

COMPOSTING for KIDS!



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Composting is FUN!

It is also easy!
Let's learn about
how we make
compost and how
we use it to grow
beautiful gardens.



The Forest Floor

Nature recycles leaves and plants.

In a forest, leaves fall forming mulch that protects the soil.

Over time they decompose into nutrients that feed forest plants.



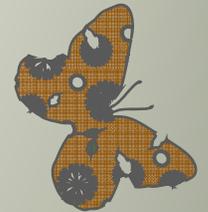
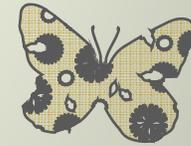
Making Compost in a Bin

You can recycle leaves and other plant materials at home by setting up a compost bin.



Set Up the Bin

First select a spot to set up your bin. It should be out of the way but convenient to reach with plenty of room to work around. Some good places would be near your garden or in a back corner of the yard. It is also a good idea to choose a location close to a source of water.



COMPOST RECIPE



The microorganisms that recycle leaves and other plant parts need an even mix of brown stuff and green stuff to munch on. They also need air and water to live and work. Put all this together and in time you will have compost.



Recipe Ingredients



- ✿ Air
- ✿ Water
- ✿ Brown Stuff
- ✿ Green Stuff



Five Containers of Ingredients

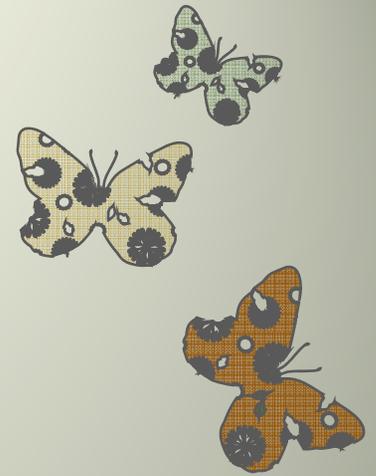
Brown stuff is dead, dried plant parts like leaves and pine needles. Brown stuff is high in the element carbon. Green stuff is fresh, living parts like grass clippings, kitchen vegetable scraps, weeds and other plants. Green stuff is high in the element nitrogen.



DON'T USE!!

Don't use meat, milk products because pets and other animals may try to dig them up out of your compost bin. Also, don't use diseased garden plants. They can spread disease back into the garden later when you use the compost.

- ✿ Meat
- ✿ Fat
- ✿ Pet droppings
- ✿ Bones
- ✿ Milk
- ✿ Diseased plants
- ✿ Cheese
- ✿ Oils



Add Leaves



It is easiest to build our compost bin in layers of ingredients. Start with brown stuff by spreading a layer of leaves or pine needles about 6 inches thick.



Carbon Sources

Here are some sources of carbon along with their carbon-nitrogen ratio. You can use these numbers to better determine how much brown and green stuff you should use to make the best mix for composting. Some things, such as sawdust, are very high in carbon compared to their nitrogen content, while others, such as leaves, are not so high.



Carbon sources:

- Dried Leaves 60:1
- Pine Needles 90:1
- Newspaper 125:1
- Sawdust 625:1



Add Grass Clippings

Next, for the green stuff, add a layer of grass clippings a few inches thick. It is helpful to mix the layers up a little as you make them.



Nitrogen Sources

- Here are some sources of nitrogen along with their carbon-nitrogen ratio. Once again, you can see that the ratio varies a lot between the different ingredients.

Nitrogen Sources:

- Food Scraps 15:1
- Grass Clippings 18:1
- Coffee Grounds 20:1
- Horse Manure 25:1



Shovel the Soil

Then sprinkle a shovelful of soil or compost to add microorganisms to the bin.



WATERING

Each layer gets a good sprinkling of water to wet the ingredients. It is important to wet each layer as you build it. Repeat each of the layers until the bin is full and then...



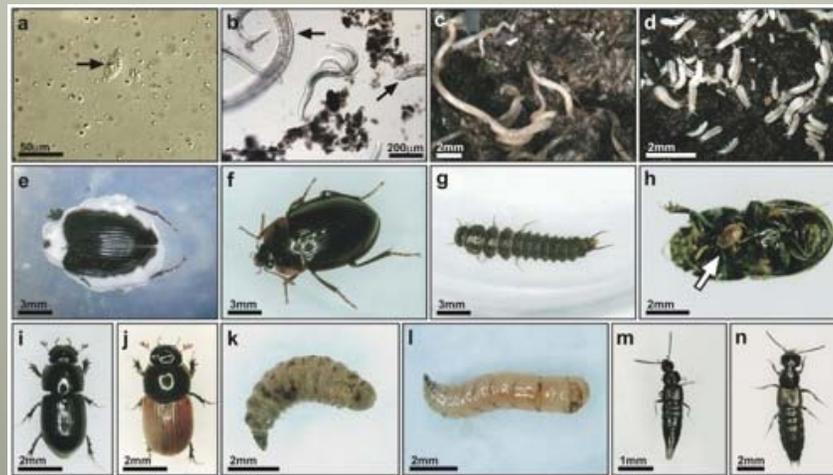
FINISHED BIN!

...TAH DAHHHH! The microorganisms will go to work breaking down the ingredients into humus. If you want fast compost, you can mix the ingredients every few weeks but this isn't necessary.



Compost “Critters”

Now tiny microorganisms (that you cannot see without a microscope) go to work breaking down the organic matter into compost. Later, as the compost cools down, you may see larger organisms such as millipedes, sowbugs, earthworms and others. Compost is teeming with living things!



Handful of Compost



This is compost, the dark, earthy-smelling stuff is rich in nutrients. Plants love it! Let's talk about how to use compost to help plants grow.



Use Compost as Mulch



You can use compost as a mulch around garden plants, like this rose bush. Mulch protects the soil and shades out weed seeds. Nutrients are washed out into the soil with each rain to feed the roots of plants.



Mix Into Planting Hole

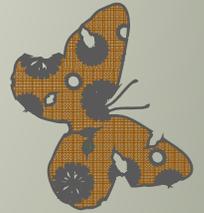


Compost is great for mixing into the soil when you are planting a new plant. It helps a sandy soil hold moisture and nutrients better and improves clay soils too.



Use Compost in Potting Soil

Compost mixed with some sand makes a super potting soil for growing plants in containers.



Trench Composting



Dumping Leaves in Trench

Another way to compost in the garden is by trench composting.

- Start by placing leaves in the trenches between raised beds, or in the pathways through your garden.

Shoveling Compost from Trench

By the end of the gardening season these leaves will be mostly decomposed and can be scooped up and placed around garden plants as an excellent mulch. Or, you can mix them into the planting beds to improve the soil.



Compost Pockets

Another way to compost in the garden is by making compost pockets. They are easy & FUN!

- ✿ Start by digging a hole about 18" deep. Place fruit, vegetable scraps and coffee grounds from the kitchen in the hole.
- ✿ **DON'T USE** meat, fat, milk or eggs because pets or wild critters will try to dig them up!



Covering With Soil

Next, cover the scraps with soil to bury them and fill the hole. Now you can make more compost pockets in other locations.

After about a month or two, you can plant a flower or maybe a tomato plant on the spot where you make the compost pocket. Then stand back and **WATCH IT GROW!**



For more information on composting:

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- Resources:
- Pictures from online sources too numerous to list – THANK YOU!
- Robert “Skip” Richter, County Extension Director, Travis County, Texas AgriLife Extension Service Online Document