in my heart to mak' ony egarding the auld ancestors inco' job he's got'', says I to findin' yer way through the n yer lantern accidentally

Diary.

R KLUGH, M. A.

AILS. plants in marshes, and one ds to the exclusion of any is the Cat-tail. In these cylindrical objects near the pistillate flowers, while the which the stem terminates owers. The whitish, silky he pistillate spikes become perianth" of the pistillate of the flowers which corlants higher up in the scale

ted to a marsh existence by s leaves, and by the posses rootstock. Marsh plants osition, are subjected to the agencies-the wind and the n spite of the fact that they er" the aerial portions must evaporation. Consequently ng a comparatively small irm, epidermis. The shape n to bend, instead of break y the full force of the wind. only gradually extends the it makes a firm mat which and currents. Several of m a single plant and spread

Cat-tails in Canada. In the ha latifolia) the stems are height, the pistillate spikes nate spikes are contiguous re from three-quarters of an pollen is four-grained. This in marshes throughout Europe and Asia. In the pha angustifolia) the stems height, the pistillate spikes er diameter than those of the ninate spikes are separated te, the leaves are about half llen is in simple grains. The r occurrence inland, though abundant.

at-tail as a source of food, flour which they used in also boiled the fresh rootluten which they used with

-tail are from three-quarters ameter, and are the storage manufactured by the plant. onsists of a core, about three er, which is an almost solid nd this core is a layer of

sen of Cornell University he question of the Cat-tail ls that a square yard of Catounds when thoroughly dry ould yield 10,792 pounds of e rootstocks are thoroughly very readily stripped off, of starchy material. These of the weight of the dried would yield 6,475 pounds ssen found that the cores per cent. of fibrous material stimated that an acre would The flour was found to be

uite like wheat flour. l flour made by shington gave the following: sh, 2.84 per cent.; fat, 0.65 cent.; carbohydrates, 81.41

wing composition: Moisture, nt.; fat, 1 per cent.; protein, ydrates, 73.83, while potato er cent.; ash, 4.01 per cent.; 12.25, and carbohydrates, that Cat-tail flour is extreme-

in baking show that it may n with wheat flour or pure tail flour and of 50 per cent. were found to be very palat-Cat-tail flour differed very om wheat flour. Puddings in place of corn-starch also

actory. at nearly three tons of flour

be obtained from an acre of lity these plants may be cul-

THE HORSE.

SEPTEMBER 16, 1920

Should a Woman be a Horsewoman?

The question "should a woman be a horsewoman?" is open to debate. Some claim that the ability to handle horses is unladylike, that it is rude and mannish. On the other hand, many claim that it is entirely within the province of any lady to be able to handle horses. Many will agree with the writer when he states, "that a woman looks her very best when well mounted, or even when driving a good horse." While we will not go so far as to say it is absolutely necessary for the individual and general welfare of humanity, that every woman be a horsewoman we think that in no case will such an acquirement be objectionable, and that there are many reasons why it is desirable. This may be said to apply particularly to rural districts. The woman on the farm, be she old or young, who can harness, hitch and drive a horse, or a pair, or who can saddle and ride a horse, or who can do both, is to a great extent independent of the man or men on the farm, so far as the performance of her business or the exercise of her pleasures, for which horses are required, are concerned.

To the woman who likes a horse, the possession of one that she can ride or drive affords an endless source of pleasure. There are many reasons when the men about the place are so busy that it is inconvenient for one of them to leave his work and come to the stable, or go to the field and catch a horse, take him to the stable, harness and hitch him, or saddle him for his wife or sister, or his employer's wife or sister to drive or ride; and there are many occasions when the women on a farm suddenly decide that they want to go some place. It may be to town to purchase something necessary; it may be to a neighbor on some errand necessary or otherwise; it may be simply for a pleasure drive or ride. In fact, innumerable causes or excuses for wanting a horse occur when there is no boy or man at hand to hitch or saddle him. The result is, when the women are not able to handle the horse, the business is not attended to, else it is done on foot; and, if the horse be needed for recreation or pleasure it must be postponed until the men appear, when it probably is not expedient or the time cannot be spared. assertion will probably be made by some, that the women on a farm are as busy as the men, and that there is no time for driving or riding for pleasure, but our experience has been that this is seldom the case, especially during some seasons. That is, that on the average farm, there are seldom several days at once in which an hour or two cannot be spared and spent with advantage by the women in taking a pleasure drive; and none will deny the fact that when the occasion arises in which it is necessary for the woman to go a considerable distance, she can save time and energy if she has a horse she can harness, hitch and drive, or

saddle and ride instead of walking.

A woman who can handle horses can afford pleasure and recreation, not only to herself, but to her friends and visitors. Some will probably say that "women on a farm have no right to have visitors in a busy season." Of course, this is nonsense. A woman on a farm has as much right to the pleasure of entertaining company at any season, as the woman in town, and the seasons when the men are busy are, in many cases, the most pleasant for visitors at a farm house, and, if either the mistress or the visitor be a horsewoman, they can have pleasure and attend to their business without interfering with the duties of the men.

In speaking of visitors, we may mention the un-welcome visitor, one who prolongs her or his visit beyond reasonable limits, and who may, when the men are in the fields, suddenly take a notion to leave, and wants to be driven to town or station. If the hostess be a horsewoman she will at once hitch her horse and drive her visitors to the desired haven; while, if she be not able to handle horses, she must wait for the return of the men, when the visitor may have changed her mind and decided to prolong her stay.

Then again, there are occasions when it is necessary to drive a horse when the services of a man cannot readily be procured. There may be an accident, in which the husband, probably the only man about the place, has been disabled, and no other man within reasonable distance. It is necessary to promptly secure medical, or other assistance. In cases of this nature, the ability of a woman to "handle horses" can be readily appreciated. We do not claim that the education, or training of horses is the proper function of a woman. This requires practice, skill, knowledge and strength possessed by few women, and is essentially the function of a man; but we claim that the ability to handle a reasonably well-mannered horse is a very desirable accomplishment for any woman. We also claim that it should be considered a duty by any farmer in reasonable circumstances, to keep at least one horse that his wife or daughters can handle. In many cases failure to do this is the result of thoughtlessness. The farmer may not think of such a thing. His father or grandfather never thought it necessary or profitable to keep a "lady's horse" and they both were successful farmers, and he does not see why he should depart from their successful methods. Well, probably there is no direct visable profit in keeping such an animal that may be said to "not earn his oats," but there is an indirect profit in the pleasure and enjoyable pastime the women derive from the horse. The pleasure derived in this way tends to break the monotony of woman's work, and, no doubt, also tends to preserve health and spirits, and lengthen life. We have often heard farmers say, "There is no use in me keeping a lady's horse practically idle about the place, as my wife is too timid

to drive." This timidity is, with few exceptions, the result of experience with horses that have not good manners. If the man who speaks this way would train or purchase a good-looking horse with good manners, provide good harness and a good rig, and demonstrate to his wife that the horse is perfectly safe for her to drive, he would soon be surprised at the disappearance of the timidity, and at the anxiety of his wife to drive him which should be considered her private property and should not be used on the farm without at least asking the owner if she needed him; and if not might be used at light work.

LIVE STOCK.

Let the sow and litter out on sunny days.

Keep an eye on the herd sire, even though he does seem quiet.

The better the breeding females the better the sire

Silage keeps young stock thrifty and growing during the winter. Mixing cut straw with the silage is a good practice. Some of the best bred individuals of the different

breeds have been lost to the breed through the ravages Cattle feeding is a means of marketing grain, con-

serving soil fertility and utilizing to advantage roughage produced on the farm. The stock bull and calves confined to the stable would like a couple of feeds a day of green corn. If

the corn is run through the cutting box it makes a very appetizing ration. There is some pleasure in feeding a bunch of growthy,

breedy steers, but it is difficult to work up enthusiasm over a lot of scrubs. Buy the best steers available for this winter's feeding even if they do cost more than the common stuff.

to the industry? The Bang system, by which re-actor are isolated and the calves removed as soon as dropped and fed on tubercular-free milk has proven feasible. The trouble is that few breeders are equipped to handle the re-actors under this system. They cannot provide two sets of stables, utensils, herdsmen, etc., consequently if the herd is to get the accredited certificate the re-actors must go to the shambles.

In localities where there are several breeders wishing to build up a high-class herd of tubercular-free cattle would it not be practicable for them to rent or buy a farm in the neighborhood, sufficiently removed from their own that there would be no danger of infection being transmitted, and put a man in charge who would look after this herd and the owners could get the calves as soon as dropped. Grade calves could get the calves as soon as dropped. Grade calves could be bought and vealed on the re-actors. This would save to the industry many choice breeding animals that would continue probably for years producing progeny that would develop into individuals of great value to the breed, and consequently to the industry. Several breeders co-operating in the running of such a farm would not find it a burden on any one, in fact it might prove to be a profitable proposition.

The fact that calves from tubercular cows, raised on clean cows or on sterilized milk, seldom contract the disease proves the system to be feasible, and if worked out would no doubt encourage many breeder to work for the securing of an accredited herd. There is too much disease in our herds and it must be cleaned up, but in doing so let us endeavor to sacrifice as few as possible of the highest-quality breeding stock.

Live Stock Notes.

Although Canadian export trade in animals and animal produce during the first four months of the present fiscal year, shows a reduction in value of approximately 50 per cent. when compared with the exports of the same period of 1919, the returns still show a favorable balance of trade amounting to \$29,071,148, representing 80 per cent. of the total trade value of Agriculture.

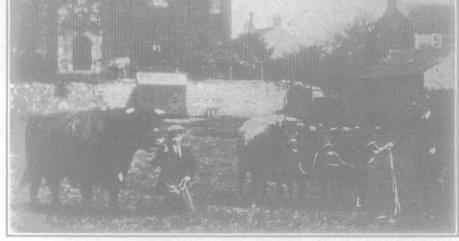
Agriculture, including all classes of agricultural and vegetable produce and animal and animal produce has a favorable trade balance of \$23,512,027. The balance is \$23,512,027.

favorable trade balance of \$33,512,027. This balance is,

however, less by about \$114,000,000, than that of the same period of 1919.

While agriculture has been able to maintain a favorable balance of trade the total trade in all classes during the first four months of the fiscal year as compared with the same period of 1919, shows a reduction of over \$4,000,000, and a reduction during the first four months of the present fiscal year, in the net trade value of exports as compared with imports, of approximately \$4,800,-000.

In connection with imports of animals and animal produce the im-ports during 1919 and 1920 were practically equal in value but in Agriculture and all other



A Noted Sire and Three of His Get at Gainford Hall.

Co-operative Farms for Re-Actors.

It is very important that our herds be freed from tuberculosis, but can the individual breeder or the live stock industry afford to have some of the outstanding breeding stock slaughtered as will be necessary where re-actors occur in herds entered under the accredited herd scheme unless the owner can provide some means of isolating the animals which re-act? Very few herds are free from re-actors. But, if every re-actor is slaughtered many of the best individuals of the breeds will go out of the breeding herds and the live loss of the individual but the loss of what progeny it might produce. There are all too few outstanding breeding females or sires in any of our breeds, and to have these go to the block would probably set the breeds back a decade or more.

The accredited herd system in vogue in Canada and the United States enrolls herds under government supervision to be tested at regular intervals, and when no re-actors are discovered over a period of two annual or three semi-annual tests a certificate of accreditation as regards tuberculosis is granted. It means that re-actors must be taken out of the herd, and that the tested herd must by no means come in contact with diseased ani-This is a step in the right direction, and fortunate are the breeders who are in a position to enter their herds and who are successful in securing a certificate. But, what is to be done with the re-actors? Some of them may be prize winning stock whose value is estimated in the thousands, or their progeny may be salering and show-ring toppers. True, under the Animal Contagious Diseases Act a breeder may recover twothirds of a maximum of two hundred and fifty dollars. but what is that to compensate for the loss of an outstanding breeding animal. It is better then nothing some will say, "and the breeder ought to be thankful for getting that much for a condemned animal." Is there not some way in which these re-actors could be saved classes there was, as the accompanying figures will show, a tremendous increase in import values:

ANIMALS AND ANIMAL PRODUCE. Four Trade Exports \$90,328,285 Imports \$27,799,712 Balance +\$62,528,573 Months 56,445,119 27,373,971 + 29,071,148 AGRICULTURE. Trade Imports Exports Balance 132,447,212 + 33,512,027 165,959,239 TOTAL TRADE ALL CLASSES. Trade Balance Imports +\$ 88,993,321 + 121,867,417 \$373,890,334 \$284,897,013 351,695,172 1920 473,562,589 Duty Net Trade Collected \$52,880,058 Value +\$141,873,381 1919 73,361,150 1920 - 48,506,267

BRITISH CATTLE AND SHEEP HOLDINGS. A preliminary statement of the number of live stock in Great Britain has been recently issued by the Ministry of Agriculture. The returns indicate a serious decline in the holdings of cattle, the figures being 5,547,000 as compared with 6,194,000 in 1919, a decrease in excess of 10 per cent., and representing the smallest holdings

The decrease is most marked in young cattle, the reduction in animals under one year of age being almost 300,000 or 25 per cent. The indiscriminate slaughter of calves was the chief cause of the depreciation: Practice of that nature is far more serious and far reaching in its effects than is unwise liquidation of more mature stock,

about the stables.