

NAME OF PROPERTY SILVER CREEK (SCHUFER) (IRON VAULT)

OBJECT LOCATED - showings on Iron Vault claim  
(Lot 5754).

UNCERTAINTY IN METRES 100. Lat. 54°50'15" Long. 127°21'50"

Mining Division Omineca District Range 5 Coast

County Township or Parish

Lot Concession or Range

Sec Tp. R.

## OWNER OR OPERATOR AND ADDRESS

Dorita Silver Mines Ltd.

## DESCRIPTION OF DEPOSIT

On the Iron Vault claim, Jurassic dark green and purple andesites with some interbedded tuffs are separated from a series of greenish tuffs by a band of fossiliferous limestone. The green tuffs pass upwards to the south into a thick formation of purple tuffs. The tuffs are mostly fine grained and massive, but some beds are well laminated. These bedded rocks strike easterly and dip from vertical to 50 degrees north. The top of the series is believed to be to the south, so that where the dip is to the north or northeast the strata are overturned. These rocks are intruded by a stock of granodiorite outcropping at the south end of the Iron Mask claim and extending westerly across the Copper Queen and Lily Fraction claims. The stock ranges from 400 to 1,000 feet in width and approaches 3,000 feet in length.

The limestone band is cut off on the west by the granodiorite stock. It is followed by natural exposures and a series of cross trenches for 1,450 feet in an east to southeast direction to where it ends along a fissured zone near the top of a  
see Card 2 ....

Associated minerals or products of value - Lead, gold.

## HISTORY OF EXPLORATION AND DEVELOPMENT

The property is located at the 5,700 foot elevation on the south side of the divide at the head of Silvern and Toboggan Creeks, on Hudson Bay Mountain, 9 miles northwest of Smithers.

Exploration work on the Silver Creek group from about 1907 was done in open cuts, stripping, and a 25 foot adit. In the fall of 1910 the property was bonded to the Hudson Bay Mountain Mining Company, Limited, of which there is no record as a Canadian incorporation. Work by the company included open cutting, an 18 foot shaft, and 2 adits 80 and 135 feet in length. In 1912 a long crosscut was begun some distance below the mineralized outcrops and was driven 400 feet. The bond was given up in 1914.

Five claims, the Iron Mask, Copper Queen, Texada, Iron Vault and Van Anda (Lots 5750 R5-5752 R5, 5754 R5, and 5756 R5, respectively) were Crown-granted in 1914 to Peter Schufer and Leeman Wood.

The owners resumed further work on the property in 1916 and continued into 1919. A short adit was driven on the calcite vein and small shipments of sorted ore were made in 1917 and 1918.

Late in 1925 The British Canadian Silver Corporation, Limited, optioned the property and development work began in 1926. Considerable trenching was done, and some 180 feet of drifting and crosscutting in No. 3 adit. Work ceased late in the fall of 1926 and the option was subsequently given up. The Lily Fr. (Lot 7245), adjoining the Iron Vault on the west, was Crown-granted in 1930 to Peter Schufer.

R.W. Wilson & Sons, of Great Falls, Montana, optioned the Silver Creek and adjacent groups in about 1930. No activity was reported on the Silver Creek group until 1935 when further work was done in No. 3 adit.

Sil-Van Consolidated Mining and Milling Company, Ltd., incorporated in September 1950, acquired a number of properties on Hudson Bay Mountain, including the Silver Creek group. The company name was changed in 1957 to Sil-Van Mines Limited, with Silver Standard Mines Limited acquiring a 36½ per cent interest in the company. In August 1963 Sil-Van incorporated a new company Hudson Bay Mountain Silver Mines Ltd., to which it transferred the Silver Creek and adjacent properties. During 1965-66 the company

Mineral Development Sector, Department of Energy, Mines and Resources, Ottawa.  
see Card 2  
510189 \*

## HISTORY OF PRODUCTION

In 1917, 5 tons of sorted ore were shipped from this property. From this ore 2 ounces of gold, 1,160 ounces of silver, and 4,006 pounds of lead were recovered.

A shipment of 30 tons of ore to the Silver Standard mill at New Hazelton was reported in 1918 (Report of Minister of Mines, British Columbia 1918, p. 118).

## REFERENCES

Kindle, E.D.; Mineral Resources, Hazelton and Smithers Areas, Cassiar and Coast Districts, British Columbia: Memoir 223 (Revised Edition), pp. 120-123, Geol. Surv. of Canada, 1954.

Jones, R.H.B.; Geology and Ore Deposits of Hudson Bay Mountain, Coast District, B.C.; Summary Report 1925, Pt. A., pp. 138-141, Geol. Surv. of Canada.

Reports of Minister of Mines, British Columbia: 1908, p. 65; 1909, p. 84; 1912, p. 115; 1913, p. 108; 1914, p. 513; 1916, p. 123; 1917, p. 114; 1918, p. 118; 1919, p. 103; 1925, p. 137; 1926, p. 129; 1927, p. 137; 1930, p. 444; 1931, p. 73; 1935, p. C 39; 1950, p. 100; 1963, p. 26; 1964, p. 51; 1965, p. 74; 1966, p. 86.

Mineral Policy Sector; Corporation Files: "Dorita Silver Mines Ltd."; "Hudson Bay Mountain Silver Mines Ltd."

Kerr, F.A.; Mineral Resources along the Canadian National Railway, between Prince Rupert and Prince George, British Columbia; Paper 36-20, p. 99, Geol. Surv. of Canada, 1936.

Mines Branch, Ottawa; Investigations in Ore Dressing and Metallurgy, 1935, No. 771 (Invest. #657), pp. 162-169.

Lode Gold Deposits of British Columbia, compiled by J.D. Galloway; Bulletin No. 1, 1932, p. 53, British Columbia Dept. of Mines.

## MAP REFERENCES

Geology of Hudson Bay Mountain, Coast District, B.C., Sc. 1":1.5 miles, Fig. 9, Summary Report 1925, Pt. A., Geol. Surv. of Canada.

Map 69-1, Smithers, Hazelton, and Terrace Areas, (Geological compilation), Sc. 1":4 miles, British Columbia Dept. of Mines.

Preliminary Map 44-23, Smithers, (Geol.), Sc. 1":2 miles, Paper 44-23, Geol. Surv. of Canada.

Sketch Map of the Silver Lake Section, Sc. 1":2,000 ft. (approx.), Report of Minister of Mines, British Columbia, 1928, p. 165.

Sketch Map, Iron Vault claim and workings, Sc. 1":400 ft., Report of Minister of Mines, British Columbia, 1926, p. 130.

Map 5319 G, Smithers, (Aeromag.), Sc. 1":1 mile.

#Map 93 L/14 W, Smithers, (Topo.), Sc. 1:50,000.

## REMARKS

Comp./Rev. By	DMacR						
Date	12-75						

## NAME OF PROPERTY

SILVER CREEK (SCHUFER) (IRON VAULT)

## DESCRIPTION OF DEPOSIT (continued)

steep bluff at elevation 5,475 feet. The limestone formation is lenticular in outline, attaining a maximum width of 65 feet midway along its outcrop. Lens-shaped orebodies consisting of a pyrrhotite-sphalerite-pyrite replacement of limestone occur at intervals along the limestone horizon. The mineralization appears to be localized to zones where small faults pass into the limestone. Recrystallization and flowage have absorbed differential movement within the limestone, so that fissures do not penetrate this formation beyond a few feet. Consequently, the orebodies are commonly along the contact of the limestone. The orebodies are short and lenticular in surface outline, but may be pipe-shaped.

About 275 feet from the east end of the main limestone band there is an outcrop of solid sulphides along the south side of the limestone at its contact with green tuffs. The sulphide body is lenticular, 50 feet long, and with a maximum width of 15 feet. It consists of solid sulphides, there being about 40 per cent black sphalerite, 40 per cent pyrrhotite, and 10 per cent pyrite.

Other sulphide lenses are exposed in open-cuts along the north side of the limestone band at distances of 500, 650, 800, and 900 feet, respectively, west of the shaft. These occur along the north border of the limestone along small faults, both as fissure fillings and as replacements of the wall-rocks.

A calcite vein occurs along a fault in andesitic rocks between 70 and 150 feet south of the east end of the main limestone band. The vein consists of brecciated and sheared andesite cemented by calcite with various amounts of galena, sphalerite, tetrahedrite, arsenopyrite, and pyrite. It ranges from 6 to 18 inches in width and has been traced for 350 feet in a horizontal direction and 225 feet in a vertical direction by two adits and by open-cuts. The fault in which the vein occurs has a marked vertical displacement. The fault has a curving strike, changing from south 80 degrees west to south 30 degrees west, and dips from 55 to 65 degrees southeast. At elevation 5,650 feet the fault is bordered on the south by a body of limestone 50 feet in width. The limestone has been heavily replaced along the fault by massive sulphides to form a body of lenticular outline measuring 30 feet long and 15 feet wide. The sulphides are present in the following order of abundance: pyrite, sphalerite, galena, arsenopyrite, pyrrhotite, and chalcopyrite.

## HISTORY OF EXPLORATION AND DEVELOPMENT (continued)

extended No. 3 adit 518 feet. Diamond drilling in 1965 was done in 16 holes totalling 3,360 feet; 8 of the holes were apparently drilled on the Silver Creek group and the remaining on the adjacent Silver Lake group. Diamond drilling totalling 712 feet in 7 holes was done in 1966 in No. 3 adit and the low level crosscut.

The company name (Sil-Van) was changed in April 1969 to Dorita Silver Mines Ltd. At that time the company held a 90% interest in the Silver Creek property.