

Lawrence, 200 x 45 x 9 ft. on the sills. The money was to be obtained by a guarantee given from the mother country. Lord Sydenham, the governor-general, formed the opinion that the expense would be too great. He considered that the locks as they were then designed, 150 ft. x 26.6 x 10 ft., could sufficiently compete with the Erie canal route. In view of the defence of the province, locks of 200 ft. x 45 ft. x 9 ft. were constructed at the entrance lock at Port Dalhousie, lake Ontario, and also lock No. 2, so that Saint Catharines can be reached by the larger class of propellers: and at the guard locks at Port Colborne, and Port Maitland, to admit such vessels, in case of need, finding refuge in the canal.

In lord Sydenham's day the wonderful traffic of the west was never even surmised. To have foretold it a quarter of a century ago would have appeared an exaggeration which might have been compared to the fabulous narratives of the Arabian nights. It has, nevertheless, surpassed all calculation and expectation. The work of the second enlargement of the canal was begun in 1873. A mixed commission had been appointed in 1870, to examine into the policy of affording greater facility by the Saint Lawrence route. The report recommended the adoption of a lock 270 ft. in length, 45 ft. in width, with 12 ft. of water on the sills. It is difficult to explain why this length was determined, for even now modern criticism affirms that it is insufficient. In 1870 the Boards of Trade both of Chicago and Milwaukee had advocated a depth of 15 ft. and a lock of the length of 300 ft. This view, I am afraid it must be said unfortunately, was not accepted, and it is to be feared that it is not to the advantage of Canada that it was not regarded. The new canal, so constructed to the 12 feet navigation, was filled on the 27th of August, 1881. The first vessel that passed through was the United States steamer "Don. M. Dickinson," in tow of the Canadian tug "Harvey Neelon," on the 15th and 16th of September of that year.

In 1886 the representations of the necessity of deepening the canal to 14 feet were accepted as calling for further enlargement. At the close of the navigation of that year, this work was undertaken and carried on through the winter. On the 30th of May, 1887, the propellor "Newburgh," drawing 14 feet, passed through the newly deepened channel from Port Colborne to Port Dalhousie.*

During the ten years the enlarged canal has been in operation the traffic has chiefly been that of vessels proceeding to Ogdensburg. The propellor engaged in this trade is 240 feet long, 42 feet beam end, drawing 15 ft. 6 in. of water, carrying 2,100 tons. To pass through the Welland canal, the vessel has to be brought to the required draught of 14 feet, and this lightage costs 2 cents per bushel of grain.

The propellor of 270 feet is still a matter of the future. It is conceived that a steel built vessel and consort, aggregate capacity of 4,500 tons=150,000 bushels, passing with unbroken bulk from lake Superior to Montreal will so reduce the charge of freight as to turn the trade to the Saint Lawrence. To what extent, is the problem to be determined by experience. Moreover, it is held

* Consequently the several enlargements to the canal have been as follows:—first lock, 110' x 22' x 7½'; second, 150' x 26½' x 8½'; third, 270' x 45' x 12'; fourth, 270' x 45' x 14'.