



## Agricultural Department.

## BUYING PLANTS.

Having prepared and enriched our ground, we are ready for the plants. The kinds and quantities we desire are often not to be found in our vicinity. In private gardens, moreover, even if our neighbors are liberal and have the plants to spare, names and varieties are usually in a tangle. We must go to the nurseryman. At this point, perhaps, a brief appeal to the reader's common sense may save much subsequent loss and disappointment.

In most of our purchases, we see the article before we take it, and can estimate its value. Just the reverse is usually true of plants. We know—or believe—that certain varieties are valuable, and we order them from a distance, paying in advance. When received, the most experienced cannot be sure that the plants are true to the names they bear. We must plant them in our carefully prepared land, expend upon them money, labor, and, above all, months and years of our brief lives, only to learn, perhaps, that the varieties are not what we ordered, and that we have wasted everything on a worthless kind. The importance of starting right, therefore, can scarcely be overestimated. It is always best to buy of men who, in the main, grow their own stock, and therefore know about it, and who have established a reputation for integrity and accuracy. The itinerant agent flits from Maine to California, and too often the marvellous portraits of fruits that he exhibits do not even resemble the varieties whose names they bear. It is best to buy of those who have a "local habitation and a name," and then, if anything is wrong, one knows where to look for redress.

Even if one wishes to be accurate, it is difficult to know that one's stock is absolutely pure and true to name. The evil of mixed plants is more often perpetuated in the following innocent manner than by any intentional deception: For instance, one buys from a trustworthy source, as he supposes, a thousand "Monarch" strawberry plants, and sets them out in the spring. All blossoms should be picked off the first year, and, therefore, there can be no fruit as a test of purity that season. But by fall there are many thousands of young plants. The grower naturally says: "I bought these for Monarch, therefore they are Monarch," and he sells many plants as such. When coming into fruit the second summer, he finds, however, that not one in twenty is a Monarch plant. As an honest man he now digs them under in disgust; but the mischief has already been done, and scattered throughout the country are thousands of mixed plants which multiply with the vigor of evil. Nurserymen should never take varieties for granted, no matter where obtained. I endeavor to so train my eye that I can detect the distinguishing marks even in the foliage and blossoms, and if anything looks suspicious I root it out.

If possible, the nurseryman should start with plants that he knows to be genuine, and propagate from them. Then by constant and personal vigilance he can maintain a stock that will not be productive chiefly of profanity when coming into fruit.

It is not thrift to save in the first cost of plants, if thereby the risk of obtaining poor, mixed varieties is increased. I do not care to save five dollars to-day and lose fifty by the operation within a year. A gentleman wrote to me: "I have been outrageously cheated in buying plants." On the same page he asked me to furnish stock at rates as absurdly low as those of the man who cheated him. If one insists on having an article at far less than the cost of production, it is not strange that he finds some who will "cheat him outrageously." I find it by far the cheapest in the long run to go to the most trustworthy sources and pay the grower a price which enables him to give me just what I want.

When plants are both fine and genuine they can still be spoiled or, at least, injured in transit from the ground where they grew. Dig so as to save all the roots, shake these clean of earth, straighten them out, and tie

the plants into bundles of fifty. Pack in boxes, with the roots down in moss and the tops exposed to the air. Do not press them in too tightly or make them too wet, or else the plants become heated—a process which speedily robs them of all vitality. In cool seasons, and when the distance is not too great, plants can be shipped in barrels thickly perforated with holes. The tops should be toward the sides and the roots in the centre, down through which there should be a circulation of air. In every case envelop the roots in damp moss or leaves—damp, but not wet. Plants can be sent by mail at the rate of one cent per ounce. Those sent out in this way rarely fail in doing well.

The greater part of the counting and packing of plants should be done in a cellar, in order to prevent the little fibrous roots, on which the future growth so greatly depends, from becoming shrivelled. The best part of the roots are extremely sensitive to sunlight or frost, and, worse than all, to a cold, dry wind. Therefore, have the plants gathered up as fast as they are dug and carried to a damp, cool place where the temperature varies but little. From such a place they can be packed and shipped with the leisure that insures careful work.—G. P. Roe, in *Scribner's Monthly*.

## CULTIVATION OF ORCHARDS.

S. G. Minkler at a meeting of the Horticultural Society of Northern Illinois, said the apple, that was once considered a luxury, has become one of the necessities of life as food, and when freely used is conducive to health as well as comfort.

In planting an orchard, the first thing to be taken into consideration is the site. The orchard, of course, should be near the dwelling; but if the ground near the dwelling is not suitable, and cannot be made so by draining, it would be advisable to choose a site more remote from the dwelling. The land should be dry; if not naturally so, should be made so by draining or ridging, for apple-trees will not endure wet feet.

**Exposure.**—I prefer a northern exposure to a southern one, for this reason, that when we have early and late frosts, the wind, of course, is in the north, consequently the frost settles on the southern slope, because it is still there; choose the highest ground on the farm.

**Preparing the Ground.**—The ground should be in good tilth, as for corn, and if plowed deeper all the better, even if trench plowed. The proper distance to set trees is twenty-eight to thirty-two feet; roots spread as well as the top. I have trees set that distance and the branches have long since kissed each other.

**Digging the Holes.**—Did I say digging the holes? The holes should be the size of the orchard; i. e., the ground should be made mellow as deep as the roots are to go; trees should be set four inches deeper than they stood in the nursery, for the reason that the ground settles and the trees do not.

**Selecting the Trees.**—Do not be governed by the usual palaver (five to seven feet) as used by the tree peddlers; but select good stocky four or five-years-old trees, with trunks four and five feet, with branches evenly distributed on all sides; avoid crotches or forks. Go to your nearest nurseryman, if he is reliable, and if you can have your choice in the trees for a few cents addition to price all the better for you. In setting trees, always range your stakes not by the trees you have set; if you do you will be sure to go crooked. In setting, be careful to have no vacancies about the roots; use your hands freely, then pack the earth well around the roots, yea, stamp it well and finish with loose soil, then mulch; this is indispensable; it consists of utilizing any old straw or stack bottom, if half rotten all the better; this should be four inches deep and reach out three feet each way around the tree. The object is to retain the moisture in the ground. The next thing is to stake the trees; this is done by driving the stake on the southwest side of the tree, one foot from the tree, then take your straw band, twisted hard, put it around the tree, then put the strands together, twist again, then part the strands and tie around the stake. I should have said above, to lean the tree in setting a little to the one o'clock sun; also put your heaviest branches on that side; the object in staking and leaning the tree is to prevent too much exposure of the trunk to the sun. If your trees get to lean-

ing that way, the sun will surely scald the bark on the southwest side, and your tree is gone; as soon as you get the branches to shade the trunk you are safe.

**Varieties.**—Be careful not to get too many varieties, say about four summer, four fall and six or eight winter, and this would be too many if you were sure they would bear each year. I will not name the varieties, for you are to be governed altogether by your locality.

**Cultivation.**—The orchard should be cultivated at least eight years, or till it comes well into bearing in any hoed crop, or sown to buckwheat and let it fall back on the ground; care should be taken not to plow too near, or too deep near the trees; when you seed use red clover. It is advisable to shorten in the branches two-thirds the last year's growth, for the reason that the tree has lost roots in being taken up, and that equalizes the top and root.

## TURKEY HATCHING.

It is incomprehensible that we do not adopt the French system of employing turkeys in the hatching business, since these birds have an extraordinary aptitude for it, and will sit contentedly month after month, bringing forth brood after brood—as many as five consecutive hatchings by the same bird not being by any means a rare occurrence,—without suffering in the least from their exertions. Even so late as the month of October, we have in more than one instance seen fifty turkeys thus engaged at one time, their owners telling us that had it been in spring we should have found the number four or five times as great. And each of these turkeys was hatching *de commande*, the brood being destined for some special person. The birds were all healthy-looking, and in good condition, and as soon as their work is over would be fattened and taken to market, new ones being purchased at the ensuing season, unless some one of them should be so exceptionally good a mother as to make it worth while to keep her during the months of idleness; for it is a great point of economy to maintain as few stock birds as possible, and merely to buy eggs and brooding fowls when needed from those whose business it is to supply them.

The turkey mother when fattened fetches quite as much as was originally given for her, and therefore has cost for the time of incubation nothing more than her keep, and whatever it may have taken during three weeks to put her into condition. All this is most accurately calculated, and the *fermiere* knows exactly what she is about. Sixty-five centimes will, it is said, feed the turkey during each hatching, and it will take one franc seventy-five centimes more to make her ready for the market; and as it is only necessary during incubation to attend to her once a day, the process does not interfere with any other avocations, or require any of that close attention, failure in which is perfectly fatal in the case of the artificial process.—*Macmillan's Magazine*.

The *Germantown Telegraph*, speaking of fences and shingles, says that the decay of wood is not hastened by moisture alone, but by heat as well. Any black substance applied to wood, though it keeps out moisture, will attract heat to a destructive degree. A fence tarred and exposed to the sun soon crumbles away, while a whitewashed fence will outlast it for years. The white color turns away rather than attracts heat, although every rain washes through it, thus showing that heat is the destructive element to contend against.

As the result of many and apparently carefully conducted experiments, Kirchner arrives at the conclusion that the cream of milk deposited in tin pans rises better than that of milk placed in wooden vessels. It has also been found that usually a larger yield of butter is obtained when the milk is cooled by means of ice than when the milk is allowed to assume the desired temperature under ordinary atmospheric influences.

Fowls should always have some hard coal screenings placed within their reach. Feed occasionally a few oats. Always keep some old iron in the drinking water; give all the out-door exercise you possibly can; even chase them round a little. Place plenty of straw for them to scratch among for exercise. Throw some small grain among this to encourage scratching.

## DOMESTIC.

**BAKED BEETS.**—These excellent vegetables are quite as good baked as boiled, and the sugar is better developed by the baking process. The oven should not be too hot, and the beets must be frequently turned. Do not peel them until they are cooked, then serve with butter, pepper and salt.

**OMELET.**—Twelve eggs, twelve tablespoonfuls of fresh milk, one lump of butter the size of an egg, pepper and salt to the taste. Beat up your eggs thoroughly, whites and yolks separately; add the milk, pepper, and salt to the yolks, and then beat in the whites. Put the butter into the pan, and, when melted, pour in the eggs. Do not stir them, but let them brown. When the eggs are cooked, fold over the omelet, and let its own heat cook the inside.

**BUCKWHEAT CAKES.**—The best buckwheat cakes are made with an addition of corn-meal flour and oat-meal flour to the buckwheat, in this proportion: Six cupfuls of buckwheat, three cupfuls of oat-meal flour, or if this cannot be obtained, substitute Graham flour in its place, and one cupful of corn-meal flour; to this add a dessert-spoon evenly filled with salt, two tablespoonfuls of molasses, and luke-warm water sufficient to form a batter. Raise over night with yeast.

**A PLUM-PUDDING** (plain, but good).—One pound of raisins, one pound of currants, half a pound of citron, four tablespoonfuls of butter, one teaspoonful of soda, a teacupful of sour milk or buttermilk. Sift the soda into the flour as for biscuits, and rub in first the butter, then the fruit. Thin it with the eggs and sour milk until it is the consistency of fruit-cake batter. Tie up in a thick cotton cloth, scalded and floured, and boil for four hours. This pudding may be made with only one sort of fruit. Many prefer simply raisins instead of the above combination.

**FISH** requires great care in boiling. Small fish should be put into cold water, large fish, such as salmon, into hot, with salt and a tablespoonful of vinegar to every quart of water. You can tell whether it is sufficiently done by inserting the blade of a knife in the back of it; if it leaves the bone it is cooked. Fish should boil slowly. If you have no fish kettle, put a plate on a square of thin muslin, lay the fish on the plate and tie the muslin by the four corners, and put plate and all into a sauce-pan. You can then lift the fish from the water without breaking.

**BEEF TEA.**—Cut up lean beef in small pieces, raw, pour over it an equal weight of cold water, and let it stand three hours. Then pour off and set aside this water, and pour over the beef the same quantity of warm water, and let this stand three hours. Finally, pour together with the beef into a tin boiler with close cover the two waters and a third equal portion of hot water, and let it cook slowly for three hours. Then pour off the tea, and keep it in a cool place. Stir before using, and season to the taste with salt and pepper. Eat hot or cold. N. B.—One pound of water is very nearly one pint.

**DON'T POUND YOUR STEAK.**—We hear a great deal about that "abomination called fried steak." I will tell you how to make tough steak tender, and how to fry it so that it will be juicy. Do not pound it either with a rolling-pin or a potato-masher, or even with that jagged piece of metal or crockery-ware which house-furnishing dealers will try to delude you into buying. If you do pound it, you will only batter its fibres and let out all its juices. Pour into the bottom of a dish three tablespoonfuls each of vinegar and salad oil, sprinkle on them half a saltspoonful of pepper (and a tablespoonful of chopped parsley, if you have it). Do not use any salt. The action of the oil and vinegar will be to soften and disintegrate the tough fibres of the meat, without drawing out its juices. The salt would do that most effectually and harden the fibres beside. You may add a teaspoonful of chopped onion if you like its flavor. Lay the steak on the oil and vinegar for three or four hours, turning it over every half hour and then *sauté*, or half-fry it quickly; season it with salt after it is cooked, and serve it with a very little fresh butter, or with the gravy from the frying-pan. If you follow these directions and do not try to improve upon them, you can have tender steaks hereafter at will.—*Golden Rule*.

\$2.00