

wheat was badly rusted, this was not affected in the least. These 18 grains yielded 3,050 grains, or an average of 169 per grain sown.

Now, can you tell me what to call it, or where it came from?

Your paper is a boon to every farmer who takes it.

Glenallen P. O.

[I send you a sample of wheat which you can compare with yours. Should yours be of a different variety I don't know what it is. Continue raising it until you have some to dispose of; have it tried by other persons. Should it prove to be any better than the varieties now known, and of good quality, you may realize something handsome for your pains. If it is not known by any name, you could call it the Cartridge Wheat, or what name you choose. I should like to see a head and a few grains after you have given it another trial.—Ed.]

The Apiary.

Adulterated Honey.

By A. C. Attwood, Apiary Editor.

In offering honey for sale late in the fall and during winter, I have frequently had parties object to it on account of it being candied, thinking it was adulterated. Now the fact is, no better proof of pure honey is wanted, than the fact of it candying early, and the quicker it candies the better.

Honey can be brought, if required, to a liquid state by placing the jar in a pot of water, and raising the heat of the water until the candying in the honey is dissolved. I see a good article in the *Bee Journal*, from the pen of Charles Dadant, of Illinois. He says a means exists for detecting adulterated honey; it has been known and practised in France for centuries; it is infallible and in reach of everyone.

Honey granulates, as you term it in this country, it candies. Sugar syrup does not granulate, does not candy, if to think it crystallizes.

Bee-keepers ask for a means to prevent honey from candying; it is the same as to want to encourage fraud, for if bee-keepers were deprived of this means of detecting false honey, the adulterators would become more daring and more numerous. What is needed, therefore, is not to find a means of preventing honey candying, but to educate all American consumers who are accustomed to buy spurious honey and who refuse the pure article because they don't know it.

It is, consequently, of the greatest importance that all bee and farm journals inform their readers that the best test for honey is the candying, and that honey candies because it is formed of grape sugar which granulates and does not crystallize; on the other hand, sugar syrup is made from cane sugar which does not candy but crystallizes; that if we find on the market from December till June, a so-called honey in liquid condition, they can with absolute certainty declare it a sophisticated honey, or at least a honey inferior in quality or which by boiling or by mixture has lost its character as true honey.

If you were in Paris offering for sale your best honey you could not find a price for it, not 5 cents per pound if your honey was liquid; while a good, white, granulated honey would sell readily at 20 cents per pound—it is because the French people are accustomed to eat candied honey, and know that it ought to be granulated. Let every one of us write in all the papers at large these simple facts, and without waiting for the millennium we will see all the amateurs of good honey ask for candied honey, for it is really better than liquid, better than even comb honey. Very little can be done in the apiary this month. Bees that have been put properly into proper winter quarters are no doubt all right and will soon begin to raise brood, even if the thermometer outside is 20° below zero. If they have plenty of food let them alone, and do not disturb them; if you think they are short, try and feed them as best you can, for I cannot advise, not knowing the exact position your bees may be in. When the weather moderates, let your first thought be your poor bees, and attend to their wants. I fear a good many that are wintering on their summer stands, or in improper repositories will come out cold. Have an eye to them the first fine day, and save them if possible.

I shall be glad to answer any questions any of my readers desire, either privately or in the apiary department of this paper—if privately enclose a stamp.

Stock and Dairy.

Scab in Sheep.

I have a flock of sheep that has the scab among them. It is something that I never saw before, and do not know how to cure it. I would be obliged to you if you could give me a remedy through the columns of the *Country Gentleman*. D. M., Huntington, N. Y. [It is difficult to cure the scab cheaply and easily when the wool is long. Let D. M. boil up a few pounds of good strong tobacco leaves or stems, so as to make a strong liquor, and dissolve in each gallon of this liquid one ounce of white arsenic, and also stir in some flour and sulphur while the solution is still hot. Fill an old teapot with the solution, and while an attendant parts off wool along the back and on the shoulders and neck of the animal, pour the liquid upon the skin wherever there is any appearance of the starting of the wool. The skin should be well rubbed by the hand while wet, and the wool again closed over the sore spots. Tobacco alone will cure the scab, but several washings of the whole surface is required, while, if arsenic is added, only the sore spots need be washed. Pouring from the teapot must be persisted in as long as there are any symptoms of scratching or uneasiness. A neighbor, an Englishman, cured a large flock one winter this way. As soon as the sheep are sheared, if they are thoroughly washed in tobacco water, in which a little flour or sulphur has been stirred, they will probably be permanently cured. Cold weather and long wool preclude such washing in the winter. The addition of soap to the infusion is recommended by Randall. An application of unguentum (mercurial ointment) one part, and lard our parts, well rubbed together, to various parts, of the sheep's body, using not over 1½ or 2 ounces to a sheep, will surely cure, but it is an unsafe remedy].—*The Cultivator*.

About Sick Animals.

Nearly all sick animals become so by improper feeding, in the first place. Nine cases out of ten digestion is wrong. Charcoal is the most efficient and rapid corrective. It will cure in a majority of cases if properly administered. An example of its use:—The hired man came in with the intelligence that one of the finest cows was very sick, and a kind neighbor proposed the usual source of drugs and poisons. The owner being ill and unable to examine the cow, concluded that the trouble came from over-heating, and ordered a teaspoonful of pulverized charcoal given in water. It was mixed, placed in a junk bottle, then held bottom upwards, and the water and charcoal poured downward. In five minutes improvement was visible, and in a few hours the animal was in the pasture quietly eating grass. Another instance of equal success occurred with a young heifer which had become badly bloated by eating green apples after a hard wind. The bloating was so severe that the sides of the animal were as hard as a barrel. The old remedy, saleratus, was tried for correcting the activity. But the attempt to put it down always caused coughing, and it did little good. Half a teaspoonful of fresh powdered charcoal was given. In six hours all appearance of bloating had gone and the heifer was well. —*Live Stock Journal*.

Clover Hay for Cows.

A correspondent of the *New England Farmer* writes as follows:

After having finished feeding fodder corn in connection with good hay to my cows, I commenced feeding from the mow, which consisted of good quality of mixed hay. With a hay-knife I cut a space about three feet wide from the end of the mow next to the barn floor, and there was no perceptible increase in the flow of milk, from what it was when they were fed one-half fodder corn. But when the lump of mixed hay was consumed, and I came to the clover, which was beneath it, I found there was an increased flow of milk at least one-third, and the next week's churning there was nearly the same increase of butter. But after I had used the clover hay in this space and began at the top to feed with mixed hay, the cows shrank both in quality of milk and butter and continued at the former stand, till the clover was again reached, when they increased again in their milk as at the first instance. This hay was cut the 21st of June, just as it was in bloom, received two days' sun, and was housed during the driest week of the season, and there is now a very rich aroma arising from it as it is taken in flakes and fed to my stock, for I feed not only my cows with it, but my horses and calves.

Feeding for Milk.

What can I feed my cows in addition to early cut hay that will increase the milk sufficiently to cover the cost? Milk four and a-half cents per quart.

Having selected good new milch cows, the next thing will be to see that they have warm and comfortable quarters. Comfort for the herd is a *sine qua non* for paying returns from feeding for milk. It will matter little how good or how cheap his food may be, if any considerable part of it must be used to warm the celestial spaces, or even that portion of the atmosphere floating over his premises, he will not get milk enough out of it to pay cost. But with a herd of good new milch cows kindly cared for, almost any of the extra foods in common use will, with milk at four and a-half cents, not only pay cost at current rates, but a profit. All foods, however, will not pay alike. From the explanations before given, it will be understood that those which abound in flesh-forming matter, and are at the same time easiest of digestion, will give the largest returns. There is but little difference in the milk-producing capacity and digestibility of oatmeal, wheat bran, shorts and canaille; the meal and canaille of buckwheat and rye bran. Eastern and Western corn, wheat and barley meal come next. Oil meal will produce more milk from the given weight than any other feed I have ever used; but it is costly, and only a small quantity can be used without affecting the flavor of milk. Brewers' grains, for the cost, produce more and poorer milk than any other food of the grain kind I have ever used.

In producing milk at any time, there is nothing which will tell upon the yield more than the circumstances of rapid and slow digestion. As already explained, a poorer food which will digest rapidly will make more milk than a richer one that can only be digested slowly. Young and succulent food digests more easily than those that are dry and old; cooked food easier than raw, especially where ripeness is approached. In cold weather warm food will digest sooner than cold. Tepid water and warm food in winter will add ten per cent. to the yield above the same given cold. Soaking, and even a little scouring, will increase the digestibility of food which is ripe and dry. Where there is no difference in rapidity of digestion, that food should be preferred which contains the most albuminoids, remembering that while a full supply of albuminoids is absolutely necessary to the largest quantity, a full supply of fat-forming element is necessary to perfect quality. With these general principles before him, the dairyman can regulate the food of his herd better than any outsider can do it for him.

Devonshire Cream.

From six to eight quarts of milk are strained into a thick earthenware pan or crock, which, when new, is prepared for use by being stood in clear cold water for several days, and then scalded three or four times with skimmed milk. Tin pans may be used if they are scalded in hot bran, and left to stand with the bran in them for twenty-four hours. The milk being strained into the pan is stood in a cool room from nine to fourteen hours, according to the temperature. It is then carefully moved to the top of the stove or range, or placed over a bright fire (not too near it) and slowly heated—so that at the end of a half hour the cream will have shrunk away from the sides of the pan, and gathered into large wrinkles, the milk at the sides of the pan commencing to simmer. The pan is then carefully returned to the cool room and left about ten hours, when the cream is skimmed off.—This cream is very delicious to use on fruit or preserves, and is esteemed a great luxury—selling for about the price per pound of the best butter.

Brine for Preserving Butter.

The *Duchess Farmer* says: To three gallons of brine strong enough to bear an egg add a quarter of a pound of nice white sugar and one tablespoonful of saltpetre. Boil the brine, and when it is cold strain carefully. Make your butter into rolls, and wrap each roll separately in a clean white muslin cloth, tying up with a string. Pack a large jar full, weight the butter down, and pour over the brine until all is submerged. This will keep really good butter perfectly sweet and fresh for a whole year. Be careful to not put ice upon butter that you wish to keep for any length of time. In summer, when the heat will not admit of butter being made into rolls, pack closely in small jars, and using the same brine, allow it to cover the butter to the depth of at least four inches. This excludes the air and answers very nearly as well as the first method suggested.