# Skeena Region 2015 Highlights

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# Skeena Region 2015 Summary

The Skeena Region spans approximately 263,213 square kilometers of north western British Columbia, roughly 25% of the province. The region transects all of the physiographic belts of the Canadian Cordillera. There are 2,951 documented MINFILE occurrences distributed through all of the geologic terranes of the Skeena region. Current exploration and mining activities are predominantly hosted in the Stikine terrane of the Intermontane tectonic province. There were 713 active Notices of Work in the region; 300 mineral, 224 placer and 189 sand and gravel.

At least ninety-two projects remained active in the Skeena region in 2015. Fifty-two of which were monitored by the author. Thirty-two grassroots, early and advanced staged projects; five mine evaluation stage projects, five mine development stage projects, three producing metal mines and seven industrial

Mineral exploration expenditure in 2015 totalled approximately \$117 million, down 27% from 2014. Despite the decrease in expenditure, the region retained

a fair tempo of exploration and mining activity. The previous four years of strong activity have yielded six permitted metal mines including the Red Chris copper-gold mine, now in production, and the Brucejack gold-silver mine, now in construction. Remaining permitted mine development projects including Don Harrison, P.Geo, Senior Permitting Inspector Kitsault, KSM, Tulsequah Chief and Silvertip all require critical capital investment prior to commencing construction.

Regional exploration drilling totalled 103,000 meters. Grassroots and early stage exploration projects were responsible for 23,830 m and represent roughly 21% of the overall regional exploration expenditure. Mine development investment totalled approximately \$347.5 million and is attributed to mine construction and expansion costs. Mining related infrastructure investment totalled at least \$460 million which includes construction and expansion expenditures of marine port facilities and power projects.

### Significant events in the Skeena region during 2015 include:

•Pretium Resources Inc. received provincial and federal permits and started construction of the underground high-grade gold Brucejack mine •Imperial Metals Corporation shipped the first copper-gold concentrate from the Red Chris mine and declared commercial production •Seabridge Gold Inc. extended boundaries of known copper-gold mineralization of the Deep Kerr and Mitchell deposits of the fully permitted KSM project •JDS Silver received a Mines Act permit for the Silvertip silver-zinc-lead project •Banks Island Gold produced over 9,500 ounces of gold in the first half of 2015 at Yellow Giant

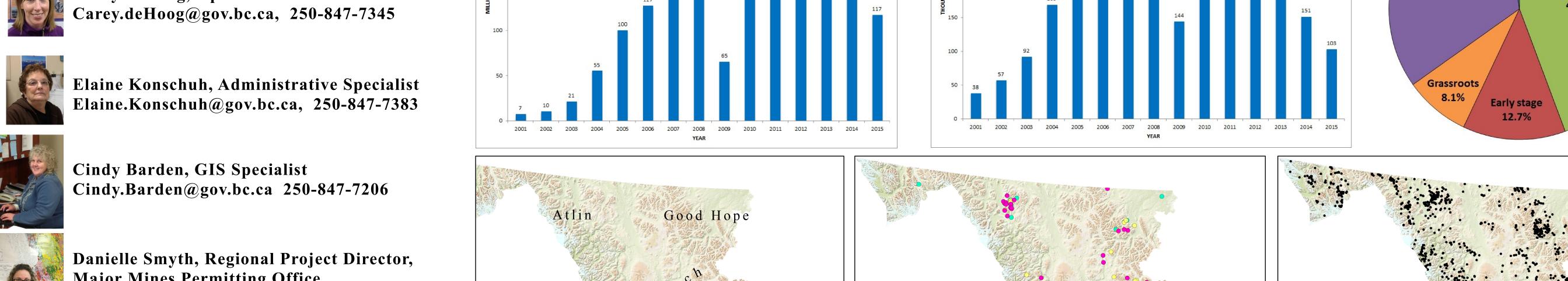
•Alloycorp Mining Inc. started pre-construction activities at Kitsault

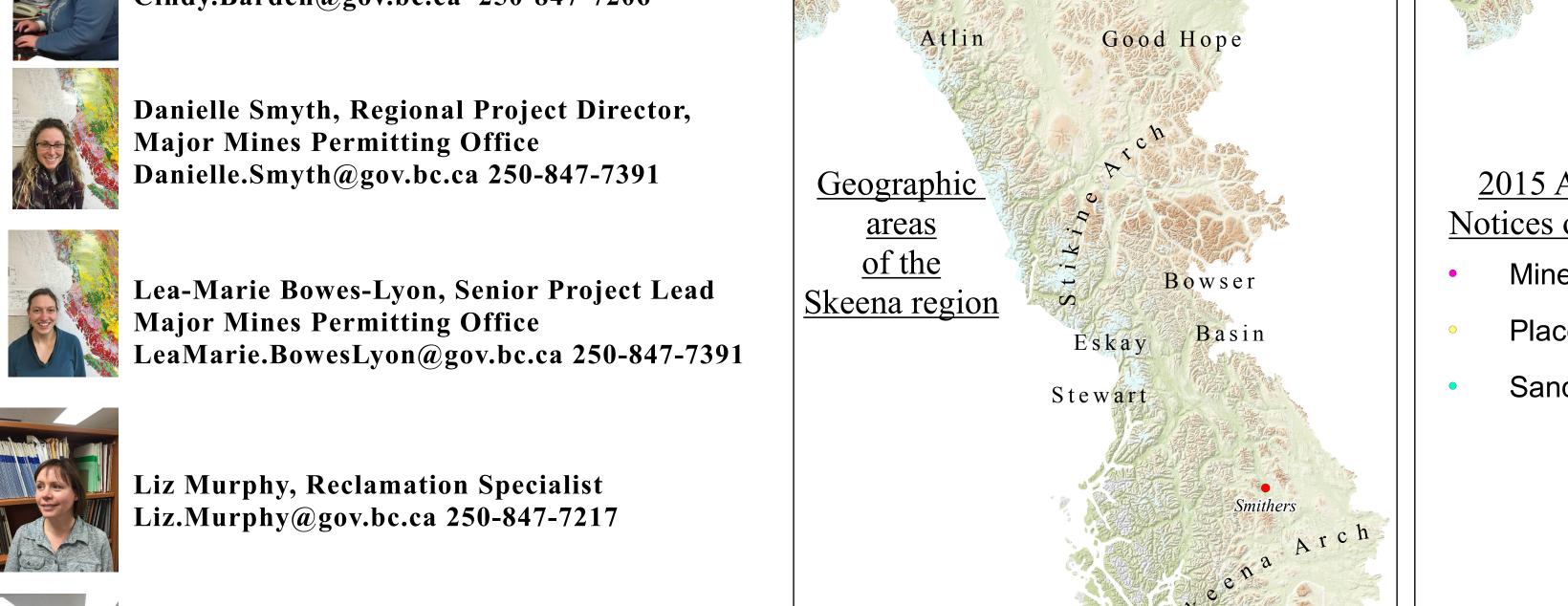
Colorado Resources Ltd. discovered new copper-gold porphyry mineralization at the KSP project Savanna.Levenson@gov.bc.ca 250-847-7452

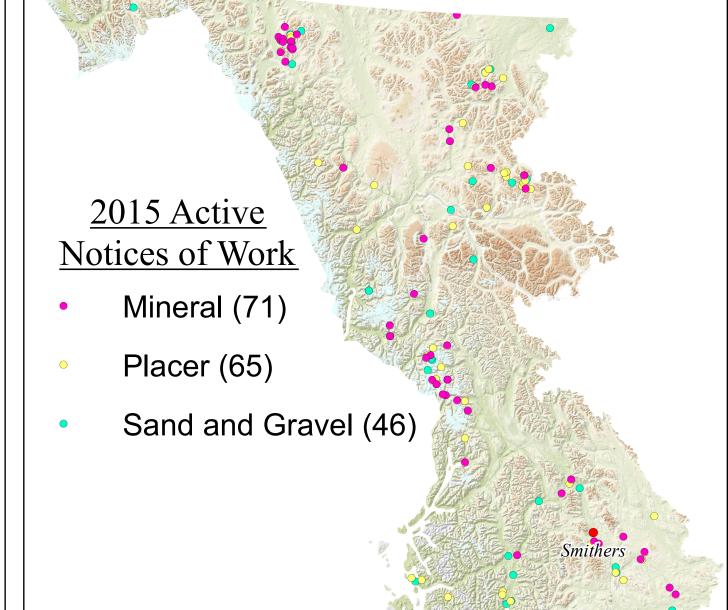
> Producing metal mines in the region included the Huckleberry copper-gold-silver-molybdenum mine which produced concentrate for the duration of 201 The Red Chris copper-gold mine started producing concentrate in February and declared commercial production in July. Lastly, the Yellow Giant goldsilver mine maintained production status until July. Seasonal placer mining for gold and jade was carried out between May and October but not emprehensively monitored.

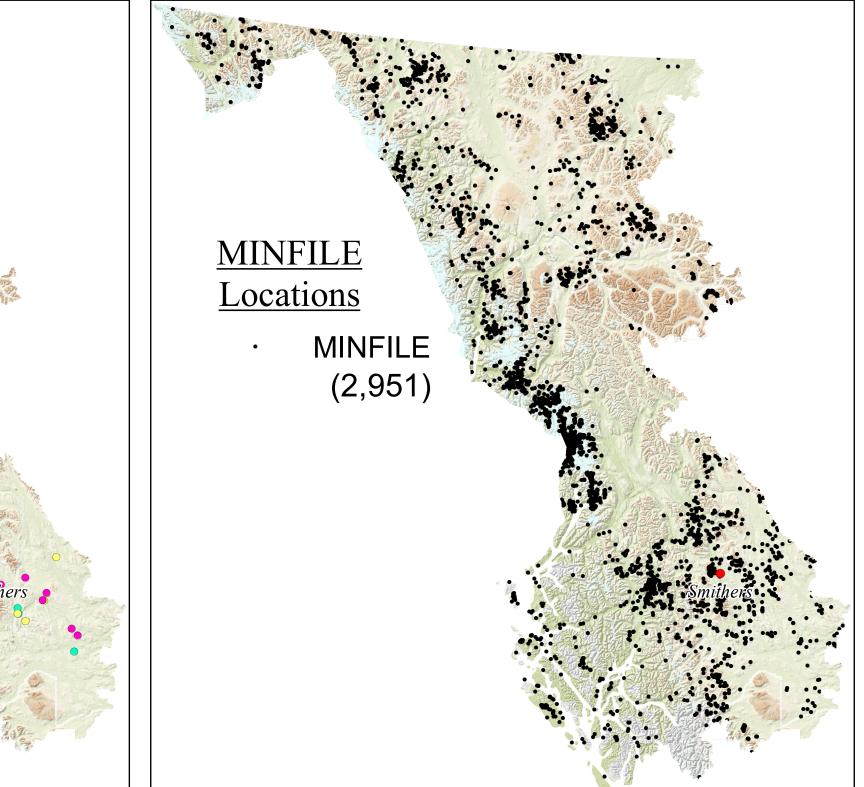
ploration projects focussed on porphyry copper-gold and vein hosted gold-silver veins predominantly focussed in the geographic and geological areas of the Stikine Arch, Eskay-Stewart and the Skeena Arch. In the northern areas, Atlin and Goodhope, limited exploration work and desktop evaluations were conducted on carbonate hosted, manto replacement and volcanogenic massive sulphide projects. Exploration for ultra-high-rank anthracite coal in the Bowser Basin slowed to minimal levels.

Exploration expenditure by project stage James Robinson, EIT, Health and Safety Inspector James.V.Robinson@gov.bc.ca 250-847-7521 Carey deHoog, Operations Coordinator









4 - Kootenay - Boundary / Fiona Katay

6 - South, West Coast / Bruce Northcote

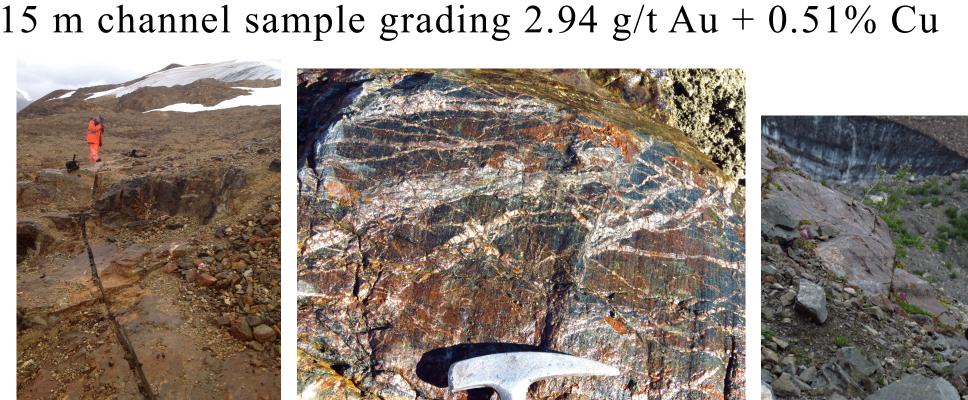
# Tulsequah Chief

Owner: Chieftain Metals Corp. MINFILE 104K 002 - Cu-Zn-Pb-Ag-Au Kuroko-type Massive

- Project deemed "substantially started" meaning EA certificate will remain valid for the life of the

-Multiple untested near-mine exploration targets -P+P Reserves: 4.4 Mt @ 2.85 g/t Au + 104 g/t Ag + 1.46% Cu + 1.29% Pb + 6.94% Zn

Owner: Colorado Resources Ltd. MINFILE 103B 138 -Intrusion related Au-Cu, precious metal veins, Cu-Mo Porphyry -Discovery of Never Give Up (NGU) porphyry -Validation of Tami porphyry on Sericite Ridge:



Owner: Pretium Resources Inc.

Owner: LCT Holdings Inc.

MINFILE 103P 016

-Subvolcanic Au-Cu

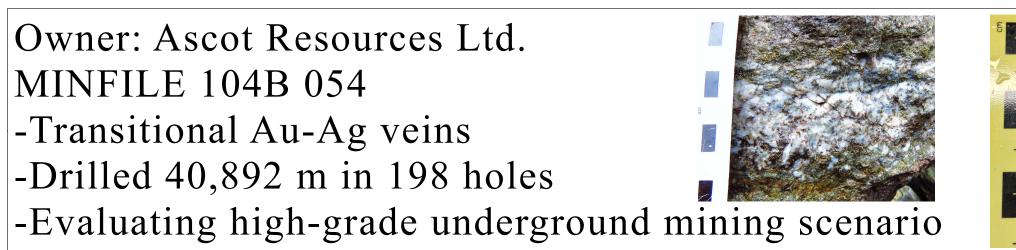
# Brucejack

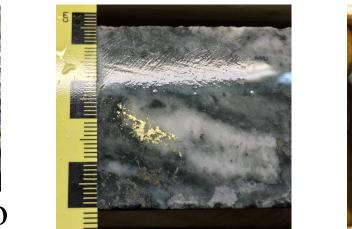
KSP

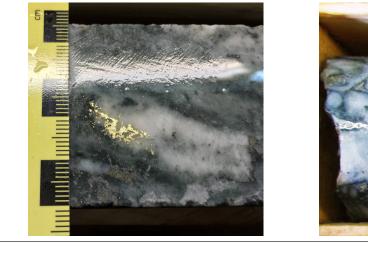
MINFILE 104B 193 -Deformed, transitional epithermal stockwork Au-Ag veins -Mine under construction, aiming for 2017 production

-Extensive underground infill drilling program continuing into 2016 -Grassroots surface exploration drilling intercepted high-grade gold over 1 km away from VOK mine area -Multiple exploration targets identified -P+P Reserves: 16.5 Mt @ 14.1 g/t Au + 57.7 g/t Ag

Owner: Ascot Resources Ltd. MINFILE 104B 054 -Transitional Au-Ag veins -Drilled 40,892 m in 198 holes







# Big Bulk

# Dolly Varden

Premier

Owner: Dolly Varden Silver Corporation / Hecla Mining Company MINFILE 103P 188

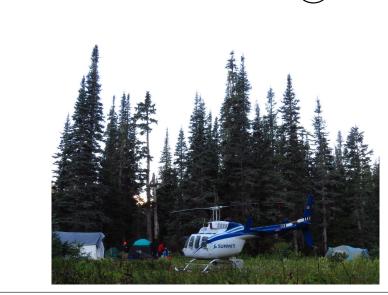
-Ag precious metal epithermal veins, VMS -Extensive grassroots exploration program

-new ownership and renewed exploration interest

-comprehensive historic data compilation

-extensive channel sampling program

-Drilled 2,037 m in 10 holes testing VMS horizon, Kitsol vein & lithology contact -Ind Resource: 3.07 Mt @ 321.6 g/t Ag



Owner: Banks Island Gold Ltd.

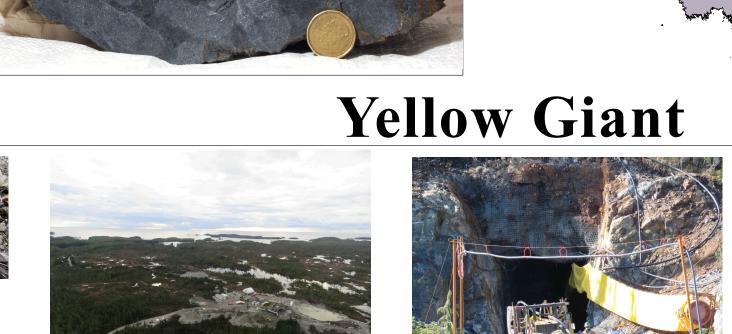
-Fault controlled Au-Ag quartz veins

Temporary shut down and in receivership

-Produced 9,555 oz Au and 27,846 oz Ag in first half of 2015

MINFILE 103G 024, 26





132°0'0"W



Red Chris

MINFILE 104H 005

Arctos

Kitwanga

Owner: JDS Silver

-High K calc-alkalic Cu-Au porphyry

Spectrum

MINFILE 104G 036

-Maiden Resource: tba

Owner: BC Railway Company

surrounding the Klappan area

-Ultra high-rank Anthracite coal

option in ten years for the price of sale

MINFILE 104H 021

Commercial production declared in July 2015

Owner: Skeena Resources Limited

-Drilled 17,350 m in 61 holes

-Au in quartz stockworks; Cu-Au porphyry

-DDH S15-15 2 m @ 74.5 g/t Au + 8.5 g/t Ag

Owner: Teck Resources Limited

-12,000 m re-logging program

Schaft Creek

MINFILE 104G 015

-DDH S15-14: 209 m @ 1.22 g/t Au + 4.8 g/t Ag + 0.17% Cu

-Calc-alkalic Cu-Mo-Au-Ag porphyry

-Acquired the adjoining GJ project and increased claims to 42 km2

-2,634 m of drilling in 5 holes at the La Casse zone

-Regional geological mapping of surrounding area

MINFILE: 104O 003

-Manto replacement Ag-Pb-Zn

-Acquired Mines Act permit and is financed for construction -Secured Sa Dene Hes processing facility and plan to re-construct on site -Access road re-furbished, bridge replacement underway



Outboard Chugach

### Insular

Alexander Wrangellia

Geologic terrane

Overlap

Younger volcanic rocks

Post accretionary

Coast Plutonic complex

## Intermontane

Cache Creek

Stikine

Yukon-Tanana-Nisling

Slide Mountain

### **Ancestral North America**

North America, basin strata

cm cm North America craton

roads

### Other geological features Stuhini - Hazelton group contact

Bowser Coal Fields

MINFILE Lines Anomaly Railline Showing

Precious metals

**Property Status** 

**Property Type** 

Coal

Mine, Operating

Mine, Development

Industrial Minerals, Specialty

Polymetallic base + precious

Porphyry (Cu-Mo, Cu-Au, Mo)

Metals and Aggregate

Mine, Proposed

Exploration Project

Prospect

Developed prospect

Past Rivers producer

### **KSM**

Owner: Seabridge Gold Inc. MINFILE 10B103

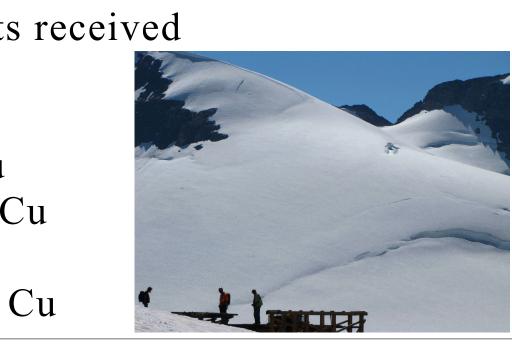
-Calc-alkalic Au-Cu-Mo-Ag porphyry -EA approvals and phase one construction permits received

-11,018 m drilling at Deep Kerr and Mitchell -Higher than Reserve grades intercepted -DDH K-15-49: 483 m @ 0.43g/t Au + 0.56% Cu

-Purchased from Fortune Minerals Limited and JV partner POSCO Canada Limited with buy-back

-Time allows for the BC Government and the Tahltan First Nation to resolve complex issues

-DDH K-15-49A: 340 m @ 0.53 g/t Au + 0.60% Cu -Planning for underground exploration portal -P+P Reserves: 2,164 Mt @ 0.55 g/t Au + 0.21% Cu



### Kitsault

Owner: Alloycorp Mining Ltd. MINFILE 103P 120 -Calc-alkalic Mo-Ag -EA approvals recieved -Nass River bridge upgraded -New mill site preparation complete -Updated engineering study include silver recovery -P+P Reserve: 228.2 Mt @ 0.083% Mo + 5.0 g/t Ag

### Dome Mountain

Owner: Gavin Mines Inc. / Dome Mountain Resources of Canada Inc. MINFILE 093L 022

-Orogenic Au-Ag veins -Mines Act Permit Ammendment required to construct onsite

mill scheduled to be awarded -Winter drill program under way to to extend mine life

### **Iuckleberry**

Owner: Imperial Metals (50%), Japanese Group (50%) MINFILE 093E 037

-Calc-alkalic Cu-Mo-Au-Ag porphyry

-2015 metal production (Q3): 15,244 tonnes Cu, 81 kg Au, 4,924 kg Ag from 5,025,638 tonnes of ore -4th year of Main Zone Optimization Pit operations suspended in early January 2016 due to low metal prices

Three drill hole exploration program totalled 1,194 m completed at Whiting Creek





# Faults and

simplified geologic terranes of British Columbia 0 75 150 300



