



BLOSSOM Organic Garden Store



4711 Black Lake Blvd SW, Olympia, Washington (360) 943-5670
Organic Growing Supplies for the Maritime Northwest

Gardening Information Leaflet (GIL) No. 2

\$5.00

**“DOING IT RIGHT”
THE MINERAL-AUGMENTED ORGANIC WAY
The Only Way to Grow!
MAKING COMPOST**

Compost, made properly, is an ideal soil amendment and fertilizer when mixed into the upper few inches of garden beds. While decomposition or rotting of organic matter goes on nearly everywhere in nature, composting is a human-invented method for speeding up the natural process of humus formation. It can take nature centuries to develop a single inch of topsoil by combining organic matter with rock minerals. The basic purpose of making and applying compost is to upgrade our topsoil for better and healthier plant or crop growth. **To emulate nature in soil making, we need to incorporate natural minerals over and above a simple mixture of organic (plant and animal) materials into the earth.**

In the making of compost lies the solution to many of the world's problems, as well as a multitude of lessons on how the world actually works. Compost represents the epitome of resource recycling and reduces pollution. Part of the appeal of compost is that it is made mainly of what are otherwise waste materials that are free or locally available with a little effort. Composting as a safe means of incorporating organic matter into the soil (and feeding micro organisms that aid the release of latent nutrients and feed your plants) is the heart of the organic method. Compost is great stuff! It's what organic gardening is famous for. However, not all composts are equal, and depending on what they are made with and how they are handled, composts can be nutrient-poor or rich with a highly available and full array of mineral and non-mineral nutrients. **Well made compost is free of weed seeds and disease organisms, which can be a problem with poorly made compost.**

The Trouble with Compost - Compost is frequently praised as the cure-all of gardening and raising crops. It is widely and naively believed that with compost alone, you can have a luxuriant garden forever. That may be absolutely correct or completely wrong, depending on the quality of the compost and the diversity of its ingredients. The trouble with compost is that it is many things to many people.

Seldom is compost made properly. A bunch of grass clippings, kitchen scraps, and dirt thrown in a fence corner is not true compost, nor is a pile of cow manure dumped out in a pasture, regardless of how much it is turned or how long it sits there. So-called mushroom compost (whether or not containing pesticides) can improve soil structure but is spent and has zilch nutrients. A second problem is that it is seldom possible to make enough compost for the needs of an average-sized garden. A cubic yard of compost, weighing about 1,000 pounds when reasonably dry, will cover 1,000 square feet to only 1/3 inch depth. Tilled into the top 8 inches of your soil, it is nearly lost. Compost is most efficiently and effectively used in the top few inches or on top of the soil, where a little does a lot.

Fortified Compost - Compost is regarded as both a soil conditioner (or amendment) and a fertilizer. However, while it is almost always an excellent conditioner and improves soil tilth (in part because decomposing microbes make “glues” that create crumb structure that aids aeration, drainage, and retention of moisture and nutrients), it may well be an inferior fertilizer in terms of nutrient analysis, unless plant materials and manures used to make it are augmented with minerals. This is especially true for our native maritime northwest soils which are often deficient in calcium and phosphorus and sometimes in potassium, magnesium, and boron. Because of this, for instance, west of the Cascades, we can grow only inferior hay without the plentiful addition of these fertilizing nutrients. BLOSSOM Organic Garden Store advises having a professional soil test made to tell you what nutrients you need initially and what you should add of the different organic and natural materials to achieve proper nutrient balance. We offer professional laboratory services and suggest re-testing at least

every four years. We also sell dozens of organic fertilizers in the form of plant and animal meals, minerals and liquid extracts.

Vegetables generally require high fertility. If the nutrients aren't in the soil in the first place (or at least are not in plant-available form), you can't get high fertility by merely recycling locally procured plant matter grown on nutrient-deficient or imbalanced soils. Even the best of barnyard manures are comparatively low in nutrients (although it is true that low analysis manures and compost help release what nutrients are already present in soil reserves). Thus importation of certain minerals, unfortunately, becomes mandatory for producing quality crops. Refer to GIL #1 on "SUPERIOR SOIL BUILDING" regarding the proper combining of minerals along with actual dirt in compost.

If your compost is to be more than simply a soil conditioner, you must *fortify* it with certain minerals as described in our Gardening Information Leaflet (GIL) #3 on "COMPOST MAKING BY THE S.P.A.M. SANDWICH METHOD." You can, of course, put those minerals directly on the garden (including calcitic lime usually). Better yet, you can incorporate them through compost applied to the garden seasonally.

Compost Fortifier Mix - For convenience, the mineral ingredients previously referred to can be applied as a mixture along with other nutrient materials of plant and animal origin that also supply some minerals and double as stimulants for more rapid and complete decomposition. Examples are seedmeals, bloodmeal, fishmeals (high nitrogen), bonemeal (high phosphorus) and kelpmeal (quick potassium) and soluble trace elements. These meals can partly make up for lack of manures. BLOSSOM Organic Garden Store has formulated a pre-blended Compost Fortifier Mix for this purpose made from 12 organic and natural fertilizing materials. Use about 4 cups for each S.P.A.M. layer on a typical pile measuring 3 ft x 3 ft x 3 ft. A 10 lb bag should be adequate. Incredibly, a pile 4 ft x 4 ft x 4 ft (64 sq ft) would be 7 times bigger.

Total Soil Management - Since you can seldom make enough compost to cover and work into the topsoil of your vegetable garden, flower beds, ornamentals, fruit trees, etc., you should use it as an adjunct to other soil building and management techniques including direct soil fertilizers and amendments, supplemental fertilizing (top and side dressings and foliar sprays), cover cropping ("green manuring"), "sheet composting," mulching and crop rotation. Compost is best used as a thin seed bed (ideal nutrient and moisture conditions for sowing seeds) and as a summer "mulch" around established plants. While compost may be used as a mulch to suppress underlying weed seed germination, it could foster blown-in or carried-in seed on top and thus a layer of bark chips or other organic material less-conductive for seed germination should be placed over the compost layer. All this may eventually be tilled in to decompose prior to the next seeding season. We plan to issue Gardening Information Leaflets (GILs) on all these other soil management aspects.