

bounty earned in 1912 was only about \$65,000, the London price of lead during about seven months having been above that at which bounty ceases to be payable. There remains something like \$700,000 unearned of the original appropriation of \$2,500,000.

#### Copper.

The estimated increase in the copper production as compared with 1910 is about 12,756,000 lb.; with 1911 it is 14,072,000 lb. Going back to earlier years, the comparison does not appear favourable, but in point of fact it is, since the total of 51,000,000 lb. estimated for 1912 is the quantity of copper actually recovered, while some years ago it was customary to record the copper-content of the ore without allowing for loss in smelting. The increase in production for last year is therefore much greater in comparison with that of any one of the years 1906-1909, inclusive, than is at first evident. The copper-content of ores smelted in 1912, as shown by assays, was approximately 62,000,000 lb., so a liberal allowance has been made for losses in the slags.

As in past years, the Boundary District mines were the largest producers of copper, with a recovery of fully 33,000,000 lb., two-thirds of which came from the Granby Consolidated Co.'s mines at Phoenix, and one-third from those of the British Columbia Copper Co. situated in other parts of the district. The latter company owns a controlling interest in the New Dominion Copper Co., so the production of the *Raichide* mine, in Phoenix camp, is included in the quantity shown as British Columbia Copper Co. production. Copper recoveries from Rossland ores appear to have been about 2,330,000 lb., while the Coast mines are credited with between 15,000,000 and 16,000,000 lb., nearly all of which was from the Britannia Co.'s mines near Howe sound, with the remainder, except a small quantity from the *Red Cliff* in the Portland Canal Division from the *Marble Bay* mine on Texada Island.

It is noteworthy that copper now leads in aggregate value of production of individual metals in all years; that is, if placer and lode gold be taken separately. The respective aggregate figures are: Copper, \$73,653,000; placer gold, \$72,139,000; lode gold, \$70,497,000. The development of the copper-mining industry in the Province may be strikingly illustrated by comparing the relative totals of these several metals as at the close of the year 1900 with those just given. They were: Placer gold, \$62,584,000; lode gold, \$12,813,000; copper, \$4,365,000. Comparison of these figures shows that copper has taken a leading place in the metalliferous production of British Columbia, for while during the twelve years, 1901-1912, the total production of lode gold has been valued at \$57,684,000, and of placer gold only \$9,555,000, that of copper has been \$69,291,000.

#### Zinc.

The adverse conditions that throughout 1911 affected the production of zinc, so far as concerned the *Whitewater* and *Lucky Jim* mines, in the Slocan, continued until 1912 was well advanced toward its close. In fact, they still exist, as affecting the *Whitewater* group, for the concentrating-mill destroyed by fire in the summer of 1910 has not yet been replaced, although transportation facilities have been restored. The latter improvement made it practicable for the shipment of zinc-ore from the *Lucky Jim* mine to be resumed in the autumn.

Most of the zinc-bearing material shipped was in the form of concentrate, made as a second product in mills concentrating ores also containing lead and silver. In round figures, the zinc recovered from concentrates was as follows: From the Standard Co.'s shipments, 2,700,000 lb.; Van-Rol Co.'s, 2,317,000 lb.; *Monarch* mine, 1,000,000 lb. Recovery from *Lucky Jim* ore shipped crude was