



Geology and Compilation by Trygve Høy  
Cartography by Wayne Jackaman

**LEGEND**

**CENOZOIC**

**QUATERNARY**

Qa unconsolidated sediments

**NEOGENE**

**Pliocene/Miocene**

MPK Kallis Formation: plateau basalt; locally olivine pyric

**PALEOGENE**

**Eocene**

mEc Coryell intrusions: alkalic intrusive rocks; syenite, monzonite (bx - breccia)  
mEt Tenderloin complex: alkalic intrusive rocks; syenite, monzonite, diorite; pyroxenite  
Ei Alkalic intrusions; syenite, diorite, rhomb porphyry, quartz monzonite (in part, equivalent to mEc)

**Pentiction Group**

Ep Undifferentiated alkalic volcanic rocks, sandstone, grit  
Em Marron Formation: trachyte, alkali basalt, tuff; minor shale or slate  
Ekr Kettle River Formation: sandstone, conglomerate; feldspathic grit, minor shale, tuff

**Paleocene**

Pigd Massive, leucocratic granodiorite, "white" granite; locally porphyritic  
Pig Porphyritic granite, magacrytic K-spar granite

**MESOZOIC**

**Late Cretaceous**

Kwh Whatshan Lake Batholith: quartz monzonite, granite; leucocratic, K-feldspar magacrytic

**Early - Middle Jurassic**

Jgd Nelson intrusions: granodiorite, granite, minor diorite; locally porphyritic  
Jogn Orthogneiss: granodiorite, diorite; may include Pgn  
mJa Averill Complex: granodiorite, diorite, monzodiorite, monzonite, pyroxenite  
Ljr Rossland Group: andesite, phonolite, minor shale, siltstone

**Late Triassic**

Jrc Josh Creek diorite: diorite, granodiorite; actinolite-feldspar schist  
Jtr Brooklyn Formation: massive greenstone, mafic volcanics; chert and limestone; related intrusions

**PALEOZOIC**

**Late Devonian to Early Permian**

Pkh Knob Hill Complex: mafic volcanic rocks, chert, argillite, greenstone  
Pgb Greenwood gabbro: gabbro, diabase dykes, minor pegmatite  
sp Serpentinite  
Patt Atwood Formation: siltstone, argillite, minor volcanic rocks  
Pa Anarchist schist complex: argillaceous quartzite, schists, metavolcanics; white dolomite (Pav - mafic lava)  
Pmr Mount Roberts Formation: mafic metavolcanics, siltstone, slate, marble; minor ultramafic rocks (includes Monashee gneiss of unknown age)

**AGE UNKNOWN**

Pgn Paragneiss; schist, quartzite; minor amphibolite, marble

**PRECAMBRIAN**

**PROTEROZOIC**

**Mesoproterozoic**

Progn Orthogneiss; hornblende granodiorite, syenitic, granitic  
Pr5 Hornblende schist, amphibolite  
Pr4 Amphibolite, calcareous schist, minor marble, calcisicate gneiss  
Pr3 Paragneiss, sillimanite schist, calcisicate gneiss, minor marble  
Pr2 Quartzite, marble, calcisicate gneiss, minor pegmatite, amphibolite

**Paleoproterozoic**

Pr1 Core gneiss; paragneiss and schist, marble, calcisicate gneiss and

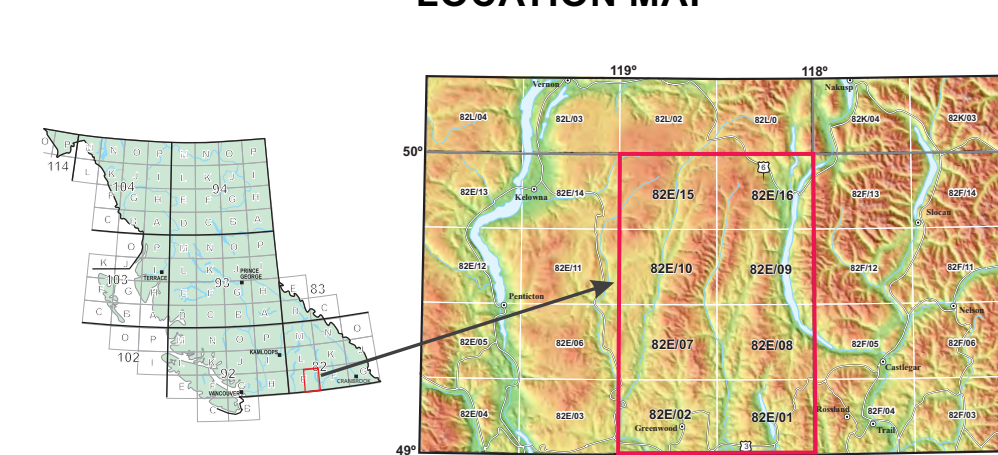
**SYMBOLS**

- CONTACT OF ALLUVIUM
- CONTACT: DEFINED, APPROXIMATE, ASSUMED
- FAULT: DEFINED, APPROXIMATE, ASSUMED
- NORMAL FAULT: DEFINED, APPROXIMATE, ASSUMED
- THRUST FAULT: DEFINED, APPROXIMATE, ASSUMED
- ANTIFORM
- ANTIFORM, OVERTURNED
- BEDDING
- FOLIATION, CLEAVAGE
- VEIN
- MINERAL OCCURRENCE - PRODUCER
- MINERAL OCCURRENCE - PAST PRODUCER
- MINERAL OCCURRENCE - DEVELOPED PROSPECT
- MINERAL OCCURRENCE - PROSPECT
- MINERAL OCCURRENCE - SHOWING
- U-Pb AGE DATES (Ma)
- Ar/Ar AGE DATES (Ma)
- K/Ar AGE DATES (Ma)
- CITY
- HIGHWAY, ROAD
- STREAM, RIVER, LAKE
- PARK BOUNDARY

**BASE MAP INFORMATION**

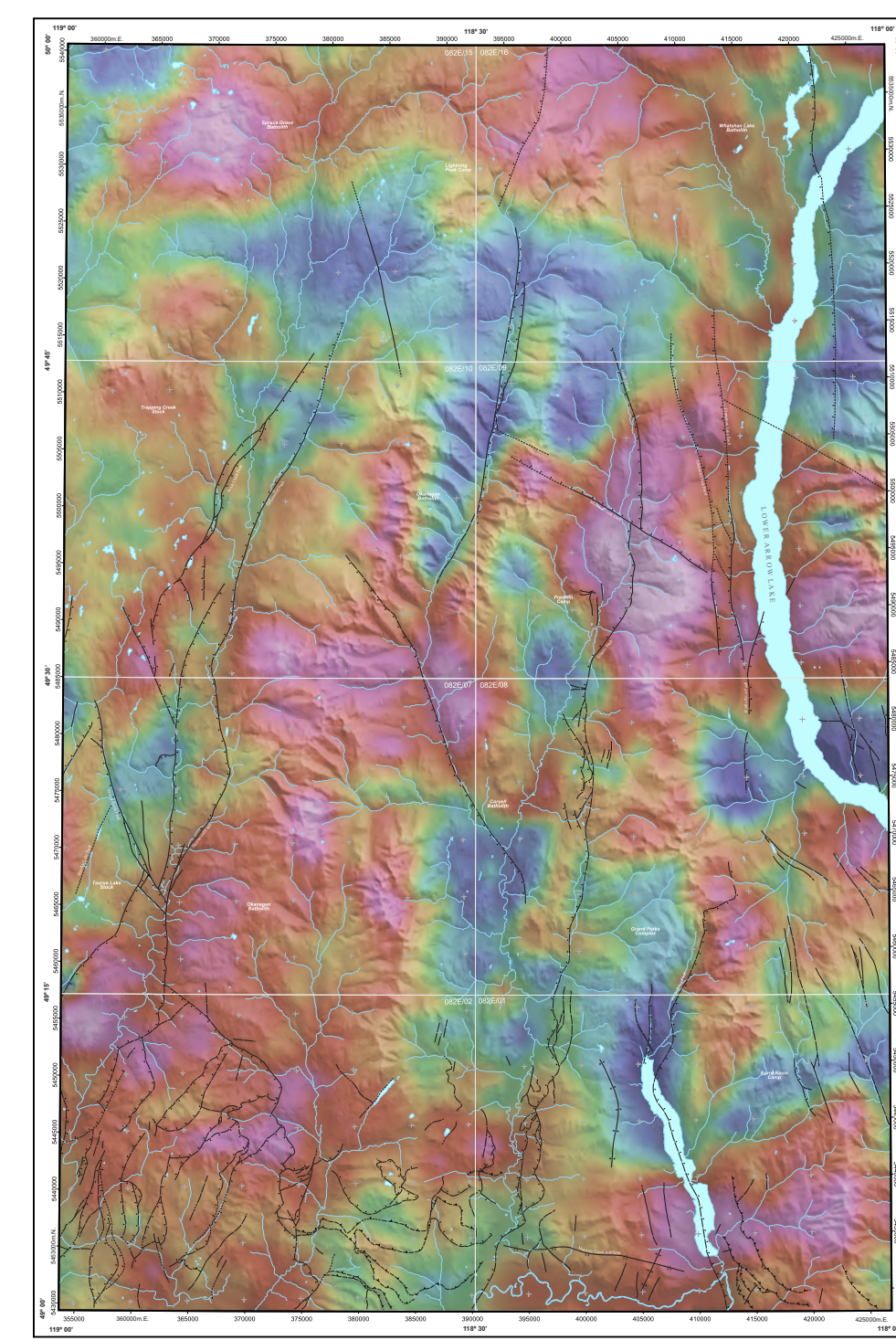
NAD 1983 UTM ZONE 11  
TRANSVERSE MERCATOR  
PROJECTION  
APPROXIMATE MEAN DECLINATION 2017  
FOR CENTRE OF MAP (EAST HALF)  
ANNUAL CHANGE 8.9/YEAR WEST  
National Topographic Data Base (NTDB)  
URL: <http://www.geogatis.ca>  
Natural Resources Canada, Centre for Topographic Information  
Canadian Digital Elevation Data (CDED)  
URL: <http://www.geobase.ca>  
Base Mapping and Geomatics Services - B.C. Government

**LOCATION MAP**



**AEROMAGNETIC DATA**

NTS 082E/01 east half



**AGE DATES**

SAMPLE ID	UTM	UTM	ROCK TYPE	UNIT	COLLECTOR (REF)	DATED BY	METHOD	MINERAL	AGE
<b>Grand Forks (082E/01)</b>									
1347	36041	54041	metagabbro		Stevens et al. (1986)	GSC	K/Ar	46.23	
1406	41285	54010	diorite		Aslan et al. (2002)	U of Alberta	U/Pb	188.00	
1406	41285	54010	diorite		Aslan et al. (2002)	U of Alberta	U/Pb	218.96	
1502	37335	54025	syenite		Baerwald et al. (1981)	U of Alberta	K/Ar	56.01	
<b>Greenwood (082E/02)</b>									
1304	36709	54083	syenite with	Marion Fm	Mathews (1984)	U of Alberta	K/Ar	50.00	
1305	36724	54045	granophyre sill		Mathews (1984)	U of Alberta	K/Ar	49.00	
1403	37028	54058	granophyre	Saquo	Massey et al. (2001)	GSC	K/Ar	288.00	
1407	36209	54063	gabbro porphyry	Leighton	Dodson et al. (2001)	UBC	U/Pb	194.48	
1348	36771	54059	metagabbro		Chouinard (1980)	UBC	Ar-Ar	207.0	± 2.1
1407	36708	54063	diagenite	Pg	Chouinard (1980)	UBC	K/Ar	233.00	
1404-01	37706	54054	granodiorite	Greenwood	Massey et al. (2001)	GSC	U/Pb	162.8	± 3.8
G-167	37705	54053	gabbro	Jagd	T. Høy (2015)	R. Frymoyer, UBC	U/Pb	162.8	± 1.2
G-168	37705	54053	gabbro	Jagd	T. Høy (2015)	J. Gabelma, UBC	Ar-Ar	162.8	± 1.2
1404-01b	37688	54053	gabbro porphyry	Greenwood	Massey et al. (2001)	GSC	U/Pb	171.6	± 2.3
<b>Almond Mountain (082E/07)</b>									
1387	36892	54023	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	53.88	
1387	36892	54023	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	53.88	
1388	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1389	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1390	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1391	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1392	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1393	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1394	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1395	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1396	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1397	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1398	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1399	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1400	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1401	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1402	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1403	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1404	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1405	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1406	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1407	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1408	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1409	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1410	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1411	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1412	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1413	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1414	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1415	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1416	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1417	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1418	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1419	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1420	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1421	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1422	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1423	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1424	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1425	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1426	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1427	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1428	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1429	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1430	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1431	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1432	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1433	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1434	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1435	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1436	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1437	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1438	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1439	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1440	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1441	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1442	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1443	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1444	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1445	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1446	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1447	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1448	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1449	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1450	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1451	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1452	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1453	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1454	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1455	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1456	36893	54153	syenite	Corbett	Massey et al. (1981)	GSC	K/Ar	50.00	
1457	36893								