

Geological Report
Barb Claims

General

the
Front Trapper Lake Campsite

- ① Geological mapping June 29 - July 11, 1983
- ② geological control on gold geochem anomalies - west of baseline immediately between 22 & 24 North

- ② 1982 geochem baseline between
- cross lines at 50 metre intervals.

Rock geochem
selected samples

- control compass & hip chain, well flagged & blazed in tree areas.
- tie lines at end
- accurate baselines - thick bush
- steep topography.
- magnetite

General Geology

Memor. 362. J.G. Searles - Geological Survey
 Oldest rocks are
 Upper Triassic - Stuhini Group - King Salmon Form; calcareous siltstones
 and shale.

These are separated from the overlying
 Sinuid Formation limestone by the
 King Salmon Thrust fault.

Intruding both of the above is Middle Jurassic and/or Cretaceous
 hornblende - biotite quartz diorite. Sloko Group, Cretaceous to Tertiary
 quartz porphyry dykes cut older rock
 Pleistocene till covers valley and creek bottom. Glacial erratics
 are scattered in the higher areas.

Field Geology. Stuhini Group.

King Salmon Formation.

- thick bed, dark brown;
- calcareous siltstone shale, weakly pyritic
- minor, narrow tuff beds and ^{thin beds.} dark carbonaceous limestone
- near intrusives - ^{fractured} bleached and with pyrite oxidized to limonite,
- and pale green very fine grained calc-silicate skarn

Upper Triassic - Sinwa Formation

- Light grey weathering cliff forming thick bedded ^{clear.} marble
- minor dark blue grey beds of carbonaceous limestone
- c. 2cm beds of white chert
- narrow ^(20.5m) beds of interformational breccia composed of angular white & black chert clasts
 - ① ^{top on weather} dolomitized ^{rock} with dolomite veinlets - sometimes pervasive
 - ② sometimes narrow patchy
- near the intrusives, weak epidote, diopside, calcite skarn containing minor pyrite mineralization.
- ^{partly} the absence of silicates. - poor skarn development
- massive magnetite zones in outcrop up to 10m x 8 meters in area are developed, often ^{fine} asicular tremolite developed
- pyrite appears best developed near ~~qtz~~ DR - quartz diorite porphyry contact - up to 1cm. beds of fine-med. crystalline py.

Jurassic and/or Cretaceous, Intrusive

This unit has been subdivided into two units the one crystalline megacrystic and the other porphyry. ^{the age and structural} Relationships between the two ~~not~~ found believed to be coeval.

It: Sloko - writer Godfrey Walton.

Red Cap King Salmon Mountain - writer examined in 1972 similar to Opper Crst (85 ma) in Yukon

^{small} GSC map Diorite stocks - high level - Tulsequah map sheet

- the quartz diorite core - stock with
- quartz diorite porphyry - shell intrusive and dykes - country rock.
- narrow cleft to 100 metres

^{weakly jointed} The Diorite = light grey ^{medium grained} medium grained with 15-20% ^{fine grained} hornblende and biotite

- rock weakly mafic minerals chlorite
- occasional weak (2%) pyrite, no magnetite southwest corner grid

The.

Quartz Diorite Porphyry - alteration & mineralization relation: 10-15% predominant ^{and} feldspar ^{and} quartz hornblende biotite

Med grained phenocrysts of hornblende felds ^{aphanitic - microcrystalline - fine grained} with minor quartz phenocrysts in an ^{fine} grained matrix.

The The. 3a & 3b. - more acid equivalent with increasing ^{equivalent} quartz phenocrysts, and biotite usually the most common mafic mineral. The strongest alteration & mineralization related to these,

brecciated contacts

Alteration - hornblende → chlorite, montmorillonite calcite pyrite

- brown ^{weathered} dolomite appearance.

Copper Notes -

Breccias - copper mineralization

- 120 x 140 m circular - diameter
- crackle breccia - no rotation fragments
- localized where 3. more acid phase. - feldspar porphyry
- dyl.
- country rock - pervasive & veinlet silicification with qz xc growing into cavities followed by carbonate filling (ankerite)
- ^{coarse} crystals of chalcopyrite with qz. - Malachite along fractures
- ^{last stage} white mineral coating cavities is possible zeolites

specularite,
oxidized equivalent
hematite

white qz-FL PPRY

- feldspar soft bleached - contain montmorillonite.

Galena - ^q highly alt - strong propylitic
brecciated - qtz feldspar porphyry
< 1 metre wide
- fine crystalline galena along fractures

Notes 936

Alteration

Paper - 936 - White bread.

- study alteration ^{from diorites} Virginia City quadrangle - Comstock Gold District

Hydrothermal Alteration - volcanic rocks.

1 Propylitic - ~~from diorites~~

don't look altered.

Cl - MM - Ca QZ - Hb → Cl Ca MM + QZ
Magnetite remains

MM. CL - CA QZ - PY - Presence PY.

① low - hornblende

- more MM.

② high - PE → Calcite & pyrite

yellow gray
no magnetite

2 Argillic -

3. Alunite-Quartz

Alunite Quartz - gold