

vation, that it was *not* much above the average yield of the wheat producing counties of England. The soil of this farm, Mr. S. says, is "what is termed in England 'strong land,' being a stiff red clay, intermixed with flint and iron stone, alternating occasionally in the same field with loam and gravel."

Our farmers would think they were doing pretty well to average over forty-four bushels to the acre, in a field of seventy-two acres of wheat, and it is fair to infer that this excellent crop must be attributable as much to understanding the art of cultivating as to the strength of the soil.—*Maine Farmer.*

TO WHAT EXTENT DO THE ROOTS OF PLANTS ENTER THE SOIL?

Perhaps no fact is so little understood as the depths to which the roots of plants will travel in a well disintegrated soil; the length of roots, also, in their horizontal travel, is much greater than is generally supposed. We have tried a number of experiments to ascertain these facts, and the results are as follows:—The roots of Indian corn, although invisible to the naked eye, have an average length of five and a half feet, while those of the onion are generally eighteen inches in length. If a trench be dug through a garden which has been thoroughly sub-soiled, and the side of this trench be washed carefully with water, the roots will be found to pass down to a depth of thirty-four inches as a maximum; such plants (like the onion) as have a less length of root going to lesser depths. During a severe drought, however, even the shorter rooted plants will throw down minute fibres, which bring up moisture for the sustenance of the plant.

Thus we find that meadows, if well sub-soiled to full depth, before being put down to grass, never run out; but those which have been plowed to slight depths, soon begin to fail. We have examined many such meadows, and have always found that when the termini of the roots of grasses meet with a cold and compact sub-soil, they decay and prevent a healthy condition of the plant above; those meadows which have been previously fully sub-soiled may be mown for years without any material deterioration in quality; and, indeed, if the soil contains a full supply of constituents or receives them from judicious top-dressings, the meadow may be mown for any length of time without renewal.—*Working Farmer.*

N. Y. STATE AGRICULTURAL SOCIETY.—The following are the officers appointed for the ensuing year, at the annual meeting, held on the 17th inst., at Albany:

President.—E. B. PRENTICE, Albany.
Vice-Presidents.—Ambrose Stevens, N. Y.; Lewis G. Morris, Westchester; Anthony Van Bergen, Greene; Z. C. Platt, Clinton; J. B. Burnett, Onondago; E. C. Frost, Chemung; Oliver Phelps, Ontario; Nelson Van Ness, Chautauque,
Cor. Secretary.—B. P. Johnston.
Rec. Secretary.—J. McD. McIntyre.
Treasurer.—Luther Tucker.
Executive Committee.—B. B. Kirtland, J. J. Viele, H. Wendell, A. Thompson, Henry Wager.

The next Fair is to be held at Albany. The Society unanimously adopted a resolution, requesting Congress to establish a National Agricultural Bureau.

TO CURE BLOATING OR HOVEN IN CATTLE.—A tablespoonful of spirits of hartshorn, for an ox or cow, or a teaspoonful for a sheep, will afford instantaneous relief. It should be diluted with water or milk. It acts by decomposing the gas generated in the stomach, which is the cause of the disease.

THE FARMER.—A BEAUTIFUL PICTURE.

The man who stands upon his own soil, who feels that by the laws of the land in which he lives—by the law of civilized nations—he is the rightful and exclusive owner of the land which he tills, is by the constitution of our nature, under a wholesome influence, not easily imbued from any other source. He feels—other things being equal—more strongly than another the character of a man as the lord of the inanimate world. Of this great and wonderful sphere, which fashioned by the hand of God, and upheld by his power, is rolling through the heavens, all is his: his from the centre to the sky. It is the space on which the generation before him moved in its round of duties; and he feels himself connected by a visible link, with those who preceded him, as he is, also to those who will follow him, and to whom he is to transmit a home. Perhaps his farm has come down to him from his fathers. They have gone to their last home; he can trace their footsteps over the scenes of his daily labours. The roof which shelters him was reared by those to whom he owes his being. Some interesting domestic tradition is connected with every enclosure. The favourite fruit-tree was planted by his father's hand. He sported in his boyhood beside the brook, which still winds through the meadow. Through that field lies the path to the village school of earliest days. He still hears from his window the voice of the Sabbath bell which called his fathers and his forefathers to the house of God, and near at hand is the spot where his parents laid down to rest, and where, when his time is come, he shall be laid by his children. These are the feelings of the owner of the soil. Words cannot paint them—gold cannot buy them; they flow out of the deepest fountains of the heart; they are the life-spring of a fresh, healthy and generous national character.—*Hon. Edward Everett.*

SIMPLE REMEDY.—The following simple application for a horse's feet which are brittle, or hoof-bound, I learned from an English shoer, and having tried it with good effect and never having seen it fail, I send it to you to be used as you may deem proper.

Mix equal parts of tar and some soft grease, and having the foot clean and dry, apply it hot, but not boiling, to all parts, letting it run under the shoe as much as possible.

In bad cases the application should be made every day, for a while, and then two or three times a week, till the foot becomes strong and smooth.—*Correspondent Genesee Farmer.*

GALLS FROM HARNESS OR SADDLE.—"A Volunteer" tells the *New England Farmer* that the following remedy was found to be invaluable in the fatiguing marches in Mexico:—"White lead, finely pulverized, is the most effective application. Rubbed on dry, or made into a paste with milk, and applied a few times; it will also prevent white hairs growing on galled places.

RECEIPT FOR A RIDER.—Keep your head up, chin down, chest forward, shoulders back, elbows in, hands down, back in, belly out, fork forward, thighs fixed, knees in, legs close, heels down, and toes in. Trot two hours a day without stirrups, loins loose, seat firm, hand tight, horse and rider well balanced, and then time and perseverance may make you a horseman.

TAN CONVERTED INTO MANURE.—This, it is said, may be successfully accomplished, by placing alternate layers of spent tan and lime—the former two feet thick, the latter $\frac{3}{4}$ inches—remaining thus for two years.