

spiky, very coarse, but very prolific even on poor soils.

The "Black Tartarian Oat" is similar to the white in all respects except color, and a little coarser straw.

The "Old Black Oat" is rather late. Straw fair length, and thin or wiry; is fair fodder. Grain rather long and thin; weight light; yields fairly.

The "Sandy Oat" is described as a rather early kind. Straw tall and stiff. Grain small; well set in husk; not liable to shed when ripe.

The "Georgian Oat" is described as rather late and prolific, with short straw. Grain large, growing chiefly towards one side, and threshed with difficulty.

The "Angus Oat."—Straw short, weak, and fine; rather late, with pretty plump grain.

The "Skinless 'at" is an early sort, and the grain is free from husk.

Many other varieties to the number of 50 to 60 are named, but we fear we have already said too much on this point, and shall proceed.

"The General Management: The Rotation of the Oat Crop."—We think the largest yield and best quality of grain are produced from "new land," i. e., land broken up from grass or lea. The next in point of yield and quality is land from which the crop of rape or turnips, mangolds, &c., have been fed or carried off. And the next in gradation is the bare or dead fallow; but, objecting, as we do, to bare fallows, and more particularly to the course being extended through the winter, we should decline entering upon its culture in this way. We know, however, that many districts will not produce any other corn crop of equal value, and it therefore demands our notice. The next is after beans, peas, or potatoes: this on good soils only; and, in most other cases, such as after barley or wheat, we consider it such a direct cross-cropping as to be alike injurious to the land and the crop.

The preparation of grass land for the oat crop should be by deep ploughing in the winter or early in the spring, to give time for the herbage and grass roots fully to decay, and for the furrow to be compressed to the furrow sole. As the season for sowing approaches, it should, if the weather is suitable, be rolled down, and left for a few days. The harrows may then be set to work, and drilling immediately to follow. The same course should be pursued with clover leys or seed land, great care being taken to have the furrow well pressed down upon the furrow sole, and that the herbage is sufficiently buried so as to promote speedy decay. By these means much will be done to prevent the ravages of the wire-worm, the grub, and the slug or snail, which usually make such havoc on such lands.

Oats after wheat, rye, barley, canaryseed, or other similar cropping, we consider highly detrimental; and it must be under very extraordinary circumstances that we could sanction even an occasional crop under such a course, and then only after several ploughings or scari-

fyings and the application of manure. The oat crop is an exhausting one; and such is its nature that it will appropriate to itself every particle of ingredient in the soil which would not readily be taken up by other plants without renewed tillage: on this account it must be highly judicious to future culture. Von Thair says: "This grain has such vigorous organs that they can dissolve and appropriate nutritious particles which would be of no use to any other kind of corn: they even appear capable of dissolving insoluble acid humus." If such is indeed its character, it ought never to follow a grain crop, but be confined to the turnip, grass, or pulse rotations.

The usual time for sowing oats is the month of March or the beginning of April; if sown earlier, as in the autumn or even in February, the cold winds or late frosts are apt to do the crop serious injury, and frequently destroy the plants altogether; or, again, if deferred till May, the drought of summer is sure to destroy much of the crop on many soils, by actually burning up the plant, in others by preventing its usual growth; but should the summer be a moist one, the crop then runs to straw, and the yield of grain is very defective. It is universally allowed that the oat crop requires more moisture than any other in the soil; and it is very important that it arrives at its proper growth for the formation of its grain before the parching heat of summer is in full force. If the summer does prove a moist one, its safety against luxuriant and excessive growth may readily be provided for. We recommend in such cases, where the crop is becoming rank, coarse, and likely to go down, that it be "topped" either with hook or scythe: indeed our practice is to have our crop looked over every season, and the heavy or laid places lightened: it makes the sample of corn more even in size and color. We prefer this mode of dragging the crop with a horse-rake, as is a more general case. The great thing is to commence in time, or before it does fall to the ground from excessive luxuriance. Dragging injures the stems, by breaking down some and crushing others; and the horse tramples much down besides the trouble of getting off the raking. We frequently top our oat crop twice: this renders it strong, and the yield is immense.

We think the decaying toppings conduce to promote the fuller formation of grain in the plant, acting in some degree as a top-dressing.

The quantity of seed sown should not be great. It was customary to sow from five to six imperial bushels to the acre: experience has proved this to be a most erroneous practice. We now drill from eight to fourteen pecks per acre, and find that amply sufficient. We vary our quantities according to the richness of the soil, the safety from wire-worm, grub, &c., the period of sowing and the manner in which we are able to get in the seed. Every practical man can form a fair judgment on these minor matters. We also prefer drilling at nine-inch intervals; it gives