Location/Identification

MINFILE Number: 093K 025
National Mineral Inventory Number: 093K6 Ag3
Name(s): **SILVER ISLAND**
NUGGET, CABIN, NERO, LAKE SHORE 1
Status: Prospect
Mining Division: Omineca
Electoral District: Nechako Lakes
Regions: British Columbia
Resource District: Nadina Natural Resource District
BCGS Map: 093K043
NTS Map: 093K06W
UTM Zone: 10 (NAD 83)
Latitude: 54 27 17 N
Northing: 6036785
Longitude: 125 24 28 W
Easting: 343911
Elevation: 711 metres
Location Accuracy: Within 500M
Comments: Mine symbol on 1:50,000 topographic sheet.

Mineral Occurrence

Commodities: Silver, Copper, Zinc, Lead, Barite, Gold

Minerals
Significant: Tetrahedrite, Argentite, Silver, Galena, Sphalerite, Chalcopyrite, Pyrite, Barite
Associated: Quartz, Ankerite, Barite
Alteration: Malachite, Azurite
Alteration Type: Oxidation
Mineralization Age: Unknown

Deposit
Character: Vein
Classification: Hydrothermal, Epigenetic, Industrial Min.
Strike/Dip: 120/45W
Comments: Quartz veins occur in shear zones striking 120 degrees and dipping 45 degrees west.

Host Rock

Dominant Host Rock: Plutonic

Stratigraphic Age	Group	Formation	Igneous/Metamorphic/Other
Tertiary	Endako	Undefined Formation	------
Paleozoic-Mesozoic	Cache Creek	Undefined Formation	------
Upper Jurassic	------	------	Francois Lake Intrusive Suite

Isotopic Age	Dating Method	Material Dated
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Lithology: Hornblende Diorite, Rhyolite
Comments: The Cache Creek Group is Mississippian to Triassic in age. The Endako Group ranges from Oligocene to Miocene in age.

Geological Setting

Tectonic Belt: Intermontane
Physiographic Area: Nechako Plateau
Terrane: Cache Creek, Stikine

Inventory

Ore Zone: OUTCROP
Year: 2013
Category: Assay/analysis
Report On: N
NI 43-101: N

Sample Type: Rock

Commodity	Grade
Silver	16232 grams per tonne

Comments: Two rock samples (SI1301 and SI1302) of mineralized vein material, collected from outcrops located approximately 5 and 25 metres along strike from the No. 1 adit, yielded 4896 and 16232 grams per tonne silver, respectively

Reference: Assessment Report 34547

Ore Zone: SAMPLE
Year: 1986
Category: Assay/analysis
Report On: N
NI 43-101: N

Sample Type: Rock

Commodity	Grade
Silver	3660 grams per tonne

Comments: Samples, around this time, from an old tunnel

Reference: Property File – 015238

Ore Zone: SAMPLE
Year: 1980
Category: Assay/analysis
Report On: N
NI 43-101: N

Sample Type: Rock

Commodity	Grade
Silver	255 grams per tonne
Gold	1.6 grams per tonne
Copper	0.21 per cent
Lead	8.62 per cent
Zinc	12.97 per cent

Comments: A sample described as ‘ore’ from the Silver Island occurrence

Reference: Property File - 520203

Ore Zone: VEIN
Year: 1929
Category: Assay/analysis
Report On: N
NI 43-101: N

Sample Type: Rock

Commodity	Grade
Silver	27900 grams per tonne
Copper	9.4 per cent

Comments: average of seven samples, taken around this time, from the Silver Island veins

Reference: Property File 520207

Ore Zone: BLUFF VEIN
Year: 1927
Category: Assay/analysis
Report On: N

NI 43-101: N

Sample Type: Chip

Commodity	Grade
Silver	86.5 grams per tonne
Gold	0.29 grams per tonne

Comments: the average of seven samples taken 3 metres apart over a distance of 21 metres from a rock bluff separating the No. 1 and 2 veins

Reference: Property File - 520204

Ore Zone: NO. 1 **Year:** 1927

Category: Assay/analysis **Report On:** N

NI 43-101: N

Sample Type: Chip

Commodity	Grade
Silver	24300 grams per tonne
Copper	13.1 per cent

Comments: from the face of the No. 1 vein tunnel

Reference: Property File - 520204

Ore Zone: NO. 2 **Year:** 1927

Category: Assay/analysis **Report On:** N

NI 43-101: N

Sample Type: Chip

Commodity	Grade
Silver	17500 grams per tonne
Copper	8.4 per cent

Comments: a sample from the deeper winze on the No. 2 vein

Reference: Property File - 520204

Ore Zone: TUNNEL **Year:** 1925

Category: Assay/analysis **Report On:** N

NI 43-101: N

Sample Type: Grab

Commodity	Grade
Silver	23780 grams per tonne
Copper	8.0000 per cent
Zinc	3.0000 per cent

Comments: Selected sample across 3.8 centimetres from No. 2 tunnel.

Reference: Minister of Mines Annual Report 1925, page 143.

Capsule Geology

The Silver Island occurrence is located near the southeast shore of Silver Island, near the south shore of Babine Lake and approximately 3.5 kilometres east-northeast of the mouth of Pinkut Creek on Babine Lake.

The geology of the region consists of: 1) a Mississippian to Triassic Cache Creek Group oceanic volcanic and sedimentary assemblage 2) the Upper Triassic dominantly mafic volcanic Takla Group 3) the Lower to Middle Jurassic Hazelton Group mafic to felsic volcanic and sedimentary rocks 4) the Upper Cretaceous to Lower Tertiary Ootsa Lake Group sedimentary and volcanic rocks and 5) the 0ligocene and Miocene Endako Group. The

region has been intruded by the Lower Jurassic quartz monzonite to granodiorite Topley Intrusive Suite, Upper Jurassic plutons of the Francois Lake Suite and plugs and stocks related to Upper Cretaceous and Tertiary volcanism.

The Silver Island prospect is underlain by volcanic rocks and argillite of the Cache Creek Group, hornblende diorite of the Francois Lake Intrusive Suite and rhyolite considered to belong to the Oligocene to Miocene Endako Group.

Quartz-ankerite-barite veins occur in shear zones striking 120 degrees and dipping at about 45 degrees southwest. These veins occur mainly within diorite although at least one occurs in rhyolite. Mineralization consists of tetrahedrite and minor amounts of argentite, native silver, galena, sphalerite, chalcopyrite, pyrite, malachite, and azurite. Numerous stringers of calcite cut the diorite.

By the 1920s, at least five parallel, east- striking veins (Nos. 1 through 5), varying from 0.05 to 1.5 metres in width, had been identified on Silver Island, with the No. 1 vein, located near the lake shoreline, being the most developed by historical workings . The No. 2, 3, 4 and 5 veins are located approximately 18, 38, 120 and 150 metres north of the No. 1 vein, respectively. Three other north- striking and west-dipping veins cut the east-striking veins and occur over approximately 390 metres. At least one of these veins has been reported to have been traced to the south shore of the Babine Lake. The north-striking veins are reported to vary in size up to 6.0 metres in width.

Work History

The Silver Island claims were originally staked in the early 1910s by Hugh MacDonald and Fred Hagen and the Silver Island Mining Co. was later formed to explore the claims.

In 1925, a selected sample over a width of 3.8 centimetres from No.2 tunnel assayed 23 780.6 grams per tonne silver, 8.0 per cent copper and 3.0 per cent zinc (Annual Report 1925, page 143).

By 1927, the no. 1 vein had been drifted on for 22.5 metres. A shaft was sunk for 39 metres approximately 15 metres from the adit portal and a tunnel/drift was driven for 12 metres at the bottom of the shaft with a crosscut developed for 5.4 metres to the south. A tunnel was also driven for approximately 49.5 metres on the No. 2 vein, approximately 19.5 metres north of the No. 1 vein. Approximately 30 and 34.5 metres from the No. 2 vein tunnel portal two winzes were developed to a depth of approximately 14.1 and 2.4 metres, respectively. Sampling at this time yielded up to 24 300 grams per tonne silver and 13.1 per cent copper the face of the No. 1 vein tunnel, whereas the average of seven samples taken 3 metres apart over a distance of 21 metres from a rock bluff separating the No. 1 and 2 veins yielded 0.29 gram per tonne gold and 86.5 grams per tonne silver and a sample from the deeper winze on the No. 2 vein yielded 17 500 grams per tonne silver and 8.4 per cent copper (Property File - 520204).

By 1929, two other adits, approximately 18 and 10.5 metres long, and a 7.5-metre shaft were reported to have been driven along with numerous pits and opencuts on the Cabin claim, located near the south shore of Babine Lake. Other reports indicate the adits may have been driven on the adjacent Nero and Lake Shore 1 claims. Seven samples taken around this time from the Silver Island veins are reported to have yielded an average of 27 900 grams per tonne silver and 9.4 per cent copper (Property File - 520207).

In 1979 and 1980, Welcome North Mines examined the Silver Island occurrence and completed a minor program of geological mapping and geochemical sampling. A sample described as ‘ore’ from the Silver Island occurrence is reported to have assayed 1.6 grams per tonne gold, 255 grams per tonne silver, 0.21 per cent copper, 8.62 per cent lead, 12.97 per cent zinc and 0.14 per cent cadmium (Property File - 520203).

In 1984, D. Poliquin completed a ground magnetic and electromagnetic survey on the area as the Silver claims. The following year, a ground electromagnetic survey and six diamond drill holes, totalling 1037.4 metres, were completed on the claims. The drillholes were completed on previously identified geophysical anomalies and returned no significant results.

In 1986, Troymin Resources Ltd. acquired the Silver Island mineral claims. Samples, around this time, from an old tunnel are reported to have yielded up to 3660 grams per tonne silver (Property File – 015238).

In 2013, Randy Marko prospected and sampled the area as the Silver Island Mines claim. Two rock samples (SI1301 and SI1302) of mineralized vein material, collected from outcrops located approximately 5 and 25 metres along strike from the No. 1 adit, yielded 4896 and 16 232 grams per tonne silver, respectively (Assessment Report 34547). No other assay values were reported. Also at this time, the vein was traced in the No. 1 adit roof for approximately 30 metres and varied from 2 to 8 centimetres in width.

Bibliography

EMPR AR *1925-142,359; 1928-419
EMPR ASS RPT 13021, 13975, *34547
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EMPR FIELDWORK 1992, pp. 475-482
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GSC MAP 631A; 907A; 971A; 1424A
GSC MEM 252, p. 174
GSC OF 2593, 3184
GSC P 37-13, p. 19; 38-10, p. 17; 90-1F, pp. 115-120; 91-1A, pp. 7-13
GCNL #97, Dec.17, 1986; #21, 1987
N MINER Jun. 2, Dec.22, 1986

Date Coded:	1985/07/24	**Coded By:**	BC Geological Survey (BCGS)	**Field Check:**	N
Date Revised:	2021/05/11	**Revised By:**	Karl A. Flower (KAF)	**Field Check:**	N