

FATTENING LAMBS ON RAPE.*

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Gain Per Head on Rape.

The results of our experiments in fattening lambs on rape show that the average gain per head weekly has been two and one-half pounds. About one pound of grain per head daily has been the average amount fed with the rape. Using our results in a conservative way, it may be said that if forty lambs are used to feed off an acre of rape, and given some pasture and an average of one pound of grain per head daily, they will produce at least 400 pounds of mutton from the acre in one month.

Pasture Necessary With Rape.

The attempt should never be made to feed rape to lambs without giving them a couple of hours' grazing on pasture before turning them into the rape. This is necessary for the safety of the lambs, as they are otherwise very liable to bloat, and the combined feeding of pasture and rape results in better gains.

The Use of Hurdles.

For folding lambs on rape it is advisable to use hurdles. Using these, the lambs may be confined to a small area until they have become accustomed to the rape. In this way further guards are thrown up against danger from scouring or bloating, which are two troubles that must be watched for in rape feeding.

Management of Lambs.

Before the rape feeding is begun, it is necessary to dock and trim the tails of the lambs. If they have been on poor pasture, it is advisable to begin feeding them grain and keeping them on pasture for a week or so before allowing them on the rape. Then accustom them to the rape gradually. Before they go on the rape at first, let them have pasture during the forenoons, and then turn them on the rape for a short time in the afternoon. The lambs should be watched when on the rape, and if any of them show that they are getting too much of it by the swelling of their stomachs, they should all be driven from the field. After following this plan for a week the time of pasture feeding may be reduced to about two hours' duration in the morning. Under no circumstances is it advisable to attempt to feed rape alone, for such a policy will almost invariably result in the loss of some lambs.

Careful Grain Feeding Necessary.

In addition to limiting the amount of rape and also feeding pasture in connection with it, carefulness should be observed in beginning the feeding of grain. One-half pound per head daily is liberal feeding at this time, and if the lambs will not eat that amount with a relish, less than this should be fed. It is advisable to feed some grain with the rape and pasture to fatten lambs. The safest grain to begin with is oats, but as oats are not very fattening in their nature, corn should gradually take their place with such other food as peas and oil meals, if these are available at reasonable prices.

Troubles That are Apt to Occur in Rape Feeding.

The most common trouble is hoven or bloating. This is produced by the lamb eating too much succulent food. It ferments in the stomach, and the gas accumulating causes the distension of the left side, which is the first sign of the appearance of bloat. When noticed in its first stages, the lambs should be at once removed from the rape. Spirits of ammonia or hartshorn is the best medicine to give at this stage. A tablespoonful of spirits of ammonia given in one-half pint of warm water will usually lead to the reduction of the swelling. If the trouble has advanced so far that the lamb is down and the stomach very notably distended, then it should be punctured at the point of the greatest swelling with a trocar and canula. By watching the lambs when first put on the rape and giving them spirits of ammonia in due season, the trouble is easily met. However, there are some lambs that may be subject to this trouble in a chronic form, and bloat without much cause. When the lambs scour, it is because they are getting too much rape and too little pasture or oats. To counteract this looseness of the bowels, keep the lambs longer on the pasture.

Feeding Rape to Lambs Previous to Fattening.

When it is the intention to feed lambs during two or three months of the winter season and put them on the January market, we have found that a month's run on the rape field previous to the shed feeding seems to have a beneficial influence on the subsequent fattening. Not only do the lambs make a satisfactory gain on the rape, but when put in the shed to feed we have found that they are in better condition to be fattened, and make better gains than those that have only had pasture before being penned.

THE POSSIBILITIES OF THE POULTRY INDUSTRY.

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(Prepared for the Farmers' Institute System).

I am glad to find that the farmers of the province generally are beginning to pay more attention to their poultry. We certainly cannot afford, at the present prices of farm products, to keep anything that is not giving a profit, where it is possible (as it is with poultry) to make a profit. While it is a fact that every farmer keeps hens, hens have not been kept and cared for with the same intelligence as the other live stock on the farm has been kept. It is for this reason, and this reason only, that we hear farmers say so often, "Poultry do not pay!" If we are going to make our poultry pay, we must feed the proper feed; but this does not mean an expensive diet. We must give our poultry suitable shelter during winter; we must never in-breed, but breed intelligently; and we must not look to hens over two years old, or late fence-corner-hatched chickens for our winter eggs.

While I believe that, everything taken into consideration, pure-bred fowls are the best to keep, yet I do not consider it necessary to have a pure-bred flock in order to have a profitable flock. Any flock of hens can be greatly improved by using pure-

bred males and selecting your best layers each year from which to raise your chickens. To put a flock on a paying basis, kill off all old hens in the fall. They are generally quite easily picked out about December 1st, or earlier, as many of the oldest will not be thoroughly through moulting. Even if they are through the moult, they will be pale and old-looking. Also get rid of all late-hatched chickens, for these will eat many times more than they are worth during the winter.

Early-hatched, well-grown pullets, then, and yearling hens, are the only birds you should keep in your winter flock of fowls. A flock of hens of this description are bound to prove profitable under proper management. They should be fed a variety of food composed largely of vegetables—not grain three times a day—and be made to lay right through the winter when a good price can be obtained for eggs. It costs less to feed hens on the proper food during winter than to feed them all the grain they will eat, as is so often done; and, besides, you have many times more eggs, which alone will certainly pay you well for the little extra trouble you take.

Do not crowd your birds together. Six square feet of floor space should be allowed for each bird, and not more than fifty should be kept in one flock. Give them more room if you can, and they will do better. From actual experience I have learned that a flock kept in small quarters on the best of food will not lay as many eggs as a flock half the size in the same quarters, and they will eat twice as much feed.

Another common mistake is breeding from the whole flock instead of choosing ten or twelve of the very best layers, and breeding only from them. No live-stock can be so rapidly improved, when properly handled, as poultry. By selecting only the best layers for breeders, and mating to suitable pure-bred males, the average egg production of whole flocks, has, in a very few years, been raised from 150 to 250 per annum, and even as high as 300 has been reached by a few hens. When we remember that the average egg yield of the hens of this province is considerably under 100, we can readily see that there is vast room for improvement. The first great step toward improvement will be made when nothing but early-hatched pullets and yearling hens are kept in our flocks. The next step will be proper housing and feeding. When we have taken these two steps forward we will, I feel certain, have increased the egg yield of our poultry nearly, if not quite, 100 per cent. We can take these two steps without any extra cost beyond the very trifling one of making our buildings more comfortable. I am anxiously looking forward to the day when these improvements will be made on every farm in our province. Then will be the last day on which the remark "There is no money in hens" will be heard.

The other improvements will not be made so quickly, but they can be made just as cheaply. Select your best layers *only* for your breeders year by year, and mate with them a pure-bred male of the best variety you can get. If you are breeding a pure-bred variety, do the selecting just the same. Every

poultry-house should have a pen set apart for a breeding pen, into which put ten or twelve of your best females and your breeding male.

Do not on any account allow a male to run with your general flock that are laying eggs for market or home consumption. Be sure that every egg you send to market is infertile. It is not very long since it was considered impossible to ship eggs from Canada and have them arrive in the British market fresh. Results have proved this untrue, and we find by the last returns made by the British Agricultural Department that Canada supplied Great Britain with about \$750,000 worth of eggs during twelve months. This is a very encouraging outlook for us, especially since circumstances on every hand are forcing us to look to Great Britain as our market. With fast steamship service and cold storage, everything is favorable toward promoting an extensive trade with Great Britain. We must do our part, and these is no doubt that we will profit thereby. We must send nothing but the very best we can get in quality, size and appearance. I would especially emphasize the *quality* as the most important thing necessary to obtain quality is to see that every egg that reaches Great Britain is infertile.

Great Britain spends annually nearly \$15,000,000 for foreign eggs. Of this amount France supplies one-third, or \$5,000,000. The little country of Belgium (just look at the size of it on the map) sends \$3,500,000 worth, and little Denmark over \$2,000,000 worth. Just think of the amount of wealth these countries derive each year from the work of the much-abused little hen! Look what we are doing with our cheese in competition with these countries! Am I saying too much when I say that we can compete equally well with them in the egg trade? I do not think so.

STORING POTATOES.

Editorial in Wisconsin Farmer.

The potato crop is not large this year, a fact which makes it all the more necessary that growers take good care of what they have and keep them in first-rate condition for the good, strong prices that will be likely to prevail during the winter and spring. If potatoes are buried, they should be covered only moderately at first, additional covering being added as the weather becomes more severe. Burying, however, is one of the most inconvenient ways of preserving the potato crop, and when potatoes are worth anything, it is also likely to be one of the most expensive. Storage of potatoes, or, indeed, of any other vegetable, in the cellar of a dwelling house in quantities beyond the needs of immediate consumption, is always objectionable, because they are likely to breed disease. Even with the best of care there is always more or less decay, and the family that lives over this species of destructive fermentation is pretty certain to suffer for it, especially during the early spring.

If one has any considerable quantity of potatoes or other tubers or roots to keep through the winter, an outside root cellar furnishes the best means to preserve them. A side hill, giving rapid drainage, makes a good site for such a cellar, and there are many kinds

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