Grain for Cows on Grass

E. L. Anderson, Oxford Co., Ont.

SHALL we or shall we not feed grain to cows on pasture? I have found that cows in luxuriant pasture will not respond to grain feeding. Luxuriant pastures, however, are now the exception and the most of us have to choose between a seriously decreased milk flow or supplementary feeding. Soiling crops, such as oats and peas, sown early in the spring, will fill the gap between pasture and after grass or corn. Even if feeding these, however, I favor a little grain in that the water content of soiling crops is so high that the heavy milking cow cannot eat sufficient to meet her food requirements. Along with soiling crops I believe that grain will increase the milk flow just about enough to pay for the extra feed. On looking up the subject recently I found that an experiment conducted at Cornell University substantiates my views on the value of feeding grain to cows on pasture.

In the experiment to which I refer a herd of cows owned by a New York farmer which had been lightly fed during the winter, were divided into two lots of eight each, all grazing on the same pasture. Each cow of lot 1 was fed four quarts daily of a mixture of two parts corn meal, one part wheat bran, and one part cotton seed meal by weight. The test began May 23rd. August 10th, the pastures being poor, both lots were fed green fodder corn and later green millet was substituted for the corn, and later still meadow grass and pumpkins in generous quantity. Even if the cows got no grain feed they would have been much better fed than are the cows on most farms. The trial lasted 22 weeks.

The eight cows in lot No. 1 were given 5,200 lbs. of grain and gave 4,931 lbs. or 28 per cent. more milk than those getting no grain. Both lots gained in weight, the grain-fed cows showing the greatest gain. I believe that had these cows not received soiling crops, as is the case on most farms, that the grain feeding would have shown much greater returns.

The man who feeds grain to his cows on short pastures receives another benefit. He is working for future results. The following year the same cows that were used in this Cornell University experiment were back on pasture as usual with no grain. The cows in lot No. 1 averaged 16 per cent. more milk than those in lot No. 2, and it seems reasonable to assume that this increased production was due to the grain fed the preceding year. It was noted that the grain fed two-year-olds and three-year-olds developed into better animals than their stable mates having no grain.

I find that similar experiments have been conducted at other stations with results on a par. The extra grain increased the milk flow just about sufficiently to pay the cost of the extra feed. In none of these cases, however, was the grain fed to animals on dry pasture with no other supplementary feeding.

I myself find that cows in good pasture will not eat any grain unless they are exceedingly heavy milkers. With an abundance of soiling crops they do not eat much. But were I to fall short of soiling crops, I would not hesitate one minute to feed grain to my cows, both for present and future results. The amount to feed can only be determined by the use of the scales, making careful note of the results in milk flow, according to the grain fed.

Keep Cows Housed

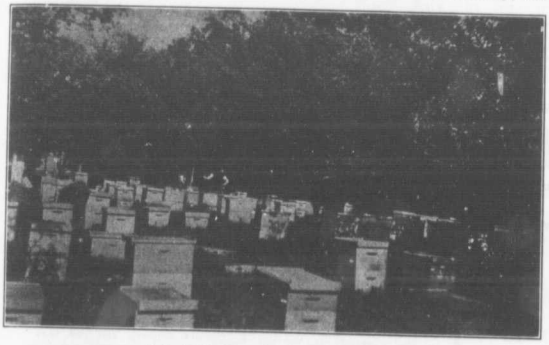
A. McLaren, Northumberland Co., Ont.

OUR experience leads us to believe that cattle, particularly dairy cows, do much better if kept in the stable on exceedingly hot days. Heat and flies are not conducive to milk production, or to cow comfort. Hot weather is even worse. On many farms there is no water in the pastures and cows have to come all the way to the barn to get a supply.

It seems reasonable to believe, and it has proved true in my experience, that dairy cows in a darkened stable, well ventilated, and with water constantly before them, give more milk and keep in better thrift than when they are turned out to pasture. We feed our cows anyway so they are not at any disadvantage when not on the pasture. They are always on pasture at night.

My ideal pasture is one with a thick grove of trees and a stream running through it. Under conditions such as these it would not be necessary to house the cows during the day. Until we get such a pasture, however, we will depend on stabling by day and pasture by night with, of course, supplementary feeding.

Just think what possibilities there lie in every 12 or 14 year old boy on leaving school if he knew the secrets of the weeds, the soils, the grains, if he had been stirred into experimenting for himself through simple experiments that the schoolmaster had initiated him into.—Prof. S. B. McCready, O.A.C., Guelph.



A Profitable Apiary Located on a Town Lot

Mr. U. H. Bowen has a farm of limited size, his apiary being on a town lot in Niagara Falls, Ont. Mr. Bowen has been troubled with foul brood for a couple of years, but is taking active measures for the eradication of the disease. In the illuseration Mr. Petitt and a couple of trained inspectors may be seen searching the hives for evidences of the disease.

Dominion Aid to Farm Forestry

THE Dominion Government is taking an active interest in farm forestry. Farm and Dairy recently had a call from Mr. B. R. Morton, with the Forestry Division at Ottawa, who gave us some interesting facts about the work of the Department with which he is connected.

"Our work so far as it affects Eastern Canada," said Mr. Morton, "is largely of an advisory character, and mostly carried on by correspondence. Farmers write to us telling of their problems, and we advise them as to the best course to pursue. Occasionally, special arrangements are made whereby we visit a farmer's wood lot, mark trees for cutting, give advice on planting, and so forth. In such cases the farmer must pay travelling expenses."

It is in the West, however, that the Domision Government is most active. "We don't give away trees in the East," said Mr. Morton, "but in the West we have given away thousands. There everyone who gets trees is visited once before planting and then again after he gets the trees the following spring. In this second visit he is given advice on planting. The summer after planting he gets a third visit, with advice on the care of the trees. If it is found that the farmer has taken good care of his trees he is recommended to get a second shipment. Occasionally men are kept on our list for supervision for three or four years. I might mention that practically all of the forestry work done in the West is being done by the Dominion Department, there being little provincial work done."

THE WORK IS POPULAR.

"How are the people taking hold of the idea?" we asked.

"We can't supply half enough trees," was the answer. "We have to limit all as to the number of trees they get and the number of times they get them. So far one man is only allowed two consignments of trees. Most of these trees are planted for shelter belts, many more are planted for beautification. Very few farmers have planted purely for fuel supply, although some have."

"Could fuel be properly grown in Western Canada?" we asked.

"At our nursery at Indian Head," said Mr. Morton, "we keep track of cost of planting, cost of cultivating, rental value of land, and so on. From a piece of Russian poplar planted four feet apart each way in 1906, we cut 18 cords of firewood an acre in 1914. The poorest cordwood will sell at $4 while the best cordwood will sell at $7 a cord. I forget the exact figures, but I know that we made a profit on the fuel crop. This was not considered to be ripe for cutting but a fungus disease was getting in and it had to be cut. A few years more and we would have gotten larger revenue and greater profits."

The conversation then switched back to Ontario and we were soon discussing the advisability of a farmer growing his own fuel. Mr. Morton estimated that an average acre of woodlot would produce 6 cords of wood a year, and with right management, 7 to 8 cords. We did not see where such a return as this would yield a profit on the investment.

"I will agree," said Mr. Morton quickly, "that a man can get more from land by cropping than by forestry, but suppose that on the farm there is a steep or stony hillside. Can he not keep that in bush to advantage?" We agreed that he could.

CARE OF FARM WOOD LOT.

In speaking of the care of the farm wood-lot, Mr. Morton said, "People have an idea that young trees aren't worth anything. The first object of our work is protection. We are advocating that cattle and sheep be kept out of the

(Concluded on page 6)