rate—one could get up to the standard of a milking-cow to  $2\frac{1}{2}$  acres. That means a comparatively small holding. There is a point that has not been particularly mentioned by many of the witnesses. Most of the witnesses have stressed the point of the bad weather conditions that are experienced in the pumice country. One admits that the seasonal conditions for dairying at a moderately high elevation on the whole will always be worse than at a lower elevation, and that unseasonable frosts do occur over the whole of the pumice country that is under discussion; but one really has to view it rather from what one can do with regard to badness of climate rather than say merely that the climate is not very satisfactory. One has an idea that on each individual holding the evil effect of the seasonal conditions can be brought down to a considerable extent, and this will naturally tend to increase the development costs of each holding. Another point that one has to take into consideration is the fact that the pumice country does vary considerably as regards quality. There are areas of the pumice country that look distinctly attractive for settlement; there are areas that look distinctly unattractive. I am pretty sure that the total area can be developed, even at a considerable loss, if you actually take into consideration the whole of the expenses in connection with it will not be anything like as large as a good many people imagine. I have not any actual knowledge of the exact area, but it certainly does not run into the millions of acres that are so loosely spoken of from time to time. What does strike one as very remarkable in this development of the pumice country is that even within moderate range of the present railhead at Rotorua-even within moderate range of the Taupo Totara Timber Co.'s line-settlement has not progressed very rapidly, indicating to my mind that transit conditions are by no means the main limiting factor in the development of this country. I will say once again that the main limiting factor in the development has been the general idea that the country can be broken in extremely cheaply, and that when you come to work it in you find that it costs a lot of money. That has, without doubt, had a very great deterrent effect upon settlement. I view with considerable trepidation Government schemes of breaking in country. I would not mind having a go at breaking in pumice country if I were not a Government officer, but as a Government officer I do not like the idea. It has to be remembered that if the Government breaks in this country it has to pay full wages for all the work that is done, and I doubt if any waste land in New Zealand that has been brought into production has paid wages to the pioneers who have broken it in for many, many years. If the group settlement mooted could be arrived at, whereby a good deal of the labour of the men breaking the country in can be, as it were, invested by them, and not paid for until such time as it is really productive, I would view the Government breaking-in of such land very much more hopefully than I do at the present moment.

10. When I asked my question as to the cost of £30 an acre, I was thinking about the cost of buildings?—I was reckoning the buildings at about £5 an acre, running to about £750 for a 150-acre

farm. That is the general estimate I have in mind.

11. It has been suggested that there is a shortage of water. It may be suggested that irrigation would meet the case. Would channels hold water, considering the porous nature of the country?— I should say the channels would silt up pretty rapidly, and carry the water all right. The question of watering is largely the business of a water engineer, which I do not know anything about. I want to emphasize the point that the country is not well watered, and it is of no use to say that it is—that is, for small holdings.

12. And there is the possibility of the water having to be carried in pipes instead of in channels, owing to the porous nature of the plains?—To a great extent, yes. Particularly one has the feeling that the water point is of such importance that one would like to see exhaustive work in connection with finding out whether boring over some of the inland plateau is not a possibility. That question

might be extremely important.

13. You think that from the national point of view this land will have to be brought in. Are you of opinion that we should work on that line in preference to the subdividing of the more or less semi-improved areas? From which, in your opinion, would we get the greatest immediate return?—One unhesitatingly says the improvement of the country developed or the partly developed country outside the pumice area offers very considerable opportunities, but one of the great difficulties ahead of that is that the initial cost, actually straight off the reel, would appear to be so great as perhaps to make the pumice-land settlement appear to be for some years to come a cheaper proposition. We will assume that half a million acres of pumice land can be brought into close occupation. That would mean an expenditure of perhaps twenty or thirty millions—the final sum, of course—but because it would not have to be paid for straight off it might be started by the Government. The purchase of improved land would mean a very large initial expenditure, and anyhow you would have to pay too much for the land. If you could secure land capable of subdivision, and not above its productive value, the development of improved land would appear to offer a better immediate chance of putting large numbers of settlers on to the country than the slow improvement of the pumice country.

14. You are aware that we have possibly millions of acres of semi-improved land in New Zealand?

-Yes, awaiting capital to develop it.

15. So there is no great immediate need of looking for this extensive undeveloped area ?—No; but the view very currently held is that the pumice country is an extremely good economic proposition to work on. That is a view that I do not hold.

16. Mr. Kyle.] You say that for many years waste land has not paid the pioneers to bring into productivity?—You mean in times gone by? What I mean is that the pioneers do not get paid for their labour for many years.

17. Has not that occurred on most of the lands of New Zealand?—Absolutely; but if the Government starts developing land it will have to pay for the labour from the start. If, under a Government scheme, one could secure the pioneering determination of the settler, Government development would be a success.