# Farm and Garden.

Plowing Hillsides.

The enormous less the country annually sustains through the annual plowing and washing of the hillsides cannot be estimated but this loss is great and its effects are far-reaching.

Agricultural writers have not discussed the question of saving our inheritance so much as methods of increasing crops, improving flocks and methods of work which will diminish labor and increase income.

It is poor econoriy to devise means for making higger crops and getting heavier rates of interest while we negleet to secure the principal. The Ohio River and its tributaries furnish us a beautiful diversity of soil in the valleys and among the hills. The bottom lands are easy to cultivate and their fertility was increased by the wash from the hills so long as the timber was le con them, and there was an annual gowth of foliage to keep up the supply of falling leaves, and by the winds and rains gradually carried into the ravines, and to the valleys of the creeks and rivers to add to the supply of humus which has for ages enriched these bottom lands.

As soon, however, as the timber was cut away the rich deposit on the hillsides invited cultivation. Not a halfcentury has passed since the timber Miamis and their tributaries, many of the slopes are too bairen to produce grass. They are no longer worth tilling, and the plow has stopped, but not till its work of destruction is complete. Fifty years ago these beautiful hills were clothed with trees, beneath which was a luxuriant herbage, making them ideal pasture lands, well watered by rivulets and springs. But the forests are gone and the plowed soil has followed, and the rocky beds of a y streams are found where once were flowing springs. I have shown in these columns how one of these barren hillsides, clothed with a locust grove has again brought forth grass able to endure this year one of the severest drouths we have had in ten years. An old resident has just told me that he helped to cut off a beautiful growth of sugar maple, hickory and black walnut from this very hillside within fifty years and had cradled there as heavy wheat as he ever saw.

Another old citizen pointed out a field of twenty acres which he bad helped to clear 42 years ago. After clearing it he helped to cultivate it in pototoes and com and never struck a stone with the plow. The soil was

project out of the ground in places two feet. The land was worth before it was cleaned \$55 an acre. To-day it would be hard to sell at any price. These projecting stones and the statement of a credible witness who says that forty years ago there were no stones near the place help to measure the annual wearing away of that rich, deep soil which it had taken ages to produce. The average wearing away of this field has been but an inch a year. But as the stones began to crop out some twenty odd years ago, and as it has been plowed very little for five years, we can see that when the soil was rich and loose and plowed often the wearing off must have been double that of the average.

Now that field is worse than dead capital. It stands there as a reproach and tells a story of reckless waste. It is a disgrace to our farming methods. It shows that the wake of our boasted enterprise is barrenness. And this is only one of the thousands of such examples which mark our civilization. But these wasted hillsides are not done with yet. They are factors in making the soil of the valleys now as they always have been. A half century ago they were rich and clothed in beauty; to-day they are poor and naked and send down the streams no longer with the great overflow, a liberal deposit of leaf mould to make the soil in was stripped away, and yet along the the valley rich and strong. The writer has plowed on the Miami bottoms after an overflow and found the recent deposits of leaf mould and loose soil more than plow deep. Then we considered the inconvenience of such an overflowamply compensated for by the riches left on our soil. Not so now. The overflows of 1883 and 1884 have not improved the bottom lands as of old. The character of that deposit is entirely changed. It is now tough, waxy and destitute of the leaf mould which before gave life and fertility to the bottom lands.

> This old despoiling of the hillsides with the axe and the plom is bearing disaster to us and posterity. The evils of it are not visited alone upon the reckless owner of the hibside nor upon his sons, but the curse is entailed and is felt to the third and fourth genera-

> The evil comes from the destruction of trees and the soil. The remedy is to come by restoring the trees and then kind nature by the same nuceasing forces will aid us in restoring the soil.

When the hillsides are yet strong enough to grow grass, economy and public good demand that the owner deep, black and strong. To-day that shail stop further destruction with the trees nor grass. There are scattered his children will be better secured by have celery the greatest part of the mullein, milkweed and dock. Rocks grass and trees than by cultivation on winter.

the hillsides, whose surface will wash into the valleys as soon as it is loosened with the plow.

L. N. BGNHAM.

### Celery in Winter.

Many people grow celery for family use, who find it very difficult to keep it for winter, the chief difficulty being to prevent its rusting. Now, if kept out of doors, there is not much trouble, but laid by, in almost any form in the root cellar, celery will rarely last very long in good condition. Usually, amatuers make the mistake of having stall earthed up together at once; whereas to keep weil late in winter the earthing up must be deferred as late as possible and only enough to keep the stalks from spreading and getting out of shape. For market purposes the earliest here is usually dug in July, and it is generally smaller and somewhat inferior in other respects to what may be called the main crop which comes late in September, and on through the months of October and November, after which the winter crop map be said to begin.

In neighborhoods where a large quantity is grown, it is not safer to have much of it unprepared in winter quarters later than the middle of November. The opposite practice will sometimes cost the grower great loss py a single frost. It is not because celery fails to stand several degrees of cold say ten or fifteen, but it is unsafe to risk much more than this. This is particularly true of that in the best condition for late keeping, having the green much exposed.

The place selected for keeping celery must be free from standing water. If not certain as to this for a depth equal to the habits of the celery it is necessary to raise the plants above the surrounding level. Choose a dry day, take up all the celety with what roots and soil will cling. Make a trench the depth the celery is high, and wide enough to form a bed that will hold, say a dozen stocks. Set them in this trench as nearly perpendicular as possible and as close together as they will stand. Pack soil just enough to these to keep the next row apart, which proceed to place the same way as the first, and so on until all are in position. When completed one has a bank of celery and earth, with the tops of celery just peeping out. Here it may remain until signs of a very sharp frost appear, when some litter must be placed over every part of the bank, sufficient to keep the frost from penetrating more than a few inches into the soil. Yet there must not be so heavy a covering as to cause any danger of heating. Choose warm spells to get at as many stalks as are likely to be field is a barren waste. It has neither plow, His own interests and that of wanted for a week's use, and you may

For small family beds, instead of a dozen stalks wide, the trench may be made only three, or a quantity to suit the demand. By this means, very small and late celery is often put away and sold, or used in the family late in the winter or early in the spring.

### Rats and Harness.

Cavenne pepper mixed with the proper quantity of oil, rubbed over the harness will effectually prevent it from the gnawing of rats, which we have known to virtually destroy it, when these vicious rodents are in a partial state of starvation which they frequentare in severe weather. The mixture should be composed of an ounce of cavenne to a quart of oil. It is also stated that an cunce of aloes to a quart of oil will afford the same profection.

#### Seasonable.

Rake up the leaves from the lawn. Cut the weeds along the fences and burn them.

Apply mulching to such trees as need it.

Clean the dead stalks from the asparagus and cover two inches thick with manure.

Oil all metallic tools.

Build a cone or mound around young fruit trees to protect them.

Cut your grafts and secure them for the winter.

Make current and gooseberry cutt-

The best protection for new set strawberries is to draw earth up around them, leaving a little trench of earth, and to protect newly set raspberries, blackberries, grapes, &c., draw a little bank of earth over them, and in spring draw this away.

Scab in potatoes, a thing quite common in many parts this year, may be prevented by salting the land (i. c.) using salt as a fertilizer.

## Loss of Flesh and Strength.

with poor appetite and perhaps slight cough in morning or on first lying down at night, should be looked to in Persons afflicted with consumption are proverbially unconscious of their real state. Most cases commence with disordered liver, leading to had digestion and imperfect assimilation of the food, hence the emaciation or wasting of the flesh. It is a form of scrofulous disease, and it is curable by the use of that greatest of all bloodcleansing, anti-bilious and invigorating compounds, known as . Dr. Pierce's Golden Medical Discovery-"

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