

UNION OF AGRICULTURAL SOCIETIES.—We are glad to see that the Puslinch Agricultural Society has made a move, with a view to an amalgamation with all the Societies in the South Riding, for the purpose of having a Union Show; when the funds of the County and Township Societies would be thrown together. Puslinch hitherto has been looked upon as the standard advocate for upholding Township Shows. Now that her society has voluntarily come forward and offered to amalgamate, we hope the other Township Societies will follow her example, and that in once we may have a first-class show in our new hall, at which prizes worth competing for will be offered. *Guelph Herald.*

SOUTH WATERLOO ON RECIPROCITY.—Your readers, representing as they do one of the wealthiest and most important county societies in Canada, wish to enter a strong expression of opinion as to the want of integrity displayed by the American Government in the carrying out of the Treaty, by the absurd prohibition of the importation into that country of Canadian stock. And although the American market is of immense importance to the prosperity of Western Canada, yet they will never submit to be forced into anything which may compromise their dignity or self-respect.

Unanimously adopted at one of the largest agricultural meetings ever held in the county.

HOW TO MAKE CORN WORTH \$1 PER BUSHEL.—I have known at least one farmer that always made his corn bring a dollar a bushel when he received six dollars per acre for his pork. He did not, however, feed the corn in the ear, nor starve his animals at one time and fatten them at another, nor keep them in a dirty, comfortless pen, nor half starve and freeze them in winter, when in the condition of "store pigs," nor select a large-boned long-nosed breed. On the contrary, he was careful to procure animals which had a large infusion of the best blood (as Berkshire or Suffolk), to keep them growing right along without check from the commencement of their existence until handed over to the butcher, and to feed them with great regularity, without overfeeding, on ground meal, scalded in barrels a day or two previous. Strict cleanliness and comfort were attended to in every particular. *Country Gentleman.*

DIGGING WELLS.—How to DETERMINE WHERE WATER IS.—At a recent meeting of the American Institute Farmers' Club, a member related his experience in this matter as follows:—"An Irishman in his employment, in order to ascertain where he ought to dig to obtain water soonest, got a stone and buried it over night in the ground, next to the hardpan. In the morning he found it quite moist, but not sufficiently so to suit his fancy. Next night he tried it in another spot, and it was found very wet on the following morning. "There," said Patrick, "you will find water not many feet deep, and plenty of it." So, enough in a few days' digging, Patrick could find his position, notwithstanding the jeers of the workmen, finding a vein which filled the well to overflowing, and rendered it exceedingly difficult to bail out the water so as to stone it. The philosophy of the operation seems to be that as great evaporation takes place from the surface of the earth during the night, the water rises up from the depths below to supply the loss, and accumulates in the vicinity of the stone, often making quite a puddle."

FARMER'S SCRAP-BOOK.—The *Agriculturist* has the following: "On the study table of a very studious farmer of Westchester Co., N. Y., we examined a system of keeping and classifying all kinds of information gathered from his reading, which is worth copying. He has numerous sheets of stiff brown paper folded once, for use as portfolios, and considerably larger than large letter paper. In these are numerous other half-sheets. The portfolios or paper covers have written upon them the various subjects which most demand his interest and attention. For instance, one is probably labeled "Sheep," and in this he places all valuable items about sheep, cut out of newspapers which he does not keep whole for binding, even advertisements, hand-bills, circulars, etc. These are pasted neatly upon the half-sheets, and at the same time classified still further if possible. Then, also, upon writing paper he makes memorials of facts, or where to find important articles which he meets with in his reading in books, or in journals, which he preserves. In the same way he has a cover devoted to each class of stock, to the prominent classes of fruits, vegetables, and other crops, as "Stone Fruits," "Small Fruits," "Apples and Pears," "Roots," "Indian Corn," "Small Grains," "Grass and Hay," &c., and so has always ready for immediate reference a vast amount of valuable information, which would otherwise not be found when most needed."

British Cleanings.

WIND.—The *Farmer and Gardener's Almanack* gives the pressure of wind per square foot in lbs. at different velocities in miles per hour. Velocity 83 m. per hour (a hurricane) pressure 31.13 lb.; vel. 10 m. (great storm) 17.71 lb.; vel. 50 m. (storm) 1.30 lb.; vel. 40 m. (very high wind) press. 7.87 lb.; vel. 30 m. (high wind) 4.42 lb.; vel. 20 m. (very brisk gale) 1.96 lb.; vel. 10 m. (brisk gale) 0.19 lb.; vel. 5 m. (gentle breeze) 0.12 lb.

SKELETON LEAVES.—The leaves are boiled for two minutes, then transferred to a strong solution of permanganate of potash and gently heated. In an hour or two the laxer tissues may be easily removed by means of a brush. Sulphurous acid or a solution of chloride of lime may be used for bleaching them. The stains of permanganate of potash upon the flaggers are easily washed off by sulphuric acid. *H. F. Church in Chemical News.*

WILD BEASTS KILLED IN CENTRAL INDIA.—The *Central India Times*, of the 25th October, says:—"We have before us a list of animals killed in these provinces during the first half of this year, with amount paid for rewards. Total number of animals killed: Tigers, 350; leopards, 516; bears, 193; wolves, 92; hyenas, 286; making in all 1553, for which 23,561 rs. 5a. have been expended. The number of animals killed is larger than the number killed during the preceding year, the rainy season of 1864, but it is somewhat less than the result attained in the corresponding half-year of 1861. Mr. Campbell hopes the decrease may be due to an actual decrease in the number of wild animals."

Beware of New Potatoes.—This favourite esculent contains a vegetable base of deleterious quality, called solanine, which is especially developed in the plant when it is shooting. Dr. Haaf has ascertained that solanine not only exists in a considerable proportion in the shoots, but in the tuber itself, and at two extreme periods of its existence, viz., when scarcely formed, and when very old, the skin containing more of it than the pulp. Hence people that chiefly live upon potatoes should beware of new ones, which are generally so highly prized as delicacies; they ought at least to be peeled, and rather boiled than fried, because water carries off a good deal of the solanine. *Gardener's Chronicle.*

SOILS. The *Farmer and Gardener's Almanack* states that "100 lb. of pure clay absorbs 70 lb. of water, while the same weight of pure sand absorbs 15 lb.; clay loam absorbs 50 lb.; chalk, 45; loamy sand 40; and calcareous sand 25. Schubler's experiments show that 1000 tons of pulverized soils will absorb moisture when exposed to the atmosphere as follows:—Sandy clay, 26 tons; loamy clay, 30 tons; stiff clay, 56 tons; and garden mould, 45 tons. If the cohesive power of pure clay is taken as the standard, and stated at 100, pure sand being placed at zero, the cohesive power of fine lime is 5, loamy clay 65, sandy clay 57, humus 8, and arable soil 33. Clay soil can be raised and burned at a cost of 6d. per cubic yard. Cubic yards of soil required to cover an acre 4 inches deep, 538; 6 inches, 807. Labour of excavating, filling, and spreading, 24d. to 3d. per cubic yard."

SALE OF PRIZE POULTRY.—We learn from the *Farmer* (Scottish) that recently "a fine selection of prize poultry, from the yards of Sir John Don Wauchope and others, was sold by auction by Messrs. Lyon & Turnbull, in the Riding School, Lothian Road, Edinburgh. There was a large and highly respectable attendance of purchasers. The prices were generally high, and among the sales were the following: A dorking cock, which gained the first prize at Stafford and Dalkeith (24 years old), at £1 4s.; a dorking cockerel, which gained the first prize at Dalkeith (ten months), at £2 17s.; a dorking cockerel, highly commended at Birmingham (ten months), £3 6s.; a dorking hen, which gained the second prize at Darlington (24 years), at £1 3s.; a dorking cockerel, (10 months), at £2, and another of the same age at £2 2s.; two black Spanish pullets, winners of the second prize at Haddington (seven months), sold at £2 3s.; and two Spanish pullets (seven months), at £1 15s."

How to Keep Eggs.—Mr. G. Kennedy Geyelin, in his work entitled "Poultry Breeding in a Commercial Point of View," gives the following directions for the preservation of eggs:—"Now the most effective, simple, and economical plan for truly preserving eggs, and without imparting to them any foreign flavour, or rendering them unfit for hatching purposes, is to use the patent stoppered glass jars with vulcanized india-rubber joints, and proceed thus:—Immediately after collecting the eggs, put the jar in hot

water, and when thoroughly warm, so as to rarify the air, place the eggs in the jar the pointed end uppermost, and pack and line with paper shavings or cocoa fibres to prevent them from breaking; then close the jar before taking it out of the water, and it will be found that eggs preserved by this method will be fit for hatching twelve months after, and that those intended for the breakfast table will be as fresh as on the day when laid." The work from which this passage is extracted, details the plan of breeding and management carried out by the National Poultry Company, at Bromley, Kent.

LESLIE'S FARM CULTIVATOR.—We learn from a correspondent of the *Banffshire Journal*, who professes to have a fair knowledge of machinery, that, "a few weeks ago, there was a steam grubber at work on the farm of Burnside, occupied by Mr. A. Leslie, bank-agent, Turriff. The invention of this grubber by Mr. Leslie will form a new era in the history of agriculture. It were vain to attempt a full description, as the inventor is only experimenting, and several of the appliances are only temporarily got up, but enough has been done to show that the new grubber is a complete success. With either a six-horse-power engine or water-wheel of that power, with ropes, anchors, and pulleys attached, a farm could be grubbed to the depth of 10 inches to 15 inches. The grubber is on the locomotive principle, and the rope required to drive it is only five-eighths of an inch thick, little more than the strength of an ordinary plough-rein. To those who have not seen the grubber in operation, this would seem incredible. As a searer of lea, this grubber will be very valuable, and we venture to predict that (once it were matured), three men, with a six or eight-horse power engine, will either searify lea, or grub stubble land, at a rate of from five to eight acres per day. In the meantime, farmers should be getting out the fast stones in preparation, for we believe that, upon a number of farms, this grubber will supplant four-fifths of the horse labour at present required."

BEULMAN WINES.—A Correspondent of the *Standard* writes from Brussels, Dec. 22, 1865:—"One of your correspondents, the other day, inquired why the British public do not drink the cheap wines of the Continent. Now, it is possible that he never heard of the Belgian wine manufacture. I have discovered a trade which, until this day, I have not known to exist. It is one in Belgian wine. What wine? you ask. Any that can be labelled upon a tavern placard. The grape is a mere delusion—white or black, its juice can be excelled by any clever chemistry, only at the bottom of all the magic must be brandy. You want acidulation, resort to cream of tartar; you want oil, you have a hundred varieties; you must exhilarate, and what more potent than ether? It is light, scentless, and combines agreeably with every fluid known. So at this point you are getting, you fancy, very near the fulfilment of your artificial manufacture. I tell you no, you have not yet comprehended the importance of tartaric acid. It can do everything; it can ferment, it can sour, it can sweeten, it can mingle itself with all the deceptions of the dyer's vat; you may put any strengthening, thickening, or colouring matter with it—eggs or cavaire—and so long as the cork is sound the wine is safe, so I hear. Next, I may as well confess, on the part of this country, how they keep their citizens sober. Not a tenth of their wine, is wine at all. They use apricots, which yield a sickly cherry; myrtle leaves, rather oily and nauseous; brandy of course, and bad; almonds only in limited quantities, because they are poisonous; amber, for the sake of its aroma; Spanish pine cones, cherries, oranges, peaches, and even cheese. Cheese, I say, is distilled into a liquor, and helps to adulterate an infinite plenitude of manufactured wine. Then you drink in this overflowing land wine made of celery, of carrots, of burnt sugar, of chesnuts, of dates, of figs, of strawberries, and you are not so monstrously cheated, because the dealers do not conceal their transactions. You would like a barrel of beer. So much new bread, so much fresh water, and mix. So much strong wine, a quart of syrup, a quart of brandy, and two quarts of water. A false wine, I have been assured by the initiated, is often not so injurious to the stomach as a good one; but let your readers not infatuated by commercial treaties read and learn. Cheap Madeira is cider sweetened with honey, and kept six months in a cask; cheap Malaga is made of bad champagne, raw grape juice, and again cider; you convert it into Greek by adding soda. *Vin de Champagne Anglais* is gooseberry, sugar, and Cognac. Boiling water weakens, without entirely spoiling the compound, which comes to perfection in about eight days. All this, and more, I have extracted from the manufacturers, who need not much persuasion, for they carry on an enormous trade, and exult in English money. They are wise; the French charge too much for their wines, and imitations moderate the markets."