

Much of the gum exported to the United Kingdom has probably been re-exported to other European countries.

With regard to the industrial uses to which kauri-gum is put, your Commission has found it very difficult to obtain any precise information. The general testimony of the men in the trade is that the gum is used mainly for the manufacture of varnish and linoleums, and to a lesser extent for the manufacture of certain kinds of paints. Vague statements that kauri-gum is used for other purposes were made to the Commission, but no definite information is available on the subject. It is clear, however, that any use of kauri-gum other than those mentioned above is of minor importance.

The use of low-grade gums in the manufacture of linoleums is a trade that has developed during the last twenty years; and, owing to the fact that supplies of the "bold" high-grade gum have been in a large measure exhausted, the proportion of low-grade or linoleum gum exported every year has become greater. From information obtained from all the exporters in Auckland with regard to the export for the last two years, we find that 40 per cent. of the weight of gum exported is used for the manufacture of varnishes, and 60 per cent. in the linoleum industry. If, however, account is taken of the amount of dirt and foreign matter associated with the linoleum gums, the weight of kauri-gum used in each of these two industries is approximately the same.

*(2.) Whether it is advisable that there should be a standard grading of kauri-gum for export, and whether the State should control the entire export.*

The establishment of a standard grading of kauri-gum is a complex problem, and it is necessary in the first place to point out that the grading of kauri-gum differs materially from the grading of such products as wool, flax, and butter, on account of the much wider variation in the quality and characteristics of kauri-gum. The question is further complicated by the fact that many of the so-called grades exported are not uniform grades, but consist of a mixture of gum of different qualities. Of the characteristics considered in assessing the commercial value of kauri-gum the following are the chief, if not the only ones considered: (1) Size; (2) colour; (3) hardness; (4) purity. It is to be noted that no scientifically determined properties, such, for instance, as specific gravity or melting-point, are considered.

With regard to the four above characteristics, in the case of gum exported from New Zealand the size varies from that of "bold" gum, several inches in diameter, through various sizes down to that of fine dust. The colour varies through all shades from very pale amber to black. The hardness varies from that of the best dial gum to that of the chalky gum obtained from swamps. Finally, the purity varies from that of rescraped dial gum, which contains no impurity, down to that of chips and dust, containing up to 75 per cent., and possibly more, of foreign matter.

Whereas some of the grades of gum exported are comparatively uniform, inasmuch as they cannot be subdivided into grades of gum of widely differing characteristics, many of the grades exported are in reality mixed grades, the gum not having been completely separated into uniform grades.

The methods of grading at present in use are crude, and from the point of view of description far from satisfactory. They are based primarily on a division into several main classes, depending partly on colour and partly on origin—viz., white gum, black gum, swamp gum, and bush gum. These main classes are divided into a number of subclasses, depending partly on size, partly on colour, partly on cleanness, and partly on the hardness of the gum. Each of these subclasses is further divided into various grades. In addition, as mentioned above, many of the exported grades are mixtures of various proportions of different uniform grades. No system of grading which does not take account individually of the various characteristics of gum can convey an accurate description of its nature and quality.

The preponderance of evidence given in our inquiry was that a system of standard grading was desirable. The opinion of most of the merchants, however, was that though such a system might be desirable, it was, from their point of view,