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Vol. I. No. 11.

Toronto, April 29th, 1882.

\$1 per annum, in advance.

### RURAL NOTES.

PHOSPHATE is sold by the Provincial Government of Quebec at \$6 per ton. Of course it is mineral phosphate.

JOHN SNELL'S sons, Edmonton, Ont., offer their celebrated Gold Medal flock of Cotswolds for sale. They will sell in lots to suit, but would prefer to sell all in one lot.

THE *Farmer's Review* (Chicago) has issued a coloured chart showing the agricultural products of the world. It was executed by the Lakeside Press, and is copyrighted.

THE best manure is made under cover. A wise farmer will not only try to save all he can, but try to have it of the best quality. Let no golden stream flow from the barn-yard after every storm.

OWING to the high price of potatoes during the past winter, it is likely there will be an unusual quantity planted the present spring; the probable results being an overstocked market and low prices next fall.

WASPS are such a source of injury to fruit in England that one enterprising gardener thinks it pays him to give threepence apiece for queens. Last season he bought and destroyed 1,192. Wasps puncture fruit; bees do not, but they follow the wasps and suck up the flowing juices.

IT is thought that new wheat will be in the American market from two to four weeks earlier than usual this year. Texas will give new wheat in May. Arkansas and Tennessee will follow not long after Texas. An extra early crop will do much to counteract an expected shortage arising from the light stocks of old wheat now on hand.

AT a recent meeting of the Orange County, N. Y., Farmers' Club, one of the members remarked: "I have three acres of orchard grass which produce more hay than any other grass on my place." He added: "I have observed that it will cut as early as clover." Orchard grass and clover make a better mix than timothy and clover.

RATS are often very troublesome in granaries. A correspondent of the *Journal d'Agriculture Progressive* suggests a method of getting rid of these pests, that has the advantage of having been most successful in his own case. It is to fill their holes with chloride of lime and oxalic acid, when a violent disengagement of chlorine takes place, their holes are filled with gas, and they are suffocated.

THE largest shipment of thorough-bred cattle ever made sailed from England on the 15th ult.

in the steamer *Texas*. It consisted of 205 head, seventy of which were Herefords, and the remainder Polled Angus cattle. They were purchased of the most noted British breeders for Hon. M. H. Cochrane, and the larger proportion of them will probably go to his great ranches in the North-West.

THE *Wilmington* (Delaware) *News* gathers from the reports of peach-growers representing a large section of country devoted mainly to that fruit, that there will be a two-thirds crop of posches, comparison being made with 1875, when the yield was enormous. Bearing trees never looked better at this season of the year, but their number was reduced about one-third by the severe winter of 1880-81.

A SYRACUSE, N. Y., grape-grower who has tried the Champion, says it is "early, hardy, prolific, and for a few days after colouring makes a fine appearance, but is really one of the poorest grapes within my knowledge;" and advises "anyone who can grow the Hartford, Concord, and Delaware, or even the Clinton," to plant these and "some other kinds whose fruit he can eat without squealing."

A DRAFT from the Bow Park herd of Shorthorns to the number of thirty-five head, and the Woodlawn herd of twelve head, were sold at Waukegan, Ill., April 20th. "Fair average prices" were realized; the highest figure obtained for any one animal being \$750. Next day Messrs. R. and J. Gibson, of Frederickton, Ont., sold forty-seven head of Shorthorns at Dexter Park, Chicago, the total prices amounting to \$27,000.

THE *Globe* of April 21st says: "Veal is the cheapest meat in Toronto to-day." So it ought to be every day, for it is the poorest, and the *Globe* is quite right in denouncing the wholesale slaughter of calves which is going on as "an outrageous piece of wastefulness." Every calf born into the world has two rights that ought to be respected: first, the right to be well-bred; and secondly, the right to live until it becomes profitable either for milk or beef.

THE famous Hampton Court vine, so long remarkable for its great size, large crop, and long-continued productiveness, is rapidly succumbing to the influence of time. It appears by the *London Garden* that after continuing, until recently, in health and vigour, bearing twenty years ago no less than 1,800 bunches, and nearly that number five years later, it is rapidly declining. Its fruit-bearing powers are nearly expended, after giving excellent Black Hamburgs for more than a hundred years.

CONCERNING the wheat market, the *Country Gentleman* says:—

"England is not so dependent on America for bread-stuffs as formerly, and if speculators now holding wheat for higher prices should lose money, they have no one but themselves to blame. In the words of the *Commercial Bulletin*, 'the fact is, the world now is practically all one market. If there are short crops here, or anywhere, the deficit can readily be made up from other sources of supply within range of the telegraph at all times, and unless there is a universal failure of crops—a contingency in the economy of nature happily not supposable—a recurrence of the famines with which mankind were formerly visited, even in civilized countries, would seem to be out of the question.'"

THERE are more oxen in Manitoba than in any other part of Canada, as they are better than horses for breaking up the prairie, and it costs less to keep them. But the supply is not equal to the demand, and at least a thousand additional teams could be sold here next summer when actual settlers begins to go in. A good team will bring \$150 to \$200 readily, and it ought to pay to export them from Ontario at these prices. More horses will also be needed, but care should be taken to let them rest after the long journey before they are put to work, as well as in feeding them till they get used to the water and hay there.

DARWIN, the great naturalist, died April 20th, in the seventy-fourth year of his age. During a long and earnest scientific career, he rendered much important service to agriculture and horticulture. His last work was on earth-worms, and the creation of mould through their agency. He was a bold and independent searcher after truth, and had the courage of his opinions. Even those who do not concur in all his conclusions must award him honour for his industry, sincerity, and devotion to the pursuit of useful knowledge, and accord him a distinguished place among the world's great men.

ONE of the famous weather prophet's critics says: "Out of thirty predictions made by Vennor for this region lately, two were just right, six partly right, and twenty-two wholly wrong." Another says: "So long as we have no means of knowing what the weather is in the northern polar regions, except guessing at it, our prognostications of the seasons must be merely guesses at best." To which the first-quoted critic adds:—"Amen, say we. And further, until we have some means of knowing the other vast, remote, and immensely varied causes that affect the weather months ahead, our predictions must be like setting the clock by guess, and then reading the time by it, or like the Dutchman's mode of weighing the hog—balance it on a plank with a stone, and then guess at the weight of the stone! Still, if we make enough guesses, some of them will come true."

## FARM AND FIELD.

## INSECTS INJURIOUS TO GRAIN AND GRASS CROPS.

The Joint-worm (*see Fig. 9*) devotes itself chiefly to barley and rye, occasionally, however, directing its unwelcome attention to oats. Its last appearance on a large scale, in this Province, was in the years 1866 and 1867.

Mr. Bethune says of this insect:—

"Its eggs are laid in the month of June, and, like those of the Hessian fly, are deposited about the first or second joint of the grain; the Hessian fly, indeed, having sometimes been mistaken for it. The effect of its work is to raise a gall or exorescence on the stock of the grain, close to the joint, somewhat resembling a joint—hence its name. The insect lives inside this swelling, where its larva work, while the Hessian fly lives in the depression of the outer surface. It attacks the stalk only, not the ear." He adds:—

"The best artificial mode of combatting this insect is either to burn the stubble of the infested grain, cutting high, so as to leave the first and second joints standing, or to cut very close and to burn the straw afterwards. These, however, are dangerous remedies, on account of the risk incurred by the use of fire."

The Anguimoth (*Butalis cercatella*), with its caterpillar, has been seldom seen, to any injurious extent, for a long period.

The Army worm (*Leucania unipuncta*)—*see Figs. 10 and 11*—has a terrible reputation, and is more common than many suppose, not often in such force as to produce very disastrous results, although it is sufficiently destructive. Mr. Bethune says of it:—

"This insect, so far as its habits are thoroughly known, feeds chiefly upon wild grasses of all kinds, and upon the grass of moist meadows and marshes, at times being excessively abundant. So abundant does it sometimes become in its own locality that, like the chinch bug and the locust of the west, and many other insects, it sets out to find fresh supplies. In order to do this, the insects assemble in very large numbers, and they all seem to go with one accord in a certain direction, as if they were a regularly marshalled army, hence the name 'Army worm.' Of course the stories about their being told off in battalions, etc., are purely mythical. Generally speaking, they do not turn aside for any obstacle; if they come to a fence or a barn, they try to go over it instead of around it. They will stream across roads, and the railway tracks in Long Island, and lately in New Brunswick, have been covered to such an extent as to prevent the movement of the trains, the driving wheels of the locomotive being so greased that they could not bite on the rail, and sand or earth had to be thrown on the rails to enable them to do so."

If the Army worm has up to the present time done no very serious injury to the crops in Ontario, it still must be regarded as an ever-present and possible danger. Mr. Bethune says on this point:—

"We in Ontario have never been visited by

such numbers, but we have had them to a certain extent and they are very destructive. When they appear in numbers the best method of meeting them would be to plough a deep furrow, or dig a trench, in the front of their line of march, with a steep side in the direction in which they are going, and when they are trying to get out of it, to throw straw or shavings or something of the kind and set fire to it, or otherwise to bury them with earth. It is an insect to which we are liable at

THE JOINT WORM—*Isosoma hordei*.

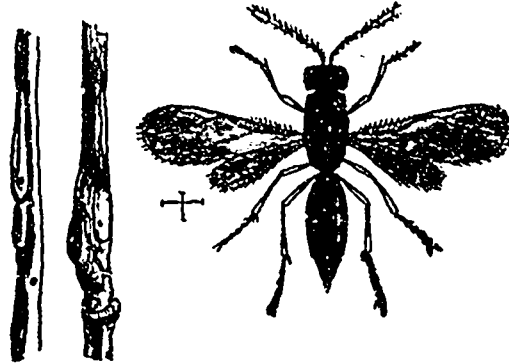


Fig. 9.

THE ARMY WORM—*Leucania unipuncta*.



Fig. 10.

Fig. 11.

Of which Fig. 10 shows the caterpillar, and Fig. 11 the moth.

THE RED-LEGGED GRASSHOPPER—*Caloptenus femur-rubrum*.



Fig. 12.

THE SEVENTEEN-YEAR LOCUST.

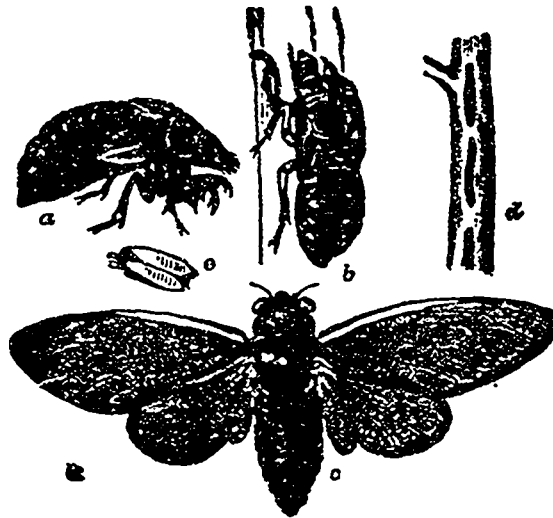


Fig. 13.

Fig. 13 represents different stages in the life history of the 17-year locust. (a) is the pupa; (b) the empty pupa-case after the perfect insect has emerged from it; (c) the perfect or winged insect; (d) the perforations in a twig for the deposit of eggs; (e) the egg.

any time, and any sort of vegetation, whether grain crops or anything else, is food for it. It is a very common insect, and I suppose all our gardens have a few specimens at all times, but it does not propagate very rapidly in our climate, though if the checks upon it were removed, it would increase enormously in numbers."

Poultry, wild birds of some species, and several parasites and friendly insects keep it in check.

"The Wire worm (*Agriotes mancus*)," says Mr. Bethune, "is sometimes troublesome to wheat. This insect lives altogether out of sight, under ground, and hence it is not much observed by the farmer. It is a long slender grub, with six legs

under the anterior portion of the body, usually of an orange-yellow or tawny colour, and is very hard, unlike our caterpillars, which are soft to the touch, consequently receiving its name, the 'Wire worm.' It feeds under ground upon the roots of vegetation, and is looked upon in England as one of the very worst foes of wheat. In Ontario, we have not been able to estimate its ravages as resulting in any great loss, though this may be because they are carried on out of sight. It is frequently observed in ploughing."

The wire worm, however, does not cease to be troublesome when it quits its larval state, and appears in the shape of the spring-back beetle.

"The perfect creature," says Mr. Bethune, "is very familiar; it flies into the house at night, attracted by the light, and may be found creeping about sap exuding from trees, ripe fruit, or anything sweet."

He recommends employing children to follow the plough and pick up the wire worm, or to turn turkeys and ducks into the ploughed fields, as remedies for the too great numbers of this creature.

The larva of another very familiar insect, popularly known as daddy long-legs (*Tipula*), is more injurious to timothy and ordinary grasses than to grain.

"Its larva," says Mr. Bethune, "is a grayish, dirty-coloured caterpillar that feeds upon grain, and vegetation of a similar kind. It has the faculty of surviving intense cold. Some years ago specimens were sent me that were gathered at the close of the winter in a field near Cobourg; they seemed to be perfectly hard frozen, and apparently as brittle as little sticks, but on the application of warmth, they became quite lively and prepared to feed. It attacks the roots of the plant, and meadows and lawns are often seriously injured by its ravages."

The Province of Ontario has never been afflicted by a visitation from the Rocky Mountain locusts (*Caloptenus spretus*), although, in other parts of the Dominion, that calamity has been experienced. The history of this pest and its migrations is interesting, but as, for reasons given in the evidence, there appears to be no reason to dread it in this Province, it will be sufficient briefly to notice Mr. Bethune's description of its habits. He says:

"The life history of this insect in a few words is as follows:—They are hatched out in the plains in countless numbers, eat up everything before them, and consequently become destitute; instinct compels them to move on, just as in the

case of the army worm, and being winged insects, they fly up into the air to a considerable height, and are then borne along by the wind, alighting when they reach a country covered with vegetation.

"Not being able to fly against the wind, their flight during the latter part of summer has been found to be invariably from the north and north-west towards the east, this being the direction of the then prevailing winds. They then deposit their eggs, from which are hatched out next spring, new insects. In the spring the prevailing winds are in an opposite direction, and the new insects, having obtained their wings, are carried back towards their original haunts,

whence, in turn, fresh hordes are borne to the east.

"They have never come much east of the Missouri River, and I think the Mississippi will be found to be their extreme limit eastward. This was the conclusion Professor Riley came to, so that we need never fear them in Ontario. The insect devours in all its stages."

We have, however, often a very disagreeable experience of the presence of the near relative of the locust, the red-legged grasshopper (*Caloptenus femur-rubrum*), its powers for mischief being limited, and only limited, by its incapacity for flying more than a few yards at a time. As a matter of fact, this insect is a locust and not a grasshopper at all. (See Fig. 12.)

"The grasshopper, properly so-called," says Mr. Bethune, "is a grayish-green insect that feeds upon grass and foliage, and is never sufficiently numerous to do much damage."

Mr. Brodie, in his evidence, refers to the great injury done by these insects to crops in the County of York some twenty or twenty-five years ago. Since that date the loss sustained by them in that district has been considerable. They were, some seven or eight years ago, so numerous in some parts of Muskoka as to inflict much suffering and inconvenience on new settlers, and the evidence taken by the Commissioners in that district shows they are still in places exceedingly troublesome. In the County of Lanark they have more recently done much mischief. Mr. James Donald, in his evidence, says on this point:—

"In our district the grasshoppers attacked the crops severely about four or five years ago. They had been numerous the year before, but did not hurt the grain crops. Four years ago they ate up everything but peas. They even ate the corn in the ear and the potato vines. The next year they were as bad. That induced people to raise rye, which got ahead of their ravages."

"The wet season at harvest time in the next year diminished them. Since then they have continued to decrease in numbers. They still do harm in the pastures. The years they were most troublesome were very dry years. The plentiful supply of grass crops is always a protection in the grain against their attacks."

"Of twenty-four acres of hay that should have given one and a half tons to the acre I did not get a load; and of eleven acres of oats I had none to thresh out. This was in the worst year—I think 1877. The spring wheat was also destroyed. Their ravages extended over the whole country, less or more, except in some of the good farm lands."

Other witnesses from that section of country fully confirm Mr. Donald's description. The grasshopper's favourite breeding grounds are old pasture lands and meadows with a light dry soil. To the parasitical enemies of this insect we have to look almost exclusively for its destruction.

The Cicada, often spoken of as a locust, "known by the peculiar shrill whizzing sound which it makes in the trees during the heat of the day," is hardly to be termed destructive in its habits. The seventeen-year and thirteen-year locusts of the United States are members of the Cicada family. The seventeen-year locust is represented in our illustrations. (See Fig. 13.)

#### SENSIBLE WORDS ABOUT CLOVER.

A correspondent of the *Country Gentleman* says:—

"Some people, rather than buy clover seed, will do without. This is all wrong. If I had a field to sow, I would pay \$20 per bushel for seed rather than not sow it, unless I had an abundance of grass and pasturage without it, and it could be re-seeded to grain without material injury. As good an investment as I ever made was when I paid \$13.50 for 50 pounds of clover

seed. I sowed it on eight acres of ground, and the next season cut a good crop of clover hay off it, and sold ten bushels of seed the same season for \$100. Another time I paid \$15 for 90 pounds of seed, and the next season, in addition to the crop of clover hay, had 80 bushels of seed, which I sold for nearly \$200. It is hard to put a proper estimate on the benefit that may be derived from sowing a bushel of clover seed, or the loss sustained by neglecting to sow it."

Another correspondent of the same paper says:—

"There is every prospect of a good catch of clover seed this spring, the frequent rains and absence of frost the past ten days starting the seed finely. More seed per acre will be sown this year than usual, partly because farmers are learning that it is better to sow enough to cover the ground and prevent weeds, and also because clover seed is unusually, and to me unexpectedly, cheap. The very best and cleanest—and none other should be sown—can now be bought at \$5.50 to \$6 per bushel from the seed stores. At these prices, if a farmer cannot afford a peck per acre, he should sell some land until he can."

#### KEEP THE TOOLS FROM RUST.

The simple preparation employed by Professor Olmstead, of Yale College, for the preservation of scientific apparatus, and which he long ago published for the general good, declining to have it patented, is made by the slow melting together of six or eight parts of lard to one of resin, stirring till cool. This remains semi-fluid, always ready for use, the resin preventing rancidity and supplying an air-tight film. Rubbed on a bright surface ever so thinly, it protects and preserves the polish effectually, and it can be wiped off nearly clean, if ever desired, as from a knife-blade; or it may be thinned with coal oil or benzine. A writer in *Forest and Streams* says that if oxidation has begun, no matter in how slight a degree, it will go on under a coating; it is therefore essential that the steel surface be both bright and dry when filmed over.—*Western Farmer*.

#### TREATMENT OF BONES.

Bones accumulate on every farm, and a hunt for them will bring out many more than one would expect to find. When properly treated, they furnish very valuable food for growing plants. Whole bones, as they are thrown out from the kitchen, are so slowly decomposed, that they are of little use, unless applied very largely. They need to be broken up or made fine in some way, that the large amount of phosphoric acid, etc., contained in them may be available. It is not practicable for ordinary farmers to have bone mills, and the next best thing is to break them up somewhat with an axe or heavy hammer, and mix them with unleached ashes, keeping the heap moist enough so the alkali will "eat" them, and render the bones soft. The bones thus treated will crumble to fine pieces when dried, and are then ready to be spread upon the land. Every farmer should see that all bones are made into a valuable home-made fertilizer.—*American Agriculturist for May*.

#### WHAT WAS RAISED ON AN ACRE.

A farmer living in Maine makes a statement of what he had raised last year on an acre of land—almost enough, we should think, to support a family. He planted one-third of his acre in corn, and he usually produced thirty bushels of good corn. This quantity was sufficient for his family use and for fattening two or three large hogs. From the same ground on which the corn stood he raised two or three hundred pumpkins, and an

ample supply of beans. From a bed of six rods square he usually obtained sixty bushels of onions; these he sold for one dollar a bushel, which amount purchased his flour for one year. Thus, from one-third of an acre and an onion bed he obtained his breadstuffs and two or three hundred pounds of pork. The remainder of the ground was appropriated to all kinds of vegetables, for both summer and winter use. He also had a flower garden, raspberries, currants, gooseberries, in great abundance, and also a few choice apple, plum, pear, peach, and quince trees.—*N. E. Homestead*.

#### CARE OF PASTURES.

A good permanent pasture, handy to the barnyard, is very convenient, almost a necessity, on every well-regulated farm. Such a field needs to be well fertilized and cared for, that it may give the best returns in an abundant supply of green food for farm stock. A top-dressing of fine well-rotted manure in winter is excellent, but if not done, a dressing of 50 to 100 pounds of nitrate of soda per acre may be applied. It is best to sow this just before a shower, that the rain may carry this very soluble food to the roots of the plants. After supplying the necessary fertilizers, it is important not to overstock the pasture. Let the adjustment between the number of animals and the capacity of the field be such that there may be good feeding throughout the whole season. If such a pasture has a natural spring, its value is much increased. Next to this is a well, provided with a windmill, for raising an abundant supply of water.—*American Agriculturist for May*.

#### CLOVER HERESY.

Pres. Elmira Farmers' Club: "If I wanted to use clover to enrich land, I should pasture up to the 20th of June, or thereabout, and then plough in. While I say pasture, I do not mean that I would allow the crop to be closely grazed. On the contrary, I would graze it to such an extent as farmers call 'half pasturing.' The effect is to strengthen the roots, and to leave, also, all the substance on the ground in the form of manure for the enrichment of the soil. In fact, it is complete utilization of the clover crop. I believe this is better than to plough in the full growth."

The facts are against you, Mr. President. There is more nitrogen in the mature crowns, roots, and dead leaves of the clover plant, at the end of the season, even after two crops—one of hay and another of seed—have been taken off, than there is at the period you propose to plough the green growth under. So far from your plan being a "complete utilization of the clover crop," it is a very in-complete one.

Our advice to farmers will bear repeating: "Don't sell your land at a decreased valuation because you want to go to some western Eldorado." You will make more money where you are if you own the land. Farm lands in this Province were not inflated in price before the fever, and there is no reason why a reaction should not set in and restore the values after this wild western craze is over.

Potatoes imported from Glasgow are now selling in Rochester, says the *Democrat*. The fact is significant. It shows conclusively the terrible effects of the drought last summer. The experience was that early potatoes succeeded best. It will be safe to plant early potatoes again in sufficient quantities. From the Scotch importation good seed potatoes may perhaps be secured. A potato of sufficient value to export is probably a good one.

**GARDEN AND ORCHARD.****THE FRUIT GARDEN.**

We trust that many fruit gardens will be started this spring. Select a warm piece of ground conveniently near the house for gathering the fruits and protection from trespassers. The soil should be rich, deep, and mellow; in short, a fruit garden should have the best soil that can be found. A list of the best sorts of grapes, raspberries, blackberries, strawberries, currants, and gooseberries has been given in the Notes for last month, so that the selections might be made early, and the desired plants ordered in time to receive the best attention from the nurserymen. The planting is to be done as soon as the ground is settled. Blackberries and raspberries start very early, and it is best to set them in the fall, but very early in spring will do. The canes that grow this year will produce the fruit next season. Every farmer should grow all the grapes the family requires, and for this it is not necessary to have a large vineyard. A few vines well kept in some out-of-the-way place will bring large returns for care bestowed upon them. Grapes need a good soil and attention in pruning. If one has no grape vines, we should advise him to get a few this spring, and then take care of them. Regarding the care of the vines we intend to give full information as the season progresses.—*American Agriculturist*.

**CHLORIDE OF LIME FOR TREES.**

*Le Cultivateur*, a French journal, says that if chloride of lime be spread on the soil or near plants, insects and vermin will not be found near them, and adds:—"By its means plants will easily be protected from insect plagues by simply brushing over the stems with a solution of it. It has often been noticed that a patch of land which has been treated in this way remains religiously respected by grubs, while the unprotected beds all around it are literally devastated. Fruit-trees may be guarded from the attacks of grubs by attaching to their trunks pieces of tow smeared with a mixture of hogs' lard, and ants and grubs already in possession will rapidly vacate their position. Butterflies, again, will avoid all plants whose leaves have been sprinkled with lime-water."

**CLUB-FOOT IN CABBAGE.**

This is a disease which affects the root of the cabbage, causing large, white bunches to grow on the root, and turning the nourishment that should go to form a head into the roots, to the destruction of a well-formed head, and sometimes to its total loss. My experience is that hog manure will produce it. That it will appear often when cabbage is planted the second year on the same land, or when cabbage follows turnips. Newly-turned turf, heavily manured this year and harrowed in with a wheel-harrow, gave a crop free from it, while ten rods away, on land upon which beans had been grown the year previous, every head club-footed. The land was ploughed and the cabbages turned under the last of July; Stockbridge manure was applied liberally and harrowed in, and the land was sowed to yellow globe turnips; these had tops two feet high, but the roots were wormy, hard, and hardly fit for cows to eat, and they could not be sold. Several years ago I had a similar experience on the same land with cauliflowers, yet the same acre sowed to timothy will produce good crops. I once sowed a mixture of salt and plaster (gypsum) on a bed of cabbage plants, and the whole bed proved club-footed; while another, where it was not ap-

plied, was free from it. It is useless to set plants that have the least tendency to the disease, for it develops rapidly; even after the bulb is taken off another will form when the plant is placed in the ground. Liberal manuring with horse or cow manure, ploughed in early, and then re-ploughed once or twice before setting to mix the manure in the soil, seems to have a good effect, and if the land has not had cabbage on it for two years before, a crop free from club-foot may be expected.—*Germantown Telegraph*.

**PEACH TREES FROM CUTTINGS.**

It seems that Mr. L. Waters thinks it a novelty to raise thrifty peach trees from cuttings. I have known them grown this way ever since I was a boy. A gentleman who lived in what was called the "Dutch bend" in south-west Autauga County, on the Alabama River, by name Stondenmire, propagated his peaches in this new way all of thirty years ago. Out old growth or new, if the new is sufficiently matured—using the end of the limb—and the straightest—about fifteen to eighteen inches long, cut the large end pen-shape, or with a slope, split it through the slope one or two inches. Now have the ground well worked up and pressed down, make holes in the bed or row with a small stick or large wire, force the cutting down to the bottom of the hole, say eight or ten inches, then pack or press the ground firmly around the cutting. The time to put in cuttings is in this locality from January 25 to February 25; in northern New York from four to six weeks later. The cuttings will grow better, if protected from the hot sun in June and July, by some fence or hedge or something put up to shade them. To show how simple this method is, I will mention that a black man who lives near Robinson Springs has 40 or 45 young trees growing around his house. I have seen them often, and he told me he was too poor to send to the nurseries like other folks for good buds and grafts, but was glad to get the limbs cut from fine trees brought in the neighbourhood; these limbs he stuck in the ground as described above, and he has the pleasure of showing fine trees in consequence. I said to him a few days since: "Well, Dennis, some peach growers up North think it impossible to grow peach trees from cuttings;" his answer was, "Tell them, Doctor, the most ignorant negro in Elmore County grows them with ease."—*Dr. E. H. Robinson, in New York Tribune*.

**EVERGREENS FROM SEED.**

Our advice is, that if you do not wish half of your time taken up watching and nursing the young evergreens the first season, you had better not make the attempt. They must be set in a frame similar to a hot-bed in shape. Spade up soil well, having plenty of well-rotted manure mixed in, and on top an inch or two of sand, and on this sow the seed. Cover with glass, and keep surface watered sufficiently to not get dry. Just as the little evergreens show above ground, spread all over the beds evergreen boughs, or cover the framework with slat covers made of lath, having lath not over one-half to three-quarters of an inch apart, to prevent too much sunshine.—*Fruit Recorder*.

**HOW I MAKE MY HANGING BASKETS.**

I take coarse, heavy wire for foundation and handle, then interlace with old hoop wire made pliable by burning or heating to a red heat; then I take young portulacca plants with a lump of earth attached to each, and put them through the interstices, and so fill the baskets. The plants take kindly to their unnatural position,

and soon become a mass of beautiful green and brilliant flowers. My baskets hold nearly half a peck of earth, and look like a hanging garden. In each I place an empty potash box, inserted in a cavity in the earth, which I fill with water daily, and in them place fresh flowers as my fancy dictates. They hang in my piazza, which is festooned and twined with the American ivy and morning glories, and no lovelier spot can well be imagined.

**POTASH FOR GRAPES.**

The value of potash for the grape has been recognized by cultivators. A curious proof is reported to one of the French journals. A variety of the Black Muscat has been found defective in colour where potash is deficient in the soil, and the writer recommends that one vine of this grape be placed in every grape-house, to show whether the border for the roots has a sufficient supply of potash.

**A WET SPRING AND AN EARLY ONE.**

An exchange, the *Lebanon Times*, says:—

One of our prominent attorneys, who is at the same time one of the leading fishermen of the valley, claims that the weather invariably repeats itself, and gives the following as the result of his observations, viz.:

All years ending in 9, 0, or 1, are extremely dry.

Those ending in 2, 8, 4, 5 and 6 are extremely wet.

Those ending in 7 and 8 are ordinarily well balanced.

Those ending in 6 have extremely cold winters.

Those ending in 2 have an early spring.

Those ending in 1 have a late spring.

Those ending in 8 and 4 are subject to great floods.

**LONDON PURPLE.**

Prof. A. J. Cook, of the Michigan Agricultural College, says that he has found this poison very effective with the potato beetle, and adds:—

"I have found that one pound of the poison is sufficient for 100 gallons of water. For such insects as canker-worms, leaf-rollers, in fact, all leaf-eating insects, it is very efficacious. It is more diffusive than Paris green, and so needs less stirring to keep it well mixed with water. Prof. Riley, in his admirable report on the cotton-worm (Bulletin No. 3 of the Entomological Commission of the Interior Department), recommends one pound to forty pounds of diluents, when it is to be used in the dry form. With this cheap poison, we have no longer reason to fear such enemies as the canker-worm, etc."

**A MARKER FOR GARDENS.**

W. C. Latta described, at one of the farmers' institutes in Michigan, the following method for making straight rows in gardens:—The marker may be three or six feet wide, with teeth nine inches apart on one side and a foot on the other. Stretch a rope tight where you want the first row, and draw the marker with one tooth constantly touching the rope. The whole is thus marked successively by running the first tooth in the last mark. Rows both ways may be made by crossing these lines at right angles in the same way, and all is rapidly performed.

**THE DAIRY.**

**THE CHEESE OUTLOOK.**

In regard to dairy prospects, the *Prairie Farmer* of April 1st has the following sensible paragraph:—

"The cheese market here and at Elgin is dull. The same condition of things is reported at other points. There appears to be very little inquiry, but fine full cream, fall, is held with some degree of confidence, but medium and low grades are very dull and weak. There appears to be no immediate prospect of improvement; on the contrary, with the approach of the season for opening the summer factories, unless a sudden demand abroad should develop, a decline is more than probable. On this point an Elgin contemporary, the *Advocate*, says:—'A few weeks ago it appeared as if all the old stocks would be disposed of and the spring make would reach a reasonable clear market, but that thought is about to be dispelled, and perhaps so because of the quality of a large portion of cheese now in the market. Some of the eastern factory men held on to their July and August cheese until late in the season, hoping to sell at high prices, but in this they were mistaken, not only not getting the advance they looked for, but being compelled to take less, and putting their goods in the market when they should have been consumed. It is a good plan to sell when the people want to buy.'"

**GOOD RETURNS.**

Mr. P. McKinley, of Elgin, Ill. (according to the *Advocate* of that city), during 1881 milked on an average sixty cows, which yielded him 384,480 pounds of milk—an average of over 6,400 pounds per cow. The milk was delivered to the Elgin Butter Company, and brought \$4,584.88 on the dividend plan. Mr. McKinley also sold \$171 worth of calves. His dairy thus brought him in a fraction over \$70.50 per cow, which certainly is a good yield. The highest dividend received per 100 pounds of milk was \$1.56 for December, and the lowest 70 cents for June.

Mr. Millard, of Lake Mills, Wis., also makes a splendid showing, as given in one of our exchanges. During the year 1881 his herd of thirty-three cows gave 224,486 pounds of milk, which was sold to the creamery at Lake Mills, no account being made of the milk used in the owner's family. This is an average of nearly 7,000 pounds of milk from each cow, for which the owner received \$2,807.25. The exact figures given are as follows:—

1881.	Pounds of Milk.	Money Received.
January.....	24,831	\$269 66
February.....	21,193	240 62
March.....	22,709	244 85
April.....	21,348	215 90
May.....	23,094	179 44
June.....	20,421	144 44
July.....	15,451	124 91
August.....	11,798	100 28
September.....	14,731	169 98
October.....	16,403	206 45
November.....	15,383	207 67
December.....	17,512	263 55
Total.....	224,336	\$2,367 25

This gives over \$71 from each cow. It is also stated, on the authority of the owner, that \$800 worth of hogs were sold that were fed with the same milk, \$200 worth of corn being used in fattening. There were also ten calves, worth at the least \$10 each, making another \$100. Deducting \$200 for the grain fed to the hogs, there was left the sum of \$700 to be added to the amount received for the milk, making an income of \$9,067.25 from thirty-three cows—nearly \$100 per cow.

It is a very unusual thing to find a herd of 38

cows that give milk, individually, throughout the year, and it may be that that was the average number of cows milked during the year; but the article from which these statements are epitomized indicates that but 88 individual cows were milked.

If these figures are correct, they furnish an illustration of successful dairying the details of which would be highly interesting and valuable reading to all persons engaged in dairying. Mr. Millard evidently understands his business. He has, necessarily, an excellent herd of cows, and he knows how to manage and feed them and conduct the details of the business to the best advantage. His cows more than pay for themselves every year. That is the kind of dairy cows that every dairyman ought to have, and can have in a few years by proper management and care in the selection of his breeding stock.

What these men have done others can do with the same intelligent management. It is not to be expected that every man who engages in the dairy business will or can at once achieve as much as they have. Knowledge and judgment, gained by close study, experience and observation, are requisite to such a measure of success as these instances exhibit. We make mention of them because they serve a valuable purpose in illustrating the possibilities of profitable dairying, and as examples which every dairyman will do well to emulate.

**PRICE OF BUTTER.**

Loud and deep are the lamentations of housekeepers about the high price and poor quality of the butter now in the market. According to the *Country Gentleman*, there is but little prospect of improvement until the new grass make comes in. That journal says:—

"The spring trade in butter opens with the price the highest in gold ever known for fodder butter. D. W. Lewis says that 'floors are bare, and receipts sold as they came at prices so high as to cut off exports. The situation is analogous to that of 1866, when old butter went out without a tub left over, and receipts of new proved insufficient. In that year the market dropped a cent on the 19th of April, a cent or two during the week ending April 26th, and 2c. @ 4c. for the week ending May 3rd, and it was not until this latter week that the flush of receipts fully overcame the demand.' Some arrivals of Kiel butter are noted in New York, and some from Scotland. Unless country receipts increase considerably, the only thing which will prevent famine prices will be importation from Europe."

**TROUBLE FROM READING A PAPER.**

A man came into the office on Tuesday with a black eye, a strip of court plaster across his cheek, one arm in a sling, and as he leaned on a crutch, and wiped the perspiration away from around a lump on his forehead with a red cotton handkerchief, he asked if the editor was in. We noticed that there was quite a healthy smell of stock yards about the visitor, but thinking that in his crippled condition we could probably whip him, if worse came to worse, we admitted that we were in.

"Well, I want to stop my paper," said he, as he sat down on one edge of a chair, as though it might hurt. "Scratch my name right off. You are responsible for my condition."

Thinking the man might have been taking our advice to deaf men, to always walk on a railroad track if they could find one, we were preparing to scratch him off without any argument, believing that he was a man who knew when he had enough, when he spoke up as follows:—

"The amount of it is this: I live out in Jeffer-

son County, and I came in on the new North-western road just to get recreation. I am a farmer, and keep cows. I recently read an article in your paper about a Dairymen's Convention, where one of the mottoes over the door was, 'Treat your cow as you would a lady,' and the article said it was contended by our best dairymen that a cow treated in a polite, gentlemanly manner, as though she was a companion, would give twice as much milk. The plan seemed feasible to me. I had been a hard man with stock, and thought maybe that was one reason my cows always dried up when butter was forty cents a pound, and gave plenty of milk when butter was only worth fifteen cents a pound. I decided to adopt your plan, and treat a cow as I would a lady. I had a brindle cow that never had been very much mashed on me, and I decided to commence on her, and the next morning after I read your devilish paper, I put on my Sunday suit and a white plug hat that I bought the year Greeley run for President, and went to the barn to milk. I noticed the old cow seemed to be bashful and frightened, but taking off my hat and bowing politely, I said: 'Madam, excuse the seeming impropriety of the request, but will you do me the favour to hoist?' At the same time I tapped her gently on the flank with my plug hat, and putting the tin pail on the floor under her, I sat down on the milking stool."

"Did she hoist?" said we, rather anxious to know how the advice of President Smith, of Sheboygan, the great dairyman, had worked.

"Did she hoist? Well, look at me, and see if you think she hoisted. Say, I tell you now in confidence, and I don't want it repeated, but that cow raised right up and kicked me with all four feet, switched me with her tail, and hooked me with both horns, all at once, and when I got up out of the bedding in the stall, and dug my hat out of the manger, and the milking-stool out from under me, and began to maul the cow, I forgot all about the proper treatment of horned cattle. Why, she fairly galloped over me, and I never want to read your paper again."

We tried to explain to him that the advice did not apply to brindle cows at all, but he hobbled out, the maddest man that ever asked a cow to hoist in diplomatic language.—*Milwaukee Sun*.

**DAIRY SHORT-HORNS.**

What a dairy Short-horn is, an English writer describes as follows: Head broad, not too long, with prominent but not staring eyes, medium-sized horns, neck arched; shoulders medium thickness, and not too prominent; neck vein full, brisket neither too wide nor too deep (for a milk-er), thick chest, deep flank, and fair thighs; long hind-quarters, arched ribs, back straight and wide, skin not too thin, with as much soft, long hair as she can grow; broad escutcheon, square, well-shaped udder.

While it is true that the milking qualities of Short-horns have been made secondary to the development of beef, it is also true that there are families or strains of this renowned breed in which fine milking qualities are prominent, and there are dairies in this country in which high-grade Short-horn cows constitute the herd. While the beef breeds, as a rule, are unsuited for the dairy, it will not do to accept this proposition without qualification. Records of remarkable milkers among Short-horns are not rare, and it is a point that some dairymen keep in view in building up and adding to their herds—either by raising calves or buying heifers—to keep such animals as they can easily fatten when they have ceased to be useful in the dairy.

SONG of the cheese—"Will you love me when I mould?"

## HORSES AND CATTLE.

### SETONING CALVES AGAINST ANTHRAX.

Mr. Paaron, V.S., says in the *National Live Stock Journal*:—As an outlet for effete matters we have frequently recommended the application of a seton; and, placed in the dewlap, it almost to a certainty answers the purposes of a preventive, probably by virtue of the continued irritation which, though insufficient to interfere with the comfort of the animal, is yet adequate to promote the formation in the blood of the fibrine, which is found to be so deficient in this fatal disease. The seton should not be inserted between the fore legs, but should begin at a place where a supposed line drawn from in front of each fore leg touches the dewlap. As the skin is very thick, and the underlying tissue interposed with much fat, the seton needle cannot very easily be inserted without first making an incision through the skin, crosswise with the dewlap, and half an inch in length. With a sharp bistoury make an incision in the centre or lowest part of the dewlap, at the place mentioned above; and from four to six inches forward of this incision make a similar one, cutting entirely through the skin. The insertion of the seton is made through the first or lower cut; the seton needle, about six to eight inches long, armed with the seton, being pushed forward until it emerges through the second cut. That no accidental injury may happen to either man or animal during the insertion of the seton, the seton needle should not have a sharp point. The material of the seton should be a strip of soft leather, about half an inch wide, or very coarse, broad tape, laid double, or three pieces of broad tape plaited together. The seton should be about ten to twelve inches long, to allow of a small stick of wood being securely tied to each end to prevent the seton from slipping out. The ends of the seton should not be tied together, as accidents are thus liable to happen.

For convenience sake, animals under a year old may be laid on the ground and held by assistants during the operation. The seton may remain inserted during a month, or longer. Whether the material of the seton be leather or tape, it should be soaked in spirits of turpentine before insertion. No other subsequent application is necessary. During the first week or two after inserting the seton the discharge is more copious than later; and, if practicable, cleanliness of the parts will be proper. During the summer months it may be necessary, in order to prevent flies from blowing the wounds and causing maggots, to apply a coat of tar. Various nostrums and applications are at times being recommended by cow leeches and "hoss" doctors; and while some of these, to a certain extent, answer the purpose, others fail, or prove injurious to the animals, in some instances causing serious and lasting blemishes. The application of a simple seton, as above described, while it answers all purposes desired, never inconveniences the animal, and will cause no other injury or blemish; besides, it is more in accordance with scientific principles.

During the process of dentition, the gums are often subject to an affection designated lampas, which may be said to consist of a tumid and inflamed appearance of the palate, and is no doubt in most cases the direct result of the irritation set up in the teething process. Lampas is, however, an affection not by any means confined to the young horse; it is often seen in the aged animal, although not in so great a degree, or showing so much inflammation; it may then be the result of a kind of chronic irritation, or of indigestion. Very often, however, lampas in the horse's mouth depends for its existence on the fertile imagination of the owner or the groom. Many of the

latter, directly a horse is off its feed, at once rush to the conclusion that he has the lampas; they open his mouth, imagine the bars of the palate are swollen, and take the horse at once to the blacksmith or the horse doctor to have them burnt down. This operation is just a varied form of vivisection, unnecessary in character, devoid of benefit, and cruel in the extreme. Any man, whether veterinary surgeon or horse owner, who allows such a vile practice to be carried out, ought to have the hot iron applied to the posterior part of his person. If the palate is really swollen, relief can be obtained by scarifying with a small lancet; and, if necessary, cooling medicines may be administered. This is the best, the easiest, the most humane and sensible treatment.

### THE FARMER AS A HORSE BREEDER.

Before railroads had spread their arms so generally over the country, horse breeding and marketing was a very different thing from now. Cities required but few compared to what they now use, because of a scant city population; and less traffic hauling to and from freight and passenger depots. Horses then were a source of traffic and sale about home, and as freight and passengers were mainly moved across the country by horse teams, and as this work was considered well enough when performed by anything that could haul a load through the mud, there was less attention paid to breeding horses that were competent to fill the positions in which they are placed in these days. Leaving street car service out of the question, there is not much demand in market for the class of horses that passed current in the days referred to.

The farmer can hardly afford to breed mere plugs simply because he can do his farm work with these. The demand for good horses is so urgent, and the facilities for shipping from any part of the country so excellent, that there are always willing buyers for the kinds that bring good prices in the leading markets. But, as a rule, there are no men out looking for mere plugs; at any rate, not for shipment. The enterprise of importers and breeders now leaves no excuse for continuing the use of neighbourhood stallions, and we hope the better sense of farmers has taught the utter folly of breeding to such as are put to service at five dollars the season. These rarely have either size or merit to recommend them. The introduction of Clydes and Normans has resulted in the production of colts of fine size, even from the most ordinary mares.

Many farmers have been tempted to keep such young stock entire, and though having inherited pretty fair looks and good size from a well-bred sire, the probabilities of being able to impart a reasonable portion of the merit drawn from one parent are slim indeed. Nothing short of a nicking of good blood, similar in kind, on the part of both parents can be relied upon for breeding purposes. If sire and dam be very dissimilar, then there need be no expectation of uniformity in the progeny. One would think this so self-evident as an inflexible principle that every farmer in the country should always have the fact in mind and require unquestionable evidence, before breeding to a stallion, that he possesses individual merit of the highest type, and that he has a good and clear title to this, having drawn it from a fountain implanted deep down in the parentage on both sides, and extending far back into remote lineage.

One of the greatest mistakes made in breeding is to patronize a stallion that is fed high and exercised but little. The fashion of travelling a horse from one stand to another several miles apart, affords fair exercise, on a walk. The exercise, however, should be more active than

this. The walk should be alternated with a sharp trot, even though it takes off a few pounds of flesh, and gives the groom some sharp rubbing to do. Horses, however, that are not moved from place to place, are soft and inert in the highest degree, and in no sense fit to be used as sires. The farmer is not wise who takes custom to a horse so kept. He should refuse his patronage unless made satisfied that abundant exercise is given at least twice daily. If any doubt exists on this point, a sharp trot for eighty rods and back will settle this question, and any owner who will refuse to show his horse under quick motion is not deserving of your custom.—"*Occasional*," in *Prairie Farmer*.

### A HINT FOR BREEDERS.

If the bulls cannot be sold for as much as \$100 each, castrate them. It may look like a great shame to do so in some instances; but it will be better for the herd and its owner to do so rather than let his best calves leave the farm at an inferior price, making it almost impossible to get more than that for any he may have to sell in the future. Besides, I contend that the farmer or breeder will, in the end, make more money to castrate his calves and sell them at good prices when fed for market than to keep them with extra care and feed, and then sell them at only a nominal price for bulls; and he cannot sell bulls for even a fair price unless they are in good fix. If they are turned to steers, they can be put together in a pasture or feed lot, and when fed and sent to market, are as good an advertisement as any breeder would want, and find a ready sale at a fair price at any age.—*Nat. Live Stock Journal*.

### THE TOUCH IN SHORTHORNS.

The skin affords in what is technically and emphatically called the touch a criterion second to none in judging of the feeding properties of an ox. The touch may be good or bad, fine or harsh, or, as it is often termed, hard or mellow. A thick, firm skin, which is generally covered with a thick-set, hard, short hair, always touches and indicates a bad feeder. A thin, meagre, papery skin, covered with thin, silken hair, being the opposite of the one just described, does not, however, afford a good touch. Such skin is indicative of a weakness of constitution, though of good feeding properties. A perfect touch will be found with thick loose skin, floating as if it were on a layer of soft fat, yielding to the least pressure, and springing back to the finger like a piece of soft thick chamois leather (or a piece of the best silk velvet), and covered with thick, glossy soft hair. It is not unlike a fine soft moss, and hence such a skin is not unfrequently styled "mossy." A knowledge of touch can only be acquired by long practice, but after having acquired it, it is of itself a sufficient means of judging of the feeding qualities of an ox, because when present the properties of symmetrical form, fine bone, quiet disposition, and purity of blood are the general accompaniments.

### INDIGESTION AND SCRATCHES IN HORSES.

For indigestion give the following:—Blood root, mandrake, gentian, liquorice, ginger, lobelia, each 1 oz.; nitro, 3 oz.; sulphate of iron, 4 oz.; sulphur, 6 oz.; sassafras, 8 oz. Mix and powder. Dose, 1 oz. a day in a pint of flaxseed jelly. For scratches give the above powder and the same amount; then take the water that potatoes are boiled in and wash the limb clean once a day. Then apply this ointment:—Sulphuric acid, 2 drachms; belladonna, 1 oz.; laudanum 1 oz.; aloes, 1 oz.; sulphur, 2 oz.; lard 6 oz. Stir well and apply.

**SHEEP AND SWINE.****CLEANLINESS A PREVENTIVE OF HOG DISEASES.**

We do not know who wrote the following "piece," but we do know that there is a large amount of common-sense in it. No doubt a considerable proportion of the diseases rife among hogs may be traced to their being confined in filthy pens:—

"During the past season there has been a great deal said and written upon the subject of allowing hogs to run in pastures. The discussion both in and out of the newspapers has been watched with a great deal of interest by hog-raisers, whose practical knowledge, acquired by experience, has enabled them long since to form opinions upon the subject. Those men who have invested in the business are prone to arrive at conclusions based upon actual observation, from which they form common-sense ideas of what is beneficial to their stock, and wisemen who read them long, self-consequential lectures upon subjects about which they have no personal knowledge receive but little consideration at the hands of breeders. It is a common remark that most anything is good enough for a hog, and to this senseless proposition is traced the diseases among swine owned by breeders who endorse it. Since time immemorial the hog has been called the farm scavenger, but, nevertheless, the successful breeder is he who relies the least upon this over-estimated characteristic of the animal. Bad water, worse treatment in handling, and a superabundance of filth are the foundation of all diseases to which hogs are subject, and it is consequently easy to believe that the health of the animal and the quality of the meat must increase in proportion to the cleanliness of his food and surroundings. It is believed that there has been less disease among swine during the past year than during any time for the past decade, and those who ought to know attribute the fact to increased care on the part of breeders, who had realized the value of cleanliness. Grass-fed hogs who have the run of good and nutritious pastures, with plenty of pure water, are the ones that bring the highest price in any market. The summer feed of grass results in bone, muscle, and all good qualities of first-class pork, and a fall feed of corn just prior to marketing makes the plump and round finish considered so desirable. It is not too much to say that if swine raisers would adopt a universal plan of cleanliness in raising and feeding the stock, it would be but a very short time before complaints of American pork would cease to be heard in any European country. Breeders owe it to them, and they owe it to their swine, to adopt such reforms as will insure them as decent treatment as possible."

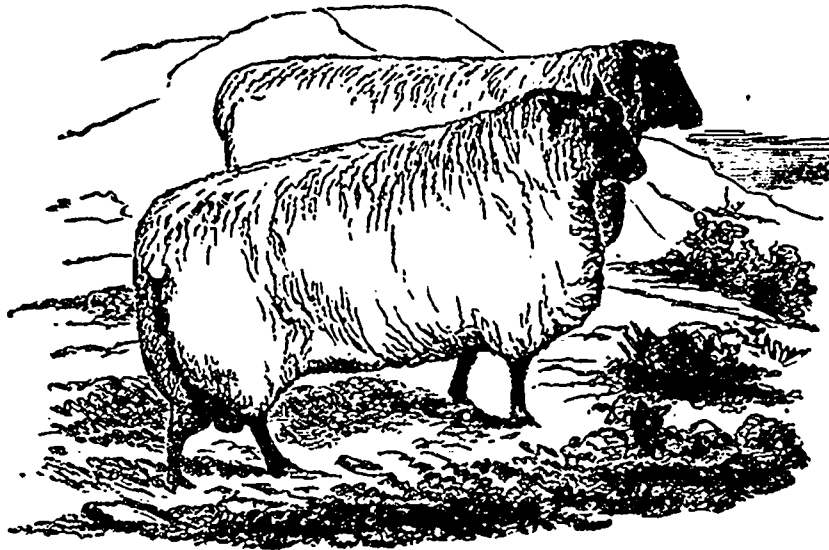
**DANGEROUS SHEEP AND BULLS.**

A correspondent writes: "I noticed an account a few weeks ago of a buck sheep killing a child by butting, and frequently see accounts of bulls injuring persons with their horns. Such accidents may be easily prevented. Some time ago I had a buck that became very troublesome in this way. I conceived the idea that if he could not see ahead he would not harm any one. So I put a piece of leather large enough to extend about two inches each side his eyes, and a little below his eyes, and fastened it there by straps around his neck and below the under jaw. It

rendered him perfectly harmless. I also fixed an ugly bull in the same way, and he could not see to do any harm."

**THE SHROPSHIRE SHEEP.**

The development of great industries in iron and coal in the districts of Shropshire, at the beginning of the century, gave rise to a large and increasing demand for mutton. To meet this demand, the farmers of that part of the country turned their attention to the raising of mutton sheep. Breeding ewes were sought for from the midland and southern counties, and, in time, Shropshire became not only a leading sheep-raising region, but also the home of an important breed, the parentage of which it is difficult to state, for the reason that it is derived from and combines a number of the best mutton breeds. The Shropshire is, more strictly speaking, a cross breed, in which the natives of the districts, the Cotswold, and later the Leicester and Southdown, have been combined. On account of this complex admixture of blood, the Shropshire breed is one that varies somewhat in character. The original sheep was horned, black or brown-faced, hardy and free from disease, producing forty-four to



SHROPSHIRE SHEEP.

fifty-six pounds of mutton to a carcass, and a fleece of two pounds of moderately fine wool. The present Shropshires are without horns, legs and face dark, or spotted with gray, the neck thick, the head well shaped, ears neat, breast back straight, barrel round, and the legs strong. The fleece is longer, heavier—averaging seven pounds—and more glossy than that of the Southdown. The Shropshire is a valuable sheep for Canadian farmers.

**THE POWER OF MUSIC OVER SHEEP.**

Many instances have been given of the effect which the sounds of music have upon animals, and an interesting one is recorded in the life of the great composer, Haydn. While he was rambling, on a certain occasion, in one of the lofty mountains of Lombardy, with some other young people, the party chanced to stop to contemplate the magnificent scenery around them, and suddenly a flock of sheep, which were leaving the fold to go to their pasture, passed by them. One of the party, who was a good performer on the flute, and always carried his instrument with him, took it out of his pocket, and bidding the others to watch the effect upon the sheep, began to play. We are told that the sheep, which were walking on with their heads hanging down, raised them at the first note of the music, and then all of them, with a general movement, turned towards the spot whence the agreeable sounds proceeded, until they had at length all flocked around the musician,

listening with motionless attention. He ceased to play for a while, but the sheep did not stir, and the shepherd was actually compelled to use his staff to induce those nearest him to move. After some time, however, they began to obey, but no sooner did they do so than the musician again commenced to play, and once more his strange audience returned to him. The shepherd now got out of patience, and sought to make his flock move by pelting them with clods of earth and stones, but only those which were hit would move on; and not until the flute player, at the entreaty of the shepherd, had stopped his magic sounds, would the remainder of the flock stir, and even when they had at last moved off, they continued to stop at intervals, as in the distance they heard that the musician had resumed his playing.

**SELECTIONS.**

**SHEEP** should be tagged regularly and kept clean. They should be culled every year, and those in any manner deficient placed in a separate pasture and fattened for the butcher.

A SMALL quantity of ashes given to pigs while fattening is found very beneficial, as their food is generally rich in phosphoric acid and deficient in lime, which ashes supply; and in this way the phosphoric acid is made available as food.

Success in raising pigs depends upon feeding liberally till the pigs are three or four months old. Let them have the run of a grass or clover pasture, and after the harvest they will do well on the wheat stubble. The cost of raising in this way is very little. In the winter they will need richer food. They should have warm quarters, with plenty of good straw.

At the recent Birmingham fat-stock show, a prize pen of three Shropshires weighed 840 pounds; a pen of Oxfords, under twenty-two months, weighed 871 pounds—an astonishing weight for age. A Shropshire ewe weighed 874 pounds. The heaviest pen of three sheep weighed 982 pounds, but the breed is not stated in accounts at hand.

The sheep is the cosmopolite among domestic animals. With a habitat extending from Nova Zembla to New Zealand, and following the lines of latitude around the world, it accommodates itself to every surrounding; here sweltering in the heated atmosphere of the tropic pampas, and there shivering before the crisp blasts that fan the mountain's brow; whether in glebe or glen, in field or forest, feeding on grain or grass, it is found fitted to its surrounding conditions, and to unflinchingly mete to its owner in the measure from which it has been supplied.—*Iowa Homestead.*

MR. WM. SPZARE, of the 12th concession, Hibbert, is the owner of a ewe which may be set down as the champion breeder, having during the past eight years given birth to and suckled no less than twenty lambs.

MR. WM. COATES, of lot 14, first line east, Chinguacousy, is the owner of one of those ewes that prove a whole boom of industry to their owners at this season of the year. The prolific ewe we now speak of is a Cotswold, and has given birth to seven lambs in less than twelve months. On the first of May of last year she had three lambs, all of which lived, and on the second of last month she astonished the folks by giving birth to four lambs, and the progeny are doing well.



## GOOD PAY TO AGENTS.

Agents wanted in every village, town, and township, to make a thorough canvass for the RURAL CANADIAN. Liberal inducements. Work to commence at once. For full particulars address

**C. BLACKETT ROBINSON,**

6 Jordan Street, Toronto.

Publisher.

LETTERS on business should always be addressed to the PUBLISHER, while communications intended for insertion in the paper, or relating to the Editorial department, to ensure prompt attention, must be addressed to EDITOR RURAL CANADIAN.

### The Rural Canadian.

EDITED BY W. F. CLARKE.

TORONTO, APRIL 29TH, 1882.

#### POPULAR IGNORANCE IN REGARD TO THE CLOVER PLANT.

Once more the wail has been lifted up in various parts of the land, "our clover is winter-killed! Few have any idea that this wail is the echo and revelation of ignorance. Yet such is the fact. The greater part of the clover said to have been killed has not been killed at all, but has only died in the natural course and order of things. When a very old man dies of mere age, it would be absurd to say he was killed. But it is not more absurd than to say clover has been killed, when the fact is, it died of old age last fall, and an open winter has merely heaved out the dead roots.

Clover is classed as a biennial plant, though, strictly speaking, its life-time is about eighteen months. The plants that grow from clover seed sown the present spring will die during the fall of 1883, and if the succeeding winter is an open one, will be heaved out of the ground, and set every ignorant farmer who sees their dead remains bestrewing the land, bewailing, as now, the winter-killing of the clover.

The common idea about clover is that you can seed land with it for a term of years, the same as timothy. This idea has grown up in consequence of a neglect of careful observation as to the nature and habits of the clover plant. Clover constantly re-seeds the ground in which it has gained a foothold, and, late in the fall, the young seedlings get a start. If the winter is favourable to the protection of these weak and tender plants, they will survive and grow with great rapidity the following spring. But an open winter is fatal to them. These young seedling clover plants may be seen in the early spring, after an open winter, lying in bunches and strings on the top of the ground, as though they had been drawn out with a rake. No farmer ever thinks of seeding down to clover in the fall, for he knows there is little or no chance of getting a catch if he sows then. But the great majority of farmers in reality depend on a chance fall catch of self-sown seed to renew their clover fields.

It may be safely affirmed that no clover plant of the first year that has had a whole season's growth was ever heaved out of the ground by the succeeding winter's frost. Give clover a fair chance, in ordinarily good soil, and before winter sets in its roots will have struck into the soil to the depth of four or five feet, or even more, with innumerable horizontal fibres ramifying out in all directions. At the end of the second season the plant dies, and consequently the fine fibrous rootlets quickly decay, leaving the old plant an easy prey to the heaving frost. Many old, experienced farmers doubt the fact of the clover roots going down to such a great depth. During a long life-time, they have never so much as followed a vigorous clover root with a spade to ascertain the hold it has got of the soil. If any farmer, young or old, will dig a few holes beside thrifty clover plants not over a year old, the probability is that the attempt to find the bottom of

the roots will be given up in despair. These assertions are easily verified, and if any reader is disposed to question or deny them, we beg that he will take a little exercise with a spade before doing so. It is absurd to suppose that a plant which takes such a mighty hold of the soil as this is ever winter-killed, except after its roots are dead, or in the case of late fall seedlings, which could only be expected to grow in very exceptional seasons. Wheat has stood the brunt of the past winter very well, yet it takes but a slight hold of the soil compared with clover. It is only a surface plant, while clover is a deep-growing, tap-rooted plant. There is no need to bewail winter-killed clover. The old roots that died last fall form valuable manure, being rich in nitrogen, and the baby seedlings that just sprouted a few inches before winter set in, could not be expected to live.

Clover is both a crop and a manure, and its chief value is as a fertilizer. The best results are obtained by sowing it alone—that is, without a grain or grass accompaniment—as early as possible in spring. A moderate outing of hay will be had that year. The second year, a crop of hay and a crop of seed may be taken off, after which the land should be ploughed for a crop of spring wheat or barley the following year. What is left of dead leaves and roots in the soil is equivalent to a dressing of manure. A good cereal crop may be safely counted on after the land has been two seasons in clover. That eminent veteran agriculturist, Mr. Lawes, says:—"One fact is perfectly clear, that whatever may be the source of nitrogen in clover, the plant furnishes that substance in the cheapest possible manner; and so long as good crops of clover can be obtained, the farmer need not have recourse to any costly artificial compounds for its supply." Clover should never be sown as a permanent seeding down of land. Strictly speaking, it is not a grass, and requires different treatment from the grasses. It should have a regular place in the rotation, mainly with a view to its manurial value. The facts stated in this article are incontrovertible. Popular ignorance pooh-poohs them, without putting them to the test, which is easily done. All we ask of the sceptical reader is a fair trial of the system we have recommended. We have no fear as to the results of so doing.

#### ONTARIO VETERINARY COLLEGE.

The following paragraph should have appeared in our last, but it is still in good time, and we have much pleasure in chronicling the continued success of this important institution, and the well-won honours bestowed on its able principal, Dr. Smith:—

"The closing exercises of this institution took place at Toronto, March 30th and 31st. On the first of these days the examinations were held, the Board of Examiners having been appointed by the Government. Out of some forty-six applicants, forty gentlemen were successful, and received their diplomas. On the following day a large gathering of students and friends of the College assembled to witness the conferring of prizes and honours. The Hon. Minister of Education and other leading gentlemen spoke, highly congratulating the principal, Prof. Andrew Smith, V. S., on the success of the College. Mr. T. B. Colton, Mount Vernon, Ohio, carried off the silver medal in pathology; Mr. W. A. Dryden, the silver medal in anatomy; and Mr. J. Hugo Reed, the gold medal for the best general examination. A magnificent full-length oil portrait of Prof. Smith was then unveiled, and, in a neat address, presented for his acceptance as a mark of the esteem in which he is held by a large part of the veterinary

profession of America. The professor replied in suitable terms, stating that he had laboured earnestly for the advancement of the veterinary profession in America; and that the efforts of himself and those associated with him had not been altogether unsuccessful, the attendance this session of 120 students at the Ontario Veterinary College would show. He thanked the donors heartily for this mark of confidence."

#### SALE OF ENGLISH DRAFT HORSES.

We learn from the *Prairie Farmer* that there was an auction sale of English draft "shire," or "cart" horses, at the Chicago Stock Yards, April 5th. Some of the animals were superior, but others were decidedly poor specimens. The prices obtained show how much heavy horses are in demand among farmers and others in the U.S. The particulars of the sale are as follows:—

Peeping Tom, 6 years, to Jacob Schnook, Jefferson, Ill.....	\$ 920
Hard Times, to same .....	1,525
Grey Prince, 4 years, to John Barr, Wilton Centre, Ill.....	1,025
Milton Duke, 8 years, to J. E. Miller, Hartsburgh, Ill.....	1,185
Prince Tom, 4 years old, to D. G. Brown, Chicago, Ill.....	1,600
Young Boxer, 6 years, to Ingersen Bros., Bryant, Iowa.....	1,200
Prince of the Isle, 6 years, to D. G. Brown, Chicago, Ill.....	1,600
Challenger, 6 years, to John Haxley, Anawan, Ill.....	875
King Pippin, 8 years, to Jones & North, Rochester, Sangamon Co., Ill.....	950
Loyal Tom, 3 years, to John Faulk, Mendota, Ill.....	1,000
British King, 2 years, to John Barr, Wilton Centre, Ill.....	975
Young England's Glory, 4 years, H. H. Cooloy, Chicago, Ill.....	900
Rob Roy, Ingersen Bros., Bryant, Iowa.....	1,825
Young Honest Tom, 3 years, to W. J. Ford, Urbana, Ill.....	825
Honest Heart, 8 years, to Thos. Bennett, Rossville, Ill.....	1,800
Prince, D. G. Brown, Chicago, Ill.....	725
Goliath, 6 years, to Jacob Degan, Ottawa, Ill.....	1,275
Isle of Ely, to H. H. Cooloy, Chicago.....	1,400
Prince of the Isle 3rd, 6 years A. C. Logan, Moline, Ill.....	1,125
Brown Prince, 6 years, Jacob Degan, Ottawa, Ill.....	850
Prince Albert, 8 years, to D. G. Brown, Chicago.....	725
Primus, 2 years, to J. B. McFarland, Chicago.....	850

These horses came from the ten districts of Cambridgeshire, and were nearly all purchased from the Duke of Beaufort's tenantry, on the Isle of Ely. Among the lot sold were several first prize winners at some of the principal shows in England in 1881.

The *Prairie Farmer* states that the demand for draft horses in the U.S. appears to be almost without limit, and hence that the importation of this class of animals will probably be large during the coming season. It adds:—"The trade in Percherons and Clydesdales has never been as active as it is at the present time, and it is likely to remain so for some years. The Shire horses of England constitute another important source whence this demand may, in part, be met, but it is well to guard against imposition, and not snap up everything that may be offered because they happen to come from districts in England where these horses are bred, or picked up in Canada and represented as well-bred Shire horses. The Clydesdale interest has suffered from such practices, and it is well for farmers, as well as for legitimate breeders and dealers, to be on their guard against speculating sharps."

#### A GOOD PAPER.

Sixteen years ago the *Turf, Field and Farm* located its offices at 87 Park Row, New York. The rooms at once became a favourite resort, and thousands of distinguished men, fond of breeding and sport, left their footprints upon the stairs. The journal echoed the best thoughts of these men, and it became a power in the land. It made popular and respectable the literature of sport. It excluded from its pages everything that was not elevated and manly. Its circulation rapidly spread

until it covered every State and Territory in the Union. The terrific fire on the 31st of January last wiped out the offices, together with the great library and picture gallery of the *Turf, Field and Farm*, and since then the paper has occupied temporary quarters at 20 Vesey street. The journal, however, has been issued with the greatest promptness, and the quality of the matter seems to have improved. The courage with which the publishers faced adversity has been warmly commended, and the circulation is larger than ever. New and handsome offices have been secured in the *Times Building*, 89 and 41 Park Row, for the *Turf, Field and Farm*; and as every member of the staff feels at home in that locality, we may look for him to do good work, and we may expect to see the paper made even better than it is, if such a thing is possible. The spirit shown by the *Turf, Field and Farm* during February and March is of the fire-proof kind, and it makes plain the fact that a journal with perfect organization and proud traditions is indestructible.

#### SALE OF AYRSHIRES.

The sale of the Ayrshire cattle of Mr. Andrew Allan, at Lachine, Que., was well attended, Americans being present from a number of different States, with a good company of local visitors. Bidding was good, though no specially high prices were obtained. The result was as follows:

4 bulls, average,	\$48.12.....	\$192.50
56 cows, do	56.40.....	3,169.00
5 2-yr. olds, do	43.00.....	215.00
13 yearlings, do	29.20 .. . . .	379.50

Total ..... \$8,946.00

This sale adds another to many indications that the Ayrshires are somewhat at a discount, notwithstanding their high milking qualities. The reason is not probably far to seek, and will be found in the demand for large-sized cattle, which, when their usefulness in the dairy has been outlived, can be profitably turned into beef. Dairymen in general are turning their attention to bulkier breeds, such as the Holsteins and good milking strains of Short-horns. This tendency will most likely exist so long as cattle shipped to Britain are carried at so much per head, instead of being carried by weight.

#### THE VALUE OF THE FARMERS' CLUB.

More eloquent than any plea we can urge in favour of the Farmers' Club, are the testimonies given as to its value by those who have been in the habit of regularly attending these meetings. Here is a specimen from the correspondence of the *Farmers' Review*—

"There is another retrospective thought which the coming spring suggests, namely, the value of the Farmers' Club. From it I have gained many most valuable things. I understand, better than ever before, how plants grow, and why they need to be fed. It seems to me that there is not so very much difference between animals and plants, after all. Of course, plants are fixed in the soil, and have to feed on soil and air, while the sheep and cattle go from place to place, and feed upon plants. They all have to be fed, at any rate. There is an interdependence of life, it seems to me. It looks as if the plants fed the animals, and in turn the animals fed the plants. If this is so in creation, then the principle should be applied to the farm. If a piece of land is to be kept in the same state of fertility, or strength, it must have both animals and plants upon it. If there are no

plants, the animals will not stay long, and if there are no animals, the plants—if crops are continuously removed, with no return—will grow smaller and weaker. It seems to me that the normal condition of farming is a mixed one, where both animals and plants are properly adjusted to each other's needs. This is one thing that the club has set me to thinking on, and I sort of see through the scheme of things better than ever before. It is more of a comfort to work when one mingles the ideas of things with the labour of his hands. It does not seem quite as hard to plough a piece of land when one knows the changes that are going on in the soil, and understands—though but a little—about the way plants get their substance from that soil and the air."

#### SKETCHES OF CANADIAN WILD BIRDS.

BY W. L. KELLS, LISTOWEL, ONT.

##### THE FLY-CATCHERS.

This genus of birds is numerous and widely diffused, some species being found in most of the countries of the earth between the Polar circles. But while some species frequent the neighbourhood of human habitations, even in towns and cities, others prefer to dwell in the deep shadows of the wildest woods, and being, as their name indicates, almost wholly insect-feeders, they are among the most useful of the minor tribes of the feathered race. They differ considerably in size, but in habits and general appearance there is much resemblance. In Canada five or six species are met with, but as several of these take up their *habitat* in the deep swampy woods, they are but little known or noticed by even the pioneers. The common king-bird and the pewee are the most common and distinguished. In the construction of their nests the same general rule is followed, though the situations in which these are placed are usually different. The eggs of all are nearly white. Those in Canada are migratory, but do not collect in flocks.

##### THE PEWEE FLY-CATCHER.

This is the commonest and best known of this genera of birds found in this country, and is one of the earliest of our spring visitors. In the early morning, while the air is still cold, and patches of snow still linger in the woods and round the fences, and while but few others of our feathered visitants have returned from their tropical exile, perched on the top of some building, or among the leafless boughs of some tree, the pleasant and familiar "pewee" of this little wanderer may be heard greeting the new-born day, and returning spring, to the delight of the rural Canadian and the student of nature. Its simple notes seem always pleasing, not for their variety or melody, but rather for the pleasing ideas of renewed life and animation with which they are associated, and the confiding nature which the little warbler itself evinces.

This species remains in Canada for about five months in each year, and during that period it may be found ranging the outskirts of the woods, the vicinity of farm buildings, and the streets of towns and villages. It is an expert insect-catcher, and generally captures its victims on the wing, by a series of darting evolutions, though it will also alight upon the grass, or down among the grain, in order to secure a prized morsel.

Its favourite haunts are the margins of water-courses, and under the bridges by which the streams are everywhere crossed its nest is often found. Those whose *habitat* is on the margin of the woods make their nests in the roots of fallen trees, while others, who prefer to abide near the

habitations of man, find nesting places in the barn, the woodshed, or on some projection beneath the eaves of the dwelling house. Its nest has also been found in chimneys, caves, wells, saw-mills, and under logs elevated a few feet off the ground. The nest is composed of moss and wool, mixed with mud, and lined with fine dry grass and hair. The eggs, of a white colour—sometimes with a few reddish dots—are from four to six in number. It seldom hatches more than once in the year. The length of this bird is six or seven inches. Its tail is constantly jerked up and down with a wagging motion. The plumage on the upper parts is yellowish-black, the under parts have a greyish hue, the feathers on the head are loose and crested; and there are short bristles at the base of the bill.

##### THE WIRWEE, OR WOOD FLY-CATCHER.

In form and plumage this species resembles the pewee, but it is smaller in size, and its song-notes and *habitat* are different. Among our summer visitors it is late in its arrival, and as its sojourn here is passed in the wild woods, and it is seldom seen to approach the open fields, it may be called the wood fly-catcher, though there are others of this genera, which are little known, whose homes are found in the wilderness. The *wirwee* does not frequent the low, swampy lands, but takes up its abode in the high, hard-wood timbered districts, where there is deep shade, and an abundance of dead twigs and branches shooting across the gloom, and where its insect food is abundant. Taking its stand on a naked limb, it for a few moments glances around, its tail meanwhile wagging with that peculiar motion common to the fly-catchers, then darting off, rapidly snapping at the insects that flirt around, and after a circling sweep of a few rods returns to its starting place, quivering its wings and uttering its peculiar notes, "wir-a-we, we-too, and which are repeated by another of its species at a short distance. These dismal notes are but little noticed until most other of our summer songsters have become silent, then when the fallen leaves and chilly winds of autumn herald the approach of winter, this sad and doleful ditty becomes conspicuous, as it echoes in the silent woods in melancholy strains, as though the little performer was bewailing the departing glories of summer, the approaching desolation of nature, and the loss of all that is lovely and gay, which, noticed in conjunction with the scenery of the surrounding landscape, may often fill the mind of nature's student with sad reflections and gloomy anticipations. As the fall advances and the leafless woods assume a barren and desolate aspect, no longer able to procure its insect food, the *wirwee* ceases to battle with the elements of nature, leaves our woods and forests for a season to the sway of the icy monarch, and seeks a refuge from the winter's storms in the evergreen valleys of the south. This bird is four inches long; its colour is dusty black, and its head has a small crest. Its nest, placed on a branch or in the fork of a small tree, is composed of moss, fibres of bark, and lined with hair. The eggs are four in number, of a dirty white colour, sometimes dotted with a few dark spots on the large end.

##### THE YELLOW-BARRED FLY-CATCHER.

In form and size this variety resembles the *wirwee*, but it is more rare and solitary, and found only in the low, swampy cedar woods. Its plumage is a dusty slate colour, with yellowish bars crossing the wings and tail. Its common notes are a simple "chip," nor am I aware that it utters any other. Its nest is placed in a mossy bank, or the root of a fallen tree, and formed of moss, fibres of bark, fine dry grass, and hair. The eggs, three or four in number, are white, with a ring of reddish spots towards the large end.

## THE LITTLE WOOD FLY-CATCHER.

This species is smaller and less numerous than the wirwoo. Its length is between three and four inches. Its colour above is brownish-black; below, yellowish-white. It constructs, in the fork of a small tree, a very neat little nest of the woolly bark of decayed trees and hair, and therein deposits two eggs of a clear white colour. This bird frequents the margins of gravel-bottomed creeks beneath the shade of high hard-wood timber. It feeds chiefly on insects and their produce, but in the dry season it preys occasionally on small fish, which it easily captures as they wriggle in the shallow water. Its notes are a monotonous "chip," which are only heard if its nest or young are approached. It arrives here in the latter part of May, and departs again in September.

## THE WAILING, OR GREAT CRESTED FLY-CATCHER.

This species is larger than the pewee, and bears much resemblance to the coloured fly-catcher of Europe. It inhabits the dry hard-wood lands, generally in the vicinity of small lakes and large streams, and is less numerous than either the pewee or wirwoo species. It receives its first name from its peculiar notes, which are frequently heard on the margins of woodland districts, where it resides, and while the bird itself is concealed in the foliage of the tree-tops; and its second from the remarkable crest with which its head is adorned. In disposition it manifests some of those irritable propensities which are characteristic of its relative, the king-bird; and when the female is nesting, she is often subjected to treatment for which there seems no reason except the bad temper of her partner. Its general colour is dull greenish-grey above, and yellowish-white beneath; its length is about seven inches. It forms its nest in the hollow of a tree, and lays four or five eggs of a white colour, marked with dark lines. The nest is made of wool, fine strips of bark, and dry grass, and in it is sometimes found the cast-off skin of a snake. It arrives in Canada in May, and takes its departure again in September.

Cocoa-NUT cake is being tried in France for feeding purposes. The analysis of Petermann shows that it contains twenty per cent. of nitrogenous substances.

It would be much better if horses were trained to walk fast, rather than to trot and run. A farmer needs good walking, but cares nothing for 2.40 trotting.

MESSRS. STONE & WELLINGTON of Ponthill, say: "Your paper, we think, is destined to be the leading horticultural paper of Canada, and should be in the hands of all fruit-growers and farmers."

The following were the shipments of horses from Montreal to the United States for the week ending April 22nd, 1882:—April 17th, 16 horses, \$1,504; 13 do., \$1,481.50; 4 do., \$452.50. April 18th, 10 horses, \$1,463; 10 do., \$1,286. April 19th, 2 horses, \$260; 2 do., \$365; 10 do., \$1,136; 2 do., \$225. April 20th, 8 horses, \$375; 15 do., \$2,137; 10 do., \$1,236. April 21st, 2 horses, \$250.

Few understand that many fruits may be transplanted out of the regular season. Last June, in going over the packing ground, we found a few vines of the Brighton and other grapes growing vigorously, where they had been overlooked in the trenches. Though in full leaf, we transplanted, watering the soil at the same time, and shading for one week with matting, so as to admit air freely. These vines made as vigorous growth as those planted earlier. Most fruit trees have dormant buds just below the lowest leaves. If the trees are cut back to these dormant buds, they may be planted with success very late in the season—long after the trees are fully in leaf.—E.

## CREAM.

A MAN IS VERY LIKE A TREE.

A man is very like a tree.  
For instance: Crooked limbs has he;  
He has a trunk; he grows somehow,  
And when he leaves he makes a bow;  
He can be cut; will often lean;  
Is always sappy when he's green.  
He is aboard when on the sea,  
And oft a shaving, too, is he;  
When he is frightened quite a lot,  
Like trees, he's rooted to the spot;  
If he is axed too much he'll lie,  
And often will, like trees, get "high."  
He has his lumber in the night,  
Is sadly warped and feels the blight.  
He "chirps" for stakes, though he should not,  
And has his chops, sometimes a lot;  
He gets "deadwood" on him. Is wood'd,  
Is knotty when he should be good,  
And when he dies he's sure to learn  
That he, like trees, has got to burn.

—Detroit Free Press.

What are the most unsocial things in the world? Milestones; you never see two of them together.

Why is it that, whenever you are looking for anything, you always find it in the last place you look?

Since I cannot govern my tongue, though with my own teeth, how can I hope to govern the tongues of others?—Franklin.

In Colorado the people are poetical. They never use the word "die." It is too harsh. They announce the demise of a fellow-man by saying, "he turned up his toes to the daisies."

A LITTLE girl read a composition before the minister. The subject was a "cow." She wove in this complimentary sentence: "A cow is the most useful animal in the world except religion."

"PAT" junior (in answer to inquiry by Saxon tourist)—"There's five of us, yer honour, an' the baby." Saxon—"And you are the eldest?" "Pat" junior—"I am, yer honour—at present!"

"BEFORE marriage she was dear, and he was her treasure, but afterwards she became dearer and he treasurer; and yet they are not happy." Had he made her treasurer all would have been serene.

MARY, aged four years, and Constance three, attended a wedding. On her way home Constance exclaimed with delight, "I've been to a wedding, and me and Mary's married." This was told to Mary next day, when she said "No, indeed, I'm not married to Connie; and if I marry any of that family, it will be Aunt Marie Alice; but I shall wait until I grow up, and marry papa."

A NUMEROUS poet having been asked why we says "caught" instead of "catched," wrote the following, by way of reply:—

"The egg isn't hatched, it is haught;  
My trousers aren't patched, they are paught;  
John and Jane are not matched, they are maught;  
My door isn't latched, it is laught;  
The pie wasn't snatched, it was snought;  
The roof wasn't hatched, it was thaught;  
The cat never scratched, but it scaught."

THEODORE HOOK was once entertaining a party who had dined with him, by singing comic songs, when he was interrupted by the servant, who came in to say the tax-gatherer was there. The wit never turned his head, but continued playing the same accompaniment, while he improvised the following:—

"There comes Mr. Winter, collector of taxes;  
I'd advise you to pay him whatever he asks;  
Excuses won't do; he stands no kind of summary;  
Though Winter's his name, his proceedings are summary."

"When I was once in danger from a tiger," said an old East India veteran, "I tried sitting down and staring at him, as I had no weapon." "How did it work?" asked the bystander. "Perfectly. The tiger didn't even offer to touch me." "Strange! very strange! How did you account for it?" "Well, sometimes I have thought that it was because I sat down on a high branch of a very tall tree."

## CURRENT NEWS ITEMS.

LAST week, Mr. Joseph Bell, of Ashfield, sold a fine team of horses for \$420, while his neighbour, Mr Robert Watson, also sold a team for \$400.

MR. HUGH CLARK, of Chinguacousy, averaged last year twenty-eight cents a pound for the butter from his Jersey cows. He churned all winter through.

MR. SORBY, from near Guelph, the other day sold two seven months' old Berkshire hogs—one to Mr. John Sault, near Pespeler, and the other to Mr. John Newstead, near Preston—for \$30 each.

MR. WM. NIXON, of East Wawanosh, captured a wild goose on the 3rd inst., by throwing a stone at it and hitting it on the wing. It was on a pond near his farm at the time. The goose weighed, when caught, nine pounds.

THE students of the Agricultural College are making great preparations for the celebration of the Queen's birthday, and everything will be done to make the games and sports a success. They are being instructed in drill every morning by Sergt.-Major Clarke.

THE Department of the Interior have made arrangements for the surveying of 18,000 square miles of land for actual settlement during the next twelve months, and 26,000 square miles into townships. Five hundred colonization companies have applied for lands. Twenty surveying parties will be put into the field before the 1st of May. They will proceed from the elbow of the South Saskatchewan northward to the Touchwood Hills, and as far south as La Grande Coteau. It is estimated that before the close of 1883, 70,000 square miles will have been surveyed.

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**BEEES AND POULTRY.****FACTS FOR BEGINNERS.**

The following are facts which every bee-keeper ought to know:—

1. That the life of a worker bee, during the working season, is only from six to eight weeks' duration, and that a large majority of them never live to see seven weeks.

2. That a worker is from five to six days old before it comes out of the hive for the first time to take an airing, and that it is from fourteen to sixteen days old before it begins to gather either pollen or honey.

3. That all swarms engaged in building comb, when they have not a fertile queen, build only drone comb, and that all the comb in the lower or breeding apartment should be worker or brood comb, except a very small quantity of drone comb, four inches square being amply sufficient.

4. That the more prolific the queen is, the more young bees you will have, and the more surplus honey will be gathered, other things being equal.

5. That you ought never to cut mouldy combs out of the hives, for the reason that you should never allow it to become mouldy.

6. That you ought never to double swarms or stocks of bees in the fall, because you ought to attend to that and make them strong during the summer, by taking brood from the strong stocks and giving it to the weaker.

7. That a drone-laying queen should be taken away, and one producing workers be put in her place, else the colony will soon come to naught.

8. That, as a rule, as soon as an Italian queen shows signs of old age or feebleness, the bees themselves will supersede her.

9. That all colonies should be kept strong in order to be successful.

10. That every hive should contain about two thousand cubic inches in the breeding department.

11. That beginners in bee-keeping should be very cautious about increasing the number of their swarms or stocks rapidly, until they thoroughly understand the business.

**TWO WAYS.**

When a woman has a hen to drive into the coop, she takes hold of her skirts with both hands, shakes them quickly at the delinquent, and says, "Shoo, there!" The hen takes one look at the object and stalks majestically into the coop. A man doesn't do that way. He goes out of doors and says: "It is singular nobody can drive a hen but me," and picking up a stick of wood, hurls it at the offending biped and observes: "Get in there, you thief." The hen immediately loses her reason, and dashes to the other end of the yard. The man straightway dashes after her. She comes back with her head down, her wings out, and followed by an assortment of stove wood, fruit cans and clinkers, and a very mad man in the rear. Then she skims under the barn, and over a fence or two, and around the house, and back again to the coop, and all the while talking as only an excited hen can talk, and all the while followed by things convenient for handling, and a man whose coat is on the sawbuck, and whose hat is on the ground, and whose perspiration has no limit. By this time the other hens have come out to take a hand in the debate and help dodge missiles, and the man says every hen on the place shall be sold in the morning, puts on his things and goes down street, and the woman has every one of those hens housed and counted in a few minutes.—*Mobile Register.*

**"THE BUSY BEE."**

BY ANTI-BEE.

I wonder if they'll ever cease  
To praise the "busy bee?"  
That "good example for mankind,"  
It fairly sickens me.

Old fogies tell us "to admire  
And pattern after them."  
Why, if we did—but I will strive  
My honest wrath to stem;

And in few words display their traits.  
(I'm daft, I hear you saying.)  
Well, never mind, we'll take that bee  
Upon yon blossom swaying.

He sucks and stuffs until he is  
Upon the point of bursting;  
A glutton, then, upon the start—  
Well, this we'll call the first thing.

Then, like a miser to his safe,  
Straight to the hive he hurries;  
And if you happen in his way,  
Good gracious! how he worries.

With angry buzz, and sting unsheathed,  
He strikes you on the forehead;  
Your classic brow, the neighbours say,  
In consequence, "looks horrid."

When "times are hard," just like mankind,  
He robs and slays his neighbours;  
And confiscates, for his own use,  
The fruits of all their labours.

And if, perchance, a stranger bee  
Should happen in their hive,  
They start him home so suddenly,  
He doubts if he's alive.

A glutton and a thief he is,  
A murderer and miser;  
And if you study him a year,  
You will be none the wiser.

They live and die for wealth alone;  
Their strife is never ended;  
Their hive's a world in miniature,  
Where good and bad are blended.

But if, for us, my friend, you still  
A good example find them,  
I'll own that I was in the wrong,  
And cruelly maligned them.

—*California Apiculturist.***FEEDING CHICKENS.**

A great deal may be said in regard to feeding; pushing the young chicks along towards maturity as rapidly as possible. The first month or two is the most critical period; while yet "downy," they are very tender. Their thin covering is not able to resist the cold winds or pelting rains; and unless judiciously fed on cooked and dry food, scraps of meat occasionally, cut onions and cabbage, and milk if it can be had, they will not thrive as rapidly as we would wish. A well-fed and well-cared-for chick or adult fowl is not as liable to disease as a neglected one. It is poor economy to stint young or old birds; and it is well to bear in mind that there is no more profit in feeding well and pushing the chicks ahead than in not feeding them at all.—*Poultry Monthly.*

**CLEANING POULTRY HOUSES.**

One of the chief difficulties experienced where many fowls are kept is in having the houses free from the germs of disease, and especially to keep the fowls free from lice in the spring and during the sitting season. The fumes of burning sulphur form probably one of the very best means ordinarily available, when the house can be closed up quite tight. The ordinary farm-house, however, is seldom sufficiently tight for this purpose. Where the building may be made perfectly tight, by caulking or otherwise, all that is necessary, after scraping out all manure and thoroughly brushing down all surfaces with a stiff broom, is to place an iron pan or pot upon a bottom of bricks, and set on fire rags saturated with sulphur.

If the fowls have any contagious disease, such as roup, cholera, etc., let them remain in the

building, when fumigated, as long as there is no danger of suffocating. Then turn them out and continue the fumigation until every part of the building is fully filled. Keep all as close as possible for ten hours, and the deadly germs and insect life will have disappeared.—*Prairie Farmer.*

**TO "BREAK UP" A HEN.**

Remove the hen to a separate pen, if possible, out of sight and hearing of her usual haunts, and keep on very spare and low diet, and in about a week she will be quite cured, and may be returned to her mates. But all this is of no use unless the removal to a separate pen be made at once, after first discovering signs of the inclination to sit. It is here that the mistake is generally made, and the bird is allowed to sit on the nest day after day until the fever (for it is nothing more nor less) has increased to an extent very difficult to cure. Do not, on any account, resort to the practice of throwing cold water over the hen. Many a good bird has been permanently ruined in health by such a shock to the system; besides, it does not hasten the cure, and is cruel in the extreme.

**ABOUT POULTRY.**

An "Old Poultry Raiser" gives his experience about poultry in the *Country Gentleman* as follows:—

"All black varieties of chickens are poorly suited for market poultry. They show the pinfeathers, and are not so saleable as white or light-coloured fowls. Those with yellow legs and skin are more saleable than blue or white-legged ones. Asiatics are among the best winter-laying fowls, and the chicks can be raised in early spring, when they command a high price as broilers. The small breeds are tender, and may die if hatched early; they cannot stand cold or wet. Asiatics grow and thrive, even when snow is on the ground. In starting in the poultry business, do not build one large house, but several small ones. They need not cost much to hold thirty, or near that number, without crowding. The smaller flock always does the best under all circumstances, provided they are fed in proportion. Divide the flocks into several buildings, and healthy fowls and the best results are sure to follow, if food and cleanliness are also provided."

**HEN MANURE.**

An exchange says: Mix it with loam or muck, never with ashes, for ashes will discharge the ammoniacal qualities. Mix it on the barn floor, and put it, as soon as convenient, into the soil, where its valuable fertilizing qualities may be utilized and not wasted by exposure to air. It should be well mixed with the soil.

**MASH FOR POULTRY.**

An exchange recommends a mash composed of two-thirds wheat bran and one-third corn-meal for solids, with hot skim-milk for liquid. Fed in the morning when about blood heat, it makes a good breakfast for poultry, especially for laying hens. Oats and buckwheat for mid-day feed, and corn and oats for supper, are excellent for poultry. Clean, fresh water is a very essential article.

The little girl rattled it off as if she knew it by heart. "Why do ducks put their heads in the water? For divers reasons. Why do they take them out? For sundry reasons. Why do they put them in again? To liquidate their little bills. Why do they take them out again? To make a run on the banks."

## HOME CIRCLE.

## HARD TIMES CONQUERED.

BY MRS. HENRY WARD BEECHER.

About seventy years ago, a physician with a young family springing up around him, consulting his wife, as all good husbands find it prudent to do, bought a large farm in one of our New England States, where every farmer truly earns his living by the sweat of his brow. Both felt that nowhere could their children be trained to industry and frugality so thoroughly as on a good farm.

Of course the Doctor was obliged to "run in debt" for this property and give a mortgage on the place. The payments were to be made quarterly, and promptly, or the whole would be forfeited and revert back to the original owner. In those days physicians were not likely to become millionaires in a hurry, and though his practice was large, the pay was small and not always sure. He therefore looked to the farm to bring forth the means to release him from the bondage of debt; and the children, even to the youngest, were taught to labour for, and look forward eagerly to, the time "when we have paid for the farm!"

The creditor was the doctor's father-in-law, through his first wife, and while the good old gentleman lived, if by any mishap or over press of business the quarterly payment had been delayed, it would have been kindly excused. But for the ten or fifteen years that he lived after the sale of the farm, there had not been one delay in payment, though now and then there would come a time when it was very hard work to secure the needed sum in time, for even in the olden days "hard times" were often found prowling about, to the great terror of our hard-working New England farmers. But little by little the heavy debt was diminishing, and they were looking forward, hopefully, to the year of Jubilee, when they could sit under their own vine and fig tree with none to molest and make them afraid.

At this period the father-in-law died. He had but two children—daughters. The younger, the doctor's wife, died childless. The elder married a hard, close, scheming man, who, knowing that his wife and children would inherit this property in case the payments were not promptly met, lost no opportunity of remarking that Dr. Mason's farm would doubtless soon come into his hands, as with his large family he must fail by-and-by.

The financial troubles which the war of 1812 had caused, as all wars are sure to do, were not yet adjusted. Money was scarce and payments very difficult. Ten children now filled the old house with merriment and gladness; but they were to be clothed and educated.

Let us see how successfully they had been taught to make their high spirits and resolute wills cheerful auxiliaries in lifting the burden which, since their grandfather's death, was pressing heavily upon their parents.

At the time of which we write, among other crops, rye was extensively raised. It was used for food among the farmers quite as much as wheat, but was also valuable for other purposes. When fall-grown, but still in the milk, large quantities were cut to be used for "braiding." The heads were used for "fodder;" the stocks, after being soaked in strong, hot soap-suds, were spread on the grass for the sun to whiten. When sufficiently bleached and ready for use, they were cut at each joint, the husk stripped off, and the straw thus prepared tied in pound bundles for sale.

Bonnets then meant something more than a small bit of silk or velvet with a flower attached, and the "straw braid" for making them was in great demand. Boys and girls were alike taught to braid, and the long winter evenings were not spent idly. Dr. Mason raised large crops of rye, and each child, almost as soon as weaned, was taught to braid, and was soon able to do much toward clothing himself. At six years of age, a dollar a week was easily earned; at eight, three dollars; and in something of that proportion up to the eldest.

Does anyone think such a life, with such an object in view, was hard or cruel? Never was there a greater mistake. It was of immense value to these young spirits. They had something real, that they could understand, to labour for. There was life and courage and true heroism in it. An education—with here and there, to be sure, some rough places to pass

over—which was worth more to them than all the money millionaires bequeath their sons and daughters—an education which prepared them in after-life to be courageous and self-helpful.

It is this kind of training that has made New England's sons and daughters strong and self-reliant, and the lack of it which makes these *hard times* such a horror, that we hear of so many who seek death by their own hands as preferable to the struggle for better times.

In the long winter evenings, when the labour of the day was over, the children home from school, and the "chores" all finished, the candles were lighted and the evening work began. The mother in her corner was busy making and mending for her large family. The doctor, if not with the sick, smoked and read opposite her. The children gathered round the long table in the middle of the room, where lay the school-books and straw all ready machined for braiding, while the old fireplace, heaped with blazing logs of hickory, oak, and fragrant birch, made the room warm and cheerful. Here, with their books fastened open before them to the next day's lessons, the children with nimble fingers plaited the straw and studied their lessons at the same time. For children taught to be industrious usually carry the principles thus developed into the school-room, and are ambitious to keep as near the head of the class as possible.

Such a family as this was well equipped to meet and conquer adversity. For several days Dr. Mason had been unusually grave and silent. All noticed it, but no remarks were made until evening, when he came to supper, so unmistakably worried and despondent that his wife inquired if he was not well.

"Yes, well enough. But, Lucy, I have so far been unable to collect money for our quarterly payment. So much is due me that I had no fears but that enough would be promptly paid to save me any trouble."

"How much is lacking?"

"Not quite a hundred dollars; but it might as well be thousands for any chance I now see of getting it in season. There is now so much sickness about, that, as you know, I have had no rest, and little time to collect money. If not ready before midnight tomorrow we are ruined. I have kept it from you as long as I dared, still hoping that those who ought to pay me would do so."

"Have you told them how very important it is that you have the money?"

"No; I did not wish to speak of it. Mr. H. is watching greedily for a 'slip,' and we need expect no mercy at his hands. Under our hard labour and good care this farm has risen greatly in value—too much so for him to spare us an hour, if he can once get hold of it. I am almost discouraged. It is the darkest time we have seen yet. But I must be off, and shall probably be out all night. To think there are not forty-eight hours between us and ruin! And my hands so tied by several bad cases that I may not find one hour to try and make up the little that is needed."

For a few minutes after the doctor left, the children stood silent and sad, watching their mother. At last she said—

"Children, we can help father through this, and save our home, if you are willing to submit to some little self-denial. No; I should have said to *great* self-denial. Each of you has worked diligently to buy new garments for winter. You need them, and deserve them, and I should be so happy and proud to see you all neat and comfortable. But to help father, are you willing to let me try to clean, mend, and make over your old clothes, and use what you have earned to help brighten this dark day? The braid you have on hand, and what is now due at the store, is all your own, or to be expended for your own clothes, and if each one of you is not *perfectly* willing, I don't wish you to give it up."

It was a beautiful sight to see those eager faces watching their mother, ready to answer the moment she had finished; for in the olden time children were taught that it was disrespectful to interrupt anyone when speaking, even when, as in this case, it was difficult to keep silent. But the reply when given was prompt, enthusiastic, and what she had confidently looked for.

"Thanks, dear children! Now, then, hasten. First bring me all your braid, and let us see how much it will come to."

The braid, in ten-yard rolls, was brought, and its value estimated.

"With that which is now due us at the store we have nearly sixty dollars! Well done for all these little fingers! But now we must devise a way to make up the remainder. Your father spoke last night of a large quantity of straw, which, if out, would bring in something. He will be away all night. If you work well we can cut many pounds before midnight. Now, girls, help me wash the dishes, while your brothers bring, before dark, the straw we can cut to-night."

By the time the candles were lighted all was ready to begin.

The younger children were excused at their usual bed-time, but the others worked with their mother till the tall clock in the corner struck one. Then all retired for a few hours' rest.

Dr. Mason returned home in season for breakfast, and his wife inquired if the eldest son could drive her over to the neighbouring town to dispose of some braid for the children. He replied that he must be gone again all day, and neither son nor team could well be spared from important work at home. But a strange thing followed this implied refusal. Mrs. Mason, who never allowed her plans or wishes to interfere with her husband's, now repeated her request, and urged it till he yielded, from sheer surprise, apparently, that his wife could be so persistent.

The doctor went his usual round, and the mother and son departed on their mysterious errand. Their business accomplished, they returned well satisfied, and ready for supper when the father arrived.

A deeper gloom was on his face when he entered; but no word was spoken till all were seated at the table. Too much absorbed in his troubled thoughts to notice the suppressed excitement plainly visible on every face, he was startled as Mrs. Mason placed before him the amount required.

"It is our children's offering, and sufficient to make up the needed sum. I persisted in going away this morning against your wishes, because I saw no other escape. We cut the straw last night—many willing hands make quick work; I sold it, and their braid added to it, with what was already due them, completed the sum."

Those who witnessed the scene will never forget it: Dr. Mason with his arm around his wife, and both in tears, calling her all happy names; the children clinging about their parents, so joyful that home was saved, and they had helped to save it.

"Put Charlie into the waggon, quick. If he fails me not, the six miles between here and M— will be the shortest I ever rode. I shall be home before bed-time to thank you all. I cannot now. I hope we shall never come so near ruin again."

And they never did. In two years the last dollar was paid, and then Dr. Mason vowed he would never owe anyone a cent. He kept his vow.—*Chris. Union.*

## THREE SCENES.

BY MISS C. W. BAEBER.

## SCENE THE FIRST.

It was a balmy night in June. The stars were out in the deep azure above, shedding over the wide, green earth quiet beauty, and the streets, in town and country, were filled with loiterers, who, won by the beauty of the night, had come out from hot offices and pent-up workshops to enjoy the hour.

In a stately country house, scarcely an hour's walk from the goodly city of G—, there were brilliant eyes, flashing mirrors, rose-wreathed vases, and a party of young and happy revellers. Young girls, clad in white, with artificial flowers twined among their braided hair, or sunny curls stayed here and there, leaning upon the arms of their gallants, or chatting merrily upon the sofas and cushioned chairs, which were strewed plentifully through the rooms.

It was one of those scenes which make the young forget, for a brief time at least, that earth has cares and trials; that it is not what it seems—the residence of truthful and happy hearts. Beside a centre table two persons stood leaning gracefully over the leaves of a richly-bound album, admiring the engravings and sentiments which they found there. Howard Greenleaf and Edith Hastings were pronounced, by all, the stars of the evening. There was something that proclaimed him to be "one of nature's nobility."

His hair was very black, and curled over a high, white forehead; his eyes were lit up by the fires of genius; his voice deep-toned, yet musical, as he turned every now and then, with an admiring glance, to the fair creature at his side. Edith was exactly the reverse of her companion, and yet none could have said that she was less beautiful. Her curls were light, almost flaxen, in their hue; her complexion was clear, even to transparency; and her large blue eyes, and sweet, rosebud-like mouth, formed a face as innocent and pure in its expression as that of a little child. She was clad in a robe of muslin not more snowy than the rounded arms, which were ornamented by heavy bracelets of gold. She was the only, the idolized child of the banker in C—.

A servant came in, bearing a waiter, upon which were refreshments. Among the stately pyramids of cake flashed several glasses, filled to the brim with wine. Howard was interrupted in the middle of one of his best speeches, as the ebony-faced attendant stopped before him; but he helped his fair companion bountifully to the tempting things before them, and then, as a crowning act to his politeness, he took two sparkling glasses from the waiter, one of which he gave into the hand of his lovely companion. Both quaffed off the ruby tide without the shadow of a fear.

## SCENE THE SECOND.

There was a wretched pallet of straw in the corner of a cellar in one of the most loathsome streets of the city. One old tin lamp, covered with lint and grease, stood on a rude pine table in the middle of the room, shedding a ghastly blue light over the scene, and "making the darkness more visible." Upon the pallet of straw there was a dying man, and beside it stood a child with flaxen hair and mild blue eyes. He was the exact portrait of Edith Hastings. The dying wretch was Howard Greenleaf; that child was all that was left him by the broken-hearted creature whom he called his wife—all that was left of the beautiful and accomplished Edith. She has been for months in her grave, "where the weary are at rest."

It was terrible to look upon the sufferer—terrible, for conscience was at work, and the contortions of his face were visible to the boy in the faint light of the lamp, as he stood with compressed lips and listened to his incoherent murmurings. Once only a gleam of reason shot through his eyes: then, reaching up his clammy hands, he grasped the white fingers of the child, and said, as if to himself: "He is like his mother; like her, as she stood beside me at the table and quaffed the fatal poison from the cup I gave her. That very night she became my affianced bride; that very night there were interwoven about her young and innocent heart those cords which dragged her down to misery and woe. I wedded her; I squandered her wealth, and abused her until her heart was broken. I did; no, not I, the poisonous wine-cup did it all. By nature I was noble and good; kind even to a fault; and gifted as the wise men of the earth.

—Forswear the bowl;  
For one rash moment sends you to the shades,  
Or shatters every hopeful scheme in life,  
And gives to horror all your days to come."

## SCENE THE THIRD.

The wind whistled through the streets, carrying with it wreaths of snow, and biting the cheeks of even the fur-clad, until they grew chill and numb in its icy breath.

The wealthy stayed in their comfortable palaces, and shut carefully every door and window, to exclude the piercing wind. The man of business hurried over the ringing pavements, as if anxious to reach the shelter of a comfortable home.

On the marble stone of a stately residence a poor beggar boy sunk down, overcome with cold and fatigue. His cheeks were sunken, and upon the long silken lashes that veiled his blue eyes there were two frozen tear-drops. As he glanced up to the warm crimson-curtained windows above him, something like a groan came through his blue and quivering lips. From that very mansion his mother went forth a young, beautiful and richly dowered bride; but the child knew it not. His recollection was misery and woe: he only knew that he was a drunkard's child!

As he sat there with his stiffening hands clasped over his naked bosom, he slept, and dreamed that the black, sullen clouds parted above, and an angel face looked brightly and smilingly forth, and beckoned him away. He caught the glitter of the silvery

wings, whiter even than the falling snow-flakes beneath them, and then he knew that it was his mother beckoning him to the land of rest.

Before morning, the beggar boy lay upon the marble steps, as white, and cold, and senseless as they. Life had fled, and those who lifted the stiffened corpse from the steps of "the gentleman's" door, wondered over the exquisitely chiselled features, wasted as they were by misery. Hastings Howard, Edith's beautiful and only child, slept then "the sleep that knows no dreaming."

## THE WILD ROSES.

"Dans la vie, garde-toi de rien différer."  
(In life beware of delaying aught.)

I walked in the joyous morning,  
The morning of June and life,  
Ere the birds had ceased to warble  
Their sweetest of love and strife.

I walked alone in the morning,  
And who so glad as I,  
When I saw the pale wild roses  
Hang from the branch on high?

Fairer than stars were the roses,  
Faint was the fragrance and rare;  
Not any flower in the garden  
Could with those roses compare.

But the day was all before me,  
The tumult of youth's delight;  
Why bear a burden of roses  
Before the calm of night?

Let them stay a while to gladden  
The air, and the earth below,  
With tender beauty and sweetness  
They cannot choose but bestow.

So I kissed the roses, and lightly  
I breathed of their breath divine;  
It is time when I come back, I said,  
To make the sweet roses mine.

I went in the gladsome morning—  
I said, we part for an hour;  
The branch of wild roses trembled,  
The dew was on every flower.

I returned in the joyless evening;  
I yearned with passion then  
For the pale and peerless roses  
I never should see again.

For another had taken delight  
In colour and perfume rare,  
And another hand had gathered  
My roses beyond compare.

I may wander east, may wander west,  
Wherever the sun doth shine;  
I shall never find the wild roses—  
The roses I thought were mine.

—Elizabeth D. Cross (Mrs. E. D. Bullock).

## PRACTICE VERSUS PREACHING.

"Mother, how much tobacco does it take to make a sermon?"

"What do you mean, my son?"

"Why, I mean how much tobacco does father chew, and how many cigars does he smoke, while he is making a sermon?"

"Well, the tobacco and cigars don't make the sermons, do they?"

"I don't know but they do—they help along, at any rate; for I heard father tell Mr. Morris, the minister who preached for him last Sunday, that 'he could never write well without a good cigar.' So I thought maybe the tobacco makes the sermons, or the best part of them."

"My son, I am shocked to hear you talk so!"

"Well, mother, I was only telling what father said, and it made me think. He said that a prime cigar was a great solace (whatever that is), and he said, besides, it drove away the blues—put him into a happy frame of mind, and simulated or stimulated his brain, so he could work better. I suppose stimulate means to make one think easier; and I've been thinking, mother, if I had something to stimulate my brain, I could study better; and the next time I have one of those knotty questions in arithmetic to work out, I will get a cigar, and see if it won't help me along. You know you often tell me if I follow my father's example I will not go far astray; and now I would like a few cigars, to make my brain work well, so that I can stand at the head of my class."

"I hope I shall never see my son with a cigar in his mouth; it would be the first step to ruin!"

"You don't think father is ruined, do you? and he has taken a good many steps since he has taken the first cigar."

"I think, my son, your father would be better without cigars, or tobacco in any shape; but he formed the habit when he was young, and now it is hard to break off."

"But father says 'we are to blame for forming bad habits, and it is a sin to continue in them.' I heard him say that in the pulpit not long ago. There is old Tom Jenkins, who gets tight every day. I suppose he would find it rather hard to leave off drinking whiskey. But father says 'it is no excuse for a man, when he gets drunk, to say he is in the habit of getting drunk.' He says it only needs resolution and moral courage to break off bad habits."

"But, my son, smoking tobacco is not quite drinking whiskey and getting drunk."

"No, I know that, mother; but I was going on to say that if smoking was a bad habit, father would have given it up long ago. But I don't believe smoking is any harm; and it does some folks a great deal of good. You know how nervous and fidgety father gets when he has to go a day without any cigars; and, besides, he could not write his sermons without them. I am sure, if he could write as well and do as much good without using tobacco, he would not spend so much for it. When I want to buy a little candy, or a bit of spruce gum, father tells me I had better practise the grace of self-denial and save my money for the missionary box. Besides, he says such stuff is not good for me; it will spoil my teeth and ruin my health. Now, I am quite certain that father would not spend so much money—more than I ever spent in my whole life for candy, gum, clothes, and everything else—if he did not believe tobacco was a real benefit to himself and others. Why, mother, do you know anything about the price of cigars in these times? Cousin Edward Wilkins, who smokes a great many, says you can't get a decent cigar for less than fifteen cents; and the best cost forty and fifty cents apiece. I heard Deacon Tompkins say his cigars cost him six hundred dollars a year; for he uses nothing but the very best, and they are all imported. He told father so the other day, when they were smoking in the study after dinner, and I was trying to get my arithmetic lesson. Now, mother, do you think my father and the deacon and a whole host of ministers and elders, and temperance lecturers, and lots of good Christian people spend so much money to keep themselves in bad habits? Why, just the sum that Deacon Tompkins alone spends for cigars, would support a missionary in the West for a whole year, and would be a better salary than most Western missionaries now get. Really, mother, I can't believe that using tobacco is wrong, as long as so many good Christians use it. I don't care so much about chewing. I would rather have some nice clean spruce-gum, like they have down in Dickson's store; I would like to smoke as my father does; and please, mother, give me a little money to get some cigars."

"My son, you may talk the matter over to your father. Ask him if he thinks it will improve your habits and your manners to learn to smoke; if he approves, you may ask him for a cigar."—N. Y. Republican.

ALEXANDRA, Princess of Wales, has set in England one excellent fashion. She has made so public a display of attachment to her young sons and daughters, that it has become the mode for the fashionable British matron similarly to express her affections. Small boys and girls have, it is stated, eclipsed toy terriers and pugs as the pets paraded by ladies in Victoria and on foot in Hyde Park at the height of the season. 'Tis a pity that there is not in this country some one of sufficient influence to produce a similar effect. The disgusting practice of carrying lap-dogs everywhere is becoming common. In the cars, the parks, and the hotels, and even in church, they can be found; and some women seem to be pleased with the attention—generally disgusted attention—with which their often hideous pets are watched. If the remarks that are made by strangers about those women, old and young, who carry dogs in public places, were heard by those to whom they refer, poodles would be left by respectable women to those who could not sink lower in public esteem.—Christian Advocate.

## YOUNG CANADA.

## WHAT THE CHAIRS THINK.

Three little chairs leant side by side against the nursery bed;  
Three little boys lay snug and warm, each tucked up to his head.  
The chairs were chatting soft and low, as chairs at night will do;  
The children, dreaming side by side, might learn a thing or two  
If slyly they would keep awake and hear the talking through.

One little chair went "creak, creak, creak," and stretched its legs a mile.  
"Oh dear!" it said, "my joints are loose, my back aches so to-night;  
That careless boy perhaps may think I do not feel his blows,  
Nor shrink away from every kick and rudeness he bestows.  
I wonder if all things can feel; perhaps they can, who knows?"

"Well, I've been chipped by Allie's knife until I sure would bleed,  
If any blood were in my veins, and shame his thoughtless deed."  
Thus spoke the second, with a sigh, and creaking sad and low:  
"Why can't the children tender be, and speak and act as though  
They knew all things had hearts and nerves?—they'd be much sweeter so."

A tiny pair of arms were raised, as if to ask attention;  
Their owner said, "There is a thing which I would like to mention,  
For sure I know *one* child at least, who's all we could desire;  
He never scratches, cuts nor kicks, nor roasts me by the fire.  
I wish we could all other boys with his kind deeds inspire.

"He's kind and gentle to all things, dog and cat as well;  
As to the baby sister, dear, the little Claribel,  
All things seem brighter when he's near, and better for the way  
He speaks to them, or deals with them; indeed, I cannot say  
How my arms ache for that dear boy when he is gone all day."

And so, remember, little friends, be gentle, tender, kind;  
And live, each day, in such a way, 'twill leave no scar behind.

## A PLEASANT SURPRISE.

My brother Johnny says he would do for a first-class bumble-bee; he's as hot all over as if he had forty stings. We've been talking through the stove-hole to comfort each other. This hole is in the wall at the side of my bed; so, if I put a chair on the bed, and then climb up and stand on tiptoe, I can see into Johnny's room, and we can have a good talk. We're in trouble; and this is how it happened:—

One day last week, our teacher read us a story about a little girl who had a sick father; and he was going to starve to death 'cause he hadn't any money to buy oranges; and everything had gone wrong inside. Well, the good little girl heard that a dentist wanted some teeth, and would pay well for them. (I don't see why he should pay money for teeth, when he could have his own for nothing.) The little girl had fine teeth, so she went to the dentist and asked him to take some out and pay her the money they were worth, for her poor father. Then the dentist made her tell him all about her father; and he wouldn't take the teeth, but he gave her the money all the same, and went to see her father, and got a doctor for him, so he didn't die.

It was a beautiful story, and made me cry. Johnny said it wasn't anything to cry about; stories like that were for examples, and when we had a chance we must just go and do likewise. Well, this morning, when father was putting on his overcoat, Johnny and I asked

him for a penny. And father, he said we were always wanting pennies, and he wasn't made of money; and then he went out.

Sister Em began to cry, 'cause father said she couldn't have a new dress this Easter. Everything was going wrong, and he didn't know what would become of him, and he was sick of everything.

Johnny and I didn't cry; we only looked at each other.

While we were going to school, Johnny said this was our chance. Now we could do like the good little girl, and be a support to our parents. Dentists always wanted teeth, and we'd go to the dentist right away after school, and have it over.

"And then," says Johnny, "if we've made five dollars for father, perhaps he'll give us our penny, 'cause it'll be such a pleasant surprise to him."

We couldn't hardly wait for school to be out. I got a black mark in arithmetic, 'cause when Miss Stevens asked me "If you had an apple, and if Samuel Smith ate it up, what had you left?" I said, "Your teeth."

After school we walked about till we came to a dentist's, and we went in, and asked him if he wanted some teeth. And he said, "Why? Did we want to lose some?" And we told him, "Yes."

We thought he would sit down and ask us all about it, just as the other dentist did with the good little girl; but he only said:

"Let's look at 'em."

Then he made Johnny climb up in the high chair, and tip his head back; and then he said, "You want those two out that crowd the rest." Then he put an iron thing into Johnny's mouth, and pulled out one tooth, and then he pulled another. And he said Johnny was a brave boy 'cause he didn't holloa.

I asked Johnny if it hurt, and he said, "Not much, and don't you disgrace the family, Kitty White, by howling."

"Now, my little lady," says the dentist, "get into the chair, and I'll be as gentle as I can." So he helped me up, and tipped back my head, and looked.

"Your teeth are crowded just like your brother's," says he; and then he begins to pull.

My, how it hurt! And didn't I make a noise! I thought my head was coming off. But it was over in a minute, and the dentist told Johnny not to laugh at me, 'cause my teeth came harder than his did.

When our teeth were out, we thought the dentist would pay us. He asked us whose little boy and girl we were, and where we lived, and said this was pleasant weather for little folks.

After a while he said: "It's four dollars."

We thought he had four dollars for us, and held out our hands, but he didn't give us anything. Instead of that, he said: "Haven't you got any money?"

Then Johnny explained to him that we thought he would pay us for our teeth so that we could help our poor father.

The dentist began to laugh, and said he didn't pay for teeth; but he would give us a letter that would make it all right.

So he wrote a letter, and sealed it, and told Johnny to be sure to give it to father. He kept laughing all the time he was writing it, and we thought he was the pleasantest man in the world.

When we got home, Johnny said we'd better wait till after dinner to give father his pleasant surprise. And at first I was glad we'd waited; for the roast beef was too brown, and father said: "There never could be a piece of beef done right in this house; and Mrs. White, my dear, if you could only have a carving knife that would cut! I believe your son uses the carving knife for a jack-knife."

We felt so sorry for poor father that we thought we'd give him his surprise then, so he'd feel better. Johnny took out the letter and gave it to him. He sits next to father, and I sit next to Johnny. Father took the letter, and said:

"What's this, sir?"

And Johnny said: "Read it, dear pa, and see."

Then father read it, and wrinkled his forehead all up, and we thought he was going to burst into tears, like the sick man did when the good little girl brought him the oranges. But he didn't burst into tears. He threw the paper across the table, and said:

"What's this, Mrs. White? Have you been running me into debt, after what I told you this morning?"

And mother said: "I'm sure I don't know what you mean, dear." Then she read the letter, and called us naughty children, and "how dare you go and have sound teeth out without my consent?"

And father said that "what we had done was catamount to robbery; going and getting him into debt of our own accord; and you may go to your rooms and think about it till your mother and I come."

We've been in our rooms ever since, and both father and mother said they were under the necessity of—

Well, Johnny says a switch is the worst, but he doesn't know anything about a slipper. Anyhow, it's over for this time.—*Ada Neyl, in St. Nicholas for May.*

## BOYS AND THIMBLES.

No man can, like the writer, live sixty years without often wishing he had learned to use a sewing thimble well in his early boyhood, especially if he has gone about the world much. Buttons will come off, stitches will break, and how handy it is for boys at school—often at home—to be able to whip on a button, stop a starting rent, and do many other little sewings, without calling on a woman, or perchance sending for a tailor. One seldom, if ever, learns to use a thimble, if this part of his education has been neglected in small boyhood. The writer has travelled a good deal, and at a rough guess he has broken threads at least five hundred times, in attempting to work a needle through a button or garment without a thimble. Boys, take our advice, and every one of you learn to use a thimble well before you grow up.

Scientific and Useful.

GINGER COOKIES.—One cup of butter, one cup of sugar, one cup of molasses, one teaspoonful of saleratus dissolved in three tablespoonfuls of water, one teaspoonful of ginger. Roll as soft as possible, and bake quickly.

A GOOD DESSERT.—An inexpensive and good dessert is made of one quart of sweet milk, two-thirds of a cup of uncooked rice, and a little salt. Put this in tea or coffee cups, set them in a steamer over a kettle of boiling water. Let it cook until the rice is almost like jelly. When cold turn it out of the cup. Serve with sugar and cream, or with pudding sauce.

THE "Confectioner and Baker" gives the following method for making peppermint drops: Take a convenient quantity of dry granulated sugar; put it in a pan having a lip, from which the contents may be poured or dropped; add just water enough to make the sugar into a stiff paste; two ounces of water to a pound of sugar is about the right proportion; set it over the fire and allow it to nearly boil, keeping it continually stirred. It must not actually come to a full boil. When the bubbles denoting that the boiling point is reached begin to rise, remove it from the fire and allow it to cool a little, stirring all the time; add strong essence of peppermint and drop on tins or sheets of white paper. The dropping may be performed by tilting the vessel slightly, so that the contents will slowly run out. The drops may be stroked off with a stiff wire on to the tins or paper.

COD CUTLETS WITH TOMATO SAUCE.—Cut some inch-thick cutlets from the middle or tail of the fish. Brush them with yolk of egg, and sprinkle them thickly with very fine bread crumbs or cracker powder. Fry them in plenty of boiling lard to a delicate brown. For sauce, stew ripe or canned tomatoes in some good stock, with a little shallot, salt, cayenne, a little lemon peel and whole black pepper with a little powdered ginger. When the tomatoes are quite tender, strain the stock from them, and put a sufficient quantity of it for the sauce required into a fresh saucepan. Press the tomato pulp through a steel wire sieve; mix it with the stock, and when boiling, stir into it sufficient corn starch or arrow-root mixed with cream to give it proper consistency. Add a squeeze of lemon juice; pour it at once into an entree dish, lay the cutlets upon it, just overlapping each other in a line in the centre of the dish, and serve immediately.

EFFECTS OF QUININE ON THE SYSTEM.—When very large doses of bark or quinine are administered, a condition is induced which is known as "cinchonism," or "quinism." The symptoms to which collectively this term is applied are headache, noises in the ears, deafness, flashes of light before the eyes, confusion of sight, giddiness, and sometimes even slight delirium. Usually the headache is dull, heavy, and stupefying, but when a dose of twenty-five or thirty grains has been given it is often agonizing. Fortunately these symptoms are of short duration, and usually all pass off in a few hours. Some people are very susceptible to the action of quinine, and in them a comparatively small dose may produce the above symptoms. These unpleasant effects need not lead to the abandonment of the drug, a reduction in the quantity or in the frequency of administration being all that is requisite.—From the Family Physician for February.

EFFECT OF SUNSHINE.—From an acorn, weighing a few grains, a tree will grow for a hundred years or more, not only throwing off many pounds of leaves every year, but itself weighing several tons. If an orange twig is put in a large box of earth, and that earth is weighed when the twig becomes a tree, bearing luscious fruit, there will be very nearly the same amount of earth. From careful experiments made by different scientific men, it is an ascertained fact that a very large part of the growth of a tree is derived from the sun, from the air, and from the water, and a very little from the earth; and notably all vegetation becomes sickly unless freely exposed to sunshine. Wood and coal are but condensed sunshine, which contains three important elements equally essential to both vegetation and animal life—magnesia, lime, and iron. It is the iron in the blood which gives it its sparkling red colour and its strength. It is the lime in the bones which gives them the durability necessary to bodily vigour, while the magnesia is important to all of the tissues. Thus it is, that the more persons are out of doors the more healthy and vigorous they are, and the longer will they live. Every human being ought to have an hour or two of sunshine at noon in winter and in the early forenoon in summer.

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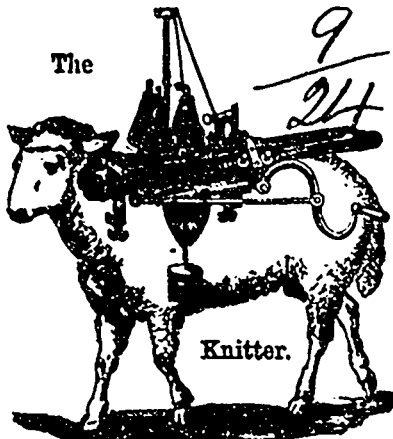
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TORONTO WHOLESALE MARKETS.

OFFICE RURAL CANADIAN, Toronto, April 27th, 1882.

GRAIN - Total stocks in store amount to 444,600 bushels, as compared with 474,957 bushels last week, and 523,776 bushels at a like time in 1881. The volume of transactions was smaller than last week, and prices close easier, in sympathy with outside markets. Fall Wheat. - Stocks in store 249,215 bushels, as compared with 246,857 bushels last week, and 136,184 bushels at a like time in 1881. There was a fair movement at near the close of last week, with sales of several cargoes of No. 2 at \$1.35, on Monday a car sold at \$1.84, and on Tuesday a cargo outside at equal to \$1.84. Yesterday there were sellers at the latter price, but buyers are holding off. Spring Wheat. - Stocks in store 89,208 bushels, as compared with 100,615 bushels last week, and 117,252 bushels at a like time in 1881. A round lot of 15,000 bushels, consisting of Nos. 1, 2, and 2 choice, sold a few days ago at \$1.88, and a car of No. 1 at \$1.88 on track. No. 2 sold on Tuesday at \$1.86, and now offers at that price. No. 1 is nominally easier at \$1.88 f.o.c. Oats. - Stocks in store 5,888 bushels, against 6,293 bushels last week, and 1,900 bushels at a like time in 1881. The supply has been moderate and the demand fair. Prices continue firm, with sales of choice western throughout the week at 46c. and 47c. on track. Eastern are worth a cent less. Barley. - Stocks in store 70,764 bushels, against 30,754 bushels last week, and 163,929 bushels at a like time last year. Business has been quiet during the week, owing to small stocks and the lateness of the season. Prices have been maintained in consequence of cool weather, which is favourable to malting. Sales of No. 1 were made at 90c., No. 2 at 88c., No. 3 extra at 87c. The low grades are extremely scarce. Peas. - Stocks in store 9,228 bushels, as compared with 10,227 bushels last week, and 96,825 bushels at a like time in 1881. A few sales of No. 2 are reported at 84c. and 85c. The demand is good, and all offerings are readily taken. Rye. - Stocks in store 20,205 bushels, against 20,211 bushels last week, and 7,186 bushels at a like time in 1881. There has been a moderate demand, but no sales reported since Friday, when a number of cars sold at 85c. f.o.c. Corn. - No business reported, but prices are nominally easier, in sympathy with the west, at 89c. to 90c. CATTLE. - The receipts of cattle during the week were larger than usual, there being about 540 head. Most of these, however, came in the latter part of last week. Within the past few days few have offered, and prices remain firm. The export demand is good, with sales of a few head at 5 1/2 to 6c. per lb. The best butchers' cattle are worth 5 to 5 1/2c., and inferior to good bring from 3 1/2 to 4c. Sheep are scarce and firm, with a few sales at 5 to 6c. per lb. Lambs are in moderate demand, with few offerings, and prices firm at 6 1/2 to 7c. per lb. Spring lambs bring \$4.50 to \$6 a head. Calves in fair supply and steady; first-class, \$12 to \$15; second-class, \$8 to \$10; third-class, \$5 to \$7 a head. Hogs firm at 6 1/2 to 7c. per lb; receipts small. CLOVER SEED. - There is a moderate jobbing trade, and prices are firm at \$5.15 to \$5.25 per bushel. Timothy is in fair demand in a jobbing way at \$3.15 to \$3.30. FLOUR AND MEAL. - Flour - Stocks in store 7,825 barrels, against 5,788 bbls. last week, and 9,546 at a like time last year. There has been some movement this week at higher prices but at the close values are easier. Sales of some very choice brands of superior extra were made on Monday at \$6.25 to \$6.30, and of an ordinary brand at \$6.10. Yesterday old standard superiors offered at \$6.10, but they would not have brought over \$6. Extra sold at \$5.90. Other grades are purely nominal, there being no demand for them. Bran is not in such active demand as last week, and prices are easier; sales were made on Saturday at \$20, and on Wednesday at \$19. Oatmeal is firmer on account of limited offerings; a car sold on Tuesday at \$4.77 1/2 on track. Cornmeal quiet, with business confined to small lots at \$3.90 to \$4. PROVISIONS. - Trade has been quiet during the week. Butter continues firm for choice lots of new tub and rolls; tubs sold at 21 to 22c., and pound rolls at 25c. Old stock is very dull, and prices easy at 13 to 17c. for medium in boxed lots, and 10c. for culls. Cheese is in moderate demand and steady at 13 to 13 1/2c. for the best, which is in small stock; ordinary qualities 12c.; new will offer shortly. Dried Apples dull, without sales; loose lots offer at 6 1/2c., and barrelled at 6 1/2 to 7c. per lb. Eggs in good demand and slightly firmer the past two days; dealers pay 14c. and sell at 15c.

per dozen in case lots. Bacon is quiet and steady in a jobbing way at 11 1/2c. for long clear; a round lot of Cumberland out sold at equal to 10 1/2c. and 100 sides at 10 1/2c.; jobbing lots sell at 10 1/2 to 10 3/4c. Holes are firm at 12 1/2 to 13c., and bellies at 13 1/2 to 14c. Hams sell in small lots at 13 1/2c., and car lots of smoked held at 18c., pickled, 12c. Mess Pork firm, at \$21 50 to \$22 - the latter for small lots. Lard firm, at 14c. for tierces and at 14 1/2c. for pails. American refined sells at 15c. Dressed Hogs firmer on the open market, at \$9.25 to \$9.75.

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