

Private planting not only benefits the individual, but, if carried out on right lines, it is of considerable advantage to the State, not only in ameliorating the climate and adding to the beauty of the landscape and attractions of the neighbourhood, but in helping to increase the future timber-supply. In this latter regard it is specially important in that these private plantations are much less likely to be damaged by fire than are those of the State; also, as the plantations are in settled districts, the timber is growing just where it is wanted and the cost of carriage is saved.

Long ago the private planter was considered a public benefactor. The Planting Encouragement Act of 1871 provided that any person planting land of 1 acre in extent or over should be entitled to receive in respect of every acre of land so planted 2 acres of rural land of the waste lands of the Crown.

Bearing all the above statements in mind, and believing as we do that the private owner of land who plants trees of a suitable nature thereon under proper forest-conditions is benefiting not only himself but the Dominion, we recommend that the State should encourage tree-planting on the following lines: (1.) That the trees for such be supplied at cost-price by the State nurseries. (2.) That the planting be under Government advice. (3.) That planting by private individuals should be encouraged by the remission of taxes or otherwise on a certain percentage of the total area of an estate which has been planted to the satisfaction of the proposed Forestry Board.

## 2. *Planting by Public Bodies.*

A considerable amount of planting has already been done by local bodies. As for private planting, so here too the trees have almost invariably been planted too far apart. This is in some cases being remedied, and afforestation on more modern lines is now being carried on by the Dunedin City Council and certain of the County Councils. Afforestation by public bodies should certainly be encouraged to the utmost. They, too, should receive trees from the State nurseries at cost-price, and any proposed site for planting should be inspected by an official of the Forestry Branch, who should draw up a scheme.

## 7. AS TO OTHER MATTERS WHICH IN OUR OPINION AFFECT FOREST-CONDITIONS OR WOULD TEND TO TERMINATE THEIR DEVELOPMENT, INCLUDING THE NECESSITY OR EXPEDIENCY OF ANY LEGISLATION IN THE PREMISES.

### (1.) *Matters concerning Afforestation.*

In our examination of the various State plantations the following matters especially attracted our notice as requiring alteration:—

#### 1. *The Method of Fire-breaks.*

Nothing is of greater importance in a scheme of planting than an adequate protection against fire. Already in the brief period of New Zealand State afforestation destructive fires have occurred in the plantations at Conical Hills, Dumgree, and Puhipuhi. Where there are vast areas of bracken fern, tea-tree, or tussock, as in nearly all the areas where the tree-planting must take place, the chance of fire in a dry season is indeed great, and the methods of the European foresters, evolved under different conditions, do not meet the case.

At present the fire-breaks consist of ploughed belts 1 chain in width. These belts surround the plantations, and there are others traversing them from side to side. It has been the custom until recently to plough the breaks yearly, but the present practice, in part at any rate, is to lay them down in grass and keep it closely grazed by sheep. Young plantations are even in greater danger from fire than older ones, for the fern or grass closely fills the spaces between the trees for several years. Recently at Waiotapu the breaks have been constructed, according to the evidence of Mr. Goudie, so that a fire fanned by the prevailing wind should strike them obliquely and not at a right angle.