

The Condition of the Scotch Farmer.—I have again received a copy of the *Advocate* for another year. It has got such a hold in the household that I think it will be the last paper parted with, and I therefore enclose once more an order for one dollar. The British farmers are still laboring under hard times. Our prices are always very low, but more steady. Our income is now fully one-third lower than it was four years ago. This is telling heavily on the country. Our proprietors are giving back a small percentage of the rent in order to encourage the tenant. A large number cannot pay full rents now, and are simply giving what they can; but I am afraid that there will be a day of reckoning soon which will throw a great many into bankruptcy, and until we get new laws instituted we can never get on.—JOHN ALLEN, Aberdeen, Scotland.

Sow Thistle-Twitch Grass.—1. There is a weed growing on my farm which I have been trying to eradicate without success. It made its appearance about six or seven years ago on the side of a little knoll where the soil was damp. It grows about a foot high; the stalk contains a milky juice; the lower leaves lie flat on the ground, choking out all other plants; the stalk has from six to twelve heads, which are yellow, when in bloom, downy, and when mature full of seeds. The roots run under ground and send up shoots every few inches. We have always cut it before the seeds were ripe, and have had the field in meadow and pasture for four years. This seemed to have killed it almost entirely, but this year, the field being plowed up and sown to oats, they have revived and seem worse than ever. At first it only occupied a few square feet, but at present it has spread to as many rods, besides cropping up here and there in other portions of the field. I have tried to kill it with salt, but a two-inch covering had but very little effect on it. I would sooner have the Canada thistle or even the wild oat to deal with than this terrible weed. 2. There is also a grass growing on my farm which I first thought was the Old Country Rye Grass, but having seen an illustration of Couch Grass in the August issue of the *Advocate* for 1886, I thought it might be this grass. I first noticed it at the foot of an apple tree, from there it spread all round the place. I send you a specimen of both plants, and would be thankful if you could tell me their names and a way to get rid of them.—E. T. Clinton, Ont.

[1. The weed is the perennial sow thistle. It resembles very much the annual sow thistle. The leaves are, however, a little narrower and less spiny, but the principal points of difference are that the perennial weed has a creeping root, and little yellow bristly hairs just below the flower head, both of these are wanting in the annual variety. The only way to get rid of them is to cultivate the field thoroughly, and if possible let none of them see daylight. 2. This weed is, as you expected, the Couch Grass. The principal point of difference in the appearance of the head of the weed and the Rye Grass is that the head of the latter is flatter. The spikelets of the head of Rye Grass are arranged edgewise, while in the Couch Grass they are cross-wise. The creeping root of the Couch Grass also serves to readily distinguish it from the Rye Grass. Repeated thorough cultivation during hot, dry weather has been found very successful in eradicating this weed, but this plan, wasting much of the soil fertility, is not considered by us as valuable as the "buckwheat plan." This consists in thorough cultivation in spring, two plowings if possible; sowing the field to buckwheat, plowing it under with a chain when in bloom; sowing to buckwheat again, plowing it under again; keep it clean in fall and following spring, and sowing a hoe crop. The buckwheat should be sown very thickly, as one of its principal functions is to choke out the weed. Read our article on Couch grass on page 166, volume 23, June, 1887.]

Instrument for Testing Quantity of Butter in Milk.—I would be much obliged if you could give me some information as to testing cows for butter. Is there any way by which we can test a cow's milk, from a small sample, so as to form an idea of her butter value? Suppose I was wanting to buy a cow for butter and took a sample of her milk, how would I go about to find out how much butter it would make, or the percentage of butter? Of course I know it can be done by a chemical analysis, but of other than that, how should it be done? I want to get a few good butter cows, and would like to be able to know what they can do before purchasing.—H. J. M., Quebec, Q.

[It has been found, by numerous experiments, that the butter fat contained in milk stands in very close relation to the butter which can be obtained from such milk. It is true that some of the fat remains in the skimmed as well as the buttermilk, but this loss is more than counterbalanced by the water, caseine and other constituents of the milk (other than fat), which find their way into the butter. There are many different methods for determining the fat, but several of these are entirely

unreliable, and among these, notwithstanding its general use, is that known as the cream gauge, for the quantity of cream is no guide for the quality of the milk. The quantity of cream will even vary very materially at times when the milk has been taken from the same cow and handled in apparently identically the same way. The best instrument which the farmer (and even the factorymen) can use to determine the percentage of fat is the lactoscope. This instrument can be easily handled, and is very accurate (varying but a small fraction of a per cent. from chemical analysis). Last year we frequently tested the milk in large cheese factories with it as fast as it could be taken in and weighed. Messrs. J. S. Pearce & Co., of this city (London), are the only dealers we know of handling these instruments in Canada. They sell them for \$4 each, and complete directions how to use it accompanies the instrument. They are packed in a neat little box about ten inches long, two inches wide and two inches high. They can, therefore, be easily carried about.

How to Eradicate Willows.—I noticed in the July issue of the *Advocate*, that you ask if any of your readers have been successful in killing the willow. We have killed quite a number on our place by girdling them about the middle of June, (some say the full moon in June, but I take little stock in the moon), and they will die in a very short time; if near water, it takes longer, but it will kill them. It has been very dry in this locality for the last two seasons, and there has been very little clover seed taken. How would it do to plow out-stubble and sow with timothy this fall; also the best time for sowing it? The land is clean and in good heart.

[It will answer very well to sow the grass on the well plowed out-stubble in fall; if sown in the first part of September, it will make growth enough to stand the winter. Harrow your meadow, which did not catch well, with a good sharp harrow and seed again.]

Commercial.

FARMER'S ADVOCATE OFFICE,
Aug. 1, 1888.

Another month of the farmer's busy and anxious season has come and gone. In some localities the country has had abundant showers, while in others these blessings seem to have been withheld, and crops are light and poor, but we are happy to be able to say that these sections are not very large in area, and on the whole we think the prospects are favorable for a good harvest, but such will depend on the next two weeks.

WHEAT.

The weather the past month has been very favorable for the maturing of the fall wheat crop and we think the sample should be plump and nice. Markets are quiet, with little change to note, and there will not be much activity in the trade till the harvest is pretty well secured, and farmers are ready to market their crop. It is certain, we shall not have the amount of wheat, either in Ontario or the United States that there was last year.

A year ago the outside price for winter wheat in Liverpool was 6s. 6d. per 100 pounds. At \$4.80 per £ sterling, this equals 93½c. per bu. The water freight thence was 13½c. per bu., leaving 80c. to Toledo. The Toledo price was 74½c. To-day Liverpool price outside is 6s. 10d., which equals 98½c. per bu. The water freight thence is 8c. per bu., leaving 90½c. to Toledo. The Toledo price is 86c. per bu.

Reports from Kentucky and southern Indiana, where the new winter wheat is being marketed, say that the sample has filled well and average fair. Further north in Ohio and Indiana, etc., the quality is reported less favorable, being decidedly below the standard in weight per bushel.

LIVE STOCK.

Live stock markets are quiet, and on the whole easier. The *Montreal Gazette* gives the market as below:—

There has been a change for the worse in the condition of the British live stock trade, and the decided strength that has prevailed since the end of June has been displaced by a weaker feeling, in fact it would not be surprising to see further weakness, as receipts promise to increase for a week or two. Our special cables to-day quote half a cent lower but are not depressed, although it must be conceded that the strength has gone out of the market. The weather at some points was reported hot and unfavorable for the handling of stock. Receipts from Canada and the States have been light, but supplies from elsewhere have reached full volume, and the market has sagged off, although demand at Liverpool to-day was about steady at the decline. Prime Canadian steers were at 13c., good to choice at 12½c., poor to medium at 11½c., and inferior and bulls at 8½c. to 10c. Sheep have been in heavy supply, with prices tending downward, but ruled irregular. Our cable from Liverpool to-day quoted best sheep 13c.; secondary grades, 11c. @ 12c.; merinos, 10½c. @ 11½c., and inferior and rams, 8c. @ 9½c. These quotations are calculated on the basis of \$1.80 in the £. A private cable from Liverpool says:—"Markets lower with prospects worse. Best cattle and sheep 6½d. Another says:—"Prospects and prices fair. Sheep, 6½d. Mixed shipments of Canadian cattle, 6½d.; do. States, 6½d." Refrigerated beef is cabled as follows:—Liverpool, hindquarters, 6½d.; fore-quarters, 4½d. per pound; London, hindquarters, 4s. 2d.; fore-quarters, 2s. 10d. per 8 pounds by the carcass. Following were the prices of prime Canadian steers in Liverpool on the dates mentioned:—

	1885.	1886.	1887.	1888.
July 23.....	12½c.	12c.	11½c.	13c.
July 16.....	14c.	12½c.	11c.	13½c.
July 9.....	14c.	12c.	10½c.	13½c.
July 2.....	14½c.	13c.	10½c.	13c.
June 25.....	15c.	13c.	11c.	12c.
June 18.....	14½c.	13½c.	11c.	12½c.
June 11.....	13½c.	13c.	12c.	13c.
June 4.....	14c.	14½c.	12½c.	12c. @ 12½c.

CHEESE

has ruled quiet the past two weeks, with prices decidedly easier and very little business doing. June make is well cleared out, although there are a few lots yet unsold. The July make is firm, and the keeping qualities will be much above the average for July goods. We shall not be surprised to see the July make go out at lower figures than June. There was too much money paid for June, and this is now reacting on the market and interfering with the consumption of these goods. Had June cheese been allowed to go out at 8½c. @ 9c. we should now see July cheese going forward at 9½c. @ 10c. Factory-men are holding for 9½c. @ 10c., and buyers are offering 9c. @ 9½c. The first half of July are ready to move and should be on the way to market.

The cable advices are no better, and the bids received for next week's shipment were below the average of what holders would accept at present. The cable was at 46s. The *New York Commercial Bulletin* says:—"The turn of the market is just a shade steadier, without any positive gain on quotable value. Yesterday afternoon and this morning two or three shippers bought a fair bunch of stock, and with moderate receipts holders appear inclined to make something of a stand again for a little fuller figure than the majority of buyers are willing to pay, especially as the weather is reasonably favorable for carrying stock. We report 9½c. for an outside quotation on colored in view of actual sales made at that rate, and in recognition of the fact that some of the stock is held even fractionally higher, but 9c. is practically all that can be depended