

Correspondence.

OUR COUNTRY ROADS.

How They Should be Worked—Something about Sassafras.

EDITOR PROGRESSIVE FARMER:—Glad to see you taking an interest in the improvement of our public roads. Glad to know that papers like the *Salisbury Watchman* and *Wilmington Star* are waking up this late in the evening of the 19th century and are realizing that something must be done with our public roads. It is waste of time to argue that good roads are a benefit to all. The question is: how are we to get good roads? The answer is, the State must make them. How should the State make them? is the question of the hour. As money represents labor and as labor makes all things that can be made by man, therefore, it is necessary for the State to raise the money by which our public roads are made and kept in repair. There are only three ways by which the State can raise the money:

1st. By taxation on labor.
2nd. By taxation on labor and property.

3rd. By taxation on property.

The first (tax on labor) is the present mode in North Carolina. It provides for only human labor to work the roads with and compels said labor to furnish the implements for working the roads. The overseers are compelled to be overseers, and they only demand of unwilling labor to do enough to keep them from the clutches of the law. "You can take a horse to water but you cannot make him drink." You can force labor to appear on the roads so many days in the year, but you cannot make roads with this system. The most ignorant laborer understands that property is enhanced in value by good roads, and although said laborer may live on property enhanced in value by good roads—roads made good by his labor, he knows the land lord can say depart and he departeth. His work remains, but he cannot enjoy it. The country laborers know there is something wrong in a system that throws the entire burden of keeping up the public roads upon them. Property says we pay all the other expenses of the government. Let us see. There are 120,000 country laborers in this State liable to road duty, liable to six days work, valued by the State at one dollar per day, making a tax on labor for roads of \$720,000—nearly \$100,000 more than all the other expenses of the State government, and yet labor pays a part of the expenses that property claims to pay. Is it any wonder that this unjust system is a failure?

The second (tax on labor and property) is more fair and efficient than the first. It is the law in force in Mecklenburg county. Labor recognizing that property is willing to bear its part of the burden, does better work than ever before, and does said work more cheerfully, because property bears its part of the tax and furnishes material by which the roads can be improved.

The third (tax on property) is the plan by which the streets in our towns and cities are made and kept in repair. While I never expect to live to see it applied to our country roads, I am satisfied it is the best and cheapest way of keeping up our public roads. It is not worth arguing a question so far in the future.

The newspapers that only talk of the benefits of good roads remind me of a meeting (of farmers) I once attended. A committee was appointed to build or rent a hall for said farmers to meet in. I was appointed one of the committee. I found no money was provided to build or rent said hall. I resigned. Will not the newspapers discuss the way to get the money to improve our roads? Get the money and we will have good roads. I have been overseer, and, with only labor at my command, I felt, like other overseers, that I was forced, the labor was forced and the task of making a good road was nearly as bad as building the hall (with no means provided) referred to above.

Mr. G. M. Yoder in an article, "To eradicate Sassafras," (*PROGRESSIVE FARMER*, Nov. 24th) states that heavy applications of stable manure will destroy sassafras. Sassafras indicates that the soil is deficient in ammonia. It is the ammonia of the stable manure that destroys it. I have seen it destroyed by heavy applications of old fashioned Peru-

vian guano. Should any of your readers try Mr. Yoder's plan, they should see to it that the stable manure is fresh and strong or they will be disappointed. If they could get a fertilizer containing as high per cent. of ammonia as the Peruvian guano sold before the war, they would find it equally as efficient.

NOTES FROM ENDERLY.

A FARMERS' CONVENTION.

Can We Manage Our Affairs—Some Plain Words from a Plain-Spoken Man.

EDITOR PROGRESSIVE FARMER:—I have watched the proceedings of the South Carolina Farmer's Convention with much interest from its beginning, but am especially pleased to see the stand they are taking in their demands for justice at the hands of the general assembly.

North Carolina needs such an organization, can have it and must have it if they expect proper recognition from our law makers.

Take our Board of Agriculture and you will find that it is everywhere unpopular with the people. Why? There are several causes. All trades and professions are organized except the agriculturists. All these prey on the farmer and are doing all they can to prevent his protecting himself, either by organization or by State aid; and when the State institutes a Department of Agriculture, there must be a direct tax on something to meet it, so as not to draw any moneys out of the common treasury. Why this discrimination? Do the farmers pay no taxes? Are they entitled to no State aid? Does agriculture enter into the industries of North Carolina? All these and many more questions present themselves to our minds, and why should we all not have equal justice?

I believe that the fertilizer tax is a just one and one that ought to be imposed, but just as other taxes. The system of taxation and appropriations we could make out with, but the administration of the department is largely in the hands of those who are not agriculturists. Indeed, not one of the officers of the Department is a practical agriculturist and very few members of the Board are strictly farmers. Why is this? Well, one says the farmers have not the ability to manage their own affairs, so we must have lawyers, doctors, colonels, honorables, merchants, &c., &c., to manage the Department and administer agricultural lore to the farmer, thereby insulting their manhood, and the result is that the farmers neither co-operate with, advise nor have anything to do with the Department, except to cast slurs at its administration.

"The farmers ought to keep silence, it will hurt some political party" says some political sage.

Suppose a farmer without legal attainments were to attempt to administer justice on the Superior or Supreme Court bench, what a cry of derision would go up from the bar. Or suppose him to meet in the medical conventions to discuss physics? Why, every sensible man would at once brand him as a presumptuous ignoramus, and they would be about right, but not more so than some of those who attempt to manage our Board of Agriculture and Agricultural Societies, who know nothing of and care less for the interests of the farmers. I say, Mr. Editor, away with all such and give every business and profession the management of its own affairs, and we will see better times, more harmony, and each profession will then be responsible for its own cause. Till then, adieu prosperity.

I hope you will induce the farmers of the State to meet in Convention at Raleigh some time in January and give expression to their views to the legislature.

Call the Convention; if only three farmers come, possibly we can have five two years hence.

Respectfully,

FARMER.

WHITE OR YELLOW CORN.

The preference for either white or yellow corn is wholly a matter of taste. Yellow corn has generally rather more oil, and is preferable for fattening, while white corn meal is better for working horses and growing stock. The Western or Dent corn is less hearty than our Eastern Flint varieties. It has a greater proportion of husk, does not weigh so much per bushel and is worth less per pound.

Farm Notes.

GIVE THE HORSES SOME LIBERTY.

Horses kept in stables will be all the better for a run in the barnyard an hour every day, where they will not only exercise, but roll in the straw and clean themselves. They may need some extra grooming but their improved condition under this management will repay it.

PAPER FOR WARMTH.

There is no cheaper mode of keeping out cold than by the use of paper, provided it is kept dry. It is impervious to wind, and two or three thicknesses placed between two blankets or even sheets, will preserve as many spaces of confined air, which is even a better shield from cold. Tanned paper can be obtained quite cheaply, and is better for battening sheds and stables than are the boards generally used for this purpose.

BLANKETING HORSES IN STABLES.

After hard driving or heavy work causes the sweat to start, blanketing horses is necessary to prevent them from catching cold while becoming dry. At other times a horse left with his natural covering of hair will need no other in the stable. If the practice of blanketing in the stable is begun with the first cold weather, it must be continued all winter, with additional danger that the horse will take cold whenever brought out for work or exercise.

HORSE AND PIG MANURE.

Although pig manure from the usual grain ration given to hogs is generally very rich, yet it is slow to ferment. Horse manure, on the contrary, heats too rapidly, and is liable to firefang. It is often a good plan to have pigs and horses kept near each other so that the manure which each makes may be piled with the other. Dry horse manure makes a good litter for pigs where straw is scarce, but while it is used as bedding pigs will not, unless confined so they cannot do otherwise, mix their own excrement with it.

RYE FEED.

In looking for cheap grain feed rye is not so likely to be forgotten. It is almost the only nutritious concentrated feed that can be bought for less than one cent per pound. The drawback on rye is that it may be affected with ergot, and thus be unsuitable to animals bearing young. But it is excellent for almost every other kind of stock, and especially for young animals which it may be desired to get into heat for the purpose of inducing earlier breeding. The action of the ergot in stimulating the generative organs into activity is then just what is wished.

GRINDING CORN IN THE EAR.

It is difficult to grind corn and cob thus early and make fine meal. The cob breaks up in chunks and cannot be crushed to powder. But by adding one-half in bulk of oats or barley, this difficulty may be obviated. The mixture also makes a better feed than corn and cob alone. There is some nutriment in the cob, but the chief advantage in grinding it with the corn is to make the meal less concentrated. It is a fact that stock suddenly changed from poor feed to a diet of corn meal often becomes cloyed, loses its appetite and will not gain so much as on an equal amount of corn and cob meal.

OLD TURKEYS FOR BREEDERS.

One reason why so many have poor success in raising turkeys is because they breed from immature birds. The chicks are not so hardy, cannot grow to a large size and gradually run out. Young turkey hens generally give more eggs than older birds but those of the latter are most valuable. The gobbler should be two years old at least, and three or four would be better. By this age, if a good breed, he will have attained an enormous size, and probably bring an extra price in markets where size is thought more important than anything else. This is the season for killing turkeys and to be successful another year the best should be kept for breeders.

DEFICIENCIES IN MANURE.

It is customary to speak of manure from the barnyard or stable as the standard, and many good farmers say if they could get plenty of that they would use no other. But there is great variation in stable manure. It generally contains something of everything that the plant needs;

but the fact that with it grain grown enormous yields of straw with deficient heads shows that it sometimes lacks in the mineral element most essential to successful production of grain. This is very apt to be the case where grain or milk have been sold from the farm for a long series of years, and only straw and hay used as food for stock. Clover hay makes rich manure alone. Other hay needs grain feed with it.

LARGE AND SMALL BREEDS.

Where the cheap production of meat is an object the advantage of the larger breed is obvious. In each animal some waste is required to supply the nervous energy, and the smaller they are, the greater the loss for a given weight. Animals of the same kind consume very nearly in proportion to their weight. Thus the large, coarse woolled sheep may eat twice as much as a Merino only one-half its weight. But it will add more than twice as much fat and flesh, as it does not waste any more than the smaller sheep. Very young animals are an exception to this rule of the larger gaining most rapidly. A litter of pigs weighing perhaps sixty pounds will double in weight very quickly if well fed.

ANNUAL GROWTH OF TREES.

So long as a tree lives it adds something, if only a little, to its growth. While young the annual extension of the shoots will often be two feet or more, but as extension proceeds the number of shoots to which the sap is diverted is greatly increased, thus lessening the amount to each and reducing growth. When apple trees make a yearly growth of ten to fifteen inches it is as much as is consistent with much fruitfulness. On old neglected trees an annual growth of two or three inches and sometimes of only an inch, per year will be made. This is nature's call for manure and better cultivation. In manuring old trees be sure and give plenty of mineral fertilizers, especially potash and phosphate, as these are needed in making fruit. Most of the material for leaves and twigs is carbon, which the tree can get from the atmosphere.

RIPENING CREAM.

How many persons really understand the true meaning of what is called ripening cream? It used to be supposed that each microscopic globule of fat was encased with a caseous membrane, and that only soursing to the verge of decay would set these fat globules free. Later investigations have shown that this was fallacy. The butter globules are entirely free and held in the water of the milk just as the caseous constituents are. The fat is lighter than water and constantly seeks to rise to the surface. Hence the ripening of the cream is more a question of temperature than anything else. The cream need not be said to cause the clinging together of the fat globules, but cream may stand for a certain time with frequent stirrings to bring the whole into a homogeneous state, in order that the separation may be as simultaneous as possible. If slightly sour, no harm is done—in fact, it assists in the better and more complete separation of the butter—but the cream should never be allowed to pass the first stages of acidity, else the butter globules may be themselves attacked.

Again to develop flavor, the fat must come into perfect contact with the oxygen of pure air, for only in this way can the change be properly made. The fat absorbs oxygen, and when the proper quantity is absorbed unless there is a tint in the air—and if so, this tint will be taken up and vitiate the butter—and of course reduce the selling price.—*Farm, Field and Stockman.*

MAKES AN ANGEL OF A DYSPEPTIC.

So here is a truly delicious secret all the way from Yorkshire, in the way of a breakfast cake which will transform the driest dyspeptic into a smiling angel. This secret cake may also serve for lunch or tea. Roll rich puff paste into rounds the size of the breakfast plate, and half an inch in thickness; strew thickly over one pound of currants, with a little candied lemon, chopped, which has been most thoroughly steeped in rum or brandy; over this place another round of paste; unite it closely round. Cut into quarters, but leave them close together and bake immediately without separating the quarters, serving either hot or cold.—*N. Y. Evening Post.*

MANAGEMENT OF BREEDING EWES.

I would now draw attention, (says "A Practical Farmer" in the *Agricultural Gazette*.) to the important subject of the period of gestation. Any abuse to the animal just at this time means a very serious loss to the owner. Among the numerous modes of abuse we note:

1. Improper dieting.
2. Insufficient food.
3. Want of regular exercise.
4. Too much crowding and knocking about when close to lambing.
5. Over feeding before lambing.
6. Dogging or starting ewes by a careless shepherd.

I refer to those abuses because I think that on the five course shift we are able to avoid the occurrence of most of them entirely, whereas under the four course the matter is not so simple.

To begin with, I would give it as my opinion that the most critical time in intra-uterine life is when the ewe is about half gone into lamb. I think that at that period ewes are more liable to go wrong if subjected to abuse either of food or otherwise than at any period of their interesting condition. A ewe which has taken the ram the last week of September is half gone about the second week in December; at that time on the five course, the ewes are on grass, receiving, if necessary a few turnips laid down daily in the field. I should, myself, prefer a little bran, oats and cake to roots but my objection at this important time is the crowding of ewes around cake boxes. A greedy ewe will rush from one box to another, kicking against her neighbors, and twisting her body about in a way not calculated to have good effect on her afterwards. I should therefore prefer that about a week before half-time the ewes were gradually brought on turnips getting just enough to do them good and avoid all gorging. When scarcity of grass indicates that the time has arrived for going on turnips I would advise that the ewes to be fed in such a manner that their health and condition be maintained and kept regular. The demand upon the ewe increases as the fetus grows, therefore the stock-master must keep pace with the necessities of the case. I never used my in-lamb ewes as cleaners up after fattening sheep, and never will. I believe the ewes to be not only the most valuable item of the farm, but at this period the most susceptible of injury from unsuitable provender. Good hay or chaff is necessary at this time; that every one knows.

As lambing approaches you want carefully to avoid too high condition and yet guard against poverty. If I think my ewes too fleshy, I rather stint them than otherwise for about a week before lambing. To any which are undoubtedly too fat I give a dose of opening medicine, may be three days before we expect them to lamb; it reduces the liability to inflammation and straining. After the ewe has quite recovered from the effects of lambing and is out of danger, I believe the better you feed the better results you will have in the lamb. One great difficulty I had with my shepherd at first was to keep him from over feeding the ewe from the time she had recovered from what I would call the labor. No sooner had she satisfied herself with her lamb than he began to give all manner of good things. This is a great error (and my herd saw it.) Until six or seven days are over I do not think the danger is past. You don't want a bursting udder for two newly born lambs, much less for one; you only cause uneasiness to the ewe, and if you don't hand-milk in such a case the ewe may go in the wrong in that direction. Ewes treated on this system will drop the finest of the lambs, big and strong and healthy; a good color, full of firm flesh, able to stand exposure almost at once—you will have no little white cripples and no nursing to do, nor warming at the fire; that is, comparatively speaking your ewes will get over their troubles easily, and your skin buyer will not find his presence required as much as when he visited you in the four course days.

—An Australian has invented an electrical machine gun which he claims is capable of firing 120 rounds "every few seconds" from any position and in any direction. Experienced officers have recommended the apparatus.