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## THE KIND OF APPLE TREES TO PLANT

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## Buy Young Stock and Prune it Properly-Keep the Heads Down-How to Prepare the Trees for Planting.

NYONE who is at all interested in fruit growing and who has travelled through our fruit sections must be impressed by the appearance of the young orchards and must realize the object lesson which is so plainly to be seen in a great many cases, especially in our apple sections. This lesson is the apparent lack of knowledge and realization of the importance of buying and preparing of young trees for planting. I do not mean to suggest that our leading growers have not come to realize the importance of this factor or to place the blame entirely on the shoulders of any individual class or classes wno may be engaged in the initial stages of this industry, but I do say that proper attention has not been given this phase of the industry and that a thorough

and continued educational campaign on this subject will accomplish great results and will indirectly be the means of saving to the growers thousands and thousands of dollars.

The greater number of farmers, wishing to plant fruit trees, believe that to attain the best results they must buy high trees They do not realize that the higher or larger the tree the longer it has been in the nursery row and the less individual attention it has received. In 1908, 1 planted 50 Wealthy trees and in ordering requested that these trees should be of the smallest type of well grown two-year-old trees as I wished to test my belief that a two-year-old tree was the best for our apple growers to plant. My reasons for this are the following:

First, the space allotted to the trees in the nursery row is just the same from the time they are first planted until they are dug for market and from my observations I had come to realize that after two years, the tree had fully utilized this space and head reached a state of development which lent itself most advantageously to transplanting.

Second, that after two years, the roots of trees in the nursery row took a greater hold on the soil, developing deeper roots and that in the process of digging a greater percentage of the finer roots were destroyed and, such being the case, were not as desirous as younger stock.

Third, that the system of pruning in the nursery does not enable the nurseryman to give each tree the individual attention which is required

for the formation of a proper head, and that this being the case, the sooner the comprehensive and intelligent farmer or fruit grower bought his trees the better able he would be to form a desirable head which is the most important factor outside of the question of vitality of stock, for the most deplorable and wasteful sight in our apple orchards is the apparent disregard to the formation of proper heads on the trees. Every year there are thousands of full bearing trees in Ontario which break down and split owing to the improper branching of the head, and the loss is tremendous and would be more noticeably so, if the amount could be computed.

Fourth, that a two-year-old tree has not to be pruned very much and offers every facility to the

characteristics of its variety and a strong, vigorous growth is the right age for transplanting to its permanent position. He must realize that the future development of the troo depends largely upon the initial stages; that the formation of a head is more easily accomplished within the first two years than at any later period; that during this period the work may be accomplished by rubbing off succulent growth or with the aid of a small knife; that all wounds heal very readily; and that the energy of the tree is more easily directed and manipulated than at any other period of the life of the tree.

## HEEL-IN UNTIL READY FOR PLANTING

The grower having given his order for trees, describing definitely and distinctly the class of tree, age and size and variety, receives them in the spring. As soon as these trees arrive, they should be taken out and heeled-in in a cool shady place until ready for planting. When the land is ready, the planting should be done in the cool part of the day, preferably in the afternoon.

When the trees are taken from the place where they were heeled-in, the roots should be pruned, not severely, but all broken ones should be cut off above the injured portion with a clean cut, and any roots which are too long (a decision which may only be arrived at by using your own judgment) should be removed in the same way. After this has been done, the roots should be puddled in mud and water and protected as much as possible until planted.

FORMING THE HEAD

If the nursery stock is young and has been well grown the formation of a head will be a comparatively easy matter. Decide upon the height of head from the ground which you desire to have and remove all branches below that height. If you

have to remove all limbs, then the formation of your head must be done the following year, only this work may be greatly ameliorated by directing the growth of the desirable buds and rubbing off all superficial ones. If, however, you have a top to form your head, then you must decide how many laterals are desirable, usually three or four. Then you must choose the permanent laterals with a view to their position and their relation to the future strength and uniformity of tree. It may only be possible to find two branches which are desirable as permanent ones, in which case, all the others must be removed and the growth stimulated in the direction required by means of checking the growth in other directions and it will be found that within a year or two you will have been able to have formed an ideal head. In choosing the position of the laterals, crotches must posi-







Trees that Illustrate the Difference Between Well-Formed Tops and Poor Ones and Between Young and Old Trees The first and second trees, from left to right, are two-year-old wealthys, treated as recommended tree is a four-year-old wealthys, treated as recommended tree is a four-year-old nursery tree planted at the same time as the other two. The percentage of loss in this catch was very market.

grower in the formation of an ideal head and allows him to adopt either the low-headed or highheaded tree, and offers a greater selection of branches which is very important in settling the relative position of one branch to another.

My experiment with the 50 Wealthy apples was carried on at Trenton. They were planted beside trees that were three to four years. They were all set at the same time and, in every case, the two-year-old stock proved to be the most desirous.

## STRIVE FOR THE IDEAL

An apple grower or, in fact, any fruit grower, in purchasing nursery stock, should endeavor to get that kind of stock which will most readily facilitate the promotion of his ideal of what a perfect tree should be. He must realize that the age at which a nursery tree has attained the