TERRITORY

NAME OF PROPERTY

SILVER LAKE (SILVER PEAK) (WHITE HEATHER) (TOWER HILL)

OBJECT LOCATED - Silver Lake No. 2 (Lot 7240).

UNCERTAINTY IN METRES 100.

Lat. 54°49'47" Long. 127°21'30"

Mining Division Omineca

District

Coast, Range 5

County

Township or Parish

Lot

PRUDUCT

Concession or Range

Sec

Tp.

R.

OWNER OR OPERATOR AND ADDRESS

DESCRIPTION OF DEPOSIT

At elevation 6,400 feet an adit has been driven 110 feet south 14 degrees east in massive, poorly bedded, red tuff. The adit follows a tight fault fissure for 50 feet, but discloses no mineralization. The fault strikes south and dips vertically. In a large cut on the surface 40 feet above and 25 feet east of the face of the adit a small, irregular, sheared zone is exposed. It ranges from 1 inch to 4 inches in width and is traversed by stringers and veinlets of bornite. Its length does not exceed 100 feet. A few tons of ore were shipped from this cut in 1916, of which a representative sample assayed: gold. 0.45 ounce a ton; silver, 120.1 ounces a ton; copper, 47.8 per cent.

Commencing a few hundred feet farther south, above elevation 6,500 feet, is a gently rising flat some 3,000 feet in length from east to west and 1,500 feet wide from north to south. Over most of the flat the bedrock is concealed by a shallow covering of disintegrated rock. Several veins have been discovered by sinking test pits on the site of disintegrated vein material. In Key Fr., 'A' Fr., Silver Lake No. 3, and Second Glacier

Associated minerals or products of value - Lead, gold, copper, zinc.

HISTORY OF EXPLORATION AND DEVELOPMENT

The property is located at elevations of 6,000 to 6,700 feet on the south side of the divide at the head of Silvern and Toboggan Creeks, on Hudson Bay Mountain, 9 miles northwest of Smithers.

A group of 9 claims, including the Reliance, Tower Hill, and Silver Top, were staked in this vicinity by Messrs. Loring and the Hankin Brothers, of Hazelton, in about 1905. The claims may have included the Silver Lake showings. Assessment work during the period 1905-07 was done in open cuts.

The White Heather group of 4 claims was staked on the showings by Frank Martin in about 1913. A small amount of sorted ore was shipped in 1913 and further mining operations were reported in 1916.

Showings in this vicinity were reported on in 1923 and 1924 as the Silver Peak group and adjoining claims. Although the owners are not named, and the location is not known with any degree of certainty, the Silver Peak group has been tentatively identified with the Silver Lake property. In 1923 the Silver Peak group was under option to D.J. Williams. Old prospect shafts and cuts were cleaned out and sampled. The option was given up before the end of the year. In 1924 considerable work was reported on the Silver Peak group and adjoining claims by The Nipissing Mining Company, Limited, under an option agreement.

The showings were restaked as the Silver Lake No. 1 and No. 2 claims by P. Schufer and L.S. McGill in about 1926. Assessment work to 1929 was done in open cuts and a short adit. A new discovery, thought to be on adjacent ground, was staked in 1928 as the Trade Dollar group (see 93 L/14, CU 2). An 8 foot pit was sunk on the best showing. A survey carried out in 1929 indicated the showing was on Silver Lake ground.

The Silver Lake property was optioned late in 1929 by R.W. Wilson and Sons, of Great Falls, Montana. Extensive open cutting was carried out. In 1933 a crosscut adit was begun at the 6,200 foot elevation and during 1934 was extended to a length of 60 feet. Kindle, 1954, mentions a 110 foot adit at the 6,400 foot elevation. The option was given up in about 1936.

The Silver Lake No. 1, Silver Lake No. 2, Bee, Cee,

Mineral Development Sector, Department of Energy, Mines and Resources, Ottawa.

HISTORY OF PRODUCTION

In 1913, 2 tons of sorted ore were shipped from the White Heather group. From this ore 174 ounces of silver, and 1.838 pounds of copper were recovered.

In 1964, 1 ton of sorted ore was shipped under the name Silver Creek, Silver Lake, Trade Dollar. From this ore 104 ounces of silver, 1,461 pounds of lead, and 157 pounds of zinc were recovered.

MAP REFERENCES
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.

Map 5319 G, Smithers, (Aeromag.), Sc. 1":1 mile. #Map 93 L/14, Smithers, (Topo.), Sc. 1:50,000.

Sketch Map of Hudson Bay Mountain, (Geol. and Mineral Prospects), Sc. 1":1 mile, Fig. 1, Paper 36-20.

REMARKS

Comp./Rev. By	DMacR	DMacR			
Date	12-75	1-79	 _		

REFERENCES

- Kindle, E.D.; Mineral Resources, Hazelton and Smithers Areas, Cassiar and Coast Districts, British Columbia; Memoir 223 (Revised Edition), pp. 123-125, Geol. Surv. of Canada, 1954.
- Reports of Minister of Mines, British Columbia: 1905, p. 134; 1907, p. 80; 1913, p. 419; 1916, p. 124; 1923, p. 110; 1924, p. 96; 1926, p. 130; 1927, p. 137; 1928, p. 164; 1929, p. 165; 1931, p. 72; 1933, p. 98; 1934, p. C 6; 1950, p. 100; 1963, p. 26; 1964, p. 51; 1965, p. 74; 1966, p. 86.
- Jones, R.H.B.; Geology and Ore Deposits of Hudson Bay Mountain, Coast District, B.C.; Summary Report, 1925, Pt. A., p. 141, Geol. Surv. of Canada.
- Kerr, F.A.; Mineral Resources along the Canadian National Railway, between Prince Rupert and Prince George, British Columbia; Paper 36-20, pp. 101-103, Geol. Surv. of Canada.
- Lode Gold Deposits of British Columbia, compiled by J.D. Galloway; Bulletin No. 1, 1932, p. 53, British Columbia Dept. of Mines.
- Mineral Policy Sector; Corporation Files: "Dorita Silver Mines Ltd."; "Hudson Bay Mountain Silver Mines Ltd.".

NAME OF PROPERTY

PRODUCT

SILVER LAKE (SILVER PEAK) (WHITE HEATHER) (TOWER HILL)

PROVINCE OR

TERRITORY

DESCRIPTION OF DEPOSIT (CONTINUED)

an open-cut some 500 feet south of the north rim of the flat a galena vein occurs along a fault fissure striking south 50 degrees east and dipping 60 degrees northeast. The vein contains up to 5 per cent of chalcopyrite associated with solid galena. It ranges from 1 inch to 3 inches in width. Other open-cuts sunk at intervals for over 400 feet along the strike of the vein disclose a persistent fault fissure with a variable mineral content. In many of the cuts the fault fissure is narrow and contains very little or no vein filling. In a cut at elevation 6,700 feet a vein is exposed for 15 feet. The vein ranges from 3 to 12 inches in width, and consists of solid, coarsely crystalline galena with less than 1 per cent of chalcopyrite. A representative sample taken from a ton of the ore piled beside the cut assayed: gold, 0.10 ounce a ton; silver, 102.55 ounces a ton; lead, 83.58 per cent.

On the north rim of the flat, and 1,000 feet to the east, a sheared zone in fine-grained andesite is exposed for 300 feet by five open-cuts. It strikes from east to south 60 degrees east and the dip ranges from vertical to 70 degrees south. In the west trench, at elevation 6,600 feet, the sheared zone is barren. In a large cut 50 feet farther east the sheared zone is 6 feet wide and there are three sulphide veins, two of them 12 inches wide and the other 3 inches wide, separated by 3 feet and 1 foot of barren rock, respectively. The vein filling consists of roughly equal parts of solid galena and dark sphalerite with a little chalcopyrite. A representative sample of this ore assayed gold, 0.24 ounce a ton; silver, 33.51 ounces a ton; lead, 26.21 per cent; zinc, 28.45 per cent; copper, 0.74 per cent. In the next cut, 60 feet farther east, there is a single, sparsely mineralized shear zone. In the fourth cut, 70 feet farther east, there is a sulphide vein, 2 inches wide, composed of sphalerite and galena with a little chalcopyrite. A similar vein ranging from 6 to 8 inches in width is exposed in a fifth open-cut, about 100 feet farther east. Here dark sphalerite is the more abundant mineral and it is accompanied by a little carbonate gangue.

Several other smaller veins are exposed in open-cuts in either andesitic or tuffaceous volcanic rocks near the centre of the flat.

see reverse Card 2

HISTORY OF EXPLORATION AND DEVELOPMENT (continued) claims (Lots 7239-7244, 7246, and 7267, respectively) were Crown-granted in 1939 to Schufer and McGill.

93 L/14

Sil-Van Consolidated Mining and Milling Company, Ltd., incorporated in September 1950, acquired a number of properties on Hudson Bay Mountain, including the Silver Lake group. The company name was changed in 1957 to Sil-Van Mines Limited, with Silver Standard Mines Limited acquiring a $36\frac{1}{2}$ per cent interest in the company. The Silver Lake and adjacent groups were transferred to a new company, Hudson Bay Mountain Silver Mines Ltd., which was incorporated in August 1963. Work on the Silver Lake group during 1964-65 included bulldozer trenching, drilling, blasting, and sampling. Diamond drilling was done in 16 holes totalling 3,360 feet, part of which was on the adjoining Silver Creek group. In 1966 two prospect shafts totalling 91 feet were sunk on high-grade showings and a sublevel was driven 97 feet from the bottom of one shaft.

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 Lake property. Dorita, in 1978, sold all its mineral properties to Silver Standard Mines Limited.

DESCRIPTION OF DEPOSIT (continued)

A showing discovered and staked as the Trade Dollar group in 1928 was subsequently found to be on the Silver Lake property. A pit on the showing exposes a vein 34 inches in width, of which a width of 30 inches is remarkably clean galena. This vein strikes N85°W (mag.) and dips northeast at about 75°. A sample taken across 2.5 feet assayed: gold, 0.14 ounce and silver, 90 ounces per ton; lead 64%; zinc, 0.2%.

"On the basis of sampling the surface trenches (in 1964), two shoots on No. 3 vein aggregate 300 feet in length and over mining widths will produce 100 tons per vertical foot grading 0.05 ounce gold, 13.1 ounces silver, 6.7% lead, 17.7% zinc" (Sil Van Ms L Rept. & Balance Sheet 30/11/64).