

**Indigestion in Horses—IV.**

**Flatulent Colic.**—A disease commonly called flatulent colic is quite common in horses. It is a form of indigestion, and in the early stages the symptoms strongly simulate those of the disease already discussed as acute indigestion. This condition is much more serious than spasmodic colic, and the causes are much the same, viz., changes of food or water, overfeeding (especially after a long fast or when overheated), food of poor quality, severe exercise too soon after a meal, a weakness or partially inactive state of the digestive glands, etc. Food that ferments readily, as green clover, turnip tops, etc., especially if wet or frosted, is a fertile cause. It sometimes occurs during the progress of other diseases, indicating a very grave condition. This, and in fact mostly all intestinal diseases, occasionally appears without recognizable cause, due, no doubt, to a nonactive condition of the digestive glands.

**Symptoms.**—The symptoms do not appear so suddenly, nor yet are they so violent or alarming to the ordinary observer as those of spasmodic colic. The animal becomes dull, uneasy, stamps his feet, probably kicks at his abdomen, looks around at his flanks, paws, lies down carefully, may roll, gets up again and continues to show uneasiness. The pulse is increased in both force and frequency, and the respiration is often more or less labored. The symptoms of pain are practically constant, but vary in intensity. In a short time after the first symptoms are shown there will be noticed a more or less well-marked fullness of the abdomen (bloating) more marked on the right side just in front of the point of the hip. The visible mucous membranes become injected, the pulse continues to increase in frequency but usually gradually loses force, the respirations will be labored in proportion to the degree of distention of the abdomen with gas. The extremities are usually cold, and there is often a twitching of the muscles. If relief be not afforded the symptoms continue to increase in severity, bloating becomes excessive and death takes place from rupture of the intestine, suffocation or absorption of gases into the circulation.

**Treatment.**—Place in a roomy box stall or paddock. Agents which combine with, neutralize or dissipate the gases are indicated. For this purpose there is probably nothing that can be safely given by the stomach that acts so well as oil of turpentine and raw linseed oil, one to three fluid oz. of the former in half a pint to a pint of the latter (according to the size of the patient). If necessary the dose may be repeated in an hour. When this is not quickly obtainable 1 to 1½ oz. of carbonate of soda (washing soda) or 2 to 3 oz. bicarbonate of soda, (baking soda) dissolved in water should be given. The patient should be well bedded and kept as comfortable as possible. A couple of gallons of warm, soapy water should be injected into the rectum occasionally. If pain be severe it should be combated by the administration of 1 to 2 oz. chloral hydrate dissolved in water or 1½ fluid oz. each of tincture of belladonna and sweet spirits of nitre in a pint of cold water as a drench. This anodyne dose may be repeated every two hours as needed. If bloating becomes excessive care should be taken to prevent the patient from throwing himself down suddenly, as there is danger of this causing rupture of the distended intestine. If the bloating becomes so marked that there is eminent danger of suffocation or rupture the patient should be punctured on the right side at the most prominent part between the point of the hip and the last rib, to allow the immediate escape of gas. This operation, if skillfully performed with a trocar and canula, has proved very successful in most cases, but the use of knives and other crude instruments, has not usually been followed by satisfactory results.

In a case of this disease where the administration of the doses recommended does not gain relief in at most two hours it is better, where possible, to secure the services of a veterinarian. Where this cannot be done the attendant can only do his best according to instruction.

**Constipation of the Bowels.**—In many cases may be looked upon as one of the symptoms of other digestive diseases rather than as a disease of itself. In other cases it is the primary trouble. This is often noticed when a sudden change of food, especially from hay to straw is made, as is often the case in the fall when the work is finished and the horses will have little or nothing to do for a few months. In about a week or ten days after the change is made the symptoms of the trouble become apparent. In many cases it occurs without well-marked cause, and a change to a laxative diet will correct it. It may be due to a weakness of the digestive glands, in which case the administration of a dram each of nux vomica and sulphate of iron 3 times daily will suffice.

**Symptoms.**—The symptoms are not usually alarming. We notice that the horse has not his usual vitality, he is somewhat dull and his appetite is impaired, and the excreta is small and

lacks moisture. If the ear be placed to the abdomen an absence of the normal intestinal murmur will be detected. The murmur may be almost absent or it may be of a metallic nature. There is a partial or complete paralysis of the muscular coats of the intestines, hence, the absence of or altered nature of the sounds.

**Treatment.**—The administration of active purgatives must be avoided, as a purgative cannot act so long as the paralysis exists, and may do harm, by irritating the intestines. The paralysis must be overcome by administering nerve tonics as nux vomica in 2 dram doses three times daily, followed by one to two pints of raw linseed oil or 4 to 6 drams aloes and 2 drams ginger. Injections per rectum should be given, and the patient fed on laxative, easily-digested food.

WHIP.

**LIVE STOCK.**

**A Summer Silo has a Place.**

The practice of soiling seemed so radical at first that it was not universally adopted, neither has it yet become established on the large percentage of farms throughout Canada, but it is yearly working itself into the system of farming now being carried on where land is limited and the operators are after dividends and profits. True, it is the labor problem has discouraged the custom, but arrayed against this obstacle is the decreased area of land required to maintain an equal-sized herd. There is no doubt but what more labor is involved in the soiling practice, but most crops used for this purpose can be mowed with the machine, raked with the horse rake loaded with the hay loader, and spread on the barn floor twice a week and preserved in good condition. This eliminates much of the labor and wasted time often considered when the hand-scythe and wheel-barrow are used to carry out

**Why Not Have a Dehorning Day?**

Now-a-days things which concern everybody are done in a co-operative way. There is "clean up day," "alfalfa day," "hog cholera day," but the greatest obstacle in the way of a dehorning day is that the calves should be deprived of their horns before they are three weeks old, and all the calves in the country are not the same age. However, a particular day of each week might be set aside as a fitting time to use the caustic potash freely, and in a humane manner perform the operation which is so necessary and desirable from many viewpoints. In their primitive state cattle required horns, they were their sword and battle axe in time of peril, but in the domesticated state horns are no more necessary than a repeating rifle at a peace conference.

The mandate of the Union Stock Yards, Toronto, that \$2.00 per head shall be deducted from each horned animal is conclusive evidence that horns depreciate the value of stock offered. One visit to the yards will convince anyone that this move is just. The lacerated sides of a number of the animals that have been ripped by the horns of others in transit or after arrival, and the bawling and frantic bellowing of the weaker ones when being pinned to the wall by a more pugnacious creature are proof that the horns are a detriment. Furthermore, the animal may not show any exterior signs of injury, but the dressed carcass often tells the story by bruises and red punches. These are often inflicted by careless drivers but more frequently it is the result of horning, and salesmen claim that it materially decreases the appearance and value of the carcass. Cattle without horns are more quiet in the runs, and it behooves the feeder to forcibly remove their horns in the fall, and with a full-grown animal it is little short of a brutal operation. Farmers who allow the young calf to grow up without removing the horns are even more responsible for the pain to the creature than the feeder who makes it fast and with saw and clipper painfully separates the horns from the bawling brute.

Many a lasting scar or perhaps an eye or limb could often be spared the attendant who is constantly working with the stock if they were deprived of such deadly weapons. True, it is many breeds and especially show animals of those breeds are enhanced in value through the possession of those ornaments, but those creatures are usually trained to deport themselves manfully and the risk is not so great. Barring such class of stock, where opinions might differ, there is still a host of cows fit only for the dairy, and they are just as productive and quite as pleasing in appearance when deprived of their dan-



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this end. The usual mid-summer shrinkage in milk or flesh can best be avoided by housing the stock in the stable during the heat of the day, and turning them out at night for exercise and grazing. A smaller run will suffice where they receive liberal rations during the day.

In Wisconsin it is considered that one acre of soilage crops equals about 2½ acres of the good blue grass pasture for feeding dairy cows, but the matter of corn silage in the summer may be considered soilage as well as clover, alfalfa vetches or rape.

Many stockmen now have at least one silo on the farm, but there are many cases where a second silo to be opened in the spring would be a money-maker for the place. On an average \$250 should erect a serviceable silo that would hold at least 100 tons. \$1.25 is the approximate cost of producing and ensiling one ton of corn. This places every ton of silage at a total cost of \$3.75 the first year. Dairy men now-a-days admit that corn silage in the silo is worth \$3.00 per ton, and if this be so there is only a debt of 75 cents per ton of silage outstanding against this venture. This could be easily wiped out in the second year and handsome profits gained.

From experiment it is hard to discriminate between ordinary, forage-crop soilage and corn silage. Taking them under similar conditions they give practically equal results, thus it seems that if labor is to be scarce considerable saving can be made by using the silo in conjunction with the field, thus producing the largest crop of forage possible to grow on an acre of land, and to be preserved in the best possible manner.

gerous appendages.

The most effective and humane method to attain this most desirable end is to use a stick of caustic potash. Moisten it well and rub it on the sprouting horns before the calves are three weeks old. Rub it on the horns only, and if necessary repeat the operation. If properly handled there is no disfigurement and a happy result. Let us have a dehorning day.

**THE FARM.**

**Farm Engineering.**

**WATER WHEEL INSTALLATION AND COSTS.**

A preliminary survey and outline report by a competent engineer is advisable in every case where a water power plant of any great size is to be erected. Such advice is not expensive and will many times set the farmer on the right track regarding details of his venture. For small installations however, the farmer may rely on his own judgement and the help available from the manufacturers whose wheel he purchases. This series of articles has for its purpose the training of the farmer to the extent that he may recognize the possibilities lying in the small stream running through the fields and may be able to determine the power available from it and the kind of wheel to purchase. Just what installation is best in each case and the exact cost depends upon local conditions. The best we