

The character of clay that is useful in such soil is sticky, puggy clay; not the marly kinds. Where the soil is naturally of a heavy character it may not be fit for treading down hard, because it might become a stodgy mass. When this is the case it is advisable to provide some lighter material to put over the roots when planting. The importance of firmly treading in the soil around newly planted trees and shrubs is often underestimated. It is really one of the most important factors in successful planting, and for quite opposite reasons in different cases. Suppose a tree or shrub is moved with a ball of earth attached, this ball of earth will be more or less hard according to the nature of the soil. A hole is prepared for the reception of the ball, and refilled when the tree is in position. Now, unless the soil that is returned is made quite as solid as the ball of the tree, water will centre into the loose soil and never penetrate the ball. The tree then dies of starvation when dry weather sets in. In such cases the soil should be trodden or rammed very firmly, the surface left loose, and the final filling should be done so as to leave the bole of the tree standing in a shallow cup—the lowest part, in fact—so as to direct rainfall to the ball of the tree. The opposite case is when a plant is put in that has no ball of earth, firm treading is just as necessary then to prevent an undue soaking of water to it, as would happen if the soil about it were looser than that in the surrounding plot.

Planting trees and shrubs of almost all varieties may with advantage be done in autumn, but some knowledge of local conditions is necessary in some cases. Where the soil becomes very cold and wet during winter it will probably be better to delay the work till spring, for it is not probable that trees can make new roots in cold, wet soil; and unless they do so the trees must perish. Early-autumn planting is the only alternative to waiting for spring in such cases. There is no doubt about the advantage of planting in autumn wherever possible. It practically means gaining a year.

#### THE CARE OF NURSERY PLANTS.

Many failures are experienced for want of proper treatment of young trees, &c., received from nurseries. There is a certain shock to young trees that are transplanted that is quite unavoidable. They also suffer somewhat during the period in which they are on the journey from the nursery to the planter. There should be a short period allowed in a suitable place for resuscitation before planting, or losses are sure to follow on sudden exposure to all the vagaries of wind and weather. My own plan is to unpack immediately on receipt, and heel the plants in a somewhat sheltered place in free soil. Heeling is done by throwing out a shallow trench to begin with, putting the soil on the side of the trench opposite the digger. A row of plants is laid close together,