

general nature touching Canada. But few, if any, of the members of the Royal Institution, or of the Council of the Chamber of Commerce, are connected with the lumber trade. So far as these public bodies were concerned, no opportunity was afforded me of receiving or imparting information worthy of note. I was present at several meetings of merchants, brokers, and timber measurers, both at the South End and at the Canada Docks, also in private offices, and, on every occasion, I clearly proved, to the satisfaction of all present, that string measure, as applied to wany timber, is not only manifestly erroneous in principle but not even uniform in error—its incorrectness varying with every variation in the extent of the wane. I explained that the quarter girth, taken as the side of the square, will not give the true contents of any figure other than a perfect square, and that any figure deviating from the square, the difference between the actual contents and that found by the quarter girth will be in proportion to such deviation. If approaching towards the circular form, the quarter girth will give less than the actual contents, and if of an oblong shape, the square of the quarter girth will give more than the actual contents, and, consequently, the quarter girth is so vague and uncertain, that no calculation can be based on it without a previous knowledge of the shape of the figure the quarter girth of which is given. I illustrated this practically by referring to the measurement of lathwood. In Canada, lathwood is sold by the cord, of 8 feet long by 4 feet high. In Liverpool, it is sold by the fathom, of 6 feet long by 6 feet high. The same length of string, 24 feet, will girth either the Canadian cord or the Liverpool fathom, and yet it is manifest that it requires nine cords to make eight fathoms. How then I asked is a person to know whether it is a cord or a fathom he is to receive if he be merely told the quarter girth is 6 feet?

Here, and afterwards in many other places, I exhibited the illustrative model, designed by me for explaining the difference in the measurement, and have much satisfaction in reporting that all, without exception, to whom I explained it, admitted the correctness of its proof, and admired the simplicity of its construction.

In the British ports, where the string measure is in use, some of the leading members of the trade have had similar ones constructed, by which to explain the errors of their present system to their customers, among whom I may mention Edward Chaloner, Esq., Liverpool, Allan Gilmour, Esq., of Glasgow, and the Messrs. Wade, of Hull. When proving the absurdity of string measure, I expressed my surprise that the trade in England should ever have adopted a mode so imperfect for taking the dimensions. I remarked that it could hardly be expected that the people of Canada would follow a system they knew to be so erroneous while they have this simple method of their own by which to arrive at the true contents of the timber. It can scarcely be supposed that gentlemen so reasonable as the merchants of Liverpool are known to be will long continue to practise a mode so vague and unsatisfactory now that they are aware of the means of ascertaining the true contents.

A most extraordinary rule which obtains in Ireland, as well as in England, was brought under my notice respecting the measurement of ma-