

having been reduced to this sum from \$261,589,000 in 1892. Eighty-one companies are shown in the blue book as engaged in lending money on mortgage in this Province, and almost all of them pay dividends on capitals ranging from \$50,000 to \$6,000,000 each; besides which insurance corporations and private capitalists lend money here by the million on land. One company, which has loaned money for forty years in Ontario only, has to-day loans of \$7,238,000 in this province, and has for years paid nine per cent. dividend. Others have aggregate loans ranging from two to five millions, and the largest company has loans of twenty millions, and their dividends are regularly paid. But the Trust and Loan Company wiseacres, seated in their cosy offices in Great Winchester Street, London, composedly give it to be understood that they "have practically exhausted the business in Ontario!" What a pity it is that the people who write their reports and inspire their annual speeches should not know something about the premier province of Canada, after doing business in it for sixty years.



SMELTING WORKS IN BRITISH COLUMBIA.

It appears inevitable that in all newly settled countries affording promise of mineral wealth, the early development of that wealth is delayed through inadequate geological knowledge and a lack of expert advice as to proper methods and machinery. British Columbia has proved no exception to the rule, in this respect. Hundreds of thousands of money have been sunk in various parts of that great mineral area, in some cases in appliances not adapted for the kinds of ore prevailing; in others because the machinery could not, for physical reasons, be got into the valleys or up the mountains where it was intended to be used. Lack of forethought, the reader will say. Yes, lack of forethought and lack of skill, both. In the matter of smelters, the province has had a very sufficient experience, as we learn from a paper by Mr. E. Jacobs, a well-known writer upon British Columbia minerals, in Bulletin No. 19 of the Provincial Government, which deals at large with the subject of mining.

Dealing in succession with the smelters in the Kootenays, in the Boundary country, and on the Pacific Coast, Mr. Jacobs shows how the first-named has had its share of unsuccessful ventures as well as successful ones. Golden, Revelstoke, Pilot Bay, Ferguson, and Marysville, each has its story of great expectations and greater disappointment. "It is a consolation to think that the long-continued operation of the Nelson and Trail smelters, especially the latter, has taken away the reproach that in the absence of their success would have become associated with the Kootenays. Not that it was deserved, for where smelting enterprises have been in fully competent hands and started under conditions necessary to success they have been kept going."

Needless to give any detailed account here of unsuccesses, these are given in the Blue Book. We note, however, that the first actual smelting of ore on a commercial scale in British Columbia appears to have been done at Revelstoke. The works are described in the Mines Report for 1889, as having a sampling and smelting capacity of 100 tons and 60 tons respectively. "It is not known to the writer how long these works were in operation, but as there is now in the Mineral Museum of the Department of Mines, at Victoria, a moulded bar of 'Kootenay' lead, stated to have been the first lead smelted in British Columbia

and believed to have been the product of the Revelstoke smelter, it would appear that ore was actually smelted here and a marketable bullion produced."

The site of the Pilot Bay smelter was chosen and work on it begun as early as 1891: in 1895 the smelter had been in operation and had shipped some 3,000 tons of bullion, the main supply of ore [low grade] being obtained from the Blue Bell mine. In that year the company employed on an average more than 200 men daily, and by December they had expended in cash more than \$650,000. "For a time the concentrator was used in 1897 by Braden Bros," but "in 1898 the whole works passed into the possession of the Bank of Montreal, since which year they have been idle."

The smelter at Nelson was built in 1895 by the Hall Mines Company, for the purpose of smelting the product of the Silver King mine, which was copper-silver ore. It has since purchased other product, and its work is largely confined now to lead ores and dry ores. During the year ended with June last, 16,677 tons (dry weight) of silver-lead ores were smelted at these works.

The Trail smelter was begun in October, 1895, by F. A. Heinze, and by the following summer five furnaces were in operation, four reverberatories and one circular. These were afterwards replaced by rectangular blast furnaces. In March, 1898, the C.P.R. bought the smelter, and it is now described as the largest lead-copper reduction works in Canada. The plant is valued at two million dollars, and employs ordinarily 350 men. The works are operated by electricity transmitted from Bonnington Falls about thirty miles.

Then there is the Northport smelter, which though situated in Washington State, a few miles south of the Canadian boundary, is to all intents and purposes a British Columbia smelter, owned by the Le Roi Mining Company, and obtaining practically all its ore supplies from Rossland and other British Columbia mines.

We must devote another article to this subject.



BANK OF OTTAWA.

It must be with much satisfaction that the authorities of the Bank of Ottawa can point to the figures among liabilities of that institution on November 30th: Capital paid up, \$2,500,000; rest, \$2,500,000. To have reached, in thirty years, the point where reserve equals capital, which had been twice enlarged in the interval, and reaches now two and a half millions, marks a stage where, if they feel like it, they may fairly rest and be thankful. But the country continues to grow, the bank's deposits continue to grow, the demands of the bank's customers must also be expected to increase. And so with the aggressiveness which is implied in the bank's motto, "Advance," one may expect to see still further additions to the large totals which this live institution is able to show. And one may hope, too, that there will be a continuance of the wise caution which, the president also assures us, has helped materially the bank's success.

The general manager's address analyzes the statement for 1904 very fully. It is printed in our columns side by side with that of 1903, making comparison easy. Circulation is well up to the limit, though not quite so large as at like date of 1903. Deposits now exceed \$15,000,000, having gone up a million and more in the year. Current loans show an advance of two millions which helps to account for a decline in call loans, and some other items among cash assets. Bank