

to run in the barn yard a good part of the day, and to rest under a shed fairly warm at night. Exercise on the part of the dam is indispensable to the well being of the foal she is carrying.

A small quantity of grain (bruised oats) with bran occasionally may be necessary for the mare in winter unless the hay is very nutritious, and when the foal comes before grazing time, bran mash should be fed daily as the time of parturition approaches, with half a pint of ground linseed meal added.

It is no certain criterion that the mare will foal within a short time, to see wax gather upon the teats, as in instances not a few this appearance vanishes before the appearance of the foal. Great vigilance is therefore necessary at such a time, especially in the case of young dams, which not unfrequently allow their colts to smother for lack of attention. When so neglected, death will take place within a few minutes after birth.

If the dam is a good feeder and a good milker, she will do fairly well when kept on good grass with plenty of clean water, with the assistance of grain, but when not a good milker, or when the pasture is deficient in quantity, or dried, she should be fed daily a quantity of bruised oats two or three times per day. The colt soon learns to eat of the meal which the mother shares, which is to them a double advantage, not only adding to their thrift before weaning, but also preventing stagnation after this takes place, as they at once take to the consumption of increased supplies of meal.

It is not profitable to work the dam while she is suckling the colt. Heating her by labor seems to alter the condition of the milk, which leads to indigestion on the part of the foal, and consequent scouring.

TREATMENT THE FIRST WINTER.

A good time to wean young colts is when taken from the grass, hence the age at which this may be done will vary considerably. The advantages are that with no other change to follow they at once adapt themselves to their new surroundings, without a second adaptation to the change of more confining quarters the same season, and the mare and colt are easily kept apart at such a time.

Proper, liberal and judicious feeding the first winter are of the utmost importance. The constant aim should be to induce continuous, steady growth without producing what may be termed a fatty condition. They should receive daily in addition to good nutritious timothy hay, or blue grass cut early, a morning feed of 3 quarts of bruised oats, a noon feed of 3 quarts of the same, and an evening feed of 2 quarts, with 2 quarts of bran added, and half a pint of boiled flax seed, that is, half a pint before the boiling. This, with the water in which it is boiled, being poured upon the meal and bran when warm, makes an excellent mash which keeps the bowels in a laxative and healthy condition; give also a little salt daily, or what is better, keep rock salt in the stall. These quantities will not be necessary just at once, but are not too much when the colt is thus gradually habituated, while it may be further necessary to vary them with the character of the colt. A specimen possessing a heavy frame, and which develops early, will require more than one of lighter conformation and lower growth.

TREATMENT THE SECOND WINTER.

They should be kept during the first, second or third winters in a loose box stall, which is all the better to be roomy, but if not large they should invariably have access to the yard, for an hour at least a day. The third winter, if being broken, they may be tied in an

ordinary stall if getting sufficient exercise through driving, but in no case confine them tied when younger, which is adverse to their right development.

The stalls should be comfortable, and sufficiently entiled and kept cleaned, and littered at least twice a day. Standing in filthy stalls induces disease of the hoof, which may never be overcome. They should also be kept separate in the stalls, amongst other reasons, to enable them to get each a proper share of food.

The food the second winter should be similar in character and in quantity to that fed the first winter, always allowing latitude for the exercise of judgment.

TREATMENT THE THIRD WINTER.

The quantity of feed required the third winter will depend largely on the size of the animal, and the stage of development which it has reached. The more nearly matured the less the quantity of the grain feed. As an average at this age 2 quarts of bruised oats three times per day will be sufficient, with a bran mash say three times a week, and a little boiled flax seed.

The first winter, in every instance, they should be halter broken, and the third winter broken to drive. The amount of such driving should be moderate, and will have an important bearing on the amount of food required.

We know that some will object that the quantity of meal mentioned as the daily ration during the first winter is too much in proportion to that fed the third winter. Our answer is try it, but be careful to observe the attendant conditions. On the principle that a big boy busied mainly with his sports and growing rapidly, requires more food than the same person when matured, we argue in favor of the larger ration for the colt in the earlier stages of growth.

SUMMER TREATMENT.

When plentifully supplied with succulent pastures, timothy, blue grass, etc., and abundance of water and shade, they require no further grain supplement until the pastures fail. Care should be taken, however, that when first turned on grass they are not allowed to remain out too long. It is all the better if the pasture is scant at first, as, otherwise, eating too much of it may induce colic. The better way is to allow them to be out but a portion of the day at first, while the grain ration is lessened by degrees.

The ration and treatment for draught colts is somewhat similar, with the difference that a somewhat more liberal allowance of food may be necessary.

All this means labor and outlay, but it is labor and outlay that will be followed—barring accidents—by very satisfactory returns. A very large proportion of the horses in our country are not worthy of the name. They are not general purpose, heavy draught, roadster, nor carriage, but non-descript, best fitted for consuming food and producing feelings of vexation when one looks at them.

There is, however, a cheering improvement of late, a desire for which will, we trust, be caught up by every breeder in the land. It should be a sacred rule with all who engage in breeding horses to keep them pushing vigorously straight ahead from the day of birth until matured.

FOR THE CANADIAN LIVE-STOCK JOURNAL. On British Polled Cattle.

BY R. C. AULD.

(Late of Tillyfour, Scotland.)

The JOURNAL for February—a most excellent number of a most excellently conducted stock paper—has just reached me. I really would not like to miss any number of it—it is now like an old friend. Its contents, its appearance, and its art—i. e. illustrations—are

steadily improving, showing that there are right men at the helm. I take special notice of what your correspondents are saying; for they are a class that can do much good or much unintentional or intentional harm. It was therefore with regret that I read Mr. Kough's notion as to "the establishment of the Aberdeen-Angus cattle. Mr. Wm. Kough's idea is certainly of the newest manufacture—brand new:

"When the breed was first established, which was some eighty or a hundred years ago, it was done by crossing the old Galloway breed with a Shorthorn, or a horned bull, and then judiciously selecting, so as to produce an ideal type in shape and color."

In the next sentence he says:

"The Sussex Red Polls would appear to have been produced by a cross from a horned bull on Galloway cows, and then bred to each other!"

Mr. Wm. Kough must either be extremely ignorant or have sources of intelligence available to none but himself, for it is the first time I have heard of a Sussex Red Polled breed. But this serves to show the value of Mr. Kough's lucubrations as to the "establishment" of breeds. As to the

SUFFOLK POLLED BREED.

I have just looked over the works of Marshall and Young, who wrote from 1780, and whose statements would hold good a long time previous, and nowhere do they say that the Suffolk was indebted for origination or establishment to the Galloway—that the breed was then established as a universally Polled breed—while "many of the Galloways were horned." They, indeed, deprecated all attempts at such a cross. Certainly there were large numbers of "Scots" cattle sent into these counties—which no one can say were used there for other purposes than "fattening." They (Marshall, etc.) do not give any grounds for the summary statements like Mr. Wm. Kough would make—which are simply cuckoo-like.

ILLUSTRIOUS DESCENT ERRONEOUSLY ASCRIBED TO GALLOWAYS.

Of these Galloways there were, according to Marshall's enumeration (and he is, it may be said, the earliest authority we have), the large and important class of "Lowland Scots." Let us identify. These were from the Northeastern counties—the calf-ground of the Aberdeen-Angus. Now in these counties the breeds were well known to consist of three (a) the lowland, (b) the midland, i. e., 'twen-low, and highland, (c) the Highland. The last may be here dismissed from consideration, as it is included in Marshall's "Highland Scots." The second, (b), were the splendid horned race of Fife, Angus and Aberdeen, now, alas! long extinct (the "some of them horned" of Marshall's Lowland Scots), of a much superior grade to the original horned Galloway. The first (a) was the native Polled race of Angus and Aberdeen, the "some of them" Polled of Marshall's Lowland Scots, known provincially, from time immemorial, as "Angus doddies" and "Buchan humlies." Such was the composition of the "Lowland Scots" of Marshall, including the horned and Polled breeds of the Northeast counties. No one here denied the existence of these horned breeds in these counties. We have gloried in them and, figuratively, wept over their extinction. But they were provincially regarded as distinct from the Polled, and these had distinct titles, "Angus-doddies" and "Buchan-humlies." There were always these two distinct kinds in the north. On the other hand in Galloway there has always only been one kind. The Galloway breeder would persistently endeavor to deny that his breed was evolved from the recently Horned Galloways—he does not glory in that ancestor; he is ashamed of the original, and not