

with quartz and limestone flux to the extent of some 80,000 tons. With the increased tonnage handled there was a corresponding increase in the output of copper, approximately 30,400,000 pounds being produced, as compared with 27,661,301 pounds in 1917.

In the Boundary District the Granby Company's mines at Phoenix were unable to supply the smelter at Grand Forks with sufficient ore to run the smelter at capacity. The ore reserves of these mines are approaching exhaustion, so that the large-scale production of former years cannot be maintained. Also the high operating costs during 1918 left but little margin of profit in working the low-grade ores at Phoenix. Or, to quote the Granby Company's annual report: "The old Phoenix mine has been run more from patriotism than hope of profits." The tonnage mined and smelted was approximately 444,000 tons, containing about 6,200,000 pounds copper (recovered content), which is a small decrease from the production figures of 1917; the 1917 output was only about one-half that of former years.

The Canada Copper Corporation, operating the Mother Lode mine and smelter at Greenwood, treated a slightly smaller tonnage than in 1917. About 165,000 tons was handled, from which approximately 2,200,000 pounds of copper were recovered, together with low gold and silver contents. Towards the end of the year the smelter was closed, the ore reserves at the Mother Lode mine being exhausted.

The Britannia mine had a very successful year, approximately 750,000 tons of ore being milled the production of copper from which is estimated at 18,250,000 pounds. This is nearly 2,500,000 pounds greater than the 1917 production.

The Marble Bay mine, on Texada Island, made about the same production as in 1917; the output is estimated at 740,000 pounds.

Half a dozen smaller shippers are listed from the Southern Coast District, but the total copper from this source only amounts to 500,000 pounds.

The Omineca Division produced less copper than in 1917; the output is estimated at 562,000 pounds.

Copper mining is now firmly established as the most important form of mining in the province, and from all indications it should maintain this place for years to come. In 1918 the value of the copper mined exceeded by over

\$4,000,000 the combined values of all other metals mined, and it formed 38 per cent. of the total value of the mineral production for the year.

It is also to be noted that 80 per cent. of the copper output is produced on the Coast, which has become the centre of the copper-mining industry, thus replacing the Boundary District, the old centre.

On Vancouver Island the amount of copper produced has been very small comparatively, but there are under development at present at Jordan river and near Quatsino Sound two properties on which active development has been carried on with such success as to indicate a large production within a couple of years.

The Ruth Mines Limited of B. C., has gone into voluntary liquidation.

The Mountain Chief Mining Company, Limited, non-personal liability, authorized capital of \$50,000, with its registered office in Nelson, has been incorporated.

The Granby Company produced 2,955,450 pounds of copper in December, according to a report from the New York office of the company. This may be compared with 2,147,405 pounds in November, 2,549,000 pounds in October, 3,371,525 pounds in September last, and 4,468,388 pounds in December, 1917, the largest in more than a year.

Several of the largest copper-producing plants in British Columbia are understood to have dropped most of their exploratory and other non-pressing work for the present, awaiting a settling-down of the copper situation. In the world's markets there is now on hand a stock of 3,000,000 pounds of copper, produced for a 26-cent market. Until this is absorbed conditions in the copper market are bound to be unsettled. The Anaconda Company's mines in Montana have reduced output recently by 25 or more per cent.

According to R. Dalby Morkill, secretary-treasurer of the New Hazelton Gold Cobalt Mines, Limited, the development work at the mines is progressing satisfactorily and conservative tests of two carloads of ore, sent to different plants for refining, have been highly encouraging. A carload of thirty tons of ore shipped recently to the government plant at Ottawa has assayed 1.40 per cent. molybdenite, 1.8 molybdenic oxide, 1.54 cobalt, 8.90 arsenic, and of gold 1.48 ounces, making a total of something in excess of \$105 per ton.

# BRITISH COLUMBIA

## The Mineral Province of Western Canada

TO END OF DECEMBER, 1917

Has produced Minerals valued as follows: Placer Gold, \$75,116,103; Lode Gold, \$93,717,974; Silver, \$43,623,761; Lead, \$39,366,144; Copper, \$130,597,620; Other Metals (Zinc, Iron, etc.), \$10,933,466; Coal and Coke, \$174,313,658; Building Stone, Brick, Cement, etc., \$27,902,381; making its Mineral Production to the end of 1917 show an

**Aggregate Value of \$595,571,107**

**Production for Year Ending December, 1917, \$37,010,392**

The Mining Laws of this Province are more liberal and the fees lower than those of any other Province in the Dominion, or any colony in the British Empire.

Mineral locations are granted to discoverers for nominal fees.

Absolute Titles are obtained by developing such properties, the security of which is guaranteed by Crown Grants.

Full information, together with mining Reports and Maps, may be obtained gratis by addressing—

**THE HON. THE MINISTER OF MINES**  
VICTORIA, British Columbia.