Mr. J. Donald's purebred Friesian, Westmere Princess Pietertje, established a new milk and butter-fat record during the year not only for her class, but for her breed and the Dominion as well. Her record of 24,199 lb. milk and 939.78 lb. butter-fat gave her the position of champion of New Zealand and leader of the junior four-year-old Friesian class.

### Herd-testing Associations.

The association testing of cows in dairy herds has been continued by the Division at Kaupokonui, Joll's, Okitu, Kia Ora, Cheltenham, Woodville, and Riverbank, and newly undertaken at Ngaere, Hawera, and Te Rehunga. In addition to this, private employees of a number of dairy companies have done a considerable amount of testing. It is expected that when more labour is available extension of the work of testing dairy herds will be forthcoming. The figures available suggest that in addition to purebred cows some seventeen thousand cows in ordinary dairy herds have been on test during the past season. The dearth of labour on dairy farms is reflected in the decrease which has occurred when this number is compared with the 26,700 on test during the 1917-18 season.

#### STAFF.

This report would be incomplete without some reference to the good work done by the officers of the Division during the course of a busy year. It is therefore desired to mention that all officers connected with the technical activities of the divisional work have taken a keen and lively interest in their respective duties. Their efforts to assist those engaged in the dairy industry have been attended with a large measure of success, and have evidently been appreciated by the producers. The clerical officers have also given close and prompt attention to their duties throughout the year, thereby greatly contributing toward a united effort to render efficient service to the country.

# HORTICULTURE DIVISION.

## REPORT OF THE DIVISIONAL DIRECTOR.

The Director-General. Wellington, 13th May, 1919. 1 HAVE pleasure in submitting the annual report of this Division for the year ended 31st March, 1919

T. W. KIRK, Director.

### Introduction.

The work coming within the scope of this Division has been carried out during the year as well as was possible considering the altered conditions caused by the Great War. The following are the principal activities dealt with by this branch of the Department:—
(1.) Instruction in fruit and vegetable production; inspection of orchards, vineyards,

gardens, and nurseries, and affording information as to the most up-to-date methods of controlling diseases and insect pests; also giving advice as to suitable varieties of fruit, vegetables, &c., to plant.

(2.) Demonstrations and instruction in the grading and packing of fruit, and in pruning and spraying.

(3.) Testing new brands of spraying-compounds for the purpose of ascertaining their efficacy under local conditions.

- (4.) Affording advice on the preserving of fruit and vegetables both for commercial and
- domestic purposes; cool storage; advances under the Fruit-preserving Industry Act. (5.) Advising on tree-planting; giving information as to the most suitable varieties of trees to plant both for shelter and timber purposes in different localities.

  (6.) Control of the horticultural stations at Te Kauwhata, Tauranga, and Arataki.
- (7.) Registration of all orchards and nurseries in the Dominion.

(8.) Orchard-tax: Issuring of tax-demand notices, &c.

(9.) Inspection of all imported fruit, plants, vegetables, bulbs, &c., at the ports of Auckland, Wellington, Christchurch, Dunedin, and Bluff; also inspection and grading of all locally grown fruit, plants, vegetables, &c., intended for export.