

*Supply—Indians—Radium*

recommends that the government appoint a radium commission for the purchase, control and distribution of that product. It is pointed out that in Great Britain there is a national radium trust and a radium commission to look after the purchase, distribution and use of radium. Belgium, it appears, produces about 95 per cent of the world's annual output of radium, and the control by the Belgium government constitutes a trust which limits the supply, holds the price at the figure I have indicated and prevents there being a sufficient supply to meet the needs of the world. Radium is particularly valuable because it is practically indestructible. The report indicates that the mass disintegrates at the rate of one per cent every twenty-five years. Therefore the radioactivity of radium will last for a period of about 2,500 years.

With respect to cancer, the report states that this disease is wide-spread, and the evidence appears to be conclusive that it is increasing over the whole world. In the mortality returns for every country in the world, cancer has ousted tuberculosis from second place in causes of death, the first being held by heart disease. In 1929, deaths from cancer in Canada numbered 88.7 per 100,000 of the population; in 1930, the last year for which figures are at present available, this had risen to 93.3. In the United States, in 1930 the number was 96 per 100,000, while in 1900 it was only 63. The report points out that from the beginning of the time when there were tabulated records, there has been a progressive increase in the number of deaths from cancer. Taking the state of Massachusetts alone, in 1842 the deaths per 100,000 were only 13; in 1860 this had risen to 26; in 1900, to 71, and in 1928 it had risen to the alarming figure of 130. May I quote from an address delivered by Senator McRae and quoted in the *Ottawa Journal* as follows:

Doctor Ellis MacDonald, director of cancer research in the university of Pennsylvania, says that 100 additional grams of radium, if properly applied, would save in the United States alone the lives of 30,000 people every year.

It goes on to point out that the supply and the price are under the control of the Belgian trust which is a part of the activities of the Belgian government. Radium is mined very largely in the Belgian Congo. I understand guards surround the mines so that no one can go there and see what is being done and there seems to be a general suspicion that the supply is limited and controlled to such an extent as artificially to raise the price and to limit the supply of radium available for the use of the world.

[Mr. Campbell.]

May I quote again from a Canadian Press despatch from Calgary, dated April 20, as follows:

A warning that European interests were seeking control of Canadian radium production was voiced to-night by Doctor H. W. McGill, Conservative member of the Alberta legislature for Calgary.

Doctor McGill made the disclosure just prior to his departure for Edmonton to attend a meeting of the Medical Council of the Alberta College of Physicians and Surgeons. He said he would place the matter before the meeting.

May I again quote from a recent editorial in the *Toronto Globe*? It says:

Some anxiety is expressed by those who assume to speak for mining interests lest General McRae's proposal for government control of the new radium deposits in the Great Bear lake region may lead to confiscation of rich ores anywhere, and thus menace the whole mining industry: Such an inference is surely not warranted.

Senator McRae made his appeal in behalf of suffering humanity, which needs radium for cancer treatment and can get it only at very high cost. Only a few days ago a New York hospital received five grams of radium on loan from Belgium, and the value is set at \$350,000. If Canada has the reputed great quantity of radium in its pitchblende ore at Great Bear lake, it has a chance to render a tremendous service, but it should be done on a fair basis.

Again from a recent editorial in the *Ottawa Journal*, may I quote as follows:

Those who realize what radium has come to mean in fighting the scourge of cancer must welcome these words, spoken in the Senate on Wednesday by Mr. Meighen:

"Government control of radium production and conservation is having immediate and earnest consideration. It looks as though Canada had a supply of radium of inestimable value to this country and to the world, such as to imply the necessity of a thorough and most careful investigation. I am confident that a policy involving control by the government will be worked out."

Radium is manufactured in a number of countries, the first factory having been started in France six years after the discoveries of Mme. Curie. But while small supplies come from Bohemia, Colorado and Portugal, the chief source of production is in the Belgian Congo, and, unfortunately, a monopoly. The result of this monopoly, so it is alleged, is that radium is at a prohibitive price, its benefits denied to the vast majority.

In the Senate on Wednesday Senator McRae said there was a danger of Canada's radium supply passing into the hands of foreign control, a development that would withhold its benefits from the Canadian people. This, should it come to pass, would be intolerable. The province of Ontario has just had a report from a cancer commission urging the creation of cancer clinics and the use of radium in combating the disease. It would be a crime if, in the light of this, Canada permitted outside interests to step in, seize control of her radium resources, and exploit them for private profit.