

amend the Act, supplying definite standards, provision for independent testing, and setting a fixed date for the act to come in force.
Halton Co., Ont. F. E. E.

POULTRY.

Blackhead in Turkeys.

Turkeys are generally considered to be the most difficult fowl to raise—at least, they appear more delicate when young and more subject to disorders of the system when nearing maturity than chickens or water fowl. After bringing the flock safely through the first month or two, it is very discouraging to the poultryman to see the half-grown flock growing smaller, due to the ravages of disease. Blackhead is more to be dreaded than any other trouble. Symptoms do not become apparent until the disease has got such a hold on the system that treatment has little effect. Blackhead is a disease that destroys turkeys in every part of the world where they are raised. It is contagious and affects the liver and caeca or blind pouches of the intestines. If the birds can be kept strong and vigorous, they are able to put up a good fight against effects of the germs when they enter the system. However, a delicate bird has a poor chance of ever reaching maturity if the disease is in the flock. The disease makes great headway in the midsummer months, if the season is damp. While young birds are most susceptible to attacks, old birds are not immune.

There are several marked symptoms whereby the disease is recognized, and this time of year the flock should be seen every day and carefully inspected to see if all are in normal health. One diseased bird may carry the infection to the entire flock. Birds first appear less active in their search for food, and when fed, show lack of appetite. Diarrhoea is nearly a constant symptom, being due to inflammation of the ceca. As the disease progresses, dullness and weakness is more pronounced, the wings and tail droop, and a peculiar discoloration of the head is often noticed. The birds appear listless and pay little attention to what occurs about them. Most of the affected poultts die unless prompt measures are taken to combat the disease. On examining a bird that has died of blackhead, the caeca will be found to be thickened and clogged with cheesy contents. The liver is usually more or less enlarged and covered with yellowish or yellowish-green spots.

"An ounce of prevention is worth a pound of cure." Care should be taken to keep the breeding stock strong and healthy. Any new stock should be secured from a flock in which the disease has never made its appearance; even then a thorough inspection should be made of the birds before placing them in a flock. If possible, keep turkeys by themselves and do not keep them on the same ground continually. Pigeons, sparrows, rats and mice are believed to carry the parasite that causes the disease. These should be excluded as far as possible from the houses and runs occupied by the turkeys. If a bird dies of blackhead, it should be promptly buried, or, better still, burned. Birds that appear sick should be killed and their bodies destroyed. Thorough disinfection of the house, roosting places, feed trough, and

drinking fountains should be made. Radical measures are necessary in order to stamp out the disease that is a great handicap to the success of the turkey industry. Up to the present, blackhead has proved the most difficult of all diseases to prevent or to eradicate. The parasites infect the soil, thus increasing the difficulty of eradicating the disease. Applying freshly burned lime to the ground most frequented by the birds is recommended.

It is necessary that the attendant pay particular attention to the flock at regular intervals, and isolate any birds that appear a little dumpy. Advanced cases of blackhead are considered incurable, but the following remedies may prevent infection: Sulphur, 5 grains, and sulphate of iron, 1 grain, or benzo-naphthol, 1 grain, and salicylate of soda, 1 grain. These remedies should be preceded and followed by a dose of Epsom salts (10 to 30 grains), or one-half to three teaspoonfuls of castor oil. One woman claims she saved a large portion of her flock by using a teaspoonful of muriatic acid in one quart of water. This was kept before them. The feed consisted of a warm feed of moistened shorts in the morning, with a grain ration of wheat and oats. If a success is to be made with turkeys, every precaution must be taken to prevent this dread disease making its inroads into the flock. Beginners should be particularly careful to guard against infection.

HORTICULTURE.

Farm Vegetable Storing.

A Middlesex vegetable grower writes:

"Next in importance to growing in variety and quantity vegetables for summer and autumn use on the farm table comes storing a plentiful supply for winter eating, when, because of the season's restricted condition, they are even more necessary to a wholesome diet. The article on storage in THE FARMER'S ADVOCATE for September 7th was therefore timely and helpful, and the request for suggestions from experience deserves response.

"Table beets I have found the least satisfactory winter keepers, because they become very leathery through drying out; but by putting a couple of inches of moist sand in the bottom of a light box and covering them closely with the same material to exclude the air, have kept them fairly well for a time. Red table carrots, a most desirable winter vegetable, are less troublesome, and keep edible well on until spring, handled about the same way as carrots. Dig them in good time, however, during clear weather and top them in the garden. Parsnips I find best left in the ground as long as possible. Like celery, they require time and cold weather to bring out the flavor and mellow the texture. For winter use they have to be covered as carefully as beets to prevent withering. I leave more than half of them in the ground until spring, when you get parsnip quality par excellence as the result of the freezing. Then as soon as practicable lift and remove to the cellar in boxes before spring sprouting begins, and keep covered with damp sand or earth. Squash, so easily grown and so wholesome, gives trouble through rotting very easily once taken indoors, but chiefly, I believe, because not placed in a dry place. Many cellars and cellar floors are damp, and squash won't stand that. Lay them singly on boards or a shelf. A cool temperature is desirable, but be sure it is dry.

The same is true, I think, of table pumpkin. A little frost on the foliage of celery does not hurt, but store before severe freezing and choose a day when the plants are dry—free from dew, rain or snow. Do not handle if frozen. For home use store in a cool, moist place like the corner of a cellar, where there is no furnace and where the temperature will not drop below freezing. I leave some earth clinging to each bunch of root, and set up on floor or in large boxes about ten or twelve inches deep, bedding each root separately in about three inches of damp sand or mould. Some "heel in" with moist sand, and then place boards eight or nine inches wide on edge between the rows of bunches. Before storing, trim off blighted or decaying leaves. If tomatoes remain green as frosts approach, they can be ripened on the vines, hung in a shed or back kitchen; or by picking the green fruits and placing them on straw in the hot bed or cold frame, they will ripen nicely under the glass sash along into December if the weather is not severe. Because of their odor and bulk, the house cellar is not a desirable place for cabbage storing. I have kept a few fastened by the roots to wires or the "overlays" in a basement stable cellar, but it must be one free from frost, and also from rats, which often play havoc with vegetables. The main point is to keep cabbages dry and cold, but not to freeze them. If pitted out of doors, be sure to avoid a low spot where water may run in and lodge. I have seen successful market gardeners carrying large quantities of cabbage through the winter on slatted shelving as already suggested in THE FARMER'S ADVOCATE, the temperature advised for these and other vegetables being about 50 degrees. Onions are not hard to keep in slatted boxes, or crates holding, say, a bushel each if dried thoroughly in the sun and the tops removed before taking indoors. They may be left in a dry shed or in the barn until severe frosts begin."

A Suggestion Re Vegetable Exhibits

The recent vegetable exhibit at the Canadian National suggests the necessity of some change in that department when the Fair extends over a period of two weeks. While the season has been very unfavorable for the production of show material, it seems altogether probable that fresh vegetables should not be allowed to stand on exhibition for such a long period at any time. The displays of fruit erected in another wing might be duplicated during one week in the vegetable wing at the Toronto Fair. If exhibits of all kinds of garden herbs and vegetables were properly arranged and labelled with the names of the different varieties, they would be at the same time attractive and educative. These could be disposed of and their place taken by the straight vegetable classes, such as now make up the vegetable exhibit. Other ideas may be more valuable to the management than the one just set forth, and it would be well to make them known. This, of course, will require a slightly larger appropriation for the vegetable department, but it represents a very important industry in this day and age, and any difficulty in that regard could possibly be overcome. This is merely a suggestion. The matter should be given some consideration, however, for a two-weeks' display of the same vegetables does not seem consistent with the quality and character of the product.

Sherbrooke Fair a Success in Spite of Bad Weather.

The Eastern Townships Agricultural Association's Annual Fair, held from Sept. 2nd to 9th this year, in spite of considerable bad weather, again proved a complete success. The opening days were particularly dull and wet, and the grounds were not in the best of condition as a result. The total attendance was up to the mark, however, and on Wednesday and Thursday the record was broken, over 25,000 being present on each of those days.

The live stock showed a falling off in numbers, but the quality of the animals shown was very good. Quite a number of exhibitors of other years were not out this year, while a few new ones were showing. The greatest decrease in numbers occurred in the horse classes; cattle and sheep were not quite so numerous, and the swine were about as usual.

Very interesting and instructive features were the exhibits by the Wool Division of the Dominion Live Stock Branch, the Dominion Experimental Farm, the Department of Agriculture of the Province of Quebec, and by Macdonald College. A great number of farmers availed themselves of the opportunity of getting information along various lines from the men in charge of these exhibits.

The rain interfered with the track events somewhat, a number of the races being postponed until Saturday. The live-stock parades each afternoon were made a strong feature, and evoked much interest.

HORSES.

While the number of exhibitors in the Clydesdale section was smaller than last year, yet many good individuals were shown, and most of the classes were strong. Some of the exhibitors were: R. Ness & Sons, Howick, Que.; W. Nussey, Howick, Que.; S. & W. R. McGerrigle, Ormstown, Que.; Sherbrooke Stock Syndicate; Milton Porter, Simcoe, Ont.; C. E.

Standish, Ayer's Cliff, Que.; and B. S. Ingham, Hillhurst, Que.

In the stallion classes Ness won the aged class on Sir Spencer, with the Sherbrooke Stock Syndicate second, Standish third, and Ingham fourth. Three year-olds: 1, Ness; 2, W. R. McGerrigle. Two-year-olds: 1, Porter; 2, Passow. In year olds, Ness was the only exhibitor. Ness won the diploma, special prize and gold medal on Sir Spencer for stallion any age, and also the gold medal for mare any age on Ruby Jean.

In the Canadian-bred classes, S. McGerrigle was first in the stallion any age class, with McLaw's Fashion, a promising two-year-old horse that was afterwards sold to T. H. Hassard, of Markham, Ont. G. W. Montgomery got second in this class. In Canadian-bred females, W. Nussey won first, and J. W. Logan second. Single mare or gelding in harness: 1, Ness; 2, S. McGerrigle. Pair of mares or geldings in harness: 1, Ness; 2, S. McGerrigle; 3, E. T. Yale.

Among the Percheron exhibitors were Milton Porter, Simcoe, Ont.; J. E. Arnold, Grenville, Que.; Sherbrooke Stock Syndicate; Jos. Bernier, O. I. Statton, J. G. Smiley, and the Brompton Pulp and Paper Co. Porter won first in the aged-stallion class, and the diploma for stallion, any age, on Kodi, a horse of high quality and good action. Arnold was second in the aged class, with the Sherbrooke Stock Syndicate third, and Jos. Bernier fourth. Three-year-olds: 1 and 2, O. T. Statton. Two-year-olds: 1, Porter; 2, Statton. Year old, Brompton Pulp Co. Arnold was first on filly or gelding three years old, and Smiley won first place on filly or gelding two years old and on brood mare with foal, while Porter took first in the aged-mare class, and the diploma for brood mare any age.

Quite a number of animals were shown in the Belgian and Norman class. The principal exhibitors

were: A. Gingras, J. E. Arnold and M. J. Ste. Marie. Arnold won the aged-stallion class on Duc, a high quality Belgian; A. Gingras getting second and third places. The diploma for stallion, any age, was also awarded to Arnold's Duc.

The exhibitors of Canadian horses included A. Denis, St. Norbert, Que.; R. Sylvestre, Clairvaux, Que.; R. Poulin and Hilton Ross. Denis won first in the aged-stallion class, and the diplomas on stallion any age and on female any age.

The heavy Draft classes were strongly contested. G. W. Montgomery, Wm. Nussey, S. & W. R. McGerrigle, H. H. Fuller, J. W. Logan, W. H. Martin, E. C. Rose, and the Brompton Pulp & Paper Co. were the principal winners. J. W. Logan captured the diploma for female any age.

In General-Purpose class H. H. Fuller, H. E. Hodgeman, W. J. McCurdy, and R. F. Collins divided most of the honors. J. R. Bodeur judged the general-purpose horses, while A. Scharf made the awards in the heavy classes.

The light-horse classes were not as strong as in other years. An interesting exhibit was shown by J. E. Jamieson, of Lennoxville, consisting of a string of ponies of Welsh and Hackney Pony extraction.

BEEF CATTLE.

Representatives of the Shorthorn and Aberdeen-Angus breeds constituted the greater part of the beef classes this year. Not many Herefords were shown, A. E. Alger being the principal exhibitor. J. W. Watt, of Elora, Ont., was a new exhibitor of Shorthorns, while F. M. Cromwell, M.P., of Cookshire, Que., did not show this year. Other exhibitors of Shorthorns were: C. Guy Bishop, Marleton, Que.; Wm. Loomis, John Adams, Cookshire; A. E. Alger, Eaton, Que.; W. E. Hunt, Ayer's Cliff; H. J. Elliott, Danville, Que.; and G. R. Mooney, Inverness, Que.