Composting: A Good Way to Handle Yard Waste

Did you know that the Father of our Country, George Washington, practiced composting? Being the innovator that he was, George was always trying new methods to improve his crop yields at Mount Vernon, where the topsoil was thin and full of clay. Severe erosion compounded infertile soils.

Washington undertook several experiments to find the best form of fertilizer. He started composting as an experiment on April 14, 1760. He used cow manure, fish heads and creek mud to start the compost, according to Dennis Pogue, director of restoration of Mount Vernon.

Some 230 years later, composting is still around, and still a good way to improve soil fertility and curb erosion. It improves the soil structure so that it holds more water with less runoff. More microorganisms allow for greater availability of nutrients in the form that plants need. Composting is also a great way to handle yard waste. Keeping it out of the storm sewers and even the local landfill is important because the nutrients can leach off into surface waters, where they could contribute to an algae problem. For more information on handling yard waste in general, including alternatives to composting, contact your UWEX office for the GWQ022 publication, *Managing Leaves and Yard Trimmings*.

It's easy to make compost at home, whether you have a big yard or a small one. Composting can be done in a modified garbage can or even in a simple plastic garbage bag. Dug into your garden, or spread on your lawn, flower bed, or around your trees, compost makes for healthier plants.

What to Use

Ideal compost substances include: grass clippings (although if you can keep most of them on your lawn, you'll be helping to feed your lawn); leaves; kitchen scraps (excluding meat, fat, bones, grains); manure (except pet waste); plant trimmings.

Getting Started

If you have the space, you can make a simple heap in your backyard. You can also use a large metal or plastic container, such as a garbage can. Cut out the top and bottom, and drill or cut holes in the sides (for ventilation). If you are really pressed for space, simply put the wastes in a black plastic garbage bag, seal it, and put in a sunny place.

To prevent odors and speed up the process, you want to provide your pile with plenty of air. You can do that by occasionally turning over your pile (the plastic bag has enough air trapped inside of it). Composting also requires a moist environment. If the center of your pile or bin becomes dry, add water to it as you turn it over. Small scraps will decay more quickly, so you may want to consider shredding your waste.

Hot Tips

Temperature is one of the key indicators in composting. Heat is generated as a byproduct of microbial breakdown of organic material, and you can use the temperature of your compost to gauge how well the system is working and how far along the decomposition has progressed. For example, if your compost heats up to 105 to 125 degrees Fahrenheit, you can deduce that the ingredients contained adequate nitrogen and moisture for rapid microbial growth.

The temperature at any point depends primarily on how much heat is being produced by microorganisms and how much is lost through aeration and surface cooling. How long the system remains hot, therefore, depends on the chemical composition of the ingredients as well as the size and shape of the system. Moisture content also affects temperature changes since water has a higher specific heat than most other materials. Drier compost mixtures tend to heat up and cool off more quickly than wetter mixtures.

Your compost will be ready when it is dark brown and crumbly, and about half its original volume. This can take anywhere from a couple of weeks to an entire year, depending on the season and how much attention you give it.

For more specific information on composting, contact the Department of Natural Resources Bureau of Waste Management, P.O. Box 7921, Madison, WI 53707, (608) 267-7566.