Using Compost in Your Landscape

Reviewed by Alex Niemiera, Extension specialist, Horticulture

Shrubs and Trees
Add compost to the soil around your shrubs and trees. In late spring, place about 1 inch of compost around the plants. Cover this with a mulch of shredded pine needles, straw, bark chips, or leaves 2 to 3 inches deep. The humic acid from the compost and decomposing mulch will penetrate the soil and change its structure. This will improve the moisture retention, aeration, and fertility of the soil around your trees and shrubs.

Turf
Incorporating compost into soil is an excellent way to establish or renovate a lawn. Spread about 2 inches of compost over the planned lawn area. Till this into the soil before laying turf or planting grass seed. Topdressing existing lawns with up to 1/4 inch depth of quality compost 1 to 2 times per year is a great way to slowly but surely improve the soil over a few years time. Combining the compost application with coring the lawn (i.e. pluging) further accelerates the benefits of the compost application.

For more information on selection, planting, cultural practices, and environmental quality, contact your local Virginia Cooperative Extension Office. If you want to learn more about horticulture through training and volunteer work, ask your Extension agent about becoming an Extension Master Gardener.

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WHAT IS COMPOST?

Compost is produced when organic matter, such as garden and lawn waste, is broken down by bacteria and fungi. When added to soil it improves soil structure; sandy soils will hold water better while clays will drain faster. Compost also promotes a biologically healthy soil by providing food for earthworms, soil insects, and beneficial microorganisms.

When you purchase compost, buy it from a reliable source. Large-scale commercial composting is a controlled, high-temperature process that destroys weed seeds and disease organisms, and produces a relatively sterile product. You can also make your own compost with yard and kitchen wastes (see the Virginia Gardener brochure on Making Compost from Yard Wastes for the proper method).

Compost contains micronutrients beneficial to plant health, but is not considered to be a fertilizer as it is low in nitrogen, phosphorus, and potassium. The amount of nitrogen in compost is low compared to organic materials, such as manure. Since nitrogen in the plant waste is lost during the composting process) some nitrogen is also incorporated into organic compounds and released slowly after the compost is applied to the soil.

Compost Benefits the Environment

Compost contains an organic material called humus which assists the soil in holding nutrients. Humus lessens the need for chemical fertilizers and helps prevent leaching of nitrogen into groundwater. Humus-rich soil also promotes healthy plants which are less susceptible to diseases and insect pests. This can reduce the need for chemical pesticides.

Compost reduces erosion by improving soil structure. Better drainage allows water to flow into lower soil layers, rather than puddle on top and run off. Improved soil structure also helps the growth of roots which hold soil in place. Finally, compost recycles garden wastes to benefit the environment.

USING COMPOST

Container Gardening

Compost can be used to make a good container gardening medium. First, strain the compost through a sieve to eliminate large particles. Then mix two parts compost, one part garden loam, and one part perlite or sand. Add a tablespoon each of phosphate and potash for each pot of mixture. You can also substitute compost for peat moss in other suggested potting mixtures.

Vegetable and Flower Gardening

If you produce large amounts of compost, spread about 2 inches over your entire garden annually and work it 6 to 8 inches into the soil. More than 2 inches at one time may encourage grubs. As an alternative to compost, you can till 3 to 4 inches of shredded, uncomposted leaves into your garden or flower bed in the fall. The leaves will decompose during winter and enrich the soil.

If your supply of compost is small, use it with transplants. Dig the hole for your transplant and mix a trowel of compost into the backfill. The compost will loosen the soil for the young plant’s roots and also provide it with micronutrients.

Compost is not as effective for a mulch, as weed seed tends to grow rapidly in it.

Intensive Gardening

The purpose of intensive gardening is to harvest the most produce possible from a given space. The key to its success is fertile soil, high in organic matter. Humus-rich compost holds extra nutrients in the soil that might otherwise be leached out. It provides food for earthworms and beneficial microorganisms, and allows for deep root penetration, permitting closer spacing of plants.

Raised beds are basic to intensive gardening. You can create a raised bed by first mixing 2 inches of compost with the top 6 to 8 inches of garden soil. Then build beds by mounding soil from the pathways into raised beds approximately 8 to 12 inches high and 3 to 4 feet wide. Heavily mulch the pathways with wood chips to eliminate weeds. Repeat this every year. Or build wooden frames around the beds to make them permanent and enrich the contained soil with compost annually.