

Fighting Bindweed.

Keen and widespread interest has been manifested in our efforts to eradicate bindweed at Weldwood. Before purchasing the farm, we learned that parts of two fields were infested with this stubborn, deep-rooted perennial, and, since taking it over, the area has been found larger than supposed, though, except for two small patches, it seems to be confined to one quarter of the farm. Most of the infested area is this year under cultivation, the worst part being bare-fallowed, and the rest planted to corn, check-rowed. Notwithstanding a large amount of other work entailed by the erection of a house, the planting of an orchard, and putting up five hundred rods of fencing, we are going after that bindweed in dead earnest, and mean to do a thorough job. Whether we can eradicate it from the corn land without an excessive amount of hoeing, remains to be seen, but we hope to finish it this season on the fallowed portion, though, if necessary, the whole area will be hoe-cropped next summer to complete the job. Much will depend upon the weather from now out. The plan of campaign is as follows: Last summer, after haying and harvesting, the land was plowed and worked two or three times, but an exceedingly wet autumn curtailed operations and prevented a second plowing. This spring, wet weather again interfered, until the bindweed began to show freely above the surface. The land was then single-disked, double-disked, single-disked twice more, and then gone over with the big four-horse, stiff-tooth cultivator, equipped with seven-inch points in front and ten-inch ones behind. With this implement chiefly the rest of the cultivation is to be done. We would like to get over the field every five days all summer, and, lest weather should delay cultivation too long at times, we are planning to cultivate as nearly twice a week as practicable. With the four horses, seven or eight acres can be ripped up deeply in about half a day. Jas. Rettie, of Oxford Co., Ont., claims to have had good success plowing infested land twice a month, or often enough to keep the weed below the surface, and no doubt this plan would be good. The great secret is to keep it from breathing for a whole summer. The majority of people give bindweed just about enough cultivation to make it grow nicely. Once a week is scarcely often enough in the fore part of the season. About once in five days is recommended.

Since announcing that we had bindweed to fight, we have been surprised to find how generally this pest has become distributed. Many farmers attribute its introduction to impure mangel seed. It is said to have been introduced to our farm in that way. Official publications say it is a European introduction, and Europe is the main source of supply for our root seeds. The seed of bindweed is fairly large, and might easily pass unnoticed in mangel seed if one were not on the look-out for it. The young plants resemble those of wild buckwheat, but the leaves are narrower, and rather more sharply pointed at the base, while the vines are less stout in their general appearance. The roots, however, are tremendously deep-reaching, white, fleshy, and spiral. The flower is a pretty white one of the morning-glory type. It blossoms freely, commencing in June, but, thank goodness, it seeds sparingly, especially in the early part of the summer. Seeds are ripe by August. Hogs are said to be fond of the roots, and we found last summer that cattle ate the vines freely where growing in peas and oats.

Bindweed has overrun many farms, while thousands of others have patches of it. Where any considerable area is affected, cultivation is the only method to be recommended, and the cultivation must be thorough away beyond what is demanded for any other weed. Trifling means failure. We are quite confident of our ability to eradicate it, though we do not promise for certain to finish the job this year. So far it has been kept under easily. Progress will be reported.

A "Farmer's Advocate" reader calls attention to the beneficial effects of one season's alfalfa-growing on the texture of a stiff and vexatious clayey hillside. Portions of the field had winter-killed, and he decided to plow up the whole plot for corn and re-seed with the legume in another season. He was delighted to find that the roots had permeated and disintegrated the soil till it literally worked up "like an ash heap"—once he got it plowed.

A. S. Smith, B. S. A., District Agricultural Representative at Sault Ste. Marie, Ont., advises Algoma farmers to save the second cutting from their clover fields for seed. Those who did so last year, he says, were very fortunate, many of the samples seen by him being of excellent quality. It is encouraging to hear of clover seed being successfully produced from second cutting in New Ontario. The advice to save clover for seed will apply with equal or greater force in other regions. Clover seed is a profitable crop.

THE DAIRY.

Cream Troubles.

Have a cow which proved not to be with calf, but which milks well and throws up good cream, which, when churning, goes to foam, or, when butter is obtained, it has a cheesy sour taste. Would you kindly advise the cause, also give a few hints on making butter on a small scale for family use.

G. A.

Ans.—This trouble of cream going to foam and butter having a cheesy taste is a common one when cows are advanced in lactation, or, in other words, when they have been milking for some time. With some cows, the milk and cream gets so bad that it is impossible to use it for household or buttermaking purposes, and the only thing to do is to allow the cow to dry up, and, if not in calf, sell her for beef.

As a method which may be tried to see if it will overcome the difficulty, I would suggest giving the cow about one and a half pounds of Epsom salts in the form of a drench, and would also pasteurize the cream. As soon as sufficient cream has been collected for a churning, and while still sweet, set the cream can into hot water at a temperature of 180 degrees, and stir the cream until it reaches 160 degrees; allow to stand for ten minutes at this temperature, and cool to between 60 and 70 degrees by setting the cream can in cold water. Next add, for each gallon of cream, about one-half pint of good-flavored sour skim milk, or buttermilk, preferably got from a neighbor who makes good butter. Stir this well into the cream, and allow to stand in a moderately warm place for about twenty hours, when it should be ripe and ready for churning. Churn this at a temperature of about 64 to 68 degrees, or lower, if butter is inclined to come soft. After the butter collects in granular form about the

indicated, and salted to suit the taste. If the butter is to be used at once, it may be made into prints; if not to be used at once, it should be packed solidly in a box or crock, then covered with parchment paper or a clean cotton cloth, with a salt paste on top to keep out the air. Keep the butter as cold as possible, and, if properly made, butter produced in the month of June should be all right in the winter months, when there is often a scarcity.

H. H. D.

POULTRY.

Caponizing.

1. At what age may cockerels be caponized safely?

2. How to distinguish cockerels from pullets as early as possible?

3. Full directions for caponizing, with names of instruments required?

D. N.

Ans.—1. As soon as the cockerels weigh 1½ to 2 pounds, or when two, three or four months old, they are ready for the operation.

2. Little difficulty will be experienced at this age in determining the sex. If combs are not showing on the male birds, they can often be distinguished by their more obstreperous nature, coarser voice, coarser legs and toes, and larger size. Their bodies are longer, and are not so plump as those of the pullets, and many of the male birds will be commencing to crow. Pullets develop wing and tail feathers faster than cockerels.

3. Before the operation the birds should be fasted for at least twenty-four hours, and fed warm, soft food for three or four days following. Operate on a day when there is a clear, strong light. An operating board or table is

necessary; the head of an apple barrel is often used in a pinch. The bird is laid on this with the right side up, and is securely fastened, wings and legs, with a stout cord. The cords on the legs are placed above the hocks, and weights are attached and hang over opposite sides of the barrel. Moistened and remove feathers from a small area just in front of the hip. With the left hand draw the skin towards the hip, and with a sharp, thin knife make an incision from one to one and a half inches in length, between the first and second ribs, next to the hip and parallel with them, and about an inch below the backbone. In cutting, be careful not to puncture the bowels. A spring-wire spreader is then inserted to spread the opening between the ribs. The intestines will now be visible, covered by a thin membrane, which is next torn apart with a small steel hook. The upper testicle, yellow, or sometimes rather dark-colored, should now be visible, appearing much like an ordinary bean in size and shape, and situated close up against the backbone. By pushing aside the intestines, the lower one can also be seen, and should be removed first.

Various types of instruments are used for this delicate part of the operation, but the canula is the only one we will describe. This consists of a hollow tube, the lower end of which is compressed and closed, except for two small holes, through which runs a horse-hair or fine wire, forming a loop below, the upper ends coming well up above the end of the tube. Having the loop just large enough, work it over the testicle, being careful to enclose the entire organ, and yet not catch any of the near-by arteries. Tighten up on the free ends of the hair or wire, sawing lightly, if necessary. When separated, remove and repeat the process with the other testicle.

Be sure to remove all blood clots, feathers or foreign matter of any kind. If bleeding is profuse, use a little absorbent cotton to take up the blood. Take out the spreader, and allow the wound to close up, and the operation is completed, no stitching being necessary.

Fowls of the smaller breeds should not be caponized. Plymouth Rocks, Wyandottes, Brahmas, Langshans, Rhode Island Reds and Orpingtons are quite suitable for capons, as are all heavy, rapid-growing breeds.



Profitable Poultry.
A group of White Wyandottes.

size of grains of wheat, draw the buttermilk and wash with cold water having a little salt dissolved in it, making a weak brine, which will help to remove the buttermilk; wash again with clear, cold water, then add salt at the rate of about 1 ounce per pound of butter, and work in the usual way. If these directions are followed, the butter ought to be of good table quality, although, as we have said, there are cases where no treatment which can be given the cream will produce butter fit for table use.

The main points in making butter on a small scale for family use are: First, to have clean, healthy cows, fed on suitable feed. This is usually obtained in summer time by allowing the cows to remain in pasture. Second, separating cream which is comparatively rich; that is, having a high percentage of fat in it. If not using a cream separator, when the cream is removed from pans or cans, be careful to take as little skim milk as possible, as the skim milk makes trouble in hot weather, causing the cream to sour too quickly and to go off in flavor. Keep the cream cold, until sufficient is collected for a churning, by placing the cream can either on a cellar floor or in cold water, and when sufficient has been collected for a churning, a culture or "starter" may be added to ripen the cream, having the temperature about 65 degrees in summer. When troubled with bad flavors, we advise pasteurizing, as previously described. When not pasteurizing, the cream should be churned in about twenty hours after adding the culture or "starter," which controls the flavor, and I would churn at as low a temperature as possible, in order to bring the butter in a reasonable time, say twenty minutes. When the butter comes in granular form, it may be washed with cold water or brine, as previously