

English vessels, under instructions from the Admiralty.

Under the Fishery Act of last session, as finally passed, the Americans enjoy rights which they could not claim under a strict interpretation of the Convention of 1818; among which may be mentioned the privilege of fishing in the Bay of Fundy. That privilege England conceded several years ago, though by a strict interpretation of treaty stipulations, even American authorities have over and over again admitted, it might have been withheld. Far from trenching on any right conferred by the convention in force, its stipulations, and any concessions, over and above which England had made to the Americans, are in express terms confirmed by the Fishery Act of last session.

In every step that has been taken on this question, the Government of the Dominion had the support and concurrence of England; and it is not alone this country but the whole Empire that is interested in the settlement of any questions which President Grant may raise. They may lead to some diplomatic tilting; but it is not in human reason to conceive that they can be made instrumental in disturbing the peace of the world.

BEET ROOT SUGAR.

CAN IT BE PROFITABLY MADE IN CANADA?

Before saying yea or nay to the question, we shall endeavor to show what has been done in similar latitudes across the lines, and what conditions are required for successful production.

We are not aware that any beet sugar factory as yet exists in the Dominion. The question was agitated a few years ago in Montreal; but the difficulty of getting a sufficient radius of country around that city, to engage in the cultivation of the root, was never surmounted. Some shrewd and enterprising gentlemen in the county of Wellington, Ont., are at the present moment, we are told, collecting information with a view to the promotion of such an enterprise. We wish them complete success, and shall be glad if, in this limited sketch, we may be able to give them any hints that will assist them.

Some 4 or 5 years ago a New York gentleman, who had devoted some time and money to promoting the culture of the Sugar Beet in the States of New York and Pennsylvania, gave the following estimate of the yield of say a thousand tons of beets:

<i>Expenses.</i>	
1,000 tons Beets at \$4 per ton.....	\$4,000
Estimates of manufacturing do at \$5 per ton.....	5,000
	9,000

Result.

200 tons pulp. at \$2 per ton.....	\$ 400
30 tons syrup at \$20 ".....	600
60 tons sugar at \$250 ".....	15,000
	\$16,000
From which deduct expenses.....	9,000
Leaves a profit of.....	7,000

The values of the manufactured article were given at New York prices, and the cost of the roots laid down at the mill apparently the same as they could be raised for in Germany, which is putting the case pretty favorably, we should think, considering the greater cheapness of labor in the latter country, and the common employment there of women and children at farm labor.

Beet Sugar manufacture may be said to have begun in the Western States in 1862. The civil war interrupted it; but in 1866 a new German company was established at Chatsworth, in the State of Illinois, with new seeds to plant, and new apparatus for refining, and in the autumn of the year they had 600 acres of beets growing. This experimental beet farm was carried on for several years with very indifferent success, but we find a statement in a very recent article from a New York journal, that in Chatsworth, Illinois, "there has been a saving of nearly thirty per cent. over the results of the best German or French cultivation in the field work or cultivation of the beets, for they were put into the pit at \$2 70 the ton," the saving being effected by the use of machine instead of hand labor. The sugar produced here was pronounced by Chicago experts to be A 1. New York sugar, and brought the price of that brand. Assuming the other items of cost to be identical with what we have given above, and the different products saleable at the same rate, we have here a profit of over 100 per cent.

This result was reached, however, only after many disappointments and failures, caused by the unfavorable location first chosen by foreign management and insufficient cultivation. These have all been rectified, and time and experience have brought success. But what is possible in Southern Illinois may be forbidden to our higher latitudes; so let us look at one of the States nearer home. Our nearest neighbor and the one most nearly identical with Ontario in position, products and climatic condition, is probably Michigan, and this is what we hear of her experience in this matter. "The farmers of Ingham County, Michigan, have for the past two seasons been planting the sugar beet as a test; a specimen of the beets from Michigan, analyzed, gives better promise than those of any other locality, except the Alvarado Valley, of California." Now, the district mentioned is about the

centre of Michigan—from west to east—and in the same latitude as the counties of Middlesex and Oxford and the Welland district, in Ontario, and half a degree north of Essex; and the question is naturally suggested—if so favorable a prospect can be shown in Michigan, what is to prevent an equally favorable result in the more southern part of our western peninsula? We have sorghum grown, and excellent syrup made from it, by the farmers of Essex; grapes, too, and grape wine from the same county; from Grimsby, in Lincoln, and the Cooksville vineyard, in Peel. The Catawba wine of Kelly's Island is well known and abundantly used by the western lake cities, and vineyards are being planted in the adjacent Canadian island of Point Pelee, in Lake Erie. All the facts seem to strengthen the supposition that Ontario is favorably placed for experiments in so valuable an industry.

In the absence of American statistics, we quote from an English work the following respecting European culture of the root:—"In France, Germany, or Russia, 20 tons of root per acre is called a good yield, and one ton of sugar from 12 tons of root; but sometimes there is the far lower estimate of 1,000 pounds sugar per acre, seeing that clumsy processes, as well as bad seasons, limit the yield. In 1864 there were 336 beet-sugar factories in Russia, 270 in the Germanic Zollverein in 1865, and 438 in France in 1866." The greater dearth of land and labor in Britain have prevented the extension of the manufacture there. The estimated quantity of beet-root sugar made in the three first-named European countries from 1865 to 1867 was over a million tons, and apportioned as follows:

Zollverein.....	385,000 tons.
France.....	425,000 "
Russia.....	225,000 "
Total.....	1,035,000

It is proper to remark that these countries lie in latitudes considerably above ours. Bavaria, Saxony, and the other German Provinces that go to make up the Zollverein quota, lie in latitude, say, 48 to 52, France some degrees lower, while Western Ontario is bounded by 42 to 44. But the question is not one of latitude solely; in fact there are so many conditions to be borne in mind, that we cannot pretend to indicate them in this article, but leave the matter for a time, in the hope that practical light may be thrown upon it by some of our agriculturists.

WINTER PROSPECTS.

"See winter comes to file the varied year,
Sulca as a sad, with all his rising train,
Vapours, and clouds, and storms."

—THOMPSON.

The winter has now fairly begun, and there must soon be good sleighing in all sections of the country. The character of the season is