

into meal, and also for feeding cattle when fattening during winter. It is excellent for feeding to milk cows during winter and spring, and is sometimes fed to horses; indeed all kinds of stock on a farm, horses, cattle, sheep, pigs, and poultry will readily eat, and seem fond of Indian Corn.

We hear of corn being sometimes used for fuel in the West, where wood and coal are scarce and dear and corn is cheap. In Illinois and other parts, they used the corn cobs chiefly for summer fuel, when kept dry they make a useful fuel and ready summer fire, and are no bad substitute at that season for wood or coal.

There are many varieties of Indian corn known, of which the most prominent are those distinguished by colour, as white, red or brown and yellow; those that have different numbers of rows on the ear, as the 8, 10, 12, to 24 rowed kinds; those that differ in taste, as the sweet and common kinds, and those that have some peculiarities in their kernels as our common kind,—the horse tooth, gourd seed, the rice corn, &c. &c.

There is no doubt that this plant can be much improved by selection and cultivation, and that varieties may be multiplied to almost any extent by judicious selection of kinds, and crossing by careful impregnation. Almost every corn grower has his favourite kind; I have never found any kind do better here than the common eight rowed yellow corn.

Though corn is a tropical or subtropical plant, yet it is capable of being acclimated in almost any region up to almost the 50 degree of latitude on this continent, and is adapted in some of its varieties to almost any part of the country. Being a short lived annual it will succeed wherever the heat of summer is intense and of sufficient duration, whatever may be the cold of winter.

The corn crop must have been of immense benefit to the early settlers of this country. It succeeds well on new cleared land, it requires little cultivation there, it gives a large increase for the seed planted, it requires a short season to mature, and could be used for food before it came to maturity. It is no wonder that this was a favorite crop; even yet there is said to be more land devoted to the production of Indian corn in the United States than to any other grain crop; and on the whole earth, Schow states, that Rice, Maize and Wheat are the most extensively cultivated grains, and that rice supports the greatest number of the human race, but that maize has the greatest range of temperature.

The quantities of Indian corn grown in North America alone are immense; the total produce of this grain in the United States by the Census of 1840 was returned at 377,581,575, by that of 1850, at 592,071,104, and by that of 1860 at 838,792,740, and no doubt the Census of 1870 shows a large increase. By the U. S. census of 1860 the average of the whole United States was 35 bushels per

acre; the highest average of any State was 45 bushels per acre (Minnesota), and the lowest (Delaware) was 20 bushels per acre.

In Upper Canada by a census of 1847 the number of Bushels of Indian corn was returned at 1,137,555, an average of about 21 per acre, in 1850 it was given at 1,688,850 bushels at an average of 23½ bushels per acre, and by the Census of 1861 there were raised 2,256,290 bushels at about the average of 28½ bushels per acre.

In this county, (Northumberland), the number of bushels of Indian corn in 1861 was returned 64,118, being an average of 27 bushels per acre, and in this Township (Hamilton), there was returned 11,726 bushels, an average of 28½ bushels per acre.

W. R.

Cobourg, 1872.

Silver Beet.

It may be interesting to those who have sown Beet seed to know in what manner the hardihood of the plant has been accidentally proved.

Last Fall, when reaping the seed, the bundles were left to dry, where laid down—this was about the 23th of November. Up to that time no frost had affected the leaves to any degree, and we felt half afraid the benefits we expected to derive from its use as a manuring plant, would be partially or altogether neutralized by the thing becoming from its hardihood, an absolute weed. However, the frost was too much for it at last, and it died entirely down, thereby relieving our mind of that dread.

Where the bundles of stalks lay to dry, some seed was necessarily shelled out, and lay on the surface all winter. This spring we were agreeably surprised by seeing a mass of young plants covering the ground as thick as they could stand. These of course were self sown seed and had never been covered with earth.

At the time of writing this article, (the 20th of June), the plants are from nine to ten inches high, standing as thick on the ground as they can, and apparently ahead of the weeds; whilst the same seed, sown this Spring, is as yet, only two inches high. No culture whatever has helped the self sown seed, the object of the neglect being to show, that the seed sown the last thing in the Fall, would mature early enough to afford a heavy crop of green manure, to be ploughed under for wheat, about the middle of August, or first of September; as it at present looks, and judging from former trials, the crop will be fully matured by the end of July, and perhaps two weeks sooner, thus affording ample time for ploughing twice before seed time. If the seed were intentionally sown in the fall, and on properly prepared land, we have little doubt of thereby obtaining an abundant crop under almost all circumstances, by the beginning of July—and especially if attention be paid to killing of the first weeds, by preparing the

land early enough in autumn. There seems every prospect that under such treatment no culture whatever will be required in the spring.

I consider these experiments to obtain some manurial agent from the land itself, and at small cost, most important in their results, and have little doubt these notices, will in the end call the attention of farmers to the facts, and lead moreover to further trial in the same direction. C.

The Roller.

Of all the implements in use upon a farm, we consider that there is none, with the exception perhaps of a plough, more absolutely necessary to a thorough working of the soil than the roller. Indeed, we pin our faith so strongly to the roller, that we consider a farm might as well be without harrows as without the roller. Until we actually looked about us and made many direct enquiries we could not have believed that at least 50 per cent of our farmers, have not, nor did they ever possess a roller; while on the other hand we can find none who one possessing this implement will ever be without it. Of course, in neither of these categories do we include that class who don't buy one, although knowing its advantages as they can always find some kind, but to our mind, foolish neighbour who will "lend the loan of his'n."

The late seeding time of the past season was peculiarly dry, and we observed more barley sown upon lumpy land than usual. The grand secret of success in barley raising is thorough cultivation. The seed bed should be, if possible, as mellow as on onion patch, while fine tilth is an absolute essential to a sure catch of clover seed. When land is dry and breaks up lumpy we may harrow for a week without much effect, the harrow teeth jump from the lumps and slide past them. But the roller will crumple such lumps to dust. We have this year taken particular notice of the length of time taken by barley to come up, and have invariably found that it will be from 2 to 5 days later upon land that is lumpy than upon a mellow bed. In dry weather we use the roller as much as the harrows, invariably rolling immediately after the plough, and before dragging. A soil whose surface is finely mellowed will retain moisture much longer than a rough field. Therefore on our lighter lands roll your Spring crops when they are a few inches high; thus retaining moisture and compact the earth firmly about the roots. When a man plants a cabbage he always presses the soil tightly around its roots. Cereals require the same treatment, and this may be accomplished by the use of the roller. We believe that the time is not far distant when the iron rollers "The Cambridge" and "The Crosskill," so much used in the old country, will be adopted here. In the mean time let us assure our readers, that a roller at 25 dollars, compared by the good work preformed is of equally as much value as harrows at 20 dollars.