

failures amongst *Pinus Banksiana*, which in this district appears to be difficult to transplant. Apart from this partial failure most of the trees have struck better than usual, and there is a smaller percentage of deaths amongst both *Pinus ponderosa* and *Pinus Laricio*. The latter, however, have made no vertical growth, and the majority will require to remain in nursery lines for another season. Excepting in specially favoured seasons, transplanting into nursery lines has been always attended here by a heavy mortality in stock, and an effort will be made during the coming season to do away with this operation as much as possible. Past experience has proved that by sowing thinly, and wrenching the trees fairly frequently during the third year, a much better class of tree for permanent planting is obtained direct from the seed-beds than that which can be produced by lining out when two years old. To carry out this proposition an increased number of seed-frames would be required; but the reduction of failures to a minimum and the saving of the cost of lining out should more than counterbalance the expenditure involved.

Raising of Seedlings.—Owing to delays in the delivery of tree-seeds, sowing was commenced later than usual, and was done at various times as the quantities came to hand. The results on the whole are disappointing, *Pinus ponderosa*, which usually germinates well, having been a partial failure. The sowing of *Pinus Laricio* seed which had been in stock for at least two years was also attended with very poor results. *Pinus radiata* has done very well, and a fine crop of seedlings to the number of some 345,000 resulted from the sowing of 60 lb. of seed. The latter will be lined out in the spring, a small number being reserved for the autumn to test the possibility of handling them at this season in preference to spring planting. It is feared, however, that the climate is too severe for this to be successful.

Trees to the number of 402,000 were raised from seed, and the total number in the nursery at 31st March was 920,450. Approximately 250,000 trees will be available for transfer to Naseby Plantation next spring.

Formation.—For the purpose of providing new ground for seed-beds and for lining out an area of 5 acres was levelled and subdivided by roads into convenient plots. This absorbed a considerable amount of labour, the ground being so uneven that it was necessary to first remove the whole of the surface soil, which was replaced after the grading was completed.

Horse-feed.—A fair crop of oatsheaf was harvested from 10 acres of spare land, and this, together with the crop from Gimmerburn Plantation, should provide sufficient horse-feed for the year.

Buildings.—Several necessary additions to buildings are now nearing completion, the work having been delayed considerably owing to difficulties in procuring material and skilled labour.

The daily average number of men employed was 6.

Rainfall, Temperature, &c.

Month.	Rainfall.	Number of Days Rain fell.	Temperature.		Number of Days Frosts occurred.
			Maximum.	Minimum.	
1919.			Deg. F	Deg. F.	
April	In. 4.14	13	69	24	10
May	0.75	6	67	19	20
June	1.52	12	64	9	20
July	1.76	8	58	20	23
August	3.19	12	57	22	17
September ..	2.67	10	66	20	15
October	0.55	8	69	27	7
November ..	2.13	12	68	30	4
December ..	2.43	13	86	31	2
1920.					
January	1.21	10	83	32	1
February	1.48	8	90	33	..
March	0.71	6	81	29	5
Totals	22.54	118	..	..	124

Details of One-year-old Trees, sown 1919-20.

Name of Tree.					Number in Seed-beds.	Amount of Seed sown.	Growth.
						lb.	
<i>Pinus radiata</i>	..	..	..	..	345,600	60	Good germination.
„ <i>Laricio</i>	..	..	..	..	22,100	50	Old seed.
„ <i>ponderosa</i>	..	..	..	..	34,300	60	Very uneven.
Total	..	..	..	..	402,000		