Puhipuhi Plantation.

On the whole very good results have been obtained amongst trees planted last winter and spring, although the death-rate, which is about 10 per cent., is somewhat higher than it was during the previous year. *Eucalyptus resinifera grandiflora* has fully demonstrated its fast-growing capabilities, the growth of the leaders in last year's planting average fully 6 in. Six different species of eucalypts were planted experimentally. In all about 1,300 trees were used, including *Eucalyptus globulus*, *E. Andrewsi*, and *E. Sieberiana*. The species named have made good growth, but all the others are complete failures.

Trees to the number of 345,310 were received from Rotorua Nursery, but of this number 49,110 were lost owing to delay in transit, the loss in this respect being much less than during the previous year. Of the trees planted, 106,200 were used upon areas previously planted with totara, 40,000 were used for replacing blanks in 1914–15 planting, and 50,000 in replacing failures in the 1915–16 planting. The planting was carried on from June to September inclusive, and the death-rate was greatest amongst those planted in June. Planting cost at the rate of 10s. per thousand.

Vigorous growth has been made by the older trees, some of which have made as much as 1 ft. vertical growth for the season. Pruning was necessary over about 400 acres of eucalypts which had been partly destroyed by fire in 1913. This work cost on the average 4s. 7d. per acre. The clearing and burning-off of 974 chains of boundary and cross fire-breaks cost at the rate of 3s. 7d. per chain. A great proportion of the fire-breaks are now widened out to 2 chains, and will average all through 1½ chains in width. In extending the width of the boundary breaks and clearing cross-breaks it was necessary to cut through fern of several years' growth, thus increasing the cost above normal. Gorse is becoming troublesome, and has cost this season £7 13s. to clear. Every effort will be made to exterminate this plant, which has spread with alarming rapidity over much valuable land in the Whangarei district.

The average number of men employed during the year was 5·78. A record of rainfall and temperature is attached.

Rainfall, Temperature, &c.

Month.	Rainfall.	Number of Days Rain fell.	Temperature.		Number of Days Frosts occurred.
			Maximum.	Minimum.	
1915.	In.		Deg. F.	Deg. F.	
April	3·53	8	70	40	..
May	4·66	13	66	32	2
June	5·00	21	62	32	1
July	6·99	14	60	32	6
August	10·37	17	62	34	..
September	9·70	13	68	34	..
October	7·68	13	70	38	..
November	2·61	8	76	40	..
December	1·05	5	84	38	..
1916.					
January	9·06	9	86	38	..
February	4·51	7	80	48	..
March	8·32	11	80	48	..
Totals	73·48	139	..	..	9

Run No. 24, Rangitikei.

The preliminary work in connection with the afforestation of this sand-drift area was commenced during August last, and although the progress made has been somewhat slow, there has been sufficient work accomplished to demonstrate the possibility of eventually controlling the sand-drift by means of plantations of timber-trees. While a large portion of this land has been fixed by natural and artificial agencies, there is a constant danger of inundation by drifting sand, owing to the uneven nature of the sandhills along the coast-line or western side. As a preliminary, therefore, to the actual afforestation-work it is necessary to create an even foredune by erecting sand-catching fences in the hollows between the sandhills. This work has been in progress continually since August, with the result that on about three miles of the coast-line sand-catching fences have been erected. The material used for these fences was got principally from the beach, which is littered with driftwood. Gorse and scrub have also been used, and, while being more easily handled and better suited for the purpose, the supplies are scarce and have to be carried for some distance. The results obtained are satisfactory. In some places the fences have caused an accumulation of sand 7 ft. and 8 ft. in depth, thus partly stopping the wind-channels and preventing much of the second line of sandhills being blown inland. As soon as the fences became buried with sand others were erected on the top of the drift and it is believed that if this process is continued the dune will in a reasonably short time attain the desired gradient to permit of the planting of marram-grass.