

question from a practical standpoint, when I say that as far as is at present known the greatest saving of nitrates is effected by applying the dung fresh. The straw in such manure will not become plant food immediately, but it will give valuable mechanical action, and will gradually be converted to the purposes of fertility in the soil. If, however, the land treated with fresh manure should remain uncovered in the summer season there will be a great loss of soil nitrogen, as these bacteria of the manure noted are very active brownies, and will transfer their energies to the soil. But we also have some friendly microbes assisting us in the soil, whose function is to convert the nitrogen of the atmospheric air into soil fertility, and to render them active we apply phosphate, which is a combination of phosphoric acid and lime. Experiments made very carefully resulted in the getting of one-fourth more crop from the land on which fresh manure was used, as against rotted manure, and the land on which the fresh manure was used gave considerable more than double the increase in yield over the unmanured portion than did the part having the rotted manure. Another point of undoubted importance is the bringing into action of the mineral elements of the manure, so that they may become available for plant nutrition and not be temporarily or permanently rendered inactive. Large quantities of the fertilizing material returned to the soil on farms is wasted in this way, and becomes an addition to what is termed locked-up fertility.

Prince Edward Island Notes

The weather for the last week has been cold with north winds and showers of rain, and very little has been done in the digging of potatoes. In fact, the majority of farmers have not dug more than two or three days yet. While a few individual farmers have a good crop, the majority have a very poor crop. Taken as a whole, the crop of potatoes in Prince Edward Island is the worst for years, and the price is away down, only eighteen cents per bushel. I have never known the farmers of this province, and the maritime provinces generally, to be in such sore straits. There never, in the history of farming in this province, was such poor all round crops as in this year. In other years some one crop would be good, though all others would fail. If potatoes were poor, wheat and oats would be good, but this year all crops, without distinction, are comparative failures, and how our farmers are to meet their obligations this fall is, indeed, a problem. In this Island oats have always been the chief money crop. This year it takes, on an average, from three to four hundred stalks of twelve sheaves each to thresh one hundred bushels of grain, that will not weigh more than twenty-five pounds per measured bushel. True, the dairyman has not much reason to complain, neither have those engaged largely in the bacon trade. The milk flow has not perceptibly diminished, in fact, the cows give as much milk now as they did in July. There are now no flies nor heat to lessen the milk flow, and the pastures are fine and abundant. The price of cheese is good, nine and a half cents is now being offered for best quality. Bacon pigs are worth \$4.50 to \$4.75 and the chief packers say they will be worth \$5.00 by the end of the present month. But where is the feed to produce the bacon? Prince Edward Island pigs have always been fattened on boiled potatoes and grain and bran mixture. This year there is neither potatoes nor grain to fatten them, and the turnip crop, of which a large heath was sown this season, chiefly for hog feed, turns out a miserably poor crop. So thus, all in all, there is practically no avenue of escape for the farmer this fall. The result of this season, however, may be a blessing in disguise to our farmers, as it will teach them more strongly than ever the oft-repeated truth of the fallacy and the dangerous possible outcome of grain and root growing for sale—of selling the farm by the bushel to the produce speculators. The result of this season will teach the farmers of the Maritime Provinces that their only salvation is to keep their raw products at home, and manufacture them, themselves, into beef, butter, mutton, lamb, eggs,

bacon, etc., and the more skill they can put into the manufacture of these products, the better they shall be rewarded.

Hermanville, P.E.I., Oct. 14th.

J. A. M.

Economy in Feeding and Caring for Poultry

Written for "Farming" by J. E. H., Mt. Albert, Ont.

We read very little about economy in feeding poultry. I do not mean by economy, however, to stint the fowls. Not at all. But a dollar saved is a dollar earned, and I have seen so much extravagance in feeding poultry that it leads me to mention this subject.

As long as one variety of food gives satisfaction it pays to use it. But when it does not give satisfaction something else must be done. Economy does not mean to go without food or to stint the fowls, but it means to get the best for the best results. If your hens are over fat, and don't lay because they have had too much corn, or other strong food, it is economy then to change their ration. Oats are, perhaps, the cheapest food that can be bought at present, but they are not cheap at any price if they don't bring good results. Meat is cheap at most any price when eggs are scarce, for it is one of the very best egg-producers, especially when fowls are confined and cannot get worms and insects, for which their system craves.

Hens, like men, like a variety of food, and they will not do well very long on one variety of grain. Variety is the spice of life, but they cannot live on spice alone; there are other items in the bill of fare, such as industry, application, perseverance, and good common sense. The months for high-priced eggs are slowly drawing on, so we must begin to use some of that common sense in feeding for the best results.

If your aim is eggs, feed for eggs; if it is fat, feed such feed as will produce fat; know just what you want, and feed for it. I have seen people feed all, and even more, oats than the fowls would eat up clean three times a day, and then condemn their hens for not laying, or, on the other hand, expect their fowls to be ready for market when fed only on a fair egg ration. This is an important question, and one that needs a great deal more attention paid to it.

But why not economize a little and raise a variety of food for your poultry? Of course, farmer poultrymen raise all their feed, but they fail to raise variety enough, and fanciers, with only small lots, could raise quite a variety of feed if they only thought so. Buckwheat can be easily raised, and produces a fair quantity of fine feed for laying stock. It can be sown on hilly or rough lands, and if the farmers would only take a little time to prepare the ground it would more than pay them in the end.

When the fowls are confined during the winter months we should try to imitate summer conditions as near as possible, in so far as the poultry are concerned. The floor of the poultry house should be kept covered with a litter of cut straw or chaff, and the grain ration thrown in the litter, in order to make the hens scratch for their feed. In feeding poultry we must remember that plenty of exercise is one of the most important points, and a point, too, that is quite frequently neglected. How often do we go into a poultry house and see the floors bare except for dirt and the grain the fowls have left. Often too the roosts are made by putting two rails up against the wall and the cross pieces fastened to them one above the other, and every crack or crevice filled with lice, which, under such circumstances, must be on the fowls. How, then, can we expect to get good results from the fowls when thus treated. It is economy, then, to fit up a poultry house in a way that will be comfortable for the fowls and free from lice. No man can get the best results from his fowls when they are infested with lice.

When the fowls have plenty of exercise, and their quarters kept clean and free from lice, and fed properly, not