The increase in financial returns from ewes because of the development of the fat-lamb industry has resulted in an erratic but distinctly downward trend in wether numbers from about 4,000,000 in 1920 to less than 2,500,000 in 1947. This declining trend was most noticeable after severe falls in crossbred-wool prices. At the present time the development of the pumice land by the State requires large numbers of wethers, and in this area increases have been recorded in recent years. In some localities numbers have been influenced by wether country being improved to carry ewes or, alternatively, deteriorating and going out of production.

The need for run cattle for pasture and fern control has been more appreciated of recent years, but the practice varies considerably over the North Island. It is generally considered that about one cattle beast to ten sheep shorn is the standard ratio, but in the lower rainfall districts such as the East Coast the ratio is about one to twelve, whereas in the King-country and North Auckland the proportion is one to eight or less. The alternative to the use of cattle on danthonia country is the practice of summer burning, but as this inevitably leads to complete reversion to scrub or gorse it is no longer the practice except on poor steep hills such as in Coromandel or Hutt Counties. (In Hutt it is used mainly to reduce gorse.) In the eastern districts cattle numbers have increased substantially since 1930, offsetting in general the decline in sheep. Because of the greater increase in sheep on the low country where the necessity to run cattle is not so great, the over-all picture is rather obscure.

The introduction of sheep in dairying areas has been a feature since 1935 in the Waikato and some other areas, but not in Taranaki. The majority are purchased as five-year ewes for fat-lamb production, but the fattening of store lambs accounts for an appreciable number. On fat-lamb farms the normal practice is to purchase store cattle, mostly beef breeds, to fatten on surplus growth. On some hill districts adjacent to dairying areas young dry dairy cows are required for pasture and fern control. These are put in calf and sold back to dairy farmers.

## (b) Main Classes of Sheep Country

Since the annual statistics are collected on a county basis, the discussion of live-stock figures has been confined to regions comprising groups of counties where sheep-farming is on roughly similar lines. Actually, farming may be better classified into five groups:—

- (1) Country Where Farming Has Not Been Successful.—This country consists of steep and broken land in high-rainfall areas, often with poor soils. The chief areas are in the northern and southern portions of the King-country. Failure to secure a successful burn after the first felling of the bush made reversion to scrub inevitable, since there was no possibility of a second burn until scrub growth was dense and tall enough to supply a good ground cover of ash.
- (2) Surface-sown Hill Country Presenting Problems of Deterioration.—This includes most of the farmed hill country of the North Island. The general problem is one of changing the country from a naturally deteriorating condition to an improving one. The approach to this problem lies in the following: (i) introduction of clovers into pastures; (ii) the effective use of cattle; (iii) aggregation of holdings into workable units; (iv) more subdivisional fencing; (v) the application of fertilizer by hand or the spreading of fertility by means of the grazing animal; (vi) the improvement of ploughable areas; (vii) the extension of access tracks by bulldozing and by scrub-cutting.