

depth of 94 to 173 feet below the surface. A shaft was then sunk 450 feet east of the diamond-drill boring and salt was found at a depth of 85 feet.

Perhaps the earliest reference to the presence of rock salt in Cumberland county was published by Dr. Abraham Gesner eighty-four years ago, in the following words:<sup>1</sup>

"Salt springs are common in the new red sandstone along the coast of Northumberland strait. At River Philip, a large quantity of salt was formerly manufactured, by evaporating the waters of a briny pool. One of the springs at that place yields a larger quantity of muriate of soda than almost any other in the country, and would supply, under proper management, more salt than would be required by the British North American colonies; nor can it be possible that the crystalline deposit from which these waters flow, is beyond the reach of the miner's skill. The infancy of the colony is a trite apology for not entering into useful speculations, but it seems impossible that any country can arrive at manhood, when little pains are taken to develop its growth."

A geological map of the Malagash peninsula was compiled by Scott Barlow, R. W. Ellis, and Hugh Fletcher, and published in 1905 as Nova Scotia Geological Sheet No. 60. Ellis<sup>2</sup> describes the anticlinal fold which characterizes the structure of Malagash peninsula and gives a section measured along the shore of Wallace river. He concludes that the Lower Carboniferous series is repeated by faulting. Fletcher<sup>3</sup> describes the continuation of the Clairmont anticlinal to Malagash point, and the rocks resembling Permian strata at the head of Tatamagouche bay.

In his report on the salt deposits of Canada, L. Heber Cole<sup>4</sup> lists certain salt springs that occur in Nova Scotia and New Brunswick, which issue from carboniferous rocks of the same age as those enclosing the Malagash deposit.

The discovery, early history, development, and geology of the Malagash deposit are described by Cole<sup>5</sup> and Hayes<sup>6</sup>.

Cole also discusses the domestic and foreign markets for salt, pointing out the importance of the discovery at Malagash to Canada and more especially to the Maritime Provinces. From a study of the report on mineral production of Canada in 1918, by John McLeish<sup>7</sup>, the conclusion is reached that Canada at the present time imports over half of her annual consumption of salt, the only production being in southwestern Ontario. The import of salt in 1918 amounted to 165,494 tons valued at \$1,267,169. Of this amount 100,103 tons were imported for the use of fisheries, about 75 per cent of which is used by the Atlantic seaboard and gulf of St. Lawrence fishing industry.

"The average value of this salt at point of shipment for 1918 was approximately \$8.15 per ton of 2,000 pounds. The ocean freight rate to bring this salt to Canadian ports of distribution would bring the cost up to at least \$10 per ton.

<sup>1</sup>Remarks on the geology and mineralogy of Nova Scotia by Abraham Gesner, 1836, p. 144.

<sup>2</sup>Ellis, R.W., Geol. Surv., Can., vol. I, 1885, p. 40E.

<sup>3</sup>Fletcher, Hugh, Geol. Surv., Can., vol. V, pt. II, 1890-91, p. 137F; vol. XV, 1902-3, p. 163 AA.

<sup>4</sup>"The salt deposits of Canada and the salt industry." L. Heber Cole, Mines Branch, Dept. of Mines, 1915, No. 325, pp. 16-20.

<sup>5</sup>Cole, L. Heber, "Notes of a discovery of rock salt in Nova Scotia," Dept. of Mines, Mines Branch, Sum. Rept. 1918, pp. 70-73, and Can. Min. Jour. Jan. 8, 1919, pp. 8, 9.

<sup>6</sup>Hayes, A. O., Geol. Surv., Can., Sum. Rept. 1918, pt. F, pp. 30F-31F.

<sup>7</sup>Mines Branch, Dept. of Mines, Publication No. 506.