I.—6. 42

856. Are you aware that sisal is likely to be produced at a lower rate than we can produce our

flax?—Yes, I believe so.

857. The Chairman.] You have laid before this Committee the following telegram: "London, 23rd July, 1890.—Premier, New Zealand.—Bull's flax good, long, fresh, strong, well cleaned, bright yellow, should be whiter; here there a little strawy; value, 22–23." Does this telegram refer to the flax prepared by your machine?—Yes.

858. And that produced is a specime of the flax made by your machine?—Yes, it was taken

out of the same flax, from the first day's stripping.

Report on an Improved Flax-dressing Machine, known as Bull's Patent Scraping Machine. SIR,-Wellington, 5th August, 1890.

In compliance with request, I have the honour to report as follows:

My experience has shown me that what is required to improve the present condition of our hemp manufacture is a better form of separating the fibre from the covering, by which the fibre bundles will be less injured and a greater proportion of fibre saved than has been possible by the use of the usual strippers. My machine effects both of these objects in a simple, practical manner, by a process more closely resembling scraping than the action of the strippers, which is that of percussion. By this means a fibre is produced free from any maceration, evenly defined from butt to tip, the colour bright, with the lustre well brought out; and, although at first sight many would not think it superior or perhaps equal to fine-dressed samples by some strippers, there can be no question of its intrinsic superiority. I am borne out in this statement by the result of the inspection of the fibre by the experts at Home, whose report, cabled to the Premier, is in evidence before you.

The machine is similar in many respects to others, and the flax is fed in the usual manner through two grooved rollers. The difference is in the drums, of which there are two, one much larger than the other, the large drum being about $15\frac{1}{2}$ in. diameter and the lesser drum only 6 in. The large drum is provided with about fifty-five bars or scrapers placed parallel to each other, but at an angle to the line of axis. The small drum has a number of bars placed parallel to the line of axis. Both drums revolve at considerable speed, the speed of the large drum being much greater, however, than that of the other, which acts in the double capacity of a beater-bar and a scraper. Both sides of the leaf are thus operated upon at one time. There is no "towing up" of the flax round the drums, thereby saving much time commonly lost in having to stop for clearing the obstruction.

This is due to the action of the two drums, and is a great consideration.

The results of trials up to the present time go to show that a saving is made in green flax of about one ton and a half to the ton of dressed fibre, and the consequent saving of the machinery, and cutting, &c., of that quantity. The time taken in bleaching is considerably lessened; less tow is made in scutching; the value of the fibre is increased; finally a superior fibre is produced and at a materially lessened cost. FREDERICK BULL.

Wednesday, 13th August, 1890. Mr. W. Ferguson examined.

Witness: I am Secretary of the Wellington Harbour Board. I understand from Mr. Beetham that the Committee have under consideration the proposal that there should be an examination of flax—of, say, one bale in five. I am strongly of opinion that, with the accommodation at present possessed by the Board, it would be impossible to carry out such an examination. Mr. Scales has pointed out to me that during the last two days he has dealt with 350 bales, so that, examining one bale in five, no less than seventy bales would be required to be examined for one merchant alone. $\,\,$ I think all that would be required would be to examine one bale out of every line; and it is quite possible that, with additional accommodation, that may be accomplished. It would certainly be impossible to carry out such a proposal with the present accommodation, quite apart from the cost.

859. The Chairman.] We are told in evidence that you are enlarging your accommodation very much?—We have enlarged the storage-accommodation, but not the floor-area to a similar extent, and the examination of flax would, of course, require a very large floor-area. At the present time, the examination that is now being carried out keeps two presses constantly going, we charge 2s. per bale, and make little or nothing out of it. Two shillings only covers the expenses. It seems to me to be a very heavy tax on the flax to make a charge of 2s. on every five bales. I think that power should be reserved to open every bale; but I think it would answer the purpose

to simply draw a hank here and there, or to open one bale out of every line.

860. You mean to say 2s. per bale is charged for every bale that is opened?—Yes. For every bale that is opened and has to be repacked a charge of 2s. is made. The bale is thrown down on the floor, opened, and cut adrift, the merchant makes his examination, and then it is repacked in

the press and the hanks readjusted.

861. What is the charge for storage of the flax?—Sixpence per bale for the first two weeks, and 3d. per bale thereafter. These rates came into force on the 1st July.

862. Is there any charge for dumping?—One shilling and eightpence per bale. That is paid by the ship. The storage is paid by the ship, and the dumping is paid by the ship, except in cases where the flax has been sent to America direct, when the charge was, I believe, thrown upon the merchant. In the case, however, of the stuff going to London the shipping companies pay the storage. I may state there is a committee of the Board now sitting, and one of the matters they are dealing with is the storage of flax and wool; and I think, sir, I am justified in saying that they are disposed to recommend to the Board a very considerable reduction. I cannot say positively, because their deliberations are not concluded, but I am quite sure there will be a considerable reduction made.