

PLANTING TREES AND SHRUBS

WHEN TO PLANT

The best time of year to plant deciduous trees and shrubs is in the early Spring, before the trees have leafed out, and the late Fall, after the leaves have fallen but before the ground is frozen. The cooler weather, longer nights and shorter days are great for root development growth and plant establishment. Plant evergreens early in the Spring, up until four weeks after deciduous trees have opened their leaves. Otherwise, plant in the fall, from about the first week of August until the end of October. Planting can be done throughout the summer but this will put more stress on the tree and you will need to watch it more closely for signs of distress.

SOIL PREPARATION

When shaping the final grade of the planting beds, remember the importance of good drainage. Before placing the first plant in the ground assure adequate drainage. If a site is poorly drained, create raised beds. Often beds can be elevated 8 – 12" above the existing grade by using native soil on site, but sometimes it is necessary to apply additional well-drained soil. In extreme cases, you may have to install a drain tile to help carry water off the site. In shaping the final grade, avoid leaving dips or pockets where water is likely to stand. Shape beds so that excess water will be carried off the site and away from buildings. If you are planting around new construction, remove any debris left on the site that may cause plant growth problems. Soil compaction is also a problem near new construction. Tilling deeply and incorporating organic matter is often sufficient to loosen hard compacted soils.

ORGANIC AMENDMENTS

Organic amendments such as compost and manure are applied to soils to improve the nutrient and water-holding capacity. When adding organic matter to a soil, it is best to mix it with the existing soil throughout the rooting zone as opposed to placing it in the planting hole. As a general rule 1/3 of the total soil volume should be organic material. If only the planting hole is amended, the structure of the soil in the hole can differ significantly from that of the surrounding native soil. This can encourage the roots to stay within the confines of the hole and discourages them from entering the surrounding native soil, especially if a perfectly round planting hole is dug. In heavy clay soils, use a shovel or spade to notch out the sides of the round planting hole. This will enable growing roots to more easily enter the surrounding soil.

HOW DEEP TO PLANT

Trees and shrubs must be planted at the right depth and receive the right amount of water to establish themselves and flourish. Planting too deeply and under or over watering are among the most common and serious planting errors.

In well-drained soil, the planting hole should be dug to the height of the root ball and 2 – 3 times as wide. This means that the soil at the bottom of the hole is left undisturbed. Setting the root ball on loosened soil will cause the tree to sink too deeply into the soil, which can strangle the tree. Roots will also grow more quickly into loosened soil, thus speeding up the tree's establishment time. In poorly drained or compacted soil, place the plant 2 – 4" higher than its original planting depth. Be sure to build the soil up beside the root ball so that the sides are not exposed, and do not place additional soil on top of the root ball. This will allow oxygen to reach the roots in the upper surface of soil. It will also cause excess water to drain away from the plant rather than collecting beneath it. Do not disturb the soil under the root ball to prevent any later settling, which will move the plant roots deeper into the soil. The top of the root ball may dry out quickly in the summer on some sites, so be prepared to irrigate accordingly.

PREPARING AND SETTING THE ROOT BALL

Shrubs grown in plastic or other hard-sided containers can be removed from their containers and placed directly in the holes prepared for them. Cut any circling roots so they will not strangle the plant later on. If a shrub is pot-bound, use sharp pruning shears or a serrated knife to make slices 1- 2" deep going from the top of the root ball to the bottom. Make these slices in three or four places around the root ball. Try not to tear the roots. Pull the roots growing along the outside of the root ball away from the root ball. Slicing the root ball enhances the distribution of new roots in the surrounding landscape soil. New roots grow from behind the cut ends.

FILLING THE PLANTING HOLE

The soil used to fill in around the root ball of the newly planted tree or shrub is called backfill. Your best backfill will be the loosened original soil from the planting hole mixed with 1/3 compost. Loosen and break up any clods of soil before backfilling. Clods in the backfill create detrimental air pockets around the root ball and could hinder root growth and establishment. Place the plant into the planting area or hole at the correct depth, and then backfill the bottom half of the space around the root ball. Tamp the soil lightly with your foot. If amendments are not used, do not tamp so heavily as to compact the soil. Finish filling the hole in layers with the loose, amended soil, and gently firm the soil after each layer.

MULCHING

Apply a 2 – 4" layer of mulch over the newly planted area. Do not allow mulch to touch the stem or trunk to reduce chances of stem rot. Mulching helps eliminate weeds, retain moisture, moderate soil temperature, and eventually adds to soil organic matter content. Some commonly used mulches include pine needles, pine bark, hardwood bark, wood chips and partially ground leaves.

WATERING

Initially the root ball will need to be watered directly because the roots have not spread into the surrounding soil. Water the plant slowly and deeply after mulching. The best way to water a new planting is with a hose running at half speed over the area of the root ball for a few hours, depending on the type of soil. Become familiar with the planting site, and try to maintain constant moisture in the root ball for the first few months after transplanting. Good, deep watering practices result in plants that establish more quickly, with a more developed and deeper root system and thus become more resistant to drought, pests and disease.