# SPECIAL CORRESPONDENCE

## COBALT, GOWGANDA AND SOUTH LORRAIN

**Oil flotation** is to be tried on a considerable scale in the Cobalt camp. The McKinley-Darragh mill is already installing a 150-ton plant to treat their slime. It is expected that the plant will be running in May. The concentrating tables are being pulled out to make way for the new process. Twenty-five tables are to be taken out to make room for the flotation plant. Six rougher cells are to be installed and two cleaner cells. The slime tailings in a Cobalt reduction plant run from five to seven oz., and Mr. Callow, whose process is being adopted, is sanguine that he can reduce these to two oz. and perhaps one. The installation is inexpensive, and the cost of running the plant not great.

The Buffalo Mines, always the pioneer in flotation in Cobalt, has decided to erect a 600-ton plant in order to treat their tailing pond.

The Nipissing is installing three units at the low-grade mill and several other companies are experimenting with the process.

In the same connection it is very interesting to record the fact that pine oil has been refined with complete success at the Buffalo mill from wood waste in Northern Ontario. The success of these experiments, in which Mr. T. R. Jones of the Buffalo, and Mr. A. A. Cole participated, was so pronounced that the attention of the Department of the Interior was called to the matter and Dr. Bates was sent up. He spent a whole week in the camp and appeared most favorably impressed with the prospects. As to the commercial possibilities, one of the large oil corporations sent up their head chemist to make his own investigations, and he, too, was quite impressed with the possibilities of the situation. The refining would have to be undertaken on a very large scale to make it commercially feasible, but good progress has already been made to accumulate no little data on the matter.

**McKinley.**—There has been a marked improvement in the position of the McKinley-Darragh-Savage in the past two or three months. A very large tonnage has been developed below the 200-ft. level of the mine. Previous to this year it was assumed that there was no ore to speak of below the 200-ft. level, but this has been proved to be a complete fallacy. There is on the Blind vein at the 250-ft. level a very large body of milling ore. Its maximum width is no less than 55 ft., but its average width is 30 ft. and its milling value is about 15 oz. The development on the Cobalt Lake fault, while it has not yet yielded anything tangible in the shape of ore reserves, is perhaps even of greater importance still. Below the 250-ft. level the winze sunk parallel to the fault was in ore for 30 ft. It is now down about 100 ft. vertically, and while the hanging wall is Keewatin, the foot wall is in excellent conglomerate. This makes the possibility of opening up ore shoots on lower levels of the mine quite bright.

Altogether ore reserves at the end of the year are shown to be 1,200 tons more than at the end of 1914 and containing 1,875,000 oz. This is 257,820 oz. less than ore reserves were declared at in 1914 owing to the fact that the grade of mill rock is lower.

A very interesting development has also occurred under the lake at the 75-ft. level. This portion of the property is now quite free from water and is quite safe and a raise is being put through to the surface. The old Discovery vein—the first vein to be found in Cobalt—was opened up for six to 17 inches wide. While it is cobalt and not high grade, it and the adjacent wall rock can be mined at a good profit. It is instructive to note that this vein had been completely missed by the pioneers of the camp. It was a foot back from the fault in the hanging wall and had been given up.

If the flotation system is successful it will result in the treatment at a profit of much lower grade milling rock than at present. It is reckoned, for instance, at the McKinley-Darragh that it will be possible to save by higher extraction no less than 500 oz. a day.

The McKinley-Darragh has done so well that it has maintained production and dividends and yet increased its ore reserves: the reduction in ore reserves is entirely due to the fact that the Savage mine has not responded to development as well as formerly. There is still quite a little mill rock at the Savage and it is more than paying expenses, but if further ore shoots are not soon found this subsidiary of the McKinley-Darragh will have to be shut down.

Foster.—Considerable interest is being taken in the development of the old Foster under the auspices of the leasing company, the Glen Lake Cobalt Mines, Ltd. This company and its predecessor, the Foster Leasing Co., has pegged away at development in this section of the field without much encouragement for about two years. It is true that from time to time short shoots of high grade ore have been found and mined near the Lawson line, but they were soon stoped out. Recently in driving to the west on a series of calcite veins a shoot of very rich ore was encountered. This shoot was not more than 15 ft. long and the vein is two inches wide, but since it is in good conglomerate there is a fair chance that it is but the first of further lenses of rich ore. From the old Foster shaft a long cross-cut has been driven under Glen Lake until now it is about 70 ft. from the Bailey line at the 210-ft. level. A winze is now being put down to the Keewatin contact. On ascertaining the horizon at which it is considered best to prospect, a cross-cut will be driven parallel to the Bailey with the expectation of picking up extensions of the Bailey veins.

No ore has yet been found under Glen Lake, although the Penn-Canadian has conducted some exploration in this direction, too. But the formation is favorable and the recent strike on the Foster will without doubt lead to further energy in the prosecution of the work.

**Prospecting at Cobalt.**—While the keenness with which gold prospects are sought is far more apparent than silver there is nevertheless a desire on the part of capital to discover whether there is not some good in some of the old prospects around Cobalt that has been overlooked in previous exploration. There is little doubt that both the John Black and the Ophir will be working in the spring. It is quite probable that there will be a merger of these two companies. The Adanac Cobalt has some fine ore but the vein is broken and not well defined. The Shamrock is working. The Gifford has been pumped out. The Rochester is working. The Peterson Lake Mining Company is working the Reliance claim.

Wettlaufer has already been dewatered by a company known as the Comfort Mining and Leasing Co. Dr. Comfort is the president of the company and it is well backed. The water has been pumped out to the fourth level and drills will be running before the end