

Remember, too, that the sun parches the surface and near the surface more than *further down*, and if the ground is made loose *down there* the roots of the crops will thus be supplied with moisture. A soldier isn't so apt to be killed in a pit as on top of the ground—corn and cotton roots ditto."

THE *Western Rural* pertinently says:—"There are hundreds of tons of hay lost every winter among farmers by careless feeding. We have been astonished sometimes when witnessing the amount wasted around barn-yards and stacks. The waste is entirely unnecessary; and if it was made the rule of every farmer never to feed any kind of stock upon the ground, thousands of dollars might be saved annually. There are times, to be sure, when the earth is frozen dry and clean; but if racks are not provided, full one half of the time the hay will be dealt out either in wet snow or mud, and a good portion lost."

THE *Canada Farmer*, in an article on drainage, says:—"It has been computed that one inch of extra depth in ploughing has added 285 tons of extra soil to one acre, and rendered it capable of retaining under its surface about 1,560,000 additional cubic inches of air. Draining helps the opening up of soil, for air circulates through the drains when they are empty, and from them into the soil. Many experienced drainers consider this a matter of so much importance that they lead all drains to the surface at one end, or give them an air connection by laying in a drain at the top of the field, to which all the other drains are connected, having each of its ends opening to the surface."

THE *Southern Cultivator* (Athens, Ga.) thus presents its ideas of rotation of crops:—"As regards habits of growth, cultivated plants may be divided into two classes: 1st. Those with long tap-roots, as peas, clover, cotton, etc.; 2nd. Those with numerous, fine, fibrous roots, as corn, wheat, barley, rye, and the grasses proper. The former send a large portion of their roots deep into the soil and subsoil, and draw their food largely from these lower depths; the roots of the latter are chiefly confined to the upper layers of soil, from which they take their supplies. One can readily see, therefore, that while several crops of small grain might exhaust the upper soil too much for another crop of the same kind to succeed well after them, the deeper layers of soil and the subsoil may still be rich enough to sustain a good crop of peas, etc. In every rotation, therefore, some fibrous-rooted and some tap-rooted plants should enter."

THE *Western Farmer* (Madison, Wis.) says the wheat crop of that State will average but thirteen and a half bushels to the acre, and then makes up this melancholy estimate of its cost:—

Two bushels of seed at \$1.12½	 \$2 25
Ploughing one acre	 2 00
Sowing one acre with broadcast seeder and harrowing the same twice	 70
Harvesting and stacking one acre	 3 00
Threshing 13½ bushels, including labor, teams, and board at 12 cents	 1 60
Cleaning and hauling to market, at 7 cents	 92
Interest on one acre of land, at \$60, at 7 per cent	 4 20
Cost of one acre, 13½ bushels	 \$14 72
Cost of one bushel of wheat	 1 09
Market price, December 20th	 75
Loss per bushel	 34
Loss per acre	 4 59

COLLECTING MANURE.—The collection and application of manure should go on continually, for the grasses and cereals and all kinds of cultivated plants make an annual draft on the soil for the ingredients which enable them to build up their stems, foliage and seeds. No liquid or solid manure suited for enriching the soil, should be allowed to go to loss about the homestead. Soapsuds, wood ashes, soot, charcoal, sawdust, etc., may be applied to the soil with much benefit to the crops. Leached wood ashes are very useful for top-dressing grass land, deepening the colour of the plants and increasing their productiveness, so much as to double the acreable yield of hay whenever they have been applied in sufficient quantities.—*Rural New Yorker*.

The Live Stock.

PREMIUM DRAUGHT STALLION "ENGLAND'S GLORY."

[SEE FRONTSPIECE.]

The engraving which we present on a fly-sheet this month depicts the mammoth, yet symmetrical and handsome, form of the heavy Draught Stallion "England's Glory," winner of the highest honours in his class at the last Provincial Exhibition. This majestic and ponderous animal, was imported from England by his present owner, Mr. J. J. Fisher, of Ben Miller, Ontario. We append a list of his achievements in the prize ring up to the date of the last Provincial Fair:—

1st prize as best draught foal at Boston, 1865.
1st prize at Burton-upon-Humber.....1867
1st prize at Lincoln County Fair.....1867
1st prize at County Fair, Blythe.....1868
1st prize and diploma, Prov. Fair Hamilton 1868
1st prize at County Fair, Brucefield.....1869
1st prize at County Fair, Clinton.....1869

THE APIARY IN MARCH.

Bees were confined to their hives by cold weather earlier than usual last fall. The honey obtained the past wet season is thinner and more waterly than usual; hence bees that are confined to their hives and those that have been housed, should be allowed to fly as early as possible, so that they may discharge their foci. The longer they are confined without flight, the more uneasy they become. Hives painted dark receive the heat of the sun more than light-colored ones, and sometimes cause the bees to fly when it is too cold for them to return. Such hives should be shaded from the sun during the warmest part of the day. A few boards laid in front of the hives or straw scattered often saves the lives of hundreds of bees amply repaying the trouble. Bees that have been housed should not be brought out only when the weather is warm enough for them to fly well, if they are, thousands of them will be lost.