Rearing the Dairy Calf.

Scotland.

is year, I carried import a couple t visit to bonnie ning of what was

gland is the most is, the rural part), tland that makes land. I think it we been visiting eders of cattle, gn countries (as anada), and there ghly enjoy than d. They are not ever met, but, breeders of dairy o other breed of t up to the same ry conformation rshire "coo" anadian friends symmetry, and they call utility have been with Ayrshire. I am n Englishman I who—getting the backed himself ould not be cone of that sort, I e with them such eauty, carriage, came to compare erds they would ure-bred animals w their A B C's, tenant farmers perfect shaped, d them mention to one thousand that they were ncy buyers alone, mers; and when e stable—utility milk in a year,

r's (or any other rtainly it is not What I like to breeder is that dollar side, and d the "utility" if you will, but y the rich, fancy is true that the they want such has always been to be a fact that e Scotch tenant farmer to buy ich men are the Il domestic anion the Island of r read or write, er to two years or the Duke of Queen, or some tleman, for \$750 d Canadian gen-

at fifty dollars,

failed to notice

roduce, perhaps, t home, but it is -looking parcel, as to style and ey prefer to pay animal. of some of the will give you state of perfec-Ayrshire have to this in Scot-

carriage of the

ons for deciding onductor, "but uld her mither nent on one of dmitted, justly l not walk with as Mr. James queenly in her rs) that stood ne is as good a king and they int the Scotch ecial attention, as not been as or Canadian have, I fear, cumference of s it goes, for l perfect shaped a dark stable breeding per-business that

er point. The

ge of the head

shoulders; the ts off an Ayr-

Non-Breeding Sows. "Someone may have non-breeding sows that will not become impregnated. Give them daily a gill of fine ground hemp seed, in dry meal of corn and shorts, or ground feed."—Theodore Lewis.

shire or any other cow, in point of form, is that she carry her top line straight to the setting of the tail. A sloping rump is a thing I can not abide on any breed of cattle; nothing so deforms the symmetry of a cow as that. And the next thing is the point I am alluding to; i. e., the drooping of the neck, or ewe neck. While this is not as bad in my estimation as a drooping rump, it is a very great eyesore, and one that is too commonly met with in this country, and is a point that Jersey breeders on the Island of Jersey even will do well to study. A drooping neck on an otherwise perfectly formed cow is like a soldier perfect in build and appointment, but stooping. I enclose a photo of a grand stamp of an Ayrshire cow, Shepherdess, save in this defect. The man who is holding her is elevating her head as much as possible to hide the fault, but no use; he has helped it a little, perhaps, but all at the expense of the carriage of the head. Comparing this photo with others, it will show what a wonderful difference it makes in the symmetry and proportion of

the animal to carry a drooping neck. In discussing this point with Mr. Howie, he replied, referring to a ewe-necked cow, "That is a thing a can na forgive in an Ayrshire coo." These are little things, perhaps, and to a utility man quite beneath his notice, but to a man who would be a genuine breeder for *improvement*, they are of the greatest importance. A strict attention to all these little things is what makes an up-to-date

These little things, these finishing touches to a cow, are what demonstrates a breeder's skill. It is what makes the difference in a painting between an amature and an artist. It is these finishing touches that brings to both the artist and the breeder the dollars, where without them we must be content with cents. To the artist it means a prize, recognition, fame; to a treeder it also means a prize, recognition, fame. It makes him a credit to his town, county, and state, and his name is mentioned down the line of generations after he has gone away as one who returned his talents with usury. F. S. PEER.

Very truly yours, Mt. Morris, N. Y., Dec., '98.

## The Importance of Good Mares.

Breeding good horses of any kind has always been a profitable pursuit. But to breed good horses it is necessary to have good dams and good sires. Breeding, formation, action, substance and soundness on both sides are required, as well as proper management, to be successful in breeding any kind of horse. P. Albert Muntz, M. P., in an article in the English Live Stock Journal Almanac for 1899, says that "during the middle of the present century, say from about 1845 till 1875, the breeding of horses in England, with the exception of the Thoroughbred race horse, was very much neglected; and to this neglect, together with the exportation to foreign countries of a great many of the best mares, may be attributed a deterioration which took place. Since that time breed societies have sprung up to promote the breeding of almost every kind of horse and pony, and selected stallions, free from unsoundness, have been placed at the com-mand of all who wished to avail themselves of their services at a very reasonable fee." One great difficulty on commencing the reform, and one which Canadian farmers find themselves confronted with at the present time, has been and is the great scarcity of suitable mares, either as to pedigree, soundness, size or shape. The use of good sires, however, even on inferior mares, will do much in the way of improvement, but many of the produce are bound to fall below the high-class type that brings the long price. While the depression in horse-breeding during recent years did much to drive out really inferior stock, it also called many of the best breeding mares into the labor market in order to secure a mead of revenue from expensively established studs.

Reference is made by the above-mentioned writer to the improvement that has attended the breeding of Shire horses in England during the past twenty five years. Yearlings of the present are equal to two-year-olds of the past, and the same may be said in reference to all ages. "This great change," it is remarked, "is not universal, but only applies to those breeders who possess the gifts of selection and mating." In many of the centers formerly celebrated for breeding the very best of Shires, the breed some years ago became almost extinct through continued neglect, but the introduction of first-class sires for five or six years entirely changed the class and character of animals, until recently the mares, fillies and foals of these districts have become fit for introduction into the best studs in the kingdom. The rapid change is attributed to the fact that although sadly neglected, and therefore stunted and poor looking, the mares still contained some of the good old blood, and the introduction of excellent sires, together with more intelligent care, has produced a class of females fitted to play a leading role in the select Shire life. In conclusion, the matter is summed up by stating that "success in horse-breeding depends upon the selection of mares and the study of mating. Let them be well formed, sound, with good action, and, above all, well bred."

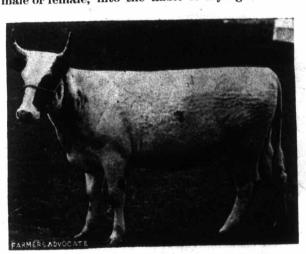
As soon after a cow calves as her milk is fit for human food, the dairyman, who is looking closely after the profits, is anxious to secure as much as possible of the cream from which his revenue is procured. This may seem like robbing the calf of its necessary nourishment, but with the exercise of judgment the young animal can be supported with a very little full milk to the advantage of its future usefulness. For a few days after it is taken from its dam the whole milk is necessary, and should be given at least three times a day. The first taken from the cow is the poorest in fat, and will answer the calf very well, leaving the richer strippings to go to the dairy. In a week or ten days it is quite safe to add a quart of skim milk at blood heat to the new milk given at each feed. As the calf the new milk given at each feed. As the call thrives the skim milk may be increased, until the whole milk is withdrawn by the twentieth day if the vigor of the calf will warrant it. The skim milk is often improved by the addition of a little oil meal or one of the meals specially prepared and sold



AYRSHIRE BULL, WHITE COCKADE. A NOTED PRIZEWINNER IN SCOTLAND,

for that purpose. In the Old Country immense quantities of these "calf meals" are used, and the practice is growing in Canada. By this time it will have learned to nibble a little hay and chop, which, if provided fresh daily, will soon be liberally taken. It sometimes occurs that a calf's digestive organs become deranged. If it shows itself in costiveness the milk should be given cooler, but if too loose, at a the milk should be given cooler, but if too loose, at a higher temperature and in smaller quantities. To the decreased quantity two raw eggs may be added, or the eggs may be given alone night and morning if the scouring persists. If further treatment is necessary, give a tablespoonful of castor oil and the necessary, give a tablespoonful of castor oil and the same of olive oil, with a teaspoonful of paregoric, mixed in a pint of hot milk. Follow the oils with a teaspoonful of pulverized chalk and pulverized charcoal alternately, in each feed of milk until the symptoms disappear. It is not well to resort to medicines to hastily, as the hot milk in small quantities and correspond foil quantities and eggs rarely fail.

To avoid getting the young animals, whether male or female, into the habit of laying on fat is



TWO-YEAR-OLD AYRSHIRE HEIFER. WINNER OF FIVE FIRST PRIZES IN SCOTLAND.

essential to the maintaining or improving of dairy qualities. To feed any substance especially calculated to produce fat to a bull, or at any time to a heifer before she comes in milk, will induce the habit of laying on fat, which will continue through all its subsequent career. The younger the animal is when this habit of making flesh and fat begins, the more controlling it will be, and the more likely the animal will be to transmit that habit to its offspring. The observing of this truth has been largely responsible for the success of Channel Islands cattle for the dairy and Scottish Shorthorns for beef.

A successful English farmer, in discussing this subject in the Farmer and Stockbreeder, says:
"Nothing should be fed to the young bulls more stimulating than good hay, and at times a few oats, shorts, or both, with coarser food. Plenty of coarse hay, straw, and grass even should be given at times. The digestive organs of a butter bull, especially when young, should be taxed and distended precisely as should those of a female designed to produce butter. Heifers should be fed on nothing but

skimmed milk, grass, hay, straw-in fact, everything to distend and tax their digestive organs—and with nothing more stimulating before they drop their first calf than oats or shorts or similar food. The rule for keeping young heifers to make good cows is rather extravagantly expressed by saying, 'A heifer should have a paunch large enough to turn herself round in.' Unsightly as they are in such a condition, such heifers make the best cows. Oatmeal, maize meal, or anything else necessary, should be fed as an alternative to keep a young animal in a thrifty growing condition, which is, from any cause, getting out of condition, or to restore one that is off. But an animal that maintains its vigor and thrift with none, other things being equal, gives far more promise of future us fulness than one that must be pampered. The rule is to feed just enough of such things as are found necessary to keep the animal in a thrifty growing condition and no more—the less the better—and never allow a milk or butter animal to lay on fat. Experienced dairymen never go into herds that are fat and sleek for their cows. They know that the rat and sleek for their cows. They know that the feeding necessary to produce such conditions in milk and butter animals impairs their power to accomplish the thing for which they are to be kept, namely, the making of milk or butter. Meat, not milk or butter, is what they will ever after make. They will take better care of themselves than of their owners." their owners.

## Does Feed Alone Influence Quality of Bacon?

To the Editor FARMER'S ADVOCATE:

SIR,—During the last few months a great deal has been written about the cause of soft bacon by pork-packers and others. In most of these articles, as far as I have seen, the cause is mainly attributed to the food fed, corn and clover being especially blamed. There are in my opinion two other causes which influence the firmness of the bacon as much, or even more so, than the food fed. For example: A few years ago it was thought to require three years to mature a beef animal to bring it to the proper degree of ripeness for the block; now this can be accomplished in 24 to 26 months, with the can be accomplished in 24 to 25 months, with the beef just as good, or better, than in the former case. How has this been accomplished? By selection in breeding, good care, and feeding. In the case of the hog, early maturity is of more recent date, and we still have, through the country, a great many hogs that are not sufficiently improved by breeding to be "ripe" enough at six to eight months old, even if they have reached the required 188 here. even if they have reached the required 185 lbs. to 225 lbs. live weight. These may be still growing, and laying on flesh rapidly, and are what are commonly termed "sappy" or "growthy." Such pigs as these fed in the same pen with others that have about reached their growth and are ripe at 200 lbs. live weight it is reasonable to suppose that the quality of bacon will not be the same in both cases. I have often noticed in our feeding experiments with swine at the Central Experimental Farm, that during the last few weeks of a feeding test the gain in weight is often put on by one or two pigs in the pen, the others being practically at a standstill, and are, in my opinion, ripe. This will be more noticeable with pigs of different breeding, but is often shown in pigs from the same litter. The second cause is from marketing runts and unthrifty, immature hogs (which have not done well from some cause), when the average weight of the pen is up to the standard. A number of recent experiments have shown that soft and firm bacon can be produced from hogs fed on the same diet. The ques tion of food is important, as it is not advisable to feed young growing hogs largely on carbohydrates, such as corn alone, but a mixture of grains with an allowance of skim milk (say 6 to 9 lbs. per head per day) and a certain amount of exercise is much better and will give better returns than any single grain, when fed to the right class of hogs. A look through an average carload of hogs picked up through the country will show quite a number that should have been retained for further feeding. Central Experimental Farm. R. R. ELLIOTT. tion of food is important, Central Experimental Farm. R. R. ELLIOTT.

## Shying Horses.

Shying is one of the most frequent causes of carriage accidents, yet with a correct knowledge of why a horse shies, and the proper use of the reins, the shying may be partially cured, and accidents often averted. A horse shies from fear, and, while keeping its eyes fixed on the cause of its terror, moves away from it as much as he can. The common practice of drivers is to keep pulling the rein mon practice of drivers is to keep pulling the rein on the side he shies on. The consequence is, he runs you into danger he does not see—perhaps int a ditch, up a bank, or against some obstacle that overthrows your vehicle. You blame the horse, when you yourself have caused the accident by pullwhen you yourself have caused the accident by pulling his head towards the thing he shies at. A good driver always shies before his horse—that is, by noticing the prick of the ears of his horse or by some previous acquaintance about his failing. The driver gives light but continuous snatches to the rein opposite to the side at which it is expected to shy; the horse feels that he is being nulled away. shy; the horse feels that he is being pulled away from the source of terror, and passes without shying in most cases. Learners of driving, and those who wish to correct a bad habit with their horses, have only to try once or twice to be assured of the soundness of this advice.

ROBERT TOMLINSON, Oak Lake, Man :- "I think the ADVOCATE a splendid paper for farmers."