



THE
AMERICAN
CHESTNUT
FOUNDATION®

TACF Fact Sheet

Planting American Chestnut in Pots:

Tips for a Successful Growing Experience

Planting Date

Planting American chestnuts in pots is a great way to prep your chestnut trees before your spring planting. Like many nuts, American chestnuts need to go through extended cold exposure, as they would in nature. This process is called stratification and it takes approximately 2-3 months for chestnuts to stratify properly. Nuts should remain in cold storage (think vegetable crisper) until at least January. In general, you want to start your chestnuts in pots about 2-3 months before your area is ready for spring planting.

Planting Container

American chestnut has a long tap root that needs plenty of room to grow, so use a container that is much deeper than it is wide. If you would just like to get a jump on spring and plant your tree outside once the weather is warm enough, a smaller pot is fine. We recommend a container 10" deep or more, like the Stuewe Deepot D40. You can even use something like an old milk or orange juice carton (make sure to poke some drainage holes in the bottom). If the tree will remain in the pot for most of the year, or longer, a larger pot is more appropriate. In these cases, a pot like the Stuewe TreePot or large 1-2 gallon container will be better suited for longer-term storage.



Figure 1.

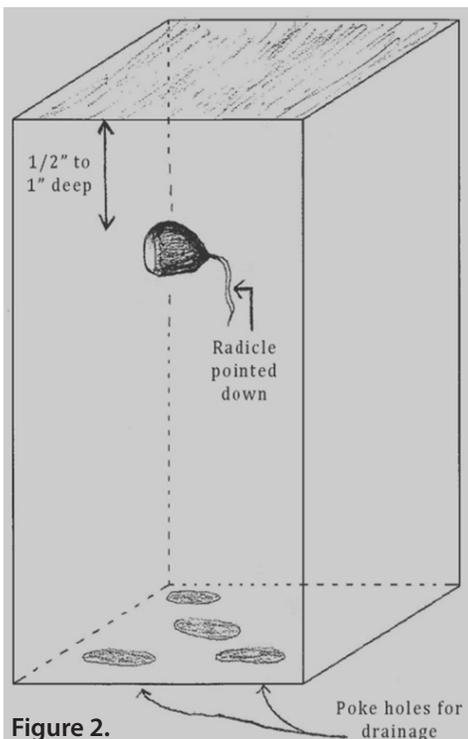


Figure 2.

Planting Mix

A soilless planting mix is best for providing good drainage and a weed-free germination environment for your chestnuts. Soilless planting mixes tend to include a lot of peat moss, which can be difficult to get wet. It is often easier to wet the planting mix in a larger container so you can work the water in by mixing (think kneading dough, see Figure 1). When choosing a planting mix, remember that American chestnuts do not like to be too wet, so keep this, as well as your own habits, in mind.

A simple mix of 1/3 each peat moss, perlite and vermiculite is a great high-drainage mix that many chestnut growers use. This mix does not hold too much moisture however, so if you may forget to water your trees on a regular basis you should look for a mix that holds a little more moisture, like Sun Gro Metro-Mix 560 Coir. Water will often bead up and runoff very dry peat moss, so pre-wetting your mix is helpful.

Planting the Seed

(Figure 2) Fill a pot with damp planting mix, tamp down and then poke a hole in the center with your finger or a hand spade. Often chestnuts will begin to sprout in cold storage so gently work the radicle (young root)



Figure 3.

into the hole until the nut is just below the soil surface. American chestnuts should be planted shallowly - a half-inch to one-inch deep. Do not break the radicle when you plant (this may kill the seed), and make sure you position the nut so that the pointed end, where the radicle comes out, is facing sideways (*NOT UP OR DOWN!* see **Figure 3**).

Chestnuts will often sprout while in cold storage and the radicle, or young root, can require a little extra care when planting. To plant, hold the nut sideways so the pointed end, where the radicle emerges, is facing sideways and the radicle is pointing down as much as possible (**Figure 4**). Carefully work the radicle down into the soil so the nut rests $\frac{1}{2}$ - 1" below the soil surface. If the radicle has emerged at an odd angle, the point of the nut can face down into the pot, but never plant with the point facing up. Place your newly-potted nut in a warm, sunny location. It should sprout within a week or two.

Seedling Care

Water your chestnut sparingly and allow the pot to dry out some between waterings. If the planting mix stays too wet, the nut may rot before it sprouts. Once sprouted, the seedling will need more water so adjust as needed. And of course, keep an eye on the temperatures. Water needs increase as temperatures increase and the winter sun can be warmer than you might expect.

As with caring for any living thing, vigilance is the key so check your seedling regularly. Most issues can be remedied if caught quickly.

Planting Outside

When you are ready to plant your seedling outside, remember that it will be much farther along in its development than if it had sprouted naturally and should be planted outside after risk of frost. Also remember that the seedling is accustomed to the protected environment inside and needs to slowly acclimate to conditions outside. This process is called "hardening-off" and should take at least two weeks. Transplanting can be stressful on a plant, so properly hardening-off your seedling will improve the odds for success.

A final tip – remove the remnant nut from the base of the seedling. At this point the seedling has used all the nutrients it needs from the nut, but the nut can still be attractive to rodents and other wildlife.



Figure 4.