2011Z173A	<4	22	---	31	<2	<4	5	---	<2
2011Z175A	<4	<1	3	103	<2	<4	<1	244	<2
2011Z178B	13	28	---	2580	<2	<4	24	---	<2
2011Z180A	<4	11		218	<2	<4	11	---	<2
2011Z183A	<4	<1	13	135	<2	<4	<1	209	<2
2011Z186A	<4	<1	2	38	<2	<4	<1	105	<2
2011Z187A	<4	<1	28	80	<2	<4	<1	212	<2
2011Z188A	<4	29	28	47	<2	<4	288	283	<2
2011Z189A	<4	<1	11	137	<2	<4	<1	12	<2
2011Z190B	<4	34	30	35	<2	<4	299	280	<2
2011Z194A	<4	<1	32	<30	<2	<4	<1	421	<2
2011Z207A	<4	<1	1	137	<2	<4	<1	80	<2
2011Z209A	<4	<1	1	44	<2	<4	<1	79	<2
2011Z220B	22	91	---	112	<2	<4	18	---	<2
2011Z224A	16	49	48	105	<2	<4	51	45	<2
2011Z256B	61	<1	200	128	<2	<4	<1	55	<2
2011Z269A	<4	<1	10	117	<2	<4	<1	68	<2
2011Z272A	17	<1	81	164	<2	<4	<1	86	<2
2011Z275A	33	<1	122	157	<2	<4	<1	60	<2
2011Z277A	42	<1	3	132	<2	<4	<1	308	<2
2011Z279A	24	<1	37	105	<2	<4	<1	338	<2
2011Z281A	18	<1	24	75	<2	<4	<1	134	<2
2011Z286A	30.1	<1	104.5	236	<2	<4	<1	41.4	12.3
2011Z286A	17	<1	100	162	<2	<4	<1	42	<2
2011Z288A	<4	<1	6.8	291	<2	<4	<1	251.7	<2
2011Z293A	<4	<1	1	256	<2	<4	<1	107	<2
2011Z294B	<4	<1	12	86	<2	<4	<1	240	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011Z165A	<1	135	<8	14	24	100	130	148
2011Z165A	<1	162	<8	<1	21	75	<9	152
2011Z166A	<1	354	<8	<1	25	78	<9	97
2011Z168B	<1	98	<8	16	---	82	63	<9
2011Z169A	<1	348	<8	<1	14	60	<9	64
2011Z173A	<1	48	<8	2	---	24	36	<9
2011Z175A	<1	500	<8	<1	35	95	<9	113
2011Z178B	<1	175	<8	21	---	152	111	---
2011Z180A	<1	41	<8	<1	---	22	34	<9
2011Z183A	<1	575	<8	<1	62	205	<9	323
2011Z186A	<1	374	<8	<1	28	119	<9	101
2011Z187A	<1	355	<8	<1	18	87	<9	52
2011Z188A	<1	151	<8	16	21	165	104	130
2011Z189A	<1	110	<8	<1	8	100	<9	42
2011Z190B	<1	204	<8	105	20	44	101	116
2011Z194A	<1	433	<8	<1	22	71	<9	86
2011Z207A	<1	236	<8	<1	14	72	<9	28
2011Z209A	<1	224	<8	<1	15	57	<9	28
2011Z220B	<1	163	<8	47	---	87	166	---
2011Z224A	<1	119	<8	9	10	53	147	149
2011Z256B	<1	126	<8	<1	18	<8	<9	45
2011Z269A	<1	267	<8	<1	19	81	<9	137
2011Z272A	<1	134	<8	<1	18	81	<9	151
2011Z275A	<1	141	<8	<1	27	84	<9	151
2011Z277A	<1	516	<8	<1	46	110	<9	192
2011Z279A	<1	354	<8	<1	19	78	<9	61
2011Z281A	<1	116	<8	<1	18	40	<9	70
2011Z286A	2.2	219	<8	<1	26.4	128	<9	204
2011Z286A	<1	195	<8	<1	23	141	<9	210
2011Z288A	<1	596	<8	<1	22	117	<9	115.8
2011Z293A	<1	411	<8	<1	25	142	<9	108
2011Z294B	<1	513	<8	<1	28	90	<9	141

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011Z296B	65.298412	-152.965281	501619	7241521	5N	Metamafic	---
2011Z311A	65.484214	-152.668359	515356	7262270	5N	Mica quartz schist	Porous
2011Z320A	65.498338	-152.653270	516046	7263848	5N	Metamafic	Porous
2011Z326A	65.400974	-152.521896	522208	7253036	5N	Gabbro	Altered
2011Z326B	65.400974	-152.521896	522208	7253036	5N	Gabbro	---
2011Z327A	65.399515	-152.520244	522286	7252874	5N	Wherlite	Altered
2011Z328A	65.397579	-152.520946	522255	7252658	5N	Metagabbro	---
2011Z330A	65.395194	-152.521442	522234	7252392	5N	Metaandesite	---
2011Z331A	65.394189	-152.521266	522243	7252280	5N	Metagabbro	---
2011Z336A	65.389356	-152.513801	522594	7251744	5N	Wherlite	Altered
2011Z345B	65.358387	-152.853866	506799	7248213	5N	Metabreccia	Inhomogenous
2011Z349A	65.360504	-152.844933	507214	7248450	5N	Metagabbro	---
2011Z350A	65.361426	-152.842606	507322	7248553	5N	Metagabbro	---
2011Z355A	65.370191	-152.825437	508118	7249532	5N	Metaandesite(?)	Porous
2011Z368B	65.371615	-152.889876	505121	7249684	5N	Metagabbro(?)	Inhomogenous
2011Z371A	65.264114	-152.984494	500724	7237698	5N	Gabbro	Altered
2011Z371A	65.264114	-152.984494	500724	7237698	5N	Metagabbro	Altered
2011Z372A	65.263038	-152.984452	500726	7237578	5N	Metagabbro	---
2011Z373A	65.261709	-152.981754	500852	7237430	5N	Metagabbro	---
2011Z374A	65.260489	-152.982719	500807	7237294	5N	Metagabbro	---
2011Z376A	65.258927	-152.976317	501106	7237120	5N	Metagabbro	---
2011Z378A	65.258979	-152.967410	501522	7237126	5N	Metagabbro	---
2011Z379A	65.259095	-152.962142	501768	7237139	5N	Metagabbro	---
2011Z380A	65.258591	-152.957411	501989	7237083	5N	Calcite-quartz mica schist	Porous
2011Z383B	65.254238	-152.952279	502229	7236598	5N	Mica quartz schist	Inhomogenous, porous
2011Z385A	65.254046	-152.942860	502669	7236577	5N	Serpentinite	---
2011Z397A	65.245132	-152.855647	506745	7235590	5N	Quartz-mica schist	Inhomogenous
2011Z399A	65.243818	-152.860855	506502	7235443	5N	Calcite-mica quartz schist	Porous
2011Z402A	65.246905	-152.870598	506046	7235786	5N	Quartzite	Inhomogenous
2011Z403A	65.246659	-152.866383	506243	7235759	5N	Quartzite	Inhomogenous
2011Z412A	65.236747	-152.859394	506572	7234655	5N	Mica quartzite	Inhomogenous, porous
2011Z412A	65.236747	-152.859394	506572	7234655	5N	Muscovite-quartz schist	Porous

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011Z296B	38.7	22.2	<0.03	7.79	19.3	0.0239	9.77	0.296	0.092
2011Z311A	82.5	8.3	0.239	0.0546	4.81	2.62	0.756	<0.03	0.0613
2011Z320A	52.5	16	0.0441	2.31	12.9	1.42	6.41	0.345	6.13
2011Z326A	47.3	16.4	0.0305	21	4.66	0.0655	8.53	0.099	1.2
2011Z326B	55.4	16.5	<0.03	11.1	4.01	0.0438	2.79	0.0915	7.56
2011Z327A	44.1	5.1	<0.03	3.68	12.9	0.0708	33	0.19	0.142
2011Z328A	51.1	16.8	0.146	10.1	9.97	1.33	5.26	0.193	3.6
2011Z330A	59.3	17.6	0.186	7.97	5.85	1.88	1.65	0.181	3.96
2011Z331A	52.4	16.3	0.106	6.8	10.6	1.71	4.9	0.274	5.4
2011Z336A	46.5	4.6	<0.03	6.42	12	0.112	29	0.197	0.222
2011Z345B	48.1	10.5	0.102	0.0568	37.5	1.59	<0.05	<0.03	0.377
2011Z349A	51.9	14.1	<0.03	9.88	11.6	0.0717	6.49	0.223	4.55
2011Z350A	49.9	16.1	<0.03	10.1	11	0.0319	8.18	0.193	3.45
2011Z355A	62.6	20.8	0.102	0.159	7.87	2.1	2.91	0.237	2
2011Z368B	46.9	14.2	<0.03	16.9	11.3	0.485	8.2	0.227	0.611
2011Z371A	49.9	15.5	0.0379	14.5	8.46	0.154	8.49	0.164	1.96
2011Z371A	49.9	16	0.042	14.2	8.05	0.18	8.3	0.151	2.2
2011Z372A	50.8	15.5	0.124	13.2	10.4	0.82	6.36	0.2	1.05
2011Z373A	51.1	16.1	0.0785	10.9	9.3	0.296	6.7	0.16	4.02
2011Z374A	50.4	17.3	0.0376	13.4	7.34	0.195	7.02	0.129	3.1
2011Z376A	49.8	16.5	0.047	13.5	8.52	0.217	7.36	0.149	2.93
2011Z378A	50.5	15.1	0.0695	13.2	8.44	0.298	8.3	0.145	2.72
2011Z379A	50.5	15.8	<0.03	12.6	9.45	0.169	7.54	0.168	2.67
2011Z380A	69	18.7	0.0557	0.146	5.47	1.01	1.65	0.0441	3.13
2011Z383B	70.8	16	0.071	0.201	6.66	0.754	1.69	0.0411	2.47
2011Z385A	49.5	2.4	<0.03	0.0342	8.07	<.02	39.3	0.094	0.0234
2011Z397A	56.9	22.5	0.175	0.167	11.1	5.05	2.1	0.104	0.488
2011Z399A	84.9	7.3	0.0849	0.157	4.73	1.37	0.619	0.0337	0.28
2011Z402A	96.2	0.9	0.0494	0.0548	2.07	0.163	0.162	<0.03	0.0343
2011Z403A	94.9	2.9	<0.03	0.156	0.554	0.499	0.26	<0.03	0.351
2011Z412A	93.6	3.14	0.0431	0.0671	1.8	0.528	0.29	<0.03	0.208
2011Z412A	85.1	8.73	0.0626	0.096	2.74	1.28	0.537	<0.03	0.928

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011Z296B	0.0818	1.55	<0.05	99.8231	<4	<2	<5	<60	133
2011Z311A	0.109	0.532	<0.05	99.9562	4	<2	<5	<60	117
2011Z320A	0.216	1.62	<0.05	99.8951	<4	<2	<5	<60	233
2011Z326A	<0.03	0.54	<0.05	99.8543	9	<2	<5	<60	73
2011Z326B	0.537	1.75	<0.05	99.8017	<4	<2	<5	<60	126
2011Z327A	0.0382	0.3	<0.05	99.5719	<4	<2	<5	<60	299
2011Z328A	0.241	1.09	<0.05	99.83	<4	<2	<5	<60	153
2011Z330A	0.45	0.785	<0.05	99.812	<4	<2	<5	<60	405
2011Z331A	0.362	0.913	<0.05	99.765	<4	<2	<5	<60	130
2011Z336A	0.0663	0.428	<0.05	99.581	7	<2	<5	<60	283
2011Z345B	0.538	0.598	<0.05	99.3728	3510	3.1	<5	<60	113
2011Z349A	0.129	0.928	<0.05	99.8901	<4	<2	<5	<60	121
2011Z350A	0.0898	0.863	<0.05	99.9243	<4	<2	<5	<60	133
2011Z355A	<0.03	0.98	<0.05	99.7818	18	<2	<5	<60	212
2011Z368B	0.0432	0.86	<0.05	99.7558	<4	<2	<5	<60	89
2011Z371A	0.064	0.615	<0.05	99.8449	<4	<2	<5	<60	228
2011Z371A	0.067	0.75	<0.05	99.84	<4	<2	<5	<60	235
2011Z372A	0.223	1.27	<0.05	99.947	<4	<2	<5	<60	107
2011Z373A	0.228	0.98	<0.05	99.8625	<4	<2	<5	<60	275
2011Z374A	0.0885	0.782	<0.05	99.7921	<4	<2	<5	<60	179
2011Z376A	0.0684	0.767	<0.05	99.8584	<4	<2	<5	<60	166
2011Z378A	0.117	0.81	<0.05	99.6995	6	<2	<5	<60	200
2011Z379A	0.0609	0.936	<0.05	99.9218	<4	<2	<5	<60	482
2011Z380A	0.0445	0.581	<0.05	99.8313	35	<2	<5	<60	307
2011Z383B	0.203	0.98	<0.05	99.8701	5	<2	<5	<60	320
2011Z385A	<0.03	<0.02	<0.05	99.46306	13	<2	<5	<60	63
2011Z397A	0.16	0.957	<0.05	99.701	<4	<2	<5	<60	73
2011Z399A	0.106	0.403	<0.05	99.9336	108	<2	<5	<60	178
2011Z402A	0.308	0.0276	<0.05	99.9351	12	<2	<5	<60	100
2011Z403A	0.0627	0.204	<0.05	99.90576	8	<2	<5	<60	229
2011Z412A	0.0352	0.172	<0.05	99.9039	<4	<2	<5	<60	424
2011Z412A	0.0309	0.388	<0.05	99.9176	77	<2	<5	286	134

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011Z296B	<10	648	106	<110	<50	<1	<1	2	135
2011Z311A	<10	91	74	<110	<50	<1	<1	8	36
2011Z320A	71	508	<7	<110	<50	<1	<1	6	180
2011Z326A	52	639	163	<110	<50	<1	<1	2	139
2011Z326B	<10	<30	25	<110	<50	<1	<1	20	40
2011Z327A	197	2370	<7	<110	<50	<1	<1	2	1610
2011Z328A	70	147	109	<110	<50	<1	<1	7	32
2011Z330A	26.5	77.3	51.7	<110	<50	<1	<1	19.3	8
2011Z331A	<10	108	60	<110	<50	<1	<1	8	68
2011Z336A	184	1980	48	<110	<50	<1	<1	3	1120
2011Z345B	<10	103	242	<110	<50	4	<1	8	110
2011Z349A	95	214	49	<110	<50	<1	<1	1	47
2011Z350A	50	77	40	<110	<50	<1	<1	1	128
2011Z355A	79	142	43	<110	<50	<1	<1	13	122
2011Z368B	57	370	62	<110	<50	<1	<1	1	246
2011Z371A	36	314	85	<110	<50	<1	<1	3	104
2011Z371A	<10	348	51	<110	<50	<1	<1	4	144
2011Z372A	43	245	18	<110	<50	<1	<1	7	86
2011Z373A	<10	477	74	<110	<50	<1	<1	6	76
2011Z374A	<10	580	56	<110	<50	<1	<1	4	134
2011Z376A	<10	701	69	<110	<50	<1	<1	5	98
2011Z378A	63	1020	134	<110	<50	<1	<1	4	175
2011Z379A	39	280	45	<110	<50	<1	<1	4	101
2011Z380A	<10	<30	27	<110	<50	<1	<1	2	<7
2011Z383B	25	44	44	<110	<50	<1	<1	9	10
2011Z385A	167	2400	7	<110	<50	<1	<1	1	3020
2011Z397A	50	137	48	2280	<50	<1	<1	17	<7
2011Z399A	<10	59	32	<110	<50	<1	<1	7	39
2011Z402A	<10	31	56	<110	<50	<1	<1	1	23
2011Z403A	<10	<30	67	<110	<50	<1	<1	4	38
2011Z412A	<10	50	<7	116	<50	<1	<1	3	38
2011Z412A	11	72	38	<110	<50	<1	<1	7	48

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011Z296B	<4	<1	2	134	<2	<4	<1	179	<2
2011Z311A	20	<1	73	61	<2	<4	<1	6	<2
2011Z320A	<4	<1	20	135	<2	<4	<1	45	<2
2011Z326A	<4	<1	1	125	<2	<4	<1	174	<2
2011Z326B	<4	<1	<1	85	<2	<4	<1	285	<2
2011Z327A	<4	<1	2	356	<2	<4	<1	72	<2
2011Z328A	<4	<1	39	79	<2	<4	<1	100	<2
2011Z330A	<4	<1	35.3	229	<2	<4	<1	619.9	<2
2011Z331A	32	<1	40	102	<2	<4	<1	777	<2
2011Z336A	<4	<1	4	332	<2	<4	<1	76	<2
2011Z345B	45	<1	76	651	3	<4	<1	36	<2
2011Z349A	32	<1	2	184	<2	<4	<1	134	<2
2011Z350A	<4	<1	1	58	<2	<4	<1	110	<2
2011Z355A	51	<1	80	105	<2	<4	<1	117	<2
2011Z368B	<4	<1	32	100	<2	<4	<1	203	<2
2011Z371A	24	<1	3	43	<2	<4	<1	306	<2
2011Z371A	25	<1	4	144	<2	<4	<1	303	<2
2011Z372A	21	<1	31	50	<2	<4	<1	254	<2
2011Z373A	<4	<1	10	58	<2	<4	<1	367	<2
2011Z374A	<4	<1	5	58	<2	<4	<1	304	<2
2011Z376A	<4	<1	8	70	<2	<4	<1	308	<2
2011Z378A	<4	<1	10	54	<2	<4	<1	284	<2
2011Z379A	<4	<1	5	107	<2	<4	<1	285	<2
2011Z380A	30	<1	31	142	<2	<4	<1	66	<2
2011Z383B	<4	<1	25	134	<2	<4	<1	116	<2
2011Z385A	<4	<1	1	41	<2	<4	<1	2	<2
2011Z397A	<4	<1	196	40	<2	<4	<1	43	<2
2011Z399A	33	<1	46	162	<2	<4	<1	19	<2
2011Z402A	32	<1	6	<30	<2	<4	<1	34	<2
2011Z403A	20	<1	16	129	<2	<4	<1	24	<2
2011Z412A	18	<1	19	414	<2	<4	<1	17	<2
2011Z412A	37	<1	51	81	<2	<4	<1	57	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011Z296B	<1	459	<8	<1	45	313	<9	94
2011Z311A	<1	117	<8	<1	6	76	<9	80
2011Z320A	<1	438	<8	<1	26	97	<9	117
2011Z326A	<1	227	<8	<1	8	34	<9	26
2011Z326B	<1	295	<8	<1	50	30	<9	319
2011Z327A	<1	99	<8	<1	3	109	<9	19
2011Z328A	<1	397	<8	<1	24	86	<9	119
2011Z330A	<1	214	<8	<1	21.7	86.6	<9	131.3
2011Z331A	<1	375	<8	<1	20	100	<9	61
2011Z336A	<1	145	<8	<1	5	102	<9	26
2011Z345B	<1	223	15.6	<1	19	488	<9	109
2011Z349A	<1	289	<8	<1	27	82	<9	51
2011Z350A	<1	257	<8	<1	24	74	<9	68
2011Z355A	<1	249	<8	<1	35	249	<9	190
2011Z368B	<1	385	<8	<1	25	88	<9	44
2011Z371A	<1	204	<8	<1	12	81	<9	37
2011Z371A	<1	200	<8	<1	12	59	<9	38
2011Z372A	<1	380	<8	<1	21	92	<9	76
2011Z373A	<1	313	<8	<1	18	77	<9	60
2011Z374A	<1	242	<8	<1	12	63	<9	44
2011Z376A	<1	242	<8	<1	11	53	<9	43
2011Z378A	<1	250	<8	<1	12	46	<9	49
2011Z379A	<1	256	<8	<1	14	82	<9	41
2011Z380A	<1	102	<8	<1	9	199	<9	103
2011Z383B	<1	200	<8	<1	11	91	<9	108
2011Z385A	<1	72	<8	<1	<8	47	<9	<9
2011Z397A	<1	215	<8	<1	41	116	<9	153
2011Z399A	<1	68	<8	<1	12	47	<9	162
2011Z402A	<1	147	<8	<1	8	19	<9	13
2011Z403A	<1	<25	<8	<1	5	57	<9	184
2011Z412A	<1	<25	<8	<1	5	35	<9	124
2011Z412A	<1	69	<8	<1	9	44	<9	168

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Root_name	Comments
2011Z417B	65.462086	-152.610657	518043	7259819	5N	Quartzite	---
2011Z418A	65.462414	-152.612249	517969	7259855	5N	Metamafic	---
2011Z420A	65.462153	-152.619201	517647	7259824	5N	Metagabbro	---
2011Z421A	65.461099	-152.621050	517562	7259706	5N	Metamafic	---
2011Z423A	65.460564	-152.629819	517156	7259644	5N	Metamafic	---
2011Z426B	65.456474	-152.637535	516801	7259186	5N	Quartzite	Inhomogenous
2011Z433A	65.200643	-152.784358	510093	7230641	5N	Chloritoid(?)-mica schist	Inhomogenous
2011Z433C	65.200643	-152.784358	510093	7230641	5N	Chloritoid(?)-mica schist	Inhomogenous
2011Z435A	65.201826	-152.765225	510988	7230776	5N	Muscovite quartzite	Porous
2011Z437A	65.376905	-152.928828	503309	7250271	5N	Metagabbro	---
2011Z438A	65.376072	-152.931949	503164	7250178	5N	Mica quartz schist	Porous
2011Z440A	65.374496	-152.938039	502881	7250002	5N	Metagabbro	Inhomogenous, porous
2011Z443A	65.370425	-152.945510	502534	7249548	5N	Metagabbro	---
2011Z444B	65.369510	-152.946286	502498	7249446	5N	Metagabbro	Inhomogenous
2011Z445A	65.368372	-152.949750	502337	7249319	5N	Garnet(?) Metagabbro(?)	---
2011Z454A	65.342515	-152.655280	516048	7246480	5N	Fine-grained gabbro	Porous
2011Z469A	65.483993	-152.582471	519333	7262269	5N	Metagabbro	---
2011Z469A	65.483993	-152.582471	519333	7262269	5N	Metagabbro	---
2011Z471A	65.486810	-152.575903	519635	7262585	5N	Fine-grained Metagabbro	---
2011Z472A	65.488246	-152.572834	519776	7262746	5N	Greenstone	---
2011Z472A	65.488246	-152.572834	519776	7262746	5N	Greenstone	---
2011Z483A	65.355460	-152.988910	500516	7247879	5N	Quartz muscovite schist	Inhomogenous, porous
2011Z489A	65.360177	-152.969240	501431	7248405	5N	Garnet-amphibole schist(?)	Inhomogenous
2011Z491A	65.360921	-152.965241	501617	7248488	5N	Garnet amphibolite(?)	Porous
2011Z492B	65.360866	-152.960899	501819	7248482	5N	Garnet amphibolite(?)	---
2011Z500A	65.296247	-152.800646	509297	7241294	5N	Metamafic	Porous
2011Z510A	65.283250	-152.771703	510652	7239850	5N	Garnet amphibolite(?)	Porous
2011Z511A	65.281883	-152.769143	510772	7239698	5N	Mica quartz schist	---
2011Z511B	65.281883	-152.769143	510772	7239698	5N	Metagabbro(?)	Porous
2011Z519E	65.218391	-154.574853	426345	7233521	5N	Garnet orthogneiss(?)	Inhomogenous

Sample_ID	SiO_2_pct	Al2O3_pct	BaO_pct	CaO_pct	FeO_pct	K2O_pct	MgO_pct	MnO_pct	Na2O_pct
2011Z417B	96	0.9	<0.03	0.436	1.45	0.0606	0.633	<0.03	0.36
2011Z418A	48.4	15.4	0.0882	9.49	13.7	0.0914	6.44	0.487	4.36
2011Z420A	49.6	7.2	<0.03	12.6	11.9	0.199	16.1	0.206	0.584
2011Z421A	48.6	15.2	0.034	12.3	12.1	0.0799	5.81	0.285	3.46
2011Z423A	49.1	15	0.0685	12.1	12.2	0.096	5.83	0.243	3.3
2011Z426B	96.1	1.4	0.599	0.0847	0.929	0.398	0.228	<0.03	0.0725
2011Z433A	65.3	17	0.13	0.676	9.02	4.43	1.48	0.09	0.241
2011Z433C	62.5	21	0.165	0.208	6.48	5.62	1.81	0.0675	0.738
2011Z435A	91.9	4	0.0395	0.136	2.18	0.734	0.377	0.0698	0.283
2011Z437A	54.9	13.9	<0.03	8.33	11.6	0.226	5.08	0.164	3.94
2011Z438A	87	6.5	0.046	0.184	3.17	0.601	0.82	<0.03	0.824
2011Z440A	53.6	13.5	0.0813	4.89	16.6	0.0584	4.39	0.335	4.55
2011Z443A	51.9	15.1	<0.03	9.22	10.7	0.0245	6.04	0.176	5.63
2011Z444B	54	13	<0.03	10.3	11.7	0.0555	5.64	0.259	3.25
2011Z445A	58.1	16	<0.03	4.61	7.67	0.0402	7.31	0.117	5.51
2011Z454A	51.3	17.2	0.343	7.14	10.2	1.86	4.64	0.154	4.05
2011Z469A	51.5	14.3	0.0485	10.7	11.5	0.23	7.09	0.195	2.93
2011Z469A	50.8	14.4	0.0473	10.9	11.6	0.242	7.26	0.194	2.89
2011Z471A	49.6	14.9	0.0377	11.3	11.2	0.131	7.78	0.212	3.12
2011Z472A	50	14.6	<0.03	11.6	12.9	0.0352	6.08	0.23	2.44
2011Z472A	50	14.6	<0.03	11.6	12.9	0.0352	6.08	0.23	2.44
2011Z483A	65.9	17.5	0.09	2.36	6.67	3.1	1.78	0.099	1.28
2011Z489A	40.3	13.6	<0.03	14.1	18	0.0834	9.47	0.322	1.32
2011Z491A	58.4	13.4	<0.03	3.99	14.5	0.0263	5.62	0.181	2.26
2011Z492B	52	14.7	0.0315	8.22	12.9	0.223	5.69	0.213	4.48
2011Z500A	58.2	14.5	0.0467	0.385	11.6	0.27	3.58	0.064	5.78
2011Z510A	49.5	15.6	0.0738	0.744	17	0.291	7.27	0.172	3.33
2011Z511A	73.7	7.9	0.149	8.12	3.91	1.67	2.74	0.106	0.712
2011Z511B	54.9	11.9	<0.03	3.95	13.4	0.051	9.54	0.195	3.43
2011Z519E	66.7	17.2	0.132	1.05	4.98	4.9	1.37	0.0803	2.21

Sample_ID	P2O5_pct	TiO2_pct	CO2_pct	Total_pct	As_ppm	Bi_ppm	Br_ppm	Ce_ppm	Cl_ppm
2011Z417B	<0.03	0.0495	<0.05	99.9617	<4	<2	<5	<60	<50
2011Z418A	0.118	1.36	<0.05	99.9346	<4	<2	<5	<60	88
2011Z420A	0.13	1.05	<0.05	99.5879	<4	<2	<5	<60	200
2011Z421A	0.175	1.89	<0.05	99.9339	4	<2	<5	<60	87
2011Z423A	0.216	1.71	<0.05	99.8635	<4	<2	<5	<60	86
2011Z426B	<0.03	0.0702	<0.05	99.9075	<4	<2	<5	<60	182
2011Z433A	0.711	0.698	<0.05	99.776	<4	<2	<5	<60	673
2011Z433C	0.158	1.08	<0.05	99.8265	<4	<2	<5	<60	155
2011Z435A	0.0403	0.169	<0.05	99.9086	<4	<2	<5	<60	445
2011Z437A	0.265	1.34	<0.05	99.7647	13	<2	<5	<60	191
2011Z438A	0.155	0.555	<0.05	99.8609	<4	<2	<5	<60	288
2011Z440A	0.348	1.48	<0.05	99.8327	<4	<2	<5	<60	161
2011Z443A	0.119	0.88	<0.05	99.8	14	<2	<5	<60	100
2011Z444B	0.307	1.2	<0.05	99.7274	71	<2	<5	<60	543
2011Z445A	0.0374	0.523	<0.05	99.9352	<4	<2	<5	<60	282
2011Z454A	0.372	2.58	<0.05	99.839	7	<2	<5	<60	117
2011Z469A	0.214	1.2	<0.05	99.9075	<4	<2	<5	<60	117
2011Z469A	0.204	1.24	<0.05	99.7773	<4	<2	<5	<60	187
2011Z471A	0.173	1.37	<0.05	99.8237	<4	<2	<5	<60	140
2011Z472A	0.198	1.74	<0.05	99.8423	<4	<2	<5	<60	112
2011Z472A	0.198	1.74	<0.05	99.8423	<4	<2	<5	<60	112
2011Z483A	0.175	0.786	<0.05	99.74	11	<2	<5	<60	485
2011Z489A	1.9	0.596	<0.05	99.7454	<4	<2	<5	<60	240
2011Z491A	0.261	1.17	<0.05	99.8249	<4	<2	<5	<60	191
2011Z492B	0.231	1.21	<0.05	99.8985	4	<2	<5	<60	146
2011Z500A	0.491	4.81	<0.05	99.7267	11	<2	<5	<60	321
2011Z510A	0.857	4.76	<0.05	99.5978	235	<2	<5	<60	467
2011Z511A	0.329	0.438	<0.05	99.784	59	<2	<5	<60	716
2011Z511B	0.444	1.82	<0.05	99.6491	<4	<2	<5	<60	230
2011Z519E	0.148	0.649	<0.05	99.4193	<4	<2	<5	<60	559

Sample_ID	Co_ppm	Cr_ppm	Cu_ppm	F_ppm	La_ppm	Mo_ppm	Nb_ppm	Nb_ppm_2	Ni_ppm
2011Z417B	<10	<30	24	<110	<50	<1	<1	2	27
2011Z418A	120	142	21	<110	<50	<1	<1	5	60
2011Z420A	116	2100	301	<110	<50	<1	<1	5	586
2011Z421A	102	176	214	<110	<50	<1	<1	7	33
2011Z423A	79	136	255	<110	<50	<1	<1	8	94
2011Z426B	<10	<30	30	<110	<50	<1	<1	2	21
2011Z433A	<10	83	114	<110	<50	<1	<1	13	<7
2011Z433C	13	98	24	<110	<50	<1	<1	17	54
2011Z435A	<10	41	16	<110	<50	<1	<1	4	27
2011Z437A	67	156	98	<110	<50	<1	<1	10	42
2011Z438A	<10	118	<7	<110	<50	<1	<1	8	32
2011Z440A	91	89	141	<110	<50	<1	<1	11	24
2011Z443A	47	540	123	<110	<50	<1	<1	1	40
2011Z444B	33	365	208	<110	<50	<1	<1	1	109
2011Z445A	66	152	32	<110	<50	<1	<1	5	61
2011Z454A	<10	254	65	<110	<50	<1	<1	12	63
2011Z469A	118	371	120	<110	<50	<1	<1	7	181
2011Z469A	45	414	113	<110	<50	<1	<1	7	188
2011Z471A	60	458	260	<110	<50	<1	<1	6	151
2011Z472A	91	202	127	<110	<50	<1	<1	7	70
2011Z472A	91	202	127	<110	<50	<1	<1	6	70
2011Z483A	<10	102	43	<110	<50	<1	<1	12	51
2011Z489A	49	312	69	<110	<50	<1	<1	2	161
2011Z491A	16	153	53	<110	<50	<1	<1	9	36
2011Z492B	<10	97	33	<110	<50	<1	<1	8	47
2011Z500A	<10	200	65	<110	<50	<1	<1	38	46
2011Z510A	146	1390	120	<110	<50	<1	<1	69	618
2011Z511A	18	83	106	<110	<50	<1	<1	8	35
2011Z511B	64	1020	<7	<110	<50	<1	<1	19	429
2011Z519E	<10	105	43	<110	<50	<1	<1	12	22

Sample_ID	Pb_ppm	Rb_ppm	Rb_ppm_2	S_ppm	Sb_ppm	Sn_ppm	Sr_ppm	Sr_ppm_2	Th_ppm
2011Z417B	<4	<1	3	<30	<2	<4	<1	23	<2
2011Z418A	<4	<1	1	60	<2	<4	<1	194	<2
2011Z420A	<4	<1	5	54	<2	<4	<1	39	<2
2011Z421A	<4	<1	2	53	<2	<4	<1	108	<2
2011Z423A	<4	<1	2	57	<2	<4	<1	213	<2
2011Z426B	30	<1	21	558	<2	<4	<1	7	<2
2011Z433A	<4	<1	163	545	<2	<4	<1	73	<2
2011Z433C	28	<1	187	168	<2	<4	<1	56	<2
2011Z435A	35	<1	26	219	<2	<4	<1	33	<2
2011Z437A	<4	<1	11	109	<2	<4	<1	218	<2
2011Z438A	17	<1	26	120	<2	<4	<1	65	<2
2011Z440A	<4	<1	3	377	<2	<4	<1	137	<2
2011Z443A	<4	<1	<1	161	<2	<4	<1	307	<2
2011Z444B	<4	<1	2	417	<2	<4	<1	86	<2
2011Z445A	<4	<1	1	132	<2	<4	<1	188	<2
2011Z454A	<4	<1	21	169	<2	<4	<1	257	<2
2011Z469A	<4	<1	5	68	<2	<4	<1	39	<2
2011Z469A	25	<1	6	160	<2	<4	<1	39	<2
2011Z471A	<4	<1	2	114	<2	<4	<1	62	<2
2011Z472A	<4	<1	1	110	<2	<4	<1	81	<2
2011Z472A	<4	<1	1	110	<2	<4	<1	82	<2
2011Z483A	<4	<1	154	334	<2	<4	<1	52	<2
2011Z489A	<4	<1	5	227	<2	26	<1	221	<2
2011Z491A	46	<1	2	554	<2	41	<1	164	<2
2011Z492B	<4	<1	10	103	<2	<4	<1	167	<2
2011Z500A	<4	<1	6	393	<2	<4	<1	25	<2
2011Z510A	<4	<1	13	263	<2	26	<1	30	<2
2011Z511A	31	<1	59	291	<2	<4	<1	240	<2
2011Z511B	<4	<1	2	381	<2	<4	<1	34	<2
2011Z519E	39	<1	190	4145	<2	<4	<1	196	<2

Sample_ID	U_ppm	V_ppm	W_ppm	Y_ppm	Y_ppm_2	Zn_ppm	Zr_ppm	Zr_ppm_2
2011Z417B	<1	<25	<8	<1	5	12	<9	17
2011Z418A	<1	428	<8	<1	28	94	<9	83
2011Z420A	<1	297	<8	<1	15	100	<9	59
2011Z421A	<1	479	<8	<1	31	91	<9	117
2011Z423A	<1	498	<8	<1	33	108	<9	124
2011Z426B	<1	68	<8	<1	2	<8	<9	29
2011Z433A	<1	121	<8	<1	36	69	<9	128
2011Z433C	<1	180	<8	<1	33	109	<9	504
2011Z435A	<1	56	<8	<1	4	21	<9	126
2011Z437A	<1	464	<8	<1	27	158	<9	123
2011Z438A	<1	146	<8	<1	17	47	<9	215
2011Z440A	<1	500	<8	<1	41	271	<9	161
2011Z443A	<1	454	<8	<1	33	72	<9	49
2011Z444B	<1	481	<8	<1	32	93	<9	63
2011Z445A	<1	182	<8	<1	21	89	<9	76
2011Z454A	<1	566	<8	<1	37	150	<9	234
2011Z469A	<1	398	<8	<1	24	79	<9	91
2011Z469A	<1	386	<8	<1	24	91	<9	94
2011Z471A	<1	418	<8	<1	26	74	<9	95
2011Z472A	<1	423	<8	<1	30	125	<9	108
2011Z472A	<1	423	<8	<1	30	125	<9	109
2011Z483A	<1	218	<8	<1	24	93	<9	177
2011Z489A	<1	390	<8	<1	30	223	<9	25
2011Z491A	<1	423	<8	<1	24	218	<9	124
2011Z492B	<1	396	<8	<1	26	119	<9	133
2011Z500A	<1	717	<8	<1	17	101	<9	298
2011Z510A	<1	678	<8	<1	27	196	<9	336
2011Z511A	<1	118	<8	<1	22	57	<9	189
2011Z511B	<1	436	<8	<1	20	131	<9	149
2011Z519E	<1	161	<8	<1	25	54	<9	179

Table 9. Detection limits and analytical methods for major-oxide, minor-oxide, and trace-element analyses of polished rock slab samples.

Chemical formula	Oxide/Element	Units	UAF		
			Lower Detection Limit	Upper detection Limit	Analytical Method
SiO_2	Silicon dioxide	%	0.1	100	XRF
Al_2O_3	Aluminum(III) oxide	%	0.05	75	XRF
BaO	Barium oxide	%	0.03	75	XRF
CaO	Calcium oxide	%	0.02	75	XRF
FeO	Iron oxide	%	0.03	75	XRF
K_2O	Potassium oxide	%	0.02	75	XRF
MgO	Magnesium oxide	%	0.05	75	XRF
MnO	Manganese(II) oxide	%	0.03	75	XRF
Na_2O	Sodium oxide	%	0.02	75	XRF
P_2O_5	Posphorous pentoxide	%	0.03	75	XRF
TiO_2	Titanium(IV) oxide	%	0.02	75	XRF
CO_2	Carbon dioxide	%	0.05	75	XRF
Total	---	%	---	---	Calculation
As	Arsenic	ppm	4	750,000	XRF
Bi	Bismuth	ppm	2	750,000	XRF
Br	Bromine	ppm	5	750,000	XRF
Ce	Cerium	ppm	60	750,000	XRF
Cl	Chlorine	ppm	50	750,000	XRF
Co	Cobalt	ppm	10	750,000	XRF
Cr	Chromium	ppm	30	750,000	XRF
Cu	Copper	ppm	7	750,000	XRF
F	Fluorine	ppm	110	750,000	XRF
La	Lanthanum	ppm	50	750,000	XRF
Mo	Molybdenum	ppm	1	750,000	XRF
Nb	Niobium	ppm	1	750,000	XRF
Ni	Nickle	ppm	7	750,000	XRF
Pb	Lead	ppm	4	750,000	XRF
Rb	Rubidium	ppm	1	750,000	XRF
S	Sulfur	ppm	30	750,000	XRF
Sb	Antimony	ppm	2	750,000	XRF
Sn	Tin	ppm	4	750,000	XRF
Sr	Strontium	ppm	1	750,000	XRF
Th	Thorium	ppm	2	750,000	XRF
U	Unranium	ppm	1	750,000	XRF
V	Vanadium	ppm	25	750,000	XRF
W	Tungston	ppm	8	750,000	XRF
Y	Yttrium	ppm	1	750,000	XRF
Zn	Zinc	ppm	8	750,000	XRF
Zr	Zirconium	ppm	9	750,000	XRF

Table 10. Location and description of rocks collected for rare-earth- and trace-element analyses in the Moran area, Tanana and Melozitna quadrangles, Alaska.

NOTE: Coordinates are based on NAD 27

Sample_ID	Latitude	Longitude	Easting	Northing	UTM_ Zone	Lithology_Description
2011BAE100A	65.487364	-152.831978	507779	7262591	5N	Biotite-muscovite monzogranite (Syenogranite); medium grained, equigranular, and massive. Minerals include minor muscovite, 10-12% 1-3 cm clean biotite books, occasional euhedral potassium feldspar megacrysts that are up to 1.5 cm long and have clean, straight matrix contacts, and smoky, subhedral quartz phenocrysts that can be rounded. 100% of exposure.
2011BAE107C	65.484924	-152.858386	506557	7262316	5N	Aplite dike (Syenogranitic aplite dike); fine grained, pink and aphanitic. Occasional visible quartz or quartz and feldspar crystals near granite margins. 5% of exposure.
2011BAE202A	65.456879	-152.502041	523081	7259274	5N	Metagabbro (Metagabbro); rock is medium grained (1-2 mm), pale green (epidotized feldspar?) to dark, olive green, massive, homogenous, and mafic. 100% of exposure.
2011BAE247A	65.325527	-152.905396	504407	7244546	5N	Metagabbro (Metagabbro); medium grained and crumbly. Fresh rock color is a mottled gray with green, unoriented actinolite crystals and possibly some lighter colors and/or spots of iron oxide. Rock weathers brown. 100% of exposure.
2011BAE337A	65.325190	-153.102222	495238	7244509	5N	Mica-feldspar-quartz porphyroclastic schist (Metagabbro); gray, fine to coarse grained, and granular with platy schistosity. Minerals include quartz or feldspar in foliation planes and a gray mica (biotite/chlorite?). 100% of exposure.
2011BAE351C	65.462650	-152.805055	509034	7259840	5N	Basalt (Basalt); fine grained, black, massive, homogenous, and undeformed. Rock has blocky, angular parting and sooty surfaces. Visible minerals include amphibole and plagioclase. 49% of exposure. Trace.
2011BAE357A	65.463469	-152.787267	509858	7259934	5N	Biotite-muscovite granite (Alkali-feldspar granite); fine to medium grained (1-2 mm), massive, homogenous, equigranular, and pink. Minerals include 5% muscovite, 5-10% biotite, and occasional 3-5 mm potassium feldspar megacrysts. 50% of exposure.
2011BAE359B	65.462807	-152.782460	510081	7259861	5N	Dacite dike (Rhyolite dike); very fine to fine grained, light gray, massive, homogenous, and porphyritic. Minerals include euhedral feldspars and quartz phenocrysts as well spots of iron oxide. 10% of exposure.

2011BAE359C	65.462807	-152.782460	510081	7259861	5N	Dacite dike (Rhyolite dike); very fine grained, light gray, massive, homogenous, and aphanitic. Rock contains small, 1-2 mm brown spots (biotite clots after clinopyroxene?) and occasional small, euhedral quartz or light feldspar. 10% of exposure.
2011GG426A	65.392661	-153.402776	481285	7252085	5N	Microgabbro (Microgabbro); fine-grained, black, slightly foliated. Minerals include approximately equal amounts of plagioclase, amphibole, and pyroxene. Plagioclase and amphibole crystals are locally aligned. 100% of exposure.
2011GG527A	65.384860	-153.830285	461410	7251410	5N	Granite (Monzogranite); black and white rock. 20% 1-3 mm anhedral clear and smokey quartz, 10-15% subhedral 2-3 mm biotite, and 65-70% feldspars, mostly 2-5 mm anhedral to subhedral crystals with minor 5-7 mm subhedral crystals. 100% of exposure.
2011LF078A	65.441124	-152.704480	513706	7257459	5N	Greenstone (Metabasalt); greenish gray. Rock contains 2% 0.5 mm relict amphiboles and 3% white to gray mica in a fine-grained, sugary groundmass. 100% of exposure.
2011LF282A	65.336063	-153.146976	493156	7245725	5N	Biotite amphibolite (Metagabbro); dark green color. Rock contains 25% 5 mm brown biotite, 75% 1 mm prismatic amphibole. 100% of exposure.
2011LF326A	65.495858	-152.741003	511987	7263552	5N	Syenogranite (Syenogranite); coarse-grained seriate texture. Rock contains 5% 3 cm potassium feldspar megacrystals, 30% 1 cm quartz, 20% 1 cm potassium feldspar, and 15% 2 mm biotite in a 2 mm feldspar groundmass. 100% of exposure.
2011LF486C	65.425908	-152.983752	500754	7255731	5N	Monzogranite (Syenogranite); fine grained. Rock contains 10% 0.5 mm biotite, 3% 5 mm clots of biotite, and 5% 1 mm quartz in a 0.1 mm, mixed-feldspar groundmass (82% of rock). 25% of exposure.
2011LF536A	65.470654	-152.610335	518052	7260774	5N	Hornblende metagabbro (Metagabbro); 20% 4 mm relict hornblende phenocrysts, 45% clinozoisite after 1 mm plagioclase laths, and 2% 0.5 mm sphene in 35% green matrix. 100% of exposure.
2011LF573A	65.291505	-152.973351	501243	7240751	5N	Metadiorite (Metagabbro); 60% 1 mm feldspars, 35% chlorite, and 0.5 mm hornblende pseudomorphs in an interlocking, subhedral texture. 100% of exposure.
2011RN221A	65.495344	-152.599618	518531	7263529	5N	Greenstone (Metabasalt); fine-grained, green, massive and blocky. 100% of exposure.

2011RN260A	65.359713	-152.894805	504894	7248357	5N	Greenstone (Metabasalt); fine-grained (1-2 mm), massive, blocky, and foliated metamafic rock. Contains 40-60% albite ± clinozoisite (?) and 40-60% chlorite. 100% of exposure.
2011RN325A	65.370436	-152.525978	522044	7249631	5N	Greenstone (Metabasalt); massive, unfoliated, blocky (<3 m^3), and locally derived Tozitna greenstone. 100% of exposure.
2011Z004A	65.400751	-153.010419	499516	7252927	5N	Biotite granite (Metamonzogranite); coarse to very coarse grained. Contains 35% porphyritic, pinkish potassium feldspar (=3 cm in diameter), 20% gray, interstitial quartz, 10% fine-grained (1-2 mm in diameter), brownish to brownish-black biotite, and 35% white plagioclase. 100% of exposure.
2011Z083A	65.462248	-152.725044	512742	7259809	5N	Biotite granite (Syenogranite); medium to very coarse grained. Rock contains porphyritic pink feldspar phenocrysts =3 cm long (average maximum dimensions are 5 cm x 2 cm), 30% biotite crystals =2 mm in diameter, and 20% 2 mm, rounded, gray quartz phenocrysts in amedium-grained granitic matrix. 100% of exposure.
2011Z256A	65.180341	-153.888678	458375	7228654	5N	Biotite-quartz monzonite (Monzogranite); extremely coarse-grained and porphyritic. Contains 40-45% =5 x 2 cm porphyritic white feldspar (potassium?) , 15% = 1 cm gray, irregular quartz, 15-25% black, irregular masses of biotite in an orange and black matrix with cream feldspars. Many feldspar phenocrysts are aligned parallel to long axis. 100% of exposure.
2011Z265B	65.185046	-153.865046	459489	7229163	5N	Aplite dike (Alkali-feldspar-granitic aplite dike); fine grained and creamy white to light gray. Contains biotite grains that are aligned parallel to dike strike. The immediate area contains several dikes and dikelets; the widest piece is 25 cm in float and 20 cm in outcrop.
2011Z323A	65.504351	-152.646101	516374	7264520	5N	Biotite granite (Syenogranite); porphyritic, with medium-grained matrix with light-orange to buff weathering and equigranular plagioclase and potassium feldspar. Broken rock is pink and white. Contains =2 cm long, pink potassium feldspar phenocrysts , 20% 2-3 mm gray quartz phenocrysts, and 15-20% black biotite in a medium-grained (1-2 mm) matrix. 100% of exposure.
2011Z336A	65.389356	-152.513801	522594	7251744	5N	Metagabbro (Serpentinite); fine-grained with light brown to dull green weathering. Broken rock looks very fresh and is black and green with possible relict olivine. 100% of exposure.

Table 11. Rare-earth- and trace-element analyses results for rocks collected in the Moran area, Tanana and Melozitna quadrangles, Alaska

NOTE: ppm = parts per million

SAMPLE_ID	Ba_ppm	Ce_ppm	Co_ppm	Cr_ppm	Cs_ppm	Dy_ppm	Er_ppm	Eu_ppm	Ga_ppm	Gd_ppm	Hf_ppm	Ho_ppm
2011BAE100A	60.8	76.9	0.9	10	10	10.85	7	0.31	20.7	9.05	5.7	2.12
2011BAE107C	10.8	27.5	0.5	10	5.54	11.95	8.89	0.08	24.8	8.89	7.3	2.46
2011BAE202A	171	12.8	52.3	1740	0.07	3.11	1.76	0.93	11	3.1	1.5	0.58
2011BAE247A	28.7	8.5	72.3	1230	0.11	1.96	1.07	0.7	10	1.89	1	0.38
2011BAE337A	266	16.2	37	110	0.27	2.93	1.62	1.2	18.4	2.93	1.8	0.56
2011BAE351C	291	28.3	41.6	60	4.88	5.45	3.01	1.74	21.3	5.55	3.2	1.03
2011BAE357A	212	36.1	1.1	10	30.7	5.94	3.27	0.51	21.3	5.03	2.8	1.07
2011BAE359B	111.5	46.6	<0.5	10	27.7	11.55	8.47	0.05	27.2	7.5	5.4	2.34
2011BAE359C	134	35.6	<0.5	<10	26.3	11.3	8.5	<0.03	33.8	6.45	6.6	2.27
2011GG426A	62.2	21	52	160	0.93	7.09	4.47	1.8	21.5	6.41	3.5	1.44
2011GG527A	895	166	7	20	11.95	4.75	2.34	1.44	22.2	6.88	6.5	0.82
2011LF078A	53.8	23	32.9	120	0.06	11.25	6.65	1.74	18.2	10.1	5.8	2.28
2011LF282A	200	22.7	61.4	10	14.95	4.27	2.34	1.6	21.3	4.4	2.7	0.81
2011LF326A	239	124	1.6	10	8.62	5.09	2.79	0.68	19.2	6.08	5.4	0.89
2011LF486C	416	131.5	2.5	20	25	5.43	2.83	0.9	17.7	6.38	4.7	0.98
2011LF536A	130.5	14.5	46.7	1220	0.1	3.65	2	1.03	12.9	3.51	1.7	0.69
2011LF573A	570	24.6	36.8	140	1.13	4.35	2.31	1.49	19.3	4.52	2.8	0.82
2011RN221A	365	14.5	46.4	200	1.2	5.06	2.91	1.35	18.4	4.56	2.6	0.98
2011RN260A	89.8	4.6	45.6	180	0.37	4.52	3	0.94	16.7	3.53	1.5	0.96
2011RN325A	73.9	16.4	45.3	140	0.23	5.68	3.33	1.58	21.3	5.33	3	1.11
2011Z004A	724	180.5	3.7	10	4.08	4.29	2.13	1.35	19.1	6.21	6.4	0.77
2011Z083A	374	150	2.8	10	11.9	4	2.34	0.82	19.5	4.53	6.1	0.75
2011Z256A	1370	200	5.5	10	7.28	6.27	3.11	2.08	21	8.88	9.8	1.12
2011Z265B	61.9	8.9	0.7	10	6.05	2.21	0.84	0.21	17.5	1.71	1.3	0.32
2011Z323A	122	96.3	1.2	10	4.22	8.38	4.93	0.43	18.2	7.78	4.2	1.62
2011Z336A	65.3	5.3	104.5	2610	0.09	1.36	0.72	0.43	5.9	1.3	0.7	0.26

SAMPLE_ID	La_ppm	Lu_ppm	Mo_ppm	Nb_ppm	Nd_ppm	Pr_ppm	Rb_ppm	Sm_ppm	Sn_ppm	Sr_ppm	Ta_ppm	Tb_ppm
2011BAE100A	35.4	1.23	<2	63.6	34.5	9.48	561	9.54	7	25.3	9.6	1.6
2011BAE107C	10.8	2.08	83	48.2	16.7	3.69	596	7.4	1	6.7	28.5	1.63
2011BAE202A	5.5	0.21	<2	3.7	9.2	1.89	3.1	2.64	<1	105.5	0.2	0.48
2011BAE247A	3.5	0.14	<2	2.3	5.9	1.21	0.6	1.69	<1	69.9	0.2	0.3
2011BAE337A	7.2	0.21	<2	5.3	10.4	2.25	6.8	2.9	<1	320	0.3	0.45
2011BAE351C	12.3	0.38	<2	10.6	18.8	4.02	44.4	4.99	2	249	0.7	0.84
2011BAE357A	16.7	0.48	<2	38.2	17.2	4.5	524	5.11	13	71.1	5.8	0.92
2011BAE359B	18.2	1.8	<2	64.2	21.6	5.82	1000	7.31	31	61.8	20.2	1.54
2011BAE359C	19.9	2.4	<2	50.1	16.4	4.64	827	5.67	65	22.2	37.5	1.49
2011GG426A	7.5	0.61	<2	7.3	16.1	3.12	6.5	5.1	2	205	0.4	1.03
2011GG527A	81.9	0.33	<2	16.2	69.8	19.35	274	10.95	5	350	1.1	0.83
2011LF078A	6.6	0.87	<2	3.4	23.5	4.2	1.3	7.9	1	124.5	0.2	1.63
2011LF282A	9.7	0.28	<2	7.7	14.8	3.13	10	3.99	1	368	0.5	0.66
2011LF326A	58.1	0.44	<2	38	48.1	13.8	456	9.36	6	89.3	3.5	0.87
2011LF486C	65.6	0.38	<2	14.6	51	14.85	318	9.07	3	139	1.9	0.91
2011LF536A	5.9	0.25	<2	4.4	10.5	2.18	4.5	3.09	<1	116.5	0.3	0.56
2011LF573A	10.6	0.29	<2	8.4	15.9	3.45	15.3	4.12	<1	338	0.5	0.66
2011RN221A	5.7	0.37	<2	6.2	11.8	2.31	2.3	3.66	1	122	0.4	0.74
2011RN260A	1.9	0.43	<2	0.7	5.6	0.95	1.4	2.43	<1	182.5	0.1	0.63
2011RN325A	5.7	0.42	<2	7.1	13.4	2.62	10.4	4.24	1	236	0.5	0.86
2011Z004A	99.7	0.26	<2	12.5	67.4	19.9	245	9.77	2	214	0.7	0.76
2011Z083A	57.8	0.41	<2	43.6	40.4	12.1	416	6.78	7	147	3.3	0.62
2011Z256A	102.5	0.38	<2	17.5	80.9	22.6	233	12.9	3	320	1	1.11
2011Z265B	4	0.09	<2	11.2	3.8	1.07	268	1.43	4	41.2	2.4	0.36
2011Z323A	46.9	0.77	<2	41.8	37.5	10.95	398	8.65	2	36.9	4.8	1.29
2011Z336A	2.2	0.09	<2	1.8	3.8	0.8	2.6	1.15	<1	69	0.1	0.21

SAMPLE_ID	Th_ppm	Tl_ppm	Tm_ppm	U_ppm	V_ppm	W_ppm	Y_ppm	Yb_ppm	Zr_ppm
2011BAE100A	57.7	1.9	1.13	31.3	<5	3	71	8.42	110
2011BAE107C	22.5	2.1	1.55	13.85	<5	2	141	12.95	54
2011BAE202A	0.78	<0.5	0.22	0.24	302	1	15.7	1.4	50
2011BAE247A	0.48	<0.5	0.14	0.16	206	1	10.3	0.94	32
2011BAE337A	1.09	<0.5	0.21	0.34	348	1	15.4	1.39	67
2011BAE351C	1.69	<0.5	0.4	0.59	405	1	27.9	2.53	118
2011BAE357A	18.55	2	0.49	5.4	5	9	35.3	3.36	65
2011BAE359B	27.4	4.8	1.46	27.8	<5	9	96	11.65	67
2011BAE359C	19.25	3.9	1.64	3.93	<5	9	86.7	14.9	57
2011GG426A	0.49	<0.5	0.58	0.23	457	6	39.3	4.11	124
2011GG527A	35.8	1	0.33	3.54	54	1	23.7	2.19	235
2011LF078A	0.13	<0.5	0.9	0.05	212	1	60.6	5.99	225
2011LF282A	1.42	<0.5	0.3	0.49	1020	1	21.6	1.97	95
2011LF326A	65.9	1.5	0.4	15.05	10	18	28.1	2.97	157
2011LF486C	32.9	0.9	0.4	5.35	12	5	28.6	2.56	152
2011LF536A	0.82	<0.5	0.25	0.28	345	1	18.4	1.71	58
2011LF573A	1.4	<0.5	0.31	0.46	344	1	21.6	2.04	101
2011RN221A	0.38	<0.5	0.39	0.12	379	<1	26.5	2.54	91
2011RN260A	0.06	<0.5	0.42	0.05	324	<1	26.7	2.86	48
2011RN325A	0.48	<0.5	0.44	0.16	427	1	29.8	2.89	110
2011Z004A	22.3	0.9	0.27	1.98	23	1	21.6	1.81	244
2011Z083A	70.3	1.3	0.36	10.3	22	11	22.2	2.67	201
2011Z256A	21.2	0.6	0.39	4.02	41	3	30.3	2.6	412
2011Z265B	1.9	0.8	0.11	2.51	<5	4	10.5	0.67	31
2011Z323A	50.3	1.1	0.73	11.35	6	2	51.6	5.18	115
2011Z336A	0.29	<0.5	0.1	0.1	129	1	6.8	0.63	23

Table 12. Detection limits and geochemical methods for rare-earth- and trace-element analyses of rock samples.

Chemex codes include:

ME-MS81 = Lithium borate fusion and X-ray fluorescence spectroscopy

Analytical methods and digestions include:

ICP-MS = Inductively coupled plasma - mass spectroscopy

LBF **=** Lithium borate fusion

Note: * = Base metal oxides and sulfides that may not be completely decomposed by the lithium borate fusion.

		ALS Chemex				
Header	Element	Lower Detection Limit	Upper Detection Limit	Chemex Code	Analytical Method	Digestion
Ba_ppm	Barium	0.5	10,000	ME-MS81	ICP-MS	LBF
Ce_ppm	Cerium	0.5	10,000	ME-MS81	ICP-MS	LBF
Co_ppm	Cobalt*	0.5	10,000	ME-MS81	ICP-MS	LBF
Cr_ppm	Chromium	10	10,000	ME-MS81	ICP-MS	LBF
Cs_ppm	Cesium	0.01	10,000	ME-MS81	ICP-MS	LBF
Dy_ppm	Dysprosium	0.05	10,000	ME-MS81	ICP-MS	LBF
Er_ppm	Erbium	0.03	1,000	ME-MS81	ICP-MS	LBF
Eu_ppm	Europium	0.03	1,000	ME-MS81	ICP-MS	LBF
Ga_ppm	Gallium	0.1	1,000	ME-MS81	ICP-MS	LBF
Gd_ppm	Gadolinium	0.05	1,000	ME-MS81	ICP-MS	LBF
Hf_ppm	Hafnium	0.2	10,000	ME-MS81	ICP-MS	LBF
Ho_ppm	Holmium	0.01	1,000	ME-MS81	ICP-MS	LBF
La_ppm	Lanthanum	0.5	10,000	ME-MS81	ICP-MS	LBF
Lu_ppm	Lutetium	0.01	1,000	ME-MS81	ICP-MS	LBF
Mo_ppm	Molybdenum*	2	10,000	ME-MS81	ICP-MS	LBF
Nb_ppm	Niobium	0.2	10,000	ME-MS81	ICP-MS	LBF
Nd_ppm	Neodymium	0.1	10,000	ME-MS81	ICP-MS	LBF
Pr_ppm	Praseodymium	0.03	1,000	ME-MS81	ICP-MS	LBF
Rb_ppm	Rubidium	0.2	10,000	ME-MS81	ICP-MS	LBF
Sm_ppm	Samarium	0.03	1,000	ME-MS81	ICP-MS	LBF
Sn_ppm	Tin	1	10,000	ME-MS81	ICP-MS	LBF
Sr_ppm	Strontium	0.1	10,000	ME-MS81	ICP-MS	LBF
Ta_ppm	Tantalum	0.1	10,000	ME-MS81	ICP-MS	LBF
Tb_ppm	Terbium	0.01	1,000	ME-MS81	ICP-MS	LBF
Th_ppm	Thorium	0.05	1,000	ME-MS81	ICP-MS	LBF
Tl_ppm	Thallium	0.5	1,000	ME-MS81	ICP-MS	LBF
Tm_ppm	Thulium	0.01	1,000	ME-MS81	ICP-MS	LBF
U_ppm	Uranium	0.05	1,000	ME-MS81	ICP-MS	LBF
V_ppm	Vanadium	5	10,000	ME-MS81	ICP-MS	LBF
W_ppm	Tungsten	1	10,000	ME-MS81	ICP-MS	LBF
Y_ppm	Yttrium	0.5	10,000	ME-MS81	ICP-MS	LBF
Yb_ppm	Ytterbium	0.03	1,000	ME-MS81	ICP-MS	LBF
Zr_ppm	Zirconium	2	10,000	ME-MS81	ICP-MS	LBF