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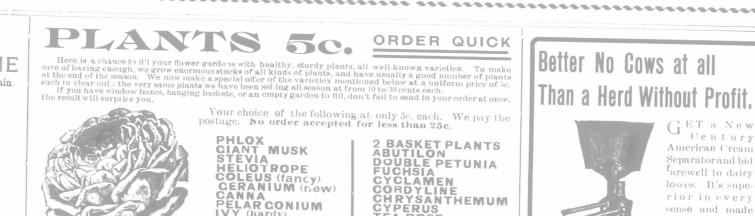
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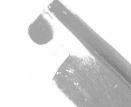
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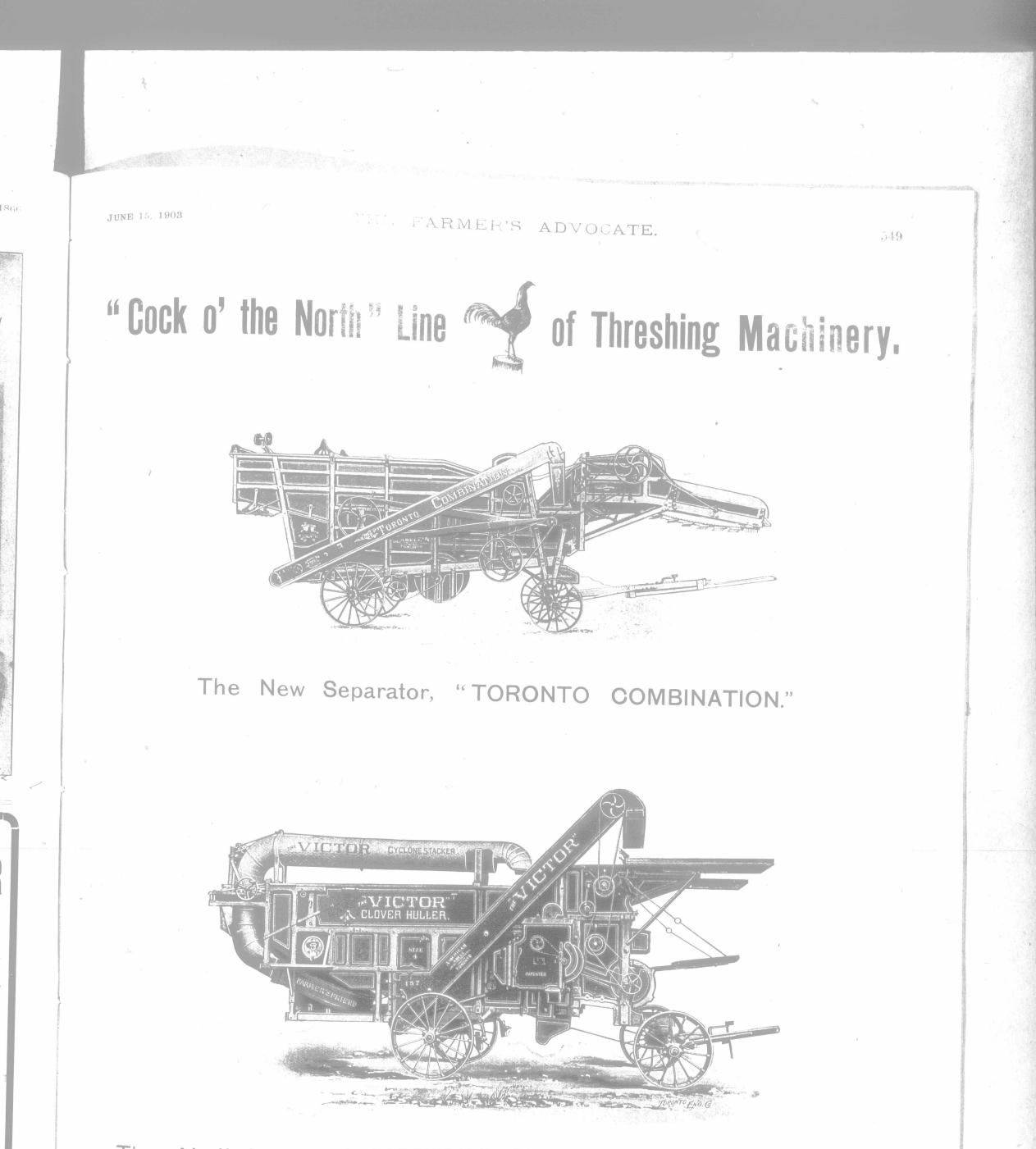
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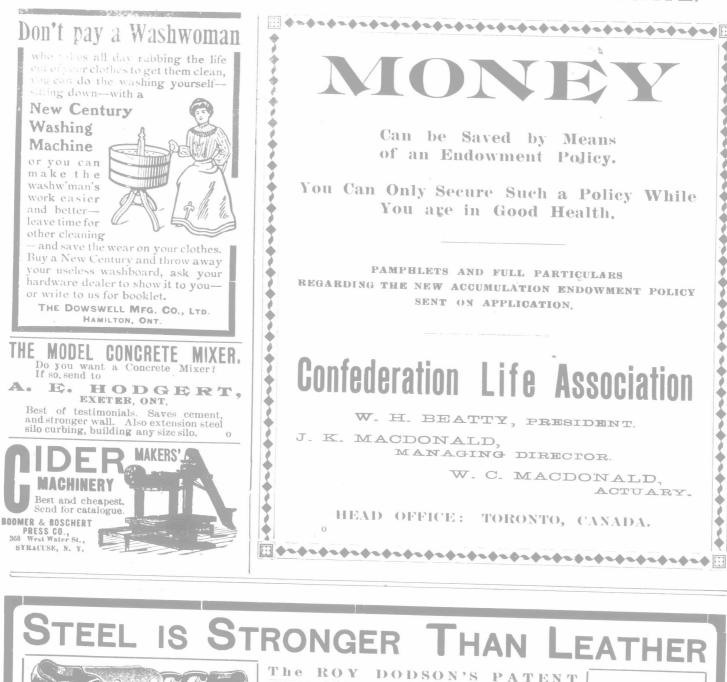


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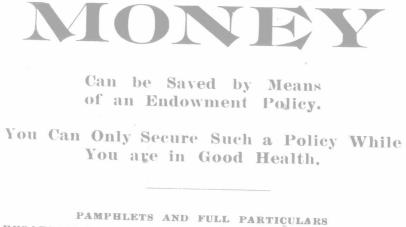
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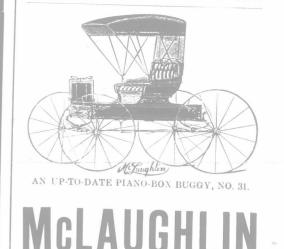
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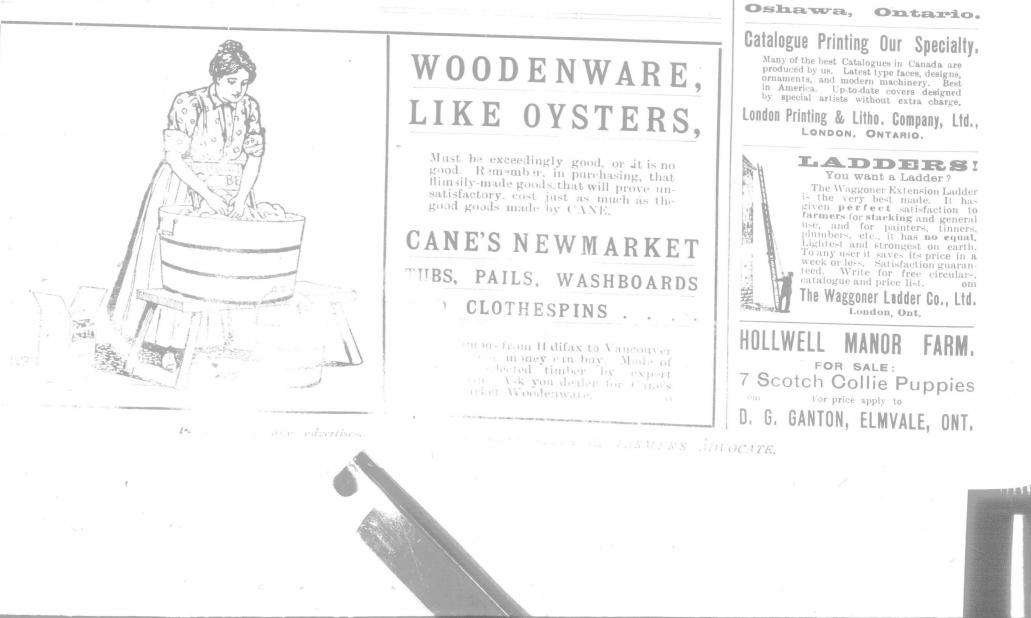




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No. 576

LONDON, ONT., AND WINNIPEG, MAN., JUNE 15, 1903. EDITORIAL.

Milk Fever.

of the country have been lost to farmers through the mysterious malady known as milk fever, or parturient apoplexy. We say mysterious, for the reason that though many apparently plausible theories have in the past been advanced by veterinarians and others as to the origin, nature and effect of the disease, observation has but tended to cast doubt and distrust upon them all, while the medicinal remedies prescribed and treatment practiced, though various and voluminous, have failed in a majority of cases to effect a cure. Indeed, in many instances medicines have precipitated fatality through being administered in a tics of milk fever. The emptying of the udder faulty manner, owing to ignorance or forgetful- (milking out) of the colostrum would seem to ness of the fact that paralysis of the tongue in have some effect upon the blood and nerve sysmany cases occurs at an early stage of the disease, depriving the animal of the power to swallow, in consequence of which the dose often found its way into the trachea and lungs, causing suffo- the true pathology of the case, the sudden and cation, and, frequently, sudden death. This diffi- complete withdrawal of the first milk is apparculty has been overcome by the use of a tube ently not nature's way of treating either the cow passed down the gullet, through which the medi- or the calf for promoting the initial life functions cine was poured into the stomach; but even with of which it is specially designed. this improvement the percentage of recoveries under 'any system of medicinal treatment was far a prominent dairyman who had visited the Island too small to warrant the treatment being termed of Jersey last year, and who stated that he found successful. The discovery a few years ago of that several of the leading owners of deep-milking what is known as the Schmidt treatment, con- cows on the Island had ceased to fear milk fever, sisting of the injection through the teats into and that the secret was that they had ceased to the udder of a solution of iodide of potassium, milk the cows out clean for the first three days was a very important improvement, and this after calving. It can, at least, be said for this treatment when used with caution and cleanli- theory that it is nature's way when left to herness has proved very successful, recovery being in self, the calf relieving the dam's udder by taking a large majority of cases comparatively rapid little and often, until it becomes capable of takand fairly complete, though in some cases it has ing all her milk, and so far as our observation been followed by udder troubles. This discovery has gone we have yet to learn that milk fever was regarded by advanced veterinarians as sup- often occurs in the case of rang porting the opinion that the malady was either where the calves are nursed and the cows only an udder ailment or a nervous affection, which partially milked at first. The fact that the could best be coped with by treatment through filling of the udder with gas has given almost the udder and mammary glands, and hence the instant relief in the worst cases of parturient discovery, by a French veterinarian, of the oxygen apoplexy seems to support the foregoing theory cure described on page 109 of the "Farmer's suggested regarding the disease, and it is con-Advocate " for this year, Feb. 2nd issue, and firmed by the recent statement of a British agriagain on page 510, June 1st issue, consisting of cultural journal, that several continental vetthe injection of pure oxygen into the udder, and erinarians in the treatment of the disease have which in the hands of Drs. Tennent & Barnes, of been employing injections of ordinary air into London, Ontario, has proved so completely suc- the udder with remarkable results, one having cessful that in every one of the eight cases in used it in 150 cases without a single failure, which they have used it, up to this date, recovery while another had used it in 34 cases, and in has been complete, and in nearly every instance every case with successful results. If we accept within an hour after the administering of the the pure oxygen treatment as efficient, it is not the mouth. The "Farmer's Advocate," from later alleged discovery, since ordinary air is personal observation of the treatment by Drs. known to be composed of over twenty per cent. Tenarcht & Barnes, can vouch for its marvellous of oxygen. While we are not without faith in and apparently magical efficiency as a quick and the simple remedy last named, we would not adlaborious, complicated and unsatisfactory methods the meantime, as this has been proven to be safe, approxity to be, we cherish the hope that the time pathology of the disease and the remedial action

as long standing have been. In every one of the recent cases treated by Drs. Tennent & Barnes as cited, the cows had been milked out and kept milked clean. It would seem that the emptying Millions of dollars' worth of the very best cows of the udder at that particular stage has something to do with precipitating or aggravating the disease.

> The cow's udder is not a hollow vessel, but a mass of gland structures, cells, ducts, blood vessels and nerwes. What actually takes place in the formation of milk is not clearly understood. The liquid secreted (colostrum) before and at the time of calving differs greatly from ordinary milk, but becomes normal in about three days. After calving, the large supplies of blood which have been nourishing the rapidly-growing calf are suddenly thrown on the cow's system, tending to occasion brain congestion and other characteristem at this particular juncture which the filling of the udder with oxygen or air appears to counteract. Whatever may yet be determined as

We quoted some months ago the words of difficult to go the further step and accept the plete cure, and a welcome relief from the vise going beyond the pure oxygen treatment in and at the same time comparatively inexpensive, Due satisfactory as the new oxygen treatment even though we may not yet understand the exact distant when preventive measures will be which takes place in the udder, or, rather, the way aned which will do away with the necessity in which nature herself is aided in that treatment the oxygen cure. The time-honored cus- to work out the cure. But if by the simple milking the cow's udder out clean imme- practice of partial milking prevention can be after calving, and keeping it milked out assured, we shall be delivered from the menace of ity as a preventive, would seem to be in a dreaded malady, a consummation certainly in heing discredited, as many others of superior to any remedial treatment.

Where Our Money is Kept.

The recent suspension of a leading stockbroking and investment house in Toronto, through a sudden and apparently uncalled-for depreciation in the value of certain stocks, is perhaps the natural termination of the period of buoyant speculation through which Canada has been passing. In haste to grow rich, people have been depending upon a rise in the market value of certain shares in which they have been investing, rather than upon their own productive efforts. It is probably well that such a lesson has been learned with so little real loss to the country as resulted from the Ames suspension. There is little doubt, however, that on this and similar occasions in the past, many men and women in moderate circumstances have been largely deprived of their means of subsistence through venturing into speculation. The care of money or the husbanding of one's resources is quite as important as the original earning or getting of it.

When a country is feeling the effects of commercial prosperity, considerable attention is given to its financial institutions. Almost everyone has heard that Canada's banking system is superior to that of almost any other country, This and the rate of interest, however, is about all the average person in the country knows about the banks. In Canada there are four classes of financial institutions with which one can deposit money to earn interest. They are, viz.: the Chartered Banks, of which there are thirty-three, many having numerous branches; the Post-office Savings Department; Loan and Savings Companies; and Private Banks. It is to the chartered bank people refer when they commend our banking institutions, and these are now practically as safe as any institution in this world can be.

The capital stock of these chartered banks is subscribed to by people from all parts of America and Britain who have money to invest, and a shareholder not only pays for his shares, but becoming a shareholder he becomes liable to the bank for the amount of his shares for the protection of depositors and circulating medium in case of the bank failing. This is called "the double liability " of the shareholders, and is the mainstay of our banking institutions. It obtains in all our chartered banks, with a single exception, in which case the bank holds an imperial charter, and by the Canadian Banking Act its circulation is limited to 75 per cent. of its paid-up capital_ Chartered banks, it is known, issue their own notes, but their circulation is limited to the amount of their paid-up capital stock, with the exception of the bank mentioned. In Canadian banking security is further assured by maintaining a reserve, which has averaged in the past about ten per cent. of the note circulation. Each bank by law is also obliged to keep in the hands of the Government a deposit equal to five per cent, of its average note circulation, for the security of note holders. This arrangement makes the management of every bank watchful of the movements of ports which every chartered bank must make to the Government are carefully studied by bank officials is evidence that there is a careful and critical watch kept on all bank transactions. In a Government statement some time ago, it was shown that on the average, banks had assets amounting to \$10.19 for every dollar of note circulation. Of course, chartered banks have failed in Canada, but these failures have but

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by the chartered banks, both of which are plenti-THE FARMER'S ADVOCATE fully supplied with money.

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stimulated governments and bank officials to maintain greater security.

Private banks should always be distinguished from chartered banks. Private banks cannot issue notes, they are not compelled to make any reports to the Government, their affairs are not made public, and the confidence that is reposed in them by depositors is wholly dependent upon the stated capital and a personal knowledge of the reputation and integrity of the management rather than upon actual security as furnished by chartered banks The long and disastrous record of failures in connection with private banks has greatly discredited these institutions, and has prompted frequent demands for some sort of Government regulation or supervision. The regular savings and loan companies include many of the most trusty monetary institutions of the country. They are to be carefully distinguished from the building and loan associations, such as those issuing terminating shares. and purporting to pay greater returns in interest than the savings companies undertake to do. They are authorized by law to take deposits to the extent of their unimpaired, paid-up capital, and are obliged to make sworn statements to the Provincial Government annually, showing amount of deposits, assets and liabilities. cash account, interest earned and list of shareholders, and other depaid, They are not allowed to loan tails. money on notes, but only on real security. The Post-office Savings Banks enjoy a position of unique confidence in the public mind, characteristic of the faith of the people in government institutions, 'as distinguished from others, or from purely political affairs, but chiefly for the reason that behind them as security stand the whole resources of the country. There are more formalities in depositing and withdrawing funds, and the amount deposited cannot exceed \$1,000 in one year, or three thousand dollars in the aggregate to any one depositor. The amount of interest allowed at the present time is only three per cent, which is about the same as paid

The unrestrained liberty allowed private concerns promising tempting rates of interest has induced secret methods of doing business and rash speculation in place of sound business methods, with unfortunate results. In view of the fact that at this time much money, representing the small earnings of artisans, farmers and others, is being deposited, one should consider well the character of and the inducements offered by the different institutions before de-

Agriculturists and the Agricultural College.

positing any considerable amount.

The number of students registered at the Ontario Agricultural College during the year 1902-3 was 653. This, of course, means a splendid growth for the college, but it is also significant of a sentiment throughout the country in favor of special training for the farmer, and also indicates that a certain class of young men from the country, who a few years ago were entering upon college courses in law, medicine and arts, are now turning their attention in the direction of agriculture. Mining, engineering and commercial schools are also experiencing the same growth as the agricultural colleges. It is the result of a desire to excel in the performance of productive work as contrasted with a professional career.

Associated with the change of purpose of the young men who are taking college courses is a change of attitude on the part of farmers toward agricultural education. Some few years ago it was quite in order in many quarters to ridicule anything pertaining to scientific agriculture. The word scientific had an antagonistic sound. The object in farming then was to gather from a prolific virgin soil the crops so lavishly produced without coaxing or cajoling. Every condition was fraught with nard labor, wherein main strength counted for more than knowledge or mental power. Conditions have changed : the object now is to wring from a much-abused mother-earth the means of sustenance for an ever-increasing family. Every device is employed to numor the soil to induce it to bring forth more liberally, and in this effort the careful student of nature who knows the reason for her many moods has much the advantage, other things being equal, of the man of less acquaintance with her conditions. Productions must be specialized, which calls into operation greater skill, and there are more obstacles to overcome requiring technical information than ever before. Farmers are realizing these facts, and, hence, the

signs, such as the increase of numbers at the Agricultural College, and an appreciation of the work of the college by the great mass of farmers throughout the land, is one of the most gratifying indications that farmers are determined to keep pace with the improvements in every other line of business operations, and that the college is doing that feature of the work of improvement that falls to its lot. There is an evidence of an ever-increasing community of interest between the farmer and the agricultural college. The former realizes the need of advanced methods, of intelligent study of its problems, and finds in the college the opportunities for that progress and study. The agricultural college clearly has a place in our national development, for in a country like ours there can be very little national growth without progress in agriculture. Civilization and agriculture have been defined as synonymous, standing for and, in a sense, meaning the same thing, since no civilization has ever risen higher than its agriculture. As our civilization is progressing, let us, then, see that our agriculture is characterized by intelligent development, and to this end let our support be given to the agricultural college. Students graduating in law and medicine were once congratulated upon the permanency of their occupations, the one being based upon dissension and the other upon dis e. Moth abiding evils. Graduates and practillopers in agriculture are none the less to be congratulated, as their occupation is just abiduir, but in no sense based upon evil, but rather mony its opposite

HORSES

Examination of Horses as to Soundness. (Continued.)

Having finished with the fore foot, it is good practice to get an assistant to hold the foot up in order to cause the horse to stand firmly on both hind feet. Look carefully along the floor of the abdomen and pelvis for umbilical or scrotal hernia or tumors. Then look carefully on the top line from the withers to the dock for abnormal conditions. Look carefully for symptoms of fistulous withers. Lift the tail and look for melanotic tumors (which occur especially in gray or cream-colored horses) and other abnormal conditions. Now proceed to examine the hind limb. Examine the stifle joint carefully. In cases where there is partial dislocation of the patella (stifle bone) there may not be noticeable defect in action at all times, but there will be an abnormal puffiness just below the joint. Look carefully on all surfaces of the limb down to the hock. We have now reached what is probably the most difficult part to examine. As before stated, the hock is liable to so many peculiarities of conformation, due to what may be called hyperdevelopment of one or more of the hones, or to the relation one part bears to another as regards angles, or to a normal looseness or puffiness of the joint, any or all of which may be undesirable and may predispose to unsoundness, at the same time do not constitute such. It must be remembered that undesirable conformation is not an unsoundness, even though it may be a predisposing cause. It is not the duty of the examiner to criticise the horse in this respect. So long as there be no actual deviation from the congenital condition, the horse must be pronounced sound, as it is seldom a colt has congenital unsoundness. In order that a man may be able to give a valuable opinion upon the soundness of a hock, he must be familiar with the various normal conformations, and there are cases in which the most expert has trouble in deciding whether or not disease exists. It is subject to many abnormalities, as bog spavin, thoroughpin, curb, capped hock, thickening of the tissues, either bony or soft, and to bone spavin. either visible or occult. The latter form of spavin causes no visible alteration in the joint, but causes lameness. In examining for bog spavin, we must be careful to not condemn a horse that is naturally slightly puffy or soft. Thoroughpins are tolerably easily detected, and a man is not likely to make a mistake here. In examining for curb we stand at the side of the horse and view the posterior border of the joint: here a mistake is liable to be made, a hyper-development of the cuboid bone gives the joint more or less the appearance of being curbed, but careful manipulation will decide. Where the apparent enlargement is due to development of bone, the condition is congenital and the enlargement is slightly lower and more to the outside of the limb than where curb exists, and is also harder student or graduate of the agricultural college is easily detected. If slight, it can usually be overnow seldom taunted with a reference to his looked, but if well marked should be considered as an unsoundness. Bone spav most serious diseases of the joint, and in many cases it is hard to determine whether or not it exists when it does not cause lameness. amining for this disease the hock must be viewed from all directions; the hocks must be carefully compared. There may be a roughness or hyperdevelopment of any part of the joint, and if this be in the seat of spavin it causes a person to suspect its presence. If a roughness or fullness be shown, we must look carefully at the other joint to see if a like roughness exists there: if so, we, in most cases, are safe in concluding that it is a normal conformation, but if one joint be smooth and the other rough, or a prominence exists in one joint and not in the other, our suspicions are necessarily increased. Of course there are cases in which both joints are involved, and we must not in all cases where we observe a similar roughness in both hocks, arrive at the conclusion that while rough they are sound. It is good practice to tie the tail up, so that it will not have below the hocks and interfere with the view. (In in front of the horse, stoop or kneel down and look backwards between the fore legs and observe the general conformation of the joint and compare it with its fellow. Then step to one side and view from an angle; then walk behind and to the side of the horse and view from that angle. Then go straight behind him If still suspicious, and especially if it he during the season that the hair is long, it is good practice to get a little water or snow and Lampen the hair on both joints so that it will te closely to the limb, and by careful manipulation and observation we will be able to more thoroughly examine and compare. If we are still suspleious, we will wait until we have finished our examination in the standing position. and then return to the hock of which we are inplators. Have the attendant lead the horse berward, and look carefully for lameness. To

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JUNE 15, 1903

make a more thorough test, it is well to lift the foot, flex the hock thoroughly, and then allow him to step forward. If spavin in which there exists inflammatory action be present, he will step lame and upon his toe for a couple of steps but a spavin in which inflammation has ceased may be present without causing lameness. Below the hock we look for unsoundnesses of the same nature as in the fore foot, viz., splint, ringbone, sidebone, and diseases of the feet. Sidebone is more rarely met with behind than before, and diseases of the hind feet are not nearly so common as of the fore. Knuckling, or partial dislocation of the fetlock joint, is frequently noticed and if well marked must be considered an unsoundness. When examining the feet, either fore or hind, it is necessary to observe whether they he of the same size and general conformation. If material difference in either size or conformation exists in a pair of feet, we become suspicious of existing or pre-existing disease, and must be very careful in arriving at a conclusion.

"WHIP." 1

Breaking the Colt.

Sewell Ford, in "Horses Nine," describes one way of breaking a colt to halter. Blue Blazes, the colt in the story, was owned by a Michigan farmer. He had been frightened by the first attempt to bridle him, and had broken away. He was promptly declared to be a vicious colt.

"We'll tame him !" said Farmer Perkins. Under his coat he hid a stout halter and a heavy bull whip. Then, holding a grain measure temptingly before him, he climbed the pasture fence.

In the measure were oats, which he rattled seductively. Also he called mildly and persuasively. Blue Blazes was suspicious. Four times he allowed the farmer to come almost within reaching distance, only to turn and bolt with a snort of alarm just at the crucial moment. At last he concluded that he must have just one taste of those oats.

" Come, coltie ! Nice coltie !" cooed the man in a strained but conciliating voice.

Blue Blazes planted himself for a sudden whirl. stretched his neck as far as possible, and worked his upper lip inquiringly. The smell of the oats lured him on. Hardly had he touched his nose to the grain before the measure was dropped, and he found himself roughly grabbed by the forelock. In a moment he saw the hated straps and ropes. Before he could break away the halter was around his neck and buckled firmly.

Farmer Perkins changed his tone. "Now, you ugly little brute, I've got you ! [Jerk.] Blast your wicked hide ! [Slash.] You will, will you ? [Yank.] I'll l'arn you !" [Slash.]

Man and colt were almost exhausted when the "lesson" was finished. It left Blue Blazes ridged with welts, trembling, fright sickened. Never again would he trust himself within reach of those men: no, not if they offered him a whole bushel of oats.

THE FARMER'S ADVOCATE.

STOCK.

Drugging Swine.

"So great is the fear of hog cholera in the mind of swine breeders that it has become the habitual practice," says Dr. A. S. Alexander in the Live-Stock Report, "to drug and dope hogs on 'general principles.' One would think that the hog was at all times, from the farrowing pen to the cool-

quality, done with the eyes open, but the drug ging of the hog is done against his will. Greedy by nature, he consumes food with avidity, and when quite hungry fails to notice the poison in the pot. But the drugs have their effect none the less, and not for good in most cases. It is simply impossible for benefit to follow the administration of the vile nostrums inflicted daily upon swine. "Shotgun" prescriptions are ever an evidence of ignorance. They are loaded up to kill a hidden and unknown foe, and like a dyna-

mite bomb intended for a tyrant, usually fail of their object. but deal dire destruction among the innocent.

" Taking it for granted that a herd of swine is of sound breed, fully and intelligently fed, without excessive use of corn or any other single food, properly housed, adequately exercised, allowed succulent and green foods, and sanitarily housed and yarded, what possible benefit can accrue from the daily infliction of a nauseating mess of drugs ? Does a healthy-begot man living in a sanitary en vironment, suitably sheltered, fed, clothed and exercised, need every day somebody's patent pestiferous pills to prevent consumption, prevalent in the hereditary-diseased family of a neighbor who transgresses all the tenets of cleanliness and hygiene. Assuredly not ! Nor do

Champion heavy-draft stallion, Calgary Spring Show. OWNED BY JOHN A. TURNER.

CHARMING PRINCE.

ing room, in imminent danger from insidious disease. Mayhap he is, but at the same time a properly bred, fed and managed hog, in our opinion, is quite likely to escape disease. Certain it is that the average drugging of swine is absurd and detrimental. The stomach of man or beast should never be made a drug store or apothecary's slop bucket. Healthy conditions cannot possibly endure in the presence of drugs galore, yet the hog's stomach, considered too weak to ward off disease germ invasion, is forsooth expected to be proof against the irritating and deleterious effects of alleged remedies both vegetable, mineral and past finding out. But the habit of taking "dope" grows upon the victim just as does the cocaine or morphine habit. Patent medicines tive of disease among swine contains the following else in the world with dire results not set down in published statistics. The habit of personal abuse of proprietary concoctions, brews and conglomerations may explain the unanimous belief in extending the like absurdity to, the animal kingdom. Evidently the matter has been given little intelligent consideration. Wholesale drugging of hogs has been practiced for generations, and the habit has been handed down from father to son without question or thought upon the part of the latter. What childlike faith there is in the mind of the man who buys a 'store bottle' with but a few visual contortions hiding the beaming smile of trustful hope ! This is wilful indulgence in drugs of unknown quantity and

swine of a sanitary environment need dope.

"And what are the drugs we are assailing ? Here is a formula daily used among swine by an extensive feeder : "We feed a mixture of either fine charcoal or soft slacked coal, screened, together with salt, unslacked lime, sal soda, mandrake root, garget root, saltpetre, ginger, bloodroot, copperas and pulverized sulphur.

"We cannot blame the hogs for 'hardly touching' the above heterogeneous collection of medicaments, nor can we blame the owner for furnishing such a 'shotgun' formula. We must excuses him when we remember that the 'government formula' used throughout the country as a preven-

Horse Sense.

Look at the padding of the horse collar and pads. See that there are no holes or lumps forming. In nine cases out of ten these start sore backs and shoulders, and once started they are hard to cure.

It is a grievous wrong to torture a horse with a headstall and bit that do not fit him. The of alleged medicine and drinks it down bravely draft animal, being naturally of a cool temper, has little to worry him in the performance of his daily work, provided his head and shoulders are reasonably comfortable and his driver human. See that the collar and bridle fit.

. . .

Think of the myriads of flies which pester your sweaty horses as they eat their noon-day meal. It is only the digested portion of a horse's food that can supply power. A tormented animal cannot digest his food equal to one in comfort, therefore, screen and darken the stable doors and windows and give the poor animals a chance to enjoy their rest and meals in peace.

. . .

We all know the yelling horseman. He is often a good man, and as a rule he is a hustler. His methods, however, if he observes any, are usually of an erratic nature. His horses are worked in rushes and spurts, and when he is not yelling "Get and !" he is screaming out "Whoa, steady !" His for sos are always in an excitable state, hard to mer use, and innocent of the first rudiments of train

ingredients : Wood charcoal, sulphur, sodium chloride, sodium bicarbonate, sodium hyposulphite, sodium sulphate and antimony sulphide.

"We knew years ago a big, strong, healthy appearing shepherd who fell into the habit of taking patent purgative pills. One did the work at first, but gradually the dose had to be increased to obtain the desired effect, until one night he took 'a whole jugful,' as his wife said, and woke up in that land where pills cease from troubling and the bowels are at rest.

"Moral.-The injudicious and indiscriminate use of drugs as preventives of disease may result in death !"



AGED CLYDESDALE WINNERS AT CALGARY SPRING SHOW.

Treatment of Parturient Apoplexy.

To the Editor "Farmer's Advocate

Sir,-I was very much interested in ...ading in your issue of June 1st the artic! by Messrs Tennent & Barnes, veterinaria ... which they give the results of several case oplexy (commonly called milk ver) treated by them by the injection of ox, sen into the udder We are usually rather sceptical when we read of such wonderful results from any special treatment for diseases that have baffled the skill of the most successful practitioners for generations, but when reports come from such reliable men as the above, we do not doubt their correctness. I have given the Schmidt treatment a fair trial, and while I have had fair success, I have not had a greater percentage of recoveries; in fact, not quite so great as by my former mode of treatment, and as occasionally udder trouble would follow, I have not been practicing it lately. You will probably remember that in an article in your journal some time ago, I stated that in my opinion the large percentage of recoveries following the Schmidt treatment was due to the fact that medicines were not administered by the mouth in the ordinary manner, and, hence, did not pass down the trachea to the lungs and cause suffocation. My experience with the disease has been that a large majority of the fatal cases is due to complications, and not to the primary The exact causes and nature of the disease have not been satisfactorily determined, hence a satisfactory explanation of the manner in which the different methods of treatment are followed by recoveries cannot be given. For instance, by the Schmidt treatment careful practitioners have had as high as 80 per cent. recoveries, while other practitioners have had as high, and some years a higher percentage from treatment upon an entirely different theory Hence, as stated, we are as yet to a great extent ignorant of the causes and nature of the disease How the oxygen acts when injected into the udder we cannot say, but if it will act in all or nearly all cases as surely and as rapidly as it has in the cases in which Messrs. Tennent & Barnes have used it, we certainly are justified in adopting this mode of treatment. The danger of udder trouble appears to be very slight, if it exists at all, and recovery takes place so quickly that it obviates the necessity of nursing and attention, which is necessary in most cases for 10 to 48 hours under former modes of treatment. I may say that I was very much impressed by the report mentioned, as I am well acquainted with Dr. Tennent and know that his report can be relied upon, and it is my intention to procure the means of giving the oxygen treatment a trial. I have had little of this trouble this year, which can, to a certain extent, be accounted for by the fact that I have instructed my patrons how to prevent the disease, but I am anxious to be in a position to treat with oxygen as soon as possible J. H. REED, V.S.

A Tribute to the Shorthorn.

In the course of the admirable article on Shorthorns and Shorthorn-breeding, which he contributed to the last issue of the Journal of the Department of Agriculture, Mr. Bruce, agricultural superintendent to the Royal Dublin Society, himself recognized as one of the L indges of a Shorthorn in the kingdom, pays a high tribute to the merits of the red, white and roans as general purpose cattle. In this connection he writes : It is well to consider for a moment what a good Shorthorn cow can do. She can, at or about two years of age, produce a calf and give a larger quantity of rich milk than any other general purpose pure-bred cow of the same age She can, under ordinary treatment, go on from year to year producing a valuable calf and milking deeply for nine or ten months out of the twelve. During the two months she is dry she can, under a sensible system of management. quickly set up condition to produce a healthy well-nurtured calf as the season comes round. After having eight, ten and even more calves, she is easily fattened to become a heavy carcas of good, useful beef. It is not, however, in a direct way that the value of the breed can be reckoned. Very few pedigree bullocks or heifers find their way into our fat markets as beef cattle, nor do we find dairymen to any extent owning pedigree cows. While this is so, the best and most profitable dairy, store and fat cattle are either the product of Shorthorn sires or are bred from dams owing much of their excellence to the amount of Shorthorn blood in their veins. Dairymen do not trouble about herdbook or pedigree cows : they look for animals to give the largest return of milk for the value of food consumed, and what do we find ' In the dairies supplying all our great cities the Shorthorn cross-bred cow is the uni versal favorite. Seatiment counts as nothing with such martical men ; with them ownership of mply a matter of pounds, shillings and

The Balky Horse.

The balky horse has found a champion in Miss Mabel Alva Messenger, who has been conducting an individual crusade in behalf of this muchabused animal.

Don't beat the horse. That is Miss Messenger's first bit of advice, given in the Chicago Tribune. He may have a sort of equine reason back of his conduct. Then her remedy is of the simplest. David Harum had an amusing remedy. but it required patience. He, it will be remembered, tied the animal so that it could not move when it wanted to, and his patience exceeded that of the balky horse

Miss Messenger's remedy takes just a minute. She simply lifts one of the horse's front hoofs. holds it up for a minute, and when she has dropped it the horse has lost his stubbornness. The plan has never failed, she asserts. Explaining her crusade, Miss Messenger says :

It is well to remember that it always makes matters worse to ill-treat a horse at any time, and it is usually futile to try to lead the balker, as that will cause him to rear, breaking the har-The simple remedy is to hold the ness, etc. horse's front foot up for some time, being careful not to jerk the lines or wield the whipnothing to remind him of his mad conduct.

After the foot has been held up, say for about a minute, urge him gently, and he will start off as though nothing had happened. I have never known it to fail. The theory is that the horse can think of but one thing at a time, and in holding his foot up his mind is taken from his balking and he forgets all about it, probably for months to come.

Dr. Rutherford's View.

To the Editor "Farmer's Advocate"

Gentlemen,-Re the account given in the "Farmer's Advocate" of June 1st, of a series of cases of milk fever treated by Messrs. Tennent & Barnes, of London, Ont., by the injection of oxygen into the udder, I am very glad indeed to note the success which has attended their enterprise in introducing to Canada this new method of treatment, which, on the highest authority, is now considered a decided improvement on sthe original methods introduced by Dr. Schmidt. You have probably observed that Schmidt himself has for some considerable time been introducing large quantities of filtered air after small injections of the ordinary solution of potassium iodide. With this treatment he recommends subcutaneous injections of caffeine. My own opinion of milk fever is that prevention is infinitely better than cure, and much more easy; but in view of the still frequent occurrence of the disease, the experiments noted by you are likely to prove of very great benefit to many owners of valuable cows. In the present stage of veterinary knowledge regarding the pathology of milk fever, it would be presumption on my part to advance any theories as to the difference in the action of oxygen and iodide of potassium in this treatment. J. G. RUTHERFORD. Chief Veterinary Inspector

Ottawa, June 2nd, 1903.

Hogs on Alfalfa.

According to the Kansas Experiment Station of \$21.10 per acce in ninety days as pasture for hogs. Rape proved less valuable, but hogs on each of the crops in addition to grain made far better gains and at a less cost than those fed on grain alone. The hogs on the green feed were quite contented, but those fed on grain and water appeared to be hankering after some kind of green fodder. The results of the Kansas experiment emphasize the importance of providing some kind of green crop for the hogs. In cases where red clover or alfalfa cannot be had, rape sown at any time from early spring until August will furnish excellent pasture for all classes of stock.

FOUNDED 1866

Our Scottish Letter.

May has been a month fruitful in agricultural news. The death of Mr. Hanbury in the height of his popularity as Minister of Agriculture has been a hard discipline. Nr. Hanbury was easily the best minister we have yet had, and in appointing his successor, Mr. Balfour has broken away from a good precedent. He has choses him from the ranks of the peers. There is no innate disability in a peer because he is a peer and the Earl of Onslow is quite a respectable member of the class. He has filled high office in the colonies, and is said to have done good serv ice as an Under Secretary ; but for an office like the Board of Agriculture, it is folly to suppose that a member of the Upper House can be at all as efficient as a member of the House of Coumons. Lord Onslow may surmount his handicap, but in my opinion a President of the Board of Agriculture would be more powerful if in the 'House of Commons, without a seat in the cabinet, than in the House of Lords with a seat in the cabinet. Lord Onslow has retained for his use during the sitting of Parliament a room in the corridor of the House of Commons, in which Mr. Hanbury received and was interviewed by his rural clients. By doing this Lord Onslow breaks through an ancient precedent. It is well. There are many precedents which merit being broken through.

Ayrshire exportation has been very active. I cannot remember whether in last letter I referred to the very valuable shipment made in April by Mr. Boden for Mr. Reford, near Montreal. If not, the high-class nature of this shipment may very well be commented on. The cattle were selected by Mr. Boden during a prolonged residence in this country. They were examined and tested in every way, and there is every reason to believe they will give satisfaction to their pur-Another very valuable shipment was made by Messrs. Hunter & Sons, Lachine Rapids, Montreal. These numbered 22 head, and one-half of the cattle were purchased from Mr. Robert Montgomerie, Lessnessock, Ochiltree. Mr. Montgomerie is a famous breeder. He has a good herd of high-class cows, and pays special attention to the milking qualities of his stock. Quite a large proportion of the animals shipped by Messrs. Hunter were bred by him and got by his noted stock bull. Rare Style of Saturland. This was one of the best bulls of his time in the showyard ; he has also been a most successful breeding bull, and Mr. Hunter has got away quite a large number of the pick of Mr. Montgomerie's stirks. The kind of animals bought by our Canadian friends does much to help those in this country who are insisting on the milking qualities of the cattle being carefully considered. A method of testing cattle for quantity and quality of milk has been inaugurated by the Highland and Agricultural Society, which subsidizes the local efforts. Much that is done in Canada by the Government departments is here done by voluntary associations. While there is a deal to be said in favor of Government help, much more may be said in commendation of the Scottish system of helping ourselves. If Governments would give grants to foster dairying progress it would be well, but little can be done effectively to promote agriculture by the direct interference of Governments, except to subsidize. Government inter-

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The Western Steer Experiment.

The steers that were brought from the West last fall to be finished for export in Ontario bave last been sent to the shambles. Although the latter part of the time of feeding was fairly well employed in making gains, the whole experiment was not altogether encouraging. The individual gains ranged about two hundred pounds for the six months' feeding. Some of those in the lots proved to be exceptionally poor feeders, and should never have been selected for such purposes. Out of the twelve head fed by Major Hood, only eight were at all suitable for the pur cattle and says that in future he will buy Or natio-bred steers for his feed lots, until the spin-

Badness" is not the only contagious of in man's nature. One individual of a ha tempered mind can create a sunny atmosphere f. many lives. Goodness is contagious : then your influence in spreading it.

live-stock breeding in this country. No Government institution, however grandmotherly its oversight, could produce such results as have been produced by the unfettered exercise of individual idiosyncrasies on the part of breeders

Mr. Robert Bruce, of the Royal Dublin Society, has published a splendid essay on Shorthorn breading In it there is a fine account of the breed in this country during the past half century, and for a longer period. It will surprise many to learn that there has been an increase in the cattle population of this country of not less than 22 per cent, during the period from 1870 1902. The decay of arable farming. especially of wheat-growing, has led to a great extension in stock-breeding. A temporary check, in vise of this broad fact, may be viewed with equationity. The whole trend is in favor of extension in cattle breeding, while there is a dis-tinct destegse in the sheep population, and this is comment all over Europe. In Scotland, cattle have increased more than twelve per cent. during the thirts venue ; sheep have receded in numbers. but l'encou say in what proportion. Whatever it be, it is emious to find this falling-off in the dreep potentiation so general. But to return to Mr. Bruce is doubtless quite all his views about these cattle. see the subject first from the record of the and shows how the three great modern Booths. Bates and Cruickshanks, all d to the great principle of line breeding and They wrought with and duplicated enouple was ever the same. Cruickshank the first secured outstanding recogniterx slawly, and in Ireland they are

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only now becoming known. Mr. Bruce's paper is an able defence of the work of the Quarker, and the upshot will very likely be a great extension of Shorthorn breeding in Ireland.

Clydesdale buyers from Canada have been an nouncing their arrival lately. The best horse are being enquired about, but some buyers will require to have patience and wait until the horses come off their seasons. There is every prospect of quite a fair trade. The various oners are from different parts, but there is no doubt of their determination to get good horses. We have also Germans and Russians buying, and I may mention as showing the activity in the market that already Messrs. A. & W. Montgomery have hired their well-known horse, Up to Time 10475, for season 1904 to the Stirling district. The horse is there for the present season, and must have made an excellent beginning to his work, and the pleasing well. He has always been a favorite horse; he has size and weight, as well as quality, and is the kind of horse wanted in these times for all kinds of countries. In connection with horses, we have again had a big Hackney and Pony sale at Warrington. The average for 13 ponies and cobs was £65 13s. 4d. and the average for 33 Hackneys, mostly all broken to work, was £110 9s. 6d.

The threatened repeal of the Corn Registration Duty, after one year's imposition, has excited widespread discontent. It is impossible to understand the ground on which the Government has proceeded in this matter. The Chancellor of the Exchequer has cynically acknowledged that it is a tax which easily lends itself to misrepresentation. I do not know a single act of legislation which could not be cast aside on the same ground. Whether the Government mean on that account to repeal everything remains to be seen. Meantime, Mr. Chaplin has led a strong agricultural and county revolt against the Government. There is a lack of leadership in the Government as at present constituted, and a peculiar tendency to let things drift. The idea seems to be that we will muddle through somehow. That remains to be seen. 'SCOTLAND YET."

Printer's "Pi."

Compositors, though in these days generally commendably correct in their work, sometimes unintentionally make a ridiculous rendering of copy by mixing the types, or by the transposition of the lines. The prize mess of the English press in this line was that made by a provincial weekly in describing, simultaneously, though of course inadvertently, the presentation of a gold-headed cane to one Doctor Mudge, and the operation of a patent pig-killing and sausage-making machine then on exhibition in the village.

"Several of the Rev. Dr. Mudge's friends," so ran the story, " called upon him yesterday, and after a conversation the unsuspecting pig was seized by the hind leg and slid along a beam until he reached the hot-water tank. His friends explained the object of their visit, and presented him with a very handsome gold-headed butcher, who grabbed him by the tail, swung him round, of working as is the ordinary peddler certainly cut his throat from ear to ear, and in less than is not in need of charity contributions. In many a minute the carcass was in the water. Thereupon he came forward, and said that there were buy simply to get rid of them. times when the feelings overpowered one, and for that reason he would not attempt to do more evil, for evil it is. One is to positively refuse than thank those around him, for the manner in which such a huge animal was cut into fragments price of his license out of his reach. In order was simply astonishing. The Doctor concluded his remarks, when the machine seized him, and in these measures are necessary. less time than it takes to write it the pig was county officials exercise the right to license pedcut into fragments and worked up into delicious by the Doctor's friends as one of the most delightful of their lives. The best pieces can be procured for twopence a pound, and we are sure is not the slightest doubt that it would result in that those who have sat so long under his ministry will rejoice that he has been treated so hand- people, and would divert a few at least to other somely.

THE FARMER'S ADVOCATE.

FARM.

Prohibit Peddling.

There is throughout the country a class of people whose industry and persistency are most remarkable, and would be highly commendable if exercised in productive effort. We allude now to pack peddlers. Conditions here seem to be suitable to the existence of this class, for it is obvious that if the peddler were discouraged, he would soon turn his attention to productive It is the people, then, who are respon-



RESIDENCE OF H. MALCOLM. Seven miles south of Birtle, Man.

sible for the peddler nuisance, for the people buy from him, and so encourage him in his vocation.

In times when labor was plentiful, the peddler was tolerated because everyone recognized how difficult it was to get work at some useful occupation, and we could not help but admire the determination and patience of the poor foreigner who tramped from house to house trying to provide a sustenance under most adverse circumstances. But conditions have changed, and men of all classes are now wanted for productive work. The cities want laborers, and the country wants men of all grades of skill, from the competent young Canadian to the most illiterate and improvident beet thinner. Work is offered to all, and there is no apology to be offered on the grounds of inexperience.

Another reason why the peddler should be discouraged is because his goods are of poor quality and of a relative high price, and are of that class upon which middlemen make most profit. There is nothing he sells that cannot be bought in the nearest village, unless it be his trashy jewellery, which is practically worthless, and when an obliging merchant carries a large stock of perishable goods, and goods upon which there is but little profit, he deserves the people's patronage on goods that give the handler a fair margin, such as the peddler handles.

People sometimes buy from a peddler merely to get rid of him, or out of charity, but buying once to get rid of him is simply giving him an invitation to come again, and a man as capable instances women are terrorized by these men, and There are two means of lessening the peddler to buy from him, and the other is to raise the to entirely abolish this nuisance, no doubt both At present the dlers, and the amount is determined according to The occasion will be long remembered the suitability of the county for the peddler busi-These licenses might easily be made prohibitive if people would insist upon it, and there the greatest good to the greatest number of helds, where help is much needed.

Cultivating Corn.

It is axiomatic that the yield of corn depends largely upon the cultivation it receives during growth. The cultivation of corn land properly begins the fall before the crop is sown. Land must be in good condition for corn, and then should get thorough cultivation after the crop is up. In the corn belt of the Central States many farmers give the land two harrowings just as the corn gets above the surface, and this is followed by continued cultivation with the corn cultivator until the crop is too high, when it is hilled up, or laid by, as they call it.

There is no necessity to explain how this continued cultivation forms a mulch to conserve moisture, or its action in liberating plant food. It is sufficient to say that in a dry season it does economize moisture, and moisture is the great need of crops in the average year to convey food to the plants, and in a wet season the cultivation tends to aid in evaporation of surface water and the prevention of baking. So then, whether the season be wet or dry let the corn be cultivated every week or ten days.

In cultivating corn there is a fine point to be observed in regard to the depth of running the teeth at different stages of growth. When the plant is quite young, before the roots have begun to spread, the teeth can be put down four or five inches or more without cutting off many of the small roots. This will provide a deep leeding ground for the plants, and will tend to make the roots strike deep. Later, as the network of roots begins to develop, the cultivation should be shallower to avoid pruning the roots and so injuring the crop.

These little details in connection with the crop may seem of very small importance, but it is by giving attention to such matters that the extra yields are secured after everything else has been done that can be done to encourage the growth of the crop. Intensive methods are the rule, and in cultivation they are best carried out.

Cocking Clover Preferred.

To the Editor "Farmer's Advocate":

In view of the number of articles that have appeared the last year or two in your excellent farm journal on handling the clover crop, it would almost seem unnecessary to publish more, but your list of readers is increasing. If the weather is favorable, I like to commence early to cut the clover, as soon as say one-third of the heads are turned brown. I never cut when the clover is wet, and seldom find it fit to rake the same day as cut, but next day as soon as dry and well wilted I start the rake, and quickly put up into good, large, well-built cocks. It is very important that the hay be thoroughly shaken up and mixed in putting up, as some of it may be quite green. Put the hay on evenly all round ; the loose hay on the outside should be raked off with the fork. When this is well done, and they have been up a few hours, we need not fear even a heavy rain. Last year the writer had considerable hay spoiled by a poor hand that threw it into small, ill-shaped piles that the rain went right through, while well-built ones were little injured. We may now let it stand for two or three days, or even longer, but I prefer to draw to barn when quite sappy. Last season we had to turn the piles over and spread an hour or two before drawing, which is a good plan any time. I have not tried the green-curing system, but one case I know of being tried last season was a failure. Last season may have been an exception, owing to the heavy rainfall and rank growth; the clover was more difficult to make into hay, which may have affected the green-cur-J. PICKERING. Peel Co.



PANORAMIC VIEW OF EDMONTON, ALTA.

Saving Clover Hay.

"Serious Losses on N. S. Farms."

In travelling about the Province of Nova Scotia, I am more and more astonished at the methods adopted by ninety per cent. of the farmors in caring for farmyard manure. It is amazing that after so much has been said and written upon this subject, farmers will completely ignore facts and common sense and go on in the same old way, wasting more than half of the fertilizing value that their supply of farmyard manure originally contained. Most of these farmers have heard it stated or have seen in print that the liquid manure of farm stock is worth per pound more than twice as much as the solids, yet on ninety per cent. of the farms in this Province this is almost entirely lost. Very few have basement cellars for the manure, so most of it is thrown outside, and often left where the rain from the roof is allowed to fall on it for several months before being hauled to the field, so about one-half of the fertilizing value is leached out before it is applied to the farm. But that is not the worst. In spite of the fact that they have been informed regarding the value of urine, not one stable floor in twenty is tight enough to prevent it from going through, and it either soaks into the ground or runs to the nearest brook and is entirely lost. So, here is two-thirds of his supply of fertilizer gone, and half of the other third by the leaching of the solids.

Now, Mr. Editor, these are serious facts, which are only too visible to anyone who cares to observe. The loss caused to farmers in this way is enormous. According to the census of 1901 there were in the Province of Nova Scotia about 400,000 head of farm stock, and according to the best authorities the manure from the average farm animal is worth at least \$20 per year, so that would make a total value of \$8,000,000 worth, but as stock is housed only about half of the year, that would cut the quantity down to about \$4,000,000 worth.

Now I have shown that in many cases not less than five-sixths of the fertilizing value of this manure is lost, but to be well within the mark we shall say that only one-half is wasted, and even then that would make a loss of no less than \$2,000,000 per year to the farmers of this Province. Is it any wonder that many of the farmers are poor ? What other business could exist with such management? Yet, after they do know how much they are losing, many take no steps to prevent this loss. I know of men who deliberately bore holes through the stable floor to prevent their cattle from floating, and then sell straw for \$3 per ton, instead of using it as an absorbent.

Now, with agricultural information almost free, there is no excuse for ignorance on this subject, and with absorbents so plentiful there is no excuse for this waste.

The first step towards reform, perhaps, is to repair the stable floors. Lumber is usually plentiful in this Province, and it would only cost a small sum to put in floors which, with a little calking, would be practically water-tight. Cement concrete floors would be still better. Then there are very few farmers in the Province but what have absorbents of some kind. Every farmer has more or less straw or coarse grass available. Then there is seaweed, sawdust, road-dust and swamp-mud, all good absorbents. There is an abundance of sawdust in many parts, and while it contains little fertilizing value in itself, if well dried is capable of absorbing a large amount of valuable urine thus proventi-But perhaps the most valuable absorbent is swamp mud, and there is an unlimited supply in this Province. Some tell me that they have tried it by spreading it on the field direct from the swamp, and declare that it does little or no good. Of course, applied in a sour state as it would then be, it would probably poison as many plants as it would improve, but if hauled up several months before using and allowed to dry, it is often worth from one to three dollars per ton, and if used as an absorbent in the stable, it is capable of soaking up urine of nearly the same value. What a store of wealth nature has thus provided, but very few farmers avail themselves of it ? They pay thousands of dollars every year to Boston firms for commercial fertilizers, and allow this almost unlimited supply of better fer-tilizer to lie dormant. "How long, oh Lord, how long," will such senseless waste continue? It is time that the farmers of Nova Scotia awoke to the fact that they must change their methods or always be poor. The choice is theirs. "BLUENOSE,"

In a special Farmers' Institute edition of the lowa Homestead, a number of practical farmers throughout the States discuss the different methods of curing clover for hay. While all the contributors are not unanimously in favor of "green curing," still the majority favor this method as compared with dry curing, the common practice in most parts of the States and Canada. The details of the green curing method are well enumerated by a contributor from Wisconsin. He says :

" The condition of the ground is about as important as the degree of heat and sunshine in making hay. Clover cut late in the afternoon, then teddered twice the next forenoon, can be put in the mow in the afternoon, if free from external moisture. Hay made in this way will not be like an overdone, unturned cake, but will have the color and fragrance that will please old Dobbin's eye and tempt her appetite. It is very important that hay full of juice be put in the mow (or stack) so it will settle even to exclude as much air as possible. The hay put in with the hay fork should be separated and spread over the mow evenly. The tedder, the side rake and the hay loader are doing much to help the hired man question, and reduce the risk of our hay spoiling after it is cut. The old way of cutting a while, stirring a while, then cocking a while, then waiting a good long while for it to heat and cure in the cock, will not do for the year 1903.'

Hay so handled was cut just as the blossoms began to turn brown. Another contributor, from Minnesota, says:

"Clover is by many dried and not properly cured. It can and should be put in the barn in n much greener state than any other hay. In fact, if one has a tight barn to store it in no harm would come to it if but nicely wilted; and, in fact, if it were not for the weight of handling I would say that this would be the proper way to take care of clover. If clover has a few hours sun and is moved with the tedder once to let the air through it, it is then in an ideal condition to put in the barn. Too much importance cannot be attached to the fact that it must not be handled with a particle of dew or rain on it. The juices in the clover itself will not cause any harm or make dirty hay. I have found this the best way to cure clover hay. Mow late in the afternoon, so that it will scarcely wilt before the dew begins to fall, and do not mow after the dew begins to fall. The next morning after the dew is off (if it is a good hay day) start the tedder and keep it going until noon, or until it has been moved twice, if there is time. Immediately after noon start the rake and follow up with the wagons, cocking up, of course, what cannot be drawn in that day, and this can be drawn in the next morning between nine o'clock and noon. But, again, do not touch it until the dew is off. In this way the wagons can be kept busy all of the time and very little exposed to bad weather at once. No harm will come to clover from dew or rain while it is in a green state, but after once dried, or partly dried, it becomes a great absorbent of moisture and even a foggy, damp day will make it unfit to handle."

It seems strange that when this ach general satisfaction wherever tried, it should not be more generally introduced, but the weight of green clover is objectionable in handling, and experience with partly-cured clover becoming musty tends to caution most people to be very careful of the condition of clover before it is housed. However, since, as is emphasized by those who practice this method, the external moisture does all the damage to musty clover, the method of green curing, giving strict attention to details, should be worthy of a very careful trial, as the advantages claimed for it are certainly obvious.

FOUNDED 1866

Country Life.

The return of the late spring and early summer months, with their birds and flowers, green fields and leafy trees, turn the thoughts of the city resident toward the country. If country born, he sees again with his mind's eye the brook with its grassy banks, along which he wandered when a boy, and hears again its mad rush as it dashes among the boulders down some sudden incline, its gentle purling as it reaches the smoother places, or the mere rippling as it flows through the broad meadows. Again the cool water flows over his bare feet, and the old straw hat is successfully used as a net to trap the quickly-darting minnows. The cattle stand knee deep in the quiet, shady reaches, dreamily chewing their cud ; the hills stretch away in the distance, and all nature wears its most inviting garb. He forgets the toil, the hardships, the privations of early life, or idealizes them as conducive to his present prosperity. All the bitter is cast aside; only the sweet remains vivid.

'He is dreaming a dream of the olden time,

- When life was smooth as the poet's rhyme,
- And his feet were bare and his cheeks were brown,
- And his heart was light as the eider down."

He awakens from his reverie with a sigh, and a determination to buy back the old homestead, or some other attractive place, and create for himself and wife and children and grandchildren a country home.

If city born, but of Anglo-Saxon stock, the land-hunger is born in him; and as the city grows, and more and more shuts out the country, the greater becomes the longing to possess in fee simple some portion of God's green earth for a country home. The city is well enough for winter while Nature sleeps; but while she is awake, and dressed in her handsomest robes, there is no place like the country.

Poisoning Ground-hogs.

Inquiries are reaching us for a good method of doing away with the ground-hog. This is one of our wild animals that flourishes best after the forest is cleared off and grain crops are grown. He did not disappear with the beaver and other wild animals when the woods were destroyed, but remained behind to become a nuisance. Every year considerable damage is done by numbers of these little pests, and even if none of the crop were injured, much inconvenience in cutting grain is caused by the mounds which they throw up. The simplest and most effective method we know of to destroy groung-hogs is the use of carbon bisulphide, an inflammable, poisonous liquid, that can be obtained at any drug store. When the liquid is exposed to the air it quickly vaporizes, and the gas is very destructive to animal life. The vapor is more than twice as heavy as air, so that when introduced to a ground-hog's burrow it naturally penetrates to the bottom of the hole, where the animals usually stay, and forces out the air, subsequently asphyxiating the groundhog. A good way to use the poison is to saturate a rag with it and lay it in the opening of the burrow, and from this the

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Cumberland County, N.S., May 30th, 1903.

Weeds in the summer-fallow should never be allowed to become large before being turned under Weed seeds of many varieties mature more than most people believe after-they are plowed, so that the wise plan is never to allow them to reach the flowering starse. The amount of moisture which a crop of wreds draws from the soil is simply enormous, and the root portion is strengthened, and in biconials and perennials new plants propagated, in averation to the amount of leaf surface. Always to a suber that leaves where sfraw is plentiful and where time will ere to plants what lungs are ... endmals.

A Profitable Use of Straw.

There are several uses to which straw that is left over from the winter's feeding can be put during the summer. It can be used for bedding. thrown in the yard to rot, kept over for another year, or mixed with the hay at having time. Where it is practicable the latter method has many things to commend it, and its only objection is that it requires time when little can be spared. By spreading straw in the hay mow in alternate layers with the hay, the feeding value of the straw is made almost equal to that of the hay, as it absorbs much of the volatile compounds given of by the hay in sweating, and also takes the sweet aroma of the hay that would otherwise pass away into the air. The straw also exercises a preservative effect upon hay that is not thoroughly dry., by absorbing much of the monotone that comes from it in sweating. It is a good what of increasing the bulk of good fodder. of productive utilizing straw, and should be tried perialt of spreading it in the hay mow.

bottom of the hole. In using carbon bisulphide, vapors sink to the it should always be remembered that it is very poisonous, and explosive if handled near a flame. It should be kept away from children and from lamps or stoves, but when used outside should cause no harm.

Curing of Clover Hay.

To the Editor "Farmer's Advocate":

Much interest has been manifested by farmers as to the best method of curing the clover crop, and not a few are rather sceptical as to the advisability of storing without much curing in the My own experience teaches me that, notwithstanding the occasional satisfactory results obtained from such a method, red clover should be cut when it is in full bloom, the foremost heads just beginning to turn brown. Cut in the morning, as soon as the dew is off; after a couple of hours' sun, start the tedder, then rake into windrows, and put it into medium-sized coils before develall. Allow the hay to sweat in the coil till the second or third day, then turn over the coils in good-sized forkfuls, and after an hour's stat and air, haul and store away? 'This treatment has given some of the finest clover hay I have ever even. It would be interesting to hear on the "green-curing" process durterson of 1902. I have tried it occasmall quantities, but cannot recommail ast year I had some alfalfa which " a bright day after the dew was off. the dow-fall, and stored from the coil : day, but it was not a success, and panion that such a system will never THOS. MCMILLAN.

Ventilating Houses.

When we build a house we like it to be as near perfect in every detail as we possibly can pasture. Some of the best crops we have seen make it with the means at hand. In planning a were sown as late as July first. A piece of sod house its suitability is judged largely by its con- land, or other fairly rich ground, plowed now and venience, appearance and cost. Convenience is made fine on the surface by the use of roller and the main consideration, and when we have a harrows will make a suitable preparation. It is satisfactory arrangement of rooms, ensuring a better to sow it in drills about two feet apart, good degree of comfort, we conclude we have a so that the horse-hoe may be used to keep down convenient house. But in looking over many weeds and hasten the growth of the crop. On such houses that have been built, apparently with clean, rich land a good crop may be had by sowthe above idea in mind, we have frequently found ing broadcast four or five pounds of seed per them with a musty, smoky or other unpleasant odor. Such houses cannot be called comfortable. Not only is the smell disagreeable, but its presence is indicative of very poor ventilation, hence unhealthful surroundings,

In summertime houses can easily be ventilated if their construction will permit. All that is necessary is to have an attic with large openings on all sides, and a large trapdoor in the floor. Then by leaving windows and doors open on the lower floors a current of air is carried through all the other rooms up to the attic, and out the windows there. Currents formed by an excessive rush of the air in any one direction, thus interfering with the proper ventilation, can be regulated by opening or closing doors or windows, as experience and observation may direct. In the wintertime ventilation is a more difficult problem. Fresh air cannot be admitted in very large quantities, and must be more economically used. Especially is this true of houses heated by furnace, hot water, or steam. Where the furnace is used the fresh air can be introduced through a duct leading from the cellar window, and ending under the furnace. The foul air under such an arrangement can be carried out by use of a grate in one or more of the central rooms of the house. A fire in a grate in houses is not alone a very pleasant arrangement, but is decidedly healthful. Where radiators are used, some other method of introducing fresh air and getting rid of foul air may be employed, but under any circumstance some provision should be made when building the house to have a serviceable system of ventilation. Elaborate and much more perfect plans of ventilation can be had, and would be much more satisfactory than those outlined, but it is hoped that at least this simple provision will be made in the new houses being built, and in many of those already erected and furnished.

Ripe Hay is Wasteful.

If there were not good reasons for cutting timothy just after it blooms, there would be no special effort to do the job then. The reasons are that after flowering the elements of nutrition begin to move from the leaves and stem and concentrate themselves in the seed and the cells in the stem through which plant food had been moving, and in which food had accumulated, begin to form woody walls to strengthen the stem so past year \$4,400 gross, from which he has a that it will be able to carry the weight of the change in the texture of the stem is accomplished by a chemical change in the materials forming the cell walls. The material in these cell walls in the green plant is easily digestible and highly nutritive, but in the ripe or matured stem they are comparatively indigestible and of little nutritive value, much of the nutriment having been transferred to the seeds. When it is remembered how easily seed shells out of timothy and that in the seed is concentrated a great proportion of the elements of animal nutrition, the importance of cutting the hay before the seed has begun to develop is fully appreciated.

THE FARMER'S ADVOCATE.

Sowing Rape.

It is not yet too late to sow rape for fall acre. In daills, two pounds is quite enough. The plants should be at least eight inches high before being pastured. The longer the growth and stronger the stalks the better feed it makes It is especially suitable for sheep, pigs and young cattle. Care should be observed not to turn stock upon it at first when hungry, or when the rape is wet with dew or rain, as there is danger of bloating, but when used to it animals may safely have the run of it in all kinds of weather No green feed will fatten sheep and young cattle so rapidly, and frost does not injure its feeding

Improving Locust Hedge.

I offer the following suggestion as to treatment of locust hedges that have not been plashed. In going through this County (Peel), one sees hundreds of rods of locust hedge that have been set out five or six years or more. While some that have been attended to have attained a good growth, only a small portion have been plashed, as the company seem to have stopped operations. We have 42 rods plashed and wired in the usual way, that promises to make a fairly good hedge in time. We also have six or eight rods that we tried to make serviceable by planting thickly and cutting back; in this we have failed. Last fall we had it trimmed, every side branch cut off, and cut to four feet in height. Now we have put on seven old barbed-wires we were glad to get rid of, the top wire being woven back and forth, the other put on one side and secured by small staples about one inch long, two or three in each tree. This has made a good, strong fence, with only one post at each end.

A Man Bigger than His Farm.

J. P.

There are two classes of farmers, says one of our exchanges : First, the man who is bigger every way than his farm. To such a man it doesn't make much difference how many acres he has, he runs the farm on close practical business principles and makes a profit. Second, the man whose farm is bigger than he is. No matter how many or how few acres he has, he doesn't run the farm ; the farm runs him. E. P. Snyder gives an account in the Ohio Farmer of a dairyman living near Toledo, who kept thirty-five Jersey cows on 100 acres of land and has made them earn the profit of \$2,200. He makes butter and sells it in Toledo at 25 cents in summer and 30 cents in weather and the British market, else unfortunate This is an extraordinary herd.

DAIRY

2007

British Dairy Market.

In view of the fact that Canada is anxious to bring her butter trade up to the position which her cheese trade occupies in the British market, the following table will be of interest to show our relative standing and the class of people with whom we shall have to compete in the struggle to capture the world's greatest market :

ANNUAL	IMPORTS OF	BUTTER	INTO THE I	NITED
	KINGDOM	, 1899 to	1902	

	d		
From	1900.	1901	1902
	Cwt.	Cwt.	Cwt.
Denmark	1,486,342	1,597,186	1,703,032
Russia*	209,738	378,452	489.091
France	322,048	311,601	414,141
Holland	282,805	298,912	393,261
Canada	138,313	215,588	285,765
Australasia	511,535	413,134	238,453
Sweden	196,041	180,212	191,591
U. S. A	56,046	150,126	54,458
Germany	36.042	26,983	26,418
Other countries	139,606	130,696	177,967

Total 3,378,516 3,702,890 3,974,177 *Russia was included in "other countries" previous to 1900.

ANNUAL IMPORTS OF CHEESE INTO THE UNITED KINGDOM 19

KINC	*DOM, 190	0 to	1 902.	
	1900		1901.	1902.
From	Cwt		Cwt.	Cwt.
Canada	1,511,8	872	1,547,739	1,709,566
U. S. A	680,	583	540,102	390.479
Holland	327,3	382	315,923	
Australasia		003	79,243	,
France		110	26,833	, , , =
Other countries	69,9	928	76,997	
Total	2,705,	878	2,586,837	2,546,384
Values.	£		£	£
Butter		5 19	9,297,396	20,527,934
Cheese	6,837,888		6,227,135	6,412,420
Margarine	2,464,825		2,556,679	2,569,453
Total	26,753,143	3 28	3,081,210	29,509,807

Danger in Shipping Green Cheese.

Among dealers in dairy products there is just a slight fear that the good prices ruling for Canadian cheese in the British market will suffer a slight fall with the advent of warm weather. It is claimed that cheese is being forwarded too green, but as long as the weather is cool the quality remains good enough to suit the market, but when higher temperatures prevail there is sure to be a deterioration in cheese that is forwarded in a very unripe condition. Last year's operations are responsible for much of the shipping of green cheese this season. Last summer makers and salesmen learned to ship cheese much earlier than had ever before been thought possible, and because of the prevailing cool weather no loss resulted. This year the practice still prevails, but without the advantage of low temperature from beginning to end. A close watch vill have

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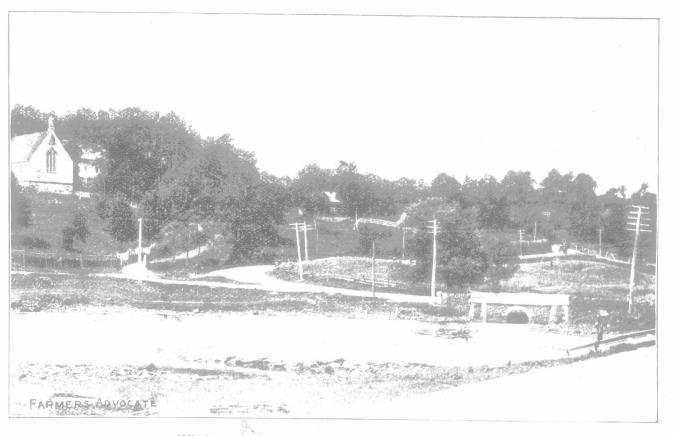
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Benefit of Cultivation.

In passing through the country at this season, the difference in the quality of the crops, resulting from a thorough and an insufficient preparation of the seed-bed, is plainly apparent. Where the cultivation has been good and the soil reduced to a fine tilth, the crops look healthy and prosperous in spite of dry weather, while on ground left in a rough and lumpy state the plants are few and far between, the bare clods showing plainly that there has been too much haste or not sufficient care exercised in making the seed-bed suitable for the best growth of the crop. It pays well in dollars and cents in this connection to do thi vell, besides the satisfaction of seeing an d prosperous-looking growth all over the Of course there are exceptional circumsuch as an unusually wet seed-time, fola protracted drouth, that on some soils the best of farming, but as a rule the It has been well put in on land that is in art will best endure the ordeal of a and will give a fair yield, even under ad-Ver. nditions.

winter. His cows, counting butter, skim milk results may develop in the cheese trade a condiand everything, earned him over \$125 each. tion that we as Canadians can ill afford at the present time.



HEAD OF NORTH-WEST ARM, HALIFAX, N. S.

Cooling Milk.

There are two ways of cooling milk that must be kept over night before being sent to the cheese factory. One is to give it a good stirring, and the other is to set the can in cold water. hest way, however, is to combine the two methods. The object of cooling milk is to prevent it souring, and souring is the result of the development of bacteria. Cooling milk by stirring it and exposing it to the air tends to prevent souring, but it also exposes the milk to the danger of being contaminated with bacteria, always present in the air, which cause bad flavors in the cheese. This fact emphasizes the importance of stirring the milk, where that process is necessary to cool it, in pure air. The air a few feet from the barn is generally the most heavily laden with germs, and, consequently, the milk should not be exposed any more than is necessary near the barn, but should be strained and otherwise handled some distance away, and in a place where currents of air do not carry contamination from the barn to the milk.

Cooling the milk with ice or water would be the better way, where ice or cold water could be had, as this exposes the milk less to contamina-In such cases sufficient stirring could be given to cool all parts of the milk as quickly as possible. Aerating might also be practiced where rape, turnips or other strong-smelling foods are given the cows, but the use of such foods is not to be commended. Stirring the milk for an hour or more just over the barnyard fence, or anywhere near the barnyard, cannot be too strongly condemned, as it adds to the cheesemaker's troubles and tends to injure the quality of all the cheese made at the factory, by carrying to it germs that cause bad flavors and pinholes in the finished product.

Starters Control Flavor.

A maker can more readily control the flavor by the use of starters. An example of this kind was shown at the National Buttermakers' contest. We find that John Sollie, of New Sweden, Minn., got an average score of 98.12. This was not brought about by chance, nor entirely by the good milk furnished by the patrons. This maker said that he carried as many as seven or eight starters during this contest. Here we find him selecting the kind of bacteria that produces the best flavor. A starter of any kind is only adding enormous quantity of a species of bacteria that we expect to predominate in the final product. This takes skill and hard work on the part of the maker. Starters of any kind are quite difficult to carry forward, as every detail must be attended to punctually. The maker must also have smell and taste well cultivated, so that he will be able to detect the slightest change or offflavor. He must also have some knowledge of the principles of hacteriology. A few years ago it was largely chance work for a maker to win two high scores in succession. Now we find makers who use pure cultures and have a knowledge of the scientific principles of cream ripening scoring high in most every contest.-[Ex.

GARDEN AND ORCHARD.

is in advance of the United States. It is evident over there that the new system has come to stay, although with them it may be only the richer and more extensive orchardists who will take it up at first. In Canada, however, it is quite practicable for a group of farmers owning 3,000 or 4,000 Arees among them to co-operate so as to have all their spraying done with a power outfit costing from \$250 to \$300.

Controlling the Moisture.

Someone has said that the best crop to grow in an orchard or fruit plantation is cultivators. "That is especially true this year, for it is seldom we experience such a dry spring, and the beginning of summer seems to bring no improvement in the situation. Now is the time moisture is needed. Trees and bushes and plants are now pushing their growth. Where fruit bearing has begun, an additional burden is imposed. In the absence of rain, we must do what we can to get moisture from the air, and hold what we have by means of the dust blanket or soil mulch, a frequent and shallow stirring of the surface soil. We cannot control the rainfall; irrigation is hardly practical here, and entirely out of the question over the parts where the land is rolling, but we can exercise a great deal of control over the moisture in the soil by frequent cultivation. It is the next best thing, and a means whereby we can do a great deal to counteract the effects of drouth. I believe the time is near at hand when we shall be doing this with our grain crops as well. The question of controlling the moisture is one of the biggest ones confronting the Ontario farmer to-day, as well as the fruit grower. We must use the cultivator.

The Ben Davis Apple.

Ask a man who is a commercial grower of apples, who grows and ships his own, and who has a good paying orchard, what variety has been the most profitable, and he will be almost sure to tell you the Ben Davis. Probably nineteen out of twenty growers will tell you the same thing. If this apple had the spicy flavor and quality of the Spy, it would be about as near the ideal apple as we could hope to attain. The good points about it are its early, regular and abundant bearing, and its good shipping and keeping qualities. Its greatest fault is its lack of quality, but it has some minor ones. Like all trees that bear early and heavily, it does not attain a large size, and in many localities is short-lived. It is subject to sun-scald and decay of the trunk. It cannot be classed as a strictly hardy tree; it may be classed as only half hardy in the northern sections. It has been planted more extensively during the last ten years than any other variety, and it is now a question whether it has not been overdone. No doubt the chief reason for its popularity in the past has been its splendid keeping and shipping qualities, ing it most profitable for export to the British markets. It nearly always lands in good condition, and the buyer knows it will keep in good condition and will not spoil before sold. But with improved methods of handling and transport of our best quality of apples, so that they can be laid down in distant markets in perfect condition, the Ben Davis must inevitably be discounted on account of its lack of flavor and quality. There is now another claimant for public favor, the Gano, closely akin to the Ben Davis, said to be a seedling of it. Being a comparatively new variety, it has not been extensively grown as yet. The tree closely resembles the Ben Davis in habit of growth and early bearing, but it is decidedly a better apple. It has also the keeping quality, in which it excels, and its qualities so far would indicate it as a safer one to plant than the Ben Davis. It would be well for intending planters to not plant heavily of the Ben Davis, or of apples of its class at present, but rather plant mostly some hardy sort for purposes of top grafting, and if after a few years it is found that the Ben Davis still retains its place as a paying commercial variety, it can be grafted on the hardy stock, and that is decidedly the best way of growing it. But it is not with apples of this class that our reputation as an apple-growing country is to be acquired and maintained. We must aim to produce something that has high quality to commend it, for it is quality that counts in all lines, and we have the soil and climatic conditions to do this, and we can do it : we can excel all other countries if we go about it in the right way. A reputation for high quality is, undoubtedly, the surest way to success, but whatever may be in the future of the industry, it cannot be denied that in the past the Ben Davis has been the most profitable commercial apple Vocato .. FOUNDED 1866

Fruit Packages.

The box is fast coming into popular favor as a suitable package for shipping apples in, as well as pears, and many shippers say that the barrel will soon be a thing of the past. However, it will be some time yet before the barrel will be entirely superseded. There are several points in favor of the box, and it is; undoubtedly, by far the best package for early and tender fruit; there is less bulk of the fruit together, and it is, therefore, much easier to keep it at a cool, even temperature. It has plenty of ventilation ; there is not as much pressure necessary to keep it tight ; it is a handy package to handle; it is square in shape, and utilizes the space on cars or on vessels to better advantage." If to be shipped in cold storage, the fruit can be cooled down to the necessary point very quickly, but it takes a long time to get a barrel cooled to the center. In price, there is little difference between the box and the barrel. The raw material has risen in price, so that a good barrel will cost about 35 cents laid down ; what is called the bushel box is laid down for about 12 cents or $12\frac{1}{2}$ cents. It takes three boxes to the barrel, so it will be seen that the difference in cost is very slight.

It is claimed that nothing but the very choicest fruit should be shipped in boxes, so that the fact of the fruit being in boxes would mean that it was of the very best quality, and that no second grade should be boxed. In British Columbia they use boxes almost entirely for shipping their fruit, and their second grade is shipped in boxes as well as the first, and where no barrels are used this must certainly be done, and it is hard to see how it can be avoided, or just why it should not be done, providing it is properly marked and branded as required by law.

There is as yet no standard fixed as to the size the box should be, and any and every kind and size is being used. Some use the bushel box, so called, holding about one-third of a barrel; others use what is called the 40-lb. box, holding about one-quarter of a barrel, and for extra fancy stuff, especially pears, which are wrapped in paper, a much smaller package, containing only about two or three dozen fruits. There is a difference of opinion among growers and shippers as to whether there should be a standard fixed, or whether everyone should continue to use the size that suited them best. In the St. Lawrence valley, in the neighborhood of Montreal, they are using what is called the Cochrane case, which is fitted with pasteboard squares like an egg case. These are used for choice specimens of Wealthy and Fameuse, and it has been highly profitable. The fruit must be of uniform size to fit the squares, and this matter of uniformity in size should be a cardinal point in packing fruit in all kinds of packages. It need not all be large, but the large specimens should be put together. smaller size can be put up, in which the only difference will be in size. In all other respects these should be as good as the first, clean and well colored; and these will often-in fact, in most ket as the largest ones; but good judgment must be used in the grading, as to uniformity, clean-The question of packages for fruit was discussed at the last annual meeting of the Ontario Fruit-growers' Association, at Walkerton, but there was such a diversity of opinion as to which was the best size of box to use, that no definite conclusion was arrived at. However, the matter will come up again, and if it is necessary to have a standard size for the barrel, and the size of the basket is fixed by statute, then we must have some definite standand for the box as well. They may be of different sizes like the baskets, so as to have a small package for very choice fruit for export, but buyers will want to know when they buy a box of

5.58

This is the month of flowers and trees, Of birds and butterflies and bees; Of velvet hills and starry skies, Of birds and bees and butterflies; Of days too full of joy for words, Of bees and butterflies and birds.

Power Spraying.

Mr. W. A. Mackinnon, Chief of the Fruit Division, recently attended the large meeting held at South Onondaga, N.Y., in the Hitchings orchard, which has become quite famous on account of the unusual methods of management prevailing there. About 300 people were present at the meeting to witness the spraying demonstrations, to examine the orchard and to study the system of cultivation which has made it such a success. The consensus of opinion among these practical orchardists was that power spraying was the only method suitable for large orchards, and that while individual fruit growers with small orchards might not find it profitable to purchase power outfits, yet by combining in the purchase and operation of the sprayer they could spray all their orchards much more economically than they could do it

In Delaware a few orchardists started-to use gasoline as a power, with the idea that one outfit would be sufficient for several farms, but they have such large orchards that they have found it profitable to purchase a power outfit for each. Fruit growers from that State seem to be delighted with the new method. When told that the Dominion Fruit Division was giving orchard demonstrations to show Canadian farmers the value of power sprayets, they were lavish in their complimentary references to the practical educational methods of the Dominion department. It was freely admitted that in such matters Canada

Fertilizer for Orchard.

Well-rotted barnyard manure is well suited for an apple orchard, as it not only supples humus, but also exertains nutritive elements for the development of the trees. It can be recommended for application in almost every case, more especially if the soft has been cropped continuously before the trees were planted. Next in value are wood asked, which will supply to a great extent the material for wood growth. Some authorities estimate that one ton of unleached wood askes is equal for value to five tons of ordinary barnyard materie. depending to some extent on the kind is word from which they are obtained. As they are reality preference to any other fertilizer. There is, that there is not another paper publeded of which there is not another paper publeded of which the spires sound teach-

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Summer Pruning.

Summer pruning of grapes and other fruits will soon need attention, and it is done with the finger and thumb. In the rase of grapes it is simply pinching out laterals that come out above the fruiting spurs, shortening in the ends of the leading canes and pinching off all surplus shoots that start up from the roots. 'The most popular way of training the grape is on the Fuller system, using three wires, one about 12 inches from the ground, one at the top of the trellis, about 41 feet from the ground, and the middle wire about half way between the two. The two main arms are tied to the bottom wire, and the canes grow from these to the top of the trellis. When they reach the top, they are stopped by pinching off the terminal shoots.

Raspherries and blackberries should be pinched when about $2\frac{1}{2}$ to 3 feet high. This stops the upward growth, and instead of a long, sprawling cane, you will have a stout, stocky one, with plenty of laterals, and it will carry its load of fruit-without bending over. If the laterals grow too long they should be pinched back before the end of the season. This summer pruning can be done rapidly and easily.

Where young apple or pear trees are being topworked to some other variety, they should be examined often during summer, and the suckers or sprouts that come out below the grafts rubled off after the grafts get a fair start, otherwise they will take the sap that should go to the graft to push it along.

Where a graft has failed to grow it is well to allow a number of the shoots that come out near the end to grow in order to keep the limb alive and healthy, and next spring it can be re-grafted by cutting it off a little farther back; the end where the cleft is being covered and protected with wax, a few sprouts allowed to grow, will be found quite healthy and fit for grafting again when the time comes to do it.

More Wasted Fertility.

Since writing the notes for the "Advocate," on "Ashes" and "Bones and Tankage," I have obtained figures showing the amount of manures imported. They are as follows:

TONS OF ASHES, BONES AND TANKAGE EXPORT-ED AND MANUFACTURED FERTIDIZERS

IMPORTED. Ex- Im-Ex- Imported, ported. ported, ported. Bones 2,457 Bone dust 2,560 3,494 Tankage, etc. 2,700 3,536 Manufactured manures.. 3,710 4.250Unmanufactured manures. Ashes 15,000

In the ashes, bones and tankage we are disposing of those substances which are our natural source of potash and phosphoric acid, two constituents of plant food which we cannot help but lose from the farm, even under the very best of management. Even these figures do not cover all the controllable loss of these fertilizers, for everyone knows that tons and tons of ashes and bones are wasted every year because no care is taken to save them. From the above figures it is evident that farmers and others are feeling the need of artificial manures of some kind, and yet last year nearly 2,500 tons of bones and over 3,000 tons of tankage were exported, and nearly 8,000 tons of manufactured manures, with their added cost of production and duty, were brought into the country to take their place. While no fault can he found with those who import and use these fertilizers intelligently, let us make use of our own cheaper raw materials and stop the wastes from the barnyard, the ash heap, the bone pile, etc., before we import the higher grades of fertilizers

THE FARMER'S ADVOCATE.

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POULTRY.

The Flock.

The weather during the past month has been all that could be desired for the growth of the young stock. Sunshine and outdoor life seem to be just as essential to the growth of poultry as good food. With conditions so favorable, there is every reason to hope that the market will be supplied when the great demand begins to be felt. Chickens and ducks hatched in June should make good material for the December and January trade, and even fancy stock hatched this late in the season, if well cared for, will be just in their bloom for the winter shows,

From now on is the time to note the progress of the flock. Things that develop long legs, long neck, narrow breast and the wind-splitting appearance throughout should be noted, and the parents that produce many such birds should be retired from active service. Utility is becoming more and more the aim of breeders. Select from the flock the blocky, short-legged, short-necked, broad-backed and sprightly pullet, especially if she comes of a good laying strain. Later in the season, if such pullets make up the bulk of the flock there should be a plentifui supply of eggs through the winter and some good sitting hens early next spring to bring along the new flock.

Chick from a Year-old Egg.

An English exchange publishes a letter from a Mr. Dare to Mr. K. B. Bagshot, Dè La Bere, in which the writer says: "I have just hatched a chicken from an egg which I preserved in your waterglass twelve months ago. I put the egg in the solution on the 15th April, 1902, and I set the egg on the 16th April of this year, and the chick was hatched last week—a nice bird and quite strong. I have had it photographed, and if you care to see it I will send you a copy."

utility lines rather than the development or famey qualities. The tune-colored turkey is so seldom seen that his future dress will be a reddish bud or light chestnut, rather than a pure but throughout.

The work of the scannittee will be submitted to the meeting of the Arranam Poultry Association next January on Feise and In the meantime, the report of the consister will be circulated, so that the recommendation analy be discussed.

APIARY.

The Month of June.

BY MORLEY PETTIT.

This month is mostly devoted to wrestling with the swarming impulse. colonies are, or should be, strong in bees, and have their brood chambers nearly full of brood. The extracting supers were put on all except weak hives during fruit bloom, and a certain amount of evening up of brood-that is, taking from the strong and giving to the weak-was done at that time. Clover, as a rule, begins to bloom about June 5th, and to yield honey freely a week to ten days later. Of course this season is an exception to the rule, as the "oldest inhabitant " cannot remember seeing white clover before on the 24th May. When white honey begins coming in freely enough so that the danger of starving is past, all dark honey should be removed from the hives. At the same time this is done, even up the brood again and spread it in the stronger hives by alternating with empty combs. & Put on comb honey supers. or, if working for extracted honey, put on as much super room as will be needed for the whole white honey Enlarge the entrances to their fullest excrop. tent (14x17 inches is none too large), and give ventilation at top of super, so that a current of

fresh air will pass right through the hive. Now if hives can be partly shaded and the brood-chambers are large enough to give full scope to the laying powers of the queen, swarming will he reduced to a minimum. the bees can be watched every day, the work of the rest of the month is to attend to what swarms come, and to give additional storeroom when needed. With out-apiaries, however, the brood chambers must be inspected once a week for indications of swarming ; i.e., for queen cells containing eggs or larvæ. New cellcups are present in most hives during summer, and are no indication of swarming unless occupied. When a colony has decided to swarm

A Maple Scale.

Enclosed you will find a small piece of branch of maple, cut from a young tree in the arbor of Mrs M. McMurray, Gladstone. The tree is quite thriby, and has made a large growth for the season but all the smaller branches are affected by this excrescence. Is it the egg deposit of some usect, or will it ultimately kill the tree?

Michillesex Co., Ont. A. A. BRODIE Are -This is one of the stages of Pulvinaria innumerabilis, the lecanium of the maple, or maple and is a close relative of the plum leca-Though called the maple scale, it is also on the grape and Virginia creeper. It needs treatment. The cottony mass on the twigs in the spring is a covering Ill, rusty brown eggs, which soon hatch y small larvæ. The larvæ soon insert iks into the tender bark of the twigs or and begin to sup the sap. As the insects in size their scale covering enlarges. te in the fall, and the females lay their he spring for a new brood. This spoalso been described as the lecanium

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ON (FRIENDLY TERMS, AT FRALEIGH FARM, BLOOMFIELD, ONT,

Poultry Standard Revision.

The committee of the American Poultry Association having charge of the work of revising the Standard of Perfection met in Buffalo on May 11th and went carefully over every page of the Standard. Several changes were made in wording, and in some cases the terminology is almost entirely new. Care was taken to develop the utility characteristics rather than the purely fancy points. The Leghorns suffered very little. except that in the future yellow shanks will be the correct thing. Some precaution was taken to prevent the Brahmas becoming too much like the Cochins in shape. The Orpingtons, Dorkings and Red Caps were all grouped into the English class, and the descriptions of these made to conform more to the English standard. The committee recommended that in the future the color of Barred Rocks be described as follows

"Shaded black and very light bluish gray. Each feather barred across with parallel bars, the two colors being equally divided except the last bar at tip of feather, which should be black, and about one-half as wide as the bars next preceding. The black to stop short of a positive or metallic black, and be absolutely free from any times of brown or purple. The barring to extend along the entire length of the feathers in all sections of the bird. The black to be of such a stande that when the feathers are overlapped they respected along the effect."

Turkey: ducks and geese received considerable attention the object being to make the descriptures in the Standard tend to improvement along the only sure way to alter its determination is to remove all the brood. In doing this the bees are brushed or shaken from the combs, with this precaution, that a ny combs with valuable queen cells on them must not be shaken for fear of

destroying the young queen. In place of the brood give six or seven Langstroth frames (or their equivalent if other size is used), containing narrow starters, or wired sheets of foundation; fill out balance of brood chamber with dumnies. The brood that has been removed may be used for strengthening weak colonies, or it may be given a queen cell or laying queen, and enough bees to protect it, and be treated as a hive that has swarmed. This method is equivalent to that more fully described by Mr. J. L. Byer, on page 68.

Foundation Built in Super.

Worker combs suitable for brood rearing can be secured by giving full sheets of foundation in the extracting super during any good honey flow. But in doing this, a few general principles must be observed. First, bees do not start work in a super full of foundation so readily as though it contained some comb. Second, they do not build comb to any extent until forced to do so for lack of space, and a comb hauging mext a sheet of foundation will be believed over to the foundation before work on the latter will be begun. Third, the weight and heat of bees worksing on foundation is liable to cause it to stretch and after the size and shape of the cells so that they are unfit for breeding worker hoes.

An arrangement of the super in accordance with these rules, would be as follows: Place a few combs in the middle and fill up the outsides with foundation. Where comb and foundation

meet, insert a "foundation separator," which is just a thin dummy perforated to allow the bees to pass through it freely. This helps support the weight of the bees, and prevents the bulging of the combs. Plenty of upward ventilation and shade will keep down excessive heat in the hive Where the combs in the middle are filled and capped, extract them and move the partly-built foundation into the middle, filling up the outside with fresh sheets; but do not return any empty combs, as that would check comb building. Of course, using wired frames and Weed process foundation is a help to prevent the stretching ; but by this method common process foundation can be used without wiring, if the hives are given plenty of upward ventilation and a good large entrance.

Elsewhere in this issue appear announcements of really beautiful and useful premiums which may be obtained by sending new subscribers to the "Farmer's Advocate."

QUESTIONS AND ANSWERS.

Ist.—Questions asked by bona-fide subscribers to the "Farmer's Advocate" are answered in this department free.

2nd.—Our purpose is to give help in real difficulties; there fore, we reserve the right to discard enquiries not of general in terest, or which appear to be asked out of mere curiosity.

Srd.—Questions should be clearly stated and plainly written, on one side of the paper only, and must be accompanied by the full name and address of the writer, as a guarantee of good faith, though the name is not necessarily for publication.

4th,—In vcterinary questions, the symptoms especially must be fully and clearly stated, otherwise satisfactory replics cannot be given.

Veterinary.

[Answered by our Veterinary Editor.] BOG SPAVIN AND SPLINTS.

1. Five-year-old horse has had bog spavin since he was a foal. Would you advise blistering, and what makes a good blister?

2. Three-year-old has splints on both fore legs. A. E. G.

Ontario Co., Ont.

Ans.-1. It is not probable blistering will have much effect on a bog spavin of five years' standing, and if the horse is not lame you had better leave it alone. The standard blister is composed of about $1\frac{1}{2}$ drs. each, biniodide of mercury and cantharides, mixed with 2 ozs. vaseline.

2. If the colt be lame, blister with the above prescription. If not lame, let it alone, and the enlargements will to a great extent disappear in a year or two, probably in less time.

RETENTION OF AFTERBIRTH, AND LUMP JAW.

Fifteen out of fifty cows retained the afterbirth. Can a recurrence be prevented, or can a herd be rendered less liable to the accident? 2. Heifer has lump on jaw.

Northumberland Co., Ont.

Ans.-1. Retention of the afterbirth occurs under all conditions, and there is no way to prevent it more than good care and keeping the cows comfortable, and giving warm drinks after calving. Medicinal agents have practically no effect, and when the membranes are not expelled in at most 48 hours after calving, they should be removed by hand.

2. Give $1\frac{1}{2}$ drs. iodide of potash, night and morning, and gradually increase the dose until she refuses food or water, or slavers, or tears run from the eyes. appear cease giving the drug. Repeat treatment in a month if necessary.

BOG SPAVINS AND RINGBONES.

Colt sprained his hind legs in the winter and bog spavins appeared. He was very stiff. He also has a ringbone on each fore pastern. I have blistered both ailments and the bogs disappeared, but the other morning I found them as bad as ever. Give me a speedy and permanent cure for both ailments. H. A. Hastings Co., Ont.

Ans.-Where congenital predisposition to puffiness of the hock exists, as it apparently does in your colt, it is not possible to guarantee a cure. Repeated blistering, or the application of pressure and cold water, is the most approved treatment. Trusses made especially for the purpose can be purchased from dealers in veterinary instruments, but I have found repeated blistering the better. When once a disease like this exists in a joint there is always a liability of its recurrence. Get your veterinarian to fire and blister the ringhones. As blistering has already failed to effect a cure, there is little use in repeating it without firing. Of course no treatment will remove the enlargements; when lameness ceases we consider a

FATALITY IN COWS.

I lost two cows after delivery. The fœtuses were dead, and parturition was two weeks before full term. The cows were sick a day, and then I got a man to deliver. He said that I had not had them attended to soon enough, and that there was inflammation of the genital organs. They died two hours after delivery. W. C

Antigonishe Co., N.S.

cure has been effected.

Ans.-It is hard to say what caused the death of the foctuses. The cows doubtless were injured in some way, as by fighting, slipping, being run by dogs, etc., etc. Whatever the cause, it doubtless operated in exciting inflammation, as stated by the obstetrist you employed. You do not state whether this man was a veterinarian. If not, he may by unskillful operation have injured the parts. It is probable if you had employed a competent obstetrist in the early stages the cows would have lived, but when delivery is delayed too long after labor pains commence it usually results in the loss of both dam and offspring. Prompt and skillful assistance is necessary in these cases. The obstetrist is often blamed when he has done all that it is possible to do.

LAME COLT.

Colt, four weeks old, strong when born, began to wabble in its hind legs a week ago, and in three days it could not stand. It lies on its side all the time, except when trying to rise. S. II. Ontario Co., Ont.

Ans.-It is probable the colt will be either dead or better before you see this. If not, examine its legs, and if there be swelling, heat and tenderness in any of the joints, with a puffiness that indicates the presence of matter, you may conclude that it has joint ill, and you had better destroy it, as although you may succeed by careful nursing in saving its life, it will be a cripple If no symptoms of this kind are present, endeavor to ascertain where the soreness is, and apply camphorated liniment and nurse it well. I think it would be wise for you to call your veterinarian.

A PUFF ON THE HOCK.

I have a Hickney filly rising tw last fall on inside of hind leg, just at the bock joint, the skin being cut a little just below that round projecting bone at the upper part of the joint; now the part just around this projecting hone seems enlarged, and there is a slight puff just underneath it. What must I do to remove it? I must have it off if there is any such thing. Please prescribe. Should I exercise her. or should I keep her in her Box stall?

SECONDARY HEMORRHAGE FOLLOWING CAS-TRATION.

1. How do you account for horses bleeding some time after castration ? I once castrated a colt and applied clams. In a few hours he commenced to bleed from one cord. I applied another clam, but in a few hours more he bled again. I seared him then and he did well. Re-cently I used an emasculator, and had bleeding a few hours after the operation. In this case the wound was plugged, but internal bleeding caused death. A post mortem revealed the ends of arteries closed.

2. Can the cord be taken up after being severed from the testicle and let go? J. K. Ont.

Ans.-1. When clams are properly applied, or a good emasculator used, bleeding cannot take place through the severed ends of the arteries, and when secondary hemorrhage occurs it is due to a weakness or diseased condition of the vessels; the pressure of the blood ruptures the coats of the artery. If a fresh clam be applied or the cord again severed with the emasculator, the artery may or may not rupture again. Where repeated rupturing takes place, plugging and styptics must be used, and in some cases recovery follows, in others the bleeding continues, though the blood does not escape, and death goon follows.

2. In nfany cases it can, but in others the retraction of the cord is so great it cannot be taken up.

No other paper offers such a list of useful and attractive premiums for obtaining new subscribers as the "Farmer's Advocate." Read the announcement elsewhere in this issue.

Miscellaneous.

VALUE OF FERTILIZERS.

Would you kindly let me know what you think is the comparative fertilizing value of the following two fertilizers, as represented in the guaranteed analysis as I take it from their respective circulars, which I have received from the agents of the two companies which furnish these goods : First-Nitrogen, stated as ammonia.....

6.05 per cent. Soluble phosphoric acid ···· 0.95 ··· a Insoluble phosphoric acid...... 4.15

71°	Total			
rotar	phosphoric acid	14.87	ϵ_{i}	11
Potash Moistu	re	10.72 6.48		с. ст

Total phosphoria	3	to	.1	per	cent
Total phosphoric acid	10	to	12	. 14	4.4
phosphoric acid	11	4	1.75		
a canable phosphoric acid	0	1	4.25		
Stand (REC)	.4	to	5	1.1	1.1
Equiv. to sulphate potash				100	

7.40 to 9.25 What I would particularly like to know is what is meant by citric soluble phosphoric acid in the first, and what equiv. to sulphate potash in No. 2 is intended to mean. W. C. M.

P. E. I.

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QUESTIONS RE BREEDING.

1. Are stallions with large spots on their penises likely to produce foals with considerable white ?

2. Can the germ of a fertile mare be drawn from her womb with an impregnator and inserted into the womb of a barren mare with success ?

3. Is there a law against a travelling ridge

4. Explain the operation of what is commonly called "raking" a mare before breeding.

INQUIRER

W. R.

Ans.-1. Not necessarily. Stallions with white markings usually produce foals with like peculiar-

2. No.

3. No.

4. Wash the hand and arm, oil thoroughly with sweet oil, insert hand into vulva and pass through the vagina until the opening of the womb is reached. If this be closed, insert first one finger with a rotary motion, and when sufficiently dilated to allow two fingers to enter, the operation has been performed.

DRY, HARD HOOFS.

Six-year-old mare has hard, dry hoofs, and they do not grow fast. Would blistering and a run on pasture be beneficial? G. C. D. York Co., Ont.

Ans .- The best treatment you can adopt is that which you suggest. Blister around the coronet once every month. You will have to tie her up for 48 hours each time you blister, and allow her to run on pasture the rest of the time. applying a little sweet oil or vaseline every day or two.

Cumberland Co., Ont.

Ans.-Apply the ordinary blister, bimiodide of mercury, 2 drs.; powdered cantharides, 2 drs vaseline, 2 ozs., after shaving off the hair. If this blister should not reduce the swelling, report and we will give you further treatment.

HERNIA AND CAPPED ELBOW.

1 Is it safe to breed a mare that is ruptured in front of the mammary gland?

2. How should I treat a shoe hoil? R. W.

Ans, -1. It would be wise to not breed her, as the muscular contraction during parturition may

2. If fluid he present lance and inject into the cavity three times daily a five per cent. solution of creolin. Zenoleum or carbolic acid. If the limb be hard, dissect out carefully, stitch up the wound and dress with one of the lotions

CALF LOSING ITS HAIR.

The hair is coming off my calf. It started to ; fall off the legs, then the neck and about half the body. There is no rawness or soreness Norfolk Co. J. H. A

Ans .- Take 1 of powdered cantharides and 1 In vaseline, mix, and apply a little with smart friction ence daily. If it commences to blister discontinue the application for a few days,

8.

ording to the figures furnished, the first is the most useful as a nitrogenous manure, and would probably be quoted a little higher than the second, as nitrogen is the most valuable ingredients of commercial plant food. In regard to the phosphoric acid, while the total of the first is higher than the second, it contains more in the insoluble condition. The term "citric soluble " in the first is equivalent to available in the second. It means that the phosphoric acid is made available as plant food in a weak citric acid solution, such as is secreted by plant roots. The available phosphoric acid is that part that will go into solution in water and the acid of the plant roots. For phosphoric acid the two are of about equal value, but the first, on account of its larger content of the insoluble, will doubtless be of more lasting value, the insoluble acid being liberated by the action of the weather. The potash content is more doubtful, as per cont. quoted is not expressed in similar terms, but we are inclined to the belief that the first is root valuable. Equivalent to sulphate of potash access that the amount of pure potash found on end, sis is equal to from 7.4 to 9.25 of potash a manufacture used it. The potash itself is never leavel in its pure state, except as prepared by chemists. In fertilizers it is commonly held as a suppliate, a nitrate or a muriate : that is, the mineral is combined with either sulphuric, nitric or muchanic acid, just as common salt is a combination of sodium and hydrochloric acid, or gypsum a conduction of lime and sulphuric acid.

Judgits by the analyses, the first fertilizer would be it, nest valuable, but if the growth of very rank, indicating plenty of nitrothe second would be the most the second would be the most and for crops that required a the second support of leaf support and a superior the for grain, such as sugar heets or the second seco would also give good results.

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BEES IN SHADE

1. Should bees be placed in the shade? 2. If so, is there a possibility of having them too shady ?

3. I have mine on a bench about three feet from the ground, at the west side of a fence which is well shaded by maple trees. A little to the south-west, and about four or five yards from the hives, a rock slopes up to the height of ten feet, at an angle of about 35 degrees. The north- dry, the pigs getting fresh water in a separate three and a half rods, where there is another row of trees running east and west. Would you consider this a suitable situation for them ? Leeds Co., Ont.

Ans.-1. Yes, bees should have a certain amount of shade, if it can be conveniently given, mate. Of course the size could be readily tremely hot weather, and helps keep down the swarming impulse.

2. A dense shade is not considered good in cool weather, but in the heat of summer it is very grateful, both to the bees and their master. There must, of course, be frequent openings in the lives of the brood; then, again, that size is situation is often found in an apple orchard.

3. Beehives should, if possible, be sheltered from cold winds in cold weather, and exposed to cool breezes in warm. The rock mentioned might have the disadvantage of acting as a powerful reflector to throw sun-heat on the hives when it is not needed, and I cannot see that it is any advantage to the bees. Individual stands two feet apart and eight inches high would place hives in a more convenient position for manipu-MORLEY PETTIT. lating frames, etc.

PLAN OF PIGGERY.

I need the plan of a good, convenient piggery,

progeny until marketable. I can secure designs, but they appear to suit only much milder climates than ours. A. T. RESENROLL. Alberta.

Ans.-In forming a plan for a piggery, it is well to appreciate the value of warmth and sunlight. Hogs, more than other stock, are susceptible to the influence of sunlight. Dampness and disease invariably accompany a dark hogpen. Therefore an ideal piggery should have a southern exposure with numerous large windows. Such a style of pen would suit best where hoglaising is followed

THE FARMER'S ADVOCATE.

PLAN OF PIGPEN-BARLEY AS PIG FEED.

1 As I wish to keep quite a number of pigs. I would like to have your ideas as to whether pens five by ten feet are the best size, and also would you recommend a passage-way behind each row, wide enough to use a horse in cleaning out ?

1 am growing white hulless barley, and as it yields well with me, I would like to know if it A. H. P. Gladstone, Man.

Ans.-1. Accompanying this answer you will find a plan of pigpen which we recommend as being suitable for the conditions of this clichanged, making it larger or smaller, according to the number of pigs kept.

Pens five by ten feet are too small to meet all conditions. A large brood sow with a litter would not have room to turn without endangering not the most economical, too many partitions and waste of space. Eight by ten we consider would suit your purpose best; that would comfortably hold five or six feeding pigs of 150 to 200 pounds weight. A larger number could be accommodated in each when the pigs were smaller. Regarding the plan you recommend for cleaning out, we believe that in this country where building material costs so much, and where the extreme cold makes it difficult to keep the quarters comfortable, it would not be economy to allow sufficient room to clean with a horse. The plan outlined in the illustration would be preferable.

2. The barley you refer to will make firstlarge enough to accommodate from ten to fifteen class pig feed when ground and fed dry, yet we

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	Yard	YARD	YARD -	YARD	YARD
ey tv	РЕ 8 x 10	РЕN 8 × 10	и РЕ N 8 x 10		PEN 8 x 10 W
D). D/D/D	TROUGH P TROUGH	ASSAGE TROUGH D		TROUGH O NG X 4 ft. V	TROUGH O
W Door	PEN 8×10 SFOR LOADING	PEN 8 ×10	PEN 8×10	<u>Ткоисн</u> РЕМ 8 x 10	PEN 8×10
	w Y A R D	YARD	YARD	YARD	W VARD

QUESTIONS ON CROPS.

1. I have a field of two acres, steep, gravelly hillside, at present in a short, thick sod. I have been using it to turn the cows on nights after milking. I would like to get this into clover to have as early as possible to turn my sows on next spring. When sharld I break it up, and what is the best way to work it? Also, how much and what kind of clover is best to seed with ?

2. Is there any difference (streakiness) noticed in after-crops on land that has had the manure placed in drills instead of plowing under ?

3. Should onions be thinned, and if so, how much in rows sixteen inches apart?

4. How do turnips broadcast compare with buckwheat in manurial value when plowed under green ?

5. At what stage is it best to cut green oats for hay? S. B. H. York Co., N. B.

Ans.-1. We would break the land in July or August, then apply a coat of manure in the fall and plow again. In the spring would divide the lot with a temporary fence and sow one-half thinly with peas and oats, seeded with twenty pounds of alfalfa. On the other half would sow rape or peas, oats and vetches, followed the next year with alfalfa. If you were satisfied that alfalfa would not grow, then use red clover, but for a permanent hog pasture we would make a determined effort to grow alfalfa. In either case, the sows should not be turned on the plot seeded to clover until the following season. The unseeded part can be pastured, or the crop can be cut and fed in the yards. This part might be sown to winter ryc and pastured early next spring if it is expedient to get the sows on green feed early. The rye could then be plowed in May or June, and the land sown as described above.

2. We have never noticed any uneveness, but such land as we have seen treated in that way was fall plowed and well intermixed before the second crop was sown.

3. Try and have the onions touching each other in the row, or better still, crowding each Bunches should be thinned out. other.

4. There should be very little difference, as the value of either of these crops for manure consists in the amount of vegetable matter they add to the soil. Whichever crop, therefore, that gives the greater bulk would be the more valuable. Clover as a green manure has the further advantage of increasing the nitrogen of the soil, a very essential element of plant food.

5. In the early milk stage of the grain.

CEMENT FLOORS FOR HORSES.

Will you inform me through your valuable paper how to mix cement for a horse-stable floor, and if it is a good floor for box stalls for colts? Do you advise plank under working horses in stalls ? J. E. R.

Cornwall Co., Ont.

Ans.—Cement for horse stables should be made rather better than for other purposes. The first layer of about four inches might be made by mixing one part cement with about five parts of gravel or coarse sand, and the top coat about one-half inch thick, should be of one of cement to about one and a half or two of sand. From our own experience and observation, however, we would advise the use of planks over the cement concrete, as it is almost impossible to make a floor that some horses will not break up with their feet, especially the front ones. In that case it is not necessary to use so much cement with the gravel, about one part to five being sufficient throughout. In box stalls for colts, where the soil would permit of it, we would prefer the earth floor, but if the land were too damp would use a layer of cement.

33 limited scale, but where

a large number are being kept, it would require to be too long and narrow, and hence a building having two rows of pens, as here outlined, is more convenient for feeding ; affords more space in proportion to the walls, and is not so much subject to sudden changes in temperature. The building should stand east and west, the pens on the south being used for the farrowing sows and young pigs. As an improvement upon the plan submitted we would suggest an additional twenty feet in length, and would use the central division on the north side for a feed room. The foundation might be built of stone eighteen inches thick and six inches above the ground. For the walls, the height would depend upon whether the loft was to be used as a storage room or not. ceiling for a large pen should at least be eight leet from the floor, and so constructed as to insure a fair degree of warmth. A frame of 2x1 scantling will be sufficient for a frame, with rough boards on the inside, then building paper, and on top of that shiplap. On the outside building paper may be fastened at right angles to the scantling frame, and over it the best quality of shiplap should be used. Floors of cement are by all odds the most satisfactory, where a sleeping platform of planks in one corner about four inches high is provided. Cement troughs are also recommended. The partition between the several pens should be four feet high. In front of each pen the partition is hung on hinges, allowing it to swin in over the trough while feed is being put in. The cost is altogether dependent upon the vill of material and cost of labor. We cannot . asize too strongly the importance of large lows in a piggery. For greater warmth ass in windows may be used. It may bled that an additional ply of boards or of the frame with building or tar pape bet w v pay for its coat in a warmer pen.



would not recommend the exclusive use of it as a grain ration, although no single grain will give better results than barley.

For pigs that you are fattening, mix a little ground wheat with it, provided you have any shrunken or small samples that will not bring good prices. For the growing pigs, over three months of age, ground oats and barley, about half and half, give excellent results. As the age advances the proportion of barley may be in-

PARIS GREEN - BORDEAUX.

Please give directions as to the mixing of Paris green for potatoes, and also of Bordeaux. N S W. M.

Ans.—A teaspoonful of Paris green to a gallon of water is sufficient for the potato bug, provided the poison is of fair purity. This year it is well to use both Bordeaux and Paris green on potatoes, as the rot is liable to do some damage. Mix the Bordeaux as described in our last issue for mustard spraying, using about eight pounds of the copper sulphate instead of ten, and about one-half pound of Paris green to the forty gallons of water. If all the solution is not used at one application it can be kept in a barrel for

Our lady readers. especially, will be interested in the new hand- and wrist-bag premiums announced elsewhere in this issue, and which may be had by getting new subscribers to the "Farmer's Advocate." We have taken care to secure articles of great value, which will be appraciated, and trust many of our readers burn sulphur in the house, and treat the hens will take advantage of these as well as other premium offers.

POULTRY OUERIES.

1. I have a rooster that has only a few tail feathers, which are about five inches long. There are pinfeathers in his tail all the time, but they do not seem to grow. He has nearly bled to death several times, the blood coming from the ends of the pinfeathers. He seems well except

2. Is there any way to make hens moult early, say the 1st of August ? If so, please state.

3. What is good to spray a henhouse with, to kill lice ? D. E. B. Brant Co., Ont.

Ans.-1, It is most probable that his feathers are pulled out by the hens. Separate him from the flock, and give good treatment.

2. Some good poultrymen recommend feeding hens a very light ration for about three weeks, or until they quit laying, then putting them sudcauses them to first moult and then they begin to lay. Sometimes, however, they begin laying before moulting. The practice is, perhaps, worth a good trial. Never keep hens over two years.

with insect powder. Use tar paper in walls when building.

PRESERVING SHINGLES.

562

Would you greatly oblige a subscriber by advising me as to what is the best shingle-preservative (pine shingles) for roofing? A reply at your convenience will confer a favor.

Brome Co., P.Q. H. S. F.

Ans .-- Our own experience has shown the best results in preserving shingles by laying them on the roof in ordinary lime mortar. We have in mind several roofs that were put on in that way 25 or 30 years ago, and they appear to be as water-proof as ever. Of course at that time the shingles may have been of better quality than they are to-day, but we think that it is still an advantageous method. It has been suggested that dipping the shingles in boiling oil, or in the Bordeaux mixture, which consists of a solution of lime and bluestone (copper sulphate), would be a very efficient preservative, but the trouble with this process is the time and difficulty of getting the shingles so treated. Very few people would undertake it, although it seems to us that it should have a very beneficial effect. We have very little faith in simply painting the exposed surface of the shingles, and it sometimes appears to have the effect of closing in the moisture that may be in green shingles, causing decay to set in. Whatever method of treatment may be pursued, the main point in the first place is to secure shingles of the very best available quality.

SLOW-CHURNING CREAM.

We find some difficulty in churning our cream, and would be pleased if you would let us know through the columns of your valuable paper the cause of the trouble, also the remedy, if any. We have a herd of seven cows; five are new milch cows this spring, the other two are "strippers." They pasture on red clover, and get salt once a We use a cream separator and a Daisy week. churn, and churn at from 58 to 62 degrees. The quantity of cream that at other times would churn in half an hour, now requires almost two hours. Would the cream from the stripper cows be the cause of the difficulty, as they have been milking over a year? E. K.

Simcoe Co., Ont.

Ans.—The small quantity of "stripper" cream from the two cows mixed with five fresh ones in the flush of milk would hardly be sufficient to cause the trouble, though it might have some effect. Possibly your separator cream screw is set to run the same quality of cream as in winter. If so, it will be thinner at this season. Set it to skim a richer cream. Be careful about the cream ripening. Sometimes the cream is set to ripen at too low a temperature, and it develops "bitterness" rather than proper souring. Start to ripen at 65 to 70 degrees, which at this season should be accomplished in about 12 hours. Then cool down the ripened cream, and hold till churning time.

PRESERVING POSTS.

Please give directions for treating cedar posts to preserve them in clay ground. W. R. Northumberland Co., Ont.

Ans.-Coal tar applied hot is one of the cheapest and best preservatives for wood. The bark is removed from the post, and the coal tar is heated in a large soup kettle. The tar can be applied with an old broom, or poured over the post with a ladle. It should be of about the same consistency as thin maple syrup. The Bordeaux mixture is also a first-class preservative. For directions re mixing, see our May 15th issue. It can be applied by standing the posts in a barrel of the mixture and then pouring it over those parts that have not been reached by the liquid, or the whole post may be put under a spray. Painting, whitewashing and charring are other methods used with fair success.

1. Would like to know if you think butter could be made to better advantage on the farm, in a well-equipped building, thereby having warm, fresh milk at all times, as against sending to a factory that has about 225 cows, or would it be better to buy the machinery and run it one's self, having now one-sixth share in building, or \$200 ?

THE FARMER'S ADVOCATE.

MAKING BUTTER - TROTTING HORSES - KILLING

ANTS.

2. What are the requirements for registration of a trotting-bred stallion; what age can they be registered at, and who is the secretary for the association?

3. Can a yearling or two-year-old stallion be shown with a bridle and surcingle on, same as what the older horses use, only lighter, or have they to be shown on the halter?

4. Is there any objection to feeding fine ground oats with whole oats, equal parts, to colts and horses, all they are able to make good use of ? 5. What will destroy black ants in flower garden ? P. Q. E. & J. M.

Ans.-1. Butter can certainly be made just as well or better under the conditions described as at a creamery, as the cream has the advantage of not being drawn several miles in summer weather. As to whether it would pay to buy the factory right out, it is hard to pass an opinion. Much depends upon the conditions. If the neighbors do not want to follow dairying, you cannot compel them to furnish cream. However, with a good man in charge of the creamery, who can command the confidence of the patrons and convince them of the advantages of the dairy business, it may be made to pay.

2. The trotting horse belongs to a branch of the equine family developed by the Americans. They have no breed exclusiveness resulting from the breeding of a long line of ancestors, but any horse that fulfils the requirements of speed is eligible for registration as a "Standard-bred" animal. The rules of registration adopted by the breeders of Standard-bred horses in 1887 appear on page 563.

3. Show the horse to the best advantage, whether with halter or bridle. A young horse sometimes acts green on the bit, and for this reason is shown on the halter until he is better broken. The authorities generally make rules to govern their own shows.

4. No objection whatever. Colts and hardworking horses might have crushed oats altogether, but young or idle horses with good teeth can do their own grinding. Never feed more than just enough to keep stock in the right condition of flesh, and that is often less than a good feeder thinks.

5. Find the hills and pour in a little carbon bisulphide or boiling water.

RIGHT TO ROAD.

A bought a road of B to reach his land. B willed the land on which the road was situated, and on deed he placed the boundaries beyond the road, including said road on willed land. Then C bought of B the land to which the road was led. Does C come in possession of road also, or does the road revert to the party to whom the land was willed? The deed of pent road B gave A was not recorded, but the other one was. N. S. W. C. Ans.--If C has any right at all in respect of the road it is probable that it is only a rightof-way over it in common with A. Certainly the devisee under B's will takes subject to B's deed to A. But the statement of case is not sufficiently clear to enable us to give a more definite answer, and we would recommend you to see a solicitor personally, submit the papers to him, and take his report as to the relative and strict rights of the parties.

FOUNDED 1866

BEEF-RING SHARES.

We are in receipt of requests to publish a chart illustrating a good method of cutting up a beef for a twenty-share beef ring. The accompanying chart was furnished us last year by J. I. Balsdon, of Ontario County. In sending it forward he says:

"To give each party a boil and a roast, it must be divided after the beef is cut down in halves. You must cut it across between Nos. 7 and 12, leaving four ribs on the hind quarter. After laying the front quarter on the table for cutting up, you will cut off front shank, No. 8; then cut from line B, making two pieces (Nos. 10 and 9) : then take off neck, No. 1; then take roast No. 7 (3 ribs in it); roast No. 6 (2 ribs); roast No. 5 (2 ribs); then cut across to line C taking piece No. 4 (boiling piece); then No. 3 (2 ribs in it), leaving piece No. 2. After cutting up the two fore quarters, you will let down the hind quarter on the table, and cut from line D. leaving flank, No. 11; then cut roast No. 12 (3 ribs in it); then follow along 13, 14, 15, 16; then cut across line E (rump roast), No. 17 then cut off Nos. 18 and 19, leaving hind shank, No. 20.

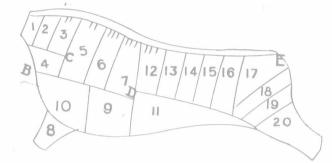


CHART FOR BEEF RING OF 20 MEMBERS.

"This is a table to put the pieces for each one:

Nos.	1	and	18	Boil and	roavt
1.4	2	and	16		10450.
1.1	3	and	12		
	4	and	13	1.4	1.1
11			17		11
1.1	6	and	20		
4.4	7	and	11		
4.4	8	and	15	<i>6</i> 4	1.1
6.6	9	and	14		
			19		~

"The weight of the beef is supposed to be not less than 400 lbs., and not to exceed 500 lbs., all to be cut up and divided into 20 shares. I think the beef should not be less than 450 lbs. It cuts up in much nicer pieces."

SOW THISTLE.

I enclose a weed supposed to be sow thistle. Will you examine it, and tell us what it really is, as it is causing a great deal of trouble in this section. Grey Co., Ont.

J. H. S. Ans.—There are several varieties of sow thistle, only two of which are so troublesome as to attract special attention. These are the common, or annual, sow thistle and the perennial sow thistle. The former is about as bad as the Canadian thistle, but the perennial is one of the very worst weeds we have. sent is not mature, it is difficult for us to say exactly what variety it is. However, it resembles most closely the annual. Notice the root system of the weed, and if there is a great mass of white, jointed roots, which send up new plants at intervals, and associated with this there is a large, bright yellow flower on a tall stem reaching above the crop, then you have the perennial variety. The annual is not so conspicuous, and spreads from the seed rather than the roots.

CUTTING RYE AND OATS FOR HAY.

Sowed a piece of land last fall to rye. It is badly infected with wild oats. What time should I cut the crop to make good hay and check the oats? How would you advise saving the crop, and how is it rated for feed for cattle or horses? Perth Co., Ont. W. F. D.

Ans.—Cut the crop with a mower, just when the most advanced oats are coming into the milk stage, or earlier if the rye begins to turn color in ripening. Treat the crop just like timothy is handled. If well cured it makes splendid feed for all stock, but would be more suitable for work horses than for cows or fattening cattle, but if bran, clover or other nitrogenous food were fed with it, it would be excellent roughage for the cows or steers.

REGISTRATION FEES.

Kindly publish scale of fees of the Clydesdale Breeders' Association for registering colts and aged horses, charged to members and non-members of said association. SUBSCRIBER. Renfrew Co., Ont.

Ans.—To members, for each second, $\$_{1:}$ to non-members, $\$_{2:}$ Transfer fee, $\$_{2:}$ second second is cate certificate, $\$_{0}$ cents. Member second second to trance fee of $\$_{2:}$ and an annual substrate second second words of $\$_{2:}$ which entries them to the resulting volumes of the studbo from the transported second ing a member and with continuing a member.

GROUNDSEL.

Please identify the enclosed plant. Is it troublesome? Give method of eradication. Middlesex Co., Ont. R. N. S.

Ans.—This is Senecio vulgaris (common groundsel). It is most common in waste ground. It is not considered troublesome in cultivated fields. Would cultivate or seed with rank-growing grass like orchard grass, or alfalfa, to eradicate it.

STALLION SERVICE REGISTER.

Enquiry was recently made for a service register for the use of stallioners. We have been informed that such can be procured from the Canadian Sportsman Office, 105 York St., Toronto; from Dr. Chas. L. Rea, 220 East 32nd St., New York, price 50 cents; or from the Sanders Publishing Co., Chicago, but the latter is more expensive.

A TAX SALE,

A owns property which he mortgages, and ceases paying taxes for; finally property is sold out taxes, and after one year the buyer takes montpassion. If property is sold without the limit buyer of mortgagee, is property still subtion to mortgage?

Ans.-Not if sale proceedings were regular.

PIPING WATER.

We wish to pipe a small spring for about 1,000 feet over to barnyard. From spring to yard there is a fall of five feet, but for the first half there is very little fall (about one foot). How much fall should it have, and what size pipe should we use? On account of curves in drain, it would be a hard job to bend a pipe larger than inch. F. J. H.

Northumberland Co., Ont.

Ans.--The fall mentioned (5 ft. in 1,000 ft.) should be sufficient, but should be made uniform throughout. If you cannot do that, then the size of the pipe used for the upper 500 feet, where the fall is least, should be increased to say $1\frac{1}{2}$ inches, the remainder being 1 inch." This would not give you a very heavy flow of water, but you do not state what quantity of water you wish conveyed. If sharp, curves have to be made elbows can be procured for the purposes, either rightangle or forty-live degree curves.

CUDWEED.

What is the enclosed plant? Describe its habit and how to exterminate. It is now matted thickly over two acres of my neighbor's pasture. Middlesex Co. SUBSCRIBER.

Ans.—The specimen is Gnaphalium uliginosum (low cudweed). It belongs to the family of everlastings, and is generally found in, sod land near woods. It never does any harm in cultivated crops. When the sod is broken up it will dis-

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TROTTING AND PACING STANDARDS

Would you be kind enough to let me know if the dam of a colt with a record of 2.19 can be registered, and where to apply for papers? 1 have a colt two years old, half-brother to the famous Minnie Keswick, 2.19. He is a very promising colt. J. L. L. Victoria Co., Ont.

Ans .- The Trotting Standard .- When an animal meets these requirements, and is duly registered, it shall be accepted as a Standard-bred trotter :

1.-The progeny of a registered Standard trotting horse and a registered Standard trotting mare.

2.—A stallion sired by a registered Standard trotting horse, provided his dam and grandam were sired by registered Standard trotting horses, and he himself has a trotting record of 2.30, and is the sire of three trotters with records of 2.30, from different mares.

3.-A mare whose sire is a registered Standard trotting horse, and whose dam and grandam were sired by registered Standard trotting horses, provided she herself has a trotting record of 2.30, or is the dam of one trotter with a record of 2.30.

4.--A mare sized by a registered Standard trotting horse, provided she is the dam of two trotters with records of 2.30.

5.-A mare sired by a registered Standard trotting horse, provided her first, second and third dams are each sired by a registered Standard trotting horse.

The Pacing Standard.-When an animal meets these requirements, and is duly registered, it shall be accepted as a Standard-bred pacer :

1.—The progeny of a registered Standard pacing horse and a registered Standard pacing mare.

2.—A stallion sired by a registered Standard pacing horse, provided his dam and grandam were sired by registered Standard pacing horses, and he himself has a pacing record of 2.25, and is the sire of three pacers with records of 2.25, from different mares.

3.-- A mare whose sire is a registered Standard pacing horse, and whose dam and grandam were sired by registered Standard pacing horses, provided she herself has a pacing record of 2.25,

or is the dam of one pacer with a record of 2.25. 4.--A mare sired by a registered Standard pacing horse, provided she is the dam of two pacers with records of 2,25.

5.-A mare sired by a registered Standard pacing horse, provided her first, second and third dams are each sired by a registered Standard pacing horse.

6.—The progeny of a registered Standard trotting horse out of a registered Standard pacing mare, or of a registered Standard pacing horse out of a registered Standard trotting mare.

Registration fee, whether Standard or non-Standard, \$2; to stockholders, \$1. Official certificate of registration, 50 cents. Transfers of ownership, 25 cents. The fees charged for registration of all animals over two years of age are double the regular fees (the age of animals to be computed from the first day of January in the year in which they were foaled)

THE FARMER'S ADVOCATE.

BOOK ON HORSE TRAINING

Where can I obtain a book on the training of horses, and what would be the price of it ? R. B Wellington Co., Ont.

Ans.-We generally recommend Ed. Geer's Experience with Trotters and Pacers to those who have light horses to train. The price of this book is \$2.00, postpaid, through this office.

NOTES AND NEWS.

The Veterinary Department of the Iowa Agricultural College, at Ames, lowa, will increase its curriculum to four years of eight months each. This extension of the course in the Veterinary Department, we understand, is in keeping with the courses in all the other departments of the State College. Dr. John H. McNeal has been selected as the Dean of the Veterinary Department.

Additional Milk Fever Cures.

In the June 1st " Advocate " detailed reports were given of six cases of milk fever successfully treated by the oxygen injection treatment in the hands of Messrs. Tennent & Barnes, veterinarians. Since then several others have been treated.

No. 7.-Grade Shorthorn cow, seven years old, in fine condition and a heavy milker, fat for dairy cow, calved 24 hours, was milked out clean before calf sucked, gave two gallons milk. At about 22 hours after calving showed unmistakable signs of milk fever. Veterinarian called at 24 hours. Found her down, but with difficulty regained her feet; champing with mouth, paddling with feet and staggering ; respiration rapid and labored. The usual quantity of oxygen was injected into teats, tying with tape to prevent escape of gas. Improvement was visible almost from finishing the injection, respiration becoming regular and steady, standing steady on her feet and calling for her calf. In less than one hour she was perfectly comfortable, the udder becoming soft and pliable. Next morning she was all right.

No. 8.-A pure-bred Ayrshire, owned by Mr. Freeman E. L. Talbot, very fat, six years old, only out of milk three weeks; calved about 20 hours when off her feet, could not rise. Had given two pounds salts in two doses and two ounces aloes. Cold water applied to her head and mustard to spine. Calf sucked and kept milked clean. In about 26 hours after calving the oxygen treatment was given by Tennent & Barnes, Filled udder tense and taped the teats. In 20 minutes, lifted up her head and showed decided improvement. and in less than one hour was up and took a drink and ate clover.

No. 9 was very similar to several other cases already reported, and recovery was equally rapid and satisfactory.

In not one of these cases was there any symptom of subsequent udder trouble, and in every case the cows milked as well, and several of the owners state even better than they did last season.

List of Fairs for 1903.

CANADA

Edmonton Alta

STATE AND GENERAL.

South Perth, Ont.

This section is rapidly tending toward stock and dairying, the general-purpose cow being the favorite. All kinds of stock, except sheep, and including poultry, share in this forward movement. But with this increase of stock and the rotting of the rails comes the uroblem of fencing. great deal of woven wire fencing is being erected, but the price to which labor and material has risen makes it an expensive undertaking to fence an ordinary farm into ten-acre fields. Therefore, many are making fifteen and even twentyacre fields, and we fail to see why this system could not be extended further, doing away with permanent fencing entirely and substituting movable hurdles, or perhaps the soiling system to which we believe stockraising in old Ontario will eventually come. The orchards in this part of the country are, as usual, being sadly neglected as to pruning, spraying and general care. The apple market at this shipping point has in the past proven so uncertain that the producers are disposed to let the orchard take care of itself, trusting that it will produce enough for home use anyway. As a result, insects and fungous diseases are gaining headway and greatly lowering the quality of the fruit for home or any other use. Unlike last season, conditions this spring are Mavorable for fruit. The weather was comparatively mild and uniform, fruit buds plentiful and ample opportunity for the bees to work among them, which, in those localities favored with enough of the busy insects, must secure a good setting of the fruit. J. H. B.

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For any additional information, apply to Frank E. Best, Registrar, Ellsworth Building, Chicago, Ill.

DEHORNING CALVES.

Will you please send me the prescription of the liniment which you recommend to prevent the horns growing upon calves; also please let me know up to what age the liniment may be used upon calves ? Can it be used up to the age of one month? An answer at your earliest convenience will very much oblige. J. C. M. Missisquoi Co., P.Q.

Ans.—Use a stick of caustic potash; moisten it well; rub it over the button before the calves are three weeks old. Put it on the horn only, and repeat if necessary.

A TROUBLESOME WEED.

Enclosed you will find a sample of a weed of which we would like to know the name, and if it is hard to to him, before June 20th, 1903. kill. What would you advise to do with it?

W. B.

Middlesex Co., Ont.

Aus.-This is Plantago lanceolata (rib grass or English Plantain). It is quite common in grass land and on roadsides and other waste places. It is seldom found in cultivated fields. When found in meadows and pustures it can be eradicated by plowing in the summer, followed by good cultivation in the fall and a root crop the following year. Where cultivation cannot be practiced, the persistent use of the scythe and spud is the only remedy for the weed.

TWO WEEDS.

Please identify the enclosed weeds, which are growing to one of my fields, and say if they are trouble-J. S. G.

theren Co., Ont.

And-One of these specimens has no flower or head. consequently, we cannot identify it. The other. ait on h just coming out, looks like one of the rye sameles well out in head we will give you the exact national nature of the plants.

A Novel Event.

Toronto horsemen are taking a most original and suitable method of entertaining visitors at the Homecomers' Festival to be held on July 3rd. Arrangements are now made to give a splendid show and parade of saddle and harness horses in the Queen's Park, Toronto. Such an event cannot fail to increase the interest taken in horses, and will force the claims of the horse upon the attention of a class of people who are just now apt to be considering automobiling the best method of combining travel and recreation. The exhibition of a large number of horses of such quality as are owned by Toronto residents and other exhibitors will be so novel and interesting to the visitors that they will be more than casually impressed with the position the horse may hold in our modern entertainments and recreations. Mr. Stewart Houston is the secretary of the show and parade, and all entries should be addressed

Newspapers Within the Empire.

Sir William Mulock's efforts to bring about greater intimacy between Canada and the other parts of the Empire by extending the distribution of Canadian newspapers, continue to bear fruit. Sarawak, Transvaal, Zanzibar, Gambia, Ceylon and British Honduras have just replied to the Postmaster General's note, and all signify their willingness to receive Canadian newspapers for distribution when these are posted in Canada at our domestic rates. Persons desirous of subscribing for or sending the "Farmer's Advocate" to friends in any of those countries will appreciate the privilege.

Canadians Still Winning.

At the examination in corn judging, Iowa Agricultural College, Ames (farm crops class), among about rs sometimes used for hay. If you will send us a dozen prizewinners, Mr. G. I. Christie, Winchester, Ont., took first place, and Mr. W. A. Linklater, Stratford, Ont., third.

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Veterinaries in Session.

The Central Canada Veterinary Association have adopted a constitution and by-laws providing rules for the conduct of business, a code of ethics regulating professional conduct, qualifications for membership, and a council to whom matters pertaining to the welfare of the association are referred. At a late meeting in Ottawa, Dr. J. G. Rutherford, V. S., Chief Veterinary Officer of the Dominion, called the attention of the local organization to the approaching annual gathering at Ottawa of the American Veterinary Medical Association, which every member of the profession should attend. On motion of Dr. Hollingsworth, of Ottawa, seconded by Dr. McGuire, of Cornwall, it was voted that the Central Canada Veterinary Association give the sum of one hundred dollars toward the entertainment of the A. V. M. A.

Our Western Letter. TRANSPORTATION.

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The pulse of the West is throbbing in anticipation of the finding of the Government on this all-important question. To realize fully the importance of the question, one must have lived in the West and participated in the very unsatisfactory conditions at present prevailing. The grievances of the farmers are in no respect imaginary. There is enough of stubborn facts, and very stubborn facts they have proved themselves to be. Hence the anxiety felt here, now that a solution of the problem is believed to be in sight, that that solution may be of a satisfactory and permanent nature. The manner in which wheat has been handled, or, to be more accurate, has not been handled, during the last few years, when the quantities were annually increasing and the wheat-growing areas yearly extending, has not been in any way in accordance with that growth and extension. Farmers might call for cars and loading platforms, and did call for them, through the railway people, through the Government officials and through the public press, but their voice was as that of one crying in the wilderness and was wafted away on empty air. It is now, however, hoped that their just claims will receive recognition and that present conditions will be changed and allowed no longer

IMMIGRATION.

Immigrants continue to come, and it is gratifying to see that most of them are of the right class-men on farming bent, whose ambitions lead to prosperity and independence, regardless of initiatory trials and hardships. Supt. Smart, of Ottawa, estimates that the number of immigrants arriving by the end of June will reach the great total of 120,000.

TERRITORIAL RIGHTS.

Hitherto very little has been done of a practical nature in the direction of establishing provincial autonomy in the Territories. Such inaction on the part of the Dominion Government, together with what residents in these Territories believe to be a feeling antagonistic to the establishment of such right in some quarters, is causing feelings of indignation in the breasts of the more ardent advocates of Provincial Government, and discontent all over. It has to be recognized that our Western Territories are becoming fast settled and the time has come for paying practical attention to the matter and making arrangements for the inaguration of a provincial form of government.

THE FAIRS.

Never before in the history of the Northwest have prospects been so bright nor hopes so high. Confidence in and love for our great country are growing daily. Business establishments are consolidating on what we all believe to be a sure and safe foundation. In this year's fairs it will be seen that industry has here a reward never before accorded to a land so young. Every encouragement in the way of prizes to competitors and attractions for visitors will be given, and in magnitude and attractiveness our Winnipeg (July 20-25) and Brandon (July 28-31) and other exhibitions promise to surpass to a considerable extent all former Western fairs.

CROP OUTLOOK GOOD.

Some time ago considerable uneasiness was felt lest the continued dry spell should last so long as to destroy the prospects of a good crop, but rain at last fell over the greater part of the West and fears subsided. The temperature accompanying the rain varied country, from warm thunder showers in some parts to actual snowfalls in others, but, as a result, the development of vegetation is universal. Present prospects are grand, and the area under crop is at least ten per cent. greater than last

Guelph Horse Show.

Guelph horsemen established a precedent when they held their horse show on June 4th, 5th and 6th, and the event was so successful that it is certain to be an annual feature in future years. The object of the show was to provide an attractive event and ultimately stimulate interest in high-class horses, especially of the lighter breeds. Most of the prize money was allotted for harness, hunter and saddle horses, but classes were also provided for drafters, general purpose and agricultural horses. More interest might be added to the show if it were possible in three days to exhibit breeding classes, as these would attract more farmers, who are really the producers of the horses that afterwards prove so attractive when well educated and handled by the dealers.

From a financial standpoint, the show was quite a success, and with the quality and numbers of the animals shown the visitors were delighted and surprised. The leading exhibitors from a distance were Geo. Pepper, Miss Pepper and Mrs. Fraser, of Toronto; A. S. Chisholm, of Oakville; Miss Wilkes, of Galt; Kidd Bros., of Listowel; Geo. Moore, of Waterloo, and Dr. Campbell, of Berlin.

In heavy-draft pairs, Geo. Moore's Wallace and Bruce, that stood second at Toronto, were alone, and in single drafters, Wallace stood first, with a big chestnut second, hardly as good in the body nor quite as solid throughout, owned by the Raymond Manufacturing Co., of Guelph. A. Atcheson, of Guelph, showed a very snappy mare of splendid quality, but a little light for the class. The two-year-old drafters, fillies or geldings, were a creditable lot. O. Sorby, of Guelph, won first and second with a pair of fillies of splendid quality, and J. Atcheson, of Inverhaugh, got third with a filly that was hardly as solid as the winners.

The agricultural classes were made up of light, fineboned drafters. Hector McCaig, of Aberfoyle, got first, and A. Atcheson, of Guelph, second. Hector McCaig also got first in the three-year-old agricultural class with Samuel Young, of Guelph, second.

The general-purpose horse was much lighter than the agricultural and more rangy. One could scarcely tell his breeding, but he is a very useful horse, and is something like what the British market calls expressers. N. Scott, of Milton, won first with an active black pair, and H. & D. McCaig, of Aberfoyle, got second with a more blocky team.

The heavy harness horses were an attractive lot, Mrs. Fraser, of North Toronto, winning the championship; A. S. Chisholm, of Oakville, and Geo. Pepper, of Toronto, furnishing the opposition. The same horses shown tandem were also very popular, Mr. Pepper getting first with Creighton and Parader, Mrs. Fraser second with Flyer and On Time, and Mr. Chisholm third with Perry and Galt.

The best pair of roadsters was Lady Crosceus and Mabel, owned by Miss Wilkes, of Galt; J. A. Tovell, of Guelph, getting second on a smaller team, although many preferred Time and Tide, owned by J. D. Cowan, of Drumbo, as they were much bigger. In singles, Lady Crosceus had it her own way, and afterwards won the championship for best roadster.

The saddle events were by far the best filled classes of the show, Mr. Pepper's and Kidd Bros.' strings claiming the most of the honors. My Surprise, owned by Miss Pepper, was particularly popular, winning the championship in the saddle classes. Mr. Pepper's brown mare, Pearl, made the highest jump, six feet ten inches, with fully two inches of a take off, equalling jump of seven feet. Rupert and Squire, from the same stable, also jumped well The award for the best single turn-out went to Mr. Chisholm. The performances of My Surprise, in saddle, Mr. Sorby's Hackney stallion, Cliffe Roberts, on the line, and the tandems of Mr. Pepper, Mr. Chisholm and Mrs. Fraser were the chief attractions of the show. Much credit is due to the management for securing such creditable events. Mr. Chas. Nelles makes a capital secretary and the president, Mr. Lockwood, is also the right man for the place. Vice-President Dr. J. H. Reed, V. S., made a good ring manager, and the judges, Mr. Hayte, of New York, in light classes and Mr. M, Gardhouse, in the heavy, agricultural and general-purposes horses, gave good and very popular decisions

FOUNDED 1866

The Hamilton Shorthorn Sale.

The combination sale of Shorthorns at Hamilton, Ont., on June 9th, brought together a goodly gathering of substantial farmers and breeders, who were not disappointed in the character of the cattle offered, which were for the most part a good collection, brought out in excellent condition, and the management and conduct of the sale was creditable to all concerned. While no sensational prices were expected or realized, the best animals were taken at very respectable figures, nine of them at prices ranging from \$300 to \$500 each, or an average of \$360, while the contingent of 25 head contributed by Messrs. W. C. Edwards & Co. made an average of \$212.50, Hon. John Dryden & Son's seven head averaged \$202.50, and Messrs. R. Mitchell & Son's two head sold averaged \$222.50, and the result for the entire 44 head sold figured out at \$187.85. The auctioneers were Capt. T. E. Robson, Ilderton, and Geo. Jackson, Port Perry. Following is the sale list :

CONTRIBUTION OF MESSRS. W. C. EDWARDS & CO., ROCKLAND

Lester's Pride (imp.) ; James A. Cochrane, Comp-

ton, Que. ...\$500 Ruby of Pine Grove 3rd; W. R. Elliot, Guelph., 425 Lovely of Pine Grove; E. C. Attrill, Goderich... 390 Actress 6th (imp.); Ira B. Vannatter, Ballinafad

Scotch Fancy 2nd (imp.); Ira B. Vannatter..... 300 Sally of Pine Grove 2nd ; Mrs. W. D. Flatt, Hamilton ...

Lady May (imp.); W. D. Flatt..... Waterloo Princess 34th (imp.); Robert Charters, Egmondville .

Flower Girl 13th (imp.); N. F. Wilson, Cumber-

Canadian Rosebud 4th; N. F. Wilson Kilblean Heather (imp.); Jas. Brown, Norval... 190 220 Lady Forthton; W. A. Douglas, Caledonia...... 170 Beauty of Plantagenet; H. J. Davis, Woodstock, 145 Lady Forthton 2nd; J. M. Gardhouse, Weston... 120 Beauty of Belleview; Chas. Priestman, Meaford, 145 Missie of Neidpath 13th ; Arthur Johnston, Green-

wood Bessie of Pine Grove; W. H. Easterbrook, Free-

man 105 Earl's Missie; J. A. Lattimer, Woodstock 150 Jeanie of Pine Grove; W. H. Easterbrook 125

Eramosa Missie; W. H. Easterbrook 60 Loyalty (bull) ; Jas. Douglas, Caledonia

CONTRIBUTION OF HON. JOHN DRYDEN & SON, BROOKLIN.

Rose of Towie 4th; W. D. Flatt	355
, J. M. Garunouse	
Victoria Beauty; H. J. Davis Northern Blonde; Hudson Usher, Queenston Lavinia Queen; W. D. Di	160
Lavinia Queen; W. D. Flatt Beautiful: Hudean Usher, Queenston	130
Beautiful; Hudson Usher	120
end ender minimum mi	110

CONTRIBUTION OF R. MITCHELL & SON,

FREEMAN.

Miriam (imp.); S. J. Pearson & Son, Meadow-

IMPROVEMENTS.

Evidences of more stability are beginning to appear in every hamlet. More substantial buildings are being built, stock is being improved, and more attention is being given to details in work.

STOCK SHOW AND SALE.

The success of the Calgary show, on the 13th and 14th ultimo, was most significant. Greater interest was taken in the show, a better quality of animals came out, and prices at the sale were quite brisk. The average price realized for pure-bred cattle was slightly lower than last year, owing to the larger proportionate number of very young or old bulls, the proportion of useful, high-priced ones being very small.

Regina Horse Show, held a few days previous to Calgary's show, gave evidence of increasing interest and general improvement. But the gratifying feature of all this display of live stock is in the fact that our grade stock all over the country is very appreciably improving and better care is being given to the useful ones.

THE BARR COLONY.

The Rev. Isaac Barr, of the Barr Colony, has resigned the leadership of that body. It is now quite evident that he failed to carry out his gigantic scheme through want of tact and business capacity. Under the prevailing conditions in the later history of the colony, Barr's presence as leader was undoubtedly prejudicial to the interests of the colonists, and the announcement of his resignation gives a feeling of relief all over the country. The immigrants will now be led by able and competent leaders, and their early settlement is assured. OBSERVER. Winniper, June 10th.

The Drought in Eastern Ontario.

The continued dry weather has reached an alarming stage, and what the farmers of Eastern Ontario are now threatened with is a complete failure of farm crops. During May there was registered at the Experimental Farm a rainfall of scarcely a quarter of an inch, about one-twelfth of an average for that month. Up to the first of June there were no fears expressed but that immediate rain might still insure fair crops of grain, though the hay would be seriously injured. During the first week of June, however, the crops began to wither and turn yellow, and on dry lands cannot now help being almost an absolute failure. Continued showers might insure a partial crop on more favored lands. The seeds of corn and root crops are lying dormant in the soil owing to an absolute lack of moisture, and a full crop of these cannot now be expected. For the farmer of Eastern Ontario things have a serious to felles aspect, and no matter how favorable conditions may be from now forward, they can, by no means, compensate for such extreme conditions as have prevailed so far this season.

Priestman, Meaford...... 170 CONTRIBUTION OF CAPT. T. E. ROBSON,

ILDERTON.

Lizzie Lorne; A. C. Pettit, Freeman 130 Nellie Fidget ; Geo. Humphrey, Lockport, N. Y., 125 Morning Glory 6th; W. D. Flatt..... 120

CONTRIBUTION OF JAMES GIBB, BROOKS-

DALE.

Aggie Hazelwood - W D Distance	160
Aggie Hazelwood; W. D. Flatt Clara's Gem; W. A. Douglas Annie Hazelwood 2nd; J. T. There	
Annie Hazelwood 2nd; J. I. Flatt	
J. I. Flatt	0.0

CONTRIBUTED BY W. B. CAMPBELL, CAMPBELLCROFT.

CONTRIBUTED BY A. J. WATSON, CASTLEDERG.

Sugar Beets in Michigan.

A short time ago a representative of the "Farmer's Advante" enjoyed a conversation with some of the farmets in Michigan who are growing beets for one of the factories in that State. Nothing could be more optimistic than the spirit and tone of the people who are now following this line of farming. year, that was so unfavorable for sugar-beet growing, did not do upon their zeal when the land was receiving its too, ecopiest drenchings. Sugar-beet acreage is intability in the parts of Isabella and Gratiot the instances, the sugar-beet companies as such as \$10.00 per acre rent for land grow beets. The labor problem has a reaction trouble as yet, and population seems labor is required. Branches of farming Inclined are now being abandoned for the adherative beet-growing, and (everything renders fair for those within the range of the sugar1866

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JUNE 15. 1903

The Royal Show.

At the sixty-fourth anniversary meeting of the governors and members of the Royal Agricultural Society of England, the entries for the London show were announced. The entries of live stock reach the large total of 2,108, which, it will be seen, is considerably above the average; but as the show marks a new departure, and is deprived of the local entries which used to swell the numbers at the migratory meetings, it cannot be very well compared with any former exhibition. Cattle take the lead with the great entry of 944; sheep follow with 520; there are 422 horses and 222 pigs. It is only in the horse section that the entries do not equal expectations, but probably quality will compensate for the smaller number. Poultry have 763 entries; produce, 609; while there will be 456 implement stands as against 340 last year, and a total of 15,585 feet of shedding, against 11,093. Thus the entries taken all over for the first show of the new series testify to progress, and will maintain its character as the largest and most comprehensive agricultural exhibition held anywhere.

T. S Cooper's Jersey Sale.

The annual sale on May 30th of imported Jersey cattle belonging to Mr. T. S. Cooper, Coopersburg, Pa., while not meeting the expectations of the owner, was yet a very successful one, as the following figures show: The 107 head disposed of made an average price of \$291. The four-year-old bull, Forfarshire, sold for \$1,750, the highest price of the day, to Filston Farms, Glencoe, Maryland. Flying Fox's Foxhall, two years old, brought \$1,050, Mr. T. W. Lawson, Boston, Mass., being the purchaser. The highest price for a female was \$1,725, for Golden Lad's Blue Belle, bought by Biltmore Farms, Biltmore, N. C. The twoyear-old heifer, Flying Fox's Brown Beauty, sold for \$1,400 to Dr. C. E. Still, Kirkville, Mo., and Nunthorpe's Fontaine, a seven-year-old cow, brought \$1,035. The three-year-old cow, Victoria of Trinity, by Napoleon Bonaparte, a son of Golden Lad, and out

THE FARMER'S ADVOCATE.

of Victoria of St. Martin, whose dam was by Golden numerous, and the honors were divided between Lord Lad, was purchased for Dentonia Park Farm, Toronto, Llangattock, Sir A. Henderson, Mr. Walpole Greenwell,

Agricultural College Graduates.

On this page will be seen a photogravure of the Ontario Agricultural College graduating class of 1903. This class has been remarkable for the high standing taken by its individual members throughout their college course, and of most of them it can be said that they have had good practical training upon the farm before entering the college. Eleven of the number specialized in agriculture, two in horticulture, two in chemistry, one in dairying, and one in biology. In this class is an evidence of the wide reputation of the college, as there are in the 1903 class two representatives from Asia, one from Europe, one from South America and one from Jamaica. The degree of B. S. A. was conferred upon the successful ones by the University of Toronto on the 12th inst. D. H. Galbraith will receive the degree upon taking a supplemental examination in agricultural bacteriology. J. P. Cleal will complete his course next year.

The Bath and West Show at Bristol.

The show at Bristol this year was in every respect a creditable event. The total number of entries exceeded any previous show of the society, although there were some small classes in some of the sections.

The number of Shire horses was not large, but some good individuals were out. The three-year-old, Hendre Royal Albert, was first among those three years and over. Mr. R. W. Hudson's Danesfield Mike, by Nateby Cashier, was considered the best two-year-old, with Hendre Ringleader standing next. The yearlings were not a particularly strong lot, a Hendre colt called Hendre Monk, by Hendre Baronet, led, and was closely followed by Yakesbury Victor, bred and shown by Mr. Cowing, and sired by Kinstoke Harold, the fourth horse in the senior class. There were a lot of mares with foals at foot, but Stanney Commotion, sired by the weighty Seldom Seen, was best, with Blythwood Nora next. The young mares and geldings were not very

Mr. P. Coats and Mr. Hudson.

Hackneys made up in quality what they lacked in numbers. Sir Walter Gilbey and Mr. Thornton were the largest exhibitors." Mr. Thornton's mare, Langton Lily, by Garton Duke of Connaught, was first in the senior class, and two, Merry Dorothy, by Royal Danegelt, and Loving Cup, by Gauymede, from the Elsenham stables, got second and third places. Merry Cayenne, Elsenham Stud, was a striking figure in the class for mares or geldings foaled in 1899 or 1900, and Gallant Girl, by Revival, also owned by Sir Walter, was the choice in the two-year-olds of the same section, with Mr. Thornton's Middleton Rosa, by Rosador, next. A lot of yearlings were out, Mr. Thornton getting first, and Mr. R.P. Evans second with Polonius. The stallion and championship classes had not been judged at the time of sending of our report.

In cattle, the Devons and South Devons were most numerous. Shorthorns were not as well represented as on some previous occasions. Mr. J. Deane Willis had the best three-year-old bull in C. I. V., by Brave Archer, although he is frequently faulted for his want of gaiety or commanding carriage. Mr. Hobbs came second with the well-known New Year's Gift. Bapton Scepter, the Dublin winner, by Bapton Duke, was first in yearling bull classes, and Roan Gift was his rival. The best cow was Rose of Underley 6th, owned by Miss Alice de Rothschild. Ringdale Crocus was best three-year-old, and Rose 4th, also from Mr. Thorley's herd, got first as two-year-old.

The Herefords were quite strong in numbers and quality, many different herds being represented. Jerseys also have an innings at this show. Their faults were quite conspicuous and the judge had quite a difficult task. It was the first time a single judge ever did the work alone. Guernseys made a very good show, and showed in better perfection than did the Jerseys. Eight breeds of sheep were represented, and all the classes were well filled. Hogs : Berkshires, Large Blacks, Large, Middle and Small Whites and Tamworths were shown.



1st row (from left to right).—W. J. Rutherford, O. A. C., Guelph, Ont.; J. P. Cleal. Dayton. Ohio; H. Rive, Guelph E. G. de Corioles, Isle of Mauritius; F. W. Broderick, St. Catharines, Ont.; H. S. Peart, Nelson, Ont.; L. S. Klinck, Victoria Square, Ont.; B. M. Eftyhithes, Asia Minor.
20. Stress row.—A. P. Kitchen, Brucefield, Ont.; W. L. MeDonald, Teeswater, Ont.; J. B. Rivara, Argentine Rep.; L. A. La Pierre, Paris, Ont.; T. D. Elderkin, Amherest, N. S.; L. H. Newman, Andrewsville, Ont.

3rd row.-F. H. Silcox, Iona, Ont.; D. H. Galbraith, Ellesmere, Ont.: T. H. Sharp, Jamaica.

ONTARIO AGRICULTURAL COLLEGE GRADUATING CLASS, 1903.

Secret of "Green-curing Clover."

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In regard to "green-curing of clover," I beg to state that I have not had any personal experience since I wrote you a year ago, as the weather conditions of 1902 were not favorable for curing by such a method, but many larmers tried the plan suggested by my letters, irrespective of weather. I had great fear of the results, and many had their hay spoiled by putting into the barns very green and wet, which caused heating. Then, to make matters worse, many of them moved the hay or cut holes down through the mows to let out the heat. This allowed the air, laden with mould germs, to get in and the whole mass was spoiled. Several farmers wrote me about their hay heating badly in the mows and asking if I thought there was danger of fire from spontaneous combustion. In every case I advised allowing the hay to remain in the barn, but to tramp the whole mass as firm as possible. This had the effect to staying the heat, and where it was taken in time it made a fair hay-better than the average cured clover in the field of last year. I saw one lot of hay that had been treated this way, being well tramped in the mow every day for a week, although put in quite wet, and it was the best saved clover that I saw during the whole season of 1902. However, I do not recommend putting it into the barn in this shape. I have more confidence than ever in the green-curing method, but the plan must be followed out properly, viz., cut in the morning after the dew or rain has dried off, rake up after dinner that which was cut in the morning and put into coils, stop cutting about four o'clock in the afternoon, and put all into coils that same evening ; haul to the barn next day, and tramp into the mows firmly. In my letters of last year, I stated that out of about 80 tons saved in 1901 by this method all was No. 1, the finest hay we ever had. I now wish to correct that statement, as we found a slightly musty spot in one mow after I had written my last letter. I had been on the lookout for this spot all along. It came from putting in a load too early one morning. The man who brought the load from the field informed me that the west side of the coils were wet with dew. I ordered the load to be put in the front of the mow at a place where I would know it. When this hay came out there was some must and dust, being the only evidence of such in the whole 80 tons.

The advantages of curing by this plan are : less time from cutting until stored in the barn, all of the blossoms and leaves are saved, the nutriments are not washed or bleached out, it is more palatable and is eaten with greater relish by the stock, thereby giving us a greater feeding value than if saved by the old plan of drying in the field, whereby much of the blossoms and leaves are left on the ground. Remember to have it free from foreign moisture, such as rain or dew, before taking to the barn. HY. GLENDINNING. Ontario Co.

About the Agricultural College.

Work is now well under way on the McDonald Institute at the Ontario Agricultural College, and it is expected that the building to be used for class-rooms and laboratories will be finished in September. The building that is to be used for residence for the lady students is not so far advanced and it is probable that it will not be finished this season. Both buildings will present a very imposing appearance. No effort is being spared to make them in every sense complete with all modern appliances.

A very interesting feature about the college, and one that excursionists will all admire, is the display of fruits and vegetables done in waxwork. So perfect

selected as Under Secretary for India, holding that office until after the General Election of 1900, when he was again chosen as Under Secretary for the Colonies.

Changes in Western Fair Prize List.

Sheep sections that formerly required two ewes now changed to "one."

Horses .- A new class was made for Dominion draft horses, towards which the Dominion Draft Horse Breeders' Association contributed \$50.

Pairs in harness will also be allowed to show " singles."

In carriage class, size was reduced in Sec. 1 to 15 hands 3 inches and over; and in Sec. 2 to 15 hands 1 inch and under 15 hands 3 inches.

'Roadster'' was made, Sec. 1, 15 hands 2 inches and over, and under 15 hands 2 inches.

Entries in Saddle and Hunter Classes, will each be allowed to show in both.

Adam Beck, M.P.P., gives a prize for the best Canadian-bred horse suitable for riding and

cavalry purposes. In "Hackneys," geldings will be allowed to show with fillies.

Ribbons to be used for all prizes in live-stock

classes. In speed, all running races to be open, and to

have catch weights.

Splendid accommodation has been provided for the sheep and swine attendants, also for feed. This has been accomplished by building a platform over the pens, sufficiently elevated so as not to interfere with the stock underneath, and enclosing sections of it for sleeping and dressing apartments, which should satisfy all.

Some changes have been made in judges.

The buttermaking competition will be repeated. An effort is being made to get the Ontario Government to make a grant for erection of a dairy building this year, which if granted will so work as to put the dairy department in proper shape.

Amendments to Fruit Marks Act.

Mr. E. D. Smith's bill to amend the Fruit Marks Act, introduced in the House at Ottawa, was lost on division, as was also Mr. Henderson's on the same subject. The aim of Mr. Smith's bill was to provide for inspection of fruit before shipping, by Government inspectors, so that the responsibility for proper grading of the fruit would rest on the Government officials. At present each packer must do his own grading and marking, and become personally responsible for the proper carrying out of the work. The Minister of Agriculture in opposing the bill said that no one should be as capable of properly grading fruit as the packer himself, and that to inspect only ten per cent. of the packages, as Mr. Smith had proposed, would not sufficiently guarantee the quality. It would also be practically impossible to obtain a sufficient number of fruit experts at the season when they would be required. The guarantee of the shipper, Mr. Fisher said, would be worth infinitely more than any Government guarantee, and by a personal oversight of the grading a fruit-grower had an excellent chance to build up his reputation.

Mr. Henderson's bill proposed to abolish the present standards, claiming that as it stood at present the act was unworkable. Mr. Fisher objected to the amendment, and showed how by adopting the proposed amendments the act would and that the experience of the past season had clearly shown how successfully the act operated in actual practice.

FOUNDED 1866

Prof. Robertson's Health.

For some time past Prof. Jas. W. Robertson, Agricultural Commissioner, has been in poor health, brought on by overwork. To prevent any serious outcome he has been ordered to take a complete rest for several months, so he left for the Old Country about the first of June. It is expected that he will be away about two months and that by that time he will have regained his wonted health and be able to resume his departmental duties.

American Institute Workers.

The eighth annual meeting of the American Association of Farmers' Institute Workers will be held in the Parliament Buildings, Toronto, June 23rd to 26th. Many of the leading institute workers of Canada and the United States will take part in the programme, which is an exceedingly interesting and practical one. On Thursday, 25th, Hon. John Dryden, Minister of Agriculture, will entertain the Association by a trip $\ensuremath{\mathsf{to}}$ the Agricultural College at Guelph. Mr. G. C. Creelman, Parliament Buildings, Toronto, is the secretary.

MARKETS.

Toronto Markets.

Export Cattle .- Prices were much easier for export cattle in sympathy with Chicago and British markets. The bulk of shipping cattle sold at \$4.75 to \$4.85, with one load of 1,400-pound cattle at \$5. Bulls, \$3.50 to \$4.50.

Butchers' cattle showed a decline of 10c.; picked lots, \$4.70 to \$4.90; choice, \$4.50 to \$4.60; fair to good, \$4.20 to \$4.40.

Stockers and Feeders.-Short-keep feeders, \$4.60 to \$4.80; stockers, \$3.30 to \$3.75; off-colors, \$3; few offering.

Milch cows, \$30 to \$45 per head.

Calves, \$2 to \$10 each, or \$4.50 to \$4.75 per cwt. Sheep.-Ewes, \$3.75 to \$4; bucks, \$3 to \$3.50; spring lambs, \$2.50 to \$4.

Hogs .- Best select bacon hogs, not less than 160 lbs., nor more than 200 lbs. each, off cars, sold at \$5.90 per cwt.; lights and fats at \$5.65; sows, \$4 to \$4.50 per cwt., and stags, \$2 to \$3 per cwt.

One load of sheep was shipped to the Barbadoes,

and one to Winnipeg.

GRAIN AND PRODUCE.

Wheat.-Red and white are worth 73c., middle freight; goose, 66c., middle; Manitoba, No. 1 hard, 89c., grinding in transit; No. 1 northern, 88c-

Barley .- No. 3 extra, for export, 44c. to 45c., and No. 3 at 42c., for export.

Oats are quoted at 30 gc.north, and 33c. at Toronto, at 35c. east, for No. 1

Corn.-Canadian, 48c., and 53c. for American, on track, at Toronto.

Peas.-Sold for milling purposes at 65c., west, and 64c. for No. 2 for export, middle.

Rye.-Quoted at about 51c., middle, and 52c., east. Bran.— City mills sell bran at \$16 to \$17, and snorts at \$18, car lots, f. o. b. Toronto.

Oatmeal at \$3.80 in bags and \$3.95 in barrels, car lots, on track, Toronto; local lots, 25c. higher.

Buffalo Markets.

Buffalo, N. Y., June 9.-Cattle-Steady; prime and shipping, \$4.80 to \$5.25; butchers' steers, \$4.25 to 5; cows and heifers, \$3.25 to \$4.85; stockers and feeders, \$3.75 to \$4.50; bulls, \$3.25 to \$4.25. Veals-Tops. \$6.25 to \$6.50; commom to good, \$4.50 to \$6.15. Hogs-Heavy, \$6.05 to \$6.15; mixed, \$6.05 to \$6.10; Yorkers and pigs, \$6 to \$6.05; roughs, \$5.25 to \$5.40; stags, \$4 to \$4.25. Sheep and Lambs.-Spring lambs, \$7.25 to \$7.50; culls to good, \$5 to \$7.15; yearlings, \$4 to \$6.25; wethers, \$5 to \$5.35; ewes, \$4.25 to \$4.50; sheep, top mixed, \$4.75 to \$5; culls to good, \$2 to \$4.65.

the shape and coloring of each specimen that only by closest examination could their real composition be determined. The collection is on exhibition in the agricultural museum.

The experiments in grass plots are well worth noting this year, as there is a very marked difference in favor of growing alfalfa clover in a meadow mixture as compared with red or mammoth clover. Work is also being done to determine which cutting of alfalfa gives the best vields of seed.

British Minister of Agriculture.

The appointment of the Earl of Onslow as President of the British Board of Agriculture would have been more generally acceptable if he had been a member of the House of Commons. Some do not approve of having the Board represented in that assembly by a deputy, even though he be as good a representative as Mr. Ailwyn Fellowes. As an extensive land-owner and farmer, and one who has seen something of colonial as well as much of English farming, Lord Onslow has many qualifications for his office. He was born in March, 1853, and succeeded his granduncle in October, 1870, as fourth Earl, was appointed a Lord-in-Waiting to Queen Victoria in 1880, and held a similar office from 1886 to In the latter year he was a delegate to 1887 the Sugar Bounties Conference, and he filled the position of Vice-President of the Colonial Conference in the same year, having been appointed Under Secretary for the Colonies. From 1888 to 1889 he was Parliamentary Secretary to the Board of Trade, and in the latter year was appointed by Lord Salisbury as Governor and Com- Henry Gatchouse, Montreal; for the three best mander-in-Chief of New Zealand. Lord Onslow standard to England in 1891, and in 1895 he was

Peel County, Ont.

Many are going extensively into corn-growing, which they claim is much easier handled and takes less labor than mangels, as there is very little weeding to be done. There is a promising outlook for an abundance of all kinds of fruit, judging from the large amount of bloom. A great many farmers in this community never crop their orchard, but cultivate it till about the middle of June, then sow rape, and when it gets about six inches high turn in hogs and calves, for which it makes a very good pasture. This method of treating an orchard has given the very best results. Λ very common practice here is to not plow the last year's root and corn ground, but simply cultivate it in spring and sow the seed grain. Many think this method the best, as it makes a good seed-bed and also tends to hold the moisture. Horses are very scarce and valuable here at present, selling from 150 to \$225, according to quality. There is a great boom in colt-raising, nearly every farmer is breeding every mare he can spare. The heavy class seem to take the lead here. M. J. S.

Gold Medals for Farm Produce.

This year at nearly all the leading fall fairs in Eastern Ontario, gold medals will be given as special prizes for dairy products, poultry, and for fat steers. The medals for butter are donated by the Dominion Creamery Co., of Montreal, and the Robert Hunter Cold Storage Co., Ottawa: the special prizes in fat poultry by steers exhibited in the Eastern Ontario circuit, B. Slattery, Ottawa.

Chicago Markets.

Chicago, June 9.-Cattle-Good to prime steers, \$4.90 to \$5.20; poor to medium, \$4 to \$4.80; stockers and feeders, \$3 to \$4.85; cows and heifers, \$1.60 to \$5; canners, \$3.50 to \$4.30; bulls, \$2.50 to \$4.25; calves, \$2.50 to \$6.75; Texas-fed steers, \$3 to \$4.50. Hogs-Mixed and butchers', 5c. to 10c. higher; mixed and butchers', \$5.70 to \$6; good to choice, heavy, \$6 to \$6.15; rough, heavy, \$5.75 to \$6; light, \$5.60 to \$5.85; bulk of sales, \$5.65. Sheep and Lambs .- Good to choice wethers, \$4.50 to \$5.25; fair to choice, mixed, \$3.50 to \$4.60; slambs,

Montreal Markets.

Montreal, June 8.-Cattle-Trade was good and prices were fair : choice butchers', 41c. to 5c.; good, 4c. to 14c. ; medium, $3\frac{3}{4}c.$ to $4\frac{1}{4}c.$; common, $2\frac{3}{4}c.$ to Be. Calves-Poor stock sold at \$1 to \$2.50, and good at \$3 to \$7. Sheep and lambs-Sheep, 3%c. to 4c. Lamba \$2.50 to \$5. Hogs, \$6.10 to \$6.25.

British Live Stock Markets.

Lordenz June E.-Choice American and Canadian cattle, 13d ; Argentines, 5%d.; sheep, 6%d. Edverpiool. June 8.-Canadian cattle, 51d. to 51d.

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"Kind hearts are the gardens, Kind thoughts are the roots. Kind words are the blossoms, Kind deeds are the fruits."

A Lesson from Brother Tom. BY AGNES LOUIS PROVOST.

" I cannot understand what has changed Nellie so." Mrs. Howard spoke in troubled tones, her eyes on her daughter's empty place at the table. Her husband shook his head. He was getting a trifle impatient with Nellie. Tom finished his second plate of griddlecakes, and intimated that he could dispose of a third. Then he announced his views on the subject :

'Now, mother, there's nothing the matter with Nell but pure airs. She has been away to school these two years, and last vacation she travelled with Aunt Nell, and was waited on until she was completely spoiled. Now she feels a little too large for the house. This morning she's late for breakfast again, and when she does come trailing in she'll have on that dressingjacket thing that looks like a bath-robe cut in half. It gives me the blues to look at it. I hate those floppy things ! I suppose she doesn't think it's worth while to dress up and be entertaining at home."

"Now, Tom dear !" admonished his mother, gently. "You must not be uncharitable with Nellie. Remember that she has studied hard this year. We will give her a chance to rest and I think she will soon come back to her old self."

Tom shook his head, unconvinced. He was a lively young gentleman just returned from his sophomore year at college, and his patience with his sister's new attitude was limited.

" It's a good thing to vary brain-work with physical exercise," he suggested wisely. " She crawls down late mornings, and if there is anything she might do round the house, she half does it and forgets the rest, or else she gets a headache and can't do anything. But she can spend hours writing fat letters to those girl friends of hers. When the Ellis boys come you'll see her down-stairs early, and not wearing that loose rag either."

"Tom, be careful !"

Mrs. Howard's word of warning came just in time. The dining-room door opened and Nellie entered, looking a trifle sleepy about the eyes. Her hair was combed somewhat less carefully than for more public occasions, and she wore the short, voluminous dressingsack which was Tom's pet abomination.

"Good morning !" she said, smiling, but stopping to cover a bit of a yawn with her hand. "I'm sorry I'm so late."

THE FARMER'S ADVOCATE.

It hurts me to think of causing her pain, but I do I think. Besides, there are a good many of us and think it will be the best thing for her. I have tried to speak with her gently, but I know she merely thought that I was carping and unkind and that we do not quite understand her. She does not realize how careless she has grown. Now be careful, Tom !"

"All right," said Tom, cheerfully, and he was off like a whirlwind.

Nellie was not quite so late as usual to breakfast on Saturday morning, perhaps because she was expecting Jean Fairfax, and had awakened with a more lively interest in her overy-day life. Her hair was a trifle reckless, and she wore the short, pink dressingsack as she came into the dining-room. At the door she started guiltily, and a wave of warmer pink swept over her face and neck and timgled in the very edges of her hair.

Two strange young men sat at the table, laughing and chatting with her father and mother and Tom. They were tall-Nellie particularly admired tall menone of them slim, with glasses and shrewd, twinkling eyes behind them, and the other broad and heavy, with a head of hair which proclaimed him to be none other than "Billy" Ellis, Tom's football hero.

Tom looked up innocently as Nell, of cruel necessity, came forward and took her place, giving an apprehensive twitch to her spreading draperies and wishing fervently that she were at the north pole, with that wretched Tom and his friends at the south pole. Tom apparently was utterly oblivious that anything was wrong, and cheerfully introduced his friends with an explanatory, "They came last night, you know."

Nellie sat through her breakfast in a far from happy frame of mind. Tom was horrid not to tell her, and she hated that dressing-sack ! The Ellis boys were nice, though, and she brightened and tried to talk, but in some way Tom kept the conversation going so rapidly, only including his parents, that she found it difficult to say anything. Billy Ellis thought Tom's sister was " jolly pretty," only he didn't care for that loose thing she wore, and he wondered why she was so quiet. His brother Preston watched her reflectively from behind his glasses, and concluded that there was some electricity in the domestic atmosphere, and that Tom was probably the cause of it.

Breakfast had never seemed so long to Nell, and as soon afterwards as she could find her brother alone, she cornered him indignantly.

"Tom Howard, I think it was perfectly horrid of you ! Why didn't you tell me, instead of letting me come down to breakfast looking like this ?'

There were volumes of scorn in the tone in which she designated her general appearance. Tom looked at her in injured surprise.

"That? Why, I thought you liked it, although I must say I don't think much of it myself. Of course, I could have let you know, if I'd known you felt that way. They just came late last night. Besides, if that rig is good enough for us, it's good enough for other people."

Brothers can sometimes be brutally frank. Nell colored, feeling that the conversation was taking an unfortunate turn, but she had another, and to her a very real, grievance.

"And you were actually rude, too ! You never gave me a chance to say a word, and I had to sit there like a wooden doll. I know they thought me queer and stupid. You never used to act this way."

"Well, I can't seem to suit you," said Tom, remedly, and his sigh was eloquent of injured

only one servant, so 1 am pretty busy helping mother mornings. If I didn't dress before breakfast, I shouldn't get time afterward. Yoo don't have to do anything but amuse yourself, do you, you lucky old dear ?'

Nell did not have much to say. She was looking doubtful.

By Monday morning the family had already fallen into the habit of lingering at the breakfast table. There was much to linger for. Three times in succession Mr. Howard had put his coffee down untasted, to laugh heartily at a lively skirmish between Preston Ellis and Jean Fairfax.

"Would you two mind suspending hostilities for a few moments ?" queried Tom. " I should like to plan a little gadding. How about a tally-ho party for Thursday ? We don't own one of those swell things ourselves, but I know of a first-class one we could hire, and pretend we owned it when once we were out of town.'

" Oh, good !"

Nell's eyes shone with excitement, but Tom suddenly looked doubtful.

"Oh, I'm so sorry, sis. I really forgot you," he said, contritely. " Are you sure you could stand it? It's a long ride, you know, and you might find it tiring."

"Why, of course, I could stand it ! What nonsense !" Nell turned to her brother in incredulous astonishment.

"Well, if you really think it would not exhaust you," he said dubiously. Then, turning to the others, he added, in grave explanation '

"You see, Nell's health has been very delicate since her return from school. I suppose she studied too hard, but she seems all worn out-just hangs around without any ambition at all, and we want her to be in better shape before she goes back."

He said it with such frank innocence of manner, and turned toward her with such a touchingly solicitous air, that it was out of the question to take exception to this remarkable statement. Nell's cheeks burned as she remembered that she had never looked plumper and healthier in her life. She felt a hysterical desire to laugh as Billy Ellis turned to her with a wondering, "Is that so? Why now, that's too, bad." But, after all, it was no laughing matter. Billy was reflecting that it was extremely disappointing that Tom's pretty sister should be one of the eternally tired kind.

"Well, then, the tally-ho goes for Thursday," continued Tom, equably. " And Billy and I were saying yesterday that it would be jolly to have an all-day, out-of-doors, do-as-you-please trip down the river, a sort of picnic with modern improvements. We could invite a few people we know, besides ourselves, and take a load of things for the inner man. How about that, mother? Is Katie too busy? Would it be much trouble to get us up some stuff for to-morrow ?"

"If it is going to make Mrs. Howard any trouble," announced Billy Ellis, decidedly, "it won't come off, and that settles it."

"Why, I can do it !" quickly interposed Nellie. "Mother needn't do anything."

"Yes, and I'll help. Mrs. Howard mustn't do a single thing but sit in a big chair and give orders. Nell and I can do it all."

Jean nodded her head conclusively as she made this statement, but Tom's anxious gaze was again bent on his sister.

"Don't be reckless, sis. There will be a lot of

There was a letter at Nellie's place, and as she opened and read it she gave an exclamation of pleasure.

"Oh, how lovely ! It is from Jean' Fairfax, mamma, and she says she can come. Saturday afternoon-that's to-morrow. Why, that is when your college friends come, isn't it, Tom ? Oh, I am so glad she can come ! She is such a dear !"

Nellie sat up straighter and evinced considerably more interest in life, but Tom, gravely finishing his coffee, apparently forgot to answer her question. His critical eyes roved severely over the wide-spreading little dressing-sack, which ended a few brief inches below his sister's naturally trim waist, and Mr. Howard, watching him, smiled significantly across the table at his wife.

After breakfast Tom hunted up his mother as she was busy about her household duties.

"Now," he said, " if you have a lot to do, make Nell work. I hear her at the piano this minute. Oh yes, I know she doesn't mean anything, but it's high time she did mean something. She's all right, really, only she's careless and spoiled, and you always did let us impose on you."

Mrs. Howard shook her head and smiled, but she loved the affectionately scolding tone which her big son occasionally adopted toward her. Tom had not finished yet.

"New, mother, let's make a bargain, honor bright. If I undertake to cure Nell with heroic treatment, will you aid, abet and encourage my nefarious schemes? You need to much; just stand by me. For instance didn't tell her, but I have received word that the F. hoys will get here late to night, instead of to-more afternoon. I want to smuggle them in so that N. 1 won't know they are here. Will you help me ?''

M Howard looked at him seriously. "Tom, I do not wish you to do anything to humiliate Nellie, at least unnecessarily. Still, I think you are right.

virtue " I thought you were so worn out and everything from school, and you've been so mopy all along, that I just exerted myself to take your share of the coversation off your shoulders. You haven't talked much to us during breakfasts, you know ----'

"Oh, you needn't bother explaining !" Nell interposed, and marched away with all the dignity she could command under such trying circumstances. But there was a choking feeling in her throat, and once out of her brother's sight she fled swiftly to her room and wept.

" Oh, oh !" she wailed in the depths of a pillow. "Wasn't it just too horrid of him ? And I saw the f-football one looking at this d-dreadful thing ! know he thought it wasn't nice, and I looked just like a balloon !'

A flushed and tear-stained face rose suddenly from the pillow, the objectionable garment was whisked off, rolled into an ignominious ball, and viciously stuffed behind the bureau.

"Oh, I just hate you, and I'll never wear you again outside this room, never, never, never !'

The recollection that Jean Fairfax would be with her that noon was a faint comfort. Nell bathed her face, and began to prepare for her friend's coming.

At lunch, Tom obligingly let the conversation go where it would, and Nell's spirits rose until Billy Ellis concluded that Tom's sister was a "jolly little thing," and turned his head in her direction so frequently that her brother's eyes gleamed with delight. But the wound still rankled, and Nellie could hardly wait to get Jean Fairfax home from the station before she poured her morning's woe into that sympathetic ear. Jean looked a little blank and paused with hat-pins half out.

" Oh, do you wear your dressing-sack at breakfast, Nell ?"

"Why, yes, just at home. Don't you ?"

Well, no, not out of my room. You see, papa and the boys hate those loose things so-most men do,

extra cooking to do, you know, and it might give you one of your headaches. I know you used to make cakes and things, but you're not used to it now, and we don't want you to overdo yourself."

"O Tom, how utterly ridiculous ! Why, I am just as well as-as you are !''

Nell tried to speak lightly, but she could have cried then and there. It was too humiliating for a plump, rosy girl of nineteen to be held up before strangers as a dejected invalid.

Tom's medicine was by no means exhausted; in fact, he considered that his heroic treatment was just begun, but Mrs. Howard had keener eyes than he for signals of distress, and she felt that Nell had been punished enough. Her eyes conveyed a quiet warning to Tom, who responded gallantly and led the conversation promptly to less personal topics.

When Mrs. Howard went into the kitchen a few moments later, she found her daughter and Jean already there, attired in voluminous aprons. Katie, more than ever busy with this houseful of young people on her hands, had thankfully improved the opportunity to slip upstairs. Nell was busy collecting materials for her cakes, but there were signs of a storm in her flushed face and unsteady lips. As Mrs. Howard opened the door, she recklessly dropped an egg and hurled herself tempestuously into those ever-ready arms, which closed warmly about her.

"O mamma, mamma, I think Tom is just too horrid ! I know I've been a mean, selfish thing, and I just hate myself, but I will help you all I can, and won't wear that horrid sack, or come down late, or be lazy and careless, or-or-oh, dear !"

Mrs. Howard bent tenderly over the brown head laid in woe and repentance on her shoulder. Tom came swinging in at the back door, thinking remorsefully that perhaps he had been a little hard, and wanting to make peace with Nell. He stopped short as he saw them. Jean, ever tactful, motioned him to come in, and slipped quietly out of the door .- [Youth's Companion.

A Devonshire Idyl.

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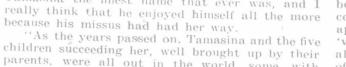
I hope you are not tired of my chatter about Devonshire, for I want to pass on to you a remnant or two of one of the sweetest bits of local patchwork I have ever come across; and this patchwork is made up of real bits which have been treasured in the memory of a real person, about real people who lived in the Devonshire nook of which she writes, a half a cen-

tury ago. Mrs. O'Neill is the author, not only of the Devonshire Idyls fronf which I have stolen her story of " Mary's old Mug," but also of another book full of local touches, called "Told in the Dimpses," which means twilight, the gloaming or the dusk. These books have been lent to me, but I must try to get them if still in print, and don't I wish I could hand them on to the readers of our Home Magazine in their entirety, instead of snipped up into little bits, as our limit of space makes imperative ?

This particular idyl is introduced by a very delightful description. "Yes, 'Mary's old Mug' is full of Devonshire pictures, and Devonshire pictures cannot be described in those common words which we all understand, being what are taught in the board schools, so if you were not born in Devonshire, as I was, you will not understand about the little cottage standing on the sloping side of the 'goyle,' nor that a 'dishwasher' is just a little bird with a white breast and a short tail, which makes the prettiest bob curtsies, as it stands on the edge of that fairy waterfall in Liddicombe Lake. The cottage stood, then, on the side of the goyle, and old Mary lived in it. Years and years ago Mary's man built it to bring home his 'Missus' to.

was a proper Devonshire maid, straight to rest in the "God's acre" near by, but Mary and slim, with bright black eyes, and verv outspoken, as most west country maids be, and when her young man had 'walked' with her all a long summer through, walked to and fro over the common to the sound of the church bells on a Sunday afternoon, he with a bit of lad's-love in his buttonhole, and she with her 'common prayer' folded in a clean cotton handkerchief with a pink border to it, and a spray of flowering thyme put in to mark the Psalms, she thought it was about time to do something more than walk to church together, and so, when Jan said to her, 'What be thinking of, Molly, then ?' she spoke up and said, 'Where be us gwine to live to, Jan? There ain't no cot that I know here abouts, and thee mustn't set thyself down fur away from thy work ?' Jan proposes that they should live with his mother, but wise Molly declines. 'Nay, lad, nay. 1 don't hold with two livyers under one roof. Give us a place to ourselves, Jan, and let I be missus in it.' And so, with the help of Molly's 'feyther,' Jan built that little house mostly with his own hands, and in it for more than sixty years Mary 'lay down missus and got up master,' as we say hereabouts. Jan was a brave, steady chap, and he lived out his appointed span of life cob cottage with the thatched roof, and never knew but what he was master of it. He was slow and steady, but she was 'flippant on her feet' and sharp with her tongue, and ordered all that came into the house, and most that went out of it." The following episode gives a pretty little picture of how Molly got her own way without Jan finding out why he did not always get his. "When the first baby arrived, Jan wanted 'the little maid ' called Lizbuth, Betty for short, after his mother, but Mary said 'Us'll call her Tamasina, after my granny who gave me the blue mug there.' The missus held her tongue till the Sunday came when she and her gossips took the child to church. As she hitched up the big teakettle to the chimney crook, and raked up the ashes before starting, she said to her man, 'I tell 'ee what, Jan, us'll have a drop o' elderberry wine to-night, and a hot toast in it. Wilt thee broach the little cask before us go away, Jam? and I'll dust out grandmother's mug, and us'll drink the little maid's health out of it. Us couldn't do no less, could us, seeing her's named to grand-mother?' Jan scratched his head, and made answer after a bit, 'No, us couldn't, I s'pose,' and quite for-got how he had once though Elizabeth Mary 'never wanted anything, not she, thank such a fine name?' The story goes on to God.' as she would say many a time Folks who heart and and into the manual.' baptize thee," Jan looked round at his wife, and "saw her winking away a bright tear," as she

and 'learnt her behavior,' he forgot all about neatly plaited Sunday cap, over which she places 'Lizbuth' for the second time, and thought Tamasina the finest name that ever was, and I really think that he enjoyed himself all the more



her little old black silk bonnet, the full white borders framing the withered cheeks. I wish we could follow her, as with her "clean, blue-checked apron tied on, the black 'turnover' pinned across 'vitty,' the turves raked together to keep her fire children succeeding her, well brought up by their alive, the door key hidden in the thatch, she starts parents, were all out in the world, some with off for her three-mile walk to sell her gooseberchildren of their own, and others with homes in ries. 'Her'll never see eighty again, for all her's

so spry, and what us'll do for our arrants when the Lord pleases to take her, I don't know, not I,' said the farmer's wife who buys her gooseberries, and entrusts her with the eggs she is to carry to Ashcombe and exchange for her into the reels of cotton, the ounce of cloves, the quarter of blue, the pound of blacking, at the village

FOUNDED 1866

'shop. "Tucked away in her basket on her basket on her gifts, 'an odd duck's egg, a bit of cold bacon, or a figgy cake hot from the oven.' 'What can a body want more,' asks grateful Molly, 'than a full belly, a warm back, and a good thatched roof over their heads?'"

At last the end comes, and the writer of Molly's simple little annals, to whom she has already given the old blue mug, is fetched hastily to her bedside. "God bless 'ee, my dear, I knowed you'd come ! No, you can't do nothing for me. You can't give me a new inside, and this one's wored right out. I've worked hard in my time, 1 have, and the children's all put out in the world; and now 1'm going to my old man, and he'll be main glad to see me. The things is all ready in the big chest, and I'm all washed and clean; folks won't have much trouble to lay me 'vitty' in my coffin......Is

SHADOW RIVER, TRIBUTARY TO MUSKOKA LAKES.

Grand Trunk Railway System.

She far-away lands, whilst honest Jan had been laid still lived on in the old cob house in the goyle, which her man had built, her grandmother's mug still hanging on the dresser hook, as she sat in the settle by the turf fire, knitting long gray stockings for the farmers' wives, whose hands were too full of children and chicken and dairy work to have much time to spare for sitting down quiet and knitting. But Mary had plenty of time. Her man was gone, her children were gone, and her own little bits of work were all easily done up early in the day.

The story tells touchingly of brave Molly's sturdy efforts to maintain her independence, how she could no longer afford the gooseberry pie, which at Whitsuntide had never failed to appear on their homely table, for they had gooseberries before anyone else, for had not John built the house "in a goyle, that ran east and west, and was 'loo' from the cold north winds, with its garden sloping to the southern sun.

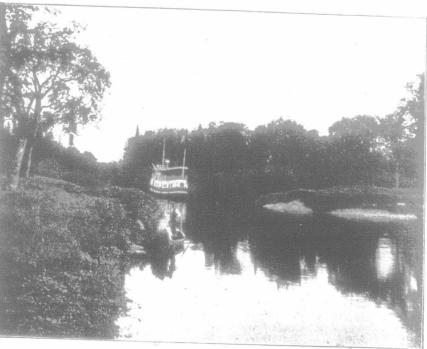
" But poor John was gone, and so was gooseberry pie in that cottage. For when the parish allows you one and sixpence a week, 'tis all you can do to buy your loaf of bread, your bit of tea, and now and then a quarter of a pound of butter. One and sixpence

Jem come ?"

When Jem comes, her eldest lad. a man of sixty, he bows his head and "cries his heart out," whilst she whispers what cannot fail to comfort him, and with the words, almost inaudible, "I'm quite ready," passes peacefully to the sleep which on this side eternity knows no waking. "As I look into the old blue mug she bequeathed me," says the writer of this true story, "I see all the memories it is full of, the familiar old face, with its lines smoothed out by the tender hand of Acath, smiling out of the net borders she herself had plaited, at the old friends who had gathered around to show their respect to one who had lived out a long life amongst them, a hard life, but never a discontented or abject one, and with the memories come a glint of the sunshine and the scent of the moorland, and almost the very sound of the ringing voices of the children's hymns which attended her to her grave at the side of her faithful Jan."

 Λ somewhat colorless life, perhaps some of my readers may say, but surely one which in its sweet content and self-forgetfulness cannot be without its wholesome lesson in the "art and joy of humble life." H. A. B

won't buy everything, but



ON THE MAGNETAWAN RIVER.

God,' as she would say many a time. Folks who heart and soul into the pursuit. have gooseberries in their garden spots can sell them, and so they can their currants when they wax red and black in the summer sun." thought of the grandmother who had been so Mary measures three good quarts in the blue good to her, and taught her to spin and to sew, mug, covers them with a rhubarb leaf, dons her

Domestic Economy.

Worry and hard work use up much nerve force, and so leave less nerve force for exercise. But, on the other hand, the exercise will free the blood from some of its impurities, and thus counteract the effect of worry. It seems almost as if pure blood were as valuable to exercise as strong blood is. The blood of the Indians, who can run fifty miles in the day, is not strong, at least it is not strong because of much food, but it is apparently very pure.

If you would take much exercise with case and enjoyment, here is a summing up of the main points : Be careful and temperate in diet; go to bed early; breathe correctly; use light clothing and proper shoes ; do the exercise correctly; especially practice the individual parts of it by themselves b'eforehand till they become easy and half automatic; play games or use some other form of competition; move shythmically; use, if possible, the large

blody words, sympathizing attentions, watchful-Less accordent wounding others' sensitiveness, these cost very nucle, but they are priceless in value.

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THE FARMER'S ADVOCATE.

CHILDREN'S CORNER. THE

A Competition.

Prizes will be given for the best original essays on "Our School." All competitors must be under fifteen years of age, and the incidents described in the essays may be fact or fiction. Write name, age and address on the lack, and send before the end of August to "Cousin Dorothy," Box 92, Newcastle, Ont. If possible, competitors will be divided into classes according to age. C. D. HOME, SWEET HOME.

There's a queer little house on the bush so green; Its walls are a rosy red. All built in a circle, with never a roof

But the blue sky overhead.

In the very middle the mother stands, Around her the fathers keep Their watch, while in a green room at her feet, The dear little babies sleep.

The beautiful house is a red, red rose, The mother's a pistil small, And the yellow stamens are fathers bold That grow by the rosy wall.

The children are seeds in a cosy room, Some day they'll open the door And build for themselves such a dainty house, As their parents had before

So the world goes on, as it has done from the beginning. The children grow up in the home nest, and sometime they will stretch their wings

and fly away. Perhaps they may grow a little tired of the nest, a little discontented because it is so small and they fancy they need more elbow room. When the boys and girls strike out for themselves they generally learn to value the home No one cares about their pains they have left. and troubles, their headaches and heartaches. No stranger, no matter how kind and obliging, can fill the place of the dear mother whose love and . sympathy can always be depended on. As Mrs. Sangster says :

"A fellow's mother," said Fred, the wise,

With his rosy cheeks and merry blue eyes, "Knows what to do if a fellow gets hurt

By a bump or bruise, or a fall in the dirt.

" A fellow's mother has bags and strings, Bags and buttons, and lots of things No matter how busy she is, she'll stop To see how well you can spin your top.

" She does not care-not much, I mean If a fellow's face is not quite clean; And if your trousers are torn at the knee, She can put in a patch you'd never see !

" A fellow's mother is never mad, And only sorry, if you are bad ; And I'll tell you this, if you're only true, She'll always forgive you, whate'er you do.

" A fellow's mean who would never try

poor, drooping friend, who felt as unhappy among her the companions as a fish out of water

Mabel rushed off to find her sister, who was playing tennis on the lawn. "Oh, Marion, come and see the splendid flower I have found !" she exclaimed breathlessly

Marion followed her little sister, wondering, what new treasure Mabel had found now. "Why it's only a common buttercup," she said, "and, see, it is beginning to fade already."

Buttercup felt weak and giddy and could not stand up. How she wanted to be at home again, where no one despised her, and where she always felt strong and well. Nobody cared for her in this grand garden; she might die and it would make no difference to anyone.

Even Mabel had grown tired of the poor, faded "weed," and took no more notice of her.

But worse things than neglect and scorn were to come. Early next morning the gardener found her, and at once dragged her up by the roots and flung her far over the wall into the field beyond. She fell near Forget-me-not, and with one gasping cry-" I am dying !"-fainted away. But she was at home, and among friends who loved her in spite of her pride and discontent. The stream went out of its way to water her dry roots; the dandelions and daisies scattered fresh dew-drops in her face, and the birds fanned her with their wings. When she revived it was to look up into the sweet face of her old friend, Forget-me-not; and such a look of loving pity was in the blue eyes which bent tenderly over the poor, draggled plant. "We are so glad to have you home again," said Forget-me-not brightly, "we all missed you dreadfully."

Buttercup did not die after all, thanks to the loving care of the home-friends she had once de-She never quite recovered her strength spised. and good looks, but no one ever heard her complain again about the stupidity of her home.

COUSIN DOROTHY

THE QUIET HOUR.

The Daily Round.

" Over and over again, No matter which way I turn, I always find in the book of life Some lessons I have to learn. I must take my turn at the mill I must grind out the golden grain, 1 must work at my task with a resolute will, Over and over again."

The people of Jericho are hiding behind closely-barred gates; no one is allowed to go in or out, for the enemy's camp is near at hand. Wonderful tales are told of the magical power exercised by the great host encamped in Gilgal, and whose attack is daily expected. One thing is certainly known in Jericho, the fact that in some mysterious way the river Jordan was stopped in its headlong descent to the Dead Sea-dammed up at the time of harvest when it overflows all its banks-that the Israelites might cross over dryshod.

which we cannot break down. We are dumb on the subjects we care for most ; or, if we do speak, the words seem to go in at one ear and out at the other, leaving no impression behind. Let us take courage. God means to win the world through men, women and children, and He can do it in any way or by any means. Everyday work, faithfully and cheerfully dong because He has commanded it, makes more impression on the world than sermons ; and when He does give the command to speak, the words come with tremendous force from those who seven days in the week have been steadily and quietly doing what they have to do. The Gospels, which simply tell the story of a Life, win more souls to Christ's service than the Epistles.

" Over and over again The brook through the meadow flows, And over and over again The ponderous mill-wheel goes. Once doing will not suffice, Though doing be not in vain, And blessing failing us once or twice May come @ we try again."

God gives victory, often very suddenly, to those who have been patiently plodding on day after day for years. Then think of the encouragement here for parents, teachers and pastors. If they keep on adding line to line, precept to precept, although very little impression may seem to be made, never fear but that some day the word of God so faithfully instilled will become quick and powerful and sharper than any twoedged sword, and the citadel so long besieged will surrender to God. But, remember, work is not enough. The ark of God was carried in the van of that mysterious procession; every day it circled the city, and one day in the week it passed round it seven times. We, too, must carry the ark-the sign of God's presence-always with us, praying each day for the souls we seek to win for Him, and praying most of all on Sundays.

"We cannot measure the need Of even the tiniest flower, Nor check the flow of the golden sands That run through a single hour. But the morning dews must fall, And the sun and summer rain Must do their part and perform it all, Over and over again."

Then let us be as confident of victory as Israel The great shout of praise and triumph was. rose before the battle began. God had promised victory to them if they faithfully performed their part, and, hopeless as it seemed, they were quite sure He would keep His word. Don't we sometimes get discouraged because no visible result follows our obedience? We are pleased to call our faithlessness "humility," saying that we are not wise or good enough to do any great work. Let us remember Jericho, and believe that God is able to conquer by weak and feeble instruments. In fact, He sometimes chooses inadequate instruments on purpose, so that it may be very plain that the victory is His gift. Think of Gideon going up against the Midianites, who were grasshoppers for multitude; for both they and their camels were without number." With only 32,000 men he might well fear defeat; but God told him that his army was too large, lest the people vaunt themselves, saying, "Mine own hand hath saved me." When those who were fearful and afraid were sent home, the little army of 10,-000 was still too large. Gideon showed great faith when he obediently reduced his force to 300, and went out against the great host of Midian with no weapons, trusting only in the power of God.

the tear from her loving eye, And the fellow's worse who sees it not

That his mother's the truest friend he's got."

Did you ever hear the story of the discontented buttercup? I will tell it to you as nearly as I can remember it.

Oh, dear ! how stupid it is down in this field !" sighed Miss Buttercup. " Just to stay in the same place, among the same people, all one's days. I declare, life is not worth living.'

A lovely little Forget-me-not, which was growing near, bent over the rippling stream, smiling at her own reflection, as she said : "Why, I don't see how anyone could help being happy here, where we are all at home together. We have plenty of work to do, and any number of friends to love.'

"The idea of work, here !" laughed Buttercup, "I should like to know what it is ?" "Why, there is always work for everyone to

do," said Forget-me-not, opening her blue eyes wide. " I say 'good morning' to the stream, the birds chat with me during the day, and then there is always one's home.'

"My family don't properly appreciate me." said Buttercup.

Just then little Mabel came dancing across the field and exclaimed, " Oh, what a splendid buttercup ! I will carry it home and plant it in my garden." She dug it up very carefully, and soon planted it among the flowers in the carefully kept garden. Buttercup was delighted with her new Position. " Now I am beginning to be appreciated," she thought, proudly; "now I shall see something of the world, and shall have a chance to distinguish myself." But soon she hung her head, feeling shy and uncomfortable, for the other flowers whispered rudely together, and she overheard some of the unkind things they said.

"Such a low-bred creature," said one.

"Yes," answered another, "the idea of expecting us to associate with weeds !"

They all turned their backs in scorn on our

It is early morning, and the army of Israel is Will the city be attacked to-day? It astir. looks like it, for see the long procession streaming out of the camp and marching round the walls. Not a word is spoken during that strange The men on the walls of Jericho gaze in march. astonishment and terror. Is this a magical charm, or has the Israelite army gone mad? After circling the city once the procession marches back to camp. For six days this apparently meaningless parade is repeated. The people of Jericho become used to it, and their fears fade as they see that no attempt is made to attack them. But on the seventh day there is a change in the proceedings, for the procession starts unusually early and goes round the city seven times. Silently the men of war continue their weary and monotonous round. They are obeying orders, as soldiers are bound to do, but it seems a useless expenditure of time and energy. At least, it would seem so ; but the God who has helped them so often has commanded it, and He can conquer for and with them by any means He chooses to make use of. Then comes the command : 'Shout, for the Lord hath given you the city !' At the sound of the trumpets, and the great shout of triumph which suddenly rises from all the men of war, the massive walls, which they could never break through alone, fall down flat and the city is easily won.

This sounds more like a legend or fairy tale than sober history, doesn't it? Yet it is a type of what all spiritual battles should be, and one of God's great object lessons for His people in all ages. Let us look a little deeper into its mean-We, like the Israelites, are given a daily ing. task to do for God. We are sworn to His service, and our work here is to fight for Him and extend His kingdom, yet the work He gives most of us seems quite useless as mission work. Every day our hands are full of common-place duties, which have to be done all over again to-morrow. We seem to make no progress. Those we wish to win for God are shut behind a wall of reserve

We are all given three great lessons to study over and over again, because they are so difficult. The first we learn through many a failure, many a defeat-the knowledge of our own weakness. The second is harder to learn, but far more valuable-dependence on the almighty power of God. The third is, "God helps those who help themselves."

When we fail, it proves that we have been trusting too much in ourselves, too little in God, or idly expecting Him to do everything. But don't let us forget that an apparent failure is often a great victory. A daily march round a city seemed a hopeless way of conquering it, and our Lord's death on the Cross seemed a hopeless way of winning dominion over the world. Only God can foresee results. Our part is to do our duty seven days in the week, and not talk too much, as I am doing now, having, as usual, overstepped my allotted space. HOPE.

To Our Lady Readers.

On page 572 of our present issue will be found a very handsome offer of wrist-bags and purses as premiums, specially suited for our lady readwhether young or old. These bags are ers. really beautiful in design and workmanship, and we urge you to turn over to the advertisement page to see how very easily you may become the possessor of one of these elegant and stylish gifts .- Editor Home Dept.

Mrs. Bright's Way.

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"Good morning, Mrs. Darke. Here you are, as usual, surrounded by your interesting group of lovely children. 1 almost envy you. Certainly you should be a happy mother."

"Happy, indeed ! Why, you know nothing about my troubles, Mrs. Bright. I am almost worn out. I am kept on the go from morning till night. Myra is teething, and is very troublesome. Children make so much work. Just imagine what it means to have five, and the eldest not nine years old. I have too many. If I had only one, now, I could manage to get along very well without a servant, and wouldn't have to work myself almost to death. One is quite enough to look after."

"Oh, no, Mrs. Darke ! I believe in large families. If you had only one you would be very apt to spoil the child. Doesn't your husband need boys to help him on the farm, and don't you want girls to help you indoors? Of late years, the baby crop has failed in many instances, and numbers of farmers are puzzled to know what to do on account of the scarcity of help. Every farmer should have half a dozen children at least. A man who couldn't, or wouldn't I should say, support comfortably and educate that many must be a very useless mortal indeed. Your fine boys can help you considerably now, before and after school hours."

"But, really, Mrs. Bright, the mother of a large family has to work very hard when she has no hired help. Now, Myra disturbs me at night, and I have to rise early in the morning to prepare breakfast. Then, I have to get the boys ready for school. Such a flock of youngsters to wait upon !"

"Why, Mrs. Darke, you don't surely mean to tell me that you wait upon those three sturdy, active boys. Surely not. They are quite able to wait on themselves, and help you a good deal besides, Eddie, dear, don't you love to help mother ?"

"Mother won't let me," replied Eddie. "She says, 'Run out and play, and don't bother me.' Then I go out with papa in the field, and have a jolly time. Papa and I are great chums."

"There, now, Mrs. Darke, Eddie is telling tales out of school. He is a willing little man. Why don't you allow him to help you? Keep the children busy. If not at work, they are very apt to be in mischief, for we read that 'Satan finds some mischief still for idle hands to do."

"But, Mrs. Bright, do you mean to say that the boys should do housework, such as sweeping, washing dishes, etc. If Eddie, Bruce and Frankie had been girls I should have set them at work some time ago. But I never thought of it, since they are boys. I have to do all the housework myself."

"That is where you are making a great mistake, Mrs. Darke. Why can't boys work indoors as well as girls? They are stronger; then what is to hinder them? Listen to a bit of personal experience, my friend. I hadn't a girl at all, so I taught my boys when they were just little tots to help me with the bousework. Such a comfort those boys were. Nothing was too hard to do for mother. When I felt poorly they wouldn't allow me to do a turn, and they often took up my breakfast to my room. Now they are married, they are just as good to their wives. Marion (she is James' wife) said to me the other day, ' Mother, I have the very best husband in the world. He is so kind. When I was ill, he did everything as well or better than a servant would have done.' Yes, Mrs. Darke, teach your boys to work in the kitchen, and by-and-bye their wives will thank you. Let me give them a lesson.''

"Eddie, dear, you can sweep the floor, can't you?" "Yes, ma'am; of course I can. That's easily done."

"Well now, take the broom and sweep the kitchen." Eddie went to work with a will, and Mrs. Bright brought the dish-pan, scraped the dishes, placed them in the pan, then poured hot water on them, and said:

"Now, Bruce and Frankie, 1 want to give you a lesson in dish-washing. Your mother is very tired. She has been working hard for your comfort, now it is your turn to help her. Bruce, dear, you wash the dishes, and Frankie will wipe them, while mother is dressing little Myra. Here, Dottie, love, is something for you to do. Take this duster, and dust off the chairs—this way, dear. That's a smart little woman now. There, see what fine willing workers your children are, Mrs. Darke."

The boys finished their work, and ran out to where their father was working in the field. In a little while they came back in great spirits. Eddie said: "Mrs. Bright, do you know what? Father has given me just a lovely filly foal for my very own."

"And," said Bruce, "he has given me a beautiful little white calf; just born last night. He said we were such good boys to work that we deserved to be rewarded and encouraged. Oh, it is twenty minutes to nine. Time to start to school, Eddie."

"Mother," said Eddie, "where's my geography? Off, I believe I left it up on my bedroom table.

"Then run up after it, Eddie," said Mrs. Bright. "Surely you don't want your mother to go. There, that's a smart boy," as he ran up for the book. Then the trip of merry boys-marched off to school.

"Now, my friend," said Mrs. Bright, " please excuse my plain speaking, but you have actually been spoiling your children. Take my advice, and turn over a new leaf at once, for their sake and for your Your boys are fine, active little men, and they own. appear to enjoy work. Now that they are broken in, as it were, don't act as though you expected them to become weary in well-doing. Keep them at work. Make them help you every morning. You need rest and fresh air. Instead of wearing yourself out trotting around waiting on those strong, healthy boys, take the two little girls, go out in the garden and enjoy the glorious, health-giving sunshine. You are nervous. This will help to strengthen your nerves. There is nothing like teaching the children habits of industry very early in life. Children accustomed to be waited upon are apt to grow up selfish and indolent, and we all know that an indolent man has a very poor chance of succeeding in life. But don't scold the little fellows,

Give them praise and encouragement when they try to do their best. Love is the mighty conqueror. I speak from experience, Mrs. Darke. Won't you take my advice ?"

"Thank you, Mrs. Bright. I shall try your recipe. I didn't imagine that the boys would be willing to work in the kitchen."

"Why shouldn't they be willing ? And there is another thing, Mrs. Darke. I always taught my children to keep all their belongings, such as hats, handkerchiefs, books, slates, school-bags, etc., in their proper places, and insisted on strict obedience to this rule. Some children are hard to manage, but I think yours are very obedient and docile. You should be very proud of your boys and girls. Train them up in the way they should go. Since my children have grown up and left the home nest, I have been lonely indeed, for I am very fond of little ones. I have often talked of adopting a little girl, but I believe in hereditary influences, and as it is difficult to obtain satisfactory information concerning the parentage of orphans from abroad, I have been afraid to assume the responsibility. But here is a chance for me now. You told me you had too many. Give me little Dorothy, then you will have one less, and you know I would be good to her. Now, don't laugh. I am in earnest. What do you say ?'

"Oh, Mrs. Bright, I couldn't think of such a thing as giving away Dottie, even to you. She is just a lovely darling. We couldn't possibly spare her."

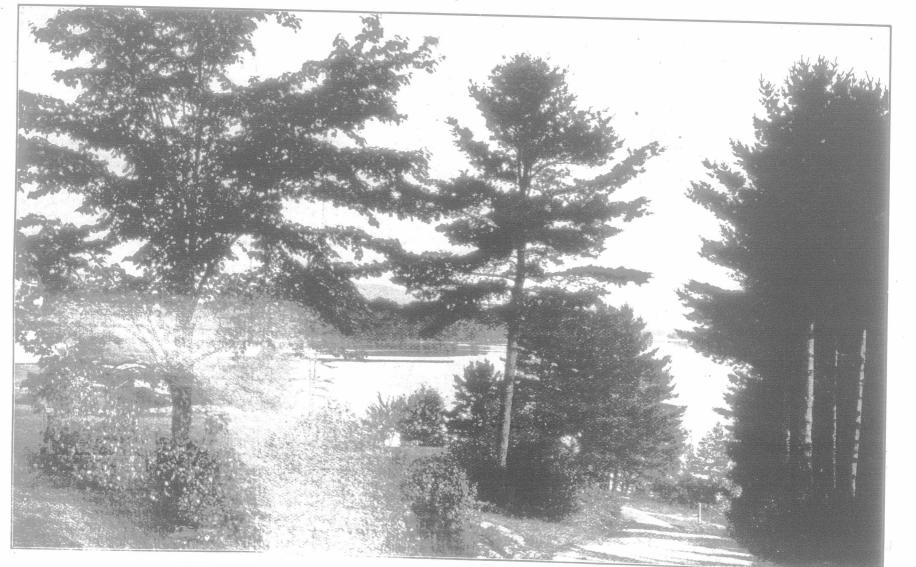
"There, I was pretty sure you didn't mean it when you said you had too many. There is room for them all in the true mother-heart. Well, Mrs. Darke, I shall have to be satisfied with borrowing one of my grandchildren occasionally, if you really won't spare me one of yours." MRS. A. RODD. Charlottetown, P. E. I.

The "Highlands of Ontario," Muskoka, an Ideal Holiday Place.

To those who are as yet undecided where they may find a truly restful and health-giving place where they may enjoy a delightful holiday, we would suggest Muskoka, the "Highlands of Ontario," and a glance at the pictures which we present this time will show some of the beauties which nature has lavished upon this part of our country.

The lakes of Muskoka abound with fish, the brooks with trout; it is cool there in the hottest days of summer, and yet it is not too far away to be easy of access; the G.T.R. running special holiday trains from Toronto and Buffalo, right to the most beautiful and attractive points. Owing to the high altitude, and pureness of the dry atmosphere, such diseases as malaria and hay fever are unknown there.

In our next number we purpose giving other Ontario and Quebec views.



FOUNDED 1866

FIVE O'CLOCE AN ENGRAVENE LIKE ROSSEAU, MUSKOKA LAKES DISTRICT.

Cread Track Ruiway System.

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JUNE 15, 1903

Dear Friends,-Since bidding adieu to you last I have written just exactly six letters for the Ingle Nook-six of them !- and have torn them all up ! You see, there were about five thousand things I wanted to say-no, hardly five thousand, I must take a little off that, or you will be thinking there has been a huge mistake somewhere, and that Lawrence Boythorn has got into Dame Durden's shoes. (By the way, do you read Dickens ?) Well, as I was saying, there were a whole lot of things that I wanted to say all at once, and they kept going down in such a higgledy, piggledy sort of fashion, that I just got disgusted, and tore them all up; the papers, of course, not the ideas.

Well, after tearing up the sixth, I was not just in very good humor. One hates to be wasting time; and yet, after all, is one ever wasting time when one is trying? That is a question. However, when I was just getting as "mad" as could be, I put the scraps of paper away, right out of sight, and went out and sat down on the green grass, in the shade of a tree. It's a fine plan, that. When you are out of sorts, just go away by yourself for a little while, and sit down in the very quietest, pleasantest spot you can find, for a little rest. Then you will get time to cool off and become sane again. You know I always hold that one is hardly normal when one is cross, or blue, or unhappy; at least, without having some really good cause for being so. It's simply wonderful, when you do this, to see how quickly the clouds begin to rise and dissipate, until nothing is left but just the "teeniest" little bit of mist, even that all shot through with bright beams that give promise of more. And so you find yourself again quite calm and happy, with the sunshine and the green grass and the waving trees all about you-just as they are-and you begin to wonder whether there were really any clouds at all or not, or whether you had not been, for a little while, only a disagreeable old crosspatch.

Well, as I sat beneath the trees, I presently found myself listening to the birds. They were out in great chorus. A cat-bird was gurgling and trilling (by the way, why did they give so ugly a name to so sweet a songster ?-he seldom mews); a tiny yellow warbler was swelling his wee throat on the top of a young spruce; another species of warbler, a little, steel-colored fellow-I don't know his name, but I wish I did was at it too piping his weird, silvery song ; from the heart of the swamp a white-throated sparrow was reiterating his, "I love dear Canada, Canada, Canada!" It was a concert well worth listening to, and a peculiar one too. Here there were five different songsters, each singing his own song, and yet the result was harmony. That's the strange thing about bird-songs. Have you ever noticed it ? No matter how many birds warble at once there is always harmony And so my worry all

THE FARMER'S ADVOCATE

passed, and I began to think what a good thing country life is, and how I would not want give up the pleasure of listening to my birds for all the chances in the world of hearing an occasional Patti, or a Calve, or a Paderewski, or a Kubelik, or any of the rest of them... rather significant that the highest tribute one can pay to a singer is, "She sings like a bird," or to a violinist, "Those high notes were absolutely bird-like ?" And yet our little entertainers give their music free to all, and only ask to be let live and be happy.

Do we appreciate the little fellows as we should? Do we appreciate any of our advantages as we should ? Do we even begin to see, and hear, and think, and feel as we should ? Or do we not often, from the very commonness of things, allow our ears to grow deaf, and our eyes blind, and our thoughts humdrum, and our hearts thankless ?- when we know, or ought to know, if we don't, that more than half the joy of living comes from keeping the ear keen and the eye sharp, and the thought active and the heart responsive. Now, you know what I mean, don't you ?-and if you don't, just think it out, please.

I'm sorry so many people find only drudgery on a farm. When this is the case there must be something wrong somewhere ; there must be overwork, or lack of interest. It is inconceivable to me how there can be lack of interest where there is so much to see, and do, and learn. You know there must be a continual learning on a farm, if it is to be a success at all. One must find out scientific methods, and know how to do things in the very best way, and why they are to be done in that way. It is necessary to read, to take the very best agricultural journals, and keep up-to-date in every line. To be thoroughly interested is to be happy.

On the other hand, where there is overwork, "that's another story," as Kipling says. It is not pleasant to be overworked. It is usually the women who complain most of this malady, and for them surely something can be done. Are things not as handy as they should be? Are there no labor-saving devices about our homes ? Are there no means of saving steps, so that we may have a little while every afternoon in which to rest or to read? These are pertinent questions

And now, let us get right down to business Let us make our next number of the Ingle Nook a "Labor-saving" number. I am sure every one who knows of even one labor-saving device will be glad to tell it, for the sake of helping some other sister who, perhaps, is overworked and has not happened to think of just that plan. We farmer girls and women ought to be just one big family in this respect, and I hope we of the Ingle Nook shall be.

1 shall be very glad to collect and publish in our next number any useful hint that may be submitted to me. I will not make this a competition, for that would spoil it all, wouldn't it? It will just be a "free-will offering," from which, I trust, each of us may obtain some benefit. Just jot down any "notion" on a post card, if you haven't time to write more. Address as before, Box 28, Chatsworth, Ont., and I am sure the whole Ingle Nook will acknowledge it gratefully, as well as-DAME DURDEN.

Humorous.

Putting One's Foot In It -" I never open my mouth but 1 put my foot in it," was the curious complaint of some unlucky wight, who might have received consolation had he reflected on the number of offenders that daily keep him company. The Guardsman's remark to the English nobleman who was in the habit of affably conversing with soldiers, " I like you, my lord; there's nothing of the gentleman about you," offers an example of the kind. "How many deaths?" asked a hospital physician. "Nine." "Why I ordered medicine' for ten !" "Yes, but one would not take it," was the startling reply. "Helio ! where are you going at this time of night ?" said a gentleman to his servant. "You are after no good, I'll warrant." " Please, sir, mistress sent me for you, sir," was the response. A gentleman said to the waiter of his club : " Michael, if I should die, would you attend my funeral ?" "Willingly, sir," was the hasty answer. "Well, Michael, that isn't very complimentary." " No, sir; I didn't mane that sir. I wouldn't be seen there, sir," was the waiter's consolatory reply.

A millionaire railway-king has a brother who is deaf, while he himself was remarkable as having a very prominent nose. Once this railway-king dined at a friend's house, where he sat between two young ladies, who talked to him very loudly, rather to his annoyance, but he said nothing. Finally, one of them shouted a commonplace remark, and then said in an ordinary tone to the other : "Did you ever see such a nose in all your life ?" " Pardon me, ladies," said the millionaire; "it is my brother who is deaf!" We can imagine the horror of the lady who indulged in such personal remarks, yet she was no more awkwardly placed than the hero of the following. When dining at a certain castle a Mr. T----, after the ladies retired, remarked to a gentleman present that the lady who had sat on his right was the ugliest woman he had ever seen. "I am sorry to hear," said the gentleman, "that you think my wife so ill-looking." " Oh no, sir; I meant the lady who sat on my left. I made a mistake." "Well, sir, she is my sister."

The lecturer put his foot in it as thoroughly when he prefaced his discourse upon the rhinoceros with, "I must beg you to give me your undivided attention; indeed, it is absolutely impossible that you could form a true idea of the hideous animal of which we are about to speak unless you keep your eyes fixed on me." A certain preacher discoursing upon Bunyan and his works, caused a titter among his hearers by exclaiming, "In these days, my brethren, we want more Bunyans." Another clergyman pleaded earnestly with his parishoners for the construction of a cemetery for their parish, asking them to consider the "deplorable condition of thirty thousand Christian Englishmen living without Christian burial." Still more curious was the clerical slip with which we conclude. A gentleman said to the minister, "When do you expect to see Deacon S---- again ?" "Never," said, the reverend gentleman, solemnly; "the deacon is in heaven.

- The dandelion is not to be despised. A cluster of

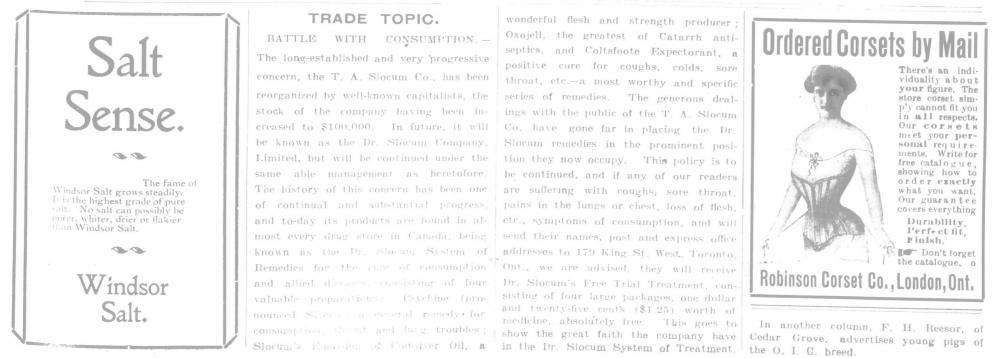


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P. S.—Goodness me! The crankiness has all one. There isn't a little bit of a cloud left. This letter is higgledy-piggledy too. Nevertheless, I have come to the conclusion that editing the Ingle Nook is, after all, the pleasantest task in the world.

Never bear more than one kind of trouble at a time. Some people bear three kinds-all they have had, all they have now, and all they expect to have .--Edward Everett Hale.

these lends brightness to the table, like a ray of sunshine. A pretty way to use them is to take α shallow dish or pan, cover it with cardboard or coarse screen wire, stick the flower stems through the wire meshes, or holes in the cardboard, until they touch the water beneath, then make a border of green leaves around the mass of yellow blooms. A similar arrangement may be used with excellent effect for violets, while moss may be laid over the wire netting, suggesting a bit of greensward sprinkled with these blue-eyed harbingers of spring.



In answering any selectivement on this page, kindly mention the FARMER'S ADVOCATE.



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claimed, than the aggregate of the ap- ing houses in the Maritime Provinces, propriations made by all previous inter- but not enough stock is raised to keep national exhibitions for live-stock exhibit them going. The New Brunswick farmer prizes. The live-stock department will has raised cereals and dairy products have about thirty acres of ground and for long years, but is now awakening to about fifty buildings, besides a grand the fact that his proximity to an ocean amphithenite and arena for an exhibit port would make the fat cattle trade a ring.

paying one for hum

BRITAIN'S BEST, Hamilton, Ontario, June 25th. D. C. FLATT & SON, Millgrove, Ontario. AUCTIONEERS : S. FRANK SMITH, THOS. INGRAM, CAPT. T. E. ROBSON.

In answering any inducrtisement on this page, kindly mention the FARMER'S ADVOCATE.

GOSSIP.

A Texas County (Missouri) lady writes us as follows : "If your Cows bag is caked Jist take a sand rock be careful and notice how it is lying on groond and take it and rub the cows bag good With the side of the stone that was down on the groond and then put it back Jist as it was in 24 hours the Cake will be all ought. I know this to be good try them. If I see this in print I Will come again."

Mr. L. Rogers, Emery, Ont., breeder of Yorkshire swine, writes us under date June 5th: "I was very much pleased with your article, 'Judging Swine,' in last number. Your description of the ideal pig is just what I have maintained for some time. I have argued that the majority of Yorkshire breeders have been fast turning the ideal bacon pig and ideal feeders' pig into the razor-back, unsuitable to both packer and feeder. All that has been said and written on bacon pigs has not been too much for breeders of the American breeds, but the breeders of the ideal York. must not turn their pigs into boards covered with a pigskin and turned with the edge up."

TRADE TOPICS.

BUG DEATH POPULAR.-I have used "Bug Death" on my cucumbers and potatoes, and I never saw anything like it. I intend using nothing else in the future, as it kills the bugs and increases the yield, and will not burn the vines .--W. B. Smith, Fruitland, Ont. I have found that "Bug Death" kills the bugs on the potatoes and the worms on the cucumbers and rose bushes. I could not raise cabbages before, and I now think that my potatoes are larger and more healthful looking. I am very much pleased with "Bug Death," and I intend using nothing else.-George Sheppard; Burlington, Ont. I have used "Bug Death " on my cabbages and cucumbers and on my potatoes. It is far ahead of Paris green. I think that next year the farmers in this locality will use nothing else; there is nothing to equal it .--John Alderson, Carlisle, Ont.

UNDER TWO FLAGS .- The Canadian works of the International Harvester Company, now in course of construction, are located at Hamilton, Ontario, and when completed McCormick machines will be manufactured under two flags-on Canadian soil by Canadian workmen, as well as on United States soil by United States workmen. McCormick machines will be manufactured at the Canadian works for the season of 1904. The company's best efforts, though earnestly put forth. were inadequate to supply the great Canadian demand for the worldrenowned McCormick, but farmers under the Canadian flag are now assured that the facilities for manufacturing McCormick machines will be expanded sufficiently to supply all the machines needed to harvest the grain and grass crops of Canada. McCormick general agencies are located at Regina, Winnipeg, Toronto, Montreal, Ogdensburg and Boston, from which the Canadian trade is supplied. THE DEERING IMPLEMENTS. - A comprehensive and beautifully illustrated description of the new works at Hamilton will be found in a lately-issued pamphlet, on the cover of which, lithographed in effective colors, is the picture of a youth bearing aloft the Union Jack and his stirring motto the words, "I'm British, Too.'' A fine double-page bird'seye view is given of the Hamilton works, and in the introductory sketch of the booklet the statement is made that this establishment is to be the largest of its class under the British flag. There is also an excellent portrait of William Deering, founder of this vast enterprise, and much information of value regarding the buildings at Hamilton and the various implements turned out. Incidentally, it is a plece of typographical workmanship that does splendid credit to the London Printing and Lithographing Company, by whom it was issued. We presume that copies may be had from the Deering invadquarters or any of the agencies.

Assiniboia and Saskatchewan Farm Lands

FOUNDED 1866

DO YOU OWN OR RENT A FARM?

If you own one, does it pay, you well? If it does not, sell it and get one that will

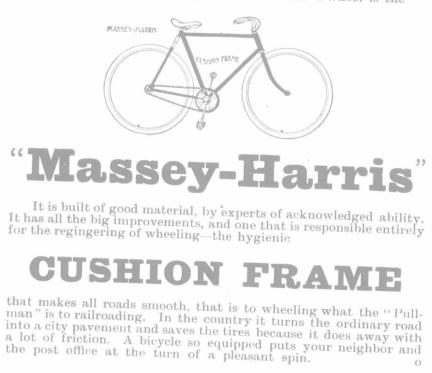
If you rent a farm, why not own one? You can buy now at low prices and on easy terms.

The value of farm lands in the West is going up very fast, and in buying now you will save yourself money at the start, and can profit by the advance. We have properties that may be just your opportunity. Write for particulars.

The Tracksell Land & Investment Company, Limited REGINA, ASSINIBOIA.



We know of no more useful thing on the farm than a good reliable bicycle—one that is made to wear well on rough roads, that is solid in build and easy to handle. Such a wheel is the

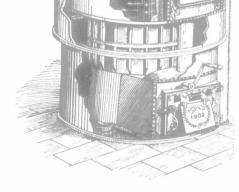


Write for our pretty new "In Bicycledom."

Canada Cycle & Motor Co.

Head Office and Works: TORONTO JUNCTION.

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574

Get an Empire.

Examine all the Cream Separators

on the market; look carefully to their construction; then select the one which you think will do the best

work and give you the least bother. We believe that's the

EMPIRE

Easy Running

Gream Separator,

Guaranteed to run more easily, to be easier to clean and last longer than any other. It's for **you** to decide. Try it first. Get our free book.

Empire Cream Separator Co.

28 Wellington St. W., TORUNTO, CANADA. Service States of Services

ABOUT

HEATING

Is the title of a booklet which we

are sending free to all who ask for

struction of our

Hecla Furnace

It describes in detail the con-

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This furnace gives excellent satisfaction with either

COAL or WOOD.

A special wood grate is supplied without extra charge. Write us for further information.



PRESTON, ONT., AND WINNIPEG, MAN.

O. I. Chester Swine Boars fit for service. Young pigs months old, of good quality. Registered pedi-grees furnished. Write for prices. F. H. REESOR, CEDAR GROVE, ONT.

In answering any advertisement on this page, kindly mention the FARMER'S MOVOCATE.

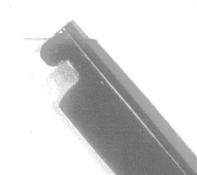
Count the Rows of Stitches



THE 6-inch Veteran Drive Belt has 27 rows of stitches, all other makes have but 23 rows; the 7-inch Veteran has 31 rows of stitches, all other makes have but 27 rows; the 8-inch Vet-eran has 36 rows of stitches, all other makes have but 31 rows. In addition, the Veteran is made from heavier canvas, weighs from 5 lbs, to 10 lbs, more per belt than other makes, and is fully 20 stronger and more durable. Our prices for these Veteran Canvas Drive Belts are 19c, per ft, for the 6-inch size, 21/c, per ft, for the 7-inch size, and 25c, per ft, for the 8-inch size. In addition, we will prepay the freight on all Veteran Drive Belts ordered before July 15th. THE 6-inch Veteran Drive Belt has 27 rows of

July 15th. Our 1903 Catalogue is now ready for distribu-tion, and will be sent to any address on appli-cation. It contains a large number of decided burgains, such as a tank pump complete with strainer, nozzle and fittings. §6.65; cylinder wrench that will fit any tooth, \$5; complete set rasps for Monitor Jr. Clover Huller, \$15; etc. Send for a copy, and ask for our special pro-position to early buyers.

WINDSOR SUPPLY CO., Windsor, Ontario,



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JUNE 15, 1903



The best and safest way to keep Baby's skin healthy is to use only BABY Pure, Dainty, Delicate. Beware of Imitations.

ALBERT TOILET SOAP CO . Mfrs. MONTREAL

COMMON-SENSE FEEDER CALF



This feeder is a simple, practical device for weaning and feedure is a simple, practical device for wearing and feeding calves. It enables you to feed the calf out of a bucket in Nature's old way, and prevents calf from taking its food in gulps, playing havoc with its digestive organs.

"Calves Never Did Nearly as Well." H. Aikin. Griffin, Que.: "In many years' experience I never had so little trouble feeding calves – never had calves do nearly as well, they being large and fit for veal at any time. I would not take \$5 each for the feeders if I could not replace them."

Common-sense Feeder, \$1.75 Double or Twin Feeder. \$2.25 Cows' Relief, ½-lb. box, 50c. Cows' Relief, 1½ lbs., \$1.00 Calves' Cordial, 2-Ib. box, 50c

THE FARMER'S ADVOCATE.

GOSSIP. IMPORTED AYRSHIRES.

Twenty-two head of Ayrshire cattle for Messrs, R. Hunter & Sons, Lachine Rapids, Que., left Glasgow on May 9th. per Allan line s. s. Sicilian. Eleven are from the herd of Mr. R. Montgomerie, Lessnessock, Ochiltree, viz., two two-yearold bulls, four yearling bulls, one threeyear-old heifer, three two-year-old heifers and one yearling heifer. One of the twoyear-old bulls is King of Beauty, bred by the Messrs. Lindsay, Carsegown, Wigtown, and last year, as a yearling, third at Ayr. He was then shown at the Highland at Aberdeen, where he was placed second. He has not been shown since, but has done well, and looks like developing into a great bull. His dam, Queen of Beauty, won leading prizes as a one- and two-year-old, and Mr. Hunter considers her the finest specimen of an Ayrshire dairy cow that he has ever looked upon. She was also dam of the great breeding bull, General Buller. The sire of King of Beauty was Mischief Still, out of the same dam as Traveller's Heir, one of the best breeding bulls going. The pire of Mischlef Still was Mischlef Maker, out of May Mischief, one of the best twoyear-old heifers ever seen, and a great dairy cow. King of Beauty has great blood on both sides, and cannot fail to prove a breeder of the highest class of dairy animal. His get are looking promising. The other is Rare Style's Heir, bred by Mr. R. Montgomerie, and got by the champion bull, Rare Style of Saturland. His dam is one of the best dairy cows in the Lessnessock herd, and is a daughter of Snowdrop and Sensation, the two champion two-year-olds in 1897. Rare Style's Heir was first and champion at Ochiltree, and fourth at Ayr this year. From his breeding, he cannot fail to prove a breeder of great, thick dairy animals. The four yearling bulls are sired by Rare Style of Saturland, and are out of heavy-milking dams. One of them is out of Snowdrop, the dam of the two-year-old bull, Snowdrof. She, last year, gave birth to three bull calves. Two are still alive, and one of them is being retained as a stock bull at Lessnessock. One of the two-year-old heifers, sired by General Blucher, was first as a one-year-old at Ochiltree last year, and also first this year, and third at Ayr. The other two two-year-olds are sired by Rare Style of Saturland. Alice, the dam of one of them, was third in the Ayr nilking competition Mr. Hunter bought a heifer out of the same dam five years ago, which was the highest tester amongst the Ayrshires at the Pan-American Exposition at Buffalo in 1901. The yearling heifer is also sired by Rare Style of Saturland, and looks like making a fine cow. One yearling bull goes from Mr. Robert Reid, Bonshaw. He was second at Stewarton Show, 1902. He should make a fine bull with a little more age. From Mr. Sloan, Treesmax, is taken one five-year-old cow, calving in June. She is a great, thickbodied cow, with short legs and fine bones, and looks particularly well below. The three-year-old heifer calving in June was secured from Mr. Grieve, Kirkland. She has only once been shown, when she obtained first at New Cumnock this year. She is a great size, with large, soft teats, and a fine silky skin, and shows great substance. From Mr. Wardrop, Garlaff, was bought one two-year-old heifer, calving in June. Last year she was first at Kilmarnock and second at the Highland, Aberdeen. She has developed well since then, and shows great, soft teats. From the herd of Mr. Baird, Garclaugh, there goes four cows and three calves. One of the cows, Bloomer 11. of Garclaugh, was second as a one and two year-old at New Cumnock, three firsts as a three-year-old in 1900, and four firsts as a cow in milk in 1901. The other three cows are four-year-olds, and have all taken leading prizes at New Cumnock, in the yeld stock, milk stock, and commercial classes. The three heifer calves are out of big. deep, milky cows, and should some day make winners -Scottish Farmer.



Arabian Scratches and Gall Cure, 25c. and 50c. boxes.

Send for Catalogue of Above,

FRED. HAMILTON 65 KING ST., HAMILTON, ONT. Hardware, Etc.

FOR SALE: The best Ranch Farm in Alberta,

Within 20 miles of Calgary, comprising 3,000 acres. Would make an ideal thoroughbred stock ranch. Soil rich dark loam, all well fenced; unlimited supply of running water winter and supply of running water fenced: unlimited supply of running water winter and summer. First-class ranch house, well finished. Frame stable for 20 horses; large granary, with windmill and grain crush-er; implement shed and first-class outfit of farm implements, wagons, sleighs, harness, etc.; cattle shed 450x30 ft.; cattle shed 300x20 ft. Water running in troughs through corrals never freezes. 200 acres seeded to Brome grass and timothy; 1:50 acres grain crop, in addition to which 1,000 tons of natural hav can be cut. to which 1,000 tons of natural hay can be cut. Going at a BARGAIN.

Westbrooke

20 miles north of Cochrane, 35 north-west of Calgary. 180 acres freehold, 1,600 leased; well fenced and cross-fenced. 100 acres to Brome grass and timothy, 60 under crop; good trout stream giving plenty of water and fishing; good hou c on stone foundation and cellar; sink and nump in kitchen. Extensive stables and other buildings, machinery, etc. Irriga-tion ditch belonging to property. At \$7,700. Further particulars about country and other bargains, write A. C. SPARROW. Live Stock Exchange, Calgary, Alta.

AGENTS IN EVERY TOWN IN ONTARIO. SEND FOR TESTIMONIALS.

The Superintendent of the Provincial Government Farm at Truro, Nova Scotia, tested it beside all other known remedies, and EUREKA was proven superior. Read what this well-known English authority says:

THE J. H. ANES CO., BOWDOINHAM, MAINE: GENTLEMEN,— This is to certify that I have used all the known remedies for prevention of flies, and consider EUREKA FLY KILLER superior to all others. Supt. Gov't Farm.

GENTLEMEN,—I found your Fly Killer and Sprayer to be all it was recommended to be. After I began using it my cows came out much in their milk. I have much pleasure in recommending it to those who have not yet used it.

Can you question which is best after reading the above?

We sell all kinds of Sprayers. The best in Canada for Fly Killer is the "ELECTRIC."





LAWTON SAW COMPANY, Ltd., MANUFACTURERS, ST. JOHN. NEW BRUNSWICK.

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from the herd of W. I. Wood, Williamsport, O., last week, 45 animals averaged ine, \$755; Gloster Girl, \$740; Imp. 37th Duchess of Gloster, \$500; bull, Bapton Lovat, \$500; Phyllis Abbottsburn, \$495; Caprice, \$405; Fairy Morning, \$360; Sweet Orange and Queen Anne, \$305 each; bulls, Kelly's

head, contributed by F. L. Studebaker, averaged \$226. Another contributor made an average of \$174; others up to \$100. The best prices were \$525, for Choke Cherry; \$450 for Gay Lass; \$400 for Corrector Lad; \$380 for Lucy

Mr. Robert Reford, St. Anne de Bellevue, Quebec, who has been in Scotland during the past few months making selections of high-class Ayrshires for Mr. Reford's herd, has returned with fifteen head, among which, says the Scottish Farmer, are several outstanding animals, including Fizzaway, the first-prize two-year-old bull at Ayr, bought from Mr. John M'Alister, Ardyne; the third-prize two-year-old quey at Kilmarnock, and the first-prize two-year-old at Symington, Ayrshire, from Mr. R. Taylor, Wexford ; four wellbred animals of deep-milking strains from Mr. Robert Wallace, Auchenbrain-one a great cow, and the others heifers that will surely be heard about; a bull calf from Mr. Thos. Howie, Fairfield Mains; a bull calf from Mr. Cross, of Knockdon the champion two-year-old at Girvan last year from Mr. William Dow; a quey from Mr. Jas. Howie, along with Fizzaway; and two deep-milking Ayrshires from Mr. Littlejohn, Genoch. The reputation of these animals has been tested in every possible way, and if they do not turn out well, it is not Mr. Boden's fault.

TRADE TOPICS.

STANDARD SCALES for weighing all classes of farm produce, such as cattle, hogs, hay, dairy products, are offered at fair prices by Mr. Geo. Fox, York St., London, Ont., whose advertisement appears on inside front cover page of this paper, and who will give prices and particulars to those who write for same.

NEW SEPARATOR CATALOGUE. -From Campbell, Arnott & Co., 186-188 King St., East, Toronto, Ont., we have received a copy of the newly issued catalogue of the Princess Cream Separator, a machine exclusively of British design and manufacture, now being introduced to Canadian dairymen. It appears to be an exceedingly simple and efficient separator, and in view of the enormous number of hand separators cominge into use in Canada and the $\mathbf{U}_{*}^{\mathbb{R}}\mathbf{S}_{*},$ decrement would do well to make enquiry for the catalogues in order to acquaint theme selves with their merits.



We make them to run on steel, wood, rod or cable track. We make the best line of Barn-door Hangers on the market, Write for catalogues and circulars,

Louden Machinery Co., Guelph, Ont.

CLYDESDALES

Worth three times as much.

works easy and never misses. Will fill your barn FULL, and never bind on the track nor break the fork pulley. Twice as strong and durable as ordinary car-riers.

15 Different Styles to Choose From

A Specialty.

Another important importation of stallions and mares may be looked for in August. Intending purchasers will do well to see our horses, as we import the best. Quality, with sufficient size, is our motto.

WM. COLOUHOUN, Mitchell P. O. and Station (G.T.R.), Ont.



New importation of prizewinners of the various breeds will arrive in August. Buying orders executed on commission,

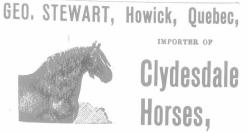
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are now offering several imp. Clydesdale, Shire and two Hackney stal-

England, Scotland, and Canada, and represent-ing the best blood alive; also several choice Canadian-bred ones. These animals are all true to type, and possess substance, quality, style and action. om



has now on hand for sale 2 three-year-olds, 3 twoyear-olds and 1 yearling stallion (all imported), carrying the blood of Baron's Pride, Mairs of Airies, Darnley and Prince of Wales, combining size, style, quality and action. The best lot I ever imported. Write quick.

GEO. STEWART, Howick, Quebec.

A sale of Poland-China hogs at Pekin, III, last month, aggregated \$13,535. Top price was \$2,000 for Miss Keepon and litter of six pigs, bought by Miss Amelia Jacobs, of Kankakee.

JUNE 15, 1908 THE FARMER'S ADVOCATE. "A FREE SAMPLE PACKET" GOSSIP. At a combination sale of Poland-China of Delicious "SALADA" Ceylon Tea hogs at Disko, Ind., May 22nd, 68 animals sold for nearly \$20,000; average, (Black, Mixed or Natural Green) will be \$285. Top price was \$1,700 for a sow. sent to any person filling in this coupon Two others brought \$1,000 and \$840. and sending it to us with a two-cent stamp TOLTON & SON'S SHORTHORNS AND (Write plainly and mention Black, Mixed or Natural Green.) for postage. OXFORDS. A drive through the big and bountiful County of Bruce in Old Ontario in June Name is a genuine treat as experienced by an "Advocate" representative, who, recent-Address..... ly, in travelling in that district, had the pleasure of a short visit at Springbank, "Farmer's Advocate." Address "SALADA" TEA CO., TORONTO. the fertile and well-kept farm of Messrs. James Tolton & Son, of Walkerton, where a nice herd of up-to-date Shorthorns and a good flock of registered Oxford Down sheep are maintained. The herd is headed by the excellent roan LA FAYETTE yearling imported bull, Prince Homer, STOCK FARM. bred by Mr. Sylvester Campbell, Kinellar, Aberdeenshire, sired by the Sittyton J. Crouch & Son, Props. Secret bull, Knight of Strathbogie 2nd, a son of the Cruickshank Clipper bull, Importers of all breeds of Prince of Sanquhar, dam Phyllis, by the Duthie-bred Scotland's Fame, whose dam Shire was by the noted sire, Scottish Archer. With such high-class breeding at his back, We are the largest Import-ers and Breeders of Olden-burg German Coach horses in America. We also import Draft horses of all kinds, in-cluding Belgring Clydes. Prince Homer could hardly fail to be what he is-a typical Scotch Shorthorn, low-set, compact, strong-backed, with well-sprung ribs, thick flesh evenly Cluding Belgians, Clydes-dales, English Shires, and Normans. 359 head of Coach and Draft stallions imported in last 15 months. 0 distributed, smooth shoulders, full crops, a strong but handsome masculine head, and standing well on a good set of legs. He is a fitting follower of the massive La Fayette, Ind.,U.S.A. and richly-bred Heir of Hope, the latelydeposed head of the herd, a prepotent Terms easy. All stock guaranteed. and impressive son of imported Blue Ribbon and imported Cleopatra, of the Kinellar Claret tribe. Among the many JOHN BRIGHT, MYRTLE, ONTARIO, excellent females in the herd may be noted the level-lined and well-fleshed four-BREEDER OF year-old imported Sybella, of the Sitty-**Clydesdales and Shorthorns**, ton Secret family, bred by Col. Munro. Aberfeldy, sired by Prince of Pitlivie (71246), and out of Sarcasm, by Cum-Is now offering for sale 8 stallions, sired by berland. Sybella has signalized herself such horses as Prince Patrick (imp.), Erskine's since her advent in the herd by present-Pride (imp.), Sir Erskine (imp.), Royal Lauring to her owners handsome twin heifer calves, born in September last, thus ence (imp.). Also a number of mares and fillies. Shorthorns of all ages, of such families as proving the seemingly unsolvable problem in subtraction-two from one-and three Miss Ramsden, Clementina, Strawberry, Crim-Secrets remain to bless and beautify the son Flower, Village Girl, Stamford, Rachel, herd. Imported Miss Howie 6th, a red

etc.

Myrtle Station, G. T. R. and C. P. R.

Farm connected by long-distance telephone.

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four-year-old cow, bred by Mr. Geo.

Cockburn, Keith, Banfishire, and sired

by the Duthie-bred Abbotsford 2nd, is a

straight, smooth, breedy-looking cow of good type that is proving her usefulness

by breeding regularly and well, having

to her credit here the good red yearling

AXXAGE AND DESCRIPTION OF

'RUMAN'S PIONEER STUD FAR

BUSHNELL, ILL.,

Has for 24 YEARS been headquarters for the CHOICEST

SHIRE, PERCHERON, SUFFOLK AND HACKNEY

STALLIONS.

Last importation received February 25th, 1903.

20 to 30 Good Practical Salesmen Wanted.

Best lot of draft stallions in the United States or Canada. Notwithstanding the superior quality of our horses, it is a fact that our prices are lower than can be obtained elsewhere in America. If there is no first-class stallion in your neigh-borhood, please write us. For our 24th annual catalogue, etc., address—

J. G. TRUMAN, Manager,

BUSHNELL, ILL.

Imp. Clydesdales 🝻 Shorthorns

Messrs. Smith & Richardson,

COLUMBUS, ONT.,

Importers and breeders of Clydesdale horses and

Importers and breeders of Clydesdale horses and Shorthorn cattle, are now offering 14 stallions, 9 of them imported, including brothers of the world-re-nowned Baron's Pride, Hiawatha, and Royal Cairn-ton; also 13 mares bred from imported stock. Short-horns, imported and home-bred, all ages. Stations:

GOSSIP.

The Rev. Dr. Gillespie, Mouswald Manse, Dumfriesshire, well-known as editor of the Galloway Cattle Herdbook, and in his capacity as a leading director of the Highland and Agricultural Society, is this year Moderator of the General Assembly of the Church of Scotland. The Reverend Doctor was cordially elected to the position at the opening meeting of the Assembly in Edinburgh on Tuesday.

Last month, Messrs. Hunter, of Lachine Rapids, Montreal, sailed from Glasgow with an exceptionally good shipment of Ayrshire cattle which they had purchased during a few weeks' visit to Scotland. The shipment numbered no fewer than twenty-two head, eleven being from the herd of Mr. Robert Montgomerie, Lessnessock, Ochiltree. Messrs. Hunter's other purchases included a very good fiveyear-old cow from Mr. Sloan, Treesman. and four cows and three calves from Mr. Baird, Garclaugh. They also bought a prize heifer from Mr. Wardrop, Garlaff. The whole shipment was made up of particularly serviceable, well-bred animals.

Stock-breeders have reason to fear the course of living and training which tends to destroy the ancestral instinct of their animals. When the conditions of life are made by far too easy for female animals they tend to breed irregularly, or to cease from that function entirely, because nature wisely decrees that the young are not to be subjected to risks and neglect. A "natural life," as it is frequently termed, is practically impossible with animals which are housed. The term is a contradiction when applied to conditions which imply human restraints and control. Still, there may be an approximation to phases of natural lifefresh air, light and sunshine, freedom from extra coddling, and fair choice of food.

A MIXED FAMILY.

An Egyptian correspondent sends a report of a strange pair of twins foaled upon the Aboukir Land Co.'s mule-breeding farm. A large Syrian donkey is used for crossing on the Egyptian countrybred mares. One of the latter gave birth recently to twins, one of which is a perfect horse foal and the other a strong female mule, with all the characteristics of the mule well developed. They are living side by side in peace and joy, the maternal instincts of the dam being unaffected by the incongruity of her offspring, each receiving an equal share of the maternal attentions.

TRADE TOPICS.

BALING PRESS.-After a good crop of hay is secured the next problem is

FOUNDED 1866

What It Means To Lose Weight

And Flesh and Feel Strength and Vitality Steadily Declining -You Can Add New Firm Flesh and Tissue by Using

Dr. Chase's Nerve Fcod

While it may not be natural for every person to be fleshy, there can be no doubt that a steady loss of flesh and weight is one unmistakable sign of a wasting away of the body and a decline of health and vigor. 'As the cause of wasting disease is almost always due to the fact that the blood does not obtain sufficient nourishment from the food taken into the system, some means of enriching the blood must be resorted to, and in the connection we are brought to mention Dr. Chase's Nerve Food.

Can you imagine a more severe test of any preparation than that of adding firm flesh and increasing the weight of the body ? It is possible, of course, to add fat by the use of fish oils, but the tissues created by the use of Dr. Chase's Nerve Food are firm and natural. The blood is thoroughly enriched and the nerve force replenished. Pallor and weakness give place to a healthy complexion and strength of mind and body. Languor and discouragement are driven out to make way for vigor, new hope and confidence.

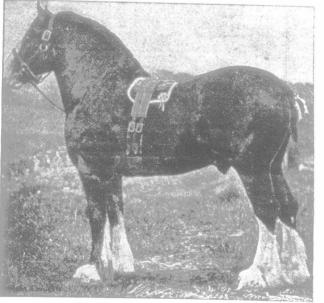
It might be worth your while to make a test of this great food cure as a builder of flesh and muscle. Note your weight when beginning the use of Dr. Chase's Nerve Food and watch the gradual increase week by week. At first the increase may be slight, owing to the wasting process, which must be stopped. Then, naturally and certainly, the whole system is built up, and perfect health and vitality restored to every part of the body.

Dr. Chase's Nerve Food, 60 cents a box, six boxes for \$2.50. At all dealers, or Edmanson, Bates & Co., Toronto.

To protect you against imitations, the portrait and signature of Dr. A. W. Chase, the famous recipe-book author, are on every box of his remedies. om







578

ROBERT BEITH. ager, Guelph, Ont. BOWMANVILLE, ONT.,

IMPORTER AND BREEDER OF Clydesdale Hackney Horses advt.

Is offering for sale a number of choicely-bred Clydesdales and Hackney stallions; also a number of Hackney mares. The Clydesdales are sired by the noted horses, Prince of Albion. King of the Roses, Lord Stewart and The Prior om

4VM

ROSEDALE STOCK FARM. IMPORTED SHIRE and CLYDESDALE HORSES. SHORTHORN CATTLE and LEICESTER SHEEP.

Newnham Duke, the gold and silver medal four-year-old Shire stallion, and the imported Clydesdale stallion, Royal Kerr, in service; also Clyde and Shire stud colts for sale. Imp. Chief Ruler, bred by W. S. Marr, heads the Shorthorn herd. Of the females, 15 are imported, from such families as Marr Missies, Strathallans, Jeabous Girls, Crimson Flowers, Orange Blossoms, Wimples, Lovelys, Jilts, Secrets, Verbenas, etc. Farm 15 miles from Toron-to, on G. T. R. and C. P. R. Post office, telephone and telegraph. J. M. GARDHOUSE, Weston, Ont.

marketing, and at this point the baling process steps in. For particulars re the Dain Pull Power Baling Press, note advertisement in this issue of the Dain Manufacturing Co., Fred R. Shanz, man-

STEEL TROUGHS.-W. Gordon, who is manufacturing and placing on the market heavy steel hog and water troughs, is meeting with great success. They are an article that has long been wanted by Canadian farmers. These troughs are to all practical purposes indestructible, as they are made very heavy and very strong. Just to show how they go, one of his agents in a small village of 900 inhabitants has purchased 1,000 feet this spring. Read his

FOR THE DENVER C. E. CONVEN-TION.-Very low excursion rates have been arranged from all points in Canada to Colorado, leaving July 6th, 7th and 8th. good for return up to August 31st. Everybody can go. The rate is wide open, and this is a splendid opportunity to spend a vacation among the Rockies at slight expense. The Chicago, Milwaukee and St. Paul Railway and con nections will run special Standard Firstclass and Tourist Sleeping Cars through to Denver, besides the regular daily service from Chicago. For full information, time tables, pamphlets, rates and sleeping car reservation, write to A J. Taylor, Canadian Passenger Agent, 8 King St. East, Toronto, Ont.

In answering any advertisement on this page, kindly mention the FARMER'S ADVOCATE.

JUNE 15, 1903 THE FARMER'S ADVOCATE. REMEMBER : Free-for-all (Trot or Pace).

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Purse, \$2,500.00. Citizens' Purse (11 dash). Winnipeg Purse, \$1,200.00. ndustrial 2 10 Trot, 2.15 Pace. Purse, \$700.00. Exhibition, 1903 2.15 Trot, 2.20 Pace. Purse, \$500.00. And 21 other Speed Events. JULY 20-25 **BIGGER AND BETTER THAN EVER** \$50,000 in Prizes and Attractions. J. T. GORDON, PRESIDENT. **STOCK-BREEDERS:** F. W. HEUBACH, GEN'L MGR. Winnipeg, Man. "THE INDUSTRIAL" draws the people. The people buy your stock. Be sure and be in it. SPECTACULAR! **MANUFACTURERS:** An exhibit of your Goods at "THE INDUS-Acrobatic feats each evening TRIAL" last year was inspected by 100,000 and afternoon. visitors. This year we promise 150,000. "FROM DARKNESS TO DAWN," one of the leading events, with fireworks each ev'g, and a score of other numbers.

Men Wanted If you desire a really profitable line, send us your name with reference, and if force. We always have openings for good men at good pay. o STONE & WELLINGTON, "Canada's Greatest Nurseries," Toronto. Standa's Greatest Nurseries," Toronto. Standa's Greatest Nurseries," Toronto. Standa's Greatest Nurseries," Toronto. Standa's Greatest Nurseries, "Toronto. Standa's Greatest Nurseries, "Toronto.

GUERNSEY BULL

For Sale.

ISALFIGH YORK No. 7354; three years

old; grand animal. Very best dairy type. Apply

Queenston Heights Shorthorns IMPORTED DERBY = 32059 = 160224 FOR SALE. If you want a really first-class bull, call or write.

FOUR BULLS (red). Ury and Stamford dams, sired by Squire Wimple, winner of first here and British Columbia; now owned by Mr. Ladner, Ladner's Landing. om ROBERT BAT'I Y. Glenbournie Farm. Meaford P. O. and Sta. T. DOUGLAS & SONS,

BREEDERS Shorthorns and Clydesdales

88 Shorthorns to select from. Herd bulls (Imp) Diamond Jubilee =28861= and D.ubile Gold =37851=. Young bulls, cows and heifers for sale at all times. Also one (imp.) stallion and two brood mares. om

ROSEVALE SHORTHORNS. Herd comprises Augustas, Polyanthus, Crimson Flowers, Minas, Strawberrys and Lavinias. For sale, both sexes, the get of Imp. Marengo Heydon Duke, Imp Baron's Heir, Imp. Golden Able and Imp. Golden Conqueror.

the situation numerically of the herd of Messrs. H. Cargill & Son, of Cargill, Ont., and is a sight seldom seen on one farm in America. To be shown cows and heifers of the various ages by years in groups of a score and a half instead of in half dozens, as usually seen, gives the impression of a wholesale business, but the pride of the place is not in numbers so much as in the quality of the individual members of the herd and in the character and breeding of the sires in service. And in this latter respect the herd is singularly well equipped, the list being headed by the red four-year-old Duthie-bred Golden Drop Victor (76780), whose breeding, as shown in the very complete catalogue of tabulated pedigrees of the herd issued by the firm, is a happy blending of the two favorite Cruickshank families, Nonpareil and Golden Drop, with a long line of noted sires on side of both sire and dam, bred by Cruickshank, Duthle and Marr, whose names stand for all that is superior in judgment in the evolution of the approved modern type of Shorthorns. But Golden Drop Victor's character is read not alone in his pedigree and the excellence of his ancestry, though these are a backing to his superior individuality not to be lightly estimated, for in his personal make-up he certainly has few equals in any country, smooth, substantial and symmetrical, standing squarely on good legs, his well-sprung ribs and strong loin deeply covered with natural flesh, level in his quarters and full in his thighs and buttocks, his flanks, fore and aft, full and well let down, his neck strong and muscular, his head masculine and imposing. he combines all the requisites of an easyfeeder and a superior sire, as seen in his offspring. His lieutenants in service are the two excellent two-year-old Collyniebred Missie bulls, Lord Mistletoe, red. and Merchantman, roan, both sired by the noted Lovat Champion, bred by Lord Lovat, and their dams by Dauntless and Scottish Archer, both bred by Amos Cruickshank. Prince Royal, a roan twoyear-old Marr-bred bull, also in use, is a capital representative of the Princess Royal tribe on his dam's side, and of the Lavender family on his sire's side,

GOSSIP.

A herd of 154 head of pure-bred Short-

horns, 127 of which are imported, and

the balance, with one exception, the prod-

uce of imported sire and dam, sizes up

THE CARGILL SHORTHORNS

579

being got by Lavender Victor (76994), and his dam by the noted William of Orange. Another excellent imported bull in service is the ro Lavender Star, a son of the Marr-bred Missie bull, Golden Star, out of Lavender Thyme 3rd, by Prince of Fashion, by Scottish Archer. Of the 31 bulls named in the pedigree of Lavender Star in the catalogue, it is notable that 27 were bred by Amos Cruickshank, two by Mr. Duthie and two by Mr. Marr, and all were of outstanding character. With such a list of bulls judiciously mated with the grand collection of cows and heifers recently seen by the writer revelling in the rich pastures of the Cargill farm of 600 acres in the valley of the gently-flowing Teeswater River, it goes without saying that the young things found in the paddocks and in the boxes in the commodious barns are typical of the best of the breed, and as one strolls through the pastures by the river-side, he is reminded of the original home of the Shorthorns in the valley of Tees of Old England: The females were found in bunches of about thirty in a field. First, a contingent of milking matrons nursing their lusty calves, sons and daughters of the worthy list of sires named ; next, a group of dry cows coming due to calve in the early autumn: then, a bevy of buxom two-year-old heifers in calf enjoying a sun bath on a carpet of blue grass; and then, perhaps the most interesting of all, a galaxy of pretty yearlings in mossy coats of red and roan, with here and there a lilywhite, not far from being the best, and without which there could be no roans. Among so many good ones, comparison would be invidious, and individual mention in the limits of the space allotted is out of the question, and our notes are



(Continued on page 580.)

In answering any advertisement on this page, kindly mention the FARMER'S ADVOCATE



In an arrive any advertisement on this poper kindly mention on FIANERS WILLERGETE.



BARN OF F. H. EICHENBERGER, DELAWARE, ONT. Size, 36x46 feet. Basement built with Thorold Cement

Read what Mr. Eichenberger says:

1866

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Estate of John Battle, Manufacturers of Thorold Cement, Thorold, Ont., December 22, 1899. Gentlewen.—It gives me great pleasure to testifue to the good qualities of your Thorold Cement. I built a barn, Szeb fect, in the wall of which I used Scharrels of your Thorold Cement, and consider I have a first-class job-better and cheaper than either stone or brick. Yours Iruly, F. H. EICHENBERGER.

EST. JOHN BATTLE, (Manufacturers of Thorold Cement.) THOROLD, ONT.

Clydesdales estate, have been sold, at the prices placed on them by Mrs. Jones before her death, to Mr. James Parker, of Salem, and Berkshires N. Y. We breed our show cattle and show our breeding we breed our snow cattle and snow our breeding cattle. The imported bulls, Scottish Beau, Viceroy and Scottish Peer, head the herd. Imported and home-bred cows and heifers for sale. FIVE LAMBS AT A BIRTH. The Scottish Farmer has recently

chronicled the fact of several Blackface ewes dropping four lambs apiece, but a hill ewe in Glenlyon has outdistanced all competitors. Last year this ewe dropped four lambs, but, not content with this, she has this season five youngsters romping at her side.

A few choice young bulls on hand, Our herd at Toronto won three firsts, a second and third out of five herd classes. om Salem P. O. and Telegaph Office. Elora Sta., C.P.E., G.T.E. SHORTHORNS. Importer and breeder of choice Shorthorns. Scottish Hero 156726 at the head of herd. om JAS. A. CRERAR, Shakespeare, Ont

In answering any advertisement on this base, kindly mention the FARMERS ADVOCATE.

FOUNDED 1866

PENNABANK STOCK FARM Three choice Shorthorn bulls from 12 to 14 months old, solid reds. Prices reasonable. Also a few Shrop-shires left, of choice quality and breeding. Hugh Pugh, Whitevale, Ont. om

SHORTHORNS and CLYDESDALES. We have for sale five bull calves, from 8

to 24 months, from imp, sire and dams; also six extra good stallions, from two to six years old.

JOHN MILLER & SONS, BROUGHAM, ONT. CLAREMONT STATION, C. P. R. om

SHORTHORNS (IMP.)



582

Cows and heifers, imp. and home - bred. Bulls, imp. and home - bred—all ages. Representing the fashionable blood of Scotland.

EDWARD ROBINSON, MARKHAM P. O. & STN.

Have for sale, at moderate prices, imported heifers and cows, with calves at foot or in calf to Bapton Chancellor, imp. (recently imported from Uppermill). Also Canadian-bred heifers and young cows. om H. J. DAVIS, WOODSTOCK, ONT.

Shorthorns, Berkshires and Leicesters. FOR SALE: Choice two-year-old heifers, well gone in calf; also yearling heifers, bull calves. Boars and sows fit for breeding, and young pigs. om ISRAEL GROFF, ALMA, ONTARIO.

A RTHUR JOHNSTON,

GREENWOOD, ONTARIO,

Offers for sale at times' prices, 6 young SHORTHORN BULLS, from imp. dams and by imp. sires.

6 YOUNG BULLS, of purest Scotch breeding.

10 YEARLING and 8 TWO-YEAR-OLD HEIFERS.

Pickering Station, G. T. R. Claremont Station, C. P. R.

SHORTHORNS.

THORNHILL HERD. ESTABLISHED 27 YEARS.

Imp. Royal Member and Sailor Champion now at head of herd, which are all bred on straight Scotch lines, and are of the up-to-date kind. Present offering : some choice young bulls. om

REDMOND BROS., Millbrook Sta. and P. O.

BONNIE 40 rods north of Stouffville station, offers Scotch Shorthorns; choice Shropshires and Berkshires from BURN imported and Canadian-bred sows. STOCK All at farmers' prices. Inspection FARM. invited.

D. H. RUSNELL, STOUFFVILLE, ONT. Grove Stock

What J. G. Truman Says About Zenoleum Dip:

"We have used Zenoleum for the past year in our different barns and have never found anything that is as good a disinfectant as it is. We wish to disinfect the cars which we snip to the International and will you please send me five gallons of Zenoleum at once."

Send for copies of "Zenoleum Veterinary Advisor" and "Piggie's Troubles" and see what others say about it. Books mailed free. Sample gallon of Zenoleum \$1.50, express prepaid. Five gallons \$6.25, freight prepaid. ZENNER DISINFECTANT CO., 113 BATES STREET, DETROIT, MICH.

DE LAVAL

It is impossible that DE LAVAL Cream Separators have attained by accident the position they hold throughout the dairy world-the accepted standard by which all other separators are measured and judged.

Superior in principles of construction, superior in materials used, superior in workmanship, for twenty-five years the name DE LAVAL has been synonymous with supreme excellence in cream separators.

There are no others "just as good."

THE DE LAVAL SEPARATOR CO., 77 YORK STREET, TORONTO.

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GOSSIP.

Messrs. R. Mitchell & Son, Nelson, Ont., in writing for change of ad., make mention of the young Shorthorn bulls they are offering, which are good ones, thick and smooth and in nice condition. with their pedigrees on their backs, one being of the popular Uppermill Red and Roan Lady tribe, Prices will be made right if taken soon, as box-stall room is needed to accommodate the large crop of calves.

Mr. J. B. Hogate, importer of Clydesdale, English Shire and Hackney stallions and Spanish Jacks, Sarnia, Ont., in ordering a change in his ad., writes : "I am pleased to report business has been very satisfactory this year, and I am satisfied that my ad. in your paper has been worth thousands to me in my business. I expect to sail for Scotland, England and Spain about July 10th to buy my stock for my next fall and winter trade, returning about September 1st. My business promises to be larger than ever next season."

J. & W. B. Watt, Salem, Ont., report the following as among recent sales of Shorthorns from their noted herd : To James Snell, Clinton, Ont., the imported yearling bull, Scottish Peer, who was our chief stock bull last year, and his stock are of the right kind. We have been very successful in past years with calves at the leading shows, and think we have as good a lot if not better this year than usual. Mr. Snell has bought several bulls from us, but none that will give him better satisfaction as a stock bull than Scottish Peer. We have shipped to British Columbia the two young bulls, Red Emperor and Proud Lad. Our herd of some ninety head are all out on the pasture, and never looked better, and as we are not going to show this season we will sell some of our show things, both imported and homebred. The country hereabout looks grand. Everything is farther advanced than usual, and as the crop was put in in the best of condition there is every prospect of a good harvest.

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UNCOMMON LAMBS. Mr. Alex. Gamley, well-known to many of our readers as a breeder of Leicester heep, who live few miles from Bra don, Man., recently hired an Englishman to help him on the farm, and towards evening Mr. Gamley, after pointing where the sheep were feeding and showing his young helper their quarters for the night, told him to house them and then come in for supper. Mr. Gamley, who, by the way, is a bachelor, went to prepare the evening meal, and then it was ready, looked out to see wha, was detaining his hired man, but, as he could not see him, concluded to begin his supper, expecting his companion to arrive at any moment. Mr. Gamley got through eating, and still no Englishman appeared, so he put on his hat and went out to see what was the cause of the delay. Before he reached the stable he met his hired man, hat in hand, coat over his arm, perspiring freely and breathing these long, deep breaths which only come through extra exertion of some kind. "Did you have any trouble with the sheep ?" aked Mr. Gamley. To which the reply came. 'No, not with the sheep, but I had an awfal time with the lambs. They were so wild I could scarcely get them in." The lambs !" exclaimed Mr. Gamley, in 🗤 surprise. "Why, there won't be any for nearly a month !" " Oh, but you are mistaken," said the Englishman, "there are eleven, and I had an awful time to catch them !" With that Mr. Gamley hurried to find out the true facts, and when he looked into the pen, lo and behold, eleven jack rabbits had been penned up with his sheep.

Shorthorn Cattle and Lincoln Sheep.



HERD prize and sweep-stake at Toronto Industrial Exhibition, three years in succession. Herd headed by the Bruce Mayflower bull, Bruce Mayflower bull, Prince Sunbeam, imp. Present crop of calves sired by Imp. Wander-er's Last, sold for \$2,005. High - class Shorthorns of all ages for sale. Also prisewing Lincolar prizewinning Lincolns. Apply om

-om

T. E. ROBSON, ILDERTON, ONT. SCOTCH SHORTHORNS AND SHROPSHIRES.

Present offering :--Have still on hand one bull and four heifers, and a few cows. Shropshires of both sexes and all ages. om BELL BROS., Bradford P.O. and Station.

SHORTHORNS. Lady Fannys and Beautys for sale 5 bulls, from 6 to 14 months old; 7 heifers, from 1 to 3 years old, some of them in calf to Prince Eclipse 33049.

James Caskey, Tiverton P.O., Kincardine Sta.

Shorthorn Cattle, Lincoln Sheep

Imp. Prime Minister at head of herd. Imp. Clippers, Miss Ramsdens, and other Scotch families. Lincolns won more than half the money and first for flock at the Pan-Ameri-can; International, Chicago, 1901 and 1902.

J. T. GIBSON, OM DENFIELD, ONT.

GRANDVIEW SHORTHORNS Are made up of Floras, Meadowsweets, Mary Booths and Roan Duchesses, For sale, 3 bulls, extra nice, thick animals, sired by Fergus Chief, Royal Beau and Golden Count; also a few females. J. H. Black & Son, Allanford P. O. & Station.



BUILT FOR P. CRERAR, MOLESWORTH, HURON CO., ONT. 14 feet in diameter and 30 feet high, with

"RATHBUN'S STAR" BRAND MANUFACTURED BY The Canadian Portland Cement Co., LIMITED

SOLE SALES AGENTS : THE RATHBUN COMPANY 310 and 312 FRONT STREET WEST, TORONTO, ONTARIO """"

In answering any advertisement on this bage, kindly mention the FARMERS ADVOCATE,



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THE FARMER'S ADVOCATE.

WILL DO. It will increase the yield of butter about 1 lb. per week, and about 30 to 60 lbs. per year, and will pay 8% on its cost price annually with one cow, and pay for itself in one year with 12 to

WHAT THE

NATIONA

ow, and pay for itself in one year with 12 to 15 cows. It will be placed on trial beside any other cream Separator and prove to be superior in construction for convenience, easy operating, cleaning, close skimming, quality of cream and butter, style, fine finish and lasting service. The only Cream Separator having its bown canada under the supervision of the best Cream Separator experts obtainable. The bowl is not filled with innumerable com-plicated parts to adjust and wash every time ti sused. It has no stable tainted, enamelled charged, that requires hot water at the barn to wash it every time it is used. The National is designed for convenience and in other Cream Separators. A sample machine sent for a free trial to prove all that is claimed NATIONAL No. 14.

NATIONAL No. 1A. Capacity, 450 to 500 lbs. per hour. NATIONAL No. 1. Capacity, 330 to 350 lbs. per hour. NATIONAL B. Capacity, 250 lbs. per hour.

Give the National a trial. Send for particu-lars to any of the following general agencies:

The CREAMERY SUPPLY CO., Guelph, for South-western Ontario. The T. C. ROGERS CO., Guelph, for Ontario North and East. JOS. A. MERRICK, Winnipeg, Man., for Manitoba and N.-W. T. JOHN A. ROBERTSON, 108 Union Avenue, Montreal, Quebec.

The Raymond Mfg. Co. of Guelph, LIMITED. GUELPH, ONT.



This Fence is particularly suited for cemetery, orchard and garden. Made of wickets 12 inches wide, and any length required. The price is less than that of the other ornamental fences, and in a long stretch this is a consideration. The **ANCHOR FENCE** is made of all No. 9 wire, either plain or coiled.

ESPLEN FRAME & CO., AGENTS WANTED. Stratford, Ont.

GOSSIP.

CAPTAIN REPRINTS SHORTHORNS. The noted Spring Grove herd of Captain T. E. Robson, of Ilderton, Ont., recently inspected by a representative of the "Farmer's Advocate," was found, as usual, full of good things and, under the efficient care of the veteran herdsman, Harry Coultham, in excellent condition. The herd at present numbers about fifty head, half a score of which are imported animals, while their produce

and the balance of the herd represent such popular Scotch-bred families as Orange Blossoms, Lavenders, Broadhooks, Duchesses of Gloster, Village Girls, Wimples, Rosebuds, Buchan Lassies and Minas, headed by the grand imported two-year-old Bruce Mayflower bull, Prince Sunbeam, bred at Heatherwick, a rich roan, sired by Prince of Archers, a son of the noted Scottish Archer and halfbrother of the champion Marengo. Prince Sunbeam is a typical Scotch Shorthorn, low-set, thick-fleshed, substantial, symmetrical, full of quality, with a model head and horns, the swinging walk of one apparently conscious of superior individuality, and a fitting follower of the noted sires that have preceded him in the herd, which is certainly saying a good deal, for few herds, if any, on this continent have had the benefits of the services of such a list of championshipwinning and high-priced bulls as this. In confirmation of the latter statement, it is only necessary to recite the names of Nominee, Moneyfuffel Lad, Topsman, Valiant and Imp. Wanderer's Last, the latter sold for \$2,005 after his term of service, and the former four winners for five years in succession of the championship at Toronto, Canada's greatest show, while the first open herd prize was also won by the Spring Grove herd three years in succession in the last five years at the same show, and the first prize for a young herd twice in the last three years. The reputation of this herd, therefore, rests not on the performances of remote ancestors, but on recent and up-to-date records. While all the noted sires above named have left their impress on the herd for good, Wanderer's Last, as one would expect from the character of his breeding and personality, has stamped his offspring with the signet seal of both good breeding and individual merit. Unfortunately for the herd, the bulk of his get here are bulls, but that will be in the favor of those fortunate enough to secure them, for seldom is seen such uniform type, character and quality of a high order as in the bull calves at Spring Grove, which we predict will make it very interesting at the shows this year unless the competition is a

good deal stronger than usual.

ROSE COTTAGE SHORTHORNS.

Royal Prince =31241=, by imp. Royal Sailor, at head of herd. For sale-4 bulls, 3 heifers (3 to 9 months old), 3 yearlings, one 2-year-old heifer and 9 cows in calf, Search and Scotch-topped. H. K. FAIRBAIRN,

om Thedford P. O. and Station, G. T. R.

H. PARKER, RIVER FARM. Breeder of SHORTHORN CATTLE. service, Verschoyle (imp. in dam) = 36125 Stock for sale. In om

BEAVER VALLEY SHORTHORNS. Some choice heifers and young cows with calf at foot; also two bulls for sale. Inspection invited. om E. & C. PARKINSON. Thornbury P. O. and Station, G. T. R.

Shorthorns and Shropchires. Scotch and Scotch-topped families of Shorthorns. Young bulls and heifers for sale. Shropshires, bred direct from imported stock: Mansell and Cooper strains. BRUCE BROS., Souffvile Station, G. T. R. o Gormley, Ont.

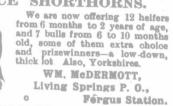
Maple Grange Shorthorns CLARETS, LAVINIAS AND BEAUTYS, Sired by such Scotch bulls as Commodore 31025, Scottish Bard, Imp. Baron's Heir. 18 heifers, 12 bulls, a number of cows (heavy milkers), to be sold

well worth the money. R. J. DOYLE, Owen Sound P. O. and Station and Port.

Shorthorns and Berkshires. Shorthorns sired by Arthur Bright, Dunblane and Blue Ribbon (imp.). Berkshires of the bacon type. Visitors welcome. Correspondence solicited.

MAC CAMPBELL. o Samson, Ont. **BELLEVUE SHORTHORNS.** Both sexes, Imported and home-bred, All ages. Prizewinners at home and abroad, BDWIN BATTYE, Gore Bay P. O. and Port.

CHOICE SHORTHORNS.



Imp. Shorthorns and Lincolns

A. D. MOGUGAN.

RODNEY, ONT., P. O. AND STA.

Imported Aberdeen Hero at the head of the herd, which is composed of the best Scotch families. Ten grand shearling and two-year old ewes for sale, in lamb to a Royal winner. Also ewe lambs from im-ported Dudding ewes at reasonable prices. o

Mitchell & Sons, Nelson, Ont.

Present offering three extra good bulls from 12 to 14 months, two imp. in dams, and one from imp. sire and dam,

Also a number of Scotch heifers in calf. Burlington Jct. Station and Tel. Office.

SUNNYLEA FARM. For sale : Jerseys-6 yearling bulls; females sows, different ages. Shropshire sheep-rams and ewes of good breeding. Prices reasonable.

583



Among the many choice things in the list of females, only a few of which can be named in the allotted space, is the H. E. WILLIAMS, Knowlton, P.Q. sweet three-year-old, Duthie-bred, im-I GUARANTEE A \$5.00 PACKAGE OF ported Jealous Girl, of the Cruickshank BARREN KOW CURE J. tribe, and sired by Bapton Conqueror. postpaid, to make any cow under 10 years old breed, or refund money. No trouble, no risk. Given in feed She is interesting, not only for her own character, breedy-looking, strong-backed L. F. Selleck, Druggist, Morrisburg, Ont. and full of quality, but also as being the dam of perhaps the best of the sons of Wanderer's Last in the lot of bull calves, a rich roan, now about nine months old. the four. Another that is notable for the same reasons is Sittyton Lavender 9th, a Box 552. roan three-year-old, also bred by Mr. Duthie, and sired by Silver Plate. She is individually excellent, and has a capital roan son of Wanderer's Last tugging at her teats. Imp. Lavender Thyme 7th, a roan three-year-old, nursing a nice roan calf, is another of the same sterling Sittyton sort, and a good one, as is her calf. A handsome, breedy-looking young cow is the red three-year-old imported Scottish Rose, of the Kinellar Rosebud tribe, sired by Lovat Champion, and with a nice red bull calf at foot. Warden Blossom, a red four-year-old, by Knight of Weldon, and her dam by the noted Gay Monarch, head of the champion herd at the World's Fair, Chicago, is a Cruickshank Orange Blossom, low, level and thick-fleshed, and having a good red heifer calf at her side. Imp. Strawberry 4th, a light roan four-year-old Sittyton Secret, by Fopsman (63447), by Gravesend, is of excellent type and character, and due to calve this month. The red yearling

(Continued on page 584.)

A SNAP IN JERSEYS. Three fine young cows, bred, and a good young bull, not akin to cows or progeny. Price, \$225 for the four. Write for particulars. W. W. EVERITT, Dun-Bdin Park Farm, Box 552. om Chatham. Ont. Holsteins yndale We are now offering a number of young bulls, fit for service, sired by Lady Waldort's De Kol. Spring calves of both sexes BROWN BROS., Lyn P. O. and Station. Spring Brook Holsteins. One cow 4 years old, three 3-year-olds, two 2-year-olds, one yearling heifer, 4 heifer calves, one bull calf; all De Kols. Quality unsur-passed. Tamworths of all ages for sale. Write at once for bargains. A. C. HALLMAN, - - BRESLAU, ONT. Maple Park Farm Holsteins. Netherland Hamming De Kol (Imp.), stock bull. Stock of all ages for sale from the great De Kol Pietertje Clothilde and Bar-rington strains. Home of the great cows, Edgeley Mol, milk record 104 lbs. in 24 hours; Emery Beauty, the great public test winner, and many others with heavy records. SIDNEY MACKLIN, om Streetsville P. O. and station, C. P. R.

HOLSTEINS, TAMWORTHS, COTSWOLDS. Present offering : Young boars and sows fit to breed, and younger ones. Choice animals. Ram and ewe lambs and two 2-shear rams. Perfect covering. R. O. Morrow, Hilton Ont., Brighton Stn.

In answering any advertisement or this page, kindly mention the FARMER'S ADVOCATE.

FOUNDED 1866

GOSSIP. (Continued from page 583.)

Broadhooks heifer, Imp. Airy Duchess Brd, is a show card that will be hard to turn down, being full of substance, quality and character, sired by Pride of All. a son of the \$6,000 bull, Brave Archer, and her dam by the Marr-bred Airy Monarch. Imp. Vanora, a roan fouryear-old cow, bred by Mr. Jackson, of Durno, and got by Remus, the sire of the champion Choice Goods, is another excellent number, showing splendid character and strong constitution. Among other great breeding cows is Imp. Bella, whose produce since her importation have sold for \$2,600, one daughter fetching \$1,700 at a Chicago sale, while she is nursing another good one. The fine old matron, Louan of Browndale 2nd, now in her 14th year, is another of the profitable sort, her calves in the last six years having sold for a total of \$1,550, and she is now nursing a nice red bull calf by Wanderer's Last. Topsman's Queen, by the champion Topsman, firstprize yearling heifer at Toronto last year and one of the first-prize young herd, is in splendid two-year-old form. thick-fleshed, symmetrical and wide as a wagon, and shows herself useful as well as ornamental, as she is nursing a fine calf. The limits of space forbids more than mere mention of such as the Sonsie roan three-year-old, Village Beauty, by Village Squire, by Abbotsford; the blocky red yearling Wimple, by Wanderer's Last, and a pair of Duchesses of Gloster. Suffice it to say that the herd is a working herd, as well as being famous for its show-yard record, as nearly every cow has a calf following her in the pastures or found in the comfortable boxes in the splendid basement barn, one of the most complete and commodious in the country.

Messrs. R. Hunter & Sons, Lachine Rapids, Que., on May 9th shipped from Glasgow to Quebec, 22 head of Ayrshire cattle, seven of which are bulls, selected from the herds of Messrs. Montgomerie, Reid and Wardrop, Baird and Sloan.

Mr. H. K. Fairbairn, Rose Cottage Farm, Thedford, Ont., breeder of Shorthorn cattle, writes, under date May 26th : "I have sold my twenty-months-old bull to Mr. L. W. Paisley, of British Columbia, for three figures. Mr. Paisley is to be congratulated on his purchase of so fine an animal. This is five bulls that have left the Rose Cottage herd for B. C."

A combination two days' sale of Shorthorns at Traer, Ia., recently, was well attended, but did not bring high prices,



SPLENDID FOR CALVES AND PIGS "INTERNATIONAL STOCK FOOD" and SKIM MILK.

UNION CITY, PA., Jan. 3, 1903.

International Stock Food Co., Minneapolis, Minn. DEAR SIRS:-I have used your "International Stock Food" for

the last year and am very much pleased with it, because it is all you claim. I have fed it to Cows, Calves and Pigs. Last year I raised my calves on "International Stock Food" and skim milk and not one of them had the scours. Yours truly, MATH. ALLEN.

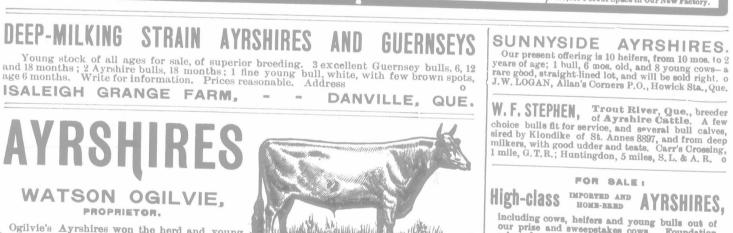
83 We Have Thousands of Similar Testimonials and Will Pay You \$1000 Cash to Prove That They Are Not Genuine and Unselicited. 60



IT CONTAINS 183 LARGE ENGRAVINGS OF HORSES, OATTLE, SHEEP, POULTRY, ETC. The Cover of this Book is a Beautiful Live Stock Picture #Printed in Six Brilliant Colors. Size of the book is 6% by 9% inches. It cost as \$2000 to have our Artists and Engravers make these Engravings and Poultry. It contains Life Engravings of many very noted Animals, and also testimonials. The Editor of This Paper Will Tell You That You Ought To Have Stock Book In Your Library For Reference. #Fits Contains a Finely Illustrated VeterInary Department That Will Save You Hundreds of Dollars.

WE WILL MAIL IT TO YOU ABSOLUTELY FREE, & Postage Prepaid. We Will Pay You \$10.00 Cash if book is not as described. Write us at once, letter or postal card, and ANSWER THESE 2 QUESTIONS:

We Employ Over 300 People and have Hundreds of Thousands of Testimonials. Refer to Any Bank in Minnespolis. HINTERNATIONAL STOCK FOOD CO., Minnespolis, Minn., U. S. A.



High-class THFORTED AND AYRSHIRES, including cows, helfers and young bulls out of our prize and sweepstakes cows. Foundation selected with due regard to quality and pro-ductiveness. Come or write.

WM. WYLIE, - HOWICK, QUEBEC.

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the average on 98 head being about \$120. The cattle were in good breeding condition, but there were many young bulls and unbred heifers. Best prices were : Sweet Charity, \$245 ; Klondike 2nd, \$285; Golden Gem, \$295.

On May 20th, thirty head of Shorthorns from the herd of Mr. C. L. Gerlaugh, Osborne, Ohio, were sold at auction, making an average of \$368.50. The highest price for a female, \$905, was paid for imported Julia Everett, a roan two-year-old heifer by Bapton Ensign, Mr. J. A. Gerlaugh, Harshman, Ohio, being the purchaser, The imported two-year-old bull, Bapton Coronet, brought \$1,100, and was purchased by W. G. Riley, Thorntown, Indiana.

A notable sale of Yorkshire swine was the disposal by auction last month of 123 head, of all ages, from the herd of Mr. Philo L. Mills, Ruddington, Yorkshire, at an average of seven guineas. The top price of the sale, 15 guineas, \$275, was paid by Captain Heaton for the aged sow, Miss Hollingsworth 113th. Owing to the existence of restrictions against the importation of pins from the district to Ireland, where the Yorkshires are very popular, a number . Irish breeders who had made arrangements to be present were deburred from attending, otherwise the result would doubtless have been a much more margaret



In answer of advertisement on this page, kindly mention the FARMLR'S ADVOCATE.



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Incomposite the set of bury, early in August, 1903 The flock is of the higest merit, and holds a record both in the show and sale rings equal to any, whilst the selections sent to the States and Canada have won the highest honors. Full particulars from W. T. HALL, Highclere,

Newbory, England, or the auctioneers. NETHERLEA AYRSHIRES. CHAPMAN

THE FARMER'S ADVOCATE.

GOSSIP.

THE HIGHCLERE BERKSHIRE SALE. On the 1st of July next, at Highclere Castle, the historic seat of Lord & Carnarvon at Newbury, Berkshire, England, there will take place, as advertised in this paper, one of the most important pig sales of the present season. Important for two main reasons: first, because the animals offered are of the highest merit, and, secondly, because they comprise some of the very best blood extant. The whole of the herd, except a very few of the younger pigs, is included in the sale, which, like all those that are conducted by those well- and widelyknown auctioneers, Messrs. J. Thornton & Co., will result in all the animals offered being sold to the highest bidder, and dence all who attend this notable sale may rest assured that if they only keep on bidding long enough they will secure that which they desire. It is, of course, impossible to give a detailed account of each lot included in the sale, but we may take this opportunity to say that the whole of the herd has been seen by our English representative, and he reports that the same will be found by those who attend the sale to be considerably above the average in regard to both breeding and merit. Few, if any, of the most fashionable strains of blood are absent from the catalogue, whilst nearly every pig, some would say every one, is either capable of being made a prizewinner itself or is a descendant of a prizewinner. Suffice it, therefore, to say that few of any herds in England or any other country could show a better bred or more typical lot of Berkshires than those which will be sent into the ring at Highclere on July the 1st next. I'wo sows that particularly struck the notice of our representative when at Highclere were Stratton Polly 3rd and 4th, both of which were bred by H. R. H. Prince-Christian, the former of which was winner of the champion prize for the pest single pig at the last Smithfield Show in London. They are a grand pair of young sows in respect to merit and equally so in respect to pedigree, for their dam was Stratton Polly, who was also the dam of that notable boar and great prizewinner, His Majesty, whose record in the show-yards was almost exceptional. Stratton Polly is safe in arrow to Hall Mark, one of the stock boars, to which reference will be made later on. Pomatom, by the last named boar, out of Parish Council 2nd, is a very fine and well-bred sow, and both herself and her dam are to come in for keen competition, the former being in farrow to Persimmon, who claims for his dam that grand typical and widelyknown sow, Haggis. Drogheda has a considerable number of produce in the sale, but one that struck our fancy more than others was the very fine sow, Holyrood 24th, now safe in farrow to Hall Mark. A sow that is sure to be keenly competed for is Hazeldine, whose stock have already secured in the United States some considerable reputation because no less than four of her daughters were included in the great sale at Biltmore, N. C., last February. This sow traces back to that great boar. History, a son of Swansea, whose blood is without question one of the very best strains in Britain, and judging from the prices made by the Biltmore sows last February, has already become not only known but highly valued in America, and being in farrow, as she is to Hall Mark, it is evident that her produce will have more than ordinary value. That most typical sow, Empress Queen, is another of that character of which there are but very few about, namely, a sow of rare good merit, with the best possible blood running through her veins. She is by Julius Cæsar, who is half-brother to First Catch F., the sire of the top-price sow at the Biltmore sale, and all who are cognizant with Berkshires know how keen the contest was for this great sow. Manor Croyden Duchess. Columns might be written on the merits of the other sows and yelts included in the sale, but enough has been done to show that the herd now being offered for sale is one of no mean description and that it is one

HARP LES TUBULAR Cream Separator If we cannot show you wherein our separators are worth at least fifty per cent more than other separators, don't buy them. We want you to know that you have the best when you buy a Tubu-lar. You cannot help being convinced if you examine a Tubular. You will find it entirely different from other separators. Write for free catalogue No. 198. THE SHARPLES CO., P. M. SHARPLES. Chicage. Illinois. West Chester, Pa HUMBUG. In One Stops swine FARMER BRIGHTON, FAIRFIELD, IOWA. FAIRVIEW SHROPSHIRES A great lot of good young lambs. Home-bred and imported shearling rame. A beautiful lot of home-bred ewes. Whoever wants such, let him write. All 1902 customers fully satisfied, and I am determined to please each and every 1903 oustomer by furnishing good atock and dealing fair. good atock and dealing fair. JOHN CAMPBELL, "Fairview Farm," Woodville, Ontario, and **CHEAPEST** IN THE MARKET.

1-gal. Imperial tin for 750. STRENGTH EQUAL TO ANY.

Instantly kills ticks and parasites on sheep and lambs. Improves and waterproofs the wool. A sure rem-

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Secretary Kent or Romney Marsh Sheep Breeders' Association. o Arundel Street, Strand, London, Eng.

(Continued on page 586.)



"BROAD LEA OXFORDS." Am offering choice ewe and ram lambs, shearling ewes and a few shearling rams for flock headers. Also young Yorkshire pigs of the best bacon types, Teeswater, C. P. R. W. H. ARKELL, Mildmay, G. T. R. cm Teeswater, Ont.

In answering any advertisement on this page, kindly mention the FARMER'S ADVOCATE,

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STANDARD OF THE WORLD for 60 Used on 250 million druggist cannot supply, send \$1.75 for \$2 (100 gal. Evans & Sons, Montreal and Toronto. **PURE FOOD INSURES** GOOD HEALTH INSURES



TORONTO, ONT. American Leicester Breeders

ASSOCIATION. A. W. Smith, Pres., Maple Lodge, Ont

Pedigrees now being received for Vol. 4. For information, blanks, etc., address :

A. J. TEMPLE, SEO., CAMERON, ILL. om U. S. A.

W. S. CARPENTER, "MODEL FARM," SIMCOE, ONT., Importer and breeder of Shropshire sheep. My flock was represented at Toronto, and won first on shearling ram, first and second on aged ewes, and second on the pen. First time exhibiting. If in need of a first-class yearling ram, imported or home-bred, write! Your wants can be supplied, and at prices consistent with quality. Have a choice lot to choose from, and can guarantee satisfaction. Come and see them, or a card will bring them.

Station One-half Mile from Farm, Wabash and G. T. R.

Dorsets & Chesters Young stock in Dorset Sheep and Chester White Hogs of good quality for sale, reasonable. R. H. HARDING, THORNDALE, ONT.

"MAPLEVIEW FARM." om "MAPLWVIW FARM." SHROPSHIRES FOR SALE. — Shearling rams, ram lambs, ewe lambs, also shearling and older ewes, about 50 head all told. All registered or eligible. Low-set, well covered, in fine condition and form. Sires from Campbell and Dryden flocks. MALCOLM McDOUGALL, om Tiverton, Ont.

LINDEN OXFORDS at Toronto, 1902, won 1st open pen; 1st and 2nd Cana-dian pen; 1st and 2nd aged, yearling and ram lambs; 1st, 2nd and 3rd yearling ewes and ewe 1 mbs. All these ewes retained in flock and the best rams R. J. HINE, Dutton, Ont..

THE FARMER'S ADVOCATE.

GOSSIP.

(Continued from page 585.) which for combination of pedigrees and merit is seldom equalled.

The stock boars represent the very cream of the best that England can produce, and they are all going to be sold to the highest bidder. Foremost amongst them comes that grand boar, Past Master, whose worth as a stock boar is shown by that noble son of his, Hall Mark, whose progeny has secured so great a reputation, both in England and elsewhere. It is a question amongst those interested in the breed which will make the most, the son or the sire, for both are included in the sale. Whatever may be the result, it is certain that whoever secures either of these will become the possessor of a valuable sire, valuable for individual merit, for none but the best are good enough to be used at Highclere, and also for their proved worth as stock-getters, probably the most valuable of all in respect to stud stock. Drogheda is also included in the sale, and he, like the former two, has been tested and proved of the highest merit in all respects, as have also Handyman and Persimmon, both of which are most typical animals, and each of which, as will be seen by their produce, to be of a merit sufficient to gain admission to any herd in existence.

Canadian buyers should bear in mind that next year the great exhibition at St. Louis will require their stock to be of the highest merit. There, doubtless, the breeders of both countries will, as at Chicago, meet in friendly rivalry, and may the best win is the wish of the writer, but in order that the Berkshires from Canada may have a chance to compete against those from the States there is no question in the mind of the writer but that to do this it will be requisite for the Canadian breeder to be equipped with the very best obtainable, and the place to secure this is at the forthcoming sale at Highclere, from whence so many have in former years gone both to Canada and to the States, in which country they have certainly secured for themselves and the herd that produced them a reputation so high and great that even at the date of writing there is in this country a buyer who is endeavoring to secure the pick of the herds whereever he can, but from this herd he cannot get them, except he waits for the sale, at which the American dollar will have to meet with, I trust, the competition of both the Canadian dollar and the good old English guinea, for we really cannot do without at least some portion of the best of the blood being left in the country. However, be the competition what it may and come from where it may, one thing is certain, as stated at the commencement, that the bidder who stays longest will secure the lot for which he bids.





BOX 188.

PINE GROVE FARM HERD of LARGE ENGLISH YORKSHIRES.

The oldest-established registered herd in America. We have 12 imported boars and sows and 20 home-bred animals breeding, and have a limited number of young boars and sows for sale, suitable for this fall's breeding. Satis-faction guaranteed in all mail orders. 0

Joseph Featherston & Son, Streetsville Station, C. P. E., and P. O. and Telegraph Clarkson Station, G. T. E.

Renfrew, Ont.

YORKSHIRES.

FOUNDED 1366

TAMWORTHS. FOR SALE: Two young sows, bred to Dandy =2954=, a good typical sire; also several young boars and sows of very best breading. oars and sows of very best breeding. BRONZE TURKEY EGGS-\$3 per setting. HAZEL DELL O D. J. GIBSON, STOCK FARM. Bowmanville, Ont.

Newcastle Herd of Tamworth Swine Have for a number of years taken a share of the best prizes offered at Toronto Exhibition, but this year has excelled all past records, having taken the sweep-stakes for the best herd; also both silver medals for best Tamworth boar and best Tamworth sow, besides many other prizes in the verious closers. Our proceed best Tamworth boar and best Tamworth sow, besides many other prizes in the various classes. Our present offerings are: A few choice young sows, 4 to 5 months old; 2 yearling sows, in pig; and we are now booking orders for spring pigs, both sexes. Enquiries promptly answered, om **COLWILL BROS.. NEWCASTLE, ONT.**

WILLOW LODGE BERKSHIRES Herd headed by Long-fellow 10th of H. F., as-sisted by the noted prizewinner, Highclere Crown 3rd, Sows, the best money will buy, and are winners. Young stock of both sexes and all ages for Line of the second second le, not akin

W. WILSON, SNELGROVE, ONT.

Yorkshires, Poultry and Collies Choice Yorksbires, 2 to 3 months old, bacon types. Eggs from prizewinning W. Wyandottes and B P. Rocks, mated for exhibition stock. A litter of fine collie pups, pedigreed. Address: J. A. & A. B. Armstrong, Warkworth, Ont.

At Yellow Springs, O., May 19th, the sale of 34 of E. S. Kelly's Shorthorns brought together 1,500 people and realized \$13,925, average \$409. Best prices were : Imp. Fair Morn, \$850; Imp. Flower Girl, \$825; Imp. Nettie 5th, \$820; Imp. Heather Blossom, \$705; Imp. Camellia, \$700; Imp. Madame Verdi, \$600; Mina Leaf, \$600; Imp. Dalmeny Missie 3rd, \$530; Imp. Jessie 2nd, \$525; Imp. Fancy 7th, \$510. At Osborne, O., C. L. Gerlaugh sold 30 Shorthorns for \$11,055, average \$368.50. Top price was \$1,100 for bull, Bapton Coronet.

Affairs among the Percheron Horse Breeders of America have now become somewhat settled by the dissolution of the injunction issued against the new as ociation serve in e ago. It will be remembered that a number of the breeders of Percherons became dissatisfied with the management of the Percheron records, and established a new association for the purpose of giving this matter better attention, but were restrained in their action by an injunction secured by the original association. This new association is at liberty now to go ahead and do a pure-bred registry business, and is managed by a most capable

In answering any advertisement on this page, kindly mention the EARMERS ADVOCATE



BOWMANVILLE, ONT.

JAS. A. RUSSELL, Procious Corners, Ont. L. ROGERS, EMERY, ONT.

YORKSHIRES AND BERKSHIRES. FOR SALE: Some choice young sows and oars, ready to breed; also Barred Rock eggs, \$1 per setting. C. & J. CARRUTHERS, m Cobourg. Ont. Cobourg, Ont. FOR SALE: Yorkshires and Holsteins Best type and quality. Young stock constantly on hand, Prices right. R. HONEY, om Brickley P. O., instead of Warkworth. Yorkshires For the next 3 months I can sup-ply either sex, that for ideal bacon type, smooth, even finish, are unsurpassed. Prices reasonable. WM. TEASDALE, on Thornhill Sta, and electric cars. Dollar P. O. Weston Herd Large Yorkshires English TORKSONIFOS Sows safe in pig, boars fit for service, sows ready to breed, boars and sows 2 and 4 months old, Satisfac-tion guaranteed in orders received by mail.



CASES WHICH PROVE WHAT MY BELT IS DOING. I got the Belt. It has worked well and I am getting along well. The last two weeks the var better in every way.—PETER M. NICHOLS, Peterboro', Ont.

is gone and I am

HARVEST OF 1903. Tarmers Binder Twine C HIS COMPANY has again set its prices on Binder Twine for the harvest of 1903. It may well be

587

said we lead the way. The duty of every intelligent Canadian farmer in this deal is easily defined. For ten years we have put up a good fight in the interests of co-operation, and have absolutely regulated the price charged you for Binder Twine in every locality where we have made a shipment. If you want us to con-tinue this same deal, give us your undivided loyalty and patronage. Don't order or buy a single pound of twine from any other concern until you know this Company's is actually exhausted. If we fail to have a farmer agent in your district, give us the name of a good man or two, and we will immediately make the

Canadian agriculturists, to say whether this organization is to continue or not. No other element or opposition can pull down our standard. The country is in danger from trusts Farmers, you are up against it.

Risbu lal at Herd Lodge April; old; Ont.

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- The action of your Belt has been most satisfactory. The varicocele and pains in my back are all gone, and I am glad that I took your advice and purchased the Belt.-FRANK MITCHELL, Dunbarton, Ont.
 - I am well pleased with the Belt. It has done great things for me. My varicocele is about gone. I feel like a new man. I was in very bad shape when I got it. -- SAM SMITH, Woodstock, Ont.
- I would not take \$50 cash for my Belt. I never enjoyed better health. I am not the same man at all. I feel stronger and enjoy life better than I ever did before.—JOHN COWLEY, La Vallee, Ont.

My Belt is worn comfortably at night while you sleep, and gives a powerful current that is always under the control of the wearer. It pours its vitalizing energy into the body for six or eight hours at night while you sleep.

EASY TO WEAR. CURES WHILE YOU SLEEP.

You have nothing to lose by trying my Belt, I take all chances of curing every case that comes to me. If it were not for the free belt scheme, which is not free at all, or the just-as-good Belt offered for a dollar or two, which gives no electric current, having made everyone sceptical, I would not have to pound away at the public to let them know what Electricity will do when properly applied. I have been carrying on war with these rascals and they have felt the weight of my blows. My business is just as clean as that of any merchant. I have perfected an applied to have not been carrying on the probability of the have perfected an appliance that does cure, and I intend to hammer away at the public until they know it. I offer to anyone only what is fair. Give me reasonable security for the price of the Belt, and you can

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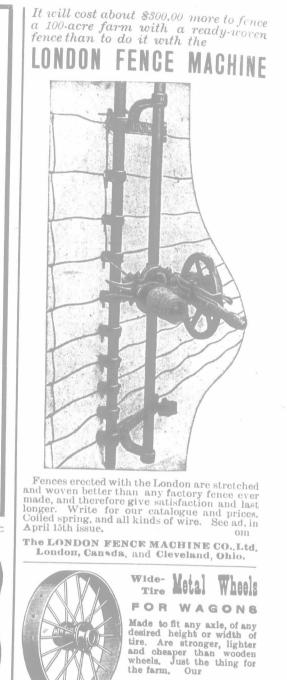
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