

CROP ECONOMICS.

So much for this brief discussion of a few of the contributory factors to fertility; but knowing what is essential thereto, and having the means of commanding it, the farmer has only very partially acquired the secrets of his business. Given a soil rendered suitable for production by nature or by the application of enlightened methods, there remains a vast category of points to be decided: What to grow; how to grow it; when to grow it; how to use the immediate product of the soil to the best advantage; how far it is wise to spend money in increasing production; in what directions to spend it; and so forth. I shall endeavour within the space at my disposal to deal with some of the more important of these matters.

"What to grow" is a fundamental question, and as a preliminary to answering it let us see what the farmers of the North Island actually do grow. From the agricultural and pastoral statistics available I have made calculations showing the approximate allocation of live-stock in terms of sheep, ploughed grass, surface-sown grass, unimproved land, cereals, roots and green crops, and orchards and plantations, over an average 1,000 acres in each of the land districts of New Zealand. The position is shown in the following table:—

Table 1, showing the Approximate Apportionment of an Average 1,000 Acres of the Land in Occupation in each of the Land Districts of New Zealand.

Province.	Carrying-capacity.	Ploughed Grass.	Surface-sown Grass.	Un-improved.	Cereals.	Roots, Forage, Crops, and Fallow.	Orchards and Plantations.
1,000 acres.	Sheep.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Taranaki ..	2,100	150	600	221	8	19	2
Wellington ..	1,900	80	612	284	8	14	2
Hawke's Bay..	1,580	112	440	427	7	12	2
Auckland ..	1,260	103	326	545	7	15	4
Canterbury ..	930	220	78	580	73	44	4
Nelson ..	620	60	180	731	13	10	6
Otago ..	580*	103	29	820	24	23	1
Southland ..		230	40	632	45	52	1
Marlborough ..	530	41	173	764	15	6	1
Westland ..	240	10	76	911	less than 1	less than 2	less than 1

* Otago and Southland combined.

An analysis of two statistical summaries, 1906 and 1911, for the North Island, indicates the trend of farming, and is shown in Table 2.