

Supply—Indians—Radium

that period of the year when waterborne transportation is possible. In addition to that, ore of a certain richness can be transported by means of aeroplanes. I have been informed that the silver deposits in certain parts of the vein at least are of such richness that it is highly profitable to transport the ore even by aeroplane. My information is that a silver content as high as 22,000 ounces to the ton has been found in some of that ore.

Dealing now with the value of the pitchblende deposit in connection with radium, I may say that at present it is undetermined. It is only in its infancy, and we do not know yet the extent or value of that deposit. Experiments which are being carried on at present by the Mines department are designed to obtain that accurate information so far as possible, and the process which has been worked out by their chemists has been very successful so far. I am told that the process they have evolved is more economical than the process used in Belgium to reduce the ore which they obtain in the Congo. With regard to radium, I may say that its present selling price varies from about \$50,000 to about \$75,000 per gramme, and that in all about 60 grammes were sold last year. I have been unable to secure any definite figure as to the cost price of that radium, though it is currently reported to be from \$10,000 to \$15,000 per gramme. Our importations of radium have been as follows:

1928.. . . .	\$ 17,597
1929.. . . .	40,687
1930.. . . .	46,012
1931.. . . .	207,735

Mr. SPENCER: May I ask where that was imported from?

Mr. MURPHY: I have not that information, although I may say generally that up to 1930 radium was produced in Belgium, in the United States and in Czechoslovakia. In 1930, however, the United States ceased the production of radium, since the Belgians were able to put it on the market at a much lower figure than was possible in the United States. Belgian radium sells for from \$50,000 to \$70,000 per gramme, while the best the United States could do was about \$120,000 per gramme. So I take it that the radium imported since 1930 has come from Belgium. I stated a moment ago that radium was produced in practically only two countries, Czechoslovakia and Belgium, but at present no exports are being made from Czechoslovakia, where the company is under state control. Therefore at present the world is dependent upon the con-

[Mr. Murphy.]

cern in Belgium known as the Union Minière de Haut Katanga, and the supply of ore is obtained from the Congo which, before the discovery in the Great Bear lake district in the Northwest territories of Canada, was the richest in the world. Radium has been discovered not only in the Great Bear lake district; there are radioactive ores in Ontario also, at Wilberforce, which is in the county of Haliburton. A private company is making certain experiments in that area. While the mineral deposits in the Northwest Territories, of course, are under the control of the Dominion government, the mineral deposits in Ontario are under the control of the provincial government.

Previous speakers have stated that in their opinion the government should take steps to see that this valuable element, radium, is controlled if not operated for the benefit of the people of Canada. I suppose they meant also for the benefit of the rest of the world, though they had particularly in mind the people of Canada. But may I point out that at the present time this pitchblende deposit in the Northwest Territories is in private hands. Those areas have been staked under the laws of this country, and those men have obtained rights. While it is certainly within the competence of the Dominion government to take such steps as may be deemed wise to preserve for the people of Canada the benefits which may come from the use of radium, still those private individuals must have their rights looked after under our laws.

Mr. GARLAND (Bow River): I understand there is a suspension of the provision in connection with the development work that must be done each year on the claim. To what extent has that suspension been carried?

Mr. MURPHY: That applies to all minerals, both in the Yukon and in the Northwest Territories. Owing to the present low prices of metals the rules governing development or representation work have been suspended for a period of a year, but before obtaining his final lease or title to his claim an individual must do the amount of work provided for under our laws. He is simply given a moratorium of a year; in the final analysis he must do the amount of work required under the regulations.

Mr. IRVINE: Would it not be a good way to get rid of those who have already filed claims if the government refused to give them any further extensions of time?