



home grown - community owned information sheet



composting

Compost is produced by the aerobic decomposition of organic matter (anything that was recently living). Any addition of organic matter to soils, e.g. by mulching, will result in compost but the quality will vary. All compost adds humus (or humic acids) to the soil. Humus improves water retention, binds and releases nutrients for plants, and improves soil structure. If you make hot compost using nutrient rich materials, compost can also be a fertiliser.

You can make compost by just putting all your garden and kitchen waste into a compost bay and leaving it for 1-2 years. However this will not kill any weed seeds or pathogens and will allow many of the nutrients to be lost to the air or leached. To make the best compost, you need to make HOT COMPOST.

Hot compost is like people. It needs AIR, WATER and a BALANCED DIET.

AIR

When building your compost heap you should try to keep as many air spaces throughout the heap as possible. This can be done by:

- putting woody sticks at the bottom when you start building the heap;
- keeping the heap 'fluffy' as you build it, never compact the material down;
- making thin layers of different types of material;
- avoiding thick layers of material that will form a mat, e.g. grass clippings and newspaper; and
- either building the heap around a stake, or inserting a stake into the centre of the heap once it has been built - rocking the stake to and fro introduces air deep into the heap.

WATER

The compost heap should be uniformly moist. This can only be achieved by watering each layer as you build the heap. It takes a lot of water! Dry, brown material should be watered much more thoroughly than fresh green material.

Keeping the compost heap at the correct level of moisture is essential if you want fast, hot composting. This can be achieved by housing the heap in a composting bay or bin, designed to suit your garden. In the southwest, rain cooling the heap and making it too wet is the main problem. So use compost bays with few holes in the walls and put cardboard/carpet or a lid over the top.

A BALANCED DIET

Any organic matter can be composted. However, the main ingredients for your compost heap are 'browns" and "greens". Browns are mostly carbon, very low in nutrients and tend to be dry. Greens are high in nitrogen, other nutrients and tend to be moist. Try to use roughly equal volumes of greens and browns to get the best C:N ratio.

If you do not have large amounts of greens, you can use a compost activator that is high in nitrogen. These include comfrey leaves (extremely high in nitrogen), liquid fish fertilisers, and any animal manure. Human urine (diluted 1:4 in water, or

collected in sawdust) is also high in nitrogen, as well as phosphorus - it is a crime to flush it away! Unless you know you can



make good hot compost, it is best to avoid using pet and human manure. However, do read The Humanure Handbook by Joseph Jenkins

hogco - composting

BUILDING YOUR COMPOST HEAP

The minimum heap size for successful hot composting is 1 m³. This is one of the reasons why commercial plastic compost bins often do not work well. You need to accumulate all the materials for the compost heap and then build it all in one go. If you have several large composting bays, you can use a batch system. Make at least 1 m³ at a time, but start the heap on top of the last one.

Your compost heap should start to heat up within 24 hours. If you put your hand into the compost, it should become slightly too hot for comfort. If it gets hotter than this or you can smell ammonia, you have added too many greens and are losing nitrogen to the air. If it does not heat up, the heap may be too dry, too wet or not have enough greens (nitrogen sources). In either case, the only remedy is to pull the heap apart and start again.

You can either turn your heap often, to ensure everything has been decomposed, or you can turn it into a second bay after 6-12 months. After another year it is ready to use. Having 3 bays means you will have a constant supply.

Researched and compiled by Jane Pickard

GREENS

- Fresh grass clippings
- Garden weeds
- Kitchen veggie scraps
- Water plants

BROWNS

- Aged grass clippings
- Straw
- Autumn leaves
- Pine needles
- Shredded newspaper
- Shredded cardboard

HERBS

It is a good idea to put a variety of herbs in your compost heap. They tend to break down quickly and add different micronutrients.

- Comfrey
- Yarrow
- Chamomile
- Valerian
- Nettle
- Dandelion leaves

OTHER THINGS

- Egg shells
- Hair/nail clippings
- Coffee grounds
- Old clothes (natural materials only)
- Cellophane
- Soil 10% of the heap
- Tea leaves/bags
- Seaweed (plants/ liquid)
- Vacuum cleaner dust

DO NOT ADD PERNICIOUS WEEDS!

These are very difficult to kill and some are illegal* to grow or put out with green waste!

- Couch roots
- Dock roots/seeds*
- Dandelion roots
- Giant Hogweed*
- Himalayan Balsam*
- Japanese Knotweed*
- Ragwort*
- Spear Thistle*

The Lasagne Method SOME POSSIBLE COMPOST between each layer WATER MATERIAL COMBINATIONS Apple pomace MOIST Blood meal ACTIVATOR Rice hulls DRY Lawn clippings MOIST ACTIVATOR Alfalfa meal Dried weeds DRY Kitchen trimings MOIST ACTIVATOR Dirt Leaves DRY Weens MOIST Manure ACTIVATOR Straw DRY