

Heading Back Plum Trees.

Would you advise trimming plum trees in the fall; that is, cutting back this year's growth on the three-year-old trees? I want to spray the trees this fall, and it would be easier to spray if the trees were pruned. J. J. W.

I would not advise severe pruning of trees in the fall of the year. The practice of heading back the new wood of plum trees is carried on to a great extent in some of the large plum orchards in New York State, and to a less extent in orchards in this country. The safest time to do pruning is in the spring, after severe frosts are over and before growth commences. This heading back is most desirable upon those varieties having a very strong upright growth, such as Abundance, Pond Seedling, etc., and it is sometimes desirable upon those which have a very sprawling habit of growth, such as Burbank. In all this heading back, however, it is well to keep in mind the natural habit of the tree, and those which have a very upright habit of growth, cut back to buds pointing outward, so as to spread the growth as much as possible; while those which have a sprawling habit should have the lower limbs cut back to the buds on the upper side, to cause new growth to grow in a more upright direction. It would be better, if spraying is necessary, to do it upon the unpruned trees, then head back as may be thought desirable in the spring. O. A. C., Guelph. H. L. HUTT.

How to Improve the Apple Trade.

Editor "The Farmer's Advocate":

Your article (Oct. 11th issue) on the Ontario apple trade has several excellent features. I am pleased to note that you place co-operation as the largest element in rescuing the apple trade from the difficulties that now beset it. In fact, co-operation would settle the main difficulties. Transportation would be very quickly arranged if we had to deal only with co-operative associations. The Fruit Marks Act would require comparatively few inspectors if the trade were in the hands of the co-operative associations. Even the cold-storage system will be of comparatively little value, unless we can secure something like co-operation in the use of it. The markets question, too, would be simplified. Even at the present time the business of marketing is being revolutionized. Direct buyers are here now to buy the output of the co-operative associations, and I have not the slightest doubt but nearly all the difficulties of marketing would disappear if there was proper organization among the apple-growers. You very properly point out that it is not the primary function of cold-storage warehouses to carry a crop unnecessarily. The most urgent need for cold-storage warehouses is for the purpose of cooling the early fruit before it begins its long journey to Great Britain or the Northwest, but certainly it would be a mistake to attempt to hold it for a later market.

A. McNEILL, Chief Fruit Division.
Ottawa.

POULTRY.

Selling Cockerels.

There is not much encouragement to keep cockerels for selling as breeders. There are so few people willing to pay the price one should have, considering the care and feed, along with the outlay necessitated in procuring good blood. A great many farmers think one dollar a very high price to be taxed for a good male bird, and they generally want to wait till spring to buy, at that. Such a price is not sufficient to remunerate the breeder. It would pay far better to chop off their heads at four months, get 40c. or 50c. each, and have done with them. Forty hens can be wintered in the same-sized pen as twenty cockerels, and they should lay \$2.60 worth of eggs each before spring; so what is the sense of trying to keep the cockerels and offering them at the sum of one dollar each.

Besides, a cockerel of right breeding is worth many times the sum mentioned, while one equally good-looking, or perhaps better, but wrongly bred, would be unprofitable to the receiver, even as a present. Take, for instance, a cockerel from a 200-egg hen, or better, and his pullets should lay one dozen eggs each more than pullets from the same hens mated with a male of poor-laying strain. If 50 pullets are raised, that would mean 50 dozens eggs extra the first year, to say nothing of the improvement of the stock for profits of future years. Let any one consider these items, and then a better idea can be formed of the real value of a good male bird.

From experience, I know that the male bird has a wonderful influence upon the offspring. Not only in the color is this seen, but also in the size and number of the eggs laid; and the disposition of his female ancestors is transmitted to his pullets also.

Parties wishing to increase the income from

their fowls, should see to it early in the season and secure the new blood that will fill the bill for them. And the breeder is worthy of a decent price as a reward for his labor and cash expenditures which he has been called upon to make striving to develop the desired qualities in his strain. Wentworth Co., Ont. J. R. H.

Remedy for Gapes.

The British Board of Agriculture have been informed that the following remedy has proved very effective in cases of gapes in poultry. A brick is placed on the fire until nearly red-hot. It is then taken out, put at the bottom of a large-sized pail, and a small quantity of ordinary carbolic oil poured on it. The chickens which require treatment should be previously placed in an old basket, which is placed on the mouth of the pail, but not touching the brick. The fumes from the oil rise and pass through the interstices of the basket, and are kept from escaping too fast by a cloth which is thrown over the basket. The chicks are kept here until nearly suffocated, and then immediately placed in the open air.

It will be seen that this remedy is a variation of the treatments with camphor, tobacco smoke, etc., all of which are intended to cause violent coughing for the purpose of ejecting the worms located in the trachea.

It is stated that the birds are unwell for a day or two, but that the treatment is so effective that only in a few cases has it to be repeated. The cost is trifling.

It will be understood, however, that it is only a local treatment for each individual case, and cannot be expected to eradicate the disease from the run, which should be attempted by a purification of the ground, either with gas-lime or by watering with a 1-per-cent. solution of sulphuric acid. Fresh ground should be used if possible, and strict attention should be paid to cleanliness.

Modern Poultry Houses.

The modern idea in poultry-house construction is cheapness, secured by a single ply of batted siding, with a layer of building or tar paper on the north to protect the fowls during roosting; half the front (south) of the house open, but provided with hinged canvas fronts that may be dropped on cold nights; loft filled a foot or two deep with straw, to act as an insulator and to absorb dampness.

The straw-loft idea has been advanced for some years by certain poultrymen, but the first good example we saw of it was down at the Ontario Agricultural College, where Prof. Graham had a house in which a straw loft had been tried for three years, without even changing the straw. Our first thought was about vermin, but a poke with a stick into the straw overhead brought down a cloud of dust which answered the questioning. Prof. Graham assured us he had experienced no difficulty from lice here in the three years.

The hothouse system of keeping poultry is getting out-of-date. So are the old, elaborate systems of ventilation. The air is now kept pure by substituting a canvas front for a glass front, and not only is ventilation better, but the temperature is fully as high. The explanation is that through a glass window heat is lost by conduction, without any compensating advantage in admission of fresh air. With the canvas front, probably less heat is lost by conduction than through the glass window, and what heat is lost through the curtains by diffusion is compensated by the resulting purification of the atmosphere.

In poultry houses, as in some other things, we are getting back to the principles of simplicity.

Weight of Eggs.

Egg production should be the essential feature of poultry-growing. About two ounces seem to govern the average size of eggs. Under this size they should sell for lower prices in the market. A case of thirty dozen eggs which weighs over sixty-five pounds is quickly claimed on the New York market. This allows full five pounds for the case, and over two pounds to the dozen of eggs. Seldom are such cases offered for sale. When they are, they bring a premium. No truer statement is made than that good-laying hens are born, not made. No matter how good she may be born, however, if not properly cared for and fed, she will not live up to her creation. Three demands are made positively for the best egg production—bred, fed and housed. If either one be absent, the chain is destroyed. Undoubtedly, the inheritance of the laying quality is the most valuable, for without it the best care and feeding of that hen would not bring equal results in egg-production as would the same attention given to one well born. For this reason, breeding must be placed first on all occasions.—[The Feather.

Rules for Building Poultry Houses.

The following general rules for building poultry houses are given in a recent bulletin by Prof. W. R. Graham, of the Ontario Agricultural College:

Every hen should be allowed at least 6 square feet of floor-space. Each bird of the Plymouth-Rock, Wyandotte, and such breeds, requires about 9 inches of perch room; Leghorns, etc., about 8 inches; and Brahmas, 10 inches.

Roosts should be made low, or near the ground. There are several reasons for this. Fowls of the heavier breed cannot fly high, and those of the lighter breeds frequently injure the soles of their feet in jumping from high perches.

When dropping-boards are used, they should be moderately low down, to admit of easy cleaning. Dropping-boards should be made of matched lumber, and should be 20 inches wide for one roost, and 3 feet for two perches, the first being placed 8 to 10 inches from the wall.

Most poultrymen prefer roosts 2 inches by 2 inches, with edges slightly rounded.

Nests.—Many use only old boxes; but such nests, if near the ground, are apt to induce egg-eating. Dark nests prevent this.

Nests are usually made from 12 to 15 inches square.

Ground floors are more in favor than board floors, and cost much less.

In my own experience, the best results are obtained from keeping 20 to 25 birds in a flock. Some succeed with 60 to 75 in a flock; but these are the minority.

Fattening Work.

The Alberta representative of "The Farmer's Advocate" was recently looking over the work at the poultry-fattening station at Wetaskiwin. Somewhere between seven and eight hundred birds were daily feasting on oatmeal and buttermilk, and changing these compounds into high-grade, white-colored chicken, worth twenty cents a pound. Good, well-bred birds thrive mightily on this feed; common stock do not do so well; mongrels are the worry of the feeder and the source of trouble to the poultry commissioner and the farmer.

When killing day comes, the operator takes the bird from the crate, hangs it head downwards, inserts a small knife through the mouth and upward to the brain, then the pluckers seize it, and presto! In a very few minutes it is dressed chicken. The market demand is very heavy. The entire product of the stations could be swallowed up in a few B. C. towns. Offers of twenty-five cents a pound have been received from outside the Province, but it is probable that local demand will take all the supply. What Alberta needs now is breeding stations to develop the different breeds of poultry to the highest standard, and to work out the various problems in connection with the poultry work in the Province.

Poultry Clips.

Medium-sized roosters are most in demand.

Satisfactory broilers are rarely made from mongrel stock.

Inbred stock does not produce good market poultry.

A poorly-dressed good carcass is worse than a neatly-dressed poor carcass.

The chicken is no longer a broiler after reaching two pounds in weight.

Tender and sweet meat is made only by quick growth and clean quarters.

Never ship carcasses to market in which there is the least suspicion of animal heat.

Constitution enables the bird to stand the feeding; that is why constitution is so important.

Another Worker Pleased with Knife.

I am writing to acknowledge knife as premium. Am delighted with it; think it is a beautiful present, and one I shall always prize. I will do all I can to get new subscribers and gain more of your valuable premiums. Wishing your paper every success, Hallon Co., Ont.

ALBERT WARE.