

markets fruit should be shipped. He would sort and pack fruit honestly and carefully, put the grower's full name upon it, together with some distinguishing trade-mark, and then select some good market and stick to it year in and year out. In the discussion which followed, Mr. Evans, of Missouri, one of the largest growers of peaches and apples in that State, said that they had found it most convenient and profitable to sell on the car track, and have the middleman take the risks and shoulder the responsibilities from that time on, but Mr. J. H. Hale objected that this was but a poor way out of the difficulty, since the middlemen were not in the business for their health alone, and what they got out of it the grower ought to get. He agreed with Mr. Kerr that the remedy lies in packing "straight," marking with your own name and selling always to the same man. The result would be that the consumer, seeing the goods and knowing the quality, would say "I want so much of this fruit," and the price paid would be a secondary consideration.

Plant Individuality.—Prof. G. Harold Powell, of Delaware, in discussing "The Importance of the Plant Individual in Horticultural Operations," said that the time had passed when nursery trees could be considered as satisfactory merely because they were well-grown and true to name. Heretofore large and well-formed trees were what was desired, and nurserymen had grown them, and other considerations had been of minor importance. Now, however, orchardists were realizing that the character of the tree from which the scion was cut had a direct and important influence upon the character of the offspring. He cited the case of an orchard of Spitzburg apples, which several years ago were all severely attacked with apple-scab, a black spot, with the exception of one tree, the fruit of which was entirely free. This fact would indicate that this one tree was better able to resist this fungus than the other trees, and in the opinion of Prof. Powell, nurserymen would be justified in expecting that a fair per cent. of nursery trees grown from scions taken from this tree would be similarly resistant to this disease.

Horticulture at the Paris Exposition.—Col. C. B. Brachett, United States Pomologist at Washington, D. C., told of the preparations being made to give a satisfactory exhibit of the horticultural products of the United States at the Paris Exposition. In Colonel Brachett's opinion there is no other way in which the fruit of a country can be better advertised and foreign purchasers shown what a country has for sale than by making such exhibits in foreign countries. So far as pecuniary returns are concerned, fruit exhibited in a fresh condition is probably the best advertisement, since intending purchasers can then see exactly what they may expect to secure in the country making the exhibit.

F. C. SEARS.

Nova Scotia School of Horticulture.

QUESTIONS AND ANSWERS.

[In order to make this department as useful as possible, parties enclosing stamped envelopes will receive answers by mail, in cases where early replies appear to us advisable; all enquiries, when of general interest, will be published in next succeeding issue, if received at this office in sufficient time. Enquirers must in all cases attach their name and address in full, though not necessarily for publication.]

Veterinary.

TO DRY A COW.

E. C. B., Perth Co., Ont.:—"Kindly let me know, through the next issue of your paper, of some cheap prescription or easy method of stopping the flow of milk in aged cows without reducing the flesh, prior to fattening on the grass."

[Give a dose of Epsom salts, 1½ lbs.; ginger, ½ oz.; dissolved in 1 quart hot water; and drench when cool. Keep the cow in on dry food, do not milk her out clean, and milk at irregular intervals. Apply colorless tr. iodine to the udder once a day. This should check the flow of milk and assist in accomplishing the desired end. It will deplete the cow's condition somewhat.]

RAM WITH ONLY ONE TESTICLE DOWN.

R. D., Wellington Co., Ont.:—"I have a ram which shows only one testicle. Is he safe to depend on as a breeder?"

[We would not be afraid to use a ram with only one testicle down, but would take precaution in this way: Before turning him with the ewes paint his breast with red paint so that he will mark all the ewes as he serves them. When all have been served and the first ones have gone three weeks, if several go back to him again it would be well to put in another ram whose breast is painted blue or black. In our experience, rams such as R. D.'s are about as sure as those showing both testicles, but we have invariably made it a rule to put in a second ram late in the season painted as we have stated, so that those not holding from the first ram will have another chance, and the last color put on the ewes will indicate the sire of the lambs.]

COWS WITH SORE MOUTH.

J. C. B., Middlesex Co., Ont.:—"Can your Veterinary Department tell me what ails my cow? She couldn't eat easily, and an examination of her tongue showed that the skin was off in patches. We kept her in and fed her hay, green fodder, shorts, chop, bran or anything she seemed able to eat, letting her out at nights. She is all right again, but another cow is similarly affected, but is getting better. However, my neighbors say it will

keep recurring until the cow is fit for nothing. The first symptoms we noticed were frothing at the mouth and inability to eat. The appetite was all right as soon as they could chew. Can you tell me the probable cause and a cure?"

[The fact that the tongue healed and the cow went on eating soon after her feed and quarters were changed, it would seem that the trouble was caused by the food she was getting. Sometimes coarse cornstalks will cause the tongues of cattle to become sore. It would be well to withhold any rough food that would be liable to cause the trouble referred to, and give any that are affected 2-dram doses, twice a day for a week, of iodide of potass., which will cause rapid healing of the sore parts.]

DISTEMPER.

J. L., Wellington Co., Ont.:—"I have a two-year-old imported colt which has a very bad cold, with symptoms of distemper. Glands and legs badly swollen. What treatment would you recommend?"

[A good veterinary surgeon should be called in to treat him as soon as possible, as he is liable to become thick in the wind if not relieved very soon. The following is a good treatment for distemper: Rub the glands well with white liniment, made as follows: Half pint of water, 2 ounces spirits of turpentine well shaken, 1 hen egg beaten up, 2 ounces methylated spirits of alcohol, and enough hard water to make one quart. Shake well for several minutes after the introduction of each ingredient. It may be necessary to apply a hot poultice to the throat at night for a few days. Give a teaspoonful three times a day on the tongue or in a mash of saltpeter and sulphur, equal parts. The colt should be kept in a well-ventilated stable and clothed comfortably to avoid chills.]

Miscellaneous.

BUILDING STONE WALL.

FARMER, Bruce Co., Ont.:—"1. What is the customary measurement of a perch of stone wall? 2. Can the mason claim pay for all the openings in wall, such as window and door spaces? 3. Do you consider a wall first-class that has numerous holes through it, allowing daylight to shine through?"

1. It is the usual custom to consider a perch of stone wall as being 1 foot high and 16½ feet long, without regard to the thickness. The thickness, however, should be agreed upon with the mason in making the bargain to have the work done, and the price fixed accordingly.

2. It is customary for the mason to receive half pay for the openings in walls up to ten feet square.

3. A first-class wall should have no holes through the masonry except those intended to be left for ventilation, drainage, etc.]

A QUESTION ASKED RE FROSTPROOF COVERING FOR WATER PIPE.

EPPING, Grey Co., Ont.:—"I have an underground pipe that conveys the water from my well, with windmill attached, to my barn, a distance of about 300 feet. The pipe is about three feet below the surface. During the cold weather last winter it froze up, which caused me a great deal of inconvenience. Is there any system of putting down those pipes to keep the frost out? I am aware if I put it down deep enough that I will have no trouble, but it is not convenient for me to go much more than three feet. Would an air space over the pipe do any good, or wrapping the pipe with tar paper? I would like to hear from someone that has experience in this line."

[We cannot speak from experience in this matter, but would consider an insulated air space would answer well to keep out the frost. A wrapping of mineral wool should prove a perfect non-conductor of frost. Will readers give us the benefit of their experience?]

STARTING TROUT PONDS.

OLD SUBSCRIBER, Norfolk Co., Ont.:—"I have a spring on my farm that runs the year round, and I would like to dig a pond for fish, to be supplied from that spring. How large and deep should it be to supply one family with fish? Where can I get trout or pickerel spawn? Or would it not be cold enough for those fish? Will it need protection by trees? Please answer through the columns of the ADVOCATE, and oblige."

[A pond having 8,000 square yards of surface should be large enough, if well stocked, to supply a large family of fish-eaters. The deeper the center of the pond is the better, but it should not be less than four feet. It should slope up, to be shallow at one edge. It is not necessary to have shade trees, but a board shelter should be provided. Trout or pickerel spawn or fry can be secured from the Government fishery at Newcastle, Ont., or from Chas. Wilmot, Credit Forks, Ont. Geo. Garnham, Guysboro, raises trout fry for the market. It would not be wise to start with spawn, but 10,000 fry or 1,000 yearlings should be put in next spring, which will give good fishing in 1901. The yearlings could take care of themselves if fed in the large pond, but fry should have a small 20- to 30-foot square nursery pond, covered with wire netting, where they could be protected and well looked after. This pond should empty into larger one. See reference to this subject in 1898 Christmas number of FARMER'S ADVOCATE, in article on Mr. W. E. H. Massey's farm. The fish will require feeding on grated liver and a little oatmeal.]

ICE HOUSE PLANS.

W. G., Sudbury Co., N. B.:—"Can you give me the dates of the FARMER'S ADVOCATE in which have appeared articles, illustrated or not, on ice houses and how to build them, say within the past year or two?"

[See our issues of January 15th, 1898, page 32; September 1st, 1898, page 409; January 15th, 1897, page 35; and January 1st, 1897, page 8.]

ROOT PRUNING.

A SUBSCRIBER, Cumberland Co., N. S.:—"Is deep plowing among fruit trees where it interferes with the roots injurious?"

[We find many of the best orchardists of the present day doing most of their cultivating by means of disk, spring-tooth or some such cultivator, and only plowing in spring when a cover crop has to be turned under, and then not plowing deeper than 5 or 6 inches. When trees are putting forth too much wood growth and not bearing fruit, root-pruning is helpful, but ordinarily as little as possible of it should be done.]

RED MAPLE DYING.

S. S. M. HUNTER, Renfrew Co., Ont.:—"We have a red maple tree, ten years old, which has always appeared very healthy, but within the last ten days has shown disease of some kind. The leaves roll up and drop off. Can you suggest any remedy, and what is likely to be the cause?"

[It is difficult to say with certainty what is the cause without seeing the tree. This much may be said, however, that the red maple thrives best in moist soil, and when it is planted in dry soil they are very liable to die, especially during a dry season. In cities, where granolithic sidewalks and asphalt pavements are becoming common, trees, especially red maples, suffer, as it is impossible for much moisture from above to get into the soil. In Ottawa trees are dying from this cause.]

W. T. MACOUN, Horticulturist.

Central Experimental Farm.]

ENGLISH PLANTAIN

(Plantago lanceolata)

RETSEF, Norfolk Co., Ont.:—"I herewith enclose a plant for identification, its habits, and means of destroying it."

[The plant sent us is a species of plantain, technically termed *Plantago lanceolata*, because of the slender lanceolate form of the leaves. It is sometimes called rib-grass, and has become a source of great annoyance in many districts into which it has been introduced from Europe. It comes up from seed, reaches maturity and dies in one season. Its leaves are long, ribbed, hairy, and narrowed at the base. The seed-spikes somewhat resemble timothy heads, but are shorter and thicker. These are usually supported on slender stems about a foot high. Several spikes are commonly borne by each plant. The plant continues to grow throughout the greater part of the growing period of the year. It is most troublesome in meadows and pastures. A good means of dealing with a meadow infested with plantain is to plow it as soon as the hay is cut, and keep the surface well worked until late in autumn. Grow a well-cultivated hoed crop the following season. If the weed appears in tilled fields, plow lightly just after harvest, and cultivate well till fall, then next season grow a soiling crop, hoed crop, or summer-fallow the field.]

POULTRY HOUSE FROM OLD FRAME DWELLING.

SUBSCRIBER, Ontario Co., Ont.:—"We have an old frame house which we purpose using for a hen-house. The walls have been filled in with sawdust and lathed and plastered. Would you please inform us what method to pursue to make it frostproof. 1. Would you suggest concreting the walls inside or bricking? 2. The building is eighteen feet by twenty-four. Would that be large enough to accommodate one hundred hens? 3. We intend putting the building on a stone foundation. Would a double flooring be required?"

[1. Either brick or concrete wall would answer well if built on a stone foundation, and of these we would prefer concrete if it can be kept from freezing until it has become thoroughly dry. It seems to us unnecessary to use either of these sorts of wall, as a durable lining of tarred building paper, held on with strips or lath so as to prevent the possibility of drafts, should make the building practically frostproof, if the outside sheeting is at all close-fitting, and if it can be packed with sawdust all the better, except that sawdust provides a suitable harbor for mice and other vermin. If it is thought fit, grout or concrete could be filled in instead of the sawdust.]

2. It is considered by good poultry authorities that each hen should have six square feet of floor space, and that not more than thirty hens should run together in a flock. The house referred to has 432 feet of floor space, which should accommodate seventy-two hens, or three groups of twenty-four each, in compartments eighteen by eight feet in size.]

3. A double floor is preferable to a single one, as no matter how good the drainage, moisture will come up from the ground at some seasons between the cracks of a single floor, and if any opportunity is given, drafts are always ready to ascend through such openings.]

WM. J. CHALLIS, J. P., Oxford County, Ont.:—"Please find enclosed payment for one year's renewal to the ADVOCATE. I consider it the best and most interesting farmer's paper that is printed."