

	Days.	Pounds Butterfat.
Highest individual herd	324	518.93
Lowest individual herd	236	87.10
Highest individual cow	296	660.83
Lowest individual cow	214	47.90
Average daily production of butterfat per cow ..		1.0355

For purposes of comparison it may be mentioned that for the season 1921-22 there were included in a similar summary 9,101 cows, averaging 271.48 lb. butterfat in 261 days. This year's figures from 18,747 cows show a decrease of 4.38 lb. butterfat and 3 days, but, considering the greatly increased number of cows, this may be regarded as almost negligible.

Comparing those associations which were in operation during both the two last seasons and for which summaries on the 210-day-and-over basis were prepared, it is found that twenty out of a total of thirty-two show an increase for last season over the preceding, while the remaining twelve show a decrease. The largest increase was one of 54.76 lb. butterfat on an average yield of 228.70 lb., which represents 24 per cent., the average days being practically the same. The largest decrease was one of 82.62 lb. on 326.22 lb., or 25.3 per cent. This was probably due to the number of days being less, and to the fact that many new herds had joined the association, while some of the old ones had fallen out. It must also be kept in mind that 326.22 lb. butterfat is a high average, and is therefore more susceptible to seasonal and other influences. This case is typical of the twelve associations which showed decreases, since all had been running for four or more years, with the exception of three, which had been in operation for three years, the decreases for the latter three being small. It has been noticed that after the third or fourth year of continuous operation association averages will often be found to go back somewhat. This may be accounted for by the fact that after three or four years of testing, with its resultant culling and selection, the average production of a herd reaches that stage where further increase is difficult, and where feed, care, and general conditions bear a more marked influence. About this stage also we find that the personnel of the older-established associations changes, many of the original members discontinuing—for a time at least. This also tends to decrease the average, which in due course will, as the result of culling and selection in the newer herds, rise again. It is this changing of members which makes it difficult by means of figures relating to association averages to truly show what improvement has been effected, the newer herds nullifying the increases in the older.

Comparing the same thirty-two associations referred to previously, it has been found that as between the two past seasons there is an increase of 1.8 per cent., the average production having risen from 271 lb. butterfat in 261 days to 275.87 lb. in 263 days, the number of cows being 8,140 and 7,899 respectively. To obtain the true course of an association's activities, however, it would be necessary to compare the same herds, rather than the same association, from season to season. Could this be done we feel confident the figures would show a larger increase.

It has been estimated that the average dairy cow in New Zealand yields approximately 168.42 lb. of butterfat per season, while the